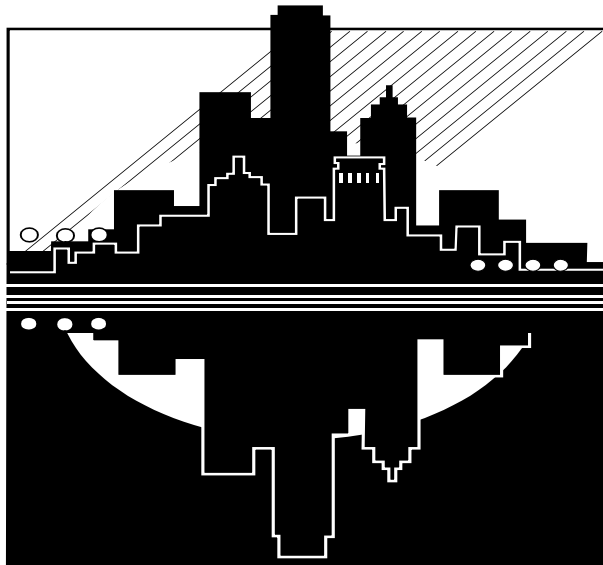
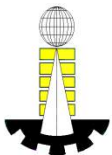


CONSTRUCTORS PERFORMANCE EVALUATION SYSTEM (CPES)

Implementing Guidelines For Infrastructure Projects



Amended Guidelines as Approved by NEDA InfraCom
Pursuant to the IRR of RA 9184
20 November 2014



Construction Industry Authority of the Philippines
PHILIPPINE DOMESTIC CONSTRUCTION BOARD

CONSTRUCTORS PERFORMANCE EVALUATION SYSTEM (CPES)
Implementing Guidelines for Infrastructure Projects
as amended on 13 September 2011

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FOREWORD

The original integrated **Constructors Performance Evaluation System (CPES) Implementing Guidelines covering Roads, Bridges, Housings, Buildings, Ports and Harbors Projects** was approved by National Economic and Development Authority (NEDA) Board's Committee on Infrastructure (INFRACOM) on 30 January 1998. The first and second set of amendments to the same guidelines was approved by the NEDA INFRACOM on 19 May 2005 and 27 August 2008, respectively. To cover all types of construction projects, the title of the guidelines was changed to **CPES Implementing Guidelines for Infrastructure Projects**.

Since 1999 up to present, various government agencies, among others, Department of Public Works and Highways (DPWH); Department of Transportation and Communications (DOTC); Department of Science and Technology (DOST); Department of Health (DOH), Department of Education (DepEd), Philippine Ports Authority (PPA), Philippine Tourism Authority (PTA); National Housing Authority (NHA); National Irrigation Administration (NIA); Pasig River Rehabilitation Commission (PRRC); Bases Conversion Development Authority (BCDA); Department of Trade and Industry (DTI); Government Service Insurance System (GSIS), Development Bank of the Philippines (DBP), Polytechnic University of the Philippines (PUP), University of the Philippines (UP), and Local Government of Guimaras, have been implementing CPES in their infrastructure projects.

To further improve the guidelines, the CPES Inter-Agency Committee (IAC) composed of representatives from the DPWH, DOTC, DOST, DepEd, NHA, NIA, BCDA, DBP, U.P., PUP, and PDCB formulated the 3rd set of amendments to the guidelines.

The 3rd set of amendments to the CPES Implementing Guidelines was prepared by the CPES-IAC and the PDCB during its 45th Regular Meeting held on 22 February 2011 under PDCB Resolution No. 03, Series of 2011, endorsed the same to the CIAP Board.

The CIAP Board, in its 59th Regular Board Meeting on 25 March 2011, resolved to endorse the proposed amendments to the CPES Implementing Guidelines under CIAP Board Resolution No. 10, Series of 2011, to the NEDA INFRACOM.

The NEDA-INFRACOM, during its meeting on 13 September 2011, approved the 3rd set of amendments to the **CPES Implementing Guidelines for Infrastructure Projects**.

The revised guidelines is intended to contribute in ensuring the quality and timely delivery of infrastructure projects in the country particularly government projects and improve performance of contractors.

September 2011

A C K N O W L E D G M E N T

The Philippine Domestic Construction Board (PDCB) of the Construction Industry Authority of the Philippines (CIAP) acknowledges with thanks the heads of the CPES Implementing Units (CPES-IU) of the following government agencies for their invaluable support in the formulation of the 3rd Revised CPES Implementing Guidelines for Infrastructure Projects:

Engr. Walter R. Ocampo		Department of Public Works and Highways
Engr. Wilfredo C. Borbor		Department of Transportation & Communications
Engr. Arnaldo C. Reyes		Department of Science and Technology
Atty. Elvira V. Estanislao		Bases Conversion Development Authority
Engr. Ma. Otelia F. Eclavea		National Housing Authority
Engr. Robert C. Suguitan		National Irrigation Administration
Engr. Oliver R. Hernandez		Department of Education
Engr. Clarito A. Magsino		Development Bank of the Philippines
Mr. Ariel S. Betan		University of the Philippines
Dr. Rolando C. Viray		Polytechnic University of the Philippines

CIAP-PDCB also recognizes the patience, diligence and selfless dedication of the following members of the CPES Inter-Agency Committee (IAC) which made this task possible:

Department of Public Works and Highways		
Engr. Melrose I. Pailma		Engr. Medmier G. Malig
Engr. Aristarco M. Doroy		Engr. Mathias L. Malenab
Department of Transportation and Communications		
Engr. Wilfredo C. Borbor		
Department of Science and Technology		
Engr. Arnaldo C. Reyes		Engr. Roberto P. Peredo
Engr. Willy F. Evangelista		
Bases Conversion Development Authority		
Engr. Arnel V. Fortunado		
National Housing Authority		
Engr. Ma. Otelia F. Eclavea		
National Irrigation Administration		
Engr. Robert C. Suguitan		Engr. Teresita Pantalla
Department of Education		
Arch. Harold V. Dime		
Development Bank of the Philippines		
Engr. Clarito A. Magsino		
University of the Philippines		
Arch. Allen R. Buenaventura		
Polytechnic University of the Philippines		
Engr. Angela L. Israel		
Construction Industry Authority of the Philippines Philippine Domestic Construction Board		
Engr. Sonia T. Valdeavilla		Engr. Leilani d.L. del Prado
Ms. Marita M. Relampagos		Mr. Jose M. Canuto, Jr.
Ms. Nenita F. Jaucian		Engr. Jake M. Velasco

EVALUATION OF CONTRACTORS PERFORMANCE
Section 12, Annex E of the Revised Implementing Rules and Regulations (IRR)
of Republic Act No. 9184

1. SUBJECT AND SCOPE

All procuring entities implementing government infrastructure projects are mandated to evaluate the performance of their contractors using the NEDA-Approved Constructors Performance Evaluation System (CPES) Guidelines for the type of project being implemented. These guidelines cover all infrastructure projects awarded by the government regardless of contract amount and funding source. CPES evaluation shall be done during construction and upon completion of each government project. To ensure continuous implementation of CPES, all procuring entities concerned are required to include in their Projects' Engineering and Administrative Overhead Cost the budget for the implementation of CPES pursuant to NEDA Board Resolution No. 18 (s. 2002).

2. EVALUATION GUIDELINES

For project types which do not have specific CPES Guidelines, the procuring entities concerned may formulate and adopt their own implementing Guidelines specific to their needs provided the NEDA-INFRACOM poses no objections to their adoption, and provided further that said Guidelines are made known to all prospective bidders.

3. IMPLEMENTATION MECHANISM FOR CPES

All procuring entities implementing infrastructure projects are required to establish CPES Implementing Units (IUs) in their respective offices/agencies/corporations. The CPES Implementing Units shall be responsible for the implementation of the CPES Implementing guidelines, including, but not limited to, the supervision of Constructors Performance Evaluators (CPEs) to be accredited by the Construction Industry Authority of the Philippines (CIAP). The procuring entity's CPES IU shall be responsible for the following: a) pre-screening of applications of CPEs, b) funding for CPEs accreditation training and seminars; and c) yearly evaluation of CPEs.

4. SUBMISSION AND DISSEMINATION OF EVALUATION RESULTS

All procuring entities implementing CPES shall submit the results of their performance evaluation to the CIAP on a monthly basis or as often as necessary. The procuring entity's CPES-IU shall likewise develop and maintain a databank and disseminate the CPES reports to the concerned units/departments within the procuring entity and to other interested users.

5. UTILIZATION OF EVALUATION RESULTS

The CIAP shall consolidate all of the CPES evaluation results received and shall disseminate the same to all procuring entities concerned. The CPES rating and other information shall be used by the concerned government agencies for the following purposes: a) pre-qualification/eligibility screening of constructors; b) awarding of contracts; c) project monitoring and control; d) issuance of Certificate of Completion; e) policy formulation/review; f) industry planning; g) granting of Incentives/Awards, and, in adopting measure to further improve performance of contractors in the prosecution of government projects.



Republic of the Philippines
NATIONAL ECONOMIC AND DEVELOPMENT AUTHORITY

NEDA sa Pasig, 12 Saint Josemaria Escriva Drive, Ortigas Center, Pasig City 1605
P.O. Box 419, Greenhills • Tels. 631-0945 to 64
<http://www.neda.gov.ph>

NEDA BOARD COMMITTEE ON INFRASTRUCTURE (INFRACOM)
Resolution No. 3, Series of 2011

**A RESOLUTION APPROVING THE PROPOSED AMENDMENTS TO THE
CONSTRUCTORS PERFORMANCE EVALUATION SYSTEM (CPES) IMPLEMENTING
GUIDELINES FOR INFRASTRUCTURE PROJECTS**

WHEREAS, Section 12 of Annex E of the Revised Implementing Rules and Regulations (IRR) of Republic Act (RA) No. 9184, otherwise known as the Government Procurement Reform Act (GPRA), mandates all procuring entities implementing government infrastructure projects to evaluate the performance of their contractors using the NEDA-Approved CPES Guidelines for the type of project being implemented;

WHEREAS, The CPES Guidelines cover all infrastructure projects awarded by the government regardless of contract amount and funding source;

WHEREAS, In order to ensure continuous implementation of CPES, NEDA Board Resolution No. 18, Series of 2002 (dated 10 December 2002) was issued requiring all procuring entities concerned to include in their Projects' Engineering and Administrative Overhead Cost the budget for the implementation of CPES;

WHEREAS, In order to streamline the implementation and to broaden the coverage on the type of infrastructure projects being implemented by procuring entities, the CPES Guidelines were revised on two (2) occasions, 19 May 2005 and 27 August 2008;

WHEREAS, There is a need to amend the existing CPES Guidelines to be consistent with the Revised IRR of RA No. 9184, which took effect on 02 September 2009, to include a new checklist and workmanship for *mooring facilities for power barges* and *diesel power plants* developed by the National Power Corporation (NPC), and to further enhance the effectiveness of the CPES in ensuring the quality of infrastructure projects of the government;

WHEREAS, The proposed amendments to the CPES Guidelines was formulated by the Philippine Domestic Construction Board (PDCB) and consequently endorsed by the Construction Industry Authority of the Philippines (CIAP) Board per its Resolution No. 10, Series of 2011 (dated 25 March 2011) to the INFRACOM for approval pursuant to Section 12 of Annex E of the Revised IRR of RA No. 9184;

WHEREAS, The proposed amendments to the CPES Guidelines were presented by the CIAP and PDCB to the INFRACOM in its Joint Cabinet Committee and Technical Board Meeting on 13 September 2011;

WHEREAS, The INFRACOM, during the said meeting, posed no objections to proposed amendments to the CPES Guidelines except on the proposed amendments concerning the issuance of the certificate of completion (Section 12.5) and the blacklisting of constructors (Section 12.7);


CERTIFIED TRUE COPY

WHEREAS, the recommended revisions of the INFRACOM on the above-mentioned Sections have been considered and incorporated accordingly in the amendments hereto attached as Annex "1".

NOW, THEREFORE, Be it resolved, as it is hereby resolved, to approve, as the same is being approved, the proposed amendments to the CPES Implementing Guidelines for Infrastructure Projects for adoption by the government which shall take effect fifteen (15) days upon publication by the CIAP in a leading newspaper of nationwide coverage or the Official Gazette and furnishing the University of the Philippines (UP) Law Center a copy thereof.

UNANIMOUSLY APPROVED, 13 September 2011.

For the INFRACOM:


CAYETANO W. PADERANGA, JR.
Secretary of Socioeconomic Planning
As Chairman, INFRACOM

Attested by:


LIBRADO F. QUITORIANO
Executive Director
INFRACOM Secretariat



REPUBLIC OF THE PHILIPPINES

NATIONAL ECONOMIC AND DEVELOPMENT AUTHORITY

NEDA BOARD COMMITTEE ON INFRASTRUCTURE (INFRACOM)
Resolution No.1, Series of 2014**A RESOLUTION APPROVING THE IMPLEMENTING GUIDELINES ON
CONSTRUCTORS PERFORMANCE EVALUATION SYSTEM (CPES) FOR
INFRASTRUCTURE PROJECTS**

WHEREAS, Annex E, Section 12 of the Implementing Rules and Regulations (IRR) of Republic Act (RA) No. 9184 or the "Government Procurement Reform Act" mandates all procuring entities implementing government infrastructure projects to evaluate the performance of their contractors using the NEDA-Approved Constructors Performance Evaluation System (CPES) Guidelines for the type of project being implemented;

WHEREAS, said Guidelines cover all infrastructure projects awarded by the government regardless of contract amount and funding source;

WHEREAS, the existing CPES Guidelines were approved by the NEDA Board Committee on Infrastructure (INFRACOM) on 27 August 2008;

WHEREAS, there was a need to amend the existing CPES Guidelines to further enhance the effectiveness of the CPES in ensuring the quality of infrastructure projects of the Government;

WHEREAS, the latest proposed amendments to the CPES Guidelines were endorsed by the Construction Industry Authority of the Philippines (CIAP) Board per its Resolution No. 4 dated 26 March 2014 for approval by the INFRACOM pursuant to Annex E, Section 12 of the IRR of RA 9184;

WHEREAS, the proposed amendments were presented by the CIAP to the INFRACOM for approval on 20 November 2014;

WHEREAS, the INFRACOM approved the amendments on the CPES Guidelines for Infrastructure Projects subject to the revision of Item 12.3 of the same for clarity;

WHEREAS, the corrected portion of Item 12.3 of the proposed amendments to the CPES Guidelines were submitted by CIAP in its letter dated 27 November 2014;

NOW, THEREFORE, be it resolved, as it is hereby resolved, to approve the proposed amendments to the CPES Guidelines for Infrastructure Projects for adoption by the government which shall take effect 15 days upon publication by CIAP in leading newspaper or the Official Gazette and furnishing the University of the Philippines (UP) Law Center a copy thereof.

UNANIMOUSLY APPROVED, 20 November 2014.

For the INFRACOM:


ARSENIO M. BALISACAN
Secretary of Socioeconomic Planning
As Chairman, INFRACOM

Attested by:


RUBEN S. REINOSO, JR.
Assistant Director-General and
Executive Director, INFRACOM Secretariat



CIAP BOARD RESOLUTION NO. 10
Series of 2011

**ENDORISING AMENDMENTS TO THE CPES IMPLEMENTING GUIDELINES TO
THE NATIONAL ECONOMIC AND DEVELOPMENT AUTHORITY (NEDA)
BOARD'S COMMITTEE OF INFRASTRUCTURE (INFRACOM) FOR APPROVAL**

WHEREAS, Section 12, Annex E of the Revised Implementing Rules and Regulations, (IRR) of RA 9184 or the Government Procurement Reform Act, requires all procuring entities implementing government infrastructure projects to evaluate the performance of their contractors using the NEDA-approved Constructors Performance Evaluation System (CPES) for the type of projects being implemented;

WHEREAS, the PDCB Board, during its 32nd Regular Board Meeting held on 29 July 2009, instructed the PDCB Secretariat to come up with a plan of actions to improve the implementation of CPES considering the issues and recommendations generated from the survey conducted by PDCB for this purpose;

WHEREAS, for this purpose, the CPES Inter-Agency Committee composed of representatives from the Departments of Public Works and Highways (DPWH), Transportation and Communications (DOTC), Science and Technology (DOST), Education (DepEd), the National Irrigation Administration (NIA), Philippine Tourism Authority (PTA), National Housing Authority (NHA), Bases Conversion and Development Authority (BCDA), Development Bank of the Philippines (DBP), University of the Philippines System (UP) and Polytechnic University of the Philippines (PUP) met on September 23 and November 20, 2009 and drafted proposals to amend the CPES Implementing Guidelines;

WHEREAS, the PDCB Board during its 45th Regular Meeting held on 22 February 2011, passed PDCB Resolution No. 03, Series of 2011, endorsing to the CIAP Board proposed amendments to the implementing Guidelines of CPES;

NOW, THEREFORE, the Construction Industry Authority of the Philippines, after due deliberations on its 59th Regular Meeting, **RESOLVES**, as it is hereby **RESOLVED**, to endorse to the National Economic and Development Authority (NEDA) Board Committee on Infrastructure (INFRACOM) for approval the proposed amendments to the Implementing Guidelines of the Constructors Performance Evaluation System (CPES) on Corrective Action Request (CAR), Blacklisting of Constructors, Uses of CPES Rating and Time hereto attached as Annex "1" and made an integral part of this Resolution.

UNANIMOUSLY APPROVED.

25 March 2011, Makati City

FOR THE CIAP BOARD:


ZENAIDA CUISON MAGLAYA

Undersecretary

(Representing DTI Secretary and CIAP Chairman Gregory L. Domingo)

Attested by:



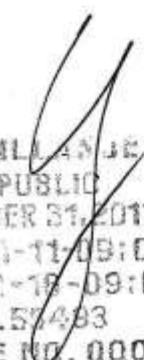
JESUS L. MOTOOMULL
Acting Board Secretary

Republic of the Philippines)
City of Makati)ss.

MAY 18 2011

SUBSCRIBED AND SWORN to before me, this ____ day of _____ 2011 affiant Jesus L. Motoomull, acting CIAP Board Secretary exhibiting his Community Tax Certificate No. CCI2010 05996607 issued on February 10, 2011 at Makati City

Doc. No. 347
Page No. 71
Book No. V
Series of 2011.



YOLANDA Y. VILLANUEVA
NOTARY PUBLIC
UNTIL DECEMBER 31, 2011
PTR NO. 9653180; 9-11-09; CAVITE
IBP NO. 783541; 2-18-09; MANILA
ROLL NO. 57493
MCLE COMPLIANCE NO. 0003210



**CIAP BOARD RESOLUTION NO. 4,
Series of 2014**

**"ENDORISING AMENDMENTS TO THE CONSTRUCTORS PERFORMANCE
EVALUATION SYSTEM IMPLEMENTING GUIDELINES TO THE NATIONAL
ECONOMIC AND DEVELOPMENT AUTHORITY (NEDA) BOARD'S COMMITTEE
OF INFRASTRUCTURE (INFRACOM) FOR APPROVAL"**

WHEREAS, Section 12, Annex E of the Revised Implementing Rules and Regulations (IRR) of RA 9184 or the Government Procurement Reform Act, requires all procuring entities, implementing government infrastructure projects to evaluate the performance of their contractors using the NEDA approved Constructors Performance Evaluation System for the type of projects being implemented.

WHEREAS, in the Philippine Domestic Construction Board (PDCB), in its efforts to improve the implementation of CPES, conducted series of CPES Interagency Meetings and came up with the proposed amendments to the CPES Implementing Guidelines under PDCB Resolution No. 1, s. 2013 and submitted the same to CIAP Board;

WHEREAS, during the CIAP 65th and 66th Regular Meetings held on 19 April and 26 July 2013, respectively, the Board discussed the proposed amendments to include among others the proposal for clarification of validity period on the disqualification of contractors and its automatic reinstatement into a good standing rating, in case there is no second and final CPES evaluation within a certain period.

WHEREAS, during the CIAP Special Meeting held on 10 September 2013, the Board further discussed the above proposed amendments and recommend the lifting of disqualification of contractors resulting in below satisfactory for CPES rating for ongoing project should be left at the discretion of the concerned agency instead of "automatic lifting" after one year. The said recommendation was sent back to PDCB for further study.

WHEREAS, during the PDCB 75th Regular Meeting held on 17 October 2013, the PDCB deliberated on the CIAP Board's recommendation and agreed to reword the proposed amendments to the CPES guidelines particularly, Sec. 12.3.4 in accordance with the said recommendation;

WHEREAS, the said final version of the proposed amendments to the CPES Guidelines incorporating the said recommendation was presented to the CIAP Board in its 67th Regular Board Meeting held on 26 March 2014 attached as "Annex A";

NOW THEREFORE, the members of the Construction Industry Authority of the Philippines after due deliberations in the said Meeting, **RESOLVES**, as it is hereby **RESOLVED**, to endorse to the National Economic and Development Authority (NEDA) Board Committee on Infrastructure (INFRACOM) for approval of the proposed amendments to the Implementing Guidelines of the Constructors Performance Evaluation System (CPES) on aspects and criteria for evaluation, requirements and procedure for renewal of accreditation as well as post qualifications, among others, hereto attached as "Annex A" and made an integral part of this Resolution.

Unanimously approved.
26 March 2014, Makati City

FOR THE CIAP BOARD:


SECRETARY ROGELIO L. SINGSON
Secretary Department of Public Works and Highways and
Vice Chairman/Member- CIAP

Department of Public Works and Highways
Office of the Secretary



OUT4\$54881

Attested by:

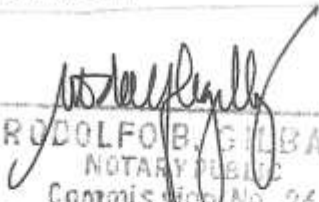

JESUS L. MOTOOMULL
Acting Board Secretary

Republic of the Philippines)
City of Makati)ss.

MAY 22 2014

Subscribed and sworn to before me, this ____ day of _____ affiant **ROGELIO L. SINGSON**, Vice
Chairman/Member- CIAP exhibiting his DPWH ID No. 10-Z0011 issued on April 4, 2011.

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Page No. 61
Book No. 63
Series of 2014.


RODOLFO B. GILBANG
NOTARY PUBLIC
Commission No. 26
Until December 31, 2014
PTR # 4-225833 Makati City
1-3-2014 Atty. Roll # 26704
MCLE No. 11-0008531
IBP No. 957356 Jan. 14 2014
Samer

Salient Features of Constructors Performance Evaluation System (CPES) Implementing Guidelines for Infrastructure Projects

Constructors Performance Evaluation System (CPES) – a system of grading the performance of a constructor for a specific kind of infrastructure projects using a set of criteria.

Mandate

Section 12, Annex E of the **Revised** Implementing Rules and Regulations (IRR) of R.A. 9184 or the Government Procurement Reform Act, requires all procuring entities implementing government infrastructure projects to evaluate the performance of their contractors using the NEDA-approved Constructors Performance Evaluation System (CPES) guidelines for the type of project being implemented. Section 12, likewise, requires all procuring entities to include in their Projects' Engineering and Administrative Overhead Cost, the budget for CPES implementation pursuant to NEDA Board Resolution No. 18 (s.2002); to establish CPES Implementing Units in their respective offices/agencies/corporations; and to use the CPES ratings for the following purposes: a) pre-qualification/eligibility screening; b) awarding of contracts; c) project monitoring & control; d) issuance of Certificate of Completion; e) policy formulation/review; f) industry planning; g) granting of incentives/awards; and in adopting measures to further improve performance of contractors in the prosecution of government projects.

Objectives

The CPES was developed in order to: a) establish a uniform set of criteria for rating the performance of constructors; b) develop a centralized base of information on performance rating of constructors for licensing, pre-qualification, quality improvement, and other purposes of government agencies, project owners and other interested parties; and c) contribute in ensuring that infrastructure projects are conformed with the specified requirements of project owners.

Persons Involved in CPES Implementation

1. CPES Implementing Unit (CPES IU) – refers to the unit of an agency responsible for the implementation of CPES;
2. Constructors Performance Evaluators (CPE) – refers to an individual or group of evaluators accredited by CIAP's PDCB tasked to undertake performance evaluation of a constructor's project using the CPES Guidelines and/or evaluation requirements of the construction industry; and
3. CIAP's PDCB – shall establish the CPES central databank and maintain linkages with concerned agencies to ensure timely and continuous submission of authenticated copies of accomplished CPES Evaluation Form and to facilitate information sharing among users of CPES data.

Aspects of Evaluation

1. **During Construction** (60% for Horizontal Projects such as Road, Bridge, Ports & Harbor, Irrigation and Flood Control, Water Supply and Sewerage, and Mooring Facilities for Power Barges and 70% for Vertical Projects such as

Housing, Building, Power Transmission Line, Substation and Diesel Power Plant) – minimum of two (2) visits with the conduct of first visit when the actual project accomplishment is at least 30% except for projects with a duration of 90 calendar days and below which may be subjected to at least one (1) final visit.

2. **Upon Completion** (40% for Horizontal Projects and 30% for Vertical Projects) – final visit when the Implementing Office reported 100% completion.

Criteria for Evaluation

1. **During Construction** (60% for Horizontal Projects and 70% for Vertical Projects)

<u>Criteria for Evaluation</u>	<u>Maximum Rating</u>
Workmanship	0.40
Materials	0.30
Time	0.15
Facilities	0.03
Environmental, Safety and Health	0.07
Resources Deployment	0.05
	===
T O T A L	1.00

2. **Upon Completion** (40% for Horizontal Projects and 30% for Vertical Projects)

<u>Criteria for Evaluation</u>	<u>Maximum Rating</u>
Workmanship	0.50
Materials	0.20
Time	0.30
	===
T O T A L	1.00

Workmanship – refers to the quality and quantity of on-going and/or completed items of work, which are verifiable, in accordance to approved plans and specifications. In evaluating the constructors workmanship, spots comprising at least 10% for every on-going and/or completed items of work; which are verifiable, shall be randomly predetermined by the CPE prior to actual site inspection.

Materials – refers to the quality, quantity and type of construction materials and components supplied by the constructor or by entities other than the constructors as required in the contract.

Time – refers to the over-all accomplishment in accordance with the approved PERT/CPM or approved program of work.

Facilities – refers to those set-up by the constructor prior to actual project start as indicated in the contract.

Environmental, Safety and Health – refers to the constructors’ ability to 1) comply with environmental protection requirements; and 2) observe the safety and health measures as specified in the contract.

Resources Deployment – refers to the ability of the constructor to deploy on time, based on the approved PERT/CPM or program of work, the required/pledged resources such as materials, equipment in good running condition and manpower.

Summary of the 3rd Amendments

Section	Features
1. Mandate	Modified “Implementing Rules and Regulations, Part A (IRR-A)” to “Revised Implementing Rules and Regulations (IRR)” to make it consistent with the Revised IRR of RA 9184.
2. Section 1 – General	
3. Section 6.1 – During Construction	Included the new checklists for workmanship for mooring facilities for power barges and diesel power plant projects.
4. Section 6.1 – Upon Completion	
5. Section 7.1.a – Workmanship	
6. Section 7.1.c - Time	Provided a formula for the computation of score for Time – During Construction for contracts with no materials or materials are supplied by the owner.
7. Section 7.2.c - Time	<p>Provided a formula for the computation of score for Time if the project is delayed to harmonize with Section III.a.2.b of the Guidelines on Termination of Contracts, and Section 8, Item 8.4 – Liquidated Damages on Annex E of the IRR of RA 9184.</p> <p>Provided a formula for the computation of score for Time – Upon Completion for contracts with no materials or materials are supplied by the owner.</p>
8. Section 11.4 – CPES Checklists	Included the new checklists for workmanship for mooring facilities for power barges and diesel power plant projects.
9. Section 12.2 – Agency Shortlist	Revised the existing Sections to be consistent with the Sections in the Revised IRR of RA 9184.
10. Section 12.3 – Post Qualification	
11. Section 12.5 – Issuance	Provided a provision to ensure that contractor

of Certificate of Completion Acceptance	and/or	complied with the Corrective Action Requests (CARs) issued by the CPES Evaluators before the agency's Implementing Office issue Certificate of Completion.
12. Section 12.6 Blacklisting Constructors	– of	Deleted the word “final” in the CPES final rating and specify Section 4.2f of the GPPB Guidelines for Blacklisting of Constructors.

CONSTRUCTORS' PERFORMANCE EVALUATION SYSTEM (CPES) IMPLEMENTING GUIDELINES FOR INFRASTRUCTURE PROJECTS¹

1. GENERAL

Section 12, Annex E of the Revised Implementing Rules and Regulation (IRR) of R.A. 9184 or the Government Procurement Reform Act, requires all procuring entities implementing government infrastructure projects to evaluate the performance of their contractors using the NEDA-approved Constructors Performance Evaluation System (CPES) guidelines for the type of project being implemented. Section 12, likewise, requires all procuring entities to include in their Projects' Engineering and Administrative Overhead Cost, the budget for CPES implementation pursuant to NEDA Board Resolution No. 18 (s. 2002); to establish CPES Implementing Units in their respective offices/agencies/corporations; and to use the CPES ratings for the following purposes: a) pre-qualification/eligibility screening; b) awarding of contracts; c) project monitoring & control; d) issuance of Certificate of Completion; e) policy formulation/review; f) industry planning; g) granting of incentives/awards; and in adopting measures to further improve performance of contractors in the prosecution of government projects.

2. OBJECTIVES

The CPES was developed in order to:

- 2.1 Establish a uniform set of criteria for rating the performance of constructors;
- 2.2 Develop a centralized base of information on performance rating of constructors for licensing, pre-qualification, quality improvement, and other purposes of government agencies, project owners, financing and insurance companies and other interested parties; and
- 2.3 Contribute in ensuring that infrastructure projects conform with the specified requirements of project owners.

3. SCOPE

The guidelines shall be used in the performance evaluation of constructors undertaking government infrastructure projects as follows:

- 3.1 Local constructors licensed by and registered with the Philippine Contractors Accreditation Board (PCAB);
- 3.2 Foreign constructors licensed by the PCAB; and
- 3.3 Joint ventures and consortia licensed by the PCAB.

¹ Full text of CPES Implementing Guidelines with amendments (in bold and underlined text) as approved by the NEDA Board Committee on Infrastructure (INFRACOM) on 20 November 2014 under Resolution No. 01, Series of 2014.

4. DEFINITION OF TERMS

- 4.1 **CIAP** - refers to the Construction Industry Authority of the Philippines, an attached agency of the Department of Trade & Industry created by Presidential Decree (PD) No. 1746 to promote, accelerate, and regulate the growth and development of the construction industry.
- 4.2 **Constructor** - deemed synonymous with the term builder and hence, any entity including joint venture and consortium licensed by PCAB who undertakes or purports to have the capacity to undertake or submits a bid for infrastructure projects.
- 4.3 **Constructors' Performance Evaluation System (CPES)** - a system of grading the performance of a constructor for a specific kind of projects using a set of criteria, approved by the NEDA-INFRACOM.
- 4.4 **Constructors' Performance Evaluator/s (CPE)** - an individual or group of evaluators accredited by CIAP tasked to undertake performance evaluation of a constructor's project using the CPES guidelines and/or evaluation requirements of the construction industry.
- 4.5 **Corrective Action Plan (CAP)** - is a plan of action proposed by the constructor to the concerned agency's implementing office which is aimed to correct the non-conformance findings on the project based on the CAR issued by the CPE(s). The CAP shall include the constructor's specific actions and timetable to immediately correct the findings subject to the approval by the head of the concerned implementing office or his authorized representative.
- 4.6 **Corrective Action Request (CAR)** - a request form wherein the CPE records his/her validated finding(s) including corresponding location(s) which do not conform to any of the checklist indicators requiring immediate actions by the constructor.
- 4.7 **CPES Implementing Unit (IU)** - the unit of an agency responsible for the implementation of CPES.
- 4.8 **Defects Liability Period** - shall be one (1) year from project completion up to final acceptance by the Government.
- 4.9 **During Construction** - reckoned from the time the construction is to start as stated in the Notice to Proceed (NTP) up to substantial completion of the project.
- 4.10 **GPPB** - refers to the Government Procurement Policy Board established under Section 63, Article XX of RA 9184.
- 4.11 **Head of the Procuring Entity** - refers to: (i) the head of the agency or body, or his duly authorized official, for NGAs and the constitutional commissions or offices, and branches of government; (ii) the governing board or its duly authorized official, for GOCCs, GFIs and SUCs; or (iii) the local chief executive, for LGUs: Provided, however, that in an agency, department, or office where the procurement is

decentralized, the Head of each decentralized unit shall be considered as the head of the procuring entity subject to the limitations and authority delegated by the head of the agency, department, or office.

- 4.12 **Implementing Office (IO)** - refer to the unit(s) or department(s) within the agency assigned to supervise the implementation of infrastructure projects.
- 4.13 **INFRACOM** - refers to the NEDA Board Committee on Infrastructure created under Executive Order No. 230, Series of 1987.
- 4.14 **Infrastructure Projects** - refers to construction, improvement or rehabilitation of roads and highways, airports and air navigation facilities, railways, ports, flood control and drainage, water supply and sewerage, irrigation systems, dams, buildings, communication facilities, dredging and reclamation, power generating plants, power transmission and distribution facilities and other related construction projects.
- 4.15 **NEDA** - refers to the National Economic and Development Authority.
- 4.16 **PCAB** - refers to the Philippine Contractors Accreditation Board, one of the implementing Boards of the CIAP which is tasked among others, to issue, deny, suspend, or revoke licenses of construction contractors by virtue of Republic Act 4566, as amended by PD 1746.
- 4.17 **PDCB** - refers to the Philippine Domestic Construction Board, one of the implementing Boards of the CIAP which is tasked to formulate, recommend and implement policies, guidelines, plans and programs for the efficient implementation of public and private construction in the country.
- 4.18 **Percentage Weight** - the weight for a specific item of work, computed by dividing its cost by the total contract amount multiplied by one hundred (100).
- 4.19 **Preventive Action Plan** - is a plan of action proposed by the constructor to the concerned agency's implementing office which is aimed to prevent the recurrence of non-conformance findings on his on-going and/or future projects.
- 4.20 **Rate** - the score for each item of work evaluated, derived using the criteria in evaluating the workmanship and materials aspects.
- 4.21 **Relative Percentage Weight** - refers to the weight of an item of work to be rated computed by dividing the percentage weight of the item of work to be rated by the sum of the percentage weight of all items.
- 4.22 **Relative Rate** - the product of the relative percentage weight and the rate for each item of work.

- 4.23 **Spot** - an area selected from the identified location of on-going and/or completed items of work which will be subject for evaluation/inspection.
- 4.24 **Upon Completion** - refers to 100% completion of the project as reported by the Implementing Office. Completion of project on time includes demobilization and final clean-up.

5. FUNCTIONAL/DEPLOYMENT FLOWCHART

The sequential activities to be undertaken by the CPES Implementing Unit (IU), Constructors Performance Evaluators (CPE), Constructor, Implementing Office (IO), and Construction Industry Authority of the Philippines (CIAP) are presented hereunder. The CPES Functional/Deployment Flowchart is illustrated in Annex 1.

5.1 Listing of Projects by the CPES-IU

The CPES-IU shall prepare the list of all infrastructure projects of the agency which have been issued Notice to Proceed (NTP) on a monthly basis upon receipt of documents “a” and “b” as listed in Section 10.1 hereof from the Implementing Offices concerned. Thereafter, the CPES-IU shall determine the frequency and tentative date(s) of the evaluation to be undertaken by the CPE for each project based on the following parameters:

- a. During Construction - Except for those projects with a duration of 90 calendar days and below which may be subjected to at least one (1) visit, all projects shall be subjected to a minimum of two (2) evaluations to be performed by the CPE. The number of evaluations beyond the prescribed minimum shall be determined by the CPES-IU based on the size, nature and complexity of the project and shall be subject to approval by the proper authorities within the agency. The first evaluation shall be performed when the project is at least thirty percent (30%) physically complete or as maybe required by the CPES-IU using the S-curve or other appropriate means to determine whether there is substantial work completed for evaluation.
- b. Upon Completion - only one evaluation shall be performed by the CPE right after the Implementing Office (IO) reports one hundred percent (100%) completion of the project.

5.2 Consolidation and Review of Documents by the CPES-IU

Prior to the tentative evaluation date(s), the CPES-IU shall require the IO concerned to submit copies of documents “c” to “f” as listed in Section 10.1 hereof and consolidate all of the submitted project documents for subsequent use of the CPE. The punch list listed as document “g” shall form part of the documentary requirement for the “upon completion” evaluation only. Based on the status of the project, the CPES-IU shall determine the most appropriate evaluation date(s)

and fills out the CPES Evaluation Forms to be used for such evaluation.

5.3 Assignment of CPE and Provision of Documents by the CPES-IU

The CPES-IU shall coordinate and schedule the most appropriate evaluation date(s) of the CPE. Also, the CPES-IU shall provide the CPE with all the necessary documents for evaluation. The CPE shall be selected by the CPES-IU from the evaluators accredited by CIAP.

5.4 Review of CPES-IU - Supplied Documents and Pre-determination of Spots for Evaluation by the CPE

The CPE upon receipt of the documents supplied by the CPES-IU shall review the same and enter pertinent data (e.g. standards and tolerances) in the appropriate spaces provided for in the CPES checklist. The CPE shall also select spots randomly for evaluation prior to site inspection.

5.5 Finalization of Evaluation Date(s) and Notification of Agency's and Constructor's Project Engineer and/or Authorized Representative

The CPES-IU shall finalize the date(s) of actual evaluation based on latest project updates provided by the concerned IO and the agreements made with the CPE. The CPES-IU shall, likewise, notify the agency's and constructor's project engineer and/or Authorized Representative before the actual evaluation date(s) within 24 hours for projects located in urban areas where means of communications are readily available and three (3) working days for projects located in remote areas. The presence of constructors and/or its authorized representatives is a requirement during CPES project site evaluation.

5.6 Notification of CPE, CPE Resource Persons/Witnesses by the CPES-IU.

The CPES-IU shall inform the CPE and CPE resource persons/witnesses as enumerated in Section 9.3 hereof of the evaluation date(s). The CPES-IU shall request their presence on said date(s) and specified venue. The resource persons/witnesses shall provide necessary information/inputs to the CPE.

5.7 Consolidation and Submission of Documents by Constructor's Project Engineer and/or Authorized Representative

The constructor's project engineer shall consolidate documents "a" & "b" as listed in Section 10.2 hereof and present the same during the on-site pre-evaluation meeting to be conducted by the CPE.

5.8 Conduct of On-site Pre-Evaluation Meeting among CPE, Resource Persons and Witnesses

Prior to actual evaluation, the CPE and its resource persons/witnesses shall meet to discuss the following: purpose and mechanics of CPES; scope and status of each work item (percentage of accomplishment) to be evaluated; documents supplied by the constructor's project engineer; and other factors affecting the implementation of the project. Based on said discussion, the CPE shall update/validate all of the standards/tolerances on relevant checklists to be used.

5.9 Conduct of Actual Evaluation by CPE

Based on the pre-determined spots to be evaluated, the CPE and its resource persons/witnesses, shall undertake the necessary evaluation and records findings in relevant checklists. The CPE may list additional indicators in relevant checklists if needed and corresponding findings. The CPE shall also take photos and/or videos to substantiate its findings.

Should there be a need to assess the constructor's performance during the defects liability period, the CPES-IU may request the CPE to undertake such evaluation. The evaluation results shall be submitted by the CPE to the CPES-IU and/or concerned units of the agency.

5.10 Conduct of Post-Evaluation Meeting

a. Validation of Findings by CPE

The CPE leader shall convene a meeting to be attended by the CPE members, resource persons and witnesses to deliberate on the findings and validate the causes for such.

b. Finalization of Evaluation Rating and CAR(s) by CPE

Based on validated findings, the CPE shall meet to finalize its evaluation rating as well as CAR(s), if any, using relevant forms. Each CAR, however, shall be prepared in duplicate copies.

c. Presentation /Issuance of Rating and CAR(s) by CPE

The CPE leader shall reconvene the meeting with the CPE members, resource persons and witnesses in order for him to present the evaluation rating and issue the duplicate copies of the CAR(s) to the constructor's project engineer.

d. Agreement on Rating and CAR(s) by Constructor's Project Engineer and/or Authorized Representative

If in agreement with the ratings and CAR(s), the Constructor's project engineer and/or Authorized Representative shall

acknowledge the relevant documents. Thereafter, said engineer and/or Authorized Representative shall be given duplicate copies of the CAR(s). But in case of disagreements with the rating or any of the CAR(s), the CPE leader shall inform said engineer and/or Authorized Representative that these shall be settled by an appropriate adjudicating body to be designated by the agency. In cases where the constructor and/or its representatives are absent during the CPES project evaluation, even after advance and proper notification, the CPES Rating of the constructor will be considered final and binding.

e. **Monitoring of Constructor's Compliance on CAR by CPES-IU**

To ensure and check constructor's compliance on CAR, the CPES-IU shall require the government project engineer to submit a Monitoring Report to the concerned Implementing Office, copy furnished the CPES-IU, to validate compliance with the CAR. Emphasis should be on projects with "Remove and Replace" proposed CAP and taking into consideration the pledged date of corrective action by the constructor. If possible, photos shall be attached to provide evidence on the works undertaken.

5.11 Submission of CPES Reports to CPES-IU

Immediately after the completion of the evaluation, the CPE leader shall submit to the CPES-IU the original copies of the accomplished CPES Evaluation Form (cover sheet, rating sheet, checklists and summary sheet), Constructor's Performance Summary Report and CAR(s). The CPE leader shall, likewise, prepare a report indicating the documents to be submitted to the agency's designated adjudicating body, in case when there is appeal made by the constructor.

5.12 Preparation and Implementation of Corrective Action Plan (CAP) and Preventive Action Plan (PAP) by the Constructor

Based on the non-conformance findings prepared by CPE, the constructor shall prepare and submit the corresponding CAP to the Head of the IO for his assessment and subsequent approval. If the CAP is approved by the Head of the Procuring Entity, the constructor's Project Engineer (PE) and/or Authorized Representative shall implement the plan which shall be monitored by the Project Owner's PE. The concerned IO shall monitor the constructor's implementation of all the recommendations made by the CPE on the noted non-conformances. This shall be supported by videos or photos before, during and after rectification has been made. After the constructor has satisfactorily completed all the corrections made, the IO shall submit the reports to the CPES-IU. However, if CAP is disapproved, the constructor's PE has to submit another CAP proposal for approval by the Head of the Procuring Entity. The constructor has to submit PAP proposal if similar findings by the CPE occurred twice or more. The process of PAP's approval is similar to CAP's.

5.13 Review of CPES Rating, Preparation of Reports, and Dissemination of Information by CPES - IU

The CPES-IU, upon receipt of the CPES Evaluation Report for a particular project shall review the completeness, accuracy and consistency of its contents. Should the contents be in order, the CPES-IU shall submit the reports to the CIAP, concerned IO and other departments/units which need the information.

After the required site visits for each project have been completed, the CPES-IU shall issue a CPES Rating to the constructor upon satisfactory completion of the necessary corrective actions listed in the CAR(s).

The CPES-IU shall submit to CIAP's PDCB an authenticated photocopy of the Constructor's Performance Summary Report within thirty (30) days after evaluation; except for implementing agencies evaluating more than one hundred (100) infrastructure projects which may submit the report within two (2) months after evaluation.

5.14 Databanking by CPES-IU and CIAP

All original copies of the CPES rating sheets shall be filed and pertinent data stored in a computer by the CPES-IU for easy access and processing of information in the future. This unit shall serve as the agency's databank for all CPES information and documents pertaining to its projects and constructors.

CIAP's PDCB, on the other hand, shall establish the CPES central data bank and maintain linkages with concerned agencies to ensure timely and continuous submission of authenticated copies of accomplished Constructor's Performance Summary Report and to facilitate information sharing among users of CPES data.

6. ASPECTS OF EVALUATION

The performance of the constructor shall be evaluated "during construction" and "upon completion" of a project. The assigned weights and aspects to be evaluated "during construction" and "upon completion" shall vary depending on the kind of project as follows:

- 6.1 During Construction** - with a weight of 60% for horizontal projects, such as road, bridge, port and harbor, irrigation and flood control, water supply and sewerage, mooring facilities for power barges, site development, etc., and 70% for vertical projects, such as housing and building, power transmission line, substation, and diesel power plant, etc., the maximum weight for the following criteria shall be:

<u>Criteria</u>	<u>Maximum Rating</u>
Workmanship	0.40
Materials	0.30
Time	0.15
Facilities	0.03
Environmental, Safety and Health (ESH)	0.07
Resources Deployment	<u>0.05</u>
Total	<u>1.00</u>

For contracts which do not involve the supply of construction materials or where the materials are supplied by the owner/agency, the maximum weights shall be:

<u>Criteria</u>	<u>Maximum Rating</u>
Workmanship	0.40
Time	0.20
Facilities	0.05
Environmental, Safety and Health (ESH)	0.10
Resources Deployment	<u>0.25</u>
Total	<u>1.00</u>

For projects which include both horizontal and vertical structures, the weight to be followed shall be that of the higher cost component of the project.

The assigned weight for vertical projects is higher than that for horizontal projects in view of the complexity of the nature of the former projects. In general, the evaluation “during construction” is assigned higher weight to ensure that constructors immediately attain satisfactory performance and maintain it until substantial work has been accomplished.

- 6.2 **Upon Completion** - with a weight of 40% for horizontal projects such as road, bridge, port and harbor, irrigation and flood control, water supply and sewerage, mooring facilities for power barges, **site development**, etc., and 30% for vertical projects such as housing and building, power transmission line, substation, and diesel power plant, etc., the maximum weight for the following criteria shall be:

<u>Criteria</u>	<u>Maximum Rating</u>
Workmanship	0.50
Materials	0.20
Time	<u>0.30</u>
Total	<u>1.00</u>

For contracts which do not involve the supply of construction materials or where the materials are supplied by the owner/agency, the maximum weights shall be:

<u>Criteria</u>	<u>Maximum Rating</u>
Workmanship	0.50
Time	<u>0.50</u>
Total	<u>1.00</u>

7. CRITERIA FOR EVALUATION

7.1 During Construction

a. Workmanship [Maximum Rating of 0.40]

Workmanship refers to the quality and quantity of on-going and/or completed items of work, which are verifiable, in accordance to approved plans and specifications. This aspect covers the utilization of the correct methodology needed in producing the desired quantity and quality of work. In rating this aspect, efficiency of methodology shall be considered.

In assessing/evaluating workmanship, the following procedures shall be observed: a) before going to the project site, the CPE shall identify the location of on-going and/or completed items of works based on the approved plan, and b) from the location identified, the CPEs shall select spots randomly for evaluation. The combined area of spots shall not be less than 10% of the on-going and/or completed items of works. Checklists for Workmanship for roads and bridges, housing and building, ports and harbor, irrigation, flood control, power transmission line, substation, mooring facilities for power barges and diesel power plant and site development projects are presented in Annex 2. Refer to Section 11.4a hereof in determining the rating for workmanship.

In case there are on-going or completed additional works or variation orders, which are verifiable, at the time of inspection, these shall be rated if said variations were approved by the Head of the Procuring Entity.

b. Materials [Maximum Rating of 0.30]

To impress upon the constructors the importance of materials in producing the desired quality of an item of work, this aspect is viewed separately from workmanship as another factor in assessing performance.

Materials means the quality, quantity and type of construction materials including asphalt and ready-mixed concrete, and components supplied by entities other than the constructors as required in the contract. The constructor gets the full rating of 0.30 for materials in a particular item of work if he complies with all the applicable indicators in the checklist for materials in Annex 3. Refer to Section 11.4b in rating materials.

Alternative construction materials used by the constructor may also be considered by the CPE in rating the materials aspect, provided there are supporting documents consisting of the approval by the owner's authorized personnel and test results. If a work item does not require the use of materials (e.g., demolition of existing structure, excavation, or scraping), the constructor automatically gets 0.30 in this aspect provided he gets the full rating in the workmanship aspect for such work item. However, if the particular item of work was not done or inadequately complied with, the rating for material shall be 0.00. Furthermore, when a particular item of work was not rated since it is no longer visible and cannot be verified, the material aspect for such item of work shall not be rated.

Materials for on-going or completed additional works, which are verifiable, at the time of inspection shall also be rated provided said variations were approved by the Head of the Procuring Entity.

Unlike the workmanship and materials aspects which are evaluated on a per item of work, the following four (4) aspects shall be appraised during each visit without particular attention to the work items completed/being completed by the constructor.

c. Time [Maximum Rating of 0.15]

This refers to the over-all accomplishment in accordance with the approved PERT/CPM or approved program of work. The constructor gets a full rating of 0.15 if he is on or ahead of schedule but gets a lower score if there is any delay or slippage attributable to his fault. The score shall depend on the percentage of delay as reflected in the checklist for time aspect presented in Annex 4. Refer to Section 11.4c in rating the time aspect.

For contracts with no materials or materials are supplied by the owner, the computation of score for Time aspect is presented in Annex 4 – For contracts with no materials or materials are supplied by the owner.

In case there are on-going or completed additional works or variation orders, time would be rated based on the effective PERT CPM and S-Curve approved by the Head of the Procuring Entity. In case it has not yet been approved by the Head of the Procuring Entity, time shall be rated based on the latest approved PERT CPM and S-curve.

d. Facilities [Maximum Rating of 0.03]

The facilities referred to are those set up by the constructor prior to the actual start of the project and maintained during the construction period. This aspect covers the provision of project signboard, sanitary and/or field and on-site office facilities which includes the surveying, transport and communication, testing and other equipment, appliances, utensils and other items as required

in the contract. The constructor merits a full rating of 0.03 if he complies with the indicators enumerated in the checklist for facilities presented in Annex 5. Refer to Section 11.4d in rating this aspect.

In case the contract does not indicate any provision for camp facilities, to be checked are the sanitary, field and on-site office facilities provided by the constructor for its technical staff and workers.

- e. Environmental, Safety and Health (ESH) [Maximum Rating of 0.07]

The constructor must learn to care for his environment and must try his best not to pollute during project prosecution. He must observe safety and health measures as required in the general and/or special contract provisions, and safeguard the lives of his workers and those of the general public. The constructor gets a full rating of 0.07 if he complies with the applicable indicators enumerated in the checklist for ESH presented in Annex 6. Refer to Section 11.4e in rating this aspect.

- f. Resources Deployment [Maximum Rating of 0.05]

In this aspect, to be evaluated is the constructor's ability to deploy on time, based on the approved PERT/CPM or program of work, the required/pledged facilities and resources such as materials, equipment in good running condition and manpower. Refer to Section 11.4f in rating this aspect. Resources deployment checklist is presented in Annex 7.

Should there be on-going additional works or variation orders at the time of inspection not yet covered by approved variation order, the provision on this matter as stated in Section 7.1-c shall likewise be adopted.

7.2 Upon Completion

- a. Workmanship [Maximum Rating of 0.50]

Workmanship is one of the three aspects to be evaluated when the project is one hundred percent (100%) complete as reported by the IO.

The punch lists prepared by the inspectorate team may serve as additional reference for project evaluation. The constructor shall merit a full rating of 0.50 for a particular item of work if he satisfies the applicable indicators in the checklist. Spots comprising not less than ten percent (10%) of the entire project shall be the sample size used in evaluating this aspect.

b. Materials [Maximum Rating of 0.20]

In rating the aspect of material, a full rating of 0.20 shall be given to materials in a particular item of work if he complies with applicable indicators in the checklist for materials in Annex 3.

If a work item does not require the use of materials (e.g. demolition of existing structure, excavation, or scraping), the constructor automatically gets 0.20 in this aspect provided he gets the full rating in the workmanship aspect for such work item. However, if the particular item of work was not done or inadequately complied with, the rating for material shall be 0.00. Furthermore, when a particular item of work was not rated since it is no longer visible and cannot be verified, the material aspect for such item of work shall not be rated.

c. Time [Maximum Rating of 0.30]

In rating the aspect of time, comparison shall be made between the approved contract completion time including time extensions granted and actual project completion time. Completion of a project on time includes demobilization and final clean-up.

The constructor shall get a full rating of 0.30 if he is on or ahead of schedule but if the project is delayed due to his fault, he gets a lower score. The score shall depend on the percentage of delay as shown in Annex 4 – Upon Completion.

For contracts with no materials or materials are supplied by the owner, the computation of score for Time aspect is presented in Annex 4 – For contracts with no materials or materials are supplied by the owner for Upon Completion phase.

8. CPES IMPLEMENTING UNIT

To ensure the effective implementation of CPES, each government agency undertaking infrastructure projects shall either create an independent unit or integrate the CPES functions in an existing unit with similar functions which shall act as the CPES-IU. Ideally, the CPES-IU should be under the office of agency head but it could also be attached to the agency's audit or monitoring group. Its organization and functions are as follows:

8.1 Organization

The CPES-IU shall be composed of the following:

- a. Unit supervisor - shall act as the head of the unit;
- b. Technical personnel - shall assist the head in the performance of the unit's technical functions; and
- c. Administrative personnel - shall perform all the administrative and coordinative requirements of the unit.

8.2 Functions

The CPES-IU shall have technical and administrative/coordination functions as follows:

a. Technical

- a.1 Undertake accreditation processes which consist of: a) pre-screening and endorsement of application of CPE applicants; and b) facilitate conduct of CPES required training and seminars;
- a.2 Undertake yearly performance evaluation of CPEs.
- a.3 Update CPE members on latest developments and other technical functions.
- a.4 Orient resource persons/witnesses.
- a.5 Review and prepare CPES reports and recommend appropriate actions based on the CPES Rating; and
- a.6 Assign its accredited CPE staff member/s to act as individual CPE/s or member/s of the CPE group/team as required.

b. Administrative/Coordination

- b.1 List all projects to be subjected to evaluation using CPES and identify/assign personnel to compose the CPE.
- b.2 Schedule orientation-seminar on CPES for in-house CPE members and resource persons/witnesses.
- b.3 Generate latest project status, schedule CPE site visits, coordinate visit with the Head of the Procuring Entity and constructor concerned, and file/safe keep all CPES related documents.
- b.4 Provide the CPE with CPES documents implementing guidelines and forms, and prepare CPE travel documents as required.
- b.5 Data banking and dissemination of CPES reports and documents to all concerned users within the agency, CIAP's Philippine Domestic Construction Board (PDCB), and other interested users.

To ensure that constructors understand the mechanics of CPES and how they are rated, their Authorized Managing Officers (AMOs) or their duly authorized Sustaining Technical Employees (STEs) shall be required to undergo a one-time Orientation Seminar on CPES to be conducted by the CIAP-PDCB prior to contract implementation.

9. CONSTRUCTOR PERFORMANCE EVALUATOR/S (CPE)

Each government agency shall have the option of tapping in-house staff, third party evaluators or combination of both either as group/team or individual to compose the CPE. For those agencies whose CPE will be composed of in-house evaluators only or combination of in-house and third party evaluators, such in-house evaluators could either be assigned on a permanent or ad-hoc basis. It is necessary that all CPE members are not in any way involved with the project to be evaluated in order for them to give an objective and unbiased evaluation of the constructor's performance.

9.1 Minimum Qualification of CPES Evaluators

All CPES evaluators shall be accredited by the CIAP based on the minimum qualifications as follows:

- a. Licensed Engineer or Architect.
- b. Must have at least 5 years experience in the actual implementation of project.
- c. In full enjoyment of his/her civil rights, must not have been convicted of a crime involving moral turpitude or of any other crime for which the penalty imposed upon him/her is over six (6) months of imprisonment.
- d. Willing to undergo all screening requirements and accreditation course for CPES evaluators to be conducted by the CIAP's PDCB or any of its accredited training institutions.

Professionals who have substantially complied with the minimum requirements stated in items "a" to "c" above, and who by reason of trainings or experiences in construction, conducted lectures on CPES accreditation courses upon invitation by the CIAP's PDCB are automatically accredited as CPES evaluators.

9.2 Procedure and Requirements for Renewal of CPE Accreditation

CPE accreditation shall be valid for a period of three (3) years from the date of accreditation. An application for renewal of CPE accreditation may be filed with the CIAP's PDCB not later than two (2) years from expiry date.

The CPES-IU or Accredited Professional Organizations (APOs) or Recognized Associations of Contractors shall endorse the renewal application based on the performance of the CPE. For renewal of CPE Accreditation, it is required that a CPE:

- a. be endorsed by the head of CPES Implementing Unit or Accredited Professional Organizations (APOs) or Recognized Associations of Contractors; and
- b. must have evaluated at least one (1) infrastructure project.

In cases where the CPEs did not have the chance to evaluate projects due to limited number of infrastructure projects of the agency, the following options may be applied:

Option 1

Require CPE to attend Enhancement/Orientation Seminar conducted by the Agency CPES-IU **or Accredited Professional Organizations (APOs) or Recognized Associations of Contractors** in coordination with PDCB;

Option 2

CPE applying for renewal of accreditation must have been involved in various CPES related activities such as but not limited to:

- a. Agency **or Accredited Professional Organizations (APOs) or Recognized Associations of Contractors** representative tasked to formulate/amend the CPES Guidelines, checklist, etc;
- b. Resource person during seminars conducted on CPES; and
- c. Served as CPE for other agencies.

9.3 Composition of CPES Evaluators

The composition of each CPE, individual or group, who have voting power, shall be:

Options	In-house CPE	Third Party CPE	Combination of In-House and Third Party CPE
Group or Team	One (1) CPE occupying supervisory position who shall act as the CPE leader. One (1) or more CPE/s as members.	Two (2) or more CPEs from other agencies/ <u>associations</u> and not directly involved with the project to be evaluated.	One (1) CPE occupying supervisory position. One (1) or more CPE/s from other agencies/ <u>associations</u> , and not directly involved with the project to be evaluated.
Individual	One (1) CPE not directly involved with the project.	One (1) CPE from other agencies/ <u>associations</u> , and not directly involved with the project to be evaluated.	

The resource persons/witnesses, who have no voting power, shall include the following:

RESOURCE PERSONS/WITNESSES	
one (1) or more	- Owner's and Constructor's Project Engineer and/or Consultant assigned in the project to act as resource person(s);
one (1)	- (Optional) Representative from any of the CIAP accredited constructors' associations nearest to the project site, knowledgeable in project implementation to act as witness;

one (1)	- (Optional) Representative from the Local Government Unit (LGU) where the project is located to act as witness;
one (1)	- (Optional) Representative from the end-user (e.g. social, religious, or civic organization).

10. DOCUMENTS REQUIRED FOR EVALUATION

The CPE should have the following documents for its review and reference during actual evaluation which shall be supplied by the IO and the constructor's project engineer:

10.1 IO-Supplied Documents

- a. Contract documents: approved contract agreement, contract drawing, general and special/local provisions including plans and specifications, method of construction, safety and health measures
- b. Approved constructor's construction program: CPM work schedule or bar chart, materials/manpower schedule, equipment schedule, organizational chart, financial chart such as S-curve or cash flow
- c. Constructor's statistical reports: physical progress/status, equipment and manpower schedules based on the latest approved PERT/CPM
- d. Materials testing procedures, records of tests and results, materials quality control program
- e. Constructor's operational set-up: general lay-out of facilities, project office and quarters, warehouse, shops for repair/maintenance/carpentry/rebar
- f. List of subcontractors or suppliers
- g. Punch list (for final visit upon completion)
- h. Relevant checklists, CPES evaluation form and cover sheet

10.2 Constructor's Project Engineer-Supplied Documents

- a. Project log book
- b. Updated records of tests/results and materials quality control program monitoring reports
- c. Other related reports

11. CPES EVALUATION FORMS

The CPES evaluation form and cover sheet to be used by the CPE is contained in Annex 8 and this shall be reproduced by the CPES-IU for distribution to all CPE(s) concerned prior to site visits.

11.1 Part 1 - Cover Sheet

Part 1 of the form is the cover sheet, which is to be filled up by the owner's project engineer contains the following general information: name and address of constructor; name and address of owner/authorized managing officer; valid license number; ARC category; nationality of constructor; project name, location; funding source; name of constructor's project manager and materials

engineer; name of government construction manager; original and revised contract amount and duration; scheduled date of project start and actual date started; and scheduled date of project completion and actual date completed (number of days advance/delayed are also indicated). Other necessary information pertaining to the project may also be included on this portion.

11.2 Part II - Rating Sheet During Construction

The CPE shall use Part II of the form during the “construction phase” first and second visits, respectively. In case the CPE intends to conduct more than two (2) visits during this phase, Part II of the form may be reproduced to correspond to the additional number of visits it shall make. Part III shall be used for the final visit.

For Part II, the CPE shall list the items of work evaluated during the visit, their corresponding percentage weights and relative percentage weights, and their rates and relative rates for both workmanship and material aspects. As defined in Section 4 hereof, the percentage weight of a particular item of work subjected to evaluation shall be computed by dividing its total cost by the total contract amount while the relative percentage weight of said item of work shall be computed by dividing its percentage weight by the sum of the percentage weight of all evaluated items of work. The relative rate for each item of work for both aspects, which shall be computed by multiplying the rate for each item of work with corresponding relative percentage weight, shall be added and later on reflected in the Summary of Ratings along with ratings for the other aspects covered.

However, in case there are on-going or completed additional works not yet covered by an approved variation order or request for time extension which is not yet approved during the visit, the CPE using a separate form shall fill up all relevant portions such as the Rate column for the workmanship and material aspects, time and resource deployment. The ratings therewith shall be used in updating the appropriate form, either Part II or III, only upon approval of the variation order or time extension.

For Part II, the CPE after completing the Summary of Ratings shall compute the “During Construction” Weighted Rating (A). This can be computed by adding all of the Ratings obtained for each visit during construction phase, dividing the sum of Ratings by the number of visits made, and then multiplying the quotient by sixty (60%) for horizontal projects or seventy (70%) for vertical projects.

11.3 Part III - Rating Sheet Upon Completion and Summary Sheet

For Part III, which will be used for the “upon completion” visit, the CPE shall list the items of work evaluated and their corresponding percentage weights and relative percentage weights, and their rates and relative rates for the workmanship aspect. After adding all of the relative rates, the sum along with the ratings for the time and materials aspects shall be reflected in the Summary of Ratings.

To determine the “upon completion” Weighted Rating (B), the CPE shall multiply the Total Rating by forty percent (40%) for horizontal projects and thirty percent (30%) for vertical projects. The Over-all Rating, on the other hand, shall be computed by adding the “during construction” Weighted Rating (A) and “upon completion” Weighted Rating (B) and multiply the sum by one hundred percent (100%).

The CPE head and members, resource persons/and witnesses present during each visit shall always affix their signature in the spaces provided for in Parts II and III.

After the over-all CPES rating of the constructor has been computed, this shall be reflected in the box marked “Qualitative Description” based on the range of constructor’s CPES rating for the specific project undertaken. Annex 8 shall be revised by the CIAP’s PDCB to indicate the new ranges of CPES ratings and their equivalent qualitative descriptions, as follows:

<u>CPES Qualitative</u> <u>Description</u>	<u>Ranges of CPES</u> <u>Rating</u>
Outstanding	> 96%
Very Satisfactory	> 89% ≤ 96%
Satisfactory	> 82% ≤ 89%
Unsatisfactory	≥ 75% ≤ 82%
Poor	< 75%

11.4 CPES Checklists

The checklists for each indicator are made to aid the accredited CPEs in the objective evaluation of constructors’ performance. These checklists are coded mainly for data banking purposes.

a. Checklist for Workmanship

For identification purposes, the checklist for workmanship for Road, Bridge, Housing, Building, Port and Harbor are coded with letters RBWS, HBWS, and PHWS, respectively. The first two letters refer to type, e.g. RB stands for Road and Bridge, and WS refers to workmanship.

The checklists for Workmanship for Road and Bridge, Housing and Building, Port and Harbor, Irrigation, Flood Control, Power Transmission Line, Substation, Mooring Facilities for Power Barges and Diesel Power Plant and **Site Development** Projects are contained in Annex 2.

The CPE shall select from the checklists those items of work which are applicable for evaluation/assessment. Indicators are set for each items of work but the CPE may add other indicators in the blank spaces provided for. All additional indicators shall be submitted to CIAP for coding purposes.

The checklists for workmanship in Annex 2 shall be revised by the CIAP's PDCB to reflect, among others, specific indicators for major and minor defects, and additional indicators as needed.

The CPE shall evaluate/assess the pre-determined spots based on the indicators set for each item of work. If there is non-compliance, the CPE shall determine if such is a major or minor defect. If an indicator is not applicable, the CPE should place NA (not applicable) at results box.

Defects are considered major on the following basis:

1. Entail losses to the government;
2. Seriously affect the stability of the structure;
3. Cause severe damage to the aesthetics (depends on the items of work involved).

Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).

Determining Results, Score, Total Score and Rate.

- a.1 Determine the number of non-compliance or full compliance per indicator
- a.2 $\text{Results} = \text{Compliance} / \text{Number of spots}$
- a.3 $\text{Score} = \text{Results} \times 0.40$ (During Construction);
 $\text{Score} = \text{Results} \times 0.50$ (Upon Completion)
- a.4 $\text{Total Score} = \text{Sum of all the scores}$
- a.5 $\text{Rate of an Item of Work} = \text{Total Score (a)} / \text{No. of Indicator (b)}$

b. Checklist for Materials

The checklist for Materials is contained in Annex 3 and starts with MAT followed by the blank space which is for the corresponding number of the item of work being evaluated. There are five (5) indicators for this aspect and all indicators shall be rated. Compliance to each indicator means full score of one (1) and non-compliance means score of zero (0).

If the constructor complies with indicator number 1 which is compliance to test requirements, then the remaining four (4) indicators need to be evaluated. If the constructor does not comply with indicator number 1, however, the remaining four (4) indicators shall also be evaluated for CAR purposes but the final rating is automatic zero (0).

If a work item does not require the use of materials (e.g. demolition of existing structure, excavation, or scraping), the constructor automatically gets 0.30 during construction and 0.20 upon completion in this aspect provided he gets the full rating in

the workmanship aspect for such work item. However, if the particular item of work was not done or inadequately complied with, the rating for materials shall be 0.00. Furthermore, when a particular item of work was not rated since it is no longer visible and cannot be verified, the material aspect for such item of work shall not be rated.

Determining Results, Score, Total Score and Rate.

- a.1 Results = If indicator is complied (C) = 1 and if not complied (NC) = 0
- a.2 Score = Compliance = 1 x 0.30 (During Construction);
Score = Compliance = 1 x 0.20 (Upon Completion);
Score = Non-Compliance = 0 x 0.00
- a.3 Total Score = Sum of all the Score (a)
- a.4 Determine number of indicators = 5 (b)
- a.5 Rate = Total Score (a) / No. of Indicators (b)

c. Checklist for Time

The checklist for Time is contained in Annex 4. Part One is for “During Construction” and Part Two is for “Upon Completion”. The checklist shall be revised by the CIAP’s PDCB to incorporate the new procedure for scoring of Time aspect which is through “calibration” instead of “bracketed” during construction phase.

For Part One – “During Construction” Form

Determining Results, Score and Rate

- a.1 Deduct the corresponding percentage of delay from 15% which is the maximum score for Time. The result is the score.
- a.2 Rate is equal to score (Rate = Score)

For Part Two – Upon Completion Form

The checklist shall be revised by the CIAP’s PDCB to incorporate the amendment during “Upon Completion” phase.

Determining Results, Score and Rate

- a.1 **Deduct the corresponding percentage of delay from 10% which is the maximum allowable negative slippage multiplied by 0.30 which is the maximum score for Time divided by 10. The result is the score.**

Use this formula for Determining Results, Score and Rate

$$S = \frac{(10\% - \% \text{ delay}) \times 0.30}{10}$$

Where : 10% is the maximum allowable slippage
0.30 is the maximum score for time
S is the score

a.2 Rate is equal to the score. (Rate = Score)

d. Checklist for Facilities

The checklist for Facilities is contained in Annex 5. The CPE should verify from the site if the indicators set for facilities are complied (C) or not complied (NC). Compliance means score of one (1) and non-compliance means score of zero (0). The CPE shall select only the indicators which are applicable.

Determining Results, Score, Total Score and Rate

- a.1 Results = If indicator is complied (C) = 1 or not complied (NC) = 0.
- a.2 Score = Compliance = 1×0.03 ; Non-compliance = 0×0.00
- a.3 Total Score = Sum of all the Scores (a).
- a.4 Determine number of indicators = 5 (b).
- a.5 Rate = Total Score (a) / No. of Indicators (b).

e. Checklist for Environmental, Safety and Health (ESH)

The checklist for ESH is contained in Annex 6. These were lifted from Department Order (DO) No. 13, series of 1998 of the Department of Labor and Employment (DOLE) entitled Guidelines Governing Occupational Safety and Health in the Construction Industry. The CPE should verify if each indicator set for this aspect is being strictly implemented by the constructor. The CPE shall select only the indicators which are applicable.

Determining Results, Score, Total Score and Final Rating

- a.1 Results = If indicator is complied (C) = 1 and if not complied (NC) = 0.
- a.2 Score = Compliance = 1×0.07 ; Non-compliance = 0×0.00
- a.3 Total Score = Sum of all the Scores (a).
- a.4 Determine number of indicators = 16 (b).
- a.5 Rate = Total Score (a) / No. of indicators (b).

f. Checklist for Resources Deployment

The checklist for Resources Deployment is contained in Annex 7. The CPE should check the actual deployment of resources (materials, manpower and equipment) and verify if the constructor complies or does not comply as per latest approved resources schedule. All indicators shall be rated.

Determining Results, Score, Total Score and Rate

- a.1 Results = If indicator is complied (C) = 1 and if not complied (NC) = 0.
- a.2 Score = Compliance = 1×0.05 ; Non-compliance = 0×0.00
- a.3 Total score = Sum of all the scores (a)
- a.4 Determine number of indicators = 3 (b)
- a.5 Rate = Total Score (a)/No. of Indicators (b)

11.5 **Corrective Action Request (CAR)**

The CPE shall issue CARs to the constructor for each finding of non-conformance, using the form attached as Annex 9. The IO shall approve and monitor the implementation of the corrective action plan submitted by the constructor.

11.6 **Constructors Performance Summary Report**

The CPEs shall process and summarize all their findings on the project in the Constructor's Performance Summary Report (Annex 10) and submit it to CPES-IU. The CPES-IU shall review and finalize the report prior to submission to the CIAP and other departments within the agency for data banking and other purposes.

12. **INFORMATION UTILIZATION AND DATA BANKING**

The CPES rating and other information contained in the authenticated copies of Constructors Performance Summary Report (Annex 10) to be regularly provided by government agencies concerned to CIAP's PDCB and centrally maintained by the same shall be made available to all interested users either electronically or in hard copy/diskette.

Pursuant to Section 12 (5), Annex E of the IRR of R.A. 9184, and to provide for a common and uniform application by all heads of agencies and instrumentalities of the national government, including government-owned and/or controlled corporations (GOCCs), government financial institutions (GFIs), state universities and colleges (SUCs), and local government units (LGUs), the CPES rating results shall be used for, but not limited to, the following purposes:

- 12.1 **Eligibility Check of Constructors** - The CPES rating shall form part of the requirements of the Bids and Award Committees (BACs) for eligibility check in the procurement of infrastructure projects pursuant to Section 23.5.2.4 of the IRR of R.A. No. 9184, which provides that the Owner's Certificate of **Final** Acceptance; or the Constructors Performance Evaluation System (CPES) **Final** Rating and/or Certificate of Completion, must be satisfactory.
- 12.2 **Agency Shortlist** - The CPES rating shall be considered in the shortlisting and selection of constructors for Negotiated Procurement under Section 53.1; 53.2; 53.3; 53.4 of the IRR of RA 9184. Constructors with CPES ratings of at least "Satisfactory" may be considered by the BAC in the shortlist of eligible constructors to be invited for negotiation pursuant to Section 54.2 of the IRR of R.A. No. 9184.
- 12.3 **Post-Qualification** - The CPES rating shall be used in the review of the technical capabilities of a constructor-bidder during the post-qualification stage pursuant to Section 34.3.b.ii of the IRR of RA 9184 which requires the agency to "check the performance of the bidder in its on-going government and private contracts." For this purpose, the BACs shall ensure that the following conditions are met:

- a) The constructor must not have a zero (0) rating for “Time” for on-going projects; and
- b) The constructor must have a CPES rating of at least “Satisfactory” in all of his on-going projects.

The following shall guide the applicability/non-applicability of below Satisfactory CPES on-going rating during post-qualification for purposes of contract award:

- 1. **When there is a second/final CPES evaluation conducted in a project, the latest CPES rating shall be considered.**
- 2. **When there is no final CPES rating on a project but has been completed and issued a Certificate of Satisfactory Completion by the project owner, the CPES on-going rating shall be disregarded.**
- 3. **When a project was terminated as determined in the supporting documents from the project owner, the following conditions shall be applied:**
 - a) **the CPES on-going rating shall be disregarded if termination is not due to the constructors’ fault, and**
 - b) **the CPES on-going rating shall be considered if termination is due to the constructors’ fault,**

The guidelines on the Termination of Contracts shall apply in terminating a project.

- 4. **When a second/final CPES evaluation has not been conducted after one (1) year from the date of latest CPES rating on on-going project in spite of constructors’ written request, the disqualification of a constructor arising from below Satisfactory CPES rating of on-going project may be lifted at the discretion of the agency concerned. However, the said constructor may also be allowed by other agencies to participate in the bidding process and award of contract at their own discretion.**

12.4 Awarding of Contracts - The CPES ratings may be used by the agencies as additional reference to ensure appropriate awarding of contract.

12.5 Issuance of Certificate of Completion for Projects Subjected to CPES Evaluation - The CPES Rating shall be used as basis for the issuance of the Certificate of Completion of projects evaluated using the CPES. If applicable, the concerned Implementing Office of each government agency is required to check compliance of constructors to all the Corrective Action Requests (CARs) recommended by the

accredited CPES evaluators and issued by the Implementing Agency. The constructors' compliance with all the CARs issued and other requirements of the project owner shall be the basis for the issuance of the Certificate of Completion.

- 12.6 **Project Monitoring and Control** - The CPES rating/information shall be used by agencies as a reference for project monitoring, audit, and quality control in ensuring the following, among others: a) compliance with contract provisions and specifications; b) prompt and effective action on problems encountered; c) compliance with safety and health regulations and d) compliance with environmental regulations.
- 12.7 **Blacklisting of Constructors** - A constructor with a CPES rating of "Poor" or "Unsatisfactory" in any of his projects shall be blacklisted from participating in any government project in accordance with Section 4.2 (f) of the GPPB Guidelines for Blacklisting of Constructors.
- 12.8 **Policy Formulation/Review** - The CPES rating and other related information shall serve as reference materials in the formulation and review of policies and procedures pertaining to, among others, eligibility check, bidding, award and contract implementation.
- 12.9 **Industry Planning** - The CPES rating and other information shall serve as additional reference by the agency's Planning Department/Division, and the CIAP and PDCB in the preparation of plans and programs for the development of the construction sector, including measures to improve constructor's performance in government projects.
- 12.10 **Granting of Awards & Recognition** - Constructors with CPES ratings of "Outstanding" shall be considered for awards and/or recognition for outstanding performance. For this purpose, the agency's CPES-IU and CIAP's PDCB shall ensure that the following conditions are met:
- a. The nominee must have at least three (3) projects with a consistent CPES final rating of "Outstanding (at least 96%)" within the period of review which is 3 years;
 - b. Projects already included in previous nominations shall no longer be considered;
 - c. No final CPES ratings of "Poor" and/or "Unsatisfactory" for the period under evaluation; and
 - d. The nominee has fully complied with and passed the CPES requirement on environmental, safety, and health concerns which include the submission to, and approval by, the DOLE of the Constructor's Construction Safety and Health Program.

The list of constructors who are awardees and granted recognition shall be posted conspicuously in the bulletin boards of government agencies and the GPPB's website.

CIAP's PDCB shall issue Certificates of Recognition to constructors with consistent CPES final ratings of "Outstanding".

- 12.11 **PCAB Registration and Classification** - When applicable, the CPES ratings shall form part of the requirements for Registration and Classification of government constructors pursuant to the guidelines to be issued by the PCAB.

13. APPLICABILITY

These guidelines shall be applied to all constructors of all national government agencies, department, bureau, office, or instrumentality of the Government, including government-owned and/or controlled corporations (GOCCs), government financial institution (GFIs), state universities and colleges (SUCs), and local government units (LGUs) undertaking infrastructure projects.

Private entities may also use these guidelines to evaluate their constructors' project performance.

14. EFFECTIVITY

These guidelines shall become effective upon approval by the National Economic and Development Authority (NEDA) Board's Committee on Infrastructure (INFRACOM) and fifteen (15) days after publication by CIAP.

LIST OF ACRONYMS

- | | | | |
|-----|----------|---|--|
| 1. | AMO | - | Authorized Managing Officer |
| 2. | BAC | - | Bids and Award Committee |
| 3. | CAP | - | Corrective Action Plan |
| 4. | CAR | - | Corrective Action Request |
| 5. | CIAP | - | Construction Industry Authority of the Philippines |
| 6. | CPE | - | Constructors' Performance Evaluator |
| 7. | CPES | - | Constructors' Performance Evaluation System |
| 8. | DOLE | - | Department of Labor and Employment |
| 9. | ESH | - | Environmental, Safety and Health |
| 10. | GFI | - | Government Financial Institutions |
| 11. | GOCCs | - | Government-Owned and/or Controlled Corporations |
| 12. | GPPB | - | Government Procurement Policy Board |
| 13. | INFRACOM | - | NEDA Board Committee on Infrastructure |
| 14. | IO | - | Implementing Office |
| 15. | IU | - | Implementing Unit |
| 16. | LGU | - | Local Government Unit |
| 17. | NEDA | - | National Economic and Development Authority |
| 18. | NGAs | - | National Government Agencies |
| 19. | NTP | - | Notice to Proceed |
| 20. | PAP | - | Preventive Action Plan |
| 21. | PCAB | - | Philippine Contractors Accreditation Board |
| 22. | PDCB | - | Philippine Domestic Construction Board |
| 23. | PE | - | Project Engineer |
| 24. | STE | - | Sustaining Technical Employee |
| 25. | SUCs | - | State Universities and Colleges |

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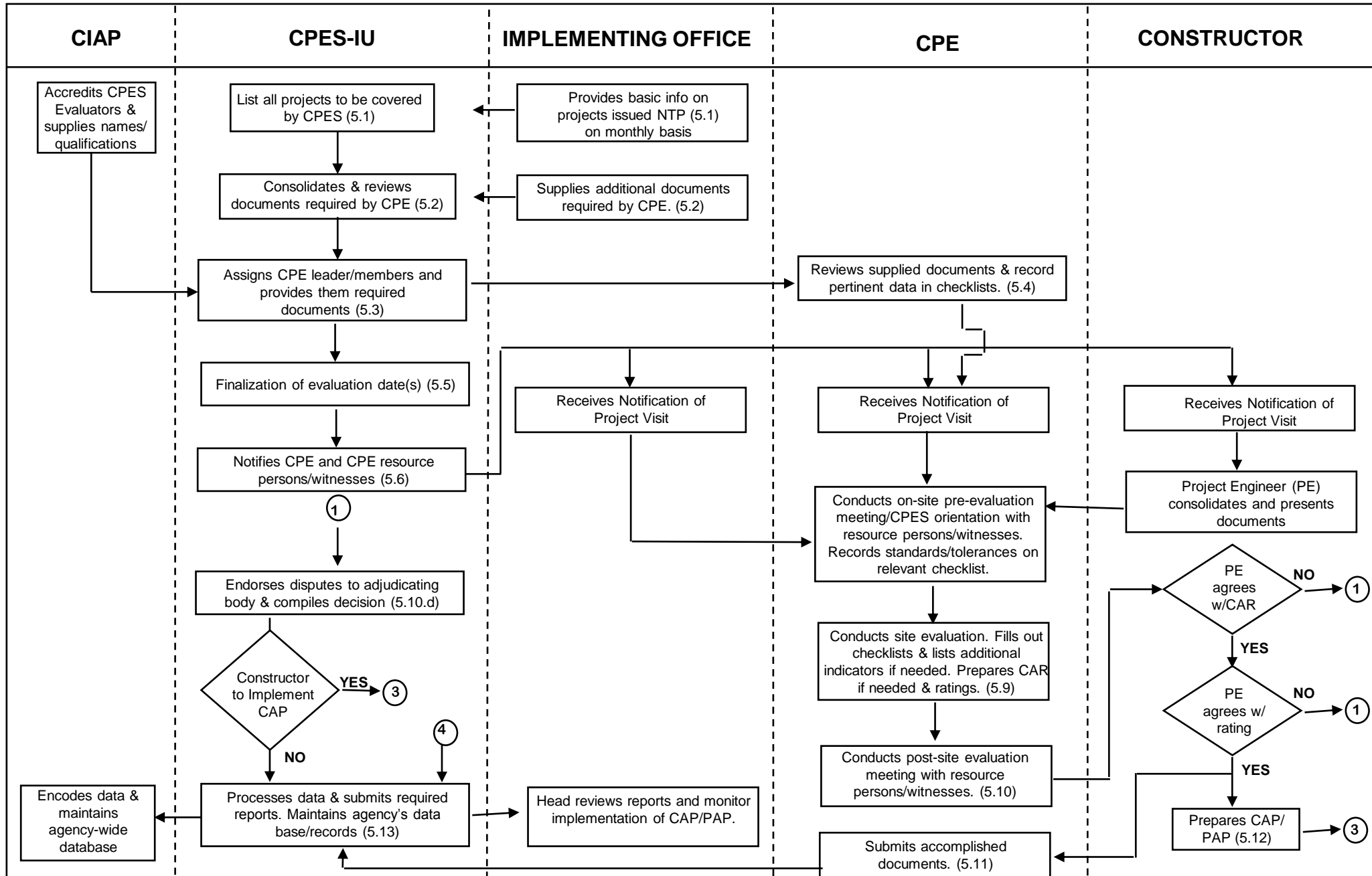
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 - J. Site Development Projects
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- Annex 9 - Corrective Action Request (CAR) Form
- Annex 10 - Constructors Performance Summary Report
- Annex 11 - Schedule of Minimum Test Requirements Governing Items of Work of the DPWH Standard Specifications for Highways, Bridges and Airports, 1995 (Vol. II)

Schedule of Minimum Test Requirements Governing Items of Work of the DPWH Standard Specifications for Highways, Bridges and Airports Using Test Requirements as Practiced by the National Transmission Corporation (TRANSCO) for Power Transmission Line and Substation Projects
- Annex 12 - List of Philippine National Standards (Construction Materials) for Mandatory Implementation

A N N E X 1

CPES FUNCTIONAL/DEPLOYMENT FLOWCHART

CPES FUNCTIONAL/DEPLOYMENT FLOWCHART



A N N E X 2

CHECKLISTS FOR WORKMANSHIP

- A. ROAD AND BRIDGE PROJECTS**
- B. HOUSING AND BUILDING PROJECTS**
- C. PORT AND HARBOR PROJECTS**
- D. IRRIGATION PROJECTS**
- E. FLOOD CONTROL PROJECTS**
- F. POWER TRANSMISSION LINE PROJECTS**
- G. SUBSTATION PROJECTS**
- H. DIESEL POWER PLANT PROJECTS**
- I. MOORING FACILITIES FOR POWER BARGES
 PROJECTS**
- J. SITE DEVELOPMENT PROJECTS**

ANNEX 2-A

CHECKLIST FOR ROAD AND BRIDGE

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CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Road
 LOCATION: _____

ITEM: Earthworks
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 100 Clearing & Grubbing, Item 101 Removal of Structure and Obstruction				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-10_-01	Proper removal of undisputed stumps roots and non-perishable solid objects/structures, vegetation, debris, tree and other obstructions (within carriageway)	/	_____ x _____ =	
Minor				
RBWS-10_-01	Proper removal of undisputed stumps roots and non-perishable solid objects/structures, vegetation, debris, tree and other obstructions (outside carriageway)	/	_____ x _____ =	
RBWS-10_-02	Conformance to proper disposal	/	_____ x _____ =	
		/	_____ x _____ =	
Item 102 Excavation, Item 103 Structure Excavation				
Major				
RBWS-10_-01	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions (if no longer correctible, e.g., with in-placed structure)	/	_____ x _____ =	
Minor				
RBWS-10_-01	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions (correctible)	/	_____ x _____ =	
RBWS-10_-02	Adherence to proper construction methodology	/	_____ x _____ =	
RBWS-10_-03	Conformance to proper disposal	/	_____ x _____ =	
		/	_____ x _____ =	
Item 104 Embankment, Item 105 Subgrade Preparation				
Major				
RBWS-10_-01	Adherence to proper construction methodology (if no longer correctible, e.g., layering, Item 105 not undertaken)	/	_____ x _____ =	
RBWS-10_-02	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions (if no longer correctible, e.g., with in-placed structure)	/	_____ x _____ =	
RBWS-10_-03	Adherence to compaction procedure and required equipment (if no longer correctible, e.g., done in layers but do not meet required compaction and succeeding layer was laid)	/	_____ x _____ =	
Minor				
RBWS-10_-01	Adherence to proper construction methodology	/	_____ x _____ =	
RBWS-10_-02	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions (correctible)	/	_____ x _____ =	
RBWS-10_-03	Adherence to compaction procedure and required equipment (correctible)	/	_____ x _____ =	
		/	_____ x _____ =	
Item 106 Compaction Eqpt. & Density Control Strips, Item 107 Overhaul				
Major				
RBWS-10_-01	Hauling distance for excavated materials claimed/considered overhaul beyond freehaul distance	/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Road
 LOCATION: _____

ITEM: Base & Sub-Base Course
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
SUB-BASE/BASE COURSE / Item 200, Aggregate Sub-Base Course, Item 201 Agg. Base Course, 202 Crushed Aggregate Base, 203 Lime Stabilized Road Mix Base, 204 Portland Cement Stabilized Road Mix Base, 205 Asphalt Stabilized Road Base, 206 Portland Cement Treated Plant Mix Base, 300 Aggregate Surface Course.				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-20_-01	Conformance of in-placed materials to plans and specifications	/	_____x_____ =	
RBWS-20_-02	Adherence to proper construction methodology (if no longer correctible, e.g., layering)	/	_____x_____ =	
RBWS-20_-03	Conformance w/ approved/specified tolerances on lines, grades, cross-section, thickness, elevation, dimensions & plans (if no longer correctible, e.g., not extended to shoulder and other succeeding items are already in-placed)	/	_____x_____ =	
RBWS-20_-04	Conformance to the required compaction	/	_____x_____ =	
Minor				
RBWS-20_-01	Conformance of in-placed materials to plans and specifications	/	_____x_____ =	
RBWS-20_-02	Conformance to required layering	/	_____x_____ =	
RBWS-20_-03	Conformance w/ approved/specified tolerances on lines, grades, cross-section, thickness, elevation, dimensions & plans (correctible)	/	_____x_____ =	
RBWS-20_-04	Conformance to the required compaction	/	_____x_____ =	
RBWS-20_-05	Sub-base/Base extended to shoulders	/	_____x_____ =	
RBWS-20_-06	Non-occurrence of subbase settlement/upheaval	/	_____x_____ =	
RBWS-20_-07	Provision of required stakes	/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Road
 LOCATION: _____

ITEM: Surface Course
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 301 Bituminous Prime Coat, Item 302 Bituminous Tack Coat, Item 303 Bituminous Seal Coat				
Major				
RBWS-30_-01	Conformance of in-placed materials to plans and specifications	/	_____X_____	
RBWS-30_-02	Observance of the required drying time	/	_____X_____	
Minor				
RBWS-30_-03	Conformance to the required rate and method of application	/	_____X_____	
		/	_____X_____	
		/	_____X_____	
Item 304 Bituminous Surface Treatment, 305 Bit. Penetration Macadam Pavement, 306 Bit. Rd. Mix Surface Course, 307 Bit. Plant Mix Surface Course, 308 Bit. Plant Mix Surface Course, 309 Bit. Plant Mix (Stockpile Maintenance Mixture), 310 Bituminous Concrete Surface Course (Hot Laid)				
Major*		* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects		
RBWS-30_-01	Conformance of in-placed materials to plans and specifications	/	_____X_____	
RBWS-30_-02	Monitoring/checking of temperature mix prior to placing/spreading/compaction	/	_____X_____	
RBWS-30_-03	Conformance to the temperature requirement	/	_____X_____	
RBWS-30_-04	No alligator and longitudinal cracks	/	_____X_____	
RBWS-30_-05	Conformance to the approved/specified tolerances for thickness, width, length, slope and cross-section (>10% deficient)	/	_____X_____	
RBWS-30_-06	No bleeding on asphalt pavement (> 1 sq. m.)	/	_____X_____	
RBWS-30_-07	No upheaval (severe and needs R/R)	/	_____X_____	
RBWS-30_-08	No ravelling (severe and needs R/R)	/	_____X_____	
Minor				
RBWS-30_-05	Conformance to the approved/specified tolerances for thickness, width, length, slope and cross-section (≤10% deficient)	/	_____X_____	
RBWS-30_-06	No bleeding on asphalt pavement (≤1 sq.m)	/	_____X_____	
RBWS-30_-07	No upheaval	/	_____X_____	
RBWS-30_-08	No ravelling	/	_____X_____	
RBWS-30_-09	No temperature cracks	/	_____X_____	
RBWS-30_-10	Conformance to the required density	/	_____X_____	
		/	_____X_____	
		/	_____X_____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT _____

PROJECT TYPE: Road
LOCATION: _____

ITEM: Surface Course
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 311 Portland Cement Concrete Pavement (PCCP)				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-311-01	No longitudinal cracks	/	_____X_____	
RBWS-311-02	Conformance to vibration requirement	/	_____X_____	
RBWS-311-03	Conformance to quality of concrete mix	/	_____X_____	
RBWS-311-04	Conformance to requirements of construction joints (outside middle thirds)	/	_____X_____	
RBWS-311-05	No through cracks (all types of cracks)	/	_____X_____	
RBWS-311-06	No scaling (severe, needs Removal and Replacement)	/	_____X_____	
RBWS-311-07	Conformance to the approved/specified tolerances for thickness, width, length, slope and cross-section (>10% deficient)	/	_____X_____	
Minor				
RBWS-311-05	No cracks e.g. transverse, diagonal, temperature, corner, restraint	/	_____X_____	
RBWS-311-06	No scaling	/	_____X_____	
RBWS-311-07	Conformance to the approved/specified tolerances for thickness, width, length, slope and cross-section (≤10% deficient)	/	_____X_____	
RBWS-311-08	No honeycomb	/	_____X_____	
RBWS-311-09	No spalling	/	_____X_____	
RBWS-311-10	No chipped-off edges	/	_____X_____	
RBWS-311-11	Conformance to required size, location & spacing of tie bars and dowel bars as per specifications	/	_____X_____	
RBWS-311-12	Conformance to proper curing procedures	/	_____X_____	
RBWS-311-13	Utilization of templates prior to pouring	/	_____X_____	
RBWS-311-14	Conformance to placing requirement which will not result to segregation of aggregates, cold joints, misalignment	/	_____X_____	
RBWS-311-15	Conformance to required amount of asphalt sealant on weakened plane joints (insufficient and excessive application)	/	_____X_____	
RBWS-311-16	Conformance to requirement of pavement blockings (include depths and widths of weakened plane joints)	/	_____X_____	
RBWS-311-17	No hardened/spilled concrete on pavement	/	_____X_____	
RBWS-311-18	No pokemarks/tire marks/animal footmarks/skid marks, etc.	/	_____X_____	
RBWS-311-19	Conformance to proper finishing of concrete (brooming)	/	_____X_____	
RBWS-311-20	Conformance to formworks requirements (wooden, defective steel and not applied with oil/grease)	/	_____X_____	
		/	_____X_____	
		/	_____X_____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Bridge
 LOCATION: _____

ITEM: Piling
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 400 Piling				
400-1 Timber Piles				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-400-1-01	Conformance of in-placed materials to plans and specifications	/	_____x_____	
RBWS-400-1-02	Conformance to construction methodology (installation, location and type)	/	_____x_____	
RBWS-400-1-03	Conformance to splicing requirements	/	_____x_____	
RBWS-400-1-04	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (>20 mm / m), elevation, location (>150 mm) & spacing	/	_____x_____	
RBWS-400-1-05	Piles provided with gradation marks (driven)	/	_____x_____	
Minor				
RBWS-400-1-04	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (≤20 mm / m), elevation, location (≤150 mm) & spacing	/	_____x_____	
RBWS-400-1-05	Piles provided with gradation marks (stockpile)	/	_____x_____	
RBWS-400-1-06	Conformance to approved/specified tolerances for length, width, thickness and or diameter	/	_____x_____	
RBWS-400-1-07	No loose knots, decay, splits, worm holes, and warp	/	_____x_____	
RBWS-400-1-08	Non-splintering/brooming of timber pile end beyond specified allowance	/	_____x_____	
RBWS-400-1-09	No cracks	/	_____x_____	
RBWS-400-1-10	Provision of pile cap	/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Bridge
 LOCATION: _____

ITEM: Piling
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
400-2 Steel Piles				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-400-2-01	Conformance of in-placed materials to plans and specifications	/	_____ x _____ =	
RBWS-400-2-02	Conformance to construction methodology (installation, location and type)	/	_____ x _____ =	
RBWS-400-2-03	Conformance to splicing requirements	/	_____ x _____ =	
RBWS-400-2-04	Conformance to the required length, width, thickness, and/or diameter	/	_____ x _____ =	
RBWS-400-2-05	Piles provided with gradation marks (driven)	/	_____ x _____ =	
RBWS-400-2-06	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (>20 mm / m), elevation, location (>150 mm) & spacing	/	_____ x _____ =	
Minor				
RBWS-400-2-05	Piles provided with gradation marks (stockpile)	/	_____ x _____ =	
RBWS-400-2-06	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (≤20 mm / m), elevation, location (≤150 mm) & spacing	/	_____ x _____ =	
RBWS-400-2-07	No corrosions on steel piles	/	_____ x _____ =	
RBWS-400-2-08	No deformation on steel piles	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: Bridge
LOCATION: _____

ITEM: Piling
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
400-3 Concrete Pile (see Common Items of Work for checklist for formworks, concrete & RSB)				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-400-3-01	Conformance of in-placed materials to plans and specifications	/	_____x_____	
RBWS-400-3-02	Conformance to construction methodology (installation, location and type)	/	_____x_____	
RBWS-400-3-03	Conformance to splicing requirements	/	_____x_____	
RBWS-400-3-04	Conformance to the required length, width, thickness, and/or diameter	/	_____x_____	
RBWS-400-3-05	Provision of pile shoe	/	_____x_____	
RBWS-400-3-06	No through cracks			
RBWS-400-3-07	No honeycomb (exposed rebars/aggregates)	/	_____x_____	
RBWS-400-3-08	Piles provided with gradation marks (driven)	/	_____x_____	
RBWS-400-3-09	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (>20 mm / m), elevation, location (>150 mm) & spacing	/	_____x_____	
Minor				
RBWS-400-3-06	No cracks	/	_____x_____	
RBWS-400-3-07	No honeycomb	/	_____x_____	
RBWS-400-3-08	Piles provided with gradation marks (stockpile)	/	_____x_____	
RBWS-400-3-09	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (≤20 mm / m), elevation, location (≤150 mm), spacing & champering	/	_____x_____	
RBWS-400-3-10	Conformance to specified curing on casted RC piles	/	_____x_____	
RBWS-400-3-11	Conformance to casting length	/	_____x_____	
RBWS-400-3-12	Conformance to required lifting procedure	/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Bridge
 LOCATION: _____

ITEM: Railings
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 401 Railings				
401-1 Steel Railings				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-401-1-01	Conformance of in-placed materials to plans & specifications	/	= _____ x _____	
RBWS-401-1-02	Conformance to alignment & jointing requirement	/	= _____ x _____	
RBWS-401-1-03	No corrosion	/	= _____ x _____	
Minor				
RBWS-401-1-03	No rust	/	= _____ x _____	
RBWS-401-1-04	No damage to painting and galvanized coating	/	= _____ x _____	
RBWS-401-1-05	Adequacy of bolts and nuts	/	= _____ x _____	
RBWS-401-1-06	Conformance to finishing requirement	/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
401-2 Timber Railings				
Major				
RBWS-401-2-01	Conformance of in-placed materials to plans & specifications	/	= _____ x _____	
RBWS-401-2-02	Conformance to alignment & jointing requirement	/	= _____ x _____	
Minor				
RBWS-401-2-03	No splitting of timber	/	= _____ x _____	
RBWS-401-2-04	Free from any form of damages	/	= _____ x _____	
RBWS-401-2-05	Provision of wood preservatives e.g. oils, creosote-oil, etc.	/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Bridge
 LOCATION: _____

ITEM: Railings
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
401-3 Masonry Railings				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-401-3-01	Conformance of in-placed materials to plans & specifications	/	= _____ x _____	
RBWS-401-3-02	Conformance to required alignment	/	= _____ x _____	
RBWS-401-3-03	Conformance to required quality of mortar mix, CHB, stones, aggregates & boulders	/	= _____ x _____	
Minor				
RBWS-401-3-03	No cracks	/	= _____ x _____	
RBWS-401-3-04	Sufficiency of mortar	/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
401-4 Concrete Railings (see Common Items of Work for checklist for Formworks, RSB & Concrete)				
Major				
RBWS-401-4-01	Conformance of in-placed materials to plans & specifications	/	= _____ x _____	
RBWS-401-4-02	Conformance to required alignment	/	= _____ x _____	
RBWS-401-4-03	Conformance to required quality of concrete mix			
Minor				
RBWS-401-4-04	Conformance to finishing requirements	/	= _____ x _____	
RBWS-401-4-05	No cracks	/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
Item 402 Trowelled				
RBWS-402-01	Smooth and even floor finish	/	= _____ x _____	
RBWS-402-02	No temperature cracks	/	= _____ x _____	
RBWS-402-03	No sign of deflection/settlement	/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: Bridge
LOCATION: _____

ITEM: Metal Structures
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 403 Metal Structures				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-403-01	Structural steel conforms to the required size and dimension as per specification	/	_____x_____	
RBWS-403-02	No corrosion (condition that already affects structural soundness)	/	_____x_____	
RBWS-403-03	No sagging/deflection (beyond 50% of the maximum tolerance)	/	_____x_____	
RBWS-403-04	Conformance to proper installation/assembly	/	_____x_____	
RBWS-403-05	Conformance to the required number of bolts/rivets as per plan	/	_____x_____	
RBWS-403-06	Conformance to the required size and dimension for welding	/	_____x_____	
RBWS-403-07	Fasteners, anchor bolts, base plates, bolts/nuts and washers conforms to specified size and dimension	/	_____x_____	
		/	_____x_____	
Minor				
RBWS-403-02	No rust/corrosion	/	_____x_____	
RBWS-403-03	No sagging/deflection (within 50% of the maximum tolerance)	/	_____x_____	
RBWS-403-08	Provided with appropriate paints (primer and surface coatings) in accordance with the specifications	/	_____x_____	
RBWS-403-09	Structural members are true to line and free from twist, bends and open joints	/	_____x_____	
RBWS-403-10	Pin holes/fastener holes (bolts & rivets) conforms to the required diameter as per specification	/	_____x_____	
RBWS-403-11	Rivets are installed according to proper procedure per specifications	/	_____x_____	
RBWS-403-12	Bolts are tightened to at least the minimum bolt tension, or at a required tension per specification	/	_____x_____	
RBWS-403-13	Conformance to use of appropriate tightening tools	/	_____x_____	
RBWS-403-14	Conformance to proper splicing/jointing	/	_____x_____	
RBWS-403-15	Provision of camber for truss/beams/girder	/	_____x_____	
RBWS-403-16	Complete number of bolts/rivets installed	/	_____x_____	
RBWS-403-17	Painted metal surface are free of loose and bubbled paints, etc.	/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Road & Bridge ITEM: Drainage & Slope Protection
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 500 Pipe Culverts & Storm Drains				
Major				
RBWS-500-01	Conformance to the required/approved tolerance for slope, alignment, elevation and dimensions	/	_____ x _____ =	
Minor				
RBWS-500-02	No cracks, honeycombs, chipping of edges	/	_____ x _____ =	
RBWS-500-03	Compliance to joint mortar mixing proportions	/	_____ x _____ =	
RBWS-500-04	Sufficient collaring and flushing	/	_____ x _____ =	
RBWS-500-05	Compliance to the required thickness, compaction & materials requirement of gravel bedding	/	_____ x _____ =	
RBWS-500-06	Compliance to the required thickness & compaction of backfill	/	_____ x _____ =	
RBWS-500-07	Conformance to trenching requirements	/	_____ x _____ =	
RBWS-500-08	Free from debris, siltation, etc.	/	_____ x _____ =	
		/	_____ x _____ =	
Item 502 Manhole, Inlets and Catch Basins				
Major				
RBWS-502-01	Conformance to connection requirements between pipes & inlet wall	/	_____ x _____ =	
RBWS-502-02	Conformance to approved/specified tolerance for dimensions and elevations	/	_____ x _____ =	
Minor				
RBWS-502-03	No damage on manhole, inlets & catch basins	/	_____ x _____ =	
RBWS-502-04	No cracks	/	_____ x _____ =	
RBWS-502-05	No honeycomb	/	_____ x _____ =	
RBWS-502-06	Free from debris, siltation, etc.	/	_____ x _____ =	
RBWS-502-07	Covers and gratings are well fitted and can easily be opened during maintenance work	/	_____ x _____ =	
		/	_____ x _____ =	
Item 504 Cleaning and Recondition of Existing Drainage Structures				
RBWS-504-01	Conformance to the approved/required tolerances for alignment	/	_____ x _____ =	
RBWS-504-02	Proper spacing of rebars	/	_____ x _____ =	
RBWS-504-03	Compliance to scope of work	/	_____ x _____ =	
RBWS-504-04	Conformance to plans and specifications	/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Road & Bridge ITEM: Drainage & Slope Protection
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 505 Riprap and Grouted Riprap, Item 506 Stone Masonry, Item 507 Rubble Concrete				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-50_-01	No through cracks	/	= _____ x _____	
RBWS-50_-02	Conformance to specifications (size, type, weight, etc. of boulders)	/	= _____ x _____	
RBWS-50_-03	Sufficient grout/mortar	/	= _____ x _____	
RBWS-50_-04	Observance to proper placing of stones/boulders	/	= _____ x _____	
RBWS-50_-05	Conformance to the approved/required tolerance for slope and thickness	/	= _____ x _____	
RBWS-50_-06	Compliance to the specified compaction and preparation of bedding	/	= _____ x _____	
Minor				
RBWS-50_-01	No cracks	/	= _____ x _____	
RBWS-50_-07	Adequate and proper spacing of weepholes	/	= _____ x _____	
RBWS-50_-08	Compliance to design mix of mortar	/	= _____ x _____	
RBWS-50_-09	Conformance with approved tolerance for lines, grades, cross-sections and elevations	/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
Item 508 Hand-laid Rock Embankment				
Major				
RBWS-508-01	Conformance to the required size of boulders	/	= _____ x _____	
RBWS-508-02	Observance to proper placement of stones/boulders	/	= _____ x _____	
RBWS-508-03	Conformance to the approved/required tolerance for length, slope, and thickness	/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Road & Bridge ITEM: Drainage & Slope Protection
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 509 Sheet Piles				
509-1 Steel Sheet Pile				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-509-1-01	Conformance of in-placed materials to plans & specifications	/	_____x_____	
RBWS-509-1-02	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (>20 mm / m), elevation, location (>150 mm) & spacing	/	_____x_____	
RBWS-509-1-03	Piles provided with gradation marks (driven)	/	_____x_____	
RBWS-509-1-04	Conformance to the approved/required tolerances for length, width, thickness and/or diameter	/	_____x_____	
		/	_____x_____	
Minor				
RBWS-509-1-02	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (≤20 mm / m), elevation, location (≤150 mm) & spacing	/	_____x_____	
RBWS-509-1-03	Piles provided with gradation marks (stockpile)	/	_____x_____	
RBWS-509-1-05	Compliance to the required splicing	/	_____x_____	
RBWS-509-1-06	No corrosion on steel sheet piles	/	_____x_____	
RBWS-509-1-07	Non-use of deformed steel bars	/	_____x_____	
RBWS-509-1-08	Attainment of required number of piles	/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Road & Bridge ITEM: Drainage & Slope Protection
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
509-2 Concrete Sheet Pile				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-509-2-01	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (>20 mm / m), elevation, location (>150 mm)	/	_____ x _____ =	
RBWS-509-2-02	Piles provided with gradation marks (driven)	/	_____ x _____ =	
RBWS-509-2-03	Conformance to the required quality of concrete mix	/	_____ x _____ =	
RBWS-509-2-04	No cracks	/	_____ x _____ =	
RBWS-509-2-05	Conformance to the approved/required tolerances for length, width, thickness and/or diameter	/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
RBWS-509-2-01	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (≤20 mm / m), elevation, location (≤150 mm)	/	_____ x _____ =	
RBWS-509-2-02	Piles provided with gradation marks (stockpile)	/	_____ x _____ =	
RBWS-509-2-06	Conformance to the required casting length	/	_____ x _____ =	
RBWS-509-2-07	Provision of pile shoe	/	_____ x _____ =	
RBWS-509-2-08	Compliance to required curing of casted sheet piles	/	_____ x _____ =	
RBWS-509-2-09	Compliance to required splicing	/	_____ x _____ =	
RBWS-509-2-10	No honeycomb, stone pockets and bulging	/	_____ x _____ =	
RBWS-509-2-11	Conformance to the required centerline and cut-off elevation	/	_____ x _____ =	
RBWS-509-2-12	Attainment of required number of piles	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Road & Bridge ITEM: Drainage & Slope Protection
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
509-3 Timber Sheet Piles				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-509-3-01	Conformance of in-placed materials to plans & specifications	/	_____x_____	
RBWS-509-3-02	Conformance to construction methodology (installation, location and type)	/	_____x_____	
RBWS-509-3-03	Conformance to splicing requirements	/	_____x_____	
RBWS-509-3-04	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (>20 mm / m), elevation, location (>150 mm) & spacing	/	_____x_____	
RBWS-509-3-05	Piles provided with gradation marks (driven)	/	_____x_____	
RBWS-509-3-06	Conformance to approved/specified tolerances for length, width, thickness and/or diameter	/	_____x_____	
Minor				
RBWS-509-3-04	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (≤20 mm / m), elevation, location (≤150 mm) & spacing	/	_____x_____	
RBWS-509-3-05	Piles provided with gradation marks (stockpile)	/	_____x_____	
RBWS-509-3-07	No worm holes, decays, warps, ring, segregation, splits and loose knots	/	_____x_____	
RBWS-509-3-08	Non-splintering/brooming of timber pile end beyond specified allowance	/	_____x_____	
RBWS-509-3-09	No cracks	/	_____x_____	
RBWS-509-3-10	Provision of pile cap	/	_____x_____	
RBWS-509-3-11	Attainment of required number of piles	/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____ Date: / /			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Road & Bridge ITEM: Drainage & Slope Protection
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 510 Concrete Slope Protection				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-510-01	No honeycomb (exposed rebars/aggregates)	/	_____ x _____ = _____	
RBWS-510-02	No through cracks	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Minor				
RBWS-510-01	No honeycomb	/	_____ x _____ = _____	
RBWS-510-02	No cracks	/	_____ x _____ = _____	
RBWS-510-03	Conformance to the required curing	/	_____ x _____ = _____	
RBWS-510-04	Proper vibration	/	_____ x _____ = _____	
RBWS-510-05	Proper finishes/plastering	/	_____ x _____ = _____	
RBWS-510-06	No corrosion on steel bars	/	_____ x _____ = _____	
RBWS-510-07	Forms applied with specified form oil	/	_____ x _____ = _____	
RBWS-510-08	Conformance to the required splicing and installation of rebars	/	_____ x _____ = _____	
RBWS-510-09	Adequate and proper spacing of weepholes	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) = _____	CAR Total
Entered by: _____			No. of Indicators (b) = _____	
Date: / /			Rate = (a) / (b) = _____	
			Rate = _____	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Road & Bridge ITEM: Drainage & Slope Protection
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 511 Gabions & Mattresses				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-511-01	Conformance to the required/approved tolerance for lines grades, dimensions and arrangements as shown on the plans and designated location (>10%)	/	_____ x _____ =	
RBWS-511-02	Conformance to specifications (size, type, weight, etc. of boulders)	/	_____ x _____ =	
Minor				
RBWS-511-01	Conformance to the required/approved tolerance for lines grades, dimensions and arrangements as shown on the plans and designated location (≤10%)	/	_____ x _____ =	
RBWS-511-03	Conformance to the required wire mesh cage fabrication requirement	/	_____ x _____ =	
RBWS-511-04	No misalignment, bulging	/	_____ x _____ =	
RBWS-511-05	Conformance to the required lapping requirement	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 602 Monuments, Markers and Guide Posts				
RBWS-602-01	Conformance to required/approved tolerance for lines, grades and dimensions	/	_____ x _____ =	
RBWS-602-02	Conformance to painting requirement	/	_____ x _____ =	
RBWS-602-03	Provision of the required warning reflectors	/	_____ x _____ =	
RBWS-602-04	Conformance to the design and location as shown on the plans	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
_____ VISIT

PROJECT TYPE: Bridge
LOCATION: _____

ITEM: Guardrail
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 603 - Guardrail				
603-1 Steel or Aluminum				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-603-1-01	Conformance to the required/approved tolerance for lines, grades and dimensions (>6%)	/	_____x_____	
Minor				
RBWS-603-1-01	Conformance to the required/approved tolerance for lines, grade, and dimensions (<6%)	/	_____x_____	
RBWS-603-1-02	Sufficient paint	/	_____x_____	
RBWS-603-1-03	Sufficient galvanizing	/	_____x_____	
RBWS-603-1-04	Non-appearance of rust on steel	/	_____x_____	
RBWS-603-1-05	Conformance with the design and location as shown on the plans	/	_____x_____	
RBWS-603-1-06	Conformance to required installation (lapping, provision of bolts, nuts & washers)	/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
603-2 Concrete (see common items of works for checklist on formworks, reinforcing steel bars and concrete)				
		/	_____x_____	
603-3 Timber				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-603-3-01	Conformance to the required/approved tolerance for lines, grades and dimensions	/	_____x_____	
Minor				
RBWS-603-3-01	Conformance to the approved/required tolerance for lines, grades and dimensions	/	_____x_____	
RBWS-603-3-02	No splitting of timber	/	_____x_____	
RBWS-603-3-03	No insect attack	/	_____x_____	
RBWS-603-3-04	No decay of timber especially at the base of the posts and joints between posts and rails	/	_____x_____	
RBWS-603-3-05	Conformity with the design and location as shown on the plans	/	_____x_____	
RBWS-603-3-06	Proper application of preservatives	/	_____x_____	
		/	_____x_____	
		/	_____x_____	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Bridge
LOCATION: _____

ITEM: Guardrail
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

[illegible]

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
_____ VISIT

PROJECT TYPE: Road
LOCATION: _____

ITEM: Miscellaneous Work
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 604 Fencing, Item 605 Road Signs, Item 606 Pavement Markings, Item 607 Reflective Pavement Studs				
Major				
RBWS-60__-01	Conformance to the required materials for road signs pavement markings and reflective pavement studs	/	_____ x _____ =	
Minor				
RBWS-60__-02	Proper preparation of pavement surface prior to paint application (Item 606)	/	_____ x _____ =	
RBWS-60__-03	Conformance to provisions stipulated in the DPWH Standard Specifications for Public Works & Highways, Vol.II, 1995	/	_____ x _____ =	
RBWS-60__-04	Cracking, peeling off of paints	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 608 Topsoil, Item 609 Spriggings, Item 610 Sodding, Item 611 Tree Planting				
RBWS-6__- 01	Conformance to appropriate type, thickness and density of soil	/	_____ x _____ =	
RBWS-6__- 02	Conformance to approved slope	/	_____ x _____ =	
RBWS-6__- 03	Conformance to the required type of grass/planting materials	/	_____ x _____ =	
RBWS-6__- 04	Healthy, dense, well rooted	/	_____ x _____ =	
RBWS-6__- 05	Free from weeds or undesirable grasses	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Road & Bridge
 LOCATION: _____

ITEM: Common Items of Work
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 900 Formworks				
RBWS-900-01	Conformance to the required type of formworks in accordance with approved shop/working drawings	/	_____x_____	
RBWS-900-02	Forms coated with mould oil as required	/	_____x_____	
RBWS-900-03	Sufficient bracing/support provided	/	_____x_____	
RBWS-900-04	No loose knots, splits, cracks, etc.	/	_____x_____	
RBWS-900-05	Provision of required concrete or steel spacer	/	_____x_____	
RBWS-900-06	Conformance to dimensions, location, plumbness and alignment	/	_____x_____	
RBWS-900-07	Provision of camber during construction stage	/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
Item 901 Reinforcing Steel Bars (including tendons for Pre/Post-Stressed concrete)				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-901-01	Conformance of in-placed materials to plans & specifications	/	_____x_____	
RBWS-901-02	Non-appearance of corrosion on steel reinforcement	/	_____x_____	
Minor				
RBWS-901-02	Non-appearance of rust on steel reinforcement	/	_____x_____	
RBWS-901-03	Conformance to approved bar cutting schedule, proper spacing, anchorage, adequate reinforcements	/	_____x_____	
RBWS-901-04	No sign of oil, paint and other deleterious materials on reinforcements	/	_____x_____	
RBWS-901-05	Conformance to jointing requirement, i.e. splicing, welding, etc.	/	_____x_____	
RBWS-901-06	Conformance to the required installation of ducttube e.g. (spacing, location and distance)	/	_____x_____	
RBWS-901-07	Conformance to the required steel plate and lock	/	_____x_____	
RBWS-901-08	Conformance to the number of bundles of tendons and number of pieces of bundles of tendons	/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b)	
Date: / /			Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT _____

PROJECT TYPE: Road & Bridge
LOCATION: _____

ITEM: Common Items of Work
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 902 Concrete Works				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-902-01	No through of cracks	/	= _____ x _____	
RBWS-902-02	No honeycomb or spalling (no exposed rebars/aggregates)	/	= _____ x _____	
RBWS-902-03	No sagging or bulging	/	= _____ x _____	
RBWS-902-04	Conformance to the required quality of concrete mix	/	= _____ x _____	
RBWS-902-05	Provision of camber for RCDG (reinforced concrete for deck girder)	/	= _____ x _____	
Minor				
RBWS-902-01	No cracks	/	= _____ x _____	
RBWS-902-02	No honeycomb or spalling	/	= _____ x _____	
RBWS-902-03	No sagging or bulging	/	= _____ x _____	
RBWS-902-06	No chipping off of concrete cover	/	= _____ x _____	
RBWS-902-07	Proper and adequate vibration	/	= _____ x _____	
RBWS-902-08	Conformance to finishing/plastering requirement	/	= _____ x _____	
RBWS-902-09	Conformance to the required concrete cover for rebars	/	= _____ x _____	
RBWS-902-10	Conformance to the batching, mixing, transporting and discharge time requirements	/	= _____ x _____	
RBWS-902-11	Conformance to placing requirement that will not result segregation of aggregates, cold joints and misalignment	/	= _____ x _____	
RBWS-902-12	Conformance to the jointing requirement	/	= _____ x _____	
RBWS-902-13	Proper curing	/	= _____ x _____	
RBWS-902-14	Conformance to required dimensions, lines, grades/elevation locations and crown (for pier)	/	= _____ x _____	
RBWS-902-15	No water ponding on bearing plates	/	= _____ x _____	
RBWS-902-16	Conformance to elevation of expansion joints	/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b)	
Date: / /			Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Road & Bridge
 LOCATION: _____

ITEM: Shotcrete
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 903 Shotcrete				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
RBWS-903-01	Conformance to the required quality of concrete mix as per specification	/	_____ x _____ =	
RBWS-903-02	Conformance to the required thickness of concrete	/	_____ x _____ =	
RBWS-903-03	Anchor bolts delivered/installed in accordance with the required size and dimension as per plan	/	_____ x _____ =	
RBWS-903-04	Steel reinforcement/wire mesh delivered/installed conforms to size and dimension per specification	/	_____ x _____ =	
RBWS-903-05	Compliance to use of appropriate shotcrete machine/equipment	/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
RBWS-903-06	No cracks, honeycomb or spalling	/	_____ x _____ =	
RBWS-903-07	Rockbolt filling materials conforms to the required specification	/	_____ x _____ =	
RBWS-903-08	Conformance to the required concrete cover for rebar/wire mesh	/	_____ x _____ =	
RBWS-903-09	Adequate and proper spacing of weepholes	/	_____ x _____ =	
RBWS-903-10	Conformance to the required size and type of materials for weepholes as per specification	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b)	
Date: / /			Rate = (a) / (b)	
			=	
			Rate	
			=	

A N N E X 2-B

CHECKLIST FOR HOUSING AND BUILDING

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CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Building & Housing
 _____ VISIT LOCATION/LOT: _____

ITEM: Earthworks
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor =	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 100 Clearing and Grubbing				
HBWS-100-02	Conformance to the approved/specified tolerance for extent of clearing and grubbing work	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 101 Excavation				
HBWS-101-01	Conformance to the approved/specified tolerances for lines, grades, dimensions, elevations	/	_____ x _____ =	
HBWS-101-02	Conformance to the excavation support systems, e.g. angle of repose, bracing, shoring, sheet piling	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 102 Fill				
HBWS-102-01	Conformance of in-placed materials to plans and specifications	/	_____ x _____ =	
HBWS-102-02	Conformance to the required thickness of fill or backfill per layer	/	_____ x _____ =	
HBWS-102-03	Conformance to the required density or degree of compaction	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 103 Soil Poisoning				
HBWS-103-01	Conformance to the specified concentration of soil poisoning solution	/	_____ x _____ =	
HBWS-103-02	Conformance to the specified rate of application	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate= (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Building & Housing
 LOCATION: _____

ITEM: Structural Steel
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score _____ x factor	Action Monitor
Item 300 Structural Steel Works				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
HBWS-300-01	Conformance of in-placed materials to plans & specifications	/	_____ x _____ =	
HBWS-300-02	Conformance to required fasteners, anchor bolts, bolts/nuts and washers (not provided)	/	_____ x _____ =	
HBWS-300-03	Free from corrosion and any other form of damages	/	_____ x _____ =	
Minor				
HBWS-300-03	Free from rust and any other form of damages	/	_____ x _____ =	
HBWS-300-04	Conformance to the specified type of welding	/	_____ x _____ =	
HBWS-300-05	Fasteners, anchor bolts, bolts / nuts & washers conforms to specified size, strength, etc.	/	_____ x _____ =	
HBWS-300-06	Installed according to plans	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 VISIT _____

PROJECT TYPE: Housing & Building
 LOCATION: _____

ITEM: Common Items of Work
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 301 Formworks				
HBWS-301-01	Conformance to the required type of formworks in accordance with approved shop/working drawings	/	_____ x _____ =	
HBWS-301-02	Forms coated with mould oil as required	/	_____ x _____ =	
HBWS-301-03	Sufficient bracing/support provided	/	_____ x _____ =	
HBWS-301-04	No loose knots, splits, cracks, etc.	/	_____ x _____ =	
HBWS-301-05	Provision of required concrete or steel spacer	/	_____ x _____ =	
HBWS-301-06	Conformance to dimensions, location, plumbness and alignment	/	_____ x _____ =	
HBWS-301-07	No use of dilapidated/salvage forms (use more than 3x)	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 302 Reinforcing Steel Bars (including tendons for Pre/Post-Stressed concrete)				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
HBWS-302-01	Conformance of in-placed materials to plans & specifications	/	_____ x _____ =	
HBWS-302-02	Non-appearance of corrosion on steel reinforcement	/	_____ x _____ =	
Minor				
HBWS-302-02	Non-appearance of rust on steel reinforcement	/	_____ x _____ =	
HBWS-302-03	Conformance to approved bar cutting schedule, proper spacing, anchorage, adequate reinforcements	/	_____ x _____ =	
HBWS-302-04	No sign of oil, paint and other deleterious materials on reinforcements	/	_____ x _____ =	
HBWS-302-05	Conformance to jointing requirement, i.e. splicing, welding, etc.	/	_____ x _____ =	
HBWS-302-06	Conformance to proper bending of stirrups	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b)	
Date: / /			Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Housing & Building
 LOCATION: _____

ITEM: Common Items of Work
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score _____ x factor	Action Monitor
Item 303 Concrete Works				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
HBWS-303-01	No through cracks	/	_____ x _____ =	
HBWS-303-02	No honeycomb (no exposed rebars/aggregates)	/	_____ x _____ =	
HBWS-303-03	No sagging or bulging	/	_____ x _____ =	
HBWS-303-04	Conformance to required quality of concrete mix	/	_____ x _____ =	
Minor				
HBWS-303-01	No cracks	/	_____ x _____ =	
HBWS-303-02	No honeycomb	/	_____ x _____ =	
HBWS-303-03	No sagging or bulging	/	_____ x _____ =	
HBWS-303-05	Proper and adequate vibration	/	_____ x _____ =	
HBWS-303-06	Conformance to finishing/plastering requirement	/	_____ x _____ =	
HBWS-303-07	No chipping off of concrete cover	/	_____ x _____ =	
HBWS-303-08	Conformance to the required concrete cover for rebars	/	_____ x _____ =	
HBWS-303-09	Conformance to the batching, mixing, transporting and discharge time requirements	/	_____ x _____ =	
HBWS-303-10	Conformance to placing requirement that will not result segregation of aggregates, cold joints and misalignment	/	_____ x _____ =	
HBWS-303-11	Conformance to the jointing requirement	/	_____ x _____ =	
HBWS-303-12	Proper curing	/	_____ x _____ =	
HBWS-303-13	Conformance to required dimensions, lines, grades/elevation, and location	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____ Date: / /			No. of Indicators (b)	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Building & Housing
 LOCATION: _____

ITEM: Masonry Works
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score _____ x factor	Action Monitor
Item 304 CHB Wall				
Major				
HBWS-304-01	Conformance to required quality of CHB	/	_____ x _____ =	
HBWS-304-02	Conformance to required quality of mortar mix	/	_____ x _____ =	
Minor				
HBWS-304-03	Conformance to specified tolerances for dimension, location, plumbness and alignment	/	_____ x _____ =	
HBWS-304-04	Proper spacing of horizontal and vertical bars	/	_____ x _____ =	
HBWS-304-05	Rebars used free from corrosion	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 305 Brick Wall				
Major				
HBWS-305-01	Conformance to required quality of mortar mix	/	_____ x _____ =	
Minor				
HBWS-305-02	Conformance to specified tolerances for dimension, location, plumbness and alignment	/	_____ x _____ =	
HBWS-305-03	Proper spacing of horizontal and vertical bars	/	_____ x _____ =	
HBWS-305-04	Rebars used free from corrosion	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Building & Housing
 LOCATION: _____

ITEM: Floor Finishes
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 400 Tiled Finish				
HBWS-400-01	Installed tiles free from chipping, cracks or any form of damages	/	_____ x _____ =	
HBWS-400-02	Mortar/Grout consistency and color conform to specification	/	_____ x _____ =	
HBWS-400-03	Joints are perfectly aligned and consistent with skirting and wall tiles	/	_____ x _____ =	
HBWS-400-04	Tiles are evenly placed/laid	/	_____ x _____ =	
HBWS-400-05	Tiles in wet areas sloped down to drain	/	_____ x _____ =	
HBWS-400-06	Tiles are properly bonded to floor	/	_____ x _____ =	
		/	_____ x _____ =	
Item 401 Carpet				
HBWS-401-01	Evenly stretched and of even surface	/	_____ x _____ =	
HBWS-401-02	Properly anchored at all edges	/	_____ x _____ =	
HBWS-401-03	Provided with underlining	/	_____ x _____ =	
HBWS-401-04	Free from any form of damages	/	_____ x _____ =	
HBWS-401-05	Materials conform to specification as per plan	/	_____ x _____ =	
		/	_____ x _____ =	
Item 402 Wood Parquet				
HBWS-402-01	Conforms to designed layout	/	_____ x _____ =	
HBWS-402-02	Even surfaces	/	_____ x _____ =	
HBWS-402-03	Free from any form of damages	/	_____ x _____ =	
HBWS-402-04	Adhesive conforms to specifications	/	_____ x _____ =	
HBWS-402-05	Parquet properly bonded to floor	/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Building & Housing
 LOCATION: _____

ITEM: Floor Finishes
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score _____ x factor	Action Monitor
Item 403 Trowelled				
HBWS-403-01	Smooth and even floor finish	/	_____ x _____ =	
HBWS-403-02	No temperature cracks	/	_____ x _____ =	
HBWS-403-03	No sign of deflection/settlement	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 404 Pebble Wash-out				
HBWS-404-01	Installed pebbles are evenly distributed	/	_____ x _____ =	
HBWS-404-02	No temperature cracks	/	_____ x _____ =	
HBWS-404-03	Installed pebbles surface are thoroughly clean from cement	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 405 Water Proofing				
HBWS-405-01	Conforms to specified method of application	/	_____ x _____ =	
HBWS-405-02	Conforms to number of coats/layers required	/	_____ x _____ =	
HBWS-405-03	Passed required leak test	/	_____ x _____ =	
HBWS-405-04	Conformance to the required materials specifications as per plan	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Building & Housing
 LOCATION: _____

ITEM: Wall Finishes
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 500 Tiled Finish				
HBWS-500-01	Installed tiles free from chipping, cracks or any form of damages	/	_____ x _____ =	
HBWS-500-02	Joints are perfectly aligned and consistent with skirting and floor tiles	/	_____ x _____ =	
HBWS-500-03	Tiles are evenly placed/layed	/	_____ x _____ =	
HBWS-500-04	Installed tiles are true to alignment	/	_____ x _____ =	
HBWS-500-05	Mortar/grout/adhesive consistency and color conform to specification	/	_____ x _____ =	
HBWS-500-06	Tiles properly bonded to wall	/	_____ x _____ =	
Item 501 Wall Paper				
HBWS-501-01	Smooth and evenly pasted	/	_____ x _____ =	
HBWS-501-02	Free from scratches, stains, etc.	/	_____ x _____ =	
		/	_____ x _____ =	
Item 502 Plaster Finish				
HBWS-502-01	Conformance to designed mixture of plastering materials	/	_____ x _____ =	
HBWS-502-02	Conformance to specified method of application and thickness of plastering	/	_____ x _____ =	
HBWS-502-03	True to alignment	/	_____ x _____ =	
HBWS-502-04	Free from any form of damages e.g. cracks, peeled-off plaster finish	/	_____ x _____ =	
Item 503 Cladding				
HBWS-503-01	Panels properly anchored	/	_____ x _____ =	
HBWS-503-02	True to alignment, plumbness	/	_____ x _____ =	
HBWS-503-03	Free from any form of damages	/	_____ x _____ =	
HBWS-503-04	Panels conforms to construction procedure	/	_____ x _____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Building & Housing
 LOCATION: _____

ITEM: Wall Finishes
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS				
Sub-item Code	<i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 504 Painting				
HBWS-504-01	Surface prepared according to specification	/	_____ x _____ =	
HBWS-504-02	Required neutralizers, etc. applied	/	_____ x _____ =	
HBWS-504-03	Applied paint appropriate to the surface	/	_____ x _____ =	
HBWS-504-04	Specified number of coats applied	/	_____ x _____ =	
HBWS-504-05	Surfaces evenly painted, proper opacity	/	_____ x _____ =	
HBWS-504-06	No discoloration and peeling-off of paint	/	_____ x _____ =	
HBWS-504-07	Paints conform to specification/requirements	/	_____ x _____ =	
HBWS-504-08	Surface are properly applied with putty/patching compound	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a) =	CAR Total
No. of Indicators (b) =	
Rate = (a) / (b) =	
Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____VISIT

PROJECT TYPE: Building & Housing
 LOCATION: _____

ITEM: Ceiling Works
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 600 Suspension				
HBWS-600-01	Conformance to the specified spacing and length of hangers, clips and joists	/	_____ x _____ =	
HBWS-600-02	Installed hangers are properly anchored and firm	/	_____ x _____ =	
HBWS-600-03	True to alignment and elevation in conformance to the approved specified tolerance	/	_____ x _____ =	
HBWS-600-04	Free from any form of damages	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 601 Ceiling Board				
HBWS-601-01	Materials free from any form of damages	/	_____ x _____ =	
HBWS-601-02	Smooth surface and true to elevation and alignment	/	_____ x _____ =	
HBWS-601-03	Location of holes for utilities conforms to plans	/	_____ x _____ =	
HBWS-601-04	Ceiling boards are properly fastened	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 602 Moulding				
HBWS-602-01	True to elevation and alignment	/	_____ x _____ =	
HBWS-602-02	Installed materials are free from any form of damages	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: Building & Housing
 LOCATION: _____

ITEM: Ceiling Works
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 603 Painting				
HBWS-603-01	Surface prepared according to specification	/	_____ x _____ =	
HBWS-603-02	Required neutralizers applied	/	_____ x _____ =	
HBWS-603-03	Applied paint appropriate to the surface	/	_____ x _____ =	
HBWS-603-04	Specified number of coats applied	/	_____ x _____ =	
HBWS-603-05	Surfaces evenly painted, proper opacity	/	_____ x _____ =	
HBWS-603-06	No discoloration and peeling-off of paint	/	_____ x _____ =	
HBWS-603-07	Surface are evenly applied with putty/patching compound	/	_____ x _____ =	
HBWS-603-08	Paint conform to the requirements	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/ NO.: _____ PROJECT TYPE: Building & Housing
 _____ VISIT LOCATION/LOT: _____

ITEM: Roofing System
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 604 Frames				
HBWS-604-01	Conformance to the required size, spacing, slope, anchorage, etc.	/	_____ x _____ =	
HBWS-604-02	Free from any form of damage	/	_____ x _____ =	
HBWS-604-03	Cleats are properly provided	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 605 Sheets				
HBWS-605-01	Conformance to the specified gauge, length, etc.	/	_____ x _____ =	
HBWS-605-02	Conformance to the specified overlapping, sealing of joints, fastening	/	_____ x _____ =	
HBWS-605-03	Installation of flashing, gutters, ridge rolls, downspouts, etc. according to plans	/	_____ x _____ =	
HBWS-605-04	Non-occurrence of leaks	/	_____ x _____ =	
HBWS-605-05	Free from any form of damage	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 606 Tiles				
HBWS-606-01	Conformance to the specified method of installation	/	_____ x _____ =	
HBWS-606-02	Non-occurrence of leaks	/	_____ x _____ =	
HBWS-606-03	Free from any form of damage	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a)		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/ NO.: _____ PROJECT TYPE: Building & Housing
 _____ VISIT LOCATION/LOT: _____

ITEM: Roofing System
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 607 Painting				
HBWS-607-01	Surface prepared according to specifications	/	_____ x _____ =	
HBWS-607-02	Specified number of coats applied	/	_____ x _____ =	
HBWS-607-03	Evenly painted surfaces	/	_____ x _____ =	
HBWS-607-04	No discoloration and peeling of paint	/	_____ x _____ =	
HBWS-607-05	Paints conforms to requirements	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
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		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: Building & Housing
 LOCATION: _____

ITEM: Doors, Windows, Railings
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 700 Doors				
HBWS-700-01	True to alignment, plumbness in conformance to the approved/specified tolerance	/	_____ x _____ =	
HBWS-700-02	Doors are well fitted to the door frames	/	_____ x _____ =	
HBWS-700-03	Door accessories installed according to plans, e.g. locksets, door closers, hinges, door stoppers	/	_____ x _____ =	
HBWS-700-04	Free from any form of damages	/	_____ x _____ =	
HBWS-700-05	Doors conforms to specification requirements e.g. panel door, flush door polyvinyl, steel doors, etc.	/	_____ x _____ =	
		/	_____ x _____ =	
Item 701 Windows				
HBWS-701-01	True to alignment and elevation in conformance to the approved/specified tolerance	/	_____ x _____ =	
HBWS-701-02	Windows are well fitted to the window frames	/	_____ x _____ =	
HBWS-701-03	Window accessories installed according to plans, e.g. handles, seals, glazing for glass window, etc.	/	_____ x _____ =	
HBWS-701-04	Free from any form of damage	/	_____ x _____ =	
HBWS-701-05	Window conforms to specification requirements, e.g. sliding, jalousies (glass & wooden) steel casement windows	/	_____ x _____ =	
		/	_____ x _____ =	
Item 702 Railings				
HBWS-702-01	Installed according to plans	/	_____ x _____ =	
HBWS-702-02	Free from dents, scratches or any form of damage	/	_____ x _____ =	
HBWS-702-03	Bends and curves are smooth	/	_____ x _____ =	
HBWS-702-04	Conforms to approved tolerance size, dimension, height and type e.g. concrete, steel, stainless, aluminum, etc.	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Building & Housing
 _____VISIT LOCATION: _____

ITEM: Basic Services
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 800 Plumbing				
HBWS-800-01	Pipes installed according to plans, e.g. slope, alignment, location, bracings/supports	/	_____ x _____ =	
HBWS-800-02	Conducted and passed the required leak test	/	_____ x _____ =	
HBWS-800-03	Pipes not clogged	/	_____ x _____ =	
HBWS-800-04	Free from any form of damages	/	_____ x _____ =	
HBWS-800-05	Fixtures and accessories installed according to plans, e.g. height, alignment, location	/	_____ x _____ =	
HBWS-800-06	Adhesive conform to specification	/	_____ x _____ =	
HBWS-800-07	Water closet, lavatory conform to specification	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 801 Sanitary				
HBWS-801-01	Pipes installed according to plans, e.g. slope, alignment, location, bracings/supports	/	_____ x _____ =	
HBWS-801-02	Conducted and passed the required pressure/leak test	/	_____ x _____ =	
HBWS-801-03	Pipes not clogged	/	_____ x _____ =	
HBWS-801-04	Free from any form of damages	/	_____ x _____ =	
HBWS-801-05	Fixtures and accessories installed according to plans, e.g. height, alignment, location	/	_____ x _____ =	
HBWS-801-06	Adhesive conforms to specification	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner : _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____VISIT

PROJECT TYPE: Building & Housing
 LOCATION: _____

ITEM: Basic Services
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score _____ x factor	Action Monitor
Item 802 Electrical Works				
HBWS-802-01	Pipes installed according to plans and laid out according to approved construction drawings	/	_____ x _____ =	
HBWS-802-02	Pipes, hangers, boxes, gutters, cable trays properly installed and painted, sharp edges of pipes removed	/	_____ x _____ =	
HBWS-802-03	Pipes properly bended	/	_____ x _____ =	
HBWS-802-04	Allowable number of wires in a pipe properly observed	/	_____ x _____ =	
HBWS-802-05	Splicing and connection provided with adequate rubber and pvc tapes	/	_____ x _____ =	
HBWS-802-06	Adequate length of wire provided for termination and splicing	/	_____ x _____ =	
HBWS-802-07	Wire color coding complied and observed	/	_____ x _____ =	
HBWS-802-08	Wire insulation not damaged during pulling	/	_____ x _____ =	
HBWS-802-09	Adequate number, correct size and gauge of pull boxes installed and properly covered	/	_____ x _____ =	
HBWS-802-10	Boxes and enclosures provided according to intended purpose	/	_____ x _____ =	
HBWS-802-11	Fittings and accessories provided and properly installed	/	_____ x _____ =	
HBWS-802-12	Block-outs and sleeves provided and properly secured	/	_____ x _____ =	
HBWS-802-13	Cable ties provided	/	_____ x _____ =	
HBWS-802-14	Blank covers provided for outlets and switches that are not utilized	/	_____ x _____ =	
HBWS-802-15	Use of tools and equipment properly observed	/	_____ x _____ =	
HBWS-802-16	Lighting fixtures, panel boards, circuit breakers, etc. properly installed and free from any form of damages	/	_____ x _____ =	
HBWS-802-17	Meager, clamp, phase sequence tests and load test conducted	/	_____ x _____ =	
HBWS-802-18	Shop drawings, as-built plan maintained	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner : _____			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
Entered by: _____			Rate = (a) / (b) =	
Date: / /			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Building
 LOCATION: _____

ITEM: Mechanical Works
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score _____ x factor	Action Monitor
Item 900 Generator Set				
HBWS-900-01	Installation of auxillary, piping and control panel according to plans	/	_____ x _____ =	
HBWS-900-02	Installed materials free from any form of damages	/	_____ x _____ =	
HBWS-900-03	Pipes sufficiently braced	/	_____ x _____ =	
HBWS-900-04	Passed the required test	/	_____ x _____ =	
		/	_____ x _____ =	
Item 901 Air-conditioning System				
HBWS-901-01	Air-conditioning units, transfer fans, pipes, ducts, condensers, installed according to plans	/	_____ x _____ =	
HBWS-901-02	Joining of pipes and ducts conform to specified jointing system	/	_____ x _____ =	
HBWS-901-03	Pipes and ducts free from leaks	/	_____ x _____ =	
HBWS-901-04	Pipes and ducts sufficiently braced/supported	/	_____ x _____ =	
HBWS-901-05	Installed materials free from any form of damage	/	_____ x _____ =	
HBWS-901-06	Conducted and passed required tests	/	_____ x _____ =	
		/	_____ x _____ =	
Item 902 Elevators				
HBWS-902-01	Installed according to plans	/	_____ x _____ =	
HBWS-902-02	Installed cables, pulleys, rails, tracks and bearings free from any form of damage	/	_____ x _____ =	
HBWS-902-03	Smooth riding operation	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJ. ID/NO.: _____
 _____ VISIT

PROJ. TYPE: Building
 LOCATION/LOT: _____

ITEM: Sewer & Drainage System
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score _____ x factor	Action Monitor
Item 903 Pipe Culvert and Storm Drain				
HBWS-903-01	Bedding and backfill materials compacted to the required density	/	_____ x _____ =	
HBWS-903-02	Proper jointing of pipes	/	_____ x _____ =	
HBWS-903-03	Mortar for jointing of reinforced concrete culvert pipes conforms to specified mixture type	/	_____ x _____ =	
HBWS-903-04	Adequate collaring of reinforced concrete culvert pipes	/	_____ x _____ =	
HBWS-903-05	Conformance to the approved/specified tolerance for elevation, slope, and alignment	/	_____ x _____ =	
HBWS-903-06	Cracks, honeycomb, chipping-off within specified tolerances	/	_____ x _____ =	
HBWS-903-07	Sufficient collaring & flushing	/	_____ x _____ =	
HBWS-903-08	Conformance to the approved quality of concrete mix	/	_____ x _____ =	
HBWS-903-09	Spacing and sizes of rebars conform to specification	/	_____ x _____ =	
		/	_____ x _____ =	
Item 904 Manholes, Inlets and Catch Basin				
HBWS-904-01	Conformance to approved/specified tolerances for dimensions, elevations	/	_____ x _____ =	
HBWS-904-02	Covers and gratings well fitted and can easily be opened during maintenance work	/	_____ x _____ =	
HBWS-904-03	Honeycomb, cracks, spalling, etc. within specified tolerance	/	_____ x _____ =	
HBWS-904-04	Conformance to approved quality of concrete mix	/	_____ x _____ =	
HBWS-904-05	Spacing and sizes of rebars conform to specification	/	_____ x _____ =	
		/	_____ x _____ =	
Item 905 Fencing, Gates				
HBWS-905-01	Conformance to the approved/specified tolerance for alignment, dimension and elevation	/	_____ x _____ =	
HBWS-905-02	Installed according to plans and specifications	/	_____ x _____ =	
Was subcontractor(s) used? If yes, name of company(ies) and sub-item: _____			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
Entered by: _____			Rate = (a) / (b) =	
Date: / /			Rate =	

A N N E X 2-C

CHECKLIST FOR PORTS AND HARBOR

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CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: Ports and Harbor
LOCATION: _____

ITEM: Rockworks
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 100 Breakwater, Bulkhead, Causeway, Jetty Groin, Shore, Protection Works, i.e., slope protection (riprap, rubble, stone masonry)				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-100-01	Conformance to the cross-sectional dimensions as per design and specifications	/	_____ x _____ = _____	
PHWS-100-02	Conformance to the design elevations	/	_____ x _____ = _____	
PHWS-100-03	Conformance to the side slopes or berm as per design and specifications	/	_____ x _____ = _____	
PHWS-100-04	Conformance to the location as per design and specifications	/	_____ x _____ = _____	
PHWS-100-05	Conformance to the alignment as per design and specifications	/	_____ x _____ = _____	
PHWS-100-06	Conformance to the rock placement methodology and/or construction methodology	/	_____ x _____ = _____	
PHWS-100-07	Compliance/conformance to the designed foundation, e.g. toe	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Minor				
PHWS-100-01	Conformance within approved/specified tolerance for cross-section	/	_____ x _____ = _____	
PHWS-100-02	Conformance within approved/specified tolerance for elevation	/	_____ x _____ = _____	
PHWS-100-05	Conformance within approved/specified tolerance for alignment	/	_____ x _____ = _____	
PHWS-100-08	Provision of adequate bedding as required	/	_____ x _____ = _____	
PHWS-100-09	Non-occurrence of displaced/sucked-out rocks	/	_____ x _____ = _____	
PHWS-100-10	Conformance within approved/specified tolerance of in-between gaps for rocks in-place	/	_____ x _____ = _____	
PHWS-100-11	Provision of settlement plates/blocks	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) = _____	CAR Total
Entered by: _____			No. of Indicators (b) = _____	
Date: / /			Rate = (a) / (b) = _____	
			Rate = _____	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT _____

PROJECT TYPE: Ports and Harbor
LOCATION: _____

ITEM: Rockworks
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 101 Gabions				
Major*		<i>* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects</i>		
PHWS-101-01	Conformance to the cross-sectional dimensions as per design and specifications	/	= _____ x _____	
PHWS-101-02	Conformance to the design elevations	/	= _____ x _____	
PHWS-101-03	Conformance to the location as per design and specifications	/	= _____ x _____	
PHWS-101-04	Conformance to the alignment as per design and specifications	/	= _____ x _____	
PHWS-101-05	Conformance to the wire mesh cage fabrication requirements (alignment, lapping, etc.)	/	= _____ x _____	
PHWS-101-06	Proper construction methodology, e.g., placing of rock fill materials, lapping and twisting of mesh wire	/	= _____ x _____	
PHWS-101-07	Conformance to minimum density requirements (in kg/cu.m.) for filled gabions	/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
Minor				
PHWS-101-01	Conformance within the approved/specified tolerance for cross-sectional dimensions	/	= _____ x _____	
PHWS-101-02	Conformance within the approved/specified tolerance for elevations	/	= _____ x _____	
PHWS-101-04	Conformance within the approved/specified tolerance vs. the actual alignment	/	= _____ x _____	
PHWS-101-08	Provision of adequate bedding as required	/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) = _____		CAR Total
Entered by: _____		No. of Indicators (b) = _____		
Date: / /		Rate = (a) / (b) = _____		
		Rate = _____		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Ports and Harbor
 LOCATION: _____

ITEM: Piers/Wharves/Slipways
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 200 R.C. Piles				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-200-01	Conformance to the cross-sectional dimensions as per design and specifications	/	_____ X _____ =	
PHWS-200-02	Conformance to the design length as per design and specifications	/	_____ X _____ =	
PHWS-200-03	Conformance to the minimum required embedment of spliced joint	/	_____ X _____ =	
PHWS-200-04	Use of metal collar and/or protective caps during driving	/	_____ X _____ =	
PHWS-200-05	Attainment of required pile penetration/bearing capacity	/	_____ X _____ =	
PHWS-200-06	Pile shoe is provided for each pile	/	_____ X _____ =	
PHWS-200-07	Conformance to required number of piles supplied and driven in-place	/	_____ X _____ =	
PHWS-200-08	Lifting of each pile is at designed lifting points	/	_____ X _____ =	
PHWS-200-09	Vertical piles are driven plumb	/	_____ X _____ =	
PHWS-200-10	Batter piles are driven in accordance with the designed slope	/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
Minor				
PHWS-200-01	Conformance within the approved/specified tolerance for dimension	/	_____ X _____ =	
PHWS-200-02	Conformance within the approved/specified tolerance for pile length	/	_____ X _____ =	
PHWS-200-09	Conformance within the approved/specified tolerance for plumbness/verticality	/	_____ X _____ =	
PHWS-200-10	Conformance within the approved/specified tolerance for slope of the batter piles	/	_____ X _____ =	
PHWS-200-11	Proper graduation/markings	/	_____ X _____ =	
PHWS-200-12	Steel lifting hooks are cut-off and applied with approved type of sealant	/	_____ X _____ =	
PHWS-200-13	Alignment of the piles driven in-place are within the approved/specified tolerance	/	_____ X _____ =	
PHWS-200-14	Pile cut-off elevations are chipped-off properly. Free from excessive chipping below the cut-off elevations	/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Ports and Harbor
 LOCATION: _____

ITEM: Piers/Wharves/Slipways
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 201 Timber Piles				
Major	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-201-01	Conformance to the cross-sectional dimensions as per design and specifications	/	_____X_____	
PHWS-201-02	Conformance to the design length as per design and specifications	/	_____X_____	
PHWS-201-03	Use of metal collar and/or protective caps during driving	/	_____X_____	
PHWS-201-04	Attainment of required pile penetration/bearing capacity	/	_____X_____	
PHWS-201-05	Conformance to the required number of piles supplied and driven in-place	/	_____X_____	
PHWS-201-06	Lifting is at designated lifting points of each pile	/	_____X_____	
PHWS-201-07	Vertical piles are driven plumb	/	_____X_____	
PHWS-201-08	Batter piles are driven in accordance with the designed slope	/	_____X_____	
PHWS-201-09	No massive splitting is visible perpendicular to the pile length	/	_____X_____	
		/	_____X_____	
		/	_____X_____	
Minor				
PHWS-201-01	Conformance within the approved/specified tolerance for dimension	/	_____X_____	
PHWS-201-02	Conformance within the approved/specified tolerance for pile length	/	_____X_____	
PHWS-201-07	Conformance within the approved/specified tolerance for plumbness/verticality	/	_____X_____	
PHWS-201-08	Conformance within the approved/specified tolerance for slope of the batter piles	/	_____X_____	
PHWS-201-10	Proper graduation/markings	/	_____X_____	
PHWS-201-11	Alignment of the piles driven in-place are within the approved/specified tolerance	/	_____X_____	
PHWS-201-12	Pile butt is free from brooming	/	_____X_____	
		/	_____X_____	
		/	_____X_____	
		/	_____X_____	
		/	_____X_____	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: Ports and Harbor
LOCATION: _____

ITEM: Piers/Wharves/Slipways
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 202 Steel Piles				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-202-01	Conformance to the cross-sectional dimensions as per design and specifications	/	_____ X _____ =	
PHWS-202-02	Conformance to the design length as per design and specifications	/	_____ X _____ =	
PHWS-202-03	Use of metal collar and/or protective caps during driving	/	_____ X _____ =	
PHWS-202-04	Attainment of required pile penetration/bearing capacity	/	_____ X _____ =	
PHWS-202-05	Conformance to the splicing requirements as per design and specifications	/	_____ X _____ =	
PHWS-202-06	Conformance to required number of piles supplied and driven in-place	/	_____ X _____ =	
PHWS-202-07	Lifting of each pile is at designed lifting points	/	_____ X _____ =	
PHWS-202-08	Vertical piles are driven plumb	/	_____ X _____ =	
PHWS-202-09	Batter piles are driven in accordance with the specified slope	/	_____ X _____ =	
PHWS-202-10	Driven piles are free from massive dents or damages	/	_____ X _____ =	
PHWS-202-11	Each pile is properly applied with protective coating as required	/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
Minor				
PHWS-202-01	Conformance within the approved/specified tolerance for dimension	/	_____ X _____ =	
PHWS-202-02	Conformance within the approved/specified tolerance for pile length	/	_____ X _____ =	
PHWS-202-08	Conformance within the approved/specified tolerance for plumbness/verticality	/	_____ X _____ =	
PHWS-202-09	Conformance within the approved/specified tolerance for slope of the batter piles	/	_____ X _____ =	
PHWS-202-12	Proper graduation/markings	/	_____ X _____ =	
PHWS-202-13	Alignment of the piles driven in-place are within the approved/specified tolerance	/	_____ X _____ =	
PHWS-202-14	Pile cut-off are properly cut with appropriate cutting outfits at the established pile cut-off elevations	/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: Ports and Harbor
LOCATION: _____

ITEM: Piers/Wharves/Slipways
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 203 Timber Structural Member				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-203-01	Non-appearance of decay or insect attack	/	_____ x _____ =	
PHWS-203-02	Non-appearance of massive splitting	/	_____ x _____ =	
PHWS-203-03	Non-appearance of bends or warping	/	_____ x _____ =	
PHWS-203-04	Conformance with the cross-sectional dimensions per design and specifications	/	_____ x _____ =	
PHWS-203-05	Conformance to the design length as per design and specifications	/	_____ x _____ =	
PHWS-203-06	Splicing/lapping is in accordance with the design and specifications	/	_____ x _____ =	
PHWS-203-07	Conformance with the installation fixtures including fittings	/	_____ x _____ =	
Minor				
PHWS-203-04	Conformance within the specified tolerance for cross-sectional dimensions	/	_____ x _____ =	
PHWS-203-05	Conformance within the specified tolerance for length	/	_____ x _____ =	
		/	_____ x _____ =	
Item 204 Metal Structural Member				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-204-01	Conformance with the cross-sectional dimensions per design and specifications	/	_____ x _____ =	
PHWS-204-02	Conformance to the design length as per design and specifications	/	_____ x _____ =	
PHWS-204-03	Connections or joints are welded in accordance with the design and specifications	/	_____ x _____ =	
PHWS-204-04	Splicing/lapping is in accordance with the design and specifications	/	_____ x _____ =	
PHWS-204-05	Non-occurrence of bending or warping, cracking on metal and fixings	/	_____ x _____ =	
PHWS-204-06	Non-occurrence of cracks on metal and fixings	/	_____ x _____ =	
PHWS-204-07	Non-occurrence of cracks on metal components and fixtures	/	_____ x _____ =	
PHWS-204-08	Non-occurrence of corrosion	/	_____ x _____ =	
Minor				
PHWS-204-01	Conformance within the specified tolerance for cross-sectional dimensions	/	_____ x _____ =	
PHWS-204-02	Conformance within the specified tolerance for length	/	_____ x _____ =	
PHWS-204-08	Non-occurrence of rust	/	_____ x _____ =	
PHWS-204-09	Sufficient coating applied for rust protection	/	_____ x _____ =	
		/	_____ x _____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT _____

PROJECT TYPE: Ports and Harbor
LOCATION: _____

ITEM: Protective Works
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 300 Rubber Dock Fender, Rubber Fender on RC Pile				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-300-01	Conformance with the cross-sectional dimensions per design and specifications	/	_____ x _____ = _____	
PHWS-300-02	Conformance to the design length as per design and specifications	/	_____ x _____ = _____	
PHWS-300-03	Free from damages such as chipped-off edges, etc. during transport and handling	/	_____ x _____ = _____	
PHWS-300-04	Installation in accordance with the locations as per design and specifications	/	_____ x _____ = _____	
PHWS-300-05	Installation in accordance with the designed elevation	/	_____ x _____ = _____	
PHWS-300-06	Proper alignment of installed fenders	/	_____ x _____ = _____	
PHWS-300-07	Complete installation of fixtures and accessories	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Minor				
PHWS-300-01	Conformance within the specified tolerance for cross-sectional dimensions	/	_____ x _____ = _____	
PHWS-300-02	Conformance within the specified tolerance for length	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Item 301 Timber Pile Fender, Rubbing Timber, Timber Wailing				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-301-01	Non-appearance of decay or insect attack	/	_____ x _____ = _____	
PHWS-301-02	Non-appearance of massive splitting	/	_____ x _____ = _____	
PHWS-301-03	Non-appearance of bends or warping	/	_____ x _____ = _____	
PHWS-301-04	Conformance with the cross-sectional dimensions per design and specifications	/	_____ x _____ = _____	
PHWS-301-05	Conformance to the design length as per design and specifications	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Minor				
PHWS-301-04	Conformance within the specified tolerance for cross-sectional dimensions	/	_____ x _____ = _____	
PHWS-301-05	Conformance within the specified tolerance for length	/	_____ x _____ = _____	
PHWS-301-06	No chipped-off edges	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) = _____		CAR Total
Entered by: _____		No. of Indicators (b) = _____		
Date: / /		Rate = (a) / (b) = _____		
		Rate = _____		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: Ports and Harbor
LOCATION: _____

ITEM: Protective Works
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 302 Mooring Fixture: Cleat, Post, Bitt, Bollard				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-302-01	Supplied/installed mooring fixtures in accordance with the plans and specifications	/	_____ x _____ =	
PHWS-302-02	Conformance to the required number of anchor bolts, nuts and washers in accordance with the plans and specifications	/	_____ x _____ =	
PHWS-302-03	Conformance to pedestal/foundation requirements in accordance with the plans and specifications	/	_____ x _____ =	
PHWS-302-04	Conformance to the anchoring/embedment requirements of the anchor bolts	/	_____ x _____ =	
PHWS-302-05	Conformance to the number of mooring fixtures in accordance with the plans and specifications	/	_____ x _____ =	
PHWS-302-06	Conformance to the location of the mooring fixtures in accordance with the plans and specifications	/	_____ x _____ =	
PHWS-302-07	Conformance to the type and installation requirements for sealers of anchor bolts and nuts	/	_____ x _____ =	
PHWS-302-08	Non-occurrence of corrosion	/	_____ x _____ =	
PHWS-302-09	Non-occurrence of damages e.g. breakage, cracks or chipped-off portions on the mooring fixtures including accessories	/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
PHWS-302-01	Supplied/installed mooring fixtures and accessories within the approved/specified tolerances	/	_____ x _____ =	
PHWS-302-03	Conformance to pedestal/foundation within the approved/specified tolerances	/	_____ x _____ =	
PHWS-302-08	Non-occurrence of rust	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 303 Filter Fabric/Reinforcing Mattress				
Minor				
PHWS-303-01	Conformance to the elevation and extent of application as shown on the plan	/	_____ x _____ =	
PHWS-303-02	Conformance to the required installation procedure, e.g. lapping requirement, etc.	/	_____ x _____ =	
PHWS-303-03	Installed material is free from damage e.g. tears or holes	/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
PHWS-303-04	Installed material is not exposed to traffic loads	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Ports and Harbor ITEM: Protective Works
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 304 Stair Landing/Ladder				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-304-01	Conformance to the dimensions as per design and specifications	/	_____ x _____ =	
PHWS-304-02	Conformance to the required number of steps, risers	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
PHWS-304-01	Conformance within the approved/specified tolerance for dimensions	/	_____ x _____ =	
		/	_____ x _____ =	
	For reinforced concrete structure: refer to Common Items of Work - PHWS 900, 901 and 902			
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 305 Bulkhead Curves and Deflector Wall				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-305-01	Conformance to the dimensions as per design and specifications	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
PHWS-305-01	Conformance within the approved/specified tolerance for dimensions	/	_____ x _____ =	
		/	_____ x _____ =	
	For reinforced concrete structure: refer to Common Items of Work - PHWS 900, 901 and 902			
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____ Date: / /		No. of Indicators (b) =		
		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Ports and Harbor ITEM: Roll-on / Roll-off
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 400 Roll-on / Roll-off				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-400-01	Conformance with the ramp dimensions in accordance with the plans and specifications	/	_____ x _____ =	
PHWS-400-02	Conformance with the deck inclination in accordance with the plans and specifications	/	_____ x _____ =	
PHWS-400-03	Conformance with the ramp location in accordance with the plans and specifications	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
PHWS-400-01	Conformance within the approved/specified tolerance for dimensions	/	_____ x _____ =	
PHWS-400-02	Conformance within the approved/specified tolerance for deck inclination	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
	For reinforced concrete structure: refer to Common Items of Work - PHWS 900, 901 and 902	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Ports and Harbor ITEM: Electrical Works
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 500 Lighting System (includes lighting tower)				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-500-01	Supplied/installed type of lamps in accordance with the design and specifications	/	_____ x _____ =	
PHWS-500-02	Supplied/installed number of lamps in accordance with the design and specifications	/	_____ x _____ =	
PHWS-500-03	Conformance to the cross-sectional dimensions of lighting poles in accordance with the design and specifications	/	_____ x _____ =	
PHWS-500-04	Conformance to the height/length of lighting poles in accordance with the design and specifications	/	_____ x _____ =	
PHWS-500-05	Conformance to the location of lighting poles in accordance with the design and specifications	/	_____ x _____ =	
PHWS-500-06	Lighting poles are erected plumb	/	_____ x _____ =	
PHWS-500-07	Conformance to the wiring sizes in accordance with the design and specifications	/	_____ x _____ =	
PHWS-500-08	Conformance with electrical fixtures (e.g. switches, wire cables, load break switch, power fuse)	/	_____ x _____ =	
PHWS-500-09	Electrical wiring installed are fully insulated e.g. insulation are not peeled-off	/	_____ x _____ =	
PHWS-500-10	Electrical conduits and pipes conformed with the design and specifications	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
PHWS-500-03	Conformance within the approved/specified tolerance for dimensions of lighting poles	/	_____ x _____ =	
PHWS-500-04	Conformance within the approved/specified tolerance for height/length of lighting poles	/	_____ x _____ =	
PHWS-500-06	Conformance within the approved/specified tolerance for plumbness of lighting poles	/	_____ x _____ =	
PHWS-500-11	Conformance with the illumination distribution or direction of illumination in accordance with the design and specs	/	_____ x _____ =	
PHWS-500-12	Lighting poles and cage platforms properly coated against rust in accordance with the plans and specifications	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
	For r.c. pedestals and foundation of lighting poles, r.c. ductbanks and r.c. handholes: refer to Common Items of Work - PHWS 900, 901 and 902			
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Ports and Harbor ITEM: Electrical Works
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 501 Reefer Container Power Terminal (Receptacle-socket Outlet & Power Panel)				
Major				
PHWS-501-01	Compliance with the quantity of Receptacle-Socket Outlets as required in the design and specifications	/	_____ x _____ =	
PHWS-501-02	Compliance with the quality requirements of Receptacle-Socket Outlets as indicated in the design and specifications	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
	For reinforced concrete structure: refer to Common Items of Work - PHWS 900, 901 and 902			
		/	_____ x _____ =	
	For steel racks: refer to PHWS 204			
		/	_____ x _____ =	
	For electrical works: refer to PHWS 903			
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Ports and Harbor ITEM: Electrical Works
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 502 Fire Alarm System (Manual Stations, Fire Alarm Bells, Control Panels, Automatic Detectors, Pre-design Horn, Visual Anusciator, Power Supply)				
PHWS-502-01	Compliance with the number of automatic detectors as required in the design and specifications	/	_____ x _____ =	
PHWS-502-02	Compliance with the number of sprinklers as required in the design and specifications	/	_____ x _____ =	
PHWS-502-03	Compliance with the number of fire alarms/bells as required in the design and specifications	/	_____ x _____ =	
PHWS-502-04	Compliance with the installation for detectors as required in the design and specifications	/	_____ x _____ =	
PHWS-502-05	Compliance with the installation for sprinkler system as required in the design and specifications	/	_____ x _____ =	
PHWS-502-06	Compliance with the type of power supply for the alarm system as required in the design and specifications	/	_____ x _____ =	
PHWS-502-07	Compliance with the installation of water supply system for fire emergencies as required in the design and specifications	/	_____ x _____ =	
PHWS-502-08	Compliance with the installation of water piping inlets/outlets for fire emergencies as required in the design and specs	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 503 Transformer (Voltage, phase, load capacity, types, location fencing)				
Major				
PHWS-503-01	Compliance with the voltage rating input/output as required in the design and specifications	/	_____ x _____ =	
PHWS-503-02	Compliance with the number of phase as required in the design and specifications	/	_____ x _____ =	
PHWS-503-03	Compliance with the load capacity as required in the design and specifications	/	_____ x _____ =	
PHWS-503-04	Compliance with the location and installation as required in the design and specifications	/	_____ x _____ =	
PHWS-503-05	Compliance with the circuit safety protection and accessories as required in the design and specifications	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
	For electrical works: refer to PHWS 903			
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____ Date: / /		No. of Indicators (b) =		
		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Ports and Harbor ITEM: Electrical Works
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 504 Protection System for Outdoor Electrical Works (Lightning arrester, Grounding wire/rod, Air Terminal complete with accessories)				
Major				
PHWS-504-01	Conformance to the type/size of lightning arresters installed as required in the design and specifications	/	_____ x _____ = _____	
PHWS-504-02	Conformance to the number of lightning arresters installed as required in the design and specifications	/	_____ x _____ = _____	
PHWS-504-03	Conformance to the type/size of grounding wires as required in the design and specifications	/	_____ x _____ = _____	
PHWS-504-04	Conformance to the type of air terminals including accessories as required in the design and specifications	/	_____ x _____ = _____	
PHWS-504-05	Conformance to the wire splicing requirements as required in the design and specifications	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
	For electrical works: refer to PHWS 903			
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Was subcontractor used? If yes, name of company and owner: _____ & _____				Total Score (a) =
Entered by: _____ Date: / /				No. of Indicators (b) =
				Rate = (a) / (b) =
				Rate =

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Ports and Harbor
 LOCATION: _____

ITEM: Mechanical Works
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 600 Stand-by Generators System				
Major				
PHWS-600-01	Conformance to the rated capacity of the generator set as required in the design and specifications	/	_____ x _____ =	
PHWS-600-02	Conformance to the engine type and engine power requirements as required in the design and specifications	/	_____ x _____ =	
PHWS-600-03	Conformance to the exhaust piping system as required in the design and specifications	/	_____ x _____ =	
		/	_____ x _____ =	
	For foundation and housing requirements of the generator set: refer to PHWS 900, 901, 902, 904, 905, 906, 907, 908 and 909			
		/	_____ x _____ =	
	For electrical works: refer to PHWS 903			
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 601 A.C. System / Cold Storage				
Major				
PHWS-601-01	Conformance with the quantity of cooling equipment as required in the design and specifications	/	_____ x _____ =	
PHWS-601-02	Conformance with the required type/class of cooling equipment as required in the design and specifications	/	_____ x _____ =	
PHWS-601-03	Conformance with the installation location of equipment as required in the design and specifications	/	_____ x _____ =	
PHWS-601-04	Dimensions of the ducting are in accordance with the plans	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
PHWS-601-05	Ventilation/air ducting are free from leaks	/	_____ x _____ =	
PHWS-601-06	Ducting is provided with insulation as required	/	_____ x _____ =	
		/	_____ x _____ =	
	For metal sheet ducting: refer to PHWS 910			
		/	_____ x _____ =	
	For electrical works: refer to PHWS 903			
		/	_____ x _____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: Ports and Harbor
LOCATION:

ITEM: Mechanical Works
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

[illegible]

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Ports and Harbor
 LOCATION: _____

ITEM: Reclamation Works
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 700 Reclamation Works				
Major				
PHWS-700-01	Excavation/displacement of unsuitable materials to required depth	/	_____ x _____ =	
PHWS-700-02	Use of suitable filling materials	/	_____ x _____ =	
PHWS-700-03	Unsuitable materials are properly segregated from the other materials to be used for the project	/	_____ x _____ =	
PHWS-700-04	Unsuitable materials are properly disposed to the approved disposal site	/	_____ x _____ =	
PHWS-700-05	Conformance to lines and grades as per plans and specifications	/	_____ x _____ =	
PHWS-700-06	Installed approved surcharge materials, drain materials	/	_____ x _____ =	
PHWS-700-07	Provision of drainage for surface run-off	/	_____ x _____ =	
PHWS-700-08	Adequate compaction above sea level	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
PHWS-700-09	Provision of settlement plate	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Ports and Harbor
 LOCATION: _____

ITEM: Dredging Works
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 710 Dredging Works				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-710-01	Conformance to the dredging limits or areas to be dredged	/	_____ x _____ = _____	
PHWS-710-02	Conformance to the dredged depth as per plans and specifications	/	_____ x _____ = _____	
PHWS-710-03	Conformance to the appropriate dredging and support equipments as per specifications	/	_____ x _____ = _____	
PHWS-710-04	Proper disposal of dredged materials to the designated disposal area/site	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Minor				
PHWS-710-02	Conformance to the allowable or approved tolerance for dredged depth	/	_____ x _____ = _____	
PHWS-710-05	Marking buoys evident on designated areas to be dredged	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____		Date: / /	No. of Indicators (b)	
			Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____VISIT

PROJECT TYPE: Ports and Harbor
 LOCATION: _____

ITEM: Special Items
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 800 Caisson Type Breakwater (Formworks, Rebars, Concrete Bedding and Filling Materials - see common items of work for checklists/criteria)				
Major				
PHWS-800-01	Conformance to the approved/specified tolerances for lines, grades and elevation	/	_____ x _____ =	
		/	_____ x _____ =	
	For concrete structure: refer to Common Items of Work - PHWS 900, 901 and 902			
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 801 Concrete Blocks/Tetrapods (Dissipators)				
		/	_____ x _____ =	
	For concrete structure: refer to Common Items of Work - PHWS 900, 901 and 902			
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 802 Navigational Aids (Beacon Poles and Lighting Fixtures, Marking Buoys)				
PHWS-802-01	Conformance to required location of Beacon Poles and Lighting Fixtures and Marking Buoys	/	_____ x _____ =	
PHWS-802-02	Conformance to the required cross-section and details	/	_____ x _____ =	
PHWS-802-03	Conformance to the required effective intensity of navigational light	/	_____ x _____ =	
PHWS-802-04	Conformance to the required luminous range of navigational light	/	_____ x _____ =	
PHWS-802-05	Conformance to the required number of flashes/flashing sign and color of navigational light	/	_____ x _____ =	
PHWS-802-06	Conformance to the required installation method	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b)	
Date: / /			Rate = (a) / (b)	
			Rate	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT _____

PROJECT TYPE: Ports and Harbor
LOCATION: _____

ITEM: Common Items of Work
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 900 Formworks				
PHWS-900-01	Conformance to the required type of formworks in accordance with approved shop/working drawings	/	_____ x _____ =	
PHWS-900-02	Forms coated with mould oil as required	/	_____ x _____ =	
PHWS-900-03	Sufficient bracing/support provided	/	_____ x _____ =	
PHWS-900-04	No loose knots, splits, cracks, etc.	/	_____ x _____ =	
PHWS-900-05	Provision of required concrete or steel spacer	/	_____ x _____ =	
PHWS-900-06	Conformance to dimensions, location, plumbness and alignment	/	_____ x _____ =	
PHWS-900-07	Provision of camber during construction stage	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 901 Reinforcing Steel Bars (including tendons for Pre/Post-stressed concrete)				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-901-01	Conformance of in-placed materials to plans & specifications	/	_____ x _____ =	
PHWS-901-02	Non-appearance of corrosion on steel reinforcement	/	_____ x _____ =	
Minor				
PHWS-901-02	Non-appearance of rust on steel reinforcement	/	_____ x _____ =	
PHWS-901-03	Conformance to approved bar cutting schedule, proper spacing, anchorage, adequate reinforcements	/	_____ x _____ =	
PHWS-901-04	No sign of oil, paint and other deleterious materials on reinforcements	/	_____ x _____ =	
PHWS-901-05	Conformance to jointing requirement, i.e. splicing, welding, etc.	/	_____ x _____ =	
PHWS-901-06	Conformance to the required installation of ducktube e.g. (spacing, location and distance)	/	_____ x _____ =	
PHWS-901-07	Conformance to the required steel plate and lock	/	_____ x _____ =	
PHWS-901-08	Conformance to the number of bundles of tendons and number of pieces of bundles of tendons	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____				Total Score (a)
Entered by: _____ Date: / /				No. of Indicators (b)
				Rate = (a) / (b)
				=
				Rate
				=

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: Ports and Harbor
LOCATION: _____

ITEM: Common Items of Work
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 902 Concrete Works				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
PHWS-902-01	No through cracks	/	_____ x _____ =	
PHWS-902-02	No honeycomb or spalling (no exposed rebars/aggregates)	/	_____ x _____ =	
PHWS-902-03	No chipping off of concrete cover	/	_____ x _____ =	
PHWS-902-04	Proper and adequate vibration	/	_____ x _____ =	
PHWS-902-05	Conformance to finishing/plastering requirement	/	_____ x _____ =	
PHWS-902-06	No sagging or bulging	/	_____ x _____ =	
PHWS-902-07	Conformance to the required concrete cover for rebars	/	_____ x _____ =	
PHWS-902-08	Conformance to the batching, mixing, transporting and discharge time requirements	/	_____ x _____ =	
PHWS-902-09	Conformance to placing requirement that will not result segregation of aggregates, cold joints and misalignment	/	_____ x _____ =	
PHWS-902-10	Conformance to the jointing requirement	/	_____ x _____ =	
PHWS-902-11	Proper curing	/	_____ x _____ =	
PHWS-902-12	Conformance to required dimensions, lines, grades/elevation locations and crown (for pier)	/	_____ x _____ =	
PHWS-902-13	Conformance to the required quality of concrete mix	/	_____ x _____ =	
PHWS-902-14	Provision of camber for RCDG	/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
PHWS-902-01	No cracks	/	_____ x _____ =	
PHWS-902-02	No honeycomb or spalling	/	_____ x _____ =	
PHWS-902-06	No sagging or bulging	/	_____ x _____ =	
PHWS-902-15	No water ponding on bearing plates	/	_____ x _____ =	
PHWS-902-16	Conformance to elevation of expansion joints	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a)		CAR Total
Entered by: _____		No. of Indicators (b)		
Date: / /		Rate = (a) / (b)		
		=		
		Rate		
		=		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____VISIT

PROJECT TYPE: Ports and Harbor
 LOCATION: _____

ITEM: Electrical Works
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 903 Electrical Works				
PHWS-903-01	Pipes installed according to plans and laid out according to approved construction drawings	/	_____x_____	
PHWS-903-02	Pipes, hangers, boxes, gutters, cable trays properly installed and painted, sharp edges of pipes removed	/	_____x_____	
PHWS-903-03	Pipes properly bended	/	_____x_____	
PHWS-903-04	Allowable number of wires in a pipe properly observed	/	_____x_____	
PHWS-903-05	Splicing and connection provided with adequate rubber and pvc tapes	/	_____x_____	
PHWS-903-06	Adequate length of wire provided for termination and splicing	/	_____x_____	
PHWS-903-07	Wire color coding complied and observed	/	_____x_____	
PHWS-903-08	Wire insulation not damaged during pulling	/	_____x_____	
PHWS-903-09	Adequate number, correct size and gauge of pull boxes installed and properly covered	/	_____x_____	
PHWS-903-10	Boxes and enclosures provided according to intended purpose	/	_____x_____	
PHWS-903-11	Fittings and accessories provided and properly installed	/	_____x_____	
PHWS-903-12	Block-outs and sleeves provided and properly secured	/	_____x_____	
PHWS-903-13	Cable ties provided	/	_____x_____	
PHWS-903-14	Blank covers provided for outlets and switches that are not utilized	/	_____x_____	
PHWS-903-15	Use of tools and equipment properly observed	/	_____x_____	
PHWS-903-16	Lighting fixtures, panel boards, circuit breakers, etc. properly installed and free from any form of damages	/	_____x_____	
PHWS-903-17	Meager, clamp, phase sequence tests and load test conducted	/	_____x_____	
PHWS-903-18	Shop drawings, as-built plan maintained	/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a)		CAR Total
Entered by: _____		No. of Indicators (b)		
Date: / /		Rate = (a) / (b)		
		=		
		Rate		
		=		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Ports and Harbor
 LOCATION: _____

ITEM: Common Items of Work
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 904 CHB Wall				
Major				
PHWS-904-01	Conformance to required quality of CHB	/	_____ x _____ =	
PHWS-904-02	Conformance to required quality mortar mix	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
PHWS-904-03	Conformance to specified tolerances for dimension, location, plumbness and alignment	/	_____ x _____ =	
PHWS-904-04	Proper spacing of horizontal and vertical bars	/	_____ x _____ =	
PHWS-904-05	Rebars used free from corrosion	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 905 Doors				
PHWS-905-01	True to alignment, plumbness in conformance to the approved/specified tolerance	/	_____ x _____ =	
PHWS-905-02	Doors are well fitted to the door frames	/	_____ x _____ =	
PHWS-905-03	Door accessories installed according to plans, e.g. locksets, door closers, hinges, door stoppers	/	_____ x _____ =	
PHWS-905-04	Free from any form of damages	/	_____ x _____ =	
PHWS-905-05	Doors conforms to specification requirements e.g. panel door, flush door polyvinyl, steel doors, etc.	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a)		CAR Total
Entered by: _____		No. of Indicators (b)		
Date: / /		Rate = (a) / (b)		
		=		
		Rate		
		=		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Ports and Harbor
 LOCATION: _____

ITEM: Wall Finishes
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 906 Plaster Finish				
PHWS-906-01	Conformance to designed mixture of plastering materials	/	_____ X _____ =	
PHWS-906-02	Conformance to specified method of application and thickness of plastering	/	_____ X _____ =	
PHWS-906-03	True to alignment	/	_____ X _____ =	
PHWS-906-04	Free from any form of damages e.g. cracks, peeled-off plaster finish	/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
Item 907 Painting				
PHWS-907-01	Surface prepared according to specification	/	_____ X _____ =	
PHWS-907-02	Required neutralizers, etc. applied	/	_____ X _____ =	
PHWS-907-03	Applied paint appropriate to the surface	/	_____ X _____ =	
PHWS-907-04	Specified number of coats applied	/	_____ X _____ =	
PHWS-907-05	Surfaces evenly painted, proper opacity	/	_____ X _____ =	
PHWS-907-06	No discoloration and peeling-off of paint	/	_____ X _____ =	
PHWS-907-07	Paints conform to specification/requirements	/	_____ X _____ =	
PHWS-907-08	Surface are properly applied with putty/patching compound	/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a)		CAR Total
Entered by: _____		No. of Indicators (b)		
Date: / /		Rate = (a) / (b)		
		=		
		Rate		
		=		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Ports and Harbor
 LOCATION: _____

ITEM: Sewer & Drainage System
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 908 Pipe Culvert and Storm Drain				
PHWS-908-01	Bedding and backfill materials compacted to the required density	/	_____ x _____ =	
PHWS-908-02	Proper jointing of pipes	/	_____ x _____ =	
PHWS-908-03	Mortar for jointing of reinforced concrete culvert pipes conforms to specified mixture type	/	_____ x _____ =	
PHWS-908-04	Adequate collaring of reinforced concrete culvert pipes	/	_____ x _____ =	
PHWS-908-05	Conformance to the approved/specified tolerance for elevation, slope, and alignment	/	_____ x _____ =	
PHWS-908-06	Cracks, honeycomb, chipping-off within specified tolerances	/	_____ x _____ =	
PHWS-908-07	Sufficient collaring & flushing	/	_____ x _____ =	
PHWS-908-08	Conformance to the approved quality of concrete mix	/	_____ x _____ =	
PHWS-908-09	Spacing and sizes of rebars conform to specification	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 909 Manholes, Inlets and Catch Basin				
PHWS-909-01	Conformance to approved/specified tolerances for dimensions and elevations	/	_____ x _____ =	
PHWS-909-02	Covers and gratings well fitted and can easily be opened during maintenance work	/	_____ x _____ =	
PHWS-909-03	Honeycomb, cracks, spalling, etc. within specified tolerance	/	_____ x _____ =	
PHWS-909-04	Conformance to approved quality of concrete mix	/	_____ x _____ =	
PHWS-909-05	Spacing and sizes of rebars conform to specification	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a)		CAR Total
Entered by: _____		No. of Indicators (b)		
Date: / /		Rate = (a) / (b)		
		=		
		Rate		
		=		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
_____ VISIT

PROJECT TYPE: Ports and Harbor
LOCATION: _____

ITEM: Roofing System
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

[illegible]

A N N E X 2-D

CHECKLIST FOR IRRIGATION

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Item 003	Diversion and Care of River During Construction and Dewatering of Foundation	2D-2
Item 004	Canal/Channel Excavation	2D-3
Item 006	Structure Excavation	2D-4
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CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____
 _____ Visit
 Date of Visit: _____

Project Type : **IRRIGATION**
Location : _____
Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		RESULTS	SCORE Result x factor	ACTION/ MONITOR
SUB-ITEM CODE	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 002 Clearing and Grubbing				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
IRWS-002-01	Existing adjacent facilities, properties and utilities are protected from damages	/	x =	
Minor				
IRWS-002-01	Existing adjacent facilities, properties and utilities are protected from damages	/	x =	
IRWS-002-02	The entire right of way for irrigation structures borrow and stockpile area cleared of all vegetation, trees except those to be preserved	/	x =	
IRWS-002-03	Swampy and/or second growth forested areas suitably dried prior to clearing	/	x =	
IRWS-002-04	Proper disposal of combustible materials	/	x =	
IRWS-002-05	Unsuitable materials completely removed up to specified/ designed depth	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
 Visit _____ Location : _____
 Date of Visit: _____ Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 003 Diversion and Care of River During Construction and Dewatering of Foundation				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
IRWS-003-01	Conformance to agency approved plan on the types, location, arrangement of river diversion	/	x =	
Minor				
IRWS-003-01	Conformance to agency approved plan on the types, location, arrangement of river diversion	/	x =	
IRWS-003-02	Construction operations performed in the dry	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____
 Visit _____
 Date of Visit: _____

Project Type : **IRRIGATION**
 Location : _____
 Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 004 Canal/Channel Excavation				
Major				
IRWS-004-01	No damages on adjoining structures, no unduly large excavation and no destabilization of grounds occurred after blasting	/	x =	
IRWS-004-02	Slope protection from land sliding in deep cut excavation provided	/	x =	
Minor				
IRWS-004-03	Horizontal and vertical controls are complete and properly established	/	x =	
IRWS-004-04	Excavation true to lines, slopes and profiles as shown on the drawings	/	x =	
IRWS-004-05	Drilling and blasting operation approved by the agency	/	x =	
IRWS-004-06	Work area cleaned and cleared, foreign materials properly disposed	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No.of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
 Visit _____ Location : _____
 Date of Visit: _____ Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 006 Structure Excavation				
Major				
IRWS-006-01	No damages to adjoining structures due to improper blasting	/	x =	
IRWS-006-02	Slope protection from land sliding in deep cut excavation provided	/	x =	
Minor				
IRWS-006-03	Excavation and compaction of foundation true to lines and grades	/	x =	
IRWS-006-04	Conformance to concrete backfilling or embankment and compaction for over excavated materials	/	x =	
IRWS-006-05	Provision of side & bottom weepholes on rock excavation	/	x =	
IRWS-006-06	Surface where concrete will be placed trimmed and cleaned thoroughly	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____
 Visit _____
 Date of Visit: _____

Project Type : **IRRIGATION**
 Location : _____
 Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 007 Drilling and Grouting				
Major				
IRWS-007-01	Holes drilled in proper location, direction and depth as shown on the drawings	/	x =	
IRWS-007-02	Drilling and blasting of holes done in accordance to specification and construction methodology	/	x =	
Minor				
IRWS-007-03	Surfaces affected by drilling and grouting operations cleaned and restored	/	x =	
IRWS-007-04	Steel pipes installed according to plans and specifications	/	x =	
IRWS-007-05	Accurate geological logs of all exploratory holes drilled provided	/	x =	
IRWS-007-06	Records of all exploratory holes and grouting operations submitted in accordance with agreed form of drawings and reports	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
 Visit _____ Location : _____
 Date of Visit: _____ Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 008 Farm and Drainage Ditch Construction				
Major				
IRWS-008-01	Location and alignment conforms to plan and maps	/	x =	
Minor				
IRWS-008-02	Excavation conforms to the section and dimension as shown on the drawings	/	x =	
IRWS-008-03	Areas saturated before excavation	/	x =	
IRWS-008-04	Conformance to required density or degree of compaction of filling materials	/	x =	
IRWS-008-05	Compacted embankment constructed true to lines, grades dimensions and prepared foundation	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
 Visit _____ Location : _____
 Date of Visit: _____ Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 009 Overhaul				
Major				
IRWS-009-01	Source and location of overhaul materials acceptable as to quality and quantity approved by the Engineer	/	x =	
Minor				
IRWS-009-02	Overhaul materials for embankment or structure backfill free from organic materials	/	x =	
IRWS-009-03	Waste materials properly placed in waste disposal areas, leveled and slope to drain	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____
 Visit _____
 Date of Visit: _____

Project Type : **IRRIGATION**
 Location : _____
 Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 010 Side Borrow				
Major				
IRWS-010-01	Conformance to compaction methodology	/	x =	
IRWS-010-02	Borrow area leveled, destroyed paddies restored	/	x =	
Minor				
IRWS-010-03	Top soil material on side borrow areas properly cleared and grubbed	/	x =	
IRWS-010-04	Conformance to lines, grades and depth of excavation	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
 Visit _____ Location : _____
 Date of Visit: _____ Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 011 Borrow Haul				
Major				
IRWS-011-01	Source and location of borrow haul materials acceptable as to quality and quantity approved by the Engineer	/	x =	
Minor				
IRWS-011-02	Borrow haul pits properly staked, cleared, grubbed, stripped of all unsuitable materials	/	x =	
IRWS-011-03	Right of way properly acquired and accessed	/	x =	
IRWS-011-04	Haul roads constructed and properly maintained	/	x =	
IRWS-011-05	Borrow pits properly drained	/	x =	
IRWS-011-06	Stripped top soil returned to smooth and even surface	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.:

Visit

Project Type : **IRRIGATION**

Location :

Date of Visit: _____

Factor :

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		RESULTS	SCORE Result x factor	ACTION/ MONITOR
SUB-ITEM CODE	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 012 Structure Backfill				
Major				
IRWS-012-01	Compliance to proper construction methodology (compacted layers as specified)	/	x =	
Minor				
IRWS-012-02	Proper removal of rubbish, mud, loose materials	/	x =	
IRWS-012-03	Dewatering of excavation pit conducted	/	x =	
IRWS-012-04	Conformance to required degree of compaction	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
 Visit _____ Location : _____
 Date of Visit: _____ Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 013 Embankment Construction and Compaction				
Major				
IRWS-013-01	Constructed in horizontal layers, thickness of layers not exceeding 15 cm. after compaction	/	x =	
IRWS-013-02	Conformance to required equipment	/	x =	
IRWS-013-03	Conformance to required degree of compaction	/	x =	
Minor				
IRWS-013-04	Compacted embankment constructed true to lines, grades, dimensions and prepared foundations	/	x =	
IRWS-013-05	Ground surface scarified to the desired depth	/	x =	
IRWS-013-06	Unsuitable materials removed and replaced with suitable materials	/	x =	
IRWS-013-07	Top soil of the foundation area for swampy ground stripped	/	x =	
IRWS-013-08	Slope of hillside horizontally cut when embankment are made on hillside (parallel, abutting, crossing over)	/	x =	
IRWS-013-09	Slope of hillside recompacted along with new embankment materials	/	x =	
IRWS-013-10	Proper surface drainage provided	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
 _____ Visit _____
 Date of Visit: _____ Location : _____
 _____ Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 014 Roads				
Major				
IRWS-014-01	In-placed materials conforms with plans and specifications	/	x =	
IRWS-014-02	Conformance to required degree of compaction	/	x =	
Minor				
IRWS-014-03	Conformance to proper construction methodology	/	x =	
IRWS-014-04	Road surfacing materials and shoulder materials did not mix during spreading	/	x =	
IRWS-014-05	Conformance to the lines, grades and dimensions as indicated in the plans and specifications	/	x =	
IRWS-014-06	Non-occurrence of irregular surface/depression	/	x =	
IRWS-014-07	Blending filler for top coarse materials conforms to specifications	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____
 Visit _____
 Date of Visit: _____

Project Type : **IRRIGATION**
 Location : _____
 Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 015 Concrete Works				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
IRWS-015-01	No through cracks	/	x =	
IRWS-015-02	No honeycomb or spalling (no exposed rebars/aggregates)	/	x =	
IRWS-015-03	No sagging or bulging	/	x =	
IRWS-015-04	Conformance to the required quality of concrete mix	/	x =	
IRWS-015-05	Provision of camber for RCDG	/	x =	
Minor				
IRWS-015-01	No cracks	/	x =	
IRWS-015-02	No honeycomb or spalling	/	x =	
IRWS-015-03	No sagging or bulging	/	x =	
IRWS-015-06	No chipping off of concrete cover	/	x =	
IRWS-015-07	Proper and adequate vibration	/	x =	
IRWS-015-08	Conformance to finishing/plastering requirement	/	x =	
IRWS-015-09	Conformance to the required concrete cover for rebars	/	x =	
IRWS-015-10	Conformance to the batching, mixing, transporting and discharge time requirements	/	x =	
IRWS-015-11	Conformance to placing requirements that will not result to segregation of aggregates, cold joints and misalignment	/	x =	
IRWS-015-12	Conformance to the jointing requirement	/	x =	
IRWS-015-13	Proper curing	/	x =	
IRWS-015-14	Conformance to the required dimensions, lines, grades/elevation, locations and crown (for pier)	/	x =	
IRWS-015-15	No water ponding on bearing plates	/	x =	
IRWS-015-16	Conformance to elevation of expansion joints	/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
 Visit _____ Location : _____
 Date of Visit: _____ Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 016 Concrete Demolition Works				
IRWS-016-01	Undertaken according to plans, operations (drilling, blasting)	/	x =	
IRWS-016-02	Proper removal/disposal of demolished structure	/	x =	
IRWS-016-03	Non-occurrence of damages to the entire/adjacent structure	/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No of Idicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
 Visit _____ Location : _____
 Date of Visit: _____ Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 018 Shotcrete				
Major				
IRWS-018-01	Adherence to proper construction methodology	/	x =	
IRWS-018-02	Class of shotcrete conforms to specs	/	x =	
Minor				
IRWS-018-03	Surfaces to be in contact with shotcrete prepared/cleaned	/	x =	
IRWS-018-04	Proper curing applied	/	x =	
IRWS-018-05	Drainage holes penetrated into the rock according to plans and specifications	/	x =	
IRWS-018-06	Welded wire/chain-link fabric free from intensive rust, mud, grease, wax, foreign materials	/	x =	
IRWS-018-07	Welded wire/chain-link fabric installed according to plans and specifications	/	x =	
IRWS-018-08	Rebounded concrete not used again as spray materials	/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
 Visit _____ Location : _____
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FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 019 Rubble Masonry				
Major				
IRWS-019-01	Conformance to proper construction methodology	/	x =	
IRWS-019-02	Conformance to specified size	/	x =	
Minor				
IRWS-019-03	Rubble stones installed are clean, sound, durable, resistant to action of water	/	x =	
IRWS-019-04	Stones thoroughly wet and properly covered with concrete binder	/	x =	
IRWS-019-05	Conformance to lines, grades and dimensions	/	x =	
IRWS-019-06	Non-occurrence of voids	/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
 Visit _____ Location : _____
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SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 020 Concrete Canal Lining				
Major				
IRWS-020-01	Non displacement of in-placed concrete lining panels	/	x =	
IRWS-020-02	Flap valve weeps installed in accordance to the drawings	/	x =	
IRWS-020-03	Conformance to proper construction methodology	/	x =	
Minor				
IRWS-020-04	Trimming according to lines, grades, elevations, dimensions, and cross-sections	/	x =	
IRWS-020-05	Impregnated building paper installed prior to concrete pouring	/	x =	
IRWS-020-06	Conformance to the locations of construction joints as shown in the drawings	/	x =	
IRWS-020-07	Surface of the lining finished as specified	/	x =	
IRWS-020-08	Cold joints are in horizontal and vertical lines	/	x =	
IRWS-020-09	Conformance to jointing requirements	/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
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 Date of Visit: _____ Location : _____
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FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 021 Concrete Joints and Joint Materials				
Major				
IRWS-021-01	Conformance to plans and specifications	/	x =	
IRWS-021-02	Contraction and expansion joints constructed at locations indicated in the drawings	/	x =	
Minor				
IRWS-021-03	Non-occurrence of feather edges	/	x =	
IRWS-021-04	No chipped-off edges or corners	/	x =	
IRWS-021-05	Provision of required amount of sealant	/	x =	
IRWS-021-06	Provision of waterstops	/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
 Visit _____ Location : _____
 Date of Visit: _____ Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 022 Dowels				
Major				
IRWS-022-01	In-placed materials conform with plans and specifications	/	x =	
Minor				
IRWS-022-02	Provision of square nut threaded into the end of dowel bar	/	x =	
IRWS-022-03	Properly secured or held in place with cement grout as specified on the drawings	/	x =	
IRWS-022-04	Drilled dowel holes in accordance with the approved drawings	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
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FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 023 Reinforcing Steel Bars				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
IRWS-023-01	Conformance of in-placed materials to plans and specifications	/	x =	
IRWS-023-02	Non-appearance of corrosion on steel reinforcement	/	x =	
Minor				
IRWS-023-02	Non-appearance of rust on steel reinforcement	/	x =	
IRWS-023-03	Conformance to approved bar cutting schedule, proper spacing, anchorage, adequate reinforcements	/	x =	
IRWS-023-04	No sign of oil, paint and other deleterious materials on reinforcements	/	x =	
IRWS-023-05	Conformance to jointing requirements, i.e., splicing, welding, etc.	/	x =	
IRWS-023-06	Conformance to the required installation of ducttube (e.g. spacing, location and distance)	/	x =	
IRWS-023-07	Conformance to the required steel plate and lock	/	x =	
IRWS-023-08	Conformance to the number of bundles of tendons and number of pieces of bundles of tendons	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____
 Visit _____
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FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 024 Reinforced Concrete Pipes				
Major				
IRWS-024-01	Conformance to the required/approved tolerance for slope, alignment, elevation and dimensions	/	x =	
IRWS-024-02	Conformance to in-placed materials	/	x =	
Minor				
IRWS-024-03	No cracks, honeycombs, chipping of edges	/	x =	
IRWS-024-04	Compliance to joint mortar mixing proportion	/	x =	
IRWS-024-05	Sufficient collaring and flushing	/	x =	
IRWS-024-06	Compliance to the required thickness, compaction and materials requirement of gravel bedding	/	x =	
IRWS-024-07	Compliance to the required thickness and compaction of backfill	/	x =	
IRWS-024-08	Conformance to trenching requirements	/	x =	
IRWS-024-09	Free from debris, siltation, etc.	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____
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SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 025 Boulder Riprap, Item 026 Gabion-type Riprap, Item 027 Grouted Riprap				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
IRWS-02_-01	No through cracks	/	x =	
IRWS-02_-02	Conformance to specifications (size, type, weight, etc. of boulders)	/	x =	
IRWS-02_-03	Sufficient grout/mortar	/	x =	
IRWS-02_-04	Observance to proper placing of stones/boulders	/	x =	
IRWS-02_-05	Conformance to the approved/required tolerance for slope, alignment and thickness (exceeding allowable tolerance)	/	x =	
IRWS-02_-06	Compliance to the specified compaction and preparation of bedding (gravel blanket and subgrade)	/	x =	
IRWS-02_-07	Compliance to design mix of mortar	/	x =	
IRWS-02_-08	Provision of weep holes	/	x =	
Minor				
IRWS-02_-01	No cracks	/	x =	
IRWS-02_-04	Observance to proper placing of stones/boulders	/	x =	
IRWS-02_-05	Conformance to the approved/required tolerance for slope, alignment and thickness (not exceeding the allowable tolerance)	/	x =	
IRWS-02_-08	Provision of weep holes	/	x =	
IRWS-02_-09	Sufficient stone/spall fillers	/	x =	
IRWS-02_-10	Conformance to the required lapping requirement	/	x =	
IRWS-02_-11	Conformance to specified curing of structure	/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.:

Project Type : **IRRIGATION**

Visit

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INDICATORS		RESULTS	SCORE Result x factor	ACTION/ MONITOR
SUB-ITEM CODE	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 028 Gravel Blanket				
IRWS-028-01	Conformance to lines, thickness as shown on the drawings	/	x	
			=	
IRWS-028-02	Conformance of in-placed materials	/	x	
			=	
IRWS-028-03	Provision of filter fabric, as required	/	x	
			=	
		/	x	
			=	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
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SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 029 Filter Drain				
Major				
IRWS-029-01	Conformance to lines, grades, thickness as shown on the drawings	/	x =	
IRWS-029-02	Compliance to specified construction methodology	/	x =	
Minor				
IRWS-029-03	Compliance to specified compaction	/	x =	
IRWS-029-04	Provision of weepholes as per plans/specification	/	x =	
IRWS-029-05	Provision of filter and flap gate	/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

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SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 030 Plain Concrete Drain Pipe				
Major	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
IRWS-030-01	No through cracks	/	x =	
IRWS-030-02	Conformance to the required/approved tolerance for slope, alignment and elevation	/	x =	
Minor				
IRWS-030-01	No cracks	/	x =	
IRWS-030-03	Compliance to joint mortar mixing proportions	/	x =	
IRWS-030-04	Sufficient collaring and flushing	/	x =	
IRWS-030-05	Compliance to the required compaction of backfill and gravel bedding	/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

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SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 031 Reinforced Concrete Piles				
Major	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
IRWS-031-01	Conformance of in-placed materials to plans and specifications	/	x =	
IRWS-031-02	Conformance to construction methodology (installation, location and type)	/	x =	
IRWS-031-03	Conformance to splicing requirements	/	x =	
IRWS-031-04	Conformance to the required length, width, thickness, and/or diameter	/	x =	
IRWS-031-05	Provision of pile shoe	/	x =	
IRWS-031-06	No cracks, honeycomb	/	x =	
IRWS-031-07	Piles provided with gradation marks (driven or stockpile)	/	x =	
IRWS-031-08	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (>20 mm/m), elevation, location (>150mm) & spacing	/	x =	
Minor				
IRWS-031-08	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (<20 mm/m), elevation, location (<150mm) & spacing	/	x =	
IRWS-031-09	Conformance to specified curing on casted RC piles	/	x =	
IRWS-031-10	Conformance to casting length	/	x =	
IRWS-031-11	Conformance to required lifting procedures	/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

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SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 032 Steel Sheet Piles				
Major	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
IRWS-032-01	Conformance of in-placed materials to plans & specs	/	x =	
IRWS-032-02	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (>20 mm/m), elevation, location (>150 mm)	/	x =	
IRWS-032-03	Piles provided with gradation marks (driven or stockpile)	/	x =	
IRWS-032-04	Conformance to the approved tolerances for dimension	/	x =	
IRWS-032-05	No corrosion on steel sheet piles	/	x =	
IRWS-032-06	Compliance to the required number of piles	/	x =	
Minor				
IRWS-032-02	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (≤20 mm/m), elevation, location (≤150 mm)	/	x =	
IRWS-032-05	No presence of rust on steel sheet piles	/	x =	
IRWS-032-07	Compliance to the required splicing	/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

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Item 033 Steel Gates and Lifting Mechanism (steel gates, stoplog, lifting mechanism, embedded parts)				
Major				
IRWS-033-01	Mounting and bearing surfaces accurately machined	/	x =	
IRWS-033-02	Installed equipment conformed accurately to the designed dimensions, free from defects in workmanship and materials according to the specified type and model	/	x =	
IRWS-033-03	Gates and lifting mechanism assembly installed in accordance to plans and specifications	/	x =	
Minor				
IRWS-033-04	Conformance to specified jointing/welding methods	/	x =	
IRWS-033-05	Drain holes provided on all locations where entrapment of water can occur	/	x =	
IRWS-033-06	Conformance to the specified painting for submerged steel, steel exposed to atmosphere and embedded steel	/	x =	
IRWS-033-07	Non-occurrence of leakage	/	x =	
IRWS-033-08	Operation and maintenance manual provided	/	x =	
IRWS-033-09	Surfaces clean and smooth, welded joints properly grinded	/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

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SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 034 Steel Pipe Manhole, Blow-off Valve and Manhole Cover				
Major				
IRWS-034-01	Installation drawings, operating and maintenance instructions, illustrations and repair procedures submitted	/	x =	
IRWS-034-02	Pipe fittings, manholes and cover, valve and accessories installed as shown on the drawings	/	x =	
Minor				
IRWS-034-03	Anchor bolts set accurately to the grade and alignment as shown on the drawings	/	x =	
IRWS-034-04	Extraneous foreign matter removed from the pipes	/	x =	
IRWS-034-05	Conformance to the specified kind and method of painting	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____
 _____ Visit
 Date of Visit: _____

Project Type : **IRRIGATION**

Location : _____

Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		RESULTS	SCORE Result x factor	ACTION/ MONITOR
SUB-ITEM CODE	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 035 Miscellaneous Metal Works and Materials				
Major				
IRWS-035-01	Provision of block outs for installation of metal works	/	x	
			=	
IRWS-035-02	Metal works and materials installed in accordance to the details shown in the drawings (alignment, position)	/	x	
			=	
Minor				
IRWS-035-03	Block outs were grouted after installation of metal works	/	x	
			=	
		/	x	
			=	
		/	x	
			=	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____
 Visit _____
 Date of Visit: _____

Project Type : **IRRIGATION**
 Location : _____
 Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 036 Painting				
IRWS-036-01	Surface prepared according to specifications	/	x =	
IRWS-036-02	Required neutralizers, etc. applied	/	x =	
IRWS-036-03	Applied paint appropriate to the surface	/	x =	
IRWS-036-04	Specified number of coats applied	/	x =	
IRWS-036-05	Surfaces evenly painted, proper opacity	/	x =	
IRWS-036-06	No discoloration and peeling off of paint	/	x =	
IRWS-036-07	Paints conform to specification/requirements	/	x =	
IRWS-036-08	Surface are properly applied with putty/patching compound	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
 Visit _____ Location : _____
 Date of Visit: _____ Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 037 Asphalt Concrete Surfacing - Plant Mix				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
IRWS-037-01	Conformance of in-placed materials to plans & specs	/	x =	
IRWS-037-02	Monitoring/checking of temperature mix prior to placing/spreading/compaction	/	x =	
IRWS-037-03	Conformance to the temperature requirement	/	x =	
IRWS-037-04	No alligator and longitudinal cracks	/	x =	
IRWS-037-05	Conformance to the approved/specified tolerance for thickness, width, length, slope and cross section (>10% deficient)	/	x =	
IRWS-037-06	No bleeding on asphalt pavement (> 1 sq.m.)	/	x =	
IRWS-037-07	No upheaval (severe and needs R/R)	/	x =	
IRWS-037-08	No ravelling (severe and needs R/R)	/	x =	
Minor				
IRWS-037-04	No temperature cracks	/	x =	
IRWS-037-05	Conformance to the approved/specified tolerance for thickness, width, length, slope and cross section (≤10% deficient)	/	x =	
IRWS-037-06	No bleeding on asphalt pavement (≤ 1 sq.m.)	/	x =	
IRWS-037-07	No upheaval	/	x =	
IRWS-037-08	No ravelling	/	x =	
IRWS-037-09	Conformance to the required density	/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
 Visit _____ Location : _____
 Date of Visit: _____ Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 038 Pressure Relief Valve				
Major				
IRWS-038-01	Installation of valves including accessories true to lines, grades and places as indicated on the drawings	/	x =	
Minor				
IRWS-038-02	Ball mechanism inserted into a designed size of pipe and installed at intervals as shown on the drawings	/	x =	
IRWS-038-03	Special locking device provided	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

CPES CHECKLIST FOR WORKMANSHIP

Contract No.: _____ Project Type : **IRRIGATION**
 Visit _____ Location : _____
 Date of Visit: _____ Factor : _____

FACTOR: "During Construction" = 0.40; "Upon Completion" = 0.50

SUB-ITEM CODE	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	RESULTS	SCORE <small>Result x factor</small>	ACTION/ MONITOR
Item 039 Bio-Engineering for Erosion Control and Slope Stabilization				
IRWS-039-01	Conformance to the required slope, line and grade as per plans and specifications	/	x =	
IRWS-039-02	Conformance to proper methodology for surface preparation	/	x =	
IRWS-039-03	Plant, shrub, grass and tree species used to reinforce soil and stabilize slopes conforms to the approved variety/kind as per approved specifications	/	x =	
IRWS-039-04	Method of propagation/planting of plant, shrub, grass and tree species conforms to specifications	/	x =	
IRWS-039-05	Inert materials (biotextiles, biomats) used as temporary solutions for superficial lining and erosion protection during vegetation growth conforms to specifications	/	x =	
IRWS-039-06	Inert materials {geomats(with fibers, continuous fibers, grids), geocells, gabions, reno mattresses, hexagonal IRWSe mesh} used for erosion protection caused by impact of raindrops and rills or the flood action of rivers and channels conforms to specifications	/	x =	
IRWS-039-07	Inert materials {gabions, geogrids (extruded, woven, bonded), hexagonal IRWSe mesh, geotextiles (woven, nonwoven)} used for soil reinforcement/soil retaining conforms to specifications	/	x =	
IRWS-039-08	Inert materials {gabions, geomats (continuous fibers, grids), geotextiles (woven, nonwoven)} used for drainage conforms to specifications	/	x =	
IRWS-039-09	Inert materials (double twist IRWSe mesh) used for rockfall protection conforms to specifications	/	x =	
		/	x =	
		/	x =	
			Total Score (a)	Total CAR
Was subcontractor used? If yes, name of company and owner _____ and _____			No. of Indicators (b)	
Entered by: _____ Date: _____			(a)/(b)=	

A N N E X 2-E

CHECKLIST FOR FLOOD CONTROL

Item 1700	Clearing and Grubbing	2E-1
Item 1701	Channel Excavation	2E-1
Item 1702	Structure Excavation	2E-1
Item 1703	Dredging	2E-2
Item 1704	Embankment	2E-2
Item 1707	Aggregate Sub-base Course	2E-3
Item 1708	Aggregate Base Course	2E-3
Item 1709	Crushed Aggregate Base Course	2E-3
Item 1710	Riprap/Grouted Riprap	2E-4
Item 1711	Stone Masonry	2E-4
Item 1713	Rubble Concrete/Sand or Stone Masonry	2E-4
Item 1712	Concrete Slope Protection	2E-5
Item 1714	Gabions and Mattresses	2E-6
Item 1715	Filter Fabric	2E-6
Item 1716	Piling Works (Timber)	2E-7
Item 1716	Piling Works (Steel)	2E-8
Item 1716	Piling Works (Concrete)	2E-9
Item 1717	Sheet Piles (Concrete)	2E-10
Item 1717	Sheet Piles (Steel)	2E-11
Item 1717	Sheet Piles (Timber)	2E-12
Item 1718	Pipe Culvert and Storm Drain	2E-13
Item 1720	Manholes, Inlets, Catch Basins	2E-14
Item 1723	Formworks	2E-15
Item 1724	Reinforcing Steel Bars	2E-15
Item 1725	Concrete Works	2E-16
Item 1726	Electrical Works	2E-17
Item 1727	Generator Set	2E-18
Item 1728	Sodding	2E-19
Item 1729	Bio-Engineering for Erosion Control & Stabilization	2E-20

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Flood Control
 LOCATION: _____

ITEM: Earthworks
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 1700 Clearing and Grubbing				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
FCWS-1700-01	Proper removal of undisputed stumps roots and non-perishable solid objects/structures, vegetation, debris, tree and other obstructions	/	_____X_____ =	
Minor				
FCWS-1700-01	Proper removal of undisputed stumps roots and non-perishable solid objects/structures, vegetation, debris, tree and other obstructions	/	_____X_____ =	
FCWS-1700-02	Conformance to proper disposal	/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
Item 1701 Channel Excavation, 1702 Structure Excavation				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
FCWS-170_-01	Conformance with approved/specified tolerance for lines, grades, cross-section, elevation and dimension (if no longer correctible)	/	_____X_____ =	
		/	_____X_____ =	
Minor				
FCWS-170_-01	Conformance with approved/specified tolerance for lines, grades, cross-section, elevation and dimension (correctible)	/	_____X_____ =	
FCWS-170_-02	Adherence to proper construction methodology	/	_____X_____ =	
FCWS-170_-03	Conformance to proper disposal	/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Flood Control
 LOCATION: _____

ITEM: Earthworks
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 1703 Dredging				
FCWS-1703-01	Unsuitable soil layers removed from river beds, bottom of creeks, and other bodies of water	/	_____ x _____ =	
FCWS-1703-02	Removed unsuitable soil layers properly disposed	/	_____ x _____ =	
FCWS-1703-03	Adherence to proper dredging methodology	/	_____ x _____ =	
FCWS-1703-04	Conformance with specified silt screens or isolation materials for prevention against the diffusing of contaminated toxic materials during dredging.	/	_____ x _____ =	
FCWS-1703-05	Conformance with approved/specified lines, grades/depth, volume and containment/sealing of disposed dredged materials	/	_____ x _____ =	
		/	_____ x _____ =	
Item 1704 Embankment				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
FCWS-1704-01	Adherence to proper construction methodology (if no longer correctible)	/	_____ x _____ =	
FCWS-1704-02	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions (if no longer correctible, e.g., with in-placed structure)	/	_____ x _____ =	
FCWS-1704-03	Adherence to compaction procedure and required equipment (if no longer correctible)	/	_____ x _____ =	
Minor				
FCWS-1704-01	Adherence to proper construction methodology	/	_____ x _____ =	
FCWS-1704-02	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions (correctible)	/	_____ x _____ =	
FCWS-1704-03	Adherence to compaction procedure and required equipment (correctible)	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

ITEM: Earthworks
DATE OF VISIT: / /

INDICATORS				
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).	Results	Score _____ x factor	Action Monitor
Item 1707 Aggregate Sub-base Course, 1708 Aggregate Base Course, 1709 Crushed Aggregate Base Course				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
FCWS 170_-01	Conformance of in-placed materials to plans and specifications	/	= _____ x _____	
FCWS 170_-02	Conformance with approved/specified tolerances on lines, grades, cross-section, thickness, elevation, dimensions and plans (if no longer correctible, e.g., not extended to shoulder and other succeeding items are already in-placed)	/	= _____ x _____	
		/	= _____ x _____	
Minor				
FCWS 170_-01	Conformance of in-placed materials to plans and specifications	/	= _____ x _____	
FCWS 170_-02	Conformance w/ approved/specified tolerances on lines, grades, cross-section, thickness, elevation, dimensions & plans (correctible)	/	= _____ x _____	
FCWS 170_-03	Conformance to required layering	/	= _____ x _____	
FCWS 170_-04	Conformance to the required compaction	/	= _____ x _____	
FCWS 170_-05	Sub-base/Base extended to shoulders	/	= _____ x _____	
FCWS 170_-06	Non-occurrence of sub-base/base settlement/upheaval	/	= _____ x _____	
FCWS 170_-07	Provision of required stakes	/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
		/	= _____ x _____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) = _____	CAR Total
Entered by: _____ Date: / /			No. of Indicators (b) = _____	
			Rate = (a) / (b) = _____	
			Rate = _____	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Flood Control
 LOCATION: _____

ITEM: Bank & Slope Protection
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 1710 Riprap/Grouted Riprap, 1711 Stone Masonry, 1713 Rubble Concrete/Sand Masonry				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
FCWS-171_-01	No through cracks	/	_____X_____	
		/	= _____X_____	
FCWS-171_-02	Conformance to specifications (size, type, weight, etc. of boulders)	/	_____X_____	
		/	= _____X_____	
FCWS-171_-03	Conformance to the approved/required tolerances for slope and thickness	/	_____X_____	
		/	= _____X_____	
FCWS-171_-04	Observance to proper placing of stones/boulders	/	_____X_____	
		/	= _____X_____	
FCWS-171_-05	Sufficient grout/mortar	/	_____X_____	
		/	= _____X_____	
		/	= _____X_____	
Minor				
FCWS-171_-01	No cracks	/	_____X_____	
		/	= _____X_____	
FCWS-171_-06	Adequate and proper spacing of weepholes	/	_____X_____	
		/	= _____X_____	
FCWS-171_-07	Conformance with the approved tolerances for lines, grades, cross-sections, and elevations	/	_____X_____	
		/	= _____X_____	
FCWS-171_-08	Compliance to design mix of mortar	/	_____X_____	
		/	= _____X_____	
		/	= _____X_____	
		/	= _____X_____	
		/	= _____X_____	
		/	= _____X_____	
		/	= _____X_____	
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		/	= _____X_____	
		/	= _____X_____	
		/	= _____X_____	
		/	= _____X_____	
		/	= _____X_____	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
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CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: Flood Control
LOCATION:

ITEM: Bank & Slope Protection
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

[illegible]

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Flood Control
 LOCATION: _____

ITEM: Bank & Slope Protection
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 1714 Gabions and Mattresses				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
FCWS-1714-01	Conformance to the required/approved tolerance for lines, grades, dimensions and arrangements as shown on the plans and designated location (>10%)	/	_____ x _____ = _____	
FCWS-1714-02	Conformance to specifications (size, type, weight, etc. of boulders)	/	_____ x _____ = _____	
Minor				
FCWS-1714-01	Conformance to the required/approved tolerance for lines, grades, dimensions and arrangements as shown on the plans and designated location (≤10%)	/	_____ x _____ = _____	
FCWS-1714-03	Conformance to the required wire mesh cage fabrication requirement	/	_____ x _____ = _____	
FCWS-1714-04	No misalignment, bulging	/	_____ x _____ = _____	
FCWS-1714-05	Conformance to the required lapping requirement	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Item 1715 Filter Fabric				
FCWS-1715-01	Conformance to the elevation and extent of application as shown on the plan	/	_____ x _____ = _____	
FCWS-1715-02	Conformance to the required installation procedure, e.g. lapping requirements, etc.	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: Flood Control
LOCATION:

ITEM: Bank & Slope Protection
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

[illegible]

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Flood Control
 LOCATION: _____

ITEM: Bank & Slope Protection
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 1716-2 Steel Piles				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
FCWS-1716-2-01	Conformance of in-placed materials to plans and specifications	/	_____ x _____ =	
FCWS-1716-2-02	Conformance to construction methodology (installation, location and type)	/	_____ x _____ =	
FCWS-1716-2-03	Conformance to splicing requirements	/	_____ x _____ =	
FCWS-1716-2-04	Conformance to the required length, width, thickness, and/or diameter	/	_____ x _____ =	
FCWS-1716-2-05	Piles provided with gradation marks (driven)	/	_____ x _____ =	
FCWS-1716-2-06	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (>20 mm / m), elevation, location (>150 mm) & spacing	/	_____ x _____ =	
Minor				
FCWS-1716-2-05	Piles provided with gradation marks (stockpile)	/	_____ x _____ =	
FCWS-1716-2-06	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (≤20 mm / m), elevation, location (≤150 mm) & spacing	/	_____ x _____ =	
FCWS-1716-2-07	No corrosions on steel piles	/	_____ x _____ =	
FCWS-1716-2-08	No deformation on steel piles	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
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		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Flood Control
 LOCATION: _____

ITEM: Bank & Slope Protection
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 1716-3 Concrete Piles (see Common Items of Work for checklist for formworks, concrete works & RSB)				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
FCWS-1716-3-01	Conformance of in-placed materials to plans and specifications	/	_____ x _____ =	
FCWS-1716-3-02	Conformance to construction methodology (installation, location and type)	/	_____ x _____ =	
FCWS-1716-3-03	Conformance to splicing requirements	/	_____ x _____ =	
FCWS-1716-3-04	Conformance to the required length, width, thickness, and/or diameter	/	_____ x _____ =	
FCWS-1716-3-05	Provision of pile shoe	/	_____ x _____ =	
FCWS-1716-3-06	No through cracks	/	_____ x _____ =	
FCWS-1716-3-07	No honeycomb (exposed rebars/aggregates)			
FCWS-1716-3-08	Piles provided with gradation marks (driven)	/	_____ x _____ =	
FCWS-1716-3-09	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (>20 mm / m), elevation, location (>150 mm) & spacing	/	_____ x _____ =	
Minor				
FCWS-1716-3-06	No cracks	/	_____ x _____ =	
FCWS-1716-3-07	No honeycomb	/	_____ x _____ =	
FCWS-17163--08	Piles provided with gradation marks (stockpile)	/	_____ x _____ =	
FCWS-1716-3-09	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (≤20 mm / m), elevation, location (≤150 mm), spacing & champering	/	_____ x _____ =	
FCWS-1716-3-10	Conformance to specified curing on casted RC piles	/	_____ x _____ =	
FCWS-1716-3-11	Conformance to casting length	/	_____ x _____ =	
FCWS-1716-3-12	Conformance to required lifting procedure	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Flood Control
 LOCATION: _____

ITEM: Bank & Slope Protection
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 1717 Sheet Piles				
1717-1 Concrete Sheet Pile				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
FCWS-1717-1-01	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (>20 mm / m), elevation, location (>150 mm) & spacing	/	_____ x _____ =	
FCWS-1717-1-02	Piles provided with gradation marks (driven)	/	_____ x _____ =	
FCWS-1717-1-03	Conformance to the required quality of concrete mix	/	_____ x _____ =	
FCWS-1717-1-04	No cracks	/	_____ x _____ =	
FCWS-1717-1-05	Conformance to the approved/required tolerances for length, width, thickness, and/or diameter	/	_____ x _____ =	
Minor				
FCWS-1717-1-01	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (≤20 mm / m), elevation, location (≤150 mm) & spacing	/	_____ x _____ =	
FCWS-1717-1-02	Piles provided with gradation marks (stockpile)	/	_____ x _____ =	
FCWS-1717-1-06	Conformance to the required casting length	/	_____ x _____ =	
FCWS-1717-1-07	Provision of pile shoe	/	_____ x _____ =	
FCWS-1717-1-08	Compliance to required curing of casted sheet piles	/	_____ x _____ =	
FCWS-1717-1-09	Compliance to required splicing	/	_____ x _____ =	
FCWS-1717-1-10	No honeycomb, stone pockets and bulging	/	_____ x _____ =	
FCWS-1717-1-11	Conformance to the required centerline and cut-off elevation	/	_____ x _____ =	
FCWS-1717-1-12	Attainment of required number of piles	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Flood Control
 LOCATION: _____

ITEM: Bank & Slope Protection
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 1717-2 Steel Sheet Pile				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
FCWS-1717-2-01	Conformance of in-placed materials to plans & specifications	/	_____ x _____ =	
FCWS-1717-2-02	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (>20 mm / m), elevation, location (>150 mm) & spacing	/	_____ x _____ =	
FCWS-1717-2-03	Piles provided with gradation marks (driven)			
FCWS-1717-2-04	Conformance to the approved/required tolerances for length, width, thickness, and/or diameter	/	_____ x _____ =	
Minor				
FCWS-1717-2-02	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (≤20 mm / m), elevation, location (≤150 mm) & spacing	/	_____ x _____ =	
FCWS-1717-2-03	Piles provided with gradation marks (stockpile)	/	_____ x _____ =	
FCWS-1717-2-05	Compliance to the required splicing	/	_____ x _____ =	
FCWS-1717-2-06	No corrosion on steel sheet piles	/	_____ x _____ =	
FCWS-1717-2-07	Non-use of deformed steel bars	/	_____ x _____ =	
FCWS-1717-2-08	Attainment of required number of piles	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
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		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Flood Control
 LOCATION: _____

ITEM: Bank & Slope Protection
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 1717-3 Timber Sheet Pile				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
FCWS-1717-3-01	Conformance of in-placed materials to plans and specifications	/	_____ x _____ =	
FCWS-1717-3-02	Conformance to construction methodology (installation, location and type)	/	_____ x _____ =	
FCWS-1717-3-03	Conformance to splicing requirements	/	_____ x _____ =	
FCWS-1717-3-04	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (>20 mm / m), elevation, location (>150 mm) & spacing	/	_____ x _____ =	
FCWS-1717-3-05	Piles provided with gradation marks (driven)	/	_____ x _____ =	
FCWS-1717-3-06	Conformance to approved/specified tolerances for length, width, thickness and/or diameter	/	_____ x _____ =	
Minor				
FCWS-1717-3-04	Conformance to proper installation, e.g. conformance to required slope, embedment, alignment, plumbness (≤20 mm / m), elevation, location (≤150 mm) & spacing	/	_____ x _____ =	
FCWS-1717-3-05	Piles provided with gradation marks (stockpile)	/	_____ x _____ =	
FCWS-1717-3-07	No worm holes, decays, warps, ring, segregation, splits, and loose knots	/	_____ x _____ =	
FCWS-1717-3-08	Non-splintering/brooming of timber pile end beyond specified allowance	/	_____ x _____ =	
FCWS-1717-3-09	No cracks	/	_____ x _____ =	
FCWS-1717-3-10	Provision of pile cap	/	_____ x _____ =	
FCWS-1717-3-11	Attainment of required number of piles	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Flood Control
 LOCATION: _____

ITEM: Drainage Works
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 1718 Pipe Culvert and Storm Drain				
Major				
FCWS-1718-01	Conformance to the required/approved tolerance for slope, alignment, elevation and dimensions	/	_____ x _____ = _____	
Minor				
FCWS-1718-02	No cracks, honeycomb, chipping of edges	/	_____ x _____ = _____	
FCWS-1718-03	Compliance to joint mortar mixing proportions	/	_____ x _____ = _____	
FCWS-1718-04	Sufficient collaring and flushing	/	_____ x _____ = _____	
FCWS-1718-05	Compliance to the required thickness, compaction & materials requirement of gravel bedding	/	_____ x _____ = _____	
FCWS-1718-06	Compliance to the required thickness and compaction of backfill	/	_____ x _____ = _____	
FCWS-1718-07	Conformance to trenching requirements	/	_____ x _____ = _____	
FCWS-1718-08	Free from debris, siltation, etc.	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a) =	CAR Total
No. of Indicators (b) =	
Rate = (a) / (b) =	
Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: Flood Control
LOCATION:

ITEM: Drainage Works
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS				
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).	Results	Score _____ x factor	Action Monitor
Item 1720 Manholes, Inlets and Catch Basins				
Major				
FCWS-1720-01	Conformance to connection requirements between pipes and inlet wall	/	= _____x_____	
FCWS-1720-02	Conformance to approved/specified tolerance for dimensions and elevations	/	= _____x_____	
Minor				
FCWS-1720-03	No damage on manhole, inlets and catch basins	/	= _____x_____	
FCWS-1720-04	No cracks	/	= _____x_____	
FCWS-1720-05	No honeycomb	/	= _____x_____	
FCWS-1720-06	Free from debris, siltation, etc.	/	= _____x_____	
FCWS-1720-07	Covers and gratings are well fitted and can easily be opened during maintenance work	/	= _____x_____	
		/	= _____x_____	
		/	= _____x_____	
		/	= _____x_____	
		/	= _____x_____	
		/	= _____x_____	
		/	= _____x_____	
		/	= _____x_____	
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		/	= _____x_____	
		/	= _____x_____	
		/	= _____x_____	
		/	= _____x_____	
		/	= _____x_____	
			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

Was subcontractor used? If yes, name of company and owner:
_____ & _____

Entered by:_____Date: / /

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Flood Control
 LOCATION: _____

ITEM: Common Items of Work
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 1723 Formworks				
FCWS-1723-01	Conformance to the required type of formworks in accordance with approved shop/working drawings	/	_____ x _____ =	
FCWS-1723-02	Forms coated with mould oil as required	/	_____ x _____ =	
FCWS-1723-03	Sufficient bracing/support provided	/	_____ x _____ =	
FCWS-1723-04	No loose knots, splits, cracks, etc.	/	_____ x _____ =	
FCWS-1723-05	Provision of required concrete or steel spacers	/	_____ x _____ =	
FCWS-1723-06	Conformance to dimensions, location, plumbness and alignment	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 1724 Reinforcing Steel Bars (including tendons for Pre/Post-Stressed concrete)				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
FCWS-1724-01	Conformance of in-placed materials to plans & specifications	/	_____ x _____ =	
FCWS-1724-02	Non-appearance of corrosion on steel reinforcement	/	_____ x _____ =	
Minor				
FCWS-1724-02	Non-appearance of rust on steel reinforcement	/	_____ x _____ =	
FCWS-1724-03	Conformance to approved bar cutting schedule, proper spacing, anchorage, adequate reinforcements	/	_____ x _____ =	
FCWS-1724-04	No sign of oil, paint and other deleterious materials on reinforcements	/	_____ x _____ =	
FCWS-1724-05	Conformance to jointing requirements, i.e. splicing, welding, etc.	/	_____ x _____ =	
FCWS-1724-06	Conformance to the required installation of ducttube (e.g. spacing, location and distance)	/	_____ x _____ =	
FCWS-1724-07	Conformance to the required steel plate and lock	/	_____ x _____ =	
FCWS-1724-08	Conformance to the number of bundles of tendons and number of pieces of bundles of tendons	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT _____

PROJECT TYPE: Flood Control
LOCATION: _____

ITEM: Common Items of Work
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 1725 Concrete Works				
Major	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
FCWS-1725-01	No through of cracks	/	_____ X _____ =	
FCWS-1725-02	No honeycomb or spalling (no exposed rebars/aggregates)	/	_____ X _____ =	
FCWS-1725-03	No sagging or bulging	/	_____ X _____ =	
FCWS-1725-04	Conformance to the required quality of concrete mix	/	_____ X _____ =	
Minor				
FCWS-1725-01	No cracks	/	_____ X _____ =	
FCWS-1725-02	No honeycomb or spalling	/	_____ X _____ =	
FCWS-1725-03	No sagging or bulging	/	_____ X _____ =	
FCWS-1725-05	No chipping off of concrete cover	/	_____ X _____ =	
FCWS-1725-06	Proper and adequate vibration	/	_____ X _____ =	
FCWS-1725-07	Conformance to finishing/plastering requirement	/	_____ X _____ =	
FCWS-1725-08	Conformance to the required concrete cover for rebars	/	_____ X _____ =	
FCWS-1725-09	Conformance to the batching, mixing, transporting and discharge time requirements	/	_____ X _____ =	
FCWS-1725-10	Conformance to placing requirement that will not result segregation of aggregates, cold joints and misalignment	/	_____ X _____ =	
FCWS-1725-11	Conformance to the jointing requirement	/	_____ X _____ =	
FCWS-1725-12	Proper curing	/	_____ X _____ =	
FCWS-1725-13	Conformance to required dimensions, lines, grades/elevation locations and crown (for pier)	/	_____ X _____ =	
FCWS-1725-14	No water ponding on bearing plates	/	_____ X _____ =	
FCWS-1725-15	Conformance to elevation of expansion joints	/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
		/	_____ X _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Flood Control
 LOCATION: _____

ITEM: Miscellaneous Works
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 1726 Electrical Works				
FCWS-1726-01	Pipes installed according to plans and laid out according to approved construction drawings	/	_____ x _____ =	
FCWS-1726-02	Pipes, hangers, boxes, gutters, cable trays properly installed and painted, sharp edges of pipes removed	/	_____ x _____ =	
FCWS-1726-03	Pipes properly bended	/	_____ x _____ =	
FCWS-1726-04	Allowable number of wires in a pipe properly observed	/	_____ x _____ =	
FCWS-1726-05	Splicing and connection provided with adequate rubber and pvc tapes	/	_____ x _____ =	
FCWS-1726-06	Adequate length of wire provided for termination and splicing	/	_____ x _____ =	
FCWS-1726-07	Wire color coding complied and observed	/	_____ x _____ =	
FCWS-1726-08	Wire insulation not damaged during pulling	/	_____ x _____ =	
FCWS-1726-09	Adequate number, correct size and gauge of pull boxes installed and properly covered	/	_____ x _____ =	
FCWS-1726-10	Boxes and enclosures provided according to intended purpose	/	_____ x _____ =	
FCWS-1726-11	Fittings and accessories provided and properly installed	/	_____ x _____ =	
FCWS-1726-12	Block-outs and sleeves provided and properly secured	/	_____ x _____ =	
FCWS-1726-13	Cable ties provided	/	_____ x _____ =	
FCWS-1726-14	Blank covers provided for outlets and switches that are not utilized	/	_____ x _____ =	
FCWS-1726-15	Use of tools and equipment properly observed	/	_____ x _____ =	
FCWS-1726-16	Lighting fixtures, panel boards, circuit breakers, etc. properly installed and free from any form of damages	/	_____ x _____ =	
FCWS-1726-17	Meager, clamp, phase sequence tests and load test conducted	/	_____ x _____ =	
FCWS-1726-18	Shop drawings, as-built plan maintained	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
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No. of Indicators (b)	
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Rate = (a) / (b)	
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Rate	
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CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: Flood Control
LOCATION:

ITEM: Miscellaneous Works
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

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CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Flood Control
 LOCATION: _____

ITEM: Miscellaneous Works
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 1728 Sodding				
FCWS-1728-01	Conformance to appropriate type, thickness and density of soil	/	_____ x _____ =	
FCWS-1728-02	Conformance to approved slope	/	_____ x _____ =	
FCWS-1728-03	Conformance to the required type of grass/planting materials	/	_____ x _____ =	
FCWS-1728-04	Healthy, dense, well rooted	/	_____ x _____ =	
FCWS-1728-05	Free from weeds or undesirable grasses	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
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			Total Score (a)	CAR Total
			No. of Indicators (b)	
Entered by: _____		Date: / /	Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: Flood Control
LOCATION:

ITEM: Bio-Engineering
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS				
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).	Results	Score _____ x factor	Action Monitor
Item 1729 Bio-Engineering for Erosion Control and Slope Stabilization				
FCWS-1729-01	Conformance to the required slope, line and grade as per plans and specifications	/	_____ x _____ =	
FCWS-1729-02	Conformance to proper methodology for surface preparation	/	_____ x _____ =	
FCWS-1729-03	Plant, shrub, grass and tree species used to reinforce soil and stabilize slopes conforms to the approved variety/kind as per approved specifications	/	_____ x _____ =	
FCWS-1729-04	Method of propagation/planting of plant, shrub, grass and tree species conforms to specifications	/	_____ x _____ =	
FCWS-1729-05	Inert materials (biotextiles, biomats) used as temporary solutions for superficial lining and erosion protection during the vegetation growth conforms to specifications	/	_____ x _____ =	
FCWS-1729-06	Inert materials {geomats (with fibers, continuous fibers, grids), geocells, gabions, reno mattresses, hexagonal wire mesh} used for erosion protection caused by impact of raindrops and rills or the flood action of rivers and channels conforms to specifications	/	_____ x _____ =	
FCWS-1729-07	Inert materials {gabions, georids (extruded, woven, bonded), hexagonal wire mesh, geotextiles (woven, nonwoven)} used for soil reinforcement/soil retaining conforms to specifications	/	_____ x _____ =	
FCWS-1729-08	Inert materials {gabions, geomats (continuous fibers, grids), geotextiles (woven, nonwoven)} used for drainage conforms to specifications	/	_____ x _____ =	
FCWS-1729-09	Inert materials (double twist wire mesh) used for rockfall protection conforms to specifications	/	_____ x _____ =	
FCWS-1729-10	Inert materials installed according to plans and specifications (e.g., size, extent, procedure, lapping, alignment, etc.)	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____ Date: / /			No. of Indicators (b)	
			Rate = (a) / (b)	
			Rate	

ANNEX 2-F

CHECKLIST FOR POWER TRANSMISSION LINE

Clearing

Item 100	ROW Clearing	2F-1
Item 101	Slope Cutting	2F-1

Foundation

Item 200	Excavation	2F-2
Item 201	Stubs Setting	2F-2
Item 202	Anchor Bolts Setting	2F-2
Item 203	Backfilling	2F-3
Item 204	Grounding System	2F-3
Item 205	Formworks	2F-4
Item 206	Reinforcing Steel Bars	2F-4
Item 207	Concrete	2F-5

Slope Protection

Item 300	Riprap	2F-6
Item 301	Grouted Riprap	2F-6
Item 302	Rockwall	2F-6
Item 303	Gabions	2F-7
Item 304	Fill	2F-7
Item 305	Sodding	2F-7
Item 306	Sprigging	2F-7

Erection

Item 400	Latticed Structure (Tower)	2F-8
Item 401	Steel Poles	2F-9
Item 402	Wood Poles	2F-9
Item 403	Concrete Poles	2F-9
Item 404	Guy	2F-9

Dressing

Item 500	Installation of Insulator String Assembly and Ground Wire Set	2F-10
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Stringing

Item 600	Pay-out of OHGW/ACSR	2F-11
Item 601	Final Sag of Conductors and Overhead Ground Wire	2F-11
Item 602	Installation of Tension Clamps & Hardware	2F-11
Item 603	Installation of Suspension Clamps & Hardware	2F-11
Item 604	Installation of Jumper Wires	2F-12
Item 605	Installation of Vibration Dampers	2F-12
Item 606	Installation of Conductor Spacer	2F-12
Item 607	Installation of Joint Box and Other Accessories for OPGW	2F-12
Item 608	Splicing of OPGW	2F-13
Item 609	Splicing of ACSR	2F-13
Item 610	Splicing of OHGW	2F-13
Item 611	Other Accessories	2F-13

Submarine Cable

Item 700	Trenching Works (Onshore)	2F-14
Item 701	Submarine Cable Laying	2F-14
Item 702	Installation of Accessories	2F-14
Item 703	Backfilling Works (Going to CTS)	2F-14

Underground Cable

Item 800	Trenching Works (Offshore)	2F-15
Item 801	Grounding Hole	2F-15
Item 802	Underground Cable Laying	2F-15
Item 803	Terminating Cable	2F-16
Item 804	Splice Joint	2F-16
Item 805	Splicing of Cable	2F-16

Pre-Commissioning

Item 900	Pre-Commissioning	2F-17
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CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Transmission Line
 LOCATION: _____

ITEM: Clearing
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score ____x factor	Action / Monitor
Item 100 ROW Clearing				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
TRLWS-100-01	Survey area is clearly staked to the required ROW width	/	____x____ =	
Minor				
TRLWS-100-02	Proper removal of undisputed stumps roots and non-perishable solid objects/structures, vegetation, debris, trees and other obstruction.	/	____x____ =	
TRLWS-100-03	Conformance to proper disposal	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 101 Slope Cutting				
Minor				
TRLWS-101-01	Conformance to the approved / specified clearance	/	____x____ =	
TRLWS-101-02	Proper disposal of cut materials	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: ____ / ____ / ____			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Transmission Line
 LOCATION: _____

ITEM: Foundation
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 200 Excavation				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
TRLWS-200-01	Conformance to the approved foundation plans for lines, grades, dimensions, elevations.	/	____x____ =	
TRLWS-200-02	Adherence to proper construction methodology.	/	____x____ =	
Minor				
TRLWS-200-02	Adherence to proper construction methodology.	/	____x____ =	
TRLWS-200-03	Conformance to the excavation support system. (i.e. shoring, bracing, sheet piling)	/	____x____ =	
TRLWS-200-04	Proper disposal of excavated materials.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 201 Stubs Setting / 202 Anchor Bolts Setting				
Major*				
TRLWS-20_-01	Conformance to the setting dimensions in accordance to plans and specifications.	/	____x____ =	
TRLWS-20_-02	Conformance to the required template setting.	/	____x____ =	
TRLWS-20_-03	Stub/Anchor bolt and template fixed with support.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: <u> </u> / <u> </u> / <u> </u>		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Transmission Line
 LOCATION: _____

ITEM: Foundation
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score x factor	Action / Monitor
Item 203 Backfilling				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
TRLWS-203-01	Conformance of in-placed materials to plans and specifications.	/	____x____ =	
TRLWS-203-02	Conformance to the required density or degree of compaction	/	____x____ =	
Minor				
TRLWS-203-03	Conformance to the required elevation of fill or backfill	/	____x____ =	
TRLWS-203-04	Conformance to ground level restoration	/	____x____ =	
TRLWS-203-05	Provision of rain water outlet.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 204 Grounding System				
Minor				
TRLWS-204-01	Conformance to the required grounding resistance.	/	____x____ =	
TRLWS-204-02	Proper installation of grounding / counterpoise.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____				Total Score (a) =
Entered by: _____				No. of Indicators (b) =
Date: <u> </u> / <u> </u> / <u> </u>				Rate = (a) / (b) =
				Rate =

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: Transmission Line
LOCATION/LOT: _____

ITEM: Foundation
DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____ x factor	Action / Monitor
Item 205 Formworks				
Minor				
TRLWS-205-01	Conformance to the required type of formworks in accordance with approved shop/working drawings.	/	____ x ____ =	
TRLWS-205-02	Forms coated with mould oil as required.	/	____ x ____ =	
TRLWS-205-03	Sufficient bracing / support.	/	____ x ____ =	
TRLWS-205-04	No loose knots, splits, cracks, etc.	/	____ x ____ =	
TRLWS-205-05	Provision of required concrete or steel spacer.	/	____ x ____ =	
TRLWS-205-06	Conformance to specified tolerances for dimensions, locations, plumbness and alignment.	/	____ x ____ =	
TRLWS-205-07	No use of dilapidated/salvage forms (use more than 3x)	/	____ x ____ =	
		/	____ x ____ =	
Item 206 Reinforcing Steel Bars (including tendons for Pre/Post-Stressed Concrete)				
Major*	<small>* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects</small>			
TRLWS-206-01	Conformance of in-placed materials to plans and specifications.	/	____ x ____ =	
TRLWS-206-02	Non-appearance of corrosion on steel reinforcement.	/	____ x ____ =	
Minor				
TRLWS-206-02	Non-appearance of rust on steel reinforcement.	/	____ x ____ =	
TRLWS-206-03	Conformance to approved bar cutting schedule, proper spacing, anchorage and adequate reinforcements.	/	____ x ____ =	
TRLWS-206-04	No sign of oil, paint and other deleterious materials on reinforcements.	/	____ x ____ =	
TRLWS-206-05	Conformance to jointing requirement, i.e. splicing, welding, etc.	/	____ x ____ =	
TRLWS-206-06	Conformance to proper bending of stirrups	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____ Date: ____ / ____ / ____			No. of Indicators (b) =	
			Rate= (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Transmission Line
 LOCATION/LOT: _____

ITEM: Foundation
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score ____x factor	Action / Monitor
Item 207 Concrete				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
TRLWS-207-01	No through cracks.	/	____X____ =	
TRLWS-207-02	No honeycomb (exposed rebars/aggregates).	/	____X____ =	
TRLWS-207-03	No sagging or bulging.	/	____X____ =	
TRLWS-207-04	Conformance to required quality of concrete mix	/	____X____ =	
TRLWS-207-05	Conformance to the required concrete cover for rebars.	/	____X____ =	
TRLWS-207-06	Conformance to the jointing requirement.	/	____X____ =	
TRLWS-207-07	Conformance to placing requirement that will not result segregation of aggregates, cold joints and misalignment.	/	____X____ =	
Minor				
TRLWS-207-01	No cracks.	/	____X____ =	
TRLWS-207-02	No honeycomb.	/	____X____ =	
TRLWS-207-03	No sagging or bulging.	/	____X____ =	
TRLWS-207-05	Conformance to the required concrete cover for rebars.	/	____X____ =	
TRLWS-207-06	Conformance to the jointing requirement.	/	____X____ =	
TRLWS-207-07	Conformance to placing requirement that will not result segregation of aggregates, cold joints and misalignment.	/	____X____ =	
TRLWS-207-08	Proper and adequate vibration.	/	____X____ =	
TRLWS-207-09	Conformance to finishing/plastering requirement.	/	____X____ =	
TRLWS-207-10	No chipping off of concrete cover.	/	____X____ =	
TRLWS-207-11	Conformance to the batching, mixing, transporting and discharge time requirements.	/	____X____ =	
TRLWS-207-12	Proper curing.	/	____X____ =	
TRLWS-207-13	Conformance to required dimensions, lines. grades/ elevation, location.	/	____X____ =	
		/	____X____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: ____ / ____ / ____

Total Score (a) =	CAR Total
No. of Indicators (b) =	
Rate= (a) / (b) =	
Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Transmission Line
 LOCATION: _____

ITEM: Slope Protection
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score x factor	Action / Monitor
Item 300 Riprap / 301 Grouted Riprap				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
TRLWS-30_-01	Conformance to plans and specifications (size, type, weight, etc. of boulders.)	/	____X____ =	
TRLWS-30_-02	Sufficient grout/mortar.	/	____X____ =	
TRLWS-30_-03	Observance to proper placing of stones/boulders.	/	____X____ =	
TRLWS-30_-04	Conformance to the approved/required tolerance for slope and thickness.	/	____X____ =	
TRLWS-30_-05	Compliance to the specified compaction and preparation of bedding.	/	____X____ =	
TRLWS-30_-06	Compliance to design mix of mortar.	/	____X____ =	
TRLWS-30_-07	No through cracks	/	____X____ =	
TRLWS-30_-08	Provision of weepholes.	/	____X____ =	
Minor				
TRLWS-30_-07	No cracks.	/	____X____ =	
TRLWS-30_-08	Adequate and proper spacing of weepholes.	/	____X____ =	
		/	____X____ =	
		/	____X____ =	
Item 302 Rockwall				
Major*				
TRLWS-302-01	Conformance to the required size of boulders.	/	____X____ =	
TRLWS-302-02	Observance to proper placement of stones/boulders.	/	____X____ =	
TRLWS-302-03	Conformance to the approved/required tolerance for length, slope and thickness.	/	____X____ =	
		/	____X____ =	
		/	____X____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: ____ / ____ / ____		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Transmission Line
 LOCATION: _____

ITEM: Slope Protection
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score x factor	Action / Monitor
Item 303 Gabions				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
TRLWS-303-01	Conformance to the required/approved tolerances for lines, grades, dimensions and arrangements as shown on the plans and designated locations.	/	____x____ =	
TRLWS-303-02	Observance to proper placing of stones/boulders.	/	____x____ =	
TRLWS-303-03	Conformance to specifications (size, type, weight, etc. of boulders, rocks).	/	____x____ =	
Minor				
TRLWS-303-04	No misalignment, bulging.	/	____x____ =	
TRLWS-303-05	Conformance to the required wire mesh cage fabrication requirement.	/	____x____ =	
		/	____x____ =	
Item 304 Fill				
Major*				
TRLWS-304-01	Conformance of in-placed materials to plans and specifications.	/	____x____ =	
TRLWS-304-02	Conformance to the required density or degree of compaction	/	____x____ =	
Minor				
TRLWS-304-03	Conformance to the required thickness of fill or backfill per layer.	/	____x____ =	
		/	____x____ =	
Item 305 Sodding / 306 Sprigging				
Minor				
TRLWS-30_-01	Conformance to the required scope of work.	/	____x____ =	
TRLWS-30_-02	Healthy, dense and well rooted.	/	____x____ =	
TRLWS-30_-03	Free from weeds or undesirable grasses.	/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____ Date: <u> / / </u>			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Transmission Line
 LOCATION: _____

ITEM: Erection
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score ____x factor	Action / Monitor
Item 400 Latticed Structure (Tower)				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
TRLWS-400-01	Tower parts and accessories are free from damages (i.e, structural steel works, anchor materials, bolts and nuts, washers, guy, etc.).	/	____x____ =	
TRLWS-400-02	Connectors of tower members are secured by bolts and nuts and washers.	/	____x____ =	
TRLWS-400-03	Conformance to foundation requirements (i.e, correct orientation, finished elevations, embedded items).	/	____x____ =	
TRLWS-400-04	Conformance to approved erection drawings.	/	____x____ =	
TRLWS-400-05	Tower parts completely installed.	/	____x____ =	
Minor				
TRLWS-400-01	Tower parts and accessories are free from damages (i.e, structural steel works, anchor materials, bolts and nuts, washers, guy, etc.).	/	____x____ =	
TRLWS-400-02	Connectors of tower members are secured by bolts and nuts and washers.	/	____x____ =	
TRLWS-400-06	Non-appearance of white rust on all galvanized members and accessories	/	____x____ =	
TRLWS-400-07	Bolts, nuts and washers conformed to the required number, number, sizes and strength.	/	____x____ =	
TRLWS-400-08	Galvanized bolts and nuts are assembled with finger fit pressure only and interchangeable without shakes.	/	____x____ =	
TRLWS-400-09	Conformance to bolt positions and insertion requirements.	/	____x____ =	
TRLWS-400-10	Bolts fastened with specified torque.	/	____x____ =	
TRLWS-400-11	Tower members are completely installed.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

Was subcontractor used? If yes, name of company and owner:
 _____ & _____

Entered by: _____

Date: / /

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Transmission Line
 LOCATION: _____

ITEM: Erection
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score _____x factor	Action / Monitor
Item 401 Steel Poles / 402 Woodpoles / 403 Concrete Poles				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
TRLWS-40_-01	Conformance to approved erection drawings.	/	_____x _____ =	
TRLWS-40_-02	Conformance to the required road right-of-way clearance.	/	_____x _____ =	
TRLWS-40_-03	Conformance to required pole embedment.	/	_____x _____ =	
TRLWS-40_-04	Provision of extension arms, brackets, braces, bolts, pole caps and other accessories.	/	_____x _____ =	
Minor				
TRLWS-40_-05	Conformance to required backfilling.	/	_____x _____ =	
TRLWS-40_-06	Conformance to approved staking distances.	/	_____x _____ =	
TRLWS-40_-07	Provision of pole identification and tag.	/	_____x _____ =	
TRLWS-40_-08	Provision of required anti-climbing device.	/	_____x _____ =	
		/	_____x _____ =	
Item 404 Guy				
Major*				
TRLWS-404-01	Conformance to plans and specifications.	/	_____x _____ =	
TRLWS-404-02	Conformance with the required proper anchorage.	/	_____x _____ =	
TRLWS-404-03	Proper connection of upper and lower guys.	/	_____x _____ =	
Minor				
TRLWS-404-03	Proper connection of upper and lower guys.	/	_____x _____ =	
TRLWS-404-04	Provision of guy guard.	/	_____x _____ =	
TRLWS-404-05	Conformance with the required mounting angle.	/	_____x _____ =	
TRLWS-404-06	Provision of porcelain insulator.	/	_____x _____ =	
TRLWS-404-07	Provision of winding grip/turnbuckle.	/	_____x _____ =	
		/	_____x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: <u> / / </u>			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Transmission Line
 LOCATION: _____

ITEM: Dressing
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score ____x factor	Action / Monitor
Item 500 Installation of Insulator String Assembly and Ground Wire Set				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
TRLWS-500-01	Conformance to the specified insulator string assembly and ground wire set.	/	____x ____ =	
TRLWS-500-02	Free from any form of damage.	/	____x ____ =	
Minor				
TRLWS-500-02	Free from any form of damage.	/	____x ____ =	
TRLWS-500-03	Conformance to required gap and alignment of arcing horns.	/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
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		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

Was subcontractor used? If yes, name of company and owner:
 _____ & _____

Entered by: _____ Date: ____ / ____ / ____

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: Transmission Line

ITEM: Stringing

_____ VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score ____x factor	Action / Monitor
Item 600 Pay-out of OHGW / ACSR				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
TRLWS-600-01	Proper installation of rollers.	/	____x ____ =	
TRLWS-600-02	Provision of back guys at each end of stringing section.	/	____x ____ =	
TRLWS-600-03	Proper installation of anchors on engine puller and tensioner.	/	____x ____ =	
TRLWS-600-04	Proper installation of scaffoldings on crossings.	/	____x ____ =	
TRLWS-600-05	Provision of conductor protection to avoid contact to the ground and prevent damage.	/	____x ____ =	
Item 601 Final Sag of Conductors and Overhead Ground Wire				
Major*				
TRLWS-601-01	Conformance to the required clearance between conductors and crossings (i.e. roads, railroads, existing lines, etc.).	/	____x ____ =	
TRLWS-601-02	No damaged conductors (i.e., cut strands, bird's cage, kinks, etc.).	/	____x ____ =	
TRLWS-601-03	Conformance to the required sag of conductors.	/	____x ____ =	
Minor				
TRLWS-601-03	Conformance to the required sag of conductors.	/	____x ____ =	
TRLWS-601-04	Conformance to the required location of joint / repair sleeves.	/	____x ____ =	
		/	____x ____ =	
Item 602 Installation of Tension Clamps & Hardware / 603 Suspension Clamps & Hardware				
Major*				
TRLWS-60_-01	Conformance to plans and specifications.	/	____x ____ =	
TRLWS-60_-02	Free from any form of damage.	/	____x ____ =	
Minor				
TRLWS-60_-02	Free from any form of damage.	/	____x ____ =	
TRLWS-60_-03	Proper installation and correct number of armour rods.	/	____x ____ =	
TRLWS-60_-04	Proper installation of clamps, hardware, and accessories.	/	____x ____ =	
		/	____x ____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a) =	CAR Total
No. of Indicators (b) =	
Rate = (a) / (b) =	
Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Transmission Line
 LOCATION: _____

ITEM: Stringing
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score x factor	Action / Monitor
Code	<small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>			
Item 604 Installation of Jumper Wires				
Minor				
TRLWS-604-01	Conformance to the required distance between jumper wires and cross arms.	/	____x____ =	
TRLWS-604-02	Conformance to jointing / splicing of wires.	/	____x____ =	
TRLWS-604-03	Free from any form of damage.	/	____x____ =	
		/	____x____ =	
Item 605 Vibration Dampers				
Minor				
TRLWS-605-01	Installation conforms to plans and specifications.	/	____x____ =	
TRLWS-605-02	Free from any form of damage.	/	____x____ =	
TRLWS-605-03	Bolts fastened with specified torque.	/	____x____ =	
		/	____x____ =	
Item 606 Conductor Spacers				
Minor				
TRLWS-606-01	Installation conforms to plans and specifications.	/	____x____ =	
TRLWS-606-02	Free from any form of damage.	/	____x____ =	
TRLWS-606-03	Bolts fastened with specified torque.	/	____x____ =	
		/	____x____ =	
Item 607 Joint Box and other Accessories for OPGW				
Major*	<small>* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects</small>			
TRLWS-607-01	Installation conforms to plans and specifications.	/	____x____ =	
TRLWS-607-02	Free from any form of damage.	/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____ Date: <u> </u> / <u> </u> / <u> </u>		No. of Indicators (b) =		
		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Transmission Line
 LOCATION: _____

ITEM: Stringing
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score ____x factor	Action / Monitor
Item 608 Splicing of OPGW				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
TRLWS-608-01	Conformance to plans and specifications.	/	= ____x ____	
TRLWS-608-02	Splicing done with proper equipment/tools.	/	= ____x ____	
TRLWS-608-03	Enclosure properly sealed and water tight.	/	= ____x ____	
TRLWS-608-04	Conformance with the required bonding and grounding.	/	= ____x ____	
Minor				
TRLWS-608-03	Enclosure properly sealed and water tight.	/	= ____x ____	
TRLWS-608-04	Conformance with the required bonding and grounding.	/	= ____x ____	
TRLWS-608-05	Provision of protective device.	/	= ____x ____	
		/	= ____x ____	
Item 609 Splicing of ACSR / 610 OHGW				
Major*				
TRLWS-60_01	Conformance to plans and specifications.	/	= ____x ____	
TRLWS-60_02	Splicing done with proper equipment/tools.	/	= ____x ____	
		/	= ____x ____	
Item 611 Other Accessories				
Minor				
TRLWS-611-01	Installation of step bolts / step ladder.	/	= ____x ____	
TRLWS-611-02	Installation of anti-climbing device.	/	= ____x ____	
TRLWS-611-03	Installation of warning / danger plate (i.e. conformance to the size and dimension, orientation).	/	= ____x ____	
TRLWS-611-04	Installation and correct location of patrol numbers (i.e. conformance to the size and dimension, orientation).	/	= ____x ____	
TRLWS-611-05	Installation and correct location of seclusion fence (i.e. conformance to the size and dimension).	/	= ____x ____	
		/	= ____x ____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: <u> </u> / <u> </u> / <u> </u>			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Transmission Line
 LOCATION: _____

ITEM: Submarine Cable
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score ____x factor	Action / Monitor
Item 700 Trenching Works (Onshore)				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
TRLWS-700-01	Conformance to the depth and width requirement.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 701 Submarine Cable Laying				
Major*				
TRLWS-701-01	Conformance to the required cable protection.	/	____x____ =	
TRLWS-701-02	Free from any form of damage.	/	____x____ =	
Minor				
TRLWS-701-03	Conformance to the required methodology of laying.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 702 Installation of Accessories				
Minor				
TRLWS-702-01	Installation of buoy markers (i.e. number, distances, type/kind, etc.).	/	____x____ =	
TRLWS-702-02	Installation of cable tablets (i.e. dimensions, number, distances, type/kind, etc.).	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 703 Backfilling Works (Going to CTS)				
Major*				
TRLWS-703-01	Conformance to the required density or degree of compaction.	/	____x____ =	
Minor				
TRLWS-703-02	Conformance to the required elevation of backfill.	/	____x____ =	
TRLWS-703-03	Ground level / Pavement restoration .	/	____x____ =	
		/	____x____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a) =	CAR Total
No. of Indicators (b) =	
Rate = (a) / (b) =	
Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Transmission Line
 LOCATION: _____

ITEM: Underground Cable
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 800 Trenching Works / 801 Grounding Hole				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
TRLWS-80_-01	Conformance to the required depth and width of trench.	/	____x____ =	
Minor				
TRLWS-80_-02	Provision of protective cover.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 802 Underground Cable Laying				
Major*				
TRLWS-802-01	Conformance to the required methodology.	/	____x____ =	
TRLWS-802-02	Free from any form of damage.	/	____x____ =	
Minor				
TRLWS-802-03	Conformance to the required cable protection.	/	____x____ =	
TRLWS-802-04	Provision of warning tape and concrete plate.	/	____x____ =	
TRLWS-802-05	Installation of marking post at specified distance.	/	____x____ =	
TRLWS-802-06	Provision of applicable cable spacer.	/	____x____ =	
TRLWS-802-07	Conformance to bedding and backfilling requirements.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____ Date: ____ / ____ / ____			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Transmission Line
 LOCATION: _____

ITEM: Underground Cable
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score ____ x factor	Action / Monitor
Item 803 Cable Termination				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
TRLWS-803-01	Conformance to plans and specifications.	/	____ x ____ =	
Minor				
TRLWS-803-02	Provision of grounding and bonding.	/	____ x ____ =	
TRLWS-803-03	Identification of cable pair on terminal blocks.	/	____ x ____ =	
TRLWS-803-04	Provision of cable rack hooks including bolts, plates and cable supporters.	/	____ x ____ =	
		/	____ x ____ =	
Item 804 Splice Joint				
Major*				
TRLWS-804-01	Conformance to plans and specifications.	/	____ x ____ =	
Minor				
TRLWS-804-02	Provision of grounding and bonding.	/	____ x ____ =	
		/	____ x ____ =	
Item 805 Splicing of Cable				
Major*				
TRLWS-805-01	Conformance with the required position.	/	____ x ____ =	
TRLWS-805-02	Enclosure properly sealed and water tight.	/	____ x ____ =	
TRLWS-805-03	Splicing done with proper equipment/tools.	/	____ x ____ =	
Minor				
TRLWS-805-03	Splicing done with proper equipment/tools.	/	____ x ____ =	
TRLWS-805-04	Conformance with the required bonding and grounding.	/	____ x ____ =	
TRLWS-805-05	Provision of protective device.	/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____ Date: ____ / ____ / ____			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Transmission Line
 LOCATION: _____

ITEM: Pre-Commissioning
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score ____x factor	Action / Monitor
Item 900 Pre-Commissioning				
Minor				
TRLWS-900-01	Conformance to the required line clearances.	/	____x____ =	
TRLWS-900-02	No tripping of line during testing.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
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		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: <u> </u> / <u> </u> / <u> </u>		Rate = (a) / (b) =		
		Rate =		

A N N E X 2-G

CHECKLIST FOR SUBSTATION

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CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Site Development
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____x factor	Action / Monitor
Code	<small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>			
Item 100 Boundary Establishment				
SSWS-100-01	Boundary of site/area for development accurately established.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
101 Clearing and Grubbing / 102 Removal of Structure and Obstruction				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-10_-01	Proper removal of undisputed stumps roots and non-perishable solid objects/structures, vegetation, debris, trees and other obstruction.	/	____x____ =	
Minor				
SSWS-10_-02	Conformance to proper disposal.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 103 Grading Excavation / 104 Structure Excavation				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-10_-01	Adherence to proper construction methodology.	/	____x____ =	
SSWS-10_-02	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions. (if no longer correctible, e.g., with in-placed structure).	/	____x____ =	
Minor				
SSWS-10_-01	Adherence to proper construction methodology.	/	____x____ =	
SSWS-10_-02	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions. (correctible)	/	____x____ =	
SSWS-10_-03	Conformance to proper disposal.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: <u> </u> / <u> </u> / <u> </u>			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Site Development
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____x factor	Action / Monitor
Code	<small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>			
Item 105 Embankment / 106 Subgrade Preparation				
Major*	<small>* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects</small>			
SSWS-10_-01	Adherence to proper construction methodology (if no longer correctible, e.g., layering, Item 105 not undertaken).	/	____x____ =	
SSWS-10_-02	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions. (if no longer correctible, e.g., with in-placed structure).	/	____x____ =	
SSWS-10_-03	Adherence to compaction procedure and required equipment (if no longer correctible, e.g., done in layers but do not meet required compaction and succeeding layer was laid).	/	____x____ =	
Minor				
SSWS-10_-01	Adherence to proper construction methodology.	/	____x____ =	
SSWS-10_-02	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions. (correctible)	/	____x____ =	
SSWS-10_-03	Adherence to compaction procedure and required equipment (correctible).	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 107 Grading Fill / 108 Backfill / 109 Selected Fill				
Major				
SSWS-10_-01	Conformance of in-placed materials to plans and specifications.	/	____x____ =	
SSWS-10_-02	Conformance to the required density or degree of compaction.	/	____x____ =	
Minor				
SSWS-10_-03	Conformance to the required thickness of fill or backfill per layer.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
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PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Site Development
 DATE OF VISIT: / /

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Sub-item	INDICATORS	Results	Score ____x factor	Action / Monitor
Code	<small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>			
Item 110 Aggregate Sub-Base Course / 111 Aggregate Base Course				
Major*	<small>* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects</small>			
SSWS-11_-01	Conformance of in-placed materials to plans and specifications.	/	____x____ =	
SSWS-11_-02	Adherence to proper construction methodology. (if no longer correctible, e.g., layer)	/	____x____ =	
SSWS-11_-03	Conformance w/ approved/specified tolerances on lines, grades, cross-section, thickness, elevation, dimensions & plans. (if no longer correctible, e.g., not extended to shoulder and other succeeding items are already in-placed).	/	____x____ =	
SSWS-11_-04	Conformance to the required compaction.	/	____x____ =	
Minor				
SSWS-11_-01	Conformance of in-placed materials to plans and specifications.	/	____x____ =	
SSWS-11_-02	Adherence to proper construction methodology. (correctible)	/	____x____ =	
SSWS-11_-03	Conformance w/ approved/specified tolerances on lines, grades, cross-section, thickness, elevation, dimensions & plans. (correctible)	/	____x____ =	
SSWS-11_-04	Conformance to the required compaction.	/	____x____ =	
SSWS-11_-05	Sub-base/Base extended to shoulders.	/	____x____ =	
SSWS-11_-06	Non-occurrence of subbase settlement/upheaval.	/	____x____ =	
SSWS-11_-07	Provision of required stakes.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

Was subcontractor used? If yes, name of company and owner:
 _____ & _____

Entered by: _____

Date: / /

CPES CHECKLIST FOR WORKMANSHIP

PROJ. ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION/LOT: _____

ITEM: Site Development
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____x factor	Action / Monitor
Code	<small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>			
Item 113 Pipe Culvert and Storm Drains				
Major*	<small>* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects</small>			
SSWS-113-01	Conformance to the required/approved tolerance for slope, alignment, elevation and dimensions.	/	____x____ =	
Minor				
SSWS-113-02	No cracks, honeycombs, chipping of edges.	/	____x____ =	
SSWS-113-03	Compliance to joint mortar mixing proportions.	/	____x____ =	
SSWS-113-04	Sufficient collaring and flushing.	/	____x____ =	
SSWS-113-05	Compliance to the required thickness, compaction & materials requirement of gravel bedding.	/	____x____ =	
SSWS-113-06	Compliance to the required thickness & compaction of backfill.	/	____x____ =	
SSWS-113-07	Conformance to trenching requirements.	/	____x____ =	
SSWS-113-08	Free from debris, siltation, etc.	/	____x____ =	
		/	____x____ =	
Item 114 Manholes, Inlets, and Catch Basins				
Major				
SSWS-114-01	Conformance to connection requirements between pipes & inlet wall.	/	____x____ =	
SSWS-114-02	Conformance with plans and design specifications.	/	____x____ =	
Minor				
SSWS-114-03	No damage on manhole, inlets & catch basins.	/	____x____ =	
SSWS-114-04	No cracks.	/	____x____ =	
SSWS-114-05	No honeycomb.	/	____x____ =	
SSWS-114-06	Free from debris, siltation, etc.	/	____x____ =	
SSWS-114-07	Covers and gratings are well fitted and can easily be opened during maintenance work.	/	____x____ =	
		/	____x____ =	
Was subcontractor(s) used? If yes, name of company(ies) and sub-item: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: ____ / ____ / ____			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJ. ID/NO.: _____
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PROJECT TYPE: Substation
 LOCATION/LOT: _____

ITEM: Site Development
 DATE OF VISIT: ____/____/____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score ____x factor	Action / Monitor
Item 112 Portland Cement Concrete Pavement				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-112-01	No longitudinal cracks.	/	____x____ =	
SSWS-112-02	Conformance to vibration requirement.	/	____x____ =	
SSWS-112-03	Conformance to quality of concrete mix.	/	____x____ =	
SSWS-112-04	Conformance to requirements of construction joints (outside middle thirds).	/	____x____ =	
SSWS-112-05	No through cracks (all types of cracks).	/	____x____ =	
SSWS-112-06	No scaling (severe, needs Removal and Replacement).	/	____x____ =	
SSWS-112-07	Conformance to the approved/specified tolerances for thickness, width, length, slope and cross-section. (>10% deficient)	/	____x____ =	
Minor				
SSWS-112-05	No cracks e.g. transverse, diagonal, temperature, corner, restraint.	/	____x____ =	
SSWS-112-06	No scaling.	/	____x____ =	
SSWS-112-07	Conformance to the approved/specified tolerances for thickness, width, length, slope and cross-section (≤10% deficient).	/	____x____ =	
SSWS-112-08	No honeycomb.	/	____x____ =	
SSWS-112-09	No spalling.	/	____x____ =	
SSWS-112-10	No chipped-off edges.	/	____x____ =	
SSWS-112-11	Conformance to required size, location & spacing of tie bars and dowel bars as per specifications.	/	____x____ =	
SSWS-112-12	Conformance to proper curing procedures.	/	____x____ =	
SSWS-112-13	Utilization of templates prior to pouring.	/	____x____ =	
SSWS-112-14	Conformance to placing requirement which will not result to segregation of aggregates, cold joints, misalignment.	/	____x____ =	
SSWS-112-15	Conformance to required amount of asphalt sealant on weakened plane joints. (insufficient and excessive application)	/	____x____ =	
SSWS-112-16	Conformance to requirement of pavement blockings (include depths and widths of weakened plane joints)	/	____x____ =	
SSWS-112-17	No hardened/spilled concrete on pavement.	/	____x____ =	
SSWS-112-18	No pokemarks/tire marks/animal foot marks/skid marks, etc.	/	____x____ =	
SSWS-112-19	Conformance to proper finishing of concrete (brooming)	/	____x____ =	
SSWS-112-20	Conformance to formwork requirements (wooden, defective steel and not applied with oil/grease)	/	____x____ =	
Was subcontractor(s) used? If yes, name of company(ies) and sub-item: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: ____/____/____			Rate = (a) / (b) =	
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CPES CHECKLIST FOR WORKMANSHIP

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PROJECT TYPE: Substation
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ITEM: Site Development
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____ x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 117 Topsoil / 118 Sprigging / 119 Sodding / 120 Ornament Plant/Tree Planting				
SSWS-1__-01	Conformance to appropriate type, thickness and density of soil.	/	____ x ____ =	
SSWS-1__-02	Conformance to approved slope.	/	____ x ____ =	
SSWS-1__-03	Conformance to the required type of grass/planting materials.	/	____ x ____ =	
SSWS-1__-04	Healthy, dense and well rooted.	/	____ x ____ =	
SSWS-1__-05	Free from weeds or undesirable grasses.	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
Item 121 Perimeter Fence				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-121-01	Conformance to the approved/specified tolerance for alignment, dimension, plumbness and elevation.	/	____ x ____ =	
SSWS-121-02	Conformance to required quality of CHB	/	____ x ____ =	
SSWS-121-03	Conformance to required quality of mortar mix	/	____ x ____ =	
Minor				
SSWS-121-04	Proper spacing of horizontal and vertical bars.	/	____ x ____ =	
SSWS-121-05	Rebars used free from corrosion.	/	____ x ____ =	
SSWS-121-06	Installed according to plans and specifications.	/	____ x ____ =	
SSWS-121-07	Conformance to the specified/designed depth of fence footings.	/	____ x ____ =	
SSWS-121-08	Conformance to the specified/designed length of fence per bay.	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____ Entered by: _____ Date: <u> </u> / <u> </u> / <u> </u>			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
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Sub-item	INDICATORS	Results	Score ____x factor	Action / Monitor
Code	<small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>			
Item 115 Riprap and Grouted Riprap				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-115-01	No through cracks.	/	____x____ =	
SSWS-115-02	Conformance to specifications (size, type, weight, etc. of boulders).	/	____x____ =	
SSWS-115-03	Sufficient grout/mortar.	/	____x____ =	
SSWS-115-04	Observance to proper placing of stones/boulders.	/	____x____ =	
SSWS-115-05	Conformance to the approved/required tolerance for slope and thickness.	/	____x____ =	
SSWS-115-06	Compliance to the specified compaction and preparation of bedding.	/	____x____ =	
SSWS-115-07	Compliance to design mix of mortar.	/	____x____ =	
SSWS-115-08	Provision of weepholes.	/	____x____ =	
Minor				
SSWS-115-01	No cracks.	/	____x____ =	
SSWS-115-08	Adequate and proper spacing of weepholes.	/	____x____ =	
		/	____x____ =	
Item 116 Gabion				
Major				
SSWS-116-01	Conformance to the required/approved tolerances for lines, grades, dimensions and arrangements as shown on the plans and designated locations.	/	____x____ =	
SSWS-116-02	Observance to proper placing of stones/boulders.	/	____x____ =	
SSWS-116-03	Conformance to specifications (size, type, weight, etc. of boulders, rocks).	/	____x____ =	
Minor				
SSWS-116-04	No misalignment, bulging.	/	____x____ =	
SSWS-116-05	Conformance to the required wire mesh cage fabrication requirement.	/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
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Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 122 Gate				
SSWS-122-01	Conformance to the approved/specified tolerance for alignment, dimension, and plumbness	/	____x ____ =	
SSWS-122-02	Installed according to plans and specifications.	/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
Item 123 Outdoor, Roadway and Perimeter Lighting System				
SSWS-123-01	Conformance of in-placed materials to plans and specifications.	/	____x ____ =	
SSWS-123-02	Provision of waterproofed structure implement for outdoor illumination.	/	____x ____ =	
SSWS-123-03	Conformance to the required dimension of lighting poles (height, diameter)	/	____x ____ =	
SSWS-123-04	Proper installation of lighting poles and fixtures (bulbs, switches, wires, cables, load break switch, power fuse, lightning arrester).	/	____x ____ =	
SSWS-123-05	Proper installation of electrical wiring resulting to non-peeling-off of insulation.	/	____x ____ =	
SSWS-123-06	Proper installation of conduit pipes.	/	____x ____ =	
SSWS-123-07	Provision of concrete encasement for pipes and conduits.	/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
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Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 124 Deepwell Drilling and Development				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-124-01	Drilled and developed according to plans and specifications.	/	____x ____ =	
SSWS-124-02	Complied and passed draw down tests.	/	____x ____ =	
SSWS-124-03	Water quality complied and passed test requirements.	/	____x ____ =	
Minor				
SSWS-124-04	Drilling method suited to condition of deep well site to be drilled.	/	____x ____ =	
SSWS-125-05	Method of placing the formation stabilizer/gravel pack in the annulus are done in such a way that separation of gravel and bridging are avoided.	/	____x ____ =	
SSWS-124-06	Well is cleaned in accordance with the specified method.	/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
Item 125 Deepwell Submersible Pump				
Major				
SSWS-125-01	Complied and passed required test.	/	____x ____ =	
Minor				
SSWS-125-02	Installed according to plans and specifications complete with controls and accessories.	/	____x ____ =	
SSWS-125-03	Provision of steel guard on power cable along the well casing.	/	____x ____ =	
SSWS-125-04	Pump is operated in conjunction with the level controller installed at the water tank.	/	____x ____ =	
SSWS-125-05	Provision of uPVC conduits for underground power cables.	/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: ____ / ____ / ____			Rate = (a) / (b) =	
			Rate =	

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ITEM: Site Development
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Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 126 Elevated Steel Water Tank				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-126-01	Elevated water storage tank and support structure are installed in accordance with plans and specifications.	/	= ____x ____	
SSWS-126-02	Complied and passed required leak tests.	/	= ____x ____	
SSWS-126-03	Free from corrosion and any form of damages.	/	= ____x ____	
Minor				
SSWS-126-03	Free from rust and any form of damages.	/	= ____x ____	
SSWS-126-04	Installed according to plan complete with control and accessories (i.e., balcony with handrail, access caged ladder, air vent, water level indicator, overflow pipe, inlet-outlet piping, drain valves and fittings, level switch attachment, access hatch, beacon red warning light).	/	= ____x ____	
SSWS-126-05	Structural members free of twist, bends and deformations.	/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
Item 127 Domestic Water Supply Piping System				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-127-01	Installed pipes, fittings and valves conformed to plans and specifications.	/	= ____x ____	
SSWS-127-02	Water line laid not less than 1.0 meter from sewer lines.	/	= ____x ____	
SSWS-127-03	Complied and passed hydraulic and leak tests.	/	= ____x ____	
Minor				
SSWS-127-04	Pipes laid free from dirt or other foreign materials.	/	= ____x ____	
SSWS-127-05	Provision of pipe sleeves for pipes crossing roadways.	/	= ____x ____	
SSWS-127-06	Provision of temporary pipe blind flange/caps at both ends during installation.	/	= ____x ____	
SSWS-127-07	Potable water lines are disinfected prior to use.	/	= ____x ____	
		/	= ____x ____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: ____ / ____ / ____			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Building
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score ____x factor	Action / Monitor
Item 200 Excavation				
SSWS-200-01	Conformance to the approved/specified tolerances for extent for lines, grades, dimensions, elevations	/	____x____ =	
SSWS-200-02	Conformance to the excavation support system, e.g. angle of repose, bracing, shoring, sheet piling)	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 201 Fill and Backfill, Selected Fill				
SSWS-201-01	Conformance of in-placed materials to plans and specifications.	/	____x____ =	
SSWS-201-02	Conformance to the required thickness of fill or backfill per layer.	/	____x____ =	
SSWS-201-03	Conformance to the required density or degree of compaction	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 202 Soil Poisoning				
SSWS-202-01	Conformance to the specified concentration of soil poisoning solution.	/	____x____ =	
SSWS-202-02	Conformance to the specified rate of application.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: <u> / / </u>		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

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PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Building
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 203 CHB Wall				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-203-01	Conformance to required quality of CHB.	/	= ____x____	
SSWS-203-02	Conformance to required quality of mortar mix. (i.e. shoring, bracing, sheet piling)	/	= ____x____	
Minor				
SSWS-203-03	Conformance to specified tolerances for dimension, location, plumbness and alignment.	/	= ____x____	
SSWS-203-04	Proper spacing of horizontal and vertical bars.	/	= ____x____	
SSWS-203-05	Rebars used free from corrosion.	/	= ____x____	
		/	= ____x____	
		/	= ____x____	
		/	= ____x____	
		/	= ____x____	
Item 204 Brick Wall				
Major				
SSWS-204-01	Conformance to required quality of mortar mix.	/	= ____x____	
Minor				
SSWS-204-02	Conformance to specified tolerances for dimension, location, plumbness and alignment.	/	= ____x____	
SSWS-204-03	Proper spacing of horizontal and vertical bars.	/	= ____x____	
SSWS-204-04	Rebars used free from corrosion.	/	= ____x____	
		/	= ____x____	
		/	= ____x____	
		/	= ____x____	
		/	= ____x____	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____ Date: ____ / ____ / ____		No. of Indicators (b) =		
		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Building
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score ____ x factor	Action / Monitor
Item 205 Tiled Finish				
SSWS-205-01	Installed tiles free from chipping, cracks or any form of damages.	/	____ x ____ =	
SSWS-205-02	Mortar/Grout consistency and color conform to specification.	/	____ x ____ =	
SSWS-205-03	Joints are perfectly aligned and consistent with skirting and wall tiles.	/	____ x ____ =	
SSWS-205-04	Tiles are evenly placed/laid.	/	____ x ____ =	
SSWS-205-05	Tiles in wet areas sloped down to drain.	/	____ x ____ =	
SSWS-205-06	Tiles are properly bonded to floor.	/	____ x ____ =	
		/	____ x ____ =	
Item 206 Carpet				
SSWS-206-01	Evenly stretched and of even surface.	/	____ x ____ =	
SSWS-206-02	Properly anchored at all edges.	/	____ x ____ =	
SSWS-206-03	Provided with underlining.	/	____ x ____ =	
SSWS-206-04	Free from any form of damages.	/	____ x ____ =	
SSWS-206-05	Materials conform to specification as per plan.	/	____ x ____ =	
		/	____ x ____ =	
Item 207 Wood Parquet				
SSWS-207-01	Conforms to designed layout.	/	____ x ____ =	
SSWS-207-02	Even surfaces.	/	____ x ____ =	
SSWS-207-03	Free from any form of damage.	/	____ x ____ =	
SSWS-207-04	Adhesive conforms to specifications.	/	____ x ____ =	
SSWS-207-05	Parquet properly bonded to floor.	/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____ Entered by: _____ Date: ____ / ____ / ____			Total Score (a)	CAR Total
			No. of Indicators (b)	
			Rate = (a) / (b)	
			Rate	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 VISIT _____

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Building
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score ____x factor	Action / Monitor
Item 208 Trowelled Floor Finish				
SSWS-208-01	Smooth and even floor finish.	/	____x____ =	
SSWS-208-02	No temperature cracks.	/	____x____ =	
SSWS-208-03	No sign of deflection/settlement.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 209 Pebble Washout				
SSWS-209-01	Installed pebbles are evenly distributed.	/	____x____ =	
SSWS-209-02	No temperature cracks.	/	____x____ =	
SSWS-209-03	Installed pebbles surface are thoroughly clean from cement.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 210 Waterproofing				
SSWS-210-01	Conforms to specified method of application.	/	____x____ =	
SSWS-210-02	Conforms to number of coats/layers required.	/	____x____ =	
SSWS-210-03	Passed required leak test.	/	____x____ =	
SSWS-210-04	Conformance to the required materials specifications as per plan.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: ____ / ____ / ____			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Building
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 211 Wall Paper				
SSWS-211-01	Smooth and evenly pasted.	/	____ x ____ =	
SSWS-211-02	Free from scratches, stains, etc.	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
Item 212 Wall Plaster Finish				
SSWS-212-01	Conformance to designed mixture of plastering materials.	/	____ x ____ =	
SSWS-212-02	Conformance to specified method of application and thickness of plastering.	/	____ x ____ =	
SSWS-212-03	True to alignment.	/	____ x ____ =	
SSWS-212-04	Free from any form of damages, e.g. cracks, peeled-off plaster finish	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
Item 213 Wall Cladding				
SSWS-213-01	Panels properly anchored.	/	____ x ____ =	
SSWS-213-02	True to alignment, plumbness.	/	____ x ____ =	
SSWS-213-03	Free from any form of damages.	/	____ x ____ =	
SSWS-213-04	Panels conform to construction procedure.	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____ Date: ____ / ____ / ____			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 VISIT _____

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Building
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 214 Wall Painting				
SSWS-214-01	Surface prepared according to specification.	/	____x____ =	
SSWS-214-02	Required neutralizers, etc. applied.	/	____x____ =	
SSWS-214-03	Applied paint appropriate to the surface.	/	____x____ =	
SSWS-214-04	Specified number of coats applied.	/	____x____ =	
SSWS-214-05	Surfaces evenly painted, proper opacity.	/	____x____ =	
SSWS-214-06	No discoloration and peeling-off of paint.	/	____x____ =	
SSWS-214-07	Paints conform to specification/requirements.	/	____x____ =	
SSWS-214-08	Surfaces are properly applied with putty/patching compound.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 215 Ceiling Suspension				
SSWS-215-01	Conformance to the specified spacing and length of hangers, clips and joists.	/	____x____ =	
SSWS-215-02	Installed hangers are properly anchored and firm.	/	____x____ =	
SSWS-215-03	True to alignment and elevation in conformance to the approved specified tolerance.	/	____x____ =	
SSWS-215-04	Free from any form of damage.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____ Entered by: _____ Date: <u> </u> / <u> </u> / <u> </u>			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Building
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 216 Ceiling Board				
SSWS-216-01	Materials free from any form of damage.	/	= ____x____	
SSWS-216-02	Smooth surface and true to elevation and alignment.	/	= ____x____	
SSWS-216-03	Location of holes for utilities conforms to plans.	/	= ____x____	
SSWS-216-04	Ceiling boards are properly fastened.	/	= ____x____	
		/	= ____x____	
Item 217 Ceiling Moulding				
SSWS-217-01	True to elevation and alignment.	/	= ____x____	
SSWS-217-02	Installed materials are free from any form of damages.	/	= ____x____	
		/	= ____x____	
Item 218 Roofing Frames				
SSWS-218-01	Conformance to the required size, spacing, slope, anchorage, etc.	/	= ____x____	
SSWS-218-02	Free from any form of damage.	/	= ____x____	
SSWS-218-03	Cleats are properly provided.	/	= ____x____	
SSWS-218-04	Application of paint primer prior to installation	/	= ____x____	
		/	= ____x____	
Item 219 Roofing Sheets				
SSWS-219-01	Conformance to the specified gauge, length, etc.	/	= ____x____	
SSWS-219-02	Conformance to the specified overlapping, sealing of joints, fastening.	/	= ____x____	
SSWS-219-03	Installation of flashing, gutters, ridge rolls, downspouts, etc., according to plans.	/	= ____x____	
SSWS-219-04	Non-occurrence of leaks.	/	= ____x____	
SSWS-219-05	Free from any form of damage.	/	= ____x____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b)	
Date: ____ / ____ / ____			Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Building
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 220 Doors				
SSWS-220-01	True to alignment, plumbness in conformance to the approved/specified tolerance.	/	____x____ =	
SSWS-220-02	Doors are well fitted to the door frames.	/	____x____ =	
SSWS-220-03	Door accessories installed according to plans, e.g. locksets, door closers, hinges, door stoppers.	/	____x____ =	
SSWS-220-04	Free from any form of damage.	/	____x____ =	
SSWS-220-05	Doors conform to specification requirements, e.g. panel door, flush door polyvinyl, steel doors, etc.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 221 Windows				
SSWS-221-01	True to alignment and elevation in conformance to the approved/specified tolerance.	/	____x____ =	
SSWS-221-02	Windows are well fitted to the window frames.	/	____x____ =	
SSWS-221-03	Window accessories installed according to plans, e.g. handles, seals, glazing for glass window, etc.	/	____x____ =	
SSWS-221-04	Free from any form of damage.	/	____x____ =	
SSWS-221-05	Windows conform to specification requirements, e.g. sliding, jalousies (glass and wooden) steel casement windows.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 222 Railings				
SSWS-222-01	Installed according to plans.	/	____x____ =	
SSWS-222-02	Free from dents, scratches or any form of damage.	/	____x____ =	
SSWS-222-03	Bends and curves are smooth.	/	____x____ =	
SSWS-222-04	Conforms to approved tolerance size, dimension, height and type, e.g. concrete, steel, stainless, aluminum, etc.	/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b)	
Date: ____ / ____ / ____			Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Substation ITEM: Building
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____x factor	Action / Monitor
Code	<small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>			
Item 225 Structural Steel Works				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-225-01	Conformance of in-placed materials to plans and specifications.	/	= ____x ____	
SSWS-225-02	Conformance to required fasteners, anchor bolts, bolts/nuts and washers (not provided).	/	= ____x ____	
SSWS-225-03	Free from corrosion and any other form of damages.	/	= ____x ____	
SSWS-225-04	Conformance to splicing requirements.	/	= ____x ____	
Minor				
SSWS-225-03	Free from rust and any other form of damages.	/	= ____x ____	
SSWS-225-05	Conformance to the specified type of welding.	/	= ____x ____	
SSWS-225-06	Fasteners, anchor bolts, bolts/nuts & washers conforms to specified size, strength, etc.	/	= ____x ____	
SSWS-225-07	Installed according to plans.	/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____ Date: <u> </u> / <u> </u> / <u> </u>		No. of Indicators (b) =		
		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: Substation

ITEM: Building

_____ VISIT

LOCATION: _____

DATE OF VISIT: ____/____/____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score x factor	Action / Monitor
Item 223 Plumbing				
SSWS-223-01	Pipes installed according to plans, e.g. slope, alignment, location, bracings/supports.	/	____x____ =	
SSWS-223-02	Conducted and passed the required leak test.	/	____x____ =	
SSWS-223-03	Pipes not clogged.	/	____x____ =	
SSWS-223-04	Free from any form of damages.	/	____x____ =	
SSWS-223-05	Fixtures and accessories installed according to plans, e.g. height, alignment, location.	/	____x____ =	
SSWS-223-06	Adhesive conform to specification.	/	____x____ =	
SSWS-223-07	Water closet, lavatory conform to specification.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 224 Sanitary				
SSWS-224-01	Pipes installed according to plans, e.g. slope, alignment, location, bracings/supports.	/	____x____ =	
SSWS-224-02	Conducted and passed the required pressure/leak test.	/	____x____ =	
SSWS-224-03	Pipes not clogged.	/	____x____ =	
SSWS-224-04	Free from any form of damages.	/	____x____ =	
SSWS-224-05	Fixtures and accessories installed according to plans, e.g. height, alignment, location.	/	____x____ =	
SSWS-224-06	Adhesives conform to specifications.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner : _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b)	
Date: ____/____/____			=	
			Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Building
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____ x factor	Action / Monitor
Code	<small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>			
Item 226 Electrical Works				
SSWS-226-01	Pipes installed according to plans and laid out according to approved construction drawings.	/	____ x ____ =	
SSWS-226-02	Pipes, hangers, boxes, gutters, cable trays properly installed and painted, sharp edges of pipes removed.	/	____ x ____ =	
SSWS-226-03	Pipes properly bended.	/	____ x ____ =	
SSWS-226-04	Allowable number of wires in a pipe properly observed.	/	____ x ____ =	
SSWS-226-05	Splicing and connection provided with adequate rubber and pvc tapes.	/	____ x ____ =	
SSWS-226-06	Adequate length of wire provided for termination and splicing.	/	____ x ____ =	
SSWS-226-07	Wire color coding complied and observed.	/	____ x ____ =	
SSWS-226-08	Wire insulation not damaged during pulling.	/	____ x ____ =	
SSWS-226-09	Adequate number, correct size and gauge of pull boxes installed and properly covered.	/	____ x ____ =	
SSWS-226-10	Boxes and enclosures provided according to intended purpose.	/	____ x ____ =	
SSWS-226-11	Fittings and accessories provided and properly installed.	/	____ x ____ =	
SSWS-226-12	Block-outs and sleeves provided and properly secured.	/	____ x ____ =	
SSWS-226-13	Cable ties provided.	/	____ x ____ =	
SSWS-226-14	Blank covers provided for outlets and switches that are not utilized.	/	____ x ____ =	
SSWS-226-15	Use of tools and equipment properly observed.	/	____ x ____ =	
SSWS-226-16	Lighting fixtures, panel boards, circuit breakers, etc. properly installed and free from any form of damages.	/	____ x ____ =	
SSWS-226-17	Meager, clamp, phase sequence tests and load test conducted.	/	____ x ____ =	
SSWS-226-18	Shop drawings, as-built plan maintained.	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
			No. of Indicators (b)	
Entered by: _____			Rate = (a) / (b)	
			=	
Date: ____ / ____ / ____			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Building
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 227 Air Conditioning System				
SSWS-227-01	Air-conditioning units, transfer fans, pipes, ducts, condensers are installed according to plans.	/	____X____ =	
SSWS-227-02	Jointing of pipes and ducts conform to specified jointing system.	/	____X____ =	
SSWS-227-03	Pipes and ducts free from leaks.	/	____X____ =	
SSWS-227-04	Pipes and ducts sufficiently braced/supported.	/	____X____ =	
SSWS-227-05	Installed materials free from any form of damage.	/	____X____ =	
SSWS-227-06	Conducted and passed the required tests.	/	____X____ =	
		/	____X____ =	
		/	____X____ =	
		/	____X____ =	
		/	____X____ =	
		/	____X____ =	
Item 228 Ventilation System				
SSWS-228-01	Conformance to the design specifications / drawings.	/	____X____ =	
SSWS-228-02	Casing free from dent.	/	____X____ =	
SSWS-228-03	Conducted and passed the required tests.	/	____X____ =	
		/	____X____ =	
		/	____X____ =	
		/	____X____ =	
		/	____X____ =	
		/	____X____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: ____ / ____ / ____			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Substation ITEM: Equipment Foundations
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____x factor	Action / Monitor
Code	<small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>			
Item 300 Excavation				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-300-01	Conformance to the approved foundation plans for lines, grades, dimensions, elevations	/	____x ____ =	
SSWS-300-02	Conformance to the excavation support system (i.e. shoring, bracing, sheet piling)	/	____x ____ =	
SSWS-300-03	Adherence to proper construction methodology.	/	____x ____ =	
Minor				
SSWS-300-01	Conformance to the approved foundation plans for lines, grades, dimensions, elevations	/	____x ____ =	
SSWS-300-03	Adherence to proper construction methodology.	/	____x ____ =	
SSWS-300-04	Conformance to proper disposal of excavated materials.	/	____x ____ =	
		/	____x ____ =	
Item 301 Fill and Backfill				
Major				
SSWS-301-01	Conformance of in-placed materials to plans and specifications.	/	____x ____ =	
SSWS-301-02	Conformance to the required thickness of fill or backfill per layer	/	____x ____ =	
SSWS-301-03	Conformance to the required density or degree of compaction	/	____x ____ =	
Minor				
SSWS-301-04	Conformance to ground level restoration.	/	____x ____ =	
		/	____x ____ =	
Item 302 Anchor Bolt Setting				
Major				
SSWS-302-01	Conformance to the anchor bolt setting dimensions.	/	____x ____ =	
SSWS-302-02	Precise setting of template.	/	____x ____ =	
Minor				
SSWS-302-03	Anchor bolts and templates fix with supporter.	/	____x ____ =	
		/	____x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: <u> / / </u>		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Substation ITEM: Equipment Foundations
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score ____x factor	Action / Monitor
Item 303 Cable Trench Cover and Supports				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-303-01	Provision of block-outs for installation of metal works.	/	= ____x ____	
SSWS-303-02	Metal works and materials installed in accordance to the details shown in the drawing (alignment, position).	/	= ____x ____	
SSWS-303-03	Block-outs were grouted after installation of metal works.	/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
Item 304 Gravel Surfacing				
Major				
SSWS-304-01	Conformance to required lines, grades and thickness.	/	= ____x ____	
Minor				
SSWS-304-02	Compliance to the specified construction methodology.	/	= ____x ____	
SSWS-304-03	No oversize/undersize of in-placed materials.	/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
		/	= ____x ____	
			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

Was subcontractor used? If yes, name of company and owner:
 _____ & _____

Entered by: _____ Date: / /

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Substation ITEM: Common Items of Work
 _____ VISIT LOCATION/LOT: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 400 Formworks				
Minor				
SSWS-400-01	Conformance to the required type of formworks in accordance with approved shop/working drawings.	/	____ x ____ =	
SSWS-400-02	Forms coated with mould oil as required.	/	____ x ____ =	
SSWS-400-03	Sufficient bracing / support.	/	____ x ____ =	
SSWS-400-04	No loose knots, splits, cracks, etc.	/	____ x ____ =	
SSWS-400-05	Provision of required concrete or steel spacer.	/	____ x ____ =	
SSWS-400-06	Conformance to specified tolerances for dimensions, locations, plumbness and alignment.	/	____ x ____ =	
SSWS-400-07	No use of dilapidated/salvage forms (use more than 3x)	/	____ x ____ =	
		/	____ x ____ =	
Item 401 Reinforcing Steel Bars (including tendons for Pre/Post-Stressed Concrete)				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-401-01	Conformance of in-placed materials to plans and specifications.	/	____ x ____ =	
SSWS-401-02	Non-appearance of corrosion on steel reinforcement.	/	____ x ____ =	
Minor				
SSWS-401-02	Non-appearance of rust on steel reinforcement.	/	____ x ____ =	
SSWS-401-03	Conformance to approved bar cutting schedule, proper spacing, anchorage and adequate reinforcements.	/	____ x ____ =	
SSWS-401-04	No sign of oil, paint and other deleterious materials on reinforcements.	/	____ x ____ =	
SSWS-401-05	Conformance to jointing requirement, i.e. splicing, welding, etc.	/	____ x ____ =	
SSWS-401-06	Conformance to proper bending of stirrups	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____ Date: <u> / /</u>			No. of Indicators (b) =	
			Rate= (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Substation ITEM: Common Items of Work
 _____ VISIT LOCATION/LOT: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score _____x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 402 Concrete				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-402-01	No through cracks.	/	_____X_____	
SSWS-402-02	No honeycomb (no exposed rebars/aggregates).	/	_____X_____	
SSWS-402-03	No sagging or bulging.	/	_____X_____	
SSWS-402-04	Conformance to required quality of concrete mix	/	_____X_____	
SSWS-402-05	Conformance to the required concrete cover for rebars.	/	_____X_____	
SSWS-402-06	Conformance to the jointing requirement.	/	_____X_____	
SSWS-402-07	Conformance to placing requirement that will not result segregation of aggregates, cold joints and misalignment.	/	_____X_____	
Minor				
SSWS-402-01	No cracks.	/	_____X_____	
SSWS-402-02	No honeycomb.	/	_____X_____	
SSWS-402-03	No sagging or bulging.	/	_____X_____	
SSWS-402-05	Conformance to the required concrete cover for rebars.	/	_____X_____	
SSWS-402-06	Conformance to the jointing requirement.	/	_____X_____	
SSWS-402-07	Conformance to placing requirement that will not result segregation of aggregates, cold joints and misalignment.	/	_____X_____	
SSWS-402-08	Proper and adequate vibration.	/	_____X_____	
SSWS-402-09	Conformance to finishing/plastering requirement.	/	_____X_____	
SSWS-402-10	No chipping off of concrete cover.	/	_____X_____	
SSWS-402-11	Conformance to the batching, mixing, transporting and discharge time requirements.	/	_____X_____	
SSWS-402-12	Proper curing.	/	_____X_____	
SSWS-402-13	Conformance to required dimensions, lines. grades/ elevation, location.	/	_____X_____	
		/	_____X_____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____ Date: <u> </u> / <u> </u> / <u> </u>			No. of Indicators (b) =	
			Rate= (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: S/S Equipment Installation
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 500 Gantries, Steel Structures and Supports				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-500-01	Conformance with the approved Erection Drawings and installation methodologies.	/	____x____ =	
SSWS-500-02	Templates are used for setting anchor bolt system.	/	____x____ =	
Minor				
SSWS-500-03	Connections are properly secured by bolts, nuts, locknuts and washers.	/	____x____ =	
SSWS-500-04	Stitch bolts are used in connecting double angle members.	/	____x____ =	
SSWS-500-05	Correct direction and bolt position of bolt insertion.	/	____x____ =	
SSWS-500-06	Conformance with specified tolerances for plumbness and alignment.	/	____x____ =	
SSWS-500-07	No damage/defective structural members.	/	____x____ =	
		/	____x____ =	
Item 501 Bus Conductors and Hardwares				
Major				
SSWS-501-01	Installed according to approved plans and specifications.	/	____x____ =	
SSWS-501-02	Conducted and passed the required tests.	/	____x____ =	
Minor				
SSWS-501-03	Conductors are free from copper dust and particles.	/	____x____ =	
SSWS-501-04	No damage/defective members.	/	____x____ =	
SSWS-501-05	Connectors/Terminal pad are equipped with approved type of bolts, nuts, flat washer and bevelled washers.	/	____x____ =	
SSWS-501-06	Terminal connectors are free from burrs, edges, fillet, damage and cracks.	/	____x____ =	
SSWS-501-07	Approved as-built drawings maintained.	/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b)	
Date: <u> / / </u>			Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: S/S Equipment Installation
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score _____ x factor	Action / Monitor
Item 502 Grounding System				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-502-01	Installed according to approved plans and specifications.	/	= _____ x _____	
SSWS-502-02	Grounding connections are properly welded through exothermic process.	/	= _____ x _____	
SSWS-502-03	Overhead ground wire are properly strung according to specified tension and sag.	/	= _____ x _____	
SSWS-502-04	Conducted and passed all required ground resistance tests.	/	= _____ x _____	
Minor				
SSWS-502-03	Overhead ground wire are properly strung according to specified tension and sag.	/	= _____ x _____	
SSWS-502-04	Conducted and passed all required ground resistance tests.	/	= _____ x _____	
SSWS-502-05	Ground rods installed according to approved plans.	/	= _____ x _____	
SSWS-502-06	Grounding trenches are excavated according to specified depth and width.	/	= _____ x _____	
SSWS-502-07	Provision of bedding materials for ground wire.	/	= _____ x _____	
SSWS-502-08	Ground leads are properly supported by clamps at specified intervals.	/	= _____ x _____	
SSWS-502-09	Shield wires and accessories are protected by specified corrosion inhibitor.	/	= _____ x _____	
SSWS-502-10	Steel structures with insulators or apparatus are properly connected to the ground mat.	/	= _____ x _____	
SSWS-502-11	Structures with more than one leg are properly connected to the ground mat with risers at minimum of 2 different points.	/	= _____ x _____	
SSWS-502-12	Substation equipment are properly grounded to two different points of the ground mat.	/	= _____ x _____	
SSWS-502-13	Lighting poles and other metal structures are properly connected to ground mat.	/	= _____ x _____	
SSWS-502-14	Cable trays, ladder, fence and gates are properly connected to ground mat.	/	= _____ x _____	
SSWS-502-15	Approved as-built drawings maintained.	/	= _____ x _____	
		/	= _____ x _____	
Was subcontractor used? If yes, name of company and owner : _____			Total Score (a)	CAR Total
			No. of Indicators (b)	
Entered by: _____			Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 VISIT _____

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: S/S Equipment Installation
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 503 Power Transformer				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-503-01	Installed according to approved plans and specifications.	/	____x____ =	
SSWS-503-02	Conducted and passed the required tests.	/	____x____ =	
Minor				
SSWS-503-03	Properly aligned and leveled.	/	____x____ =	
SSWS-503-04	Appurtenants are clean and free from damages.	/	____x____ =	
SSWS-503-05	Tanks, conservator, radiators coolers and fittings are free from oil leaks.	/	____x____ =	
SSWS-503-06	Approved as-built drawings maintained.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 504 Power Circuit Breaker				
Major				
SSWS-504-01	Installed according to approved plans and specifications.	/	____x____ =	
SSWS-504-02	Conducted and passed the required tests.	/	____x____ =	
Minor				
SSWS-504-03	Mounting bases are properly aligned and leveled.	/	____x____ =	
SSWS-504-04	Installed materials are free from damages.	/	____x____ =	
SSWS-504-05	Approved as-built drawings maintained.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____ Date: <u> </u> / <u> </u> / <u> </u>			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 VISIT _____

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: S/S Equipment Installation
 DATE OF VISIT: ____/____/____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 505 Disconnect / Earthing Switch				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-505-01	Installed according to approved plans and specifications.	/	____x____ =	
SSWS-505-02	Conducted and passed the required tests.	/	____x____ =	
Minor				
SSWS-505-03	Moving parts are properly aligned and leveled.	/	____x____ =	
SSWS-505-04	Installed materials are free from damages.	/	____x____ =	
SSWS-505-05	Approved as-built drawings maintained.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 506 Current Transformer / 507 Voltage Transformer				
Major				
SSWS-50_-01	Installed according to approved plans and specifications.	/	____x____ =	
SSWS-50_-02	Conducted and passed the required tests.	/	____x____ =	
Minor				
SSWS-50_-03	Installed materials are free from damages.	/	____x____ =	
SSWS-50_-04	Approved as-built drawings maintained.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
			Total Score (a)	CAR Total
			No. of Indicators (b)	
			Rate = (a) / (b)	
			Rate	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: ____/____/____

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: S/S Equipment Installation
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score ____x factor	Action / Monitor
Sub-item Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 508 Surge Arrester				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-508-01	Installed according to approved plans and specifications.	/	____ x ____ =	
SSWS-508-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
SSWS-508-03	Installed materials are free from damage.	/	____ x ____ =	
SSWS-508-04	Discharge counter and cable are properly braced and connected to ground mat.	/	____ x ____ =	
SSWS-508-05	Approved as-built drawings maintained.	/	____ x ____ =	
Item 509 Metal Clad Switchgear				
Major				
SSWS-509-01	Installed according to approved plans and specifications.	/	____ x ____ =	
SSWS-509-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
SSWS-509-03	Stationary and moving assembly are properly aligned.	/	____ x ____ =	
SSWS-509-04	Installed materials are free from damage.	/	____ x ____ =	
SSWS-509-05	Approved as-built drawings maintained.	/	____ x ____ =	
Item 510 Station Service Transformer				
Major				
SSWS-510-01	Installed according to approved plans and specifications.	/	____ x ____ =	
SSWS-510-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
SSWS-510-03	Provision of proper ventilaton from the base of the finish ground level for cooling purposes.	/	____ x ____ =	
SSWS-510-04	Properly aligned and leveled.	/	____ x ____ =	
SSWS-510-05	Radiators and coolers are free from oil leaks.	/	____ x ____ =	
SSWS-510-06	Approved as-built drawings maintained.	/	____ x ____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: ____ / ____ / ____

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Substation ITEM: S/S Equipment Installation
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 511 AC and DC Station Auxillary Switchboard				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-511-01	Installed according to approved plans and specifications.	/	____x____ =	
SSWS-511-02	Conducted and passed the required tests.	/	____x____ =	
Minor				
SSWS-511-03	Terminal lugs are grip insulated.	/	____x____ =	
SSWS-511-04	Conformance to proper wirings, markings, tags and ties.	/	____x____ =	
SSWS-511-05	Installed materials are free from damage.	/	____x____ =	
SSWS-511-06	Approved as-built drawings maintained.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 512 Battery Charger				
Major				
SSWS-512-01	Installed according to approved plans and specifications.	/	____x____ =	
SSWS-512-02	Conducted and passed the required tests.	/	____x____ =	
Minor				
SSWS-512-03	Conformance of wiring to required bending radius.	/	____x____ =	
SSWS-512-04	Cable clamps are uniformly spaced.	/	____x____ =	
SSWS-512-05	Terminal lugs are grip insulated.	/	____x____ =	
SSWS-512-06	Installed materials are free from damage.	/	____x____ =	
SSWS-512-07	Approved as-built drawings maintained.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____ Date: <u> / / </u>			No. of Indicators (b)	
			Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Substation ITEM: S/S Equipment Installation
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 513 Storage Battery				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-513-01	Installed according to approved plans and specifications.	/	____X____ =	
SSWS-513-02	Conducted and passed the required tests.	/	____X____ =	
Minor				
SSWS-513-03	Battery racks are free from rust/corrosion.	/	____X____ =	
SSWS-513-04	Current carrying parts are properly insulated.	/	____X____ =	
SSWS-513-05	No damage/defect in any material.	/	____X____ =	
SSWS-513-06	Battery rooms are properly ventilated with exhaust fan and sealed to prevent entry of dust.	/	____X____ =	
SSWS-513-07	Approved as-built drawings maintained.	/	____X____ =	
		/	____X____ =	
Item 514 Power / Control / Instrumentation Cables				
Major				
SSWS-514-01	Installed according to approved cable schedule.	/	____X____ =	
SSWS-514-02	Conducted and passed required tests.	/	____X____ =	
Minor				
SSWS-514-03	Cables are properly installed and placed in conduits, cable trays and trenches.	/	____X____ =	
SSWS-514-04	Cables not yet terminated are properly sealed to prevent moisture into the cable.	/	____X____ =	
SSWS-514-05	Conformance to proper wirings, markings, tags and ties.	/	____X____ =	
SSWS-514-06	No splicing along trays and trench.	/	____X____ =	
SSWS-514-07	Termination of conductors to terminal blocks are provided with terminal lugs, insulated and gripped.	/	____X____ =	
SSWS-514-08	Approved as-built drawings maintained.	/	____X____ =	
		/	____X____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____ Entered by: _____ Date: <u> / / </u>			Total Score (a)	CAR Total
			No. of Indicators (b)	
			Rate = (a) / (b)	
			Rate	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Substation ITEM: S/S Equipment Installation
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score _____x factor	Action / Monitor
Item 515 Uninterruptible Power Supply				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-515-01	Installed according to approved plans and specifications.	/	_____X_____ =	
SSWS-515-02	Conducted and passed the required tests.	/	_____X_____ =	
Minor				
SSWS-515-03	Seismic anchor and clamping device are fixed to foundation.	/	_____X_____ =	
SSWS-515-04	Termination of conductors to terminal blocks are provided with terminal lugs, insulated and gripped.	/	_____X_____ =	
SSWS-514-05	Conformance to proper wirings, markings, tags and ties.	/	_____X_____ =	
SSWS-515-06	No splicing of wires.	/	_____X_____ =	
SSWS-515-07	Maximum of two lines are connected to one terminal block point.	/	_____X_____ =	
SSWS-515-08	Approved as-built drawings maintained.	/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
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		/	_____X_____ =	
		/	_____X_____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____ Date: <u> </u> / <u> </u> / <u> </u>			No. of Indicators (b)	
			Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Substation ITEM: S/S Equipment Installation
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score _____x factor	Action / Monitor
Item 516 Insulating Oil Treatment Plant				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-516-01	Installed according to approved plans and specifications.	/	_____X_____	
SSWS-516-02	Conducted and passed required tests.	/	_____X_____	
Minor				
SSWS-516-03	Installed plant and accessories are free from any form of damage.	/	_____X_____	
		/	_____X_____	
		/	_____X_____	
		/	_____X_____	
		/	_____X_____	
Item 517 Emergency Diesel Generator Set				
Major				
SSWS-516-01	Installed according to approved plans and specifications.	/	_____X_____	
SSWS-517-02	Conducted and passed the required tests.	/	_____X_____	
Minor				
SSWS-517-03	Exhaust system is properly fastened, supported with expansion materials, and insulated.	/	_____X_____	
SSWS-517-04	Fuel tanks and piping system are leak-free.	/	_____X_____	
SSWS-517-05	Generator set and accessories are free from damages.	/	_____X_____	
		/	_____X_____	
		/	_____X_____	
		/	_____X_____	
		/	_____X_____	
				Total Score (a)
Was subcontractor used? If yes, name of company and owner: _____ & _____				CAR Total
				No. of Indicators (b)
Entered by: _____ Date: <u> / / </u>				Rate = (a) / (b)
				=
				Rate
				=

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Substation ITEM: S/S Equipment Installation
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 518 Lighting System				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-518-01	Installed according to approved plans and specifications.	/	____X____ =	
SSWS-518-02	Conducted and passed required tests.	/	____X____ =	
Minor				
SSWS-518-03	Pull boxes are properly installed and covered.	/	____X____ =	
SSWS-518-04	Outlet boxes are firmly anchored in-place with fixture supports.	/	____X____ =	
SSWS-518-05	No exposed pulling boxes in areas normally occupied by working personnel.	/	____X____ =	
SSWS-518-06	Lighting panels are surface/recess-mounted with proper identifications/labeling on all branch circuits.	/	____X____ =	
SSWS-518-07	Conformance to allowable number of wires in conduit pipe.	/	____X____ =	
SSWS-518-08	Adequate rubber and PVC tapes are provided in splicing and connections.	/	____X____ =	
SSWS-518-09	Boxes and enclosures are provided according to intended purpose.	/	____X____ =	
SSWS-518-10	Wire insulation not damaged during pulling.	/	____X____ =	
SSWS-518-11	Provision of covers for blank utility boxes.	/	____X____ =	
SSWS-518-12	Conformance to proper wirings, markings, tags and ties.	/	____X____ =	
SSWS-518-13	Lighting fixtures are free of warps, dents, and other damages.	/	____X____ =	
SSWS-518-14	Hanger cable supports, channels, frames and brackets are provided in the lighting fixtures (as necessary).	/	____X____ =	
SSWS-518-15	Flood lights, perimeter lighting, structure mounted luminous are installed with appropriate supports and brackets.	/	____X____ =	
SSWS-518-16	Outdoor lighting fixtures are provided with sealing gaskets.	/	____X____ =	
SSWS-518-17	Approved as-built drawings maintained.	/	____X____ =	
		/	____X____ =	
		/	____X____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____ Date: <u> </u> / <u> </u> / <u> </u>			No. of Indicators (b)	
			Rate = (a) / (b)	
			Rate	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Substation ITEM: S/S Equipment Installation
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 519 Conduits and Cable Tray System				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-519-01	Installed according to approved plans and specifications.	/	____x____ =	
SSWS-519-02	Conducted and passed the required tests.	/	____x____ =	
Minor				
SSWS-519-03	Conduit ends are reamed and smoothened before jointing.	/	____x____ =	
SSWS-519-04	Provision of plug and fillers.	/	____x____ =	
SSWS-519-05	Provision of coupling and bends.	/	____x____ =	
SSWS-519-06	Provision of spacers, inserts and ties for conduits.	/	____x____ =	
SSWS-519-07	Provision of stow enamel coating inside conduits.	/	____x____ =	
SSWS-519-08	Provision of rigid metal expansion joints where required.	/	____x____ =	
SSWS-519-09	Cable trays, accessories and fittings are smooth, free from defects and sharp edges.	/	____x____ =	
SSWS-519-10	Trays are properly installed and supported as per plan.	/	____x____ =	
SSWS-519-11	Provision of adequate support on vertical cable runs.	/	____x____ =	
SSWS-519-12	Multi core cables are clamped to the racks.	/	____x____ =	
SSWS-519-13	Conformance to required leveling and alignment of all installed materials	/	____x____ =	
SSWS-519-14	Conformance to grounding connections.	/	____x____ =	
SSWS-519-15	Cables are adequately supported by racks and clamps, if it is not feasible to support cables by means of tray.	/	____x____ =	
SSWS-519-16	Approved as-built drawings maintained.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____ Date: <u> / / </u>			No. of Indicators (b)	
			Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: Substation
LOCATION: _____

ITEM: Telecom System
DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score ____x factor	Action / Monitor
Item 600 Microwave Equipment				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-600-01	Completeness of installation according to approved plans and specifications.	/	____x____ =	
SSWS-600-02	Cable trays, racks and conduit system installed according to approved plans and specifications.	/	____x____ =	
SSWS-600-03	Link terminal; i.e transmitters and receiver installed at specified room conditions and temperature.	/	____x____ =	
SSWS-600-04	Antenna rigidly mounted in accordance with approved plans and specifications.	/	____x____ =	
SSWS-600-05	Conformance to specified antenna directions.	/	____x____ =	
SSWS-600-06	Grounding rods and arresters installed and connected according to approved plans and specifications.	/	____x____ =	
SSWS-600-07	Conducted and passed the required tests.	/	____x____ =	
SSWS-600-08	Equipment is free from any damage.	/	____x____ =	
Minor				
SSWS-600-02	Cable trays, racks and conduit system installed according to approved plans and specifications.	/	____x____ =	
SSWS-600-08	Equipment is free from any damage.	/	____x____ =	
SSWS-600-09	Antenna coarse and fine adjustments provided.	/	____x____ =	
SSWS-600-10	Complied with the minimum bending radius for wave guide.	/	____x____ =	
SSWS-600-11	Order wire circuit contained in rack mounted not integrated within the other units of the radio equipment rack conformed with specified height.	/	____x____ =	
SSWS-600-12	Wave guide installed complete with mounting hardwares wall fed through, grounding straps, connectors and pressurizing equipment.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: ____ / ____ / ____

Total Score (a)	CAR Total
No. of Indicators (b)	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Substation ITEM: Telecom System
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score ____x factor	Action / Monitor
Item 601 Fiber Optic Terminal Equipment				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-601-01	Completeness of installation according to approved plans and specifications.	/	____x____ =	
SSWS-601-02	Free from any form of damage.	/	____x____ =	
SSWS-601-03	Clean from inside and outside.	/	____x____ =	
SSWS-601-04	Proper identifications/markings are provided on the cable.	/	____x____ =	
SSWS-601-05	Fiber optic cables are terminated in connectors accessible through jumper cables (pigtails).	/	____x____ =	
SSWS-601-06	Ends of the fiber optic cable are provided with caps to prevent moisture ingress into the cables.	/	____x____ =	
SSWS-601-07	Each end of the cables are securely fastened to the reel to prevent the cable from becoming loose during placing operations.	/	____x____ =	
SSWS-601-08	Conducted and passed the required tests.	/	____x____ =	
Minor				
SSWS-601-02	Free from any form of damage.	/	____x____ =	
SSWS-601-03	Clean from inside and outside.	/	____x____ =	
SSWS-601-07	Each end of the cables are securely fastened to the reel to prevent the cable from becoming loose during placing operations.	/	____x____ =	
Item 602 Power Line Carrier Equipment				
Major				
SSWS-602-01	Completeness of installation according to approved plans and specifications.	/	____x____ =	
SSWS-602-02	Appurtenants of PLC equipment are free from damages (i.e, PLC cubicles, transmitter/reciever sets, line tuners, line traps, protection signalling equipment, etc.)	/	____x____ =	
SSWS-602-03	Conformance to the ambient temperature in which the cubicles are located.	/	____x____ =	
SSWS-602-04	Conducted and passed the required tests.	/	____x____ =	
Minor				
SSWS-602-02	Appurtenants of PLC equipment are free from damages (i.e, PLC cubicles, transmitter/reciever sets, line tuners, line traps, protection signalling equipment, etc.)	/	____x____ =	
SSWS-602-05	Co-axial cables are properly laid with cable support and cable ties.	/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____ Entered by: _____ Date: <u> </u> / <u> </u> / <u> </u>			Total Score (a)	CAR Total
			No. of Indicators (b)	
			Rate = (a) / (b)	
			Rate	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Telecom System
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____ x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 603 Telephone Equipment				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-603-01	Completeness of installation according to approved plans and specifications.	/	____ x ____ =	
SSWS-603-02	Circuit boards and components are sealed / treated to provide protection against moisture.	/	____ x ____ =	
SSWS-603-03	Main Distribution Panel/frame is equipped with earthing accessories for connection to station ground mat.	/	____ x ____ =	
SSWS-603-04	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
SSWS-603-02	Circuit boards and components are sealed / treated to provide protection against moisture.	/	____ x ____ =	
SSWS-603-05	Lines are plugged-in type to the Distribution Frame. No soldering.	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
Item 604 UHF / VHF Radio Equipment				
Major				
SSWS-604-01	Completeness of installation according to approved plans and specifications.	/	____ x ____ =	
SSWS-604-02	UHF / VHF Radio Equipment are free from damages (i.e, base station, repeater sets, portable sets, mobile radio sets, co-axial cables, antenna system, etc.).	/	____ x ____ =	
SSWS-604-03	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
SSWS-604-02	UHF / VHF Radio Equipment are free from damages (i.e, base station, repeater sets, portable sets, mobile radio sets, co-axial cables, antenna system, etc.).	/	____ x ____ =	
SSWS-604-04	Co-axial cables are laid with mounting hardwares or roof fed through to avoid sag. Provisions for grounding as required.	/	____ x ____ =	
SSWS-604-05	Base antenna are installed / mounted rigidly on its support structure with lightning protection.	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
			Total Score (a)	CAR Total
			No. of Indicators (b)	
			Rate = (a) / (b)	
			Rate	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: ____ / ____ / ____

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Telecom System
 DATE OF VISIT: ____/____/____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 605 Antenna Tower				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-605-01	Conformance to foundation requirements (i.e, correct orientation, finished elevations, embedded items).	/	____x____ =	
SSWS-605-02	Conformance to approved erection drawings.	/	____x____ =	
SSWS-605-03	Tower parts and accessories are free from damages (i.e, structural steel works, anchor materials, bolts and nuts, washers, guy, etc.).	/	____x____ =	
SSWS-605-04	Connectors of tower members are secured by bolts and nuts and washers.	/	____x____ =	
SSWS-605-05	Tower parts completely installed.	/	____x____ =	
SSWS-605-06	Lightning rod completely installed as per plans and specifications.	/	____x____ =	
Minor				
SSWS-605-03	Tower parts and accessories are free from damages (i.e, structural steel works, anchor materials, bolts and nuts, washers, guy, etc.).	/	____x____ =	
SSWS-605-04	Connectors of tower members are secured by bolts and nuts and washers.	/	____x____ =	
SSWS-605-07	Provision of setting templates for setting anchor bolts or stub angles for each type of tower.	/	____x____ =	
SSWS-605-08	No appearance of white rust on all galvanized members and accessories	/	____x____ =	
SSWS-605-09	Bolts, nuts and washers conformed to the required number, sizes and strength.	/	____x____ =	
SSWS-605-10	Galvanized bolts and nuts are assembled with finger fit pressure only and interchangeable without shakes.	/	____x____ =	
SSWS-605-11	Conformance to bolt positions and insertion requirements.	/	____x____ =	
SSWS-605-12	Bolts fastened with specified torque.	/	____x____ =	
SSWS-605-13	Approved as-built drawings maintained.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: ____/____/____			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Telecom System
 DATE OF VISIT: ____/____/____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____ x factor	Action / Monitor
Item 606 Fiber Optic Cable (Linking the Substation)				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-606-01	Cable pulling in boxes conforms with plans and specifications.	/	= ____ x ____	
SSWS-606-02	Proper backfilling and compaction prior to cable pipe laying.	/	= ____ x ____	
SSWS-606-03	Trench slopes conform to plans and specifications.	/	= ____ x ____	
SSWS-606-04	Conformance to laying/pulling operation procedure.	/	= ____ x ____	
SSWS-606-05	Conducted and passed the required tests.	/	= ____ x ____	
Minor				
SSWS-606-01	Cable pulling in boxes conforms with plans and specifications.	/	= ____ x ____	
SSWS-606-02	Proper backfilling and compaction prior to cable pipe laying.	/	= ____ x ____	
SSWS-606-03	Trench slopes conform to plans and specifications.	/	= ____ x ____	
SSWS-606-06	Required markings are provided.	/	= ____ x ____	
SSWS-606-07	Backfilling of trenches conform to plans and specifications.	/	= ____ x ____	
SSWS-606-08	Equipment arrangement and accessories (i.e, pulling ropes, hooks, rollers, etc. for the pipe and cable pulling operations) conform to approved procedure	/	= ____ x ____	
SSWS-606-09	Conformance to repair preparedness procedure.	/	= ____ x ____	
SSWS-606-10	Approved as-built drawings maintained.	/	= ____ x ____	
		/	= ____ x ____	
		/	= ____ x ____	
		/	= ____ x ____	
		/	= ____ x ____	
		/	= ____ x ____	
		/	= ____ x ____	
		/	= ____ x ____	
			Total Score (a)	CAR Total
			No. of Indicators (b)	
Was subcontractor used? If yes, name of company and owner : _____				
Entered by: _____			Date: ____/____/____	
			Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Control System
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score ____ x factor	Action / Monitor
Item 700 Microprocessor Based Control System (MBSC)				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-700-01	Installation and arrangement conforms to approved plans and specifications.	/	____ x ____ =	
SSWS-700-02	Installed materials are free from damages.	/	____ x ____ =	
SSWS-700-03	Conducted and passed required tests (i.e., routine and quality conformance tests).	/	____ x ____ =	
Minor				
SSWS-700-02	Installed materials are free from damages.	/	____ x ____ =	
SSWS-700-04	Power supplies system are properly arranged.	/	____ x ____ =	
SSWS-700-05	Earthing terminal are provided for grounding connection.	/	____ x ____ =	
SSWS-700-06	Cabling layout conforms to plan.	/	____ x ____ =	
SSWS-700-07	Provision of raceways for wiring connection of MBSC to various equipment.	/	____ x ____ =	
SSWS-700-08	Approved as-built drawings maintained.	/	____ x ____ =	
Item 701 Closed Circuit Television System				
Major				
SSWS-701-01	Installed according to approved plans complete with required furnitures.	/	____ x ____ =	
SSWS-701-02	Installation of foundation, pole, junction boxes, tamper switch, sun shade and screen wiper in accordance to approved plans.	/	____ x ____ =	
SSWS-701-03	Cabling layout conforms to plan.	/	____ x ____ =	
SSWS-701-04	Conducted and passed required tests.	/	____ x ____ =	
Minor				
SSWS-701-05	Provision for equipment grounding to ground mat.	/	____ x ____ =	
SSWS-701-06	Wirings/video cable passed through approved and properly supported raceways.	/	____ x ____ =	
SSWS-701-07	Approved as-built drawings maintained.	/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____ Entered by: _____ Date: ____ / ____ / ____			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: S/S Control
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____ x factor	Action / Monitor
Item 702 Access Control and Alarm Monitoring System				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-702-01	Installed according to approved equipment arrangement and layout.	/	____ x ____ =	
SSWS-702-02	Cable layout conforms to plans.	/	____ x ____ =	
SSWS-702-03	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
SSWS-702-02	Cable layout conforms to plans.	/	____ x ____ =	
SSWS-702-04	Accessories for signal transmission are properly installed (i.e., mounting hardwares, connectors, etc.).	/	____ x ____ =	
SSWS-702-05	Installation of field wirings in conduit is in accordance with applicable codes and standards.	/	____ x ____ =	
SSWS-702-06	Conformance to required sizes of conduits and conductors in the drawings.	/	____ x ____ =	
SSWS-702-07	Provision for grounding connection to ground mat.	/	____ x ____ =	
SSWS-702-08	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

Was subcontractor used? If yes, name of company and owner:
 _____ & _____

Entered by: _____ Date: ____ / ____ / ____

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Protection System
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score ____x factor	Action / Monitor
Item 800 Line Protection System				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-800-01	Completeness of installation according to approved plans and specifications.	/	= ____x____	
SSWS-800-02	Installed materials are free from any form of damage.	/	= ____x____	
SSWS-800-03	Conducted and passed the required tests.	/	= ____x____	
Minor				
SSWS-800-02	Installed materials are free from any form of damage.	/	= ____x____	
SSWS-800-04	Relay panels are complete with grounding connections.	/	= ____x____	
SSWS-800-05	Conformance of control and power cable entrance openings to plans and specs.	/	= ____x____	
SSWS-800-06	Approved as-built drawings maintained.	/	= ____x____	
		/	= ____x____	
Item 801 Substation Protection				
Major				
SSWS-801-01	Completeness of installation according to approved plans and specifications.	/	= ____x____	
SSWS-801-02	Conformance of control and power cable entrance openings to plans and specs.	/	= ____x____	
SSWS-801-03	Cables entering the relay cubicle are properly installed and placed.	/	= ____x____	
SSWS-801-04	Grounding terminal pads are provided for connection to ground mat.	/	= ____x____	
SSWS-801-05	Conducted and passed the required tests.	/	= ____x____	
SSWS-801-06	Installed materials are free from any form of damage.	/	= ____x____	
Minor				
SSWS-801-06	Installed materials are free from any form of damage.	/	= ____x____	
SSWS-801-07	Wirings are properly identified with markings.	/	= ____x____	
SSWS-801-08	Cable rack hooks and supports are provided.	/	= ____x____	
SSWS-801-09	Approved as-built drawings maintained.	/	= ____x____	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: ____ / ____ / ____			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Protection System
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score _____ x factor	Action / Monitor
Item 802 Network Disturbance Monitoring System				
Major*	<small>* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects</small>			
SSWS-802-01	Completeness of installation according to approved plans and specifications.	/	_____ x _____ =	
SSWS-802-02	Conducted and passed the required tests.	/	_____ x _____ =	
SSWS-802-03	Installed materials are free from any form of damage.	/	_____ x _____ =	
Minor				
SSWS-802-03	Installed materials are free from any form of damage.	/	_____ x _____ =	
SSWS-802-04	Approved as-built drawings maintained.	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 803 Protection Signalling Equipment				
Major				
SSWS-803-01	Completeness of installation according to approved plans and specifications.	/	_____ x _____ =	
SSWS-803-02	Parts are free from damages.	/	_____ x _____ =	
SSWS-803-03	Conducted and passed functional and other required tests.	/	_____ x _____ =	
Minor				
SSWS-803-02	Parts are free from damages.	/	_____ x _____ =	
SSWS-803-04	Provision of terminal pad for grounding connections.	/	_____ x _____ =	
SSWS-803-05	Conformance to proper arrangements of terminal blocks inside the panel.	/	_____ x _____ =	
SSWS-803-06	Approved as-built drawings maintained.	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: ____ / ____ / ____			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Substation ITEM: Fire Protection System
 _____ VISIT LOCATION: _____ DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 900 Fire Pumping System				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SSWS-900-01	Installed pumps, accessories and appurtenances conformed to the required capacity and approved plans and specifications.	/	____x____ =	
SSWS-900-02	Piping connections sufficiently braced/supported and free from leaks.	/	____x____ =	
SSWS-900-03	Installed system free from any form of damage.	/	____x____ =	
SSWS-900-04	Conducted and passed the required tests.	/	____x____ =	
Minor				
SSWS-900-02	Piping connections sufficiently braced/supported and free from leaks.	/	____x____ =	
SSWS-900-03	Installed system free from any form of damage.	/	____x____ =	
SSWS-900-05	Conformance to foundation, anchorage, housing/casing requirements.	/	____x____ =	
SSWS-900-06	Conformance to pipings and control panel technical specifications.	/	____x____ =	
SSWS-900-07	Conformance to alignment, balancing and vibration limitations.	/	____x____ =	
SSWS-900-08	Approved as-built drawings maintained.	/	____x____ =	
Item 901 Fire Protection Piping System				
Major				
SSWS-901-01	Installed pipes conform to plans, e.g. slope, alignment, location, bracings, supports.	/	____x____ =	
SSWS-901-02	Pipes not clogged.	/	____x____ =	
SSWS-901-03	Installed materials are free from any form of damage.	/	____x____ =	
SSWS-901-04	Conducted and passed the required tests.	/	____x____ =	
Minor				
SSWS-901-03	Installed materials are free from any form of damage.	/	____x____ =	
SSWS-901-05	Installed fixtures and accessories conform to plans, e.g. height, alignment, location.	/	____x____ =	
SSWS-901-06	Approved as-built drawings maintained.	/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____ Date: <u> </u> / <u> </u> / <u> </u>			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 VISIT _____

PROJECT TYPE: Substation
 LOCATION: _____

ITEM: Fire Protection System
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____ x factor	Action / Monitor
Code	<small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>			
Item 902 Outdoor Hydrant / 903 Hydrant for Transformer Area / 904 Portable Fire Extinguisher / 905 Portable Foam Equipment with Foam Concentrate				
SSWS-90_-01	Conformance to the design specifications, drawings and applicable codes.	/	____ x ____ =	
SSWS-90_-02	Conducted and passed the required tests.	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
Item 906 Transformer Deluge Water Sprinkler System				
Major				
SSWS-906-01	Completeness of installation according to approved plans and specifications.	/	____ x ____ =	
SSWS-906-02	Conducted and passed the required tests.	/	____ x ____ =	
SSWS-906-03	Installed materials are free from any form of damage.	/	____ x ____ =	
Minor				
SSWS-906-03	Installed materials are free from any form of damage.	/	____ x ____ =	
SSWS-906-04	Installed complete with appurtenances and its control, e.g. fixed piping and supports, spray nozzles, deluge valve system, detection and signaling equipment.	/	____ x ____ =	
SSWS-906-05	Provision of strainers in the supply lines of fixed water pipe spray system.	/	____ x ____ =	
SSWS-906-06	Detection equipment requiring weather protection are provided with canopy, hood or other suitable features.	/	____ x ____ =	
SSWS-906-07	System pipings are adequately supported.	/	____ x ____ =	
SSWS-906-08	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: ____ / ____ / ____			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Substation ITEM: Fire Protection System
 _____ VISIT LOCATION: _____ DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score ____ x factor	Action / Monitor
Item 907 Total Gas Flooding Fire Suppression System (For Control Room, Relay Room, and Auxillary Room)				
Major				
SSWS-907-01	Conformance to the design specifications, drawings and applicable codes.	/	____ x ____ =	
SSWS-907-02	Conducted and passed the required tests.	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
Item 908 Fire Detection and Alarm System				
Major* <small>* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects</small>				
SSWS-908-01	Installed according to approved plans and specifications.	/	____ x ____ =	
SSWS-908-02	Wirings are in accordance with the requirements of the applicable codes.	/	____ x ____ =	
SSWS-908-03	No T-wiring or pigtail connections.	/	____ x ____ =	
SSWS-908-04	Conducted and passed the required tests.	/	____ x ____ =	
SSWS-908-05	Installed materials are free from any form of damage.	/	____ x ____ =	
Minor				
SSWS-908-05	Installed materials are free from any form of damage.	/	____ x ____ =	
SSWS-908-06	Wirings are color coded in conduit or electrical metallic tubing.	/	____ x ____ =	
SSWS-908-07	Circuit conductors are identified within each enclosure where a tap, splice or termination is made.	/	____ x ____ =	
SSWS-908-08	Markers properly in-placed.	/	____ x ____ =	
SSWS-908-09	Control circuit terminations are properly identified.	/	____ x ____ =	
SSWS-908-10	Terminals requiring grounding connectors are properly connected to grounding system.	/	____ x ____ =	
SSWS-908-11	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____ Date: ____ / ____ / ____			No. of Indicators (b)	
			Rate = (a) / (b)	
			Rate	

ANNEX 2-H

CHECKLIST FOR DIESEL POWER PLANT

Site Development

Item 100	Boundary Establishment	2H-1
Item 101	Clearing and Grabbing	2H-1
Item 102	Removal of Structure and Obstruction	2H-1
Item 103	Grading Excavation	2H-1
Item 104	Structure Excavation	2H-1
Item 105	Embankment	2H-2
Item 106	Subgrade Preparation	2H-2
Item 107	Grading Fill	2H-3
Item 108	Selected Fill/Engineered fill	2H-3
Item 109	Aggregate Sub-base Course/Aggregate Base Course	2H-4
Item 110	Portland Cement Concrete Pavement	2H-5
Item 111	Pipe Culvert and Storm Drains	2H-6
Item 112	Manholes, Inlets, and Catch Basins	2H-6
Item 113	Riprap and Grouted Riprap	2H-7
Item 114	Gabion /Mattresses	2H-7
Item 115	Topsoil	2H-8
Item 116	Sprigging/Sodding	2H-8
Item 117	Ornament Plant/Tree Planting	2H-8
Item 118	Perimeter/Seclusion Fence	2H-9
Item 119	Gate / Guardhouse	2H-10
Item 120	Outdoor, Roadway and Perimeter Lighting System	2H-10
Item 121	Deepwell Drilling and Development	2H-10
Item 122	Deepwell Submersible Pump	2H-11
Item 123	Elevated Steel Water Tank	2H-11
Item 124	Domestic Water Supply Piping System	2H-12
Item 125	Gravel Surfacing	2H-12
Item 126	Concrete Drainage Canal	2H-13
Item 127	Oil-Water Separator	2H-13
Item 128	Rockwall/Retaining Wall	2H-13

Powerhouse Building

Item 200	Fill and Selected Fill	2H-14
Item 201	Soil Poisoning	2H-14
Item 202	CHB Wall	2H-14
Item 203	Brick Wall	2H-15
Item 204	Tiled Finish	2H-15
Item 205	Trowelled Floor Finish	2H-15
Item 206	Pebble Wash-Out	2H-16
Item 207	Waterproofing	2H-16
Item 208	Wall Paper	2H-16
Item 209	Wall Plaster Finish	2H-16
Item 210	Wall Cladding	2H-17
Item 211	Wall/Roof Painting	2H-17
Item 212	Ceiling Suspension	2H-17
Item 213	Ceiling Board	2H-18
Item 214	Ceiling Moulding	2H-18
Item 215	Roofing Frames	2H-18
Item 216	Roofing Sheets	2H-18
Item 217	Doors	2H-19
Item 218	Windows	2H-19
Item 219	Railings	2H-19
Item 220	Plumbing	2H- 20
Item 221	Sanitary	2H- 20
Item 222	Structural Steel Works	2H- 21
Item 223	Electrical Works	2H- 22
Item 224	Air Conditioning System	2H- 23

Item 225	Ventilation System	2H- 23
Item 226	Septic Vaults	2H- 23

Equipment Foundations

Item 300	Fill / Sand and Gravel Bedding	2H-24
Item 301	Lean Concrete	2H-24
Item 302	Anchor Bolt Setting	2H-24
Item 303	Epoxy and Non-Cementitious Grouting	2H-24
Item 304	Cable Trench Cover and Supports	2H-25
Item 305	Gravel Surfacing	2H-25

Common Items of Works

Item 400	Excavation	2H-26
Item 401	Backfill	2H-26
Item 402	Formworks	2H-26
Item 403	Reinforcing Steel Bars (including tendons for Pre/Post-Stressed Concrete)	2H-27
Item 404	Concrete	2H-28

Equipment Installation

Item 500	Diesel Generator Set and its Appurtenances	2H-29
Item 501	Fuel Oil System	2H-29
Item 502	Cooling System	2H-30
Item 503	Cooling Water Supply System	2H-30
Item 504	Lubrication Oil System	2H-31
Item 505	Compressed Air System	2H-31
Item 506	Exhaust System	2H-32
Item 507	Domestic Water Supply System	2H-32
Item 508	Power Transformer	2H-33
Item 509	Power Circuit Breaker	2H-34
Item 510	Station Service Transformer	2H-34
Item 511	Kilowatt Hour Billing Meter	2H-35
Item 512	Current Transformer	2H-35
Item 513	Potential/Voltage Transformer	2H-35
Item 514	Metal Clad Switch Gear	2H-36
Item 515	Disconnect/Earthing Switch	2H-36
Item 516	Power/Control and Protection Panel	2H-37
Item 517	Surge/Lightning Arrester	2H-37
Item 518	Uninterruptible Power Supply	2H-38
Item 519	Storage Battery	2H-38
Item 520	Battery Charger	2H-39
Item 521	Grounding System	2H-40
Item 522	Bus Conductors and Hardwares	2H-41
Item 523	Gantries, Steel Structures and Supports	2H-41
Item 524	Power/Control/ Instrumentation Cables	2H-42
Item 525	Conduits and Cable Tray System	2H-43

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Site Development**
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____ x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 100 Boundary Establishment				
DPWS-100-01	Boundary of site/area for development accurately established.	/	____ x ____ =	
101 Clearing and Grubbing				
DPWS-101--01	Proper removal of undisputed stumps roots and non- perishable solid objects/structures, vegetation, debris, trees and other obstruction.	/	____ x ____ =	
DPWS-101-02	Conformance to proper disposal.	/	____ x ____ =	
102 Removal of Structure and Obstruction				
DPWS-102-01	Proper removal of undisputed stumps roots and non- perishable solid objects/structures, vegetation, debris, trees and other obstruction.	/	____ x ____ =	
DPWS-102-02	Conformance to proper disposal.	/	____ x ____ =	
Item 103 Grading Excavation				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-103-01	Adherence to proper construction methodology.	/	____ x ____ =	
DPWS-103-02	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions. (if no longer correctible, e.g., with in-placed structure).	/	____ x ____ =	
Minor				
DPWS-103-03	Conformance to proper disposal.	/	____ x ____ =	
104 Structure Excavation				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-104-01	Adherence to proper construction methodology.			
DPWS-104-02	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions. (if no longer correctible, e.g., with in-placed structure).	/	____ x ____ =	
Minor				
DPWS-104-02	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions. (correctible)	/	____ x ____ =	
DPWS-104-03	Conformance to proper disposal.	/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____ Date: ____ / ____ / ____			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **DIESEL POWER PLANT**

ITEM: **Site Development**

_____ VISIT

LOCATION: _____

DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score _____x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 105 Embankment				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-105-01	Adherence to proper construction methodology (if no longer correctible, e.g., layering, Item 106 not undertaken).	/	_____x_____ =	
DPWS-105-02	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions. (if no longer correctible, e.g., with in-placed structure).	/	_____x_____ =	
DPWS-105-03	Adherence to compaction procedure and the required equipment (if no longer correctible, e.g., done in layers but do not meet required compaction and succeeding layer was laid).	/	_____x_____ =	
Minor				
DPWS-105-01	Adherence to proper construction methodology.	/	_____x_____ =	
DPWS-105-02	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions. (correctible)	/	_____x_____ =	
DPWS-105-03	Adherence to compaction procedure and the required equipment(correctible).	/	_____x_____ =	
106 Subgrade Preparation				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-106-01	Adherence to proper construction methodology (if no longer correctible, e.g., layering, Item 105 not undertaken).	/	_____x_____ =	
DPWS-106-02	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions. (if no longer correctible, e.g., with in-placed structure).	/	_____x_____ =	
DPWS-106-03	Adherence to compaction procedure and the required equipment (if no longer correctible, e.g., done in layers but do not meet required compaction and succeeding layer was laid).	/	_____x_____ =	
Minor				
DPWS-106-01	Adherence to proper construction methodology.			
DPWS-106-02	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions. (correctible)	/	_____x_____ =	
DPWS-106-03	Adherence to compaction procedure and the required equipment(correctible).	/	_____x_____ =	
		/	_____x_____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: ____ / ____ / ____

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Site Development**
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score _____x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 107 Grading Fill				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-107-01	Conformance of in-placed materials to plans and specifications.	/	____x____ =	
DPWS-107-02	Conformance to the required density or degree of compaction.	/	____x____ =	
Minor				
DPWS-107-03	Conformance to the proper placement and to the required thickness per layer of fill/backfill	/	____x____ =	
DPWS-107-04	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions. (correctible)	/	____x____ =	
DPWS-107-05	Adherence to compaction procedure and the required equipment(correctible).	/	____x____ =	
Item 108 Selected Fill/ Engineered Fill				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-108-01	Conformance of in-placed materials to plans and specifications.	/	____x____ =	
DPWS-108-02	Conformance to the required density or degree of compaction.	/	____x____ =	
Minor				
DPWS-108-03	Adherence to proper construction methodology	/	____x____ =	
DPWS-108-04	Conformance with approved/specified tolerances for lines, grades, cross-section, elevation, & dimensions. (correctible)	/	____x____ =	
DPWS-108-05	Adherence to compaction procedure and the required equipment(correctible).	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
			Total Score (a)	CAR Total
Was subcontractor used? If yes, name of company and owner: _____ & _____			No. of Indicators (b)	
Entered by: _____			Rate = (a) / (b)	
			Rate	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **DIESEL POWER PLANT**

ITEM: **Site Development**

_____ VISIT

LOCATION: _____

DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score ____x factor	Action / Monitor
Sub-item	Code			
*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).				
Item 109 Aggregate Sub-Base Course / Aggregate Base Course				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-109-01	Conformance of in-placed materials according to plans and specifications.	/	____x____ =	
DPWS-109-02	Adherence to proper construction methodology. (if no longer correctible, e.g., layer)	/	____x____ =	
DPWS-109-03	Conformance w/ approved/specified lines, grades, cross-section, thickness, elevation as per plans and specifications.	/	____x____ =	
DPWS-109-04	Conformance to the required compaction.	/	____x____ =	
Minor				
DPWS-109-01	Conformance of in-placed materials according to plans and specifications.	/	____x____ =	
DPWS-109-02	Adherence to proper construction methodology. (correctible)	/	____x____ =	
DPWS-109-03	Conformance w/ approved/specified tolerances on lines, grades, cross-section, thickness, elevation, & plans. (correctible) dimensions	/	____x____ =	
DPWS-109-04	Conformance to the required compaction.	/	____x____ =	
DPWS-109-05	Sub-base/Base extended to shoulders.	/	____x____ =	
DPWS-109-06	Non-occurrence of subbase settlement/upheaval.	/	____x____ =	
DPWS-109-07	Provision of required stakes.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: ____ / ____ / ____

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Site Development**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 110 Portland Cement Concrete Pavement				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-110-01	No longitudinal cracks.	/	____x____ =	
DPWS-110-02	Conformance to vibration requirement.	/	____x____ =	
DPWS-110-03	Conformance to quality of concrete mix.	/	____x____ =	
DPWS-110-04	Conformance to requirements of construction joints (outside middle thirds).	/	____x____ =	
DPWS-110-05	No through cracks (all types of cracks).	/	____x____ =	
DPWS-110-06	No scaling (severe, needs Removal and Replacement).	/	____x____ =	
DPWS-110-07	Conformance to the approved/specified tolerances for thickness, width, length, slope and cross-section. (>10% deficient)	/	____x____ =	
Minor				
DPWS-110-05	No cracks e.g. transverse, diagonal, temperature, corner, restraint.	/	____x____ =	
DPWS-110-06	No scaling.	/	____x____ =	
DPWS-110-07	Conformance to the approved/specified tolerances for thickness, width, length, slope and cross-section (<10% deficient).	/	____x____ =	
DPWS-110-08	No honeycomb.	/	____x____ =	
DPWS-110-09	No spalling.	/	____x____ =	
DPWS-110-10	No chipped-off edges.	/	____x____ =	
DPWS-110-11	Conformance to required size, location & spacing of tie bars and dowel bars as per specifications.	/		
DPWS-110-12	Conformance to proper curing procedures.	/	____x____ =	
DPWS-110-13	Utilization of templates prior to pouring.	/	____x____ =	
DPWS-110-14	Conformance to placing requirement which will not result to segregation of aggregates, cold joints, misalignment.	/	____x____ =	
DPWS-110-15	Conformance to required amount of asphalt sealant on weakened plane joints. (insufficient and excessive application)	/	____x____ =	
DPWS-110-16	Conformance to requirement of pavement blockings (include depths and widths of weakened plane joints)	/	____x____ =	
DPWS-110-17	No hardened/spilled concrete on pavement.	/	____x____ =	
DPWS-110-18	No pokemarks/tire marks/animal foot marks/skid marks, etc.	/	____x____ =	
DPWS-110-19	Conformance to proper finishing of concrete (brooming)	/	____x____ =	
DPWS-110-20	Conformance to formwork requirements (wooden, defective steel and not applied with oil/grease)	/	____x____ =	
Was subcontractor(s) used? If yes, name of company(ies) and sub-item: _____ & _____			Total Score (a)	CAR Total
			No. of Indicators (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Site Development**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score _____x factor	Action / Monitor
Item 111 Pipe Culvert and Storm Drains				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-111-01	Conformance to the required/approved tolerance for slope, alignment, elevation and dimensions.	/	= _____x_____	
Minor				
DPWS-111-02	No cracks, honeycombs, chipping of edges.	/	= _____x_____	
DPWS-111-03	Compliance to joint mortar mixing proportions.	/	= _____x_____	
DPWS-111-04	Sufficient collaring and flushing.	/	= _____x_____	
DPWS-111-05	Compliance to the required thickness, compaction & materials requirement of gravel bedding.	/	= _____x_____	
DPWS-111-06	Compliance to the required thickness & compaction of backfill.	/	= _____x_____	
DPWS-111-07	Conformance to trenching requirements.	/	= _____x_____	
DPWS-111-08	Free from debris, siltation, etc.	/	= _____x_____	
		/	= _____x_____	
Item 112 Manholes, Inlets, and Catch Basins				
Major				
DPWS-112-01	Conformance to connection requirements between pipes & inlet wall.	/	= _____x_____	
DPWS-112-02	Conformance with plans and design specifications.	/	= _____x_____	
Minor				
DPWS-112-03	No damage on manhole, inlets & catch basins.	/		
DPWS-112-04	No cracks.	/	= _____x_____	
DPWS-112-05	No honeycomb.	/	= _____x_____	
DPWS-112-06	Free from debris, siltation, etc.	/	= _____x_____	
		/	= _____x_____	
Was subcontractor(s) used? If yes, name of company(ies) and sub-item: _____ & _____ Entered by: _____ Date: / /			Total Score (a)	CAR Total
			No. of Indicators (b)	
			Rate = (a) / (b)	
			Rate	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Site Development**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 113 Riprap and Grouted Riprap				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-113-01	No through cracks	/	____x____ =	
DPWS-113-02	Conformance to specifications (size, type, weight, etc. of boulders).	/	____x____ =	
DPWS-113-03	Sufficient grout/mortar.	/	____x____ =	
DPWS-113-04	Observance to proper placing of stones/boulders.	/	____x____ =	
DPWS-113-05	Conformance to the approved/required tolerance for slope and thickness.	/	____x____ =	
DPWS-113-06	Compliance to the specified compaction and preparation of bedding.	/	____x____ =	
DPWS-113-07	Compliance to design mix of mortar.	/	____x____ =	
DPWS-113-08	Provision of weepholes.	/	____x____ =	
Minor				
DPWS-113-01	No cracks.	/	____x____ =	
DPWS-113-08	Adequate and proper spacing of weepholes.	/	____x____ =	
		/	____x____ =	
Item 114 Gabion/Mattresses				
Major	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-114-01	Conformance to the required/approved tolerances for lines, grades, dimensions and arrangements as shown on the plans and designated locations	/	____x____ =	
DPWS-114-02	Observance to proper placing of stones/boulders.	/	____x____ =	
DPWS-114-03	Conformance to specifications (size, type, weight, etc. of boulders, rocks).	/	____x____ =	
Minor				
DPWS-114-04	No misalignment, bulging	/	____x____ =	
DPWS-114-05	Conformance to the required wire mesh cage fabrication requirement	/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____ Entered by: _____ Date: / /			Total Score (a)	CAR Total
			No. of Indicators (b)	
			Rate = (a) / (b)	
			Rate	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 VISIT _____

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Site Development**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 115 Topsoil				
DPWS-115-01	Conformance to the scope of work.	/	____x____ =	
DPWS-115-02	Properly tilled.	/	____x____ =	
DPWS-115-03	Free from weeds or undesirable grasses.	/	____x____ =	
		/	____x____ =	
Item 116 Sprigging / Sodding				
DPWS-116-01	Conformance to the scope of work.	/	____x____ =	
DPWS-116-02	Healthy, dense and well rooted.	/	____x____ =	
DPWS-116-03	Free from weeds or undesirable grasses.	/	____x____ =	
		/	____x____ =	
Item 117 Ornament Plant/Tree Planting				
DPWS-117-01	Conformance to the scope of work.	/	____x____ =	
DPWS-117-02	Healthy, dense and well rooted.	/	____x____ =	
DPWS-117-03	Free from weeds or undesirable grasses.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____				CAR Total No. of Indicators (b) = Rate = (a) / (b) = Rate =
Entered by: _____				
Date: ____ / ____ / ____				

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 VISIT _____

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Site Development**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score _____x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 118 Perimeter /Seclusion Fence				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-118-01	Conformance to the approved/specified tolerance for alignment, dimension, plumbness and elevation.	/	_____x_____	
DPWS-118-02	Conformance to required quality of CHB	/	_____x_____	
DPWS-118-03	Conformance to required quality of mortar mix	/	_____x_____	
Minor				
DPWS-118-04	Proper spacing of horizontal and vertical bars.	/	_____x_____	
DPWS-118-05	Rebars used free from corrosion.	/	_____x_____	
DPWS-118-06	Installed according to plans and specifications.	/	_____x_____	
DPWS-118-07	Conformance to the specified/designed depth of fence footings.	/	_____x_____	
DPWS-118-08	Conformance to the specified/designed length of fence per bay.	/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	
		/	_____x_____	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: ____ / ____ / ____

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Site Development**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 119 Gate/GuardHouse				
DPWS-119-01	Conformance to the approved/specified tolerance for alignment, dimension, and plumbness	/	____x____ =	
DPWS-119-02	Installed according to plans and specifications.	/	____x____ =	
Item 120 Outdoor, Roadway and Perimeter Lighting System				
DPWS-120-01	Conformance of in-placed materials to plans and specifications.	/	____x____ =	
DPWS-120-02	Provision of waterproofed structure implement for outdoor illumination.	/	____x____ =	
DPWS-120-03	Conformance to the required dimension of lighting poles (height, diameter)	/	____x____ =	
DPWS-120-04	Proper installation of lighting poles and fixtures (bulbs, switches, wires, cables, load break switch, power fuse, lightning arrester).	/	____x____ =	
DPWS-120-05	Proper installation of electrical wiring resulting to non-peeling-off of insulation.	/	____x____ =	
DPWS-120-06	Proper installation of conduit pipes.	/	____x____ =	
DPWS-120-07	Provision of concrete encasement for pipes and conduits.	/	____x____ =	
		/	____x____ =	
Item 121 Deepwell Drilling and Development				
Major				
DPWS-121-01	Drilled and developed according to plans and specifications.	/	____x____ =	
DPWS-121-02	Complied and passed draw down tests.	/	____x____ =	
DPWS-121-03	Water quality complied and passed test requirements.	/	____x____ =	
Minor				
DPWS-121-04	Drilling method suited to condition of deep well site to be drilled.	/	____x____ =	
DPWS-121-05	Method of placing the formation stabilizer/gravel pack in the annulus are done in such a way that separation of gravel and bridging are avoided.	/	____x____ =	
DPWS-121-06	Well is cleaned in accordance with the specified method.	/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: ____ / ____ / ____			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
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PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Site Development**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 122 Deepwell Submersible Pump				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-122-01	Complied and passed required test.	/	____x ____ =	
		/	____x ____ =	
Minor				
DPWS-122-02	Installed according to plans and specifications complete with controls and accessories.	/	____x ____ =	
DPWS-122-03	Provision of steel guard on power cable along the well casing.	/	____x ____ =	
DPWS-122-04	Pump is operated in conjunction with the level controller installed at the water tank.	/	____x ____ =	
DPWS-122-05	Provision of uPVC conduits for underground power cables.	/	____x ____ =	
		/	____x ____ =	
		/	____x ____ =	
Item 123 Elevated Steel Water Tank				
Major				
DPWS-123-01	Tank parts and support structure are installed in accordance with plans and specifications.	/	____x ____ =	
DPWS-123-02	Complied and passed required leak tests.	/	____x ____ =	
DPWS-123-03	Free from corrosion and any form of damages.	/	____x ____ =	
		/	____x ____ =	
Minor				
DPWS-123-03	Free from rust and any form of damages.	/	____x ____ =	
DPWS-123-04	Installed according to plan complete with control and accessories (i.e., balcony with handrail, access caged ladder, air vent, water level indicator, overflow pipe, inlet-outlet piping, drain valves and fittings, level switch attachment, access hatch, beacon red warning light).	/	____x ____ =	
DPWS-123-05	Structural members free of twist, bends and deformations.	/	____x ____ =	
		/	____x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
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PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Site Development**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 124 Domestic Water Supply Piping System				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-124-01	Installed pipes, fittings and valves conformed to plans and specifications.	/	____x____ =	
DPWS-124-02	Water line laid not less than 1.0 meter from sewer lines.	/	____x____ =	
DPWS-124-03	Complied and passed hydraulic and leak tests.	/	____x____ =	
Minor				
DPWS-124-04	Pipes laid free from dirt or other foreign materials.	/	____x____ =	
DPWS-124-05	Provision of pipe sleeves for pipes crossing roadways.	/	____x____ =	
DPWS-124-06	Provision of temporary pipe blind flange/caps at both ends during installation.	/	____x____ =	
DPWS-124-07	Potable water lines are disinfected prior to use.	/	____x____ =	
		/	____x____ =	
Item 125 Gravel Surfacing				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-125-01	Complied to the required thickness of gravel surfacing as indicated in the drawings and specifications.	/	____x____ =	
DPWS-125-02	Complied to the appropriate placement workmanship in placing, spreading, compacting of gravel as specified in the drawings or specifications	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Rate = (a) / (b) =	
Entered by: _____		Date: ____ / ____ / ____	Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 VISIT _____

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Site Development**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score _____x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 126 Concrete Drainage Canals				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-126-01	Adherence to proper construction methodology.	/	_____x _____ =	
DPWS-126-02	Conformance with approved/specified tolerances for lines, grades, cross-sections, elevations & dimensions as specified in the drawings and specifications.	/	_____x _____ =	
DPWS-126-03	Non-displacement of in-placed concrete canal linings	/	_____x _____ =	
Minor				
DPWS-126-04	Conformance to the location of construction joints as shown in the drawing or indicated in the specifications	/	_____x _____ =	
DPWS-126-05	Conformance to the jointing requirements.	/	_____x _____ =	
		/	_____x _____ =	
Item 127 Oil-Water Separator				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-127-01	Adherence to proper construction methodology.	/	_____x _____ =	
DPWS-127-02	Conformance with approved/specified cross-sections, elevations & dimensions as indicated in the drawings and specifications.	/	_____x _____ =	
DPWS-127-03	Adherence to proper connection of the outlet pipe to main sewer system	/	_____x _____ =	
DPWS-127-04	Compliance to the environmental requirement	/	_____x _____ =	
		/	_____x _____ =	
Item 128 Rockwall/Retaining Wall				
DPWS-128-01	Conformance with approved/required tolerances for slopes, thickness, alignment, elevations and dimensions as indicated in the drawings and specifications.	/	_____x _____ =	
DPWS-128-02	Conformance to the required size, type, weight and quality of rock and boulder materials to be used as indicated in plans and specifications.	/	_____x _____ =	
DPWS-128-03	Observance to the proper placing and laying of stones and boulders.	/	_____x _____ =	
DPWS-128-04	Conformance with the provision of weepholes and the required spacing.	/	_____x _____ =	
DPWS-128-05	Compliance to the design mix of mortar and the sufficiency of grout.	/	_____x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____ Entered by: _____ Date: ____ / ____ / ____		Total Score (a)		CAR Total
		=		
		No. of Indicators (b)		
		=		
		Rate = (a) / (b)		
		=		
		Rate		
		=		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Powerhouse**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score ____x factor	Action / Monitor
Item 200 Fill and Selected Fill				
DPWS-200-01	Conformance of in-placed materials according to plans and specifications	/	____x____ =	
DPWS-200-02	Conformance to the required thickness of fill or backfill per layer.	/	____x____ =	
DPWS-200-03	Conformance to the required density or degree of compaction	/	____x____ =	
		/	____x____ =	
Item 201 Soil Poisoning				
DPWS-201-01	Conformance to the specified concentration of soil poisoning solution.	/	____x____ =	
DPWS-201-02	Conformance to the specified rate of application.	/	____x____ =	
		/	____x____ =	
Item 202 CHB Wall				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-202-01	Conformance to required dimensions, location, plumbness and alignment.	/	____x____ =	
DPWS-202-02	Conformance to required quality of CHB as stipulated in the specifications	/	____x____ =	
DPWS-202-03	Conformance to required quality of mortar mix.	/	____x____ =	
		/	____x____ =	
Minor				
DPWS-202-01	Conformance to specified tolerances for dimension, location, plumbness and alignment.	/	____x____ =	
DPWS-202-04	Proper spacing of horizontal and vertical bars.	/	____x____ =	
DPWS-202-05	Rebars used free from corrosion.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: ____ / ____ / ____

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Powerhouse**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score _____x factor	Action / Monitor
Item 203 Brick Wall				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-203-01	Conformance to required dimensions, location, plumbness and alignment.	/	= _____x _____	
DPWS-203-02	Conformance to required quality of bricks as stipulated in the specifications	/	= _____x _____	
DPWS-203-03	Conformance to required quality of mortar mix.	/	= _____x _____	
Minor				
DPWS-203-01	Conformance to specified tolerances for dimension, location, plumbness and alignment.	/	= _____x _____	
DPWS-203-04	Proper spacing of horizontal and vertical bars.	/	= _____x _____	
DPWS-203-05	Rebars used free from corrosion.	/	= _____x _____	
		/	= _____x _____	
Item 204 Tiled Finish				
DPWS-204-01	Installed tiles free from chipping, cracks or any form of damage	/	= _____x _____	
DPWS-204-02	Mortar/Grout consistency and color conformed to specification	/	= _____x _____	
DPWS-204-03	Tiles are evenly placed or laid on.	/	= _____x _____	
DPWS-204-04	Tiles in wet areas are sloped toward the drain.	/	= _____x _____	
DPWS-204-05	Tiles are properly bonded to the floor or walls.	/	= _____x _____	
		/	= _____x _____	
Item 205 Trowelled Floor Finish				
DPWS-205-01	Smooth and even floor finish.	/	= _____x _____	
DPWS-205-02	No temperature cracks.	/	= _____x _____	
DPWS-205-03	No sign of deflection/settlement.	/	= _____x _____	
		/	= _____x _____	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: ____ / ____ / ____		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Powerhouse**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 206 Pebble Washout				
DPWS-206-01	Installed pebbles are evenly distributed.	/	____x____ =	
DPWS-206-02	No temperature cracks.	/	____x____ =	
DPWS-206-03	Installed pebbles surface are thoroughly clean from cement.	/	____x____ =	
		/	____x____ =	
Item 207 Waterproofing				
DPWS-207-01	Conforms to specified method of application.	/	____x____ =	
DPWS-207-02	Conforms to number of coats/layers required.	/	____x____ =	
DPWS-207-03	Passed required leak test.	/	____x____ =	
DPWS-207-04	Conformance to the required materials specifications as per plan.	/	____x____ =	
		/	____x____ =	
Item 208 Wall Paper				
DPWS-208-01	Smooth and evenly pasted.	/	____x____ =	
DPWS-208-02	Free from scratches, stains, etc.	/	____x____ =	
		/	____x____ =	
Item 209 Wall Plaster Finish				
DPWS-209-01	Conformance to designed mixture of plastering materials.	/	____x____ =	
DPWS-209-02	Conformance to specified method of application and thickness of plastering.	/	____x____ =	
DPWS-209-03	True to alignment.	/	____x____ =	
DPWS-209-04	Free from any form of damages, e.g. cracks, peeled-off plaster finish	/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Powerhouse**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score _____x factor	Action / Monitor
Item 210 Wall Cladding				
DPWS-210-01	Panels properly anchored.	/	_____ x _____ =	
DPWS-210-02	True to alignment, plumbness.	/	_____ x _____ =	
DPWS-210-03	Free from any form of damages.	/	_____ x _____ =	
DPWS-210-04	Panels conform to construction procedure.	/	_____ x _____ =	
		/	_____ x _____ =	
Item 211 Wall/Roof Painting				
DPWS-211-01	Surface prepared according to specification.	/	_____ x _____ =	
DPWS-211-02	Required neutralizers, etc. applied.	/	_____ x _____ =	
DPWS-211-03	Applied paint appropriate to the surface.	/	_____ x _____ =	
DPWS-211-04	Specified number of coats applied.	/	_____ x _____ =	
DPWS-211-05	Surfaces evenly painted, proper opacity.	/	_____ x _____ =	
DPWS-211-06	No discoloration and peeling-off of paint.	/	_____ x _____ =	
DPWS-211-07	Paints conform to specification/requirements.	/	_____ x _____ =	
DPWS-211-08	Surfaces are properly applied with putty/patching compound.	/	_____ x _____ =	
		/	_____ x _____ =	
Item 212 Ceiling Suspension				
DPWS-212-01	Conformance to the specified spacing and length of hangers, clips and joists.	/	_____ x _____ =	
DPWS-212-02	Installed hangers are properly anchored and firm.	/	_____ x _____ =	
DPWS-212-03	True to alignment and elevation in conformance to the approved specified tolerance.	/	_____ x _____ =	
DPWS-212-04	Free from any form of damage.	/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____ Date: ____ / ____ / ____			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Powerhouse**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score _____x factor	Action / Monitor
Item 213 Ceiling Board				
DPWS-213-01	Materials free from any form of damage.	/	_____X_____ =	
DPWS-213-02	Smooth surface and true to elevation and alignment.	/	_____X_____ =	
DPWS-213-03	Location of holes for utilities conforms to plans.	/	_____X_____ =	
DPWS-213-04	Ceiling boards are properly fastened.	/	_____X_____ =	
		/	_____X_____ =	
Item 214 Ceiling Moulding				
DPWS-214-01	True to elevation and alignment.	/	_____X_____ =	
DPWS-214-02	Installed materials are free from any form of damages.	/	_____X_____ =	
		/	_____X_____ =	
Item 215 Roofing Frames				
DPWS-215-01	Conformance to the required size, spacing, slope, anchorage, etc.	/	_____X_____ =	
DPWS-215-02	Free from any form of damage.	/	_____X_____ =	
DPWS-215-03	Cleats are properly provided.	/	_____X_____ =	
DPWS-215-04	Application of paint primer prior to installation	/	_____X_____ =	
		/	_____X_____ =	
Item 216 Roofing Sheets				
DPWS-216-01	Conformance to the specified gauge, length, etc.	/	_____X_____ =	
DPWS-216-02	Conformance to the specified overlapping, sealing of joints, fastening.	/	_____X_____ =	
DPWS-216-03	Installation of flashing, gutters, ridge rolls, downspouts, etc., according to plans.	/	_____X_____ =	
DPWS-216-04	Non-occurrence of leaks.	/	_____X_____ =	
DPWS-216-05	Free from any form of damage.	/	_____X_____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b)	
Date: ____ / ____ / ____			Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Powerhouse**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score ____x factor	Action / Monitor
Item 217 Doors				
DPWS-217-01	True to alignment, plumbness in conformance to the approved/specified tolerance.	/	____x____ =	
DPWS-217-02	Doors are well fitted to the door frames.	/	____x____ =	
DPWS-217-03	Door accessories installed according to plans, e.g. locksets, door closers, hinges, door stoppers.	/	____x____ =	
DPWS-217-04	Free from any form of damage.	/	____x____ =	
DPWS-217-05	Doors conform to specification requirements, e.g. panel door, flush door polyvinyl, steel doors, etc.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 218 Windows				
DPWS-218-01	True to alignment and elevation in conformance to the approved/specified tolerance.	/	____x____ =	
DPWS-218-02	Windows are well fitted to the window frames.	/	____x____ =	
DPWS-218-03	Window accessories installed according to plans, e.g. handles, seals, glazing for glass window, etc.	/	____x____ =	
DPWS-218-04	Free from any form of damage.	/	____x____ =	
DPWS-218-05	Windows conform to specification requirements, e.g. sliding, jalousies (glass and wooden) steel casement windows	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 219 Railings				
DPWS-219-01	Installed according to plans.	/	____x____ =	
DPWS-219-02	Free from dents, scratches or any form of damage.	/	____x____ =	
DPWS-219-03	Bends and curves are smooth.	/	____x____ =	
DPWS-219-04	Conforms to approved tolerance size, dimension, height and type, e.g. concrete, steel, stainless, aluminum, etc.	/	____x____ =	
		/	____x____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
No. of Indicators (b)	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **DIESEL POWER PLANT**

ITEM: **Powerhouse**

_____ VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score ____x factor	Action / Monitor
Item 220 Plumbing				
DPWS-220-01	Pipes installed according to plans, e.g. slope, alignment, location, bracings/supports.	/	____x____ =	
DPWS-220-02	Conducted and passed the required leak test.	/	____x____ =	
DPWS-220-03	Pipes not clogged.	/	____x____ =	
DPWS-220-04	Free from any form of damages.	/	____x____ =	
DPWS-220-05	Fixtures and accessories installed according to plans, e.g. height, alignment, location.	/	____x____ =	
DPWS-220-06	Adhesive conform to specification.	/	____x____ =	
DPWS-220-07	Water closet, lavatory conform to specification.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Item 221 Sanitary				
DPWS-221-01	Pipes installed according to plans, e.g. slope, alignment, location, bracings/supports.	/	____x____ =	
DPWS-221-02	Conducted and passed the required pressure/leak test.	/	____x____ =	
DPWS-221-03	Pipes not clogged.	/	____x____ =	
DPWS-221-04	Free from any form of damages.	/	____x____ =	
DPWS-221-05	Fixtures and accessories installed according to plans, e.g. height, alignment, location.	/	____x____ =	
DPWS-221-06	Adhesives conform to specifications.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner : _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **DIESEL POWER PLANT**

ITEM: **Powerhouse**

_____ VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 222 Structural Steel Works				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-222-01	Conformance of in-placed materials to plans and specifications.	/	____x____ =	
DPWS-222-02	Conformance to required fasteners, anchor bolts, bolts/nuts and washers (not provided).	/	____x____ =	
DPWS-222-03	Free from corrosion and any other form of damages.	/	____x____ =	
DPWS-222-04	Conformance to splicing requirements.	/	____x____ =	
Minor				
DPWS-222-03	Free from rust and any other form of damages.	/	____x____ =	
DPWS-222-06	Conformance to the specified type of welding.	/	____x____ =	
DPWS-222-07	Fasteners, anchor bolts, bolts/nuts & washers conforms to specified size, strength, etc.	/	____x____ =	
DPWS-222-08	Installed according to plans.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
Entered by: _____			Rate = (a) / (b) =	
Date: ____ / ____ / ____			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
LOCATION: _____

ITEM: **Powerhouse**
DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS	Results	Score x factor	Action / Monitor
	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 223 Electrical Works				
DPWS-223-01	Pipes installed according to plans and laid out according to approved construction drawings.	/	_____X_____	
DPWS-223-02	Pipes, hangers, boxes, gutters, cable trays properly installed and painted, sharp edges of pipes removed.	/	_____X_____	
DPWS-223-03	Pipes properly bended.	/	_____X_____	
DPWS-223-04	Allowable number of wires in a pipe properly observed.	/	_____X_____	
DPWS-223-05	Splicing and connection provided with adequate rubber and pvc tapes.	/	_____X_____	
DPWS-223-06	Adequate length of wire provided for termination and splicing.	/	_____X_____	
DPWS-223-07	Wire color coding complied and observed.	/	_____X_____	
DPWS-223-08	Wire insulation not damaged during pulling.	/	_____X_____	
DPWS-223-09	Adequate number, correct size and gauge of pull boxes installed and properly covered.	/	_____X_____	
DPWS-223-10	Boxes and enclosures provided according to intended purpose.	/	_____X_____	
DPWS-223-11	Fittings and accessories provided and properly installed.	/	_____X_____	
DPWS-223-12	Block-outs and sleeves provided and properly secured.	/	_____X_____	
DPWS-223-13	Cable ties provided.	/	_____X_____	
DPWS-223-14	Blank covers provided for outlets and switches that are not utilized.	/	_____X_____	
DPWS-223-15	Use of tools and equipment properly observed.	/	_____X_____	
DPWS-223-16	Lighting fixtures, panel boards, circuit breakers, etc. properly installed and free from any form of damages.	/	_____X_____	
DPWS-223-17	Meager, clamp, phase sequence tests and load test conducted.	/	_____X_____	
DPWS-223-18	Shop drawings, as-built plan maintained.	/	_____X_____	
		/	_____X_____	
		/	_____X_____	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: ____ / ____ / ____

Total Score (a)	CAR Total
No. of Indicators (b)	
Rate = (a) / (b)	
Rate	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 VISIT _____

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Powerhouse**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score _____x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 224 Air Conditioning System				
DPWS-224-01	Air-conditioning units, transfer fans, pipes, ducts, condensers are installed according to plans.	/	_____X_____ =	
DPWS-224-02	Jointing of pipes and ducts conform to specified jointing system.	/	_____X_____ =	
DPWS-224-03	Pipes and ducts free from leaks.	/	_____X_____ =	
DPWS-224-04	Pipes and ducts sufficiently braced/supported.	/	_____X_____ =	
DPWS-224-05	Installed materials free from any form of damage.	/	_____X_____ =	
DPWS-224-06	Conducted and passed the required tests.	/	_____X_____ =	
		/	_____X_____ =	
Item 225 Ventilation System				
DPWS-225-01	Conformance to the design specifications and drawings.	/	_____X_____ =	
DPWS-225-02	Casing free from dent.	/	_____X_____ =	
DPWS-225-03	Conducted and passed the required tests.	/	_____X_____ =	
		/	_____X_____ =	
Item 226 Septic Vaults				
DPWS-226-01	Adherence to proper construction methodology	/	_____X_____ =	
DPWS-226-02	Conformance with approved/specified for lines, grades, cross-section, elevation, & dimensions as indicated in drawing.	/	_____X_____ =	
DPWS-226-03	Adherence to proper connection of the outlet pipe to main sewer.	/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
		/	_____X_____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b)	
Date: ____/____/____			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Equipment Foundations**

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 300 Fill / Sand and Gravel Bedding				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-300-01	Conformance of in-placed materials to plans and specifications.	/	____x____ =	
DPWS-300-02	Conformance to the required thickness of bedding and of fill per layer	/	____x____ =	
DPWS-300-03	Conformance to the required density or degree of compaction	/	____x____ =	
Minor				
DPWS-300-04	Conformance to ground level restoration.	/	____x____ =	
		/	____x____ =	
Item 301 Lean Concrete				
DPWS-301-01	Adherence to proper construction methodology.	/	____x____ =	
DPWS-301-02	Conformance to the required thickness and strength	/	____x____ =	
		/	____x____ =	
Item 302 Anchor Bolt Setting				
Major	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-302-01	Conformance to the anchor bolt setting dimensions.	/	____x____ =	
DPWS-302-02	Precise setting of template.	/	____x____ =	
Minor				
DPWS-302-03	Anchor bolts and templates fix with supporter.	/	____x____ =	
		/	____x____ =	
Item 303 Epoxy and Non-cementitious Grouting				
DPWS-303-01	Conformance to the required workmanship in mixing, placing, spreading, compacting, curing and surface finishing as showing on drawing or indicated in the specifications.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____ Entered by: _____ Date: ____ / ____ / ____		Total Score (a) = No. of Indicators (b) = Rate = (a) / (b) = Rate =		CAR Total =

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Equipment**
Foundations
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS	Results	Score ____x factor	Action / Monitor
	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 304 Cable Trench Cover and Supports				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-304-01	Provision of block-outs for installation of metal works.	/	____x____ =	
DPWS-304-02	Metal works and materials installed in accordance to the details shown in the drawing (alignment, position).	/	____x____ =	
DPWS-304-03	Block-outs were grouted after installation of metal works.	/	____x____ =	
		/	____x____ =	
Item 305 Gravel Surfacing				
Major				
DPWS-305-01	Conformance to required lines, grades and thickness.	/	____x____ =	
Minor				
DPWS-305-02	Compliance to the specified construction methodology.	/	____x____ =	
DPWS-305-03	No oversize/undersize of in-placed materials.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: ____ / ____ / ____

Total Score (a) =	CAR Total
No. of Indicators (b) =	
Rate = (a) / (b) =	
Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Common Items**
of Works
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score _____ x factor	Action / Monitor
Item 400 Excavation				
DPWS-400-01	Conformance to the approved/specified tolerance for lines, grades, dimensions and elevations.	/	_____ x _____ =	
DPWS-400-02	Conformance to the excavation support system, (e.g. angle of repose, bracing, shoring, sheet piling)	/	_____ x _____ =	
		/	_____ x _____ =	
Item 401 Backfill				
DPWS-401-01	Conformance of in-placed materials to plans and specifications.	/	_____ x _____ =	
DPWS-401-02	Conformance to the required thickness of backfill per layer	/	_____ x _____ =	
DPWS-401-03	Conformance to the required density or degree of compaction	/	_____ x _____ =	
		/	_____ x _____ =	
Item 402 Formworks				
DPWS-402-01	Conformance to the required type of formworks in accordance with approved shop/working drawings	/	_____ x _____ =	
DPWS-402-02	Forms coated with mould oil as required	/	_____ x _____ =	
DPWS-402-03	Sufficient bracing/support provided	/	_____ x _____ =	
DPWS-402-04	No loose knots, splits, cracks, etc.	/	_____ x _____ =	
DPWS-402-05	Provision of required concrete or steel spacer	/	_____ x _____ =	
DPWS-402-06	Conformance to dimensions, location, plumbness and alignment	/	_____ x _____ =	
DPWS-402-07	No use of dilapidated/salvage forms (use more than 3x)	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____ Date: ____ / ____ / ____			No. of Indicators (b) =	
			Rate= (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Common Items
 of Works**
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____x factor	Action / Monitor
Item 403 Reinforcing Steel Bars (including tendons for Pre/Post-Stressed Concrete)				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-403-01	Conformance of in-placed materials to plans and specifications.	/	_____x_____ =	
DPWS-403-02	No appearance of corrosion on steel reinforcement.	/	_____x_____ =	
Minor				
DPWS-403-02	No appearance of corrosion on steel reinforcement.	/	_____x_____ =	
DPWS-403-03	Conformance to approved bar cutting schedule, proper spacing, anchorage and adequate reinforcements.	/	_____x_____ =	
DPWS-403-04	No sign of oil, paint and other deleterious materials on reinforcements.	/	_____x_____ =	
DPWS-403-05	Conformance to jointing requirement, i.e. splicing, welding, etc.	/	_____x_____ =	
DPWS-403-06	Conformance to proper bending of stirrups	/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a) =	CAR Total
No. of Indicators (b) =	
Rate= (a) / (b) =	
Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: **DIESEL POWER PLANT**
 LOCATION: _____

ITEM: **Common Items
 of Works**

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 404 Concrete				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-404-01	No through cracks.	/	____x____ =	
DPWS-404-02	No honeycomb (no exposed rebars/aggregates)	/	____x____ =	
DPWS-404-03	No evidence of sagging or bulging.	/	____x____ =	
DPWS-404-04	Conformance to required quality of concrete mix	/	____x____ =	
DPWS-404-05	Conformance to the required concrete cover for rebars.	/	____x____ =	
DPWS-404-06	Conformance to the jointing requirement.	/	____x____ =	
DPWS-404-07	Conformance to placing requirement that will not result segregation of aggregates, cold joints and misalignment.	/	____x____ =	
Minor				
DPWS-404-01	No cracks.	/	____x____ =	
DPWS-404-02	No honeycomb.	/	____x____ =	
DPWS-404-03	No sagging or bulging.	/	____x____ =	
DPWS-404-05	Conformance to the required concrete cover for rebars.	/	____x____ =	
DPWS-404-06	Conformance to the jointing requirement.	/	____x____ =	
DPWS-404-07	Conformance to placing requirement that will not result segregation of aggregates, cold joints and misalignment.	/	____x____ =	
DPWS-404-08	Proper and adequate vibration.	/	____x____ =	
DPWS-404-09	Conformance to finishing/plastering requirement.	/	____x____ =	
DPWS-404-10	No chipping off of concrete cover.	/	____x____ =	
DPWS-404-11	Conformance to the batching, mixing, transporting and discharge time requirements.	/	____x____ =	
DPWS-404-12	Proper curing.	/	____x____ =	
DPWS-404-13	Conformance to required dimensions, lines, grades/elevation, location.	/	____x____ =	
		/	____x____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: ____ / ____ / ____

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate= (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: **Diesel Power Plant**
 LOCATION: _____

ITEM: **Equipment Installation**
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____ x factor	Action / Monitor
Item 500 Diesel Generator Set and its appurtenances				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-500-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-500-02	Conducted and passed all required pre commissioning and commissioning tests.	/	____ x ____ =	
		/	____ x ____ =	
Minor				
DPWS-500-03	Connections are properly secured by bolts, nuts, locknuts and washers.	/	____ x ____ =	
DPWS-500-04	Conformance with specified tolerances for plumbness and alignment.	/	____ x ____ =	
DPWS-500-05	No damage/defective component parts.	/	____ x ____ =	
		/	____ x ____ =	
Item 501 Fuel Oil System				
Major				
DPWS-501-01	Fuel Oil Storage Tanks, Pumps, piping and other equipment and components are installed according to approved plans and specifications.	/	____ x ____ =	
SSWS-501-02	Conducted and passed the required tests.	/	____ x ____ =	
		/	____ x ____ =	
Minor				
DPWS-501-03	Connections are properly secured by bolts, nuts, locknuts and washers.	/	____ x ____ =	
DPWS-501-04	Conformance with specified tolerances for plumbness and alignment.	/	____ x ____ =	
DPWS-501-05	No damage/defective component parts.	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
			Total Score (a)	CAR Total
			No. of Indicators (b)	
			Rate = (a) / (b)	
			Rate	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: ____ / ____ / ____

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: Diesel Power Plant
 LOCATION: _____

ITEM: Equipment Installation
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____ x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 502 Cooling System				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-502-01	Cooling Water Storage Tanks, Pumps, piping and other equipment and components are installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-502-02	Conducted and passed the required tests.	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	
Minor				
DPWS-502-03	Connections are properly secured by bolts, nuts, locknuts and washers.	/	____ x ____ =	
DPWS-502-04	Conformance with specified tolerances for plumbness and alignment.	/	____ x ____ =	
DPWS-502-05	No damage/defective parts and materials.	/	____ x ____ =	
		/	____ x ____ =	
Item 503 Cooling Water Supply System				
Major	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-503-01	Water Storage Tanks, Pumps, piping and other equipment and components are installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-503-02	Conducted and passed the required tests.	/	____ x ____ =	
		/	____ x ____ =	
Minor				
DPWS-503-03	Connections are properly secured by bolts, nuts, locknuts and washers.	/	____ x ____ =	
DPWS-503-04	Conformance with specified tolerances for plumbness and alignment.	/	____ x ____ =	
DPWS-503-05	No damage/defective component parts.	/	____ x ____ =	
		/	____ x ____ =	
		/	____ x ____ =	

Was subcontractor used? If yes, name of company and owner :

Entered by: _____

Date: ____ / ____ / ____

Total Score (a)	CAR Total
No. of Indicators (b)	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 VISIT _____

PROJECT TYPE: **Diesel Power Plant**
 LOCATION: _____

ITEM: **Equipment Installation**
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____x factor	Action / Monitor
Item 504 Lubrication Oil System				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-504-01	Lube Oil Tanks, Pumps, Filtering equipment and piping and other equipment and components are installed according to approved plans and specifications.	/	____x____ =	
DPWS-504-02	Conducted and passed the required tests.	/	____x____ =	
		/	____x____ =	
Minor				
DPWS-504-03	Connections are properly secured by bolts, nuts, locknuts and washers.	/	____x____ =	
DPWS-504-04	Conformance with specified tolerances for plumbness and alignment.	/	____x____ =	
DPWS-504-05	No damage/defective component parts.	/	____x____ =	
		/	____x____ =	
Item 505 Compressed Air System				
Major				
DPWS-505-01	Air Compressors, Receivers and piping and other equipment and components are installed according to approved plans and specifications.	/	____x____ =	
DPWS-505-02	Conducted and passed the required tests.	/	____x____ =	
		/	____x____ =	
Minor				
DPWS-505-03	Connections are properly secured by bolts, nuts, locknuts and washers.	/	____x____ =	
DPWS-505-04	Conformance with specified tolerances for plumbness and alignment.	/	____x____ =	
DPWS-505-05	No damage/defective component parts.	/	____x____ =	
		/	____x____ =	
		/	____x____ =	
		/	____x____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____ Date: ____ / ____ / ____			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: **Diesel Power Plant**
 LOCATION: _____

ITEM: **Equipment Installation**
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score _____x factor	Action / Monitor
Code	<i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>			
Item 506 Exhaust System				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-506-01	Exhaust Pipe and its support assembly are installed according to approved plans and specifications.	/	_____x_____ =	
		/	_____x_____ =	
Minor				
DPWS-506-02	Connections are properly secured by bolts, nuts, locknuts and washers.	/	_____x_____ =	
DPWS-506-03	Conformance with specified tolerances for plumbness and alignment.	/	_____x_____ =	
DPWS-506-04	No damage/defective parts and materials.	/	_____x_____ =	
		/	_____x_____ =	
Item 507 Domestic Water Supply System				
Major				
DPWS-507-01	Water Storage Tanks, Pumps, piping and other equipment and components are installed according to approved plans and specifications.	/	_____x_____ =	
DPWS-507-02	Conducted and passed the required tests.	/	_____x_____ =	
		/	_____x_____ =	
Minor				
DPWS-507-03	Connections are properly secured by bolts, nuts, locknuts and washers.	/	_____x_____ =	
DPWS-507-04	Conformance with specified tolerances for plumbness and alignment.	/	_____x_____ =	
DPWS-507-05	No damage/defective component parts.	/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____ Date: ____ / ____ / ____			No. of Indicators (b) =	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: **Diesel Power Plant**
 LOCATION: _____

ITEM: **Equipment Installation**
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____ x factor	Action / Monitor
Item 508 Power Transformer				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-508-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-508-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
DPWS-508-03	Properly aligned and leveled.	/	____ x ____ =	
DPWS-508-04	Appurtenants are clean and free from damages.	/	____ x ____ =	
DPWS-508-05	Tanks, conservator, radiators coolers and fittings are free from oil leaks.	/	____ x ____ =	
DPWS-508-06	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____ Date: ____ / ____ / ____			No. of Indicators (b)	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: **Diesel Power Plant**
 LOCATION: _____

ITEM: **Equipment Installation**
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____ x factor	Action / Monitor
Item 509 Power Circuit Breaker				
Major				
DPWS-509-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-509-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
DPWS-509-03	Mounting bases are properly aligned and leveled.	/	____ x ____ =	
DPWS-509-04	Installed materials are free from damages.	/	____ x ____ =	
DPWS-509-05	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Item 510 Station Service Transformer				
Major				
DPWS-510-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-510-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
DPWS-510-03	Provision of proper ventilaton from the base of the finish ground level for cooling purposes.	/	____ x ____ =	
DPWS-510-04	Properly aligned and leveled.	/	____ x ____ =	
DPWS-510-05	Radiators and coolers are free from oil leaks.	/	____ x ____ =	
DPWS-510-06	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____ Date: ____ / ____ / ____			No. of Indicators (b)	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: **Diesel Power Plant**
 LOCATION: _____

ITEM: **Equipment Installation**
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____ x factor	Action / Monitor
Item 511 Kilowatt Hour Billing Meter				
Major				
DPWS-511-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-511-02	Properly calibrated prior to installation.	/	____ x ____ =	
DPWS-511-03	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
DPWS-511-04	Installed materials are free from damages.	/	____ x ____ =	
DPWS-511-05	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Item 512 Current Transformer				
Major				
DPWS-512-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-512-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
DPWS-512-03	Installed materials are free from damages.	/	____ x ____ =	
DPWS-512-04	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Item 513 Potential/Voltage Transformer				
Major				
DPWS-513-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-513-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
DPWS-513-03	Installed materials are free from damages.	/	____ x ____ =	
DPWS-513-04	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b)	
Date: ____ / ____ / ____			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: **Diesel Power Plant**
 LOCATION: _____

ITEM: **Equipment Installation**
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____ x factor	Action / Monitor
Code	<small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>			
Item 514 Metal Clad Switchgear				
Major				
DPWS-514-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-514-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
DPWS-514-02	Stationary and moving assembly are properly aligned.	/	____ x ____ =	
DPWS-514-03	Installed materials are free from damage.	/	____ x ____ =	
DPWS-514-04	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Item 515 Disconnect / Earthing Switch				
Major*	<small>* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects</small>			
DPWS-515-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-515-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
DPWS-515-03	Moving parts are properly aligned and leveled.	/	____ x ____ =	
DPWS-515-04	Installed materials are free from damages.	/	____ x ____ =	
DPWS-515-05	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____ Entered by: _____ Date: ____ / ____ / ____		Total Score (a)		CAR Total
		No. of Indicators (b)		
		Rate = (a) / (b)		
		Rate		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____

PROJECT TYPE: **Diesel Power Plant**

ITEM: **Equipment Installation**

_____ VISIT

LOCATION: _____

DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____ x factor	Action / Monitor
Item 516 Power, Control & Protection Panel				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-516-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-516-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
DPWS-516-03	Terminal lugs are grip insulated.	/	____ x ____ =	
DPWS-516-04	Conformance to proper wirings, markings, tags and ties.	/	____ x ____ =	
DPWS-516-05	Installed materials are free from damage.	/	____ x ____ =	
DPWS-516-06	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Item 517 Surge/Lightning Arrester				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-517-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-517-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
DPWS-517-03	Installed materials are free from damage.	/	____ x ____ =	
DPWS-517-04	Discharge counter and cable are properly braced and connected to ground mat.	/	____ x ____ =	
DPWS-517-05	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a)		CAR Total
Entered by: _____		No. of Indicators (b)		
Date: ____ / ____ / ____		Rate = (a) / (b)		
		=		
		Rate		
		=		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: **Diesel Power Plant**
 LOCATION: _____

ITEM: **Equipment Installation**
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item	INDICATORS	Results	Score ____ x factor	Action / Monitor
Code	<small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>			
Item 518 Uninterruptible Power Supply				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-518-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-518-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
DPWS-518-03	Seismic anchor and clamping device are fixed to foundation.	/	____ x ____ =	
DPWS-518-04	Termination of conductors to terminal blocks are provided with terminal lugs, insulated and gripped.	/	____ x ____ =	
DPWS-518-05	Conformance to proper wirings, markings, tags and ties.	/	____ x ____ =	
DPWS-518-06	No splicing of wires.	/	____ x ____ =	
DPWS-518-07	Maximum of two lines are connected to one terminal block point.	/	____ x ____ =	
DPWS-518-08	Approved as-built drawings maintained.	/	____ x ____ =	
Item 519 Storage Battery				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-519-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-519-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
DPWS-519-03	Battery racks are free from rust/corrosion.	/	____ x ____ =	
DPWS-519-04	Current carrying parts are properly insulated.	/	____ x ____ =	
DPWS-519-05	No damage/defect in any material.	/	____ x ____ =	
DPWS-519-06	Battery rooms are properly ventilated with exhaust fan and sealed to prevent entry of dust.	/	____ x ____ =	
DPWS-519-07	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____ Entered by: _____ Date: ____ / ____ / ____		Total Score (a)		CAR Total
		No. of Indicators (b)		
		Rate = (a) / (b)		
		Rate		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: **Diesel Power Plant**
 LOCATION: _____

ITEM: **Equipment Installation**
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____ x factor	Action / Monitor
Item 520 Battery Charger				
Major				
DPWS-520-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-520-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
DPWS-520-03	Conformance of wiring to required bending radius.	/	____ x ____ =	
DPWS-520-04	Cable clamps are uniformly spaced.	/	____ x ____ =	
DPWS-520-05	Terminal lugs are grip insulated.	/	____ x ____ =	
DPWS-520-06	Installed materials are free from damage.	/	____ x ____ =	
DPWS-520-07	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____ Date: ____ / ____ / ____			No. of Indicators (b)	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____

PROJECT TYPE: **Diesel Power Plant**

ITEM: **Equipment Installation**

_____ VISIT

LOCATION: _____

DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score ____ x factor	Action / Monitor
Item 521 Grounding System				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-521-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-521-02	Grounding connections are properly welded through exothermic process.	/	____ x ____ =	
DPWS-521-03	Overhead ground wire are properly strung according to specified tension and sag.	/	____ x ____ =	
DPWS-521-04	Conducted and passed all required ground resistance tests.	/	____ x ____ =	
Minor				
DPWS-521-03	Overhead ground wire are properly strung according to specified tension and sag.	/	____ x ____ =	
DPWS-521-04	Conducted and passed all required ground resistance tests.	/	____ x ____ =	
DPWS-521-05	Ground rods installed according to approved plans.	/	____ x ____ =	
DPWS-521-06	Grounding trenches are excavated according to specified depth and width.	/	____ x ____ =	
DPWS-521-07	Provision of bedding materials for ground wire.	/	____ x ____ =	
DPWS-521-08	Ground leads are properly supported by clamps at specified intervals.	/	____ x ____ =	
DPWS-521-09	Shield wires and accessories are protected by specified corrosion inhibitor.	/	____ x ____ =	
DPWS-521-10	Steel structures with insulators or apparatus are properly connected to the ground mat.	/	____ x ____ =	
DPWS-521-11	Structures with more than one leg are properly connected to the ground mat with risers at minimum of 2 different points.	/	____ x ____ =	
DPWS-521-12	Switchyard equipment are properly grounded to two different points of the ground mat.	/	____ x ____ =	
DPWS-521-13	Lighting poles and other metal structures are properly connected to ground mat.	/	____ x ____ =	
DPWS-521-14	Cable trays, ladder, fence and gates are properly connected to ground mat.	/	____ x ____ =	
DPWS-521-15	Test boxes are installed properly and connected to ground mat.	/	____ x ____ =	
DPWS-521-16	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a)		CAR Total
Entered by: _____		No. of Indicators (b)		
Date: ____ / ____ / ____		Rate = (a) / (b)		
		=		
		Rate		
		=		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: **Diesel Power Plant**
 LOCATION: _____

ITEM: **Equipment Installation**
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____ x factor	Action / Monitor
Item 522 Bus Conductors and Hardwares				
Major				
DPWS-522-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-522-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
DPWS-522-03	Conductors are free from copper dust and particles.	/	____ x ____ =	
DPWS-522-04	No damage/defective members.	/	____ x ____ =	
DPWS-522-05	Connectors/Terminal pad are equipped with approved type of bolts, nuts, flat washer and bevelled washers.	/	____ x ____ =	
DPWS-522-06	Terminal connectors are free from burrs, edges, fillet, damage and cracks.	/	____ x ____ =	
DPWS-522-07	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Item 523 Gantries, Steel Structures and Supports				
Major*	<small>* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects</small>			
DPWS-523-01	Conformance with the approved Erection Drawings and installation methodologies.	/	____ x ____ =	
DPWS-523-02	Templates are used for setting anchor bolt system.	/	____ x ____ =	
Minor				
DPWS-523-03	Connections are properly secured by bolts, nuts, locknuts and washers.	/	____ x ____ =	
DPWS-523-04	Stitch bolts are used in connecting double angle members.	/	____ x ____ =	
DPWS-523-05	Correct direction and bolt position of bolt insertion.	/	____ x ____ =	
DPWS-523-06	Conformance with specified tolerances for plumbness and alignment.	/	____ x ____ =	
DPWS-523-07	No damage/defective structural members.	/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____ Entered by: _____ Date: ____ / ____ / ____		Total Score (a)		CAR Total
		No. of Indicators (b)		
		Rate = (a) / (b)		
		Rate		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: **Diesel Power Plant**
 LOCATION: _____

ITEM: **Equipment Installation**
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____ x factor	Action / Monitor
Item 524 Power / Control / Instrumentation Cables				
Major				
DPWS-524-01	Installed according to approved cable schedule.	/	____ x ____ =	
DPWS-524-02	Conducted and passed required tests.	/	____ x ____ =	
Minor				
DPWS-524-03	Cables are properly installed and placed in conduits, cable trays and trenches.	/	____ x ____ =	
DPWS-524-04	Cables not yet terminated are properly sealed to prevent moisture entering into the cable.	/	____ x ____ =	
DPWS-524-05	Conformance to proper wirings, markings, tags and ties.	/	____ x ____ =	
DPWS-524-06	No splicing along trays and trench.	/	____ x ____ =	
DPWS-524-07	Termination of conductors to terminal blocks are provided with terminal lugs, insulated and gripped.	/	____ x ____ =	
DPWS-524-08	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____ Date: ____ / ____ / ____			No. of Indicators (b)	
			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: **Diesel Power Plant**
 LOCATION: _____

ITEM: **Equipment Installation**
 DATE OF VISIT: ____ / ____ / ____

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small><i>*Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i></small>	Results	Score ____ x factor	Action / Monitor
Item 525 Conduits and Cable Tray System				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
DPWS-525-01	Installed according to approved plans and specifications.	/	____ x ____ =	
DPWS-525-02	Conducted and passed the required tests.	/	____ x ____ =	
Minor				
DPWS-525-03	Conduit ends are reamed and smoothened before jointing.	/	____ x ____ =	
DPWS-525-04	Provision of plug and fillers.	/	____ x ____ =	
DPWS-525-05	Provision of coupling and bends.	/	____ x ____ =	
DPWS-525-06	Provision of spacers, inserts and ties for conduits.	/	____ x ____ =	
DPWS-525-07	Provision of stow enamel coating inside conduits.	/	____ x ____ =	
DPWS-525-08	Provision of rigid metal expansion joints where required.	/	____ x ____ =	
DPWS-525-09	Cable trays, accessories and fittings are smooth, free from defects and sharp edges.	/	____ x ____ =	
DPWS-525-10	Trays are properly installed and supported as per plan.	/	____ x ____ =	
DPWS-525-11	Provision of adequate support on vertical cable runs.	/	____ x ____ =	
DPWS-525-12	Multi core cables are clamped to the racks.	/	____ x ____ =	
DPWS-525-13	Conformance to required leveling and alignment of all installed materials	/	____ x ____ =	
DPWS-525-14	Conformance to grounding connections.	/	____ x ____ =	
DPWS-525-15	Cables are adequately supported by racks and clamps, if it is not feasible to support cables by means of tray.	/	____ x ____ =	
DPWS-525-16	Approved as-built drawings maintained.	/	____ x ____ =	
		/	____ x ____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a)		CAR Total
Entered by: _____		No. of Indicators (b)		
Date: ____ / ____ / ____		Rate = (a) / (b)		
		=		
		Rate		
		=		

A N N E X 2- I

CHECKLIST FOR MOORING FACILITIES FOR POWER BARGES

Item 100	Site Development	2I -1
Item 101	Breakwater, Bulkhead, Causeway, Jetty Groin, Shore Protection Works, i.e, Slope Protection (Riprap, Rubble, Stone Masonry)	2I -1
Item 102	Gabions/Mattresses	2I -2
Item 103	Reinforced Concrete Piles	2I -3
Item 104	Timber/Wooden Piles	2I -4
Item 105	Steel Piles	2I -5
Item 106	Breasting and Mooring Dolphins	2I -6
Item 107	Bits/Cleats/Bollards	2I -6
Item 108	Take-Off Structures	2I -7
Item 109	Rubber Fender	2I -7
Item 110	Reclamation Works	2I -8
Item 111	Dredging Works	2I -8
Item 112	Formworks	2I -8
Item 113	Reinforcing Steel Bars (Including Tendons for Pre/Post-stressed Concrete	2I -9
Item 114	Concrete Works	2I -9
Item 115	Catwalk/Stair Landing/Ladder	2I -10
Item 116	Piping Works	2I -10
Item 117	Painting Works	2I -10
Item 118	Electrical Works	2I -11
Item 119	Grounding System	2I -12

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **Mooring Facilities
for Power Barges**

ITEM: **Site Development and
Rockworks**

_____ VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS				
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).	Results	Score _____ x factor	Action Monitor
Item 100 Site Development				
Major*	<i>* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects</i>			
MFWS-100-01	Accurate establishment of Boundary of Site and Area of Development	/	_____ x _____ =	
MFWS-100-02	Precise establishment of benchmark and geodetic controls	/	_____ x _____ =	
MFWS-100-03	Conformance to the exact location of required mooring structures as shown in the drawings.	/	_____ x _____ =	
MFWS-100-04	Proper removal of structures, rocks, boulders, non-perisable solid objects and other obstructions.(If there are any.)	/	_____ x _____ =	
Item 101 Breakwater, Bulkhead, Causeway, Jetty Groin, Shore, Protection Works, i.e., slope protection (riprap, rubble, stone masonry)				
Major*	<i>* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects</i>			
MFWS-101-01	Conformance to the cross-sectional dimensions as per design and specifications	/	_____ x _____ =	
MFWS-101-02	Conformance to the design elevations	/	_____ x _____ =	
MFWS-101-03	Conformance to the side slopes or berm as per design and specifications	/	_____ x _____ =	
MFWS-101-04	Conformance to the location as per design and specifications	/	_____ x _____ =	
MFWS-101-05	Conformance to the alignment as per design and specifications	/	_____ x _____ =	
MFWS-101-06	Conformance to the rock placement methodology and/or construction methodology	/	_____ x _____ =	
MFWS-101-07	Compliance/conformance to the designed foundation, e.g. toe	/	_____ x _____ =	
Minor				
MFWS-101-01	Conformance within approved/specified tolerance for cross-section	/	_____ x _____ =	
MFWS-101-02	Conformance within approved/specified tolerance for elevation	/	_____ x _____ =	
MFWS-101-08	Conformance within approved/specified tolerance for alignment	/	_____ x _____ =	
MFWS-101-09	Provision of adequate bedding as required	/	_____ x _____ =	
MFWS-101-10	Non-occurrence of displaced/sucked-out rocks	/	_____ x _____ =	
MFWS-101-11	Conformance within approved/specified tolerance of in-between gaps for rocks in-place	/	_____ x _____ =	
MFWS-101-12	Provision of settlement plates/blocks	/	_____ x _____ =	
		/	_____ x _____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **Mooring Facilities
for Power Barges**

ITEM: **Gabion/Rockworks**

_____VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

_____VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 102 Gabions/Mattresses				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
MFWS-102-01	Conformance to the cross-sectional dimensions as per design and specifications	/	_____x_____ =	
MFWS-102-02	Conformance to the design elevations	/	_____x_____ =	
MFWS-102-03	Conformance to the location as per design and specifications	/	_____x_____ =	
MFWS-102-04	Conformance to the alignment as per design and specifications	/	_____x_____ =	
MFWS-102-05	Conformance to the wire mesh cage fabrication requirements (alignment, lapping, etc.)	/	_____x_____ =	
MFWS-102-06	Proper construction methodology, e.g., placing of rock fill materials, lapping and twisting of mesh wire	/	_____x_____ =	
MFWS-102-07	Conformance to minimum density requirements (in kg./cu.m.) for filled gabions	/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
Minor				
MFWS-102-01	Conformance within the approved/specified tolerance for cross-sectional dimensions	/	_____x_____ =	
MFWS-102-02	Conformance within the approved/specified tolerance for elevations	/	_____x_____ =	
MFWS-102-04	Conformance within the approved/specified tolerance vs. the actual alignment	/	_____x_____ =	
MFWS-102-08	Provision of adequate bedding as required	/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **Mooring Facilities
for Power Barges**

ITEM: **Concrete Pilesworks**

_____VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 103 Reinforced Concrete Piles				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
MFWS-103-01	Conformance to the cross-sectional dimensions as per design and specifications	/	_____ x _____ =	
MFWS-103-02	Conformance to the design length as per design and specifications	/	_____ x _____ =	
MFWS-103-03	Conformance to the minimum required embedment of spliced joint	/	_____ x _____ =	
MFWS-103-04	Use of metal collar and/or protective caps during driving	/	_____ x _____ =	
MFWS-103-05	Attainment of required pile penetration/bearing capacity	/	_____ x _____ =	
MFWS-103-06	Pile shoe is provided for each pile	/	_____ x _____ =	
MFWS-103-07	Conformance to required number of piles supplied and driven in-place	/	_____ x _____ =	
MFWS-103-08	Lifting of each pile is at designed lifting points	/	_____ x _____ =	
MFWS-103-09	Vertical piles are driven plumb	/	_____ x _____ =	
MFWS-103-10	Batter piles are driven in accordance with the designed slope	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
MFWS-103-01	Conformance within the approved/specified tolerance for dimension	/	_____ x _____ =	
MFWS-103-02	Conformance within the approved/specified tolerance for pile length	/	_____ x _____ =	
MFWS-103-09	Conformance within the approved/specified tolerance for plumbness/verticality	/	_____ x _____ =	
MFWS-103-10	Conformance within the approved/specified tolerance for slope of the batter piles	/	_____ x _____ =	
MFWS-103-11	Proper graduation/markings	/	_____ x _____ =	
MFWS-103-12	Steel lifting hooks are cut-off and applied with approved type of sealant	/	_____ x _____ =	
MFWS-103-13	Alignment of the piles driven in-place are within the approved/specified tolerance	/	_____ x _____ =	
MFWS-103-14	Pile cut-off elevations are chipped-off properly. Free from excessive chipping below the cut-off elevations	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **Mooring Facilities
for Power Barges**

ITEM: **Timber Pilesworks**

_____ VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 104 Timber/Wooden Piles				
Major	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
MFWS-104-01	Conformance to the cross-sectional dimensions as per design and specifications	/	_____ x _____ =	
MFWS-104-02	Conformance to the design length as per design and specifications	/	_____ x _____ =	
MFWS-104-03	Use of metal collar and/or protective caps during driving	/	_____ x _____ =	
MFWS-104-04	Attainment of required pile penetration/bearing capacity	/	_____ x _____ =	
MFWS-104-05	Conformance to the required number of piles supplied and driven in-place	/	_____ x _____ =	
MFWS-104-06	Lifting is at designated lifting points of each pile	/	_____ x _____ =	
MFWS-104-07	Vertical piles are driven plumb	/	_____ x _____ =	
MFWS-104-08	Batter piles are driven in accordance with the designed slope	/	_____ x _____ =	
MFWS-104-09	No massive splitting is visible perpendicular to the pile length	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
MFWS-104-01	Conformance within the approved/specified tolerance for dimension	/	_____ x _____ =	
MFWS-104-02	Conformance within the approved/specified tolerance for pile length	/	_____ x _____ =	
MFWS-104-07	Conformance within the approved/specified tolerance for plumbness/verticality	/	_____ x _____ =	
MFWS-104-08	Conformance within the approved/specified tolerance for slope of the batter piles	/	_____ x _____ =	
MFWS-104-10	Proper graduation/markings	/	_____ x _____ =	
MFWS-104-11	Alignment of the piles driven in-place are within the approved/specified tolerance	/	_____ x _____ =	
MFWS-104-12	Pile butt is free from brooming	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **Mooring Facilities
for Power Barges**

ITEM: **Steel Pileworks**

_____ VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 105 Steel Piles				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
MFWS-105-01	Conformance to the cross-sectional dimensions as per design and specifications	/	_____ x _____ =	
MFWS-105-02	Conformance to the design length as per design and specifications	/	_____ x _____ =	
MFWS-105-03	Use of metal collar and/or protective caps during driving	/	_____ x _____ =	
MFWS-105-04	Attainment of required pile penetration/bearing capacity	/	_____ x _____ =	
MFWS-105-05	Conformance to the splicing requirements as per design and specifications	/	_____ x _____ =	
MFWS-105-06	Conformance to required number of piles supplied and driven in-place	/	_____ x _____ =	
MFWS-105-07	Lifting of each pile is at designed lifting points	/	_____ x _____ =	
MFWS-105-08	Vertical piles are driven plumb	/	_____ x _____ =	
MFWS-105-09	Batter piles are driven in accordance with the specified slope	/	_____ x _____ =	
MFWS-105-10	Driven piles are free from massive dents or damages	/	_____ x _____ =	
MFWS-105-11	Each pile is properly applied with protective coating as required	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
MFWS-105-01	Conformance within the approved/specified tolerance for dimension	/	_____ x _____ =	
MFWS-105-02	Conformance within the approved/specified tolerance for pile length	/	_____ x _____ =	
MFWS-105-08	Conformance within the approved/specified tolerance for plumbness/verticality	/	_____ x _____ =	
MFWS-105-09	Conformance within the approved/specified tolerance for slope of the batter piles	/	_____ x _____ =	
MFWS-105-12	Proper graduation/markings	/	_____ x _____ =	
MFWS-105-13	Alignment of the piles driven in-place are within the approved/specified tolerance	/	_____ x _____ =	
MFWS-105-14	Pile cut-off are properly cut with appropriate cutting outfits at the established pile cut-off elevations	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **Mooring Facilities
for Power Barges**

ITEM: **Dolphins and Bitts/
Bollards**

_____ VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 106 Breasting and Mooring Dolphins				
Major	<i>* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects</i>			
MFWS-106-01	Adherence to proper construction methodology.	/	_____ x _____ =	
MFWS-106-02	Conformance to exact location and relative position with reference to the power barge as shown in the site development plan.	/	_____ x _____ =	
MFWS-106-03	Conformance to the required size and number of piles driven.	/	_____ x _____ =	
MFWS-106-04	Conformance to the correct section, dimensions and elevation of pile caps.	/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
MFWS-106-05	Conformance within the approved/specified tolerance for dimension	/	_____ x _____ =	
MFWS-106-06	Conformance within the approved/specified tolerance for plumbness/verticality	/	_____ x _____ =	
MFWS-106-07	Conformance within the approved/specified tolerance for slope of the batter piles	/	_____ x _____ =	
		/	_____ x _____ =	
Item 107 Bitts/Cleats/Bollards				
Major	<i>* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects</i>			
MFWS-107-01	Conformance to the required supply and installation of bitts, cleats and bollards as per plans and specifications	/	_____ x _____ =	
MFWS-107-02	Conformance to the required number of anchor bolts, nuts and washers in accordance with the plans and specifications	/	_____ x _____ =	
MFWS-107-03	Conformance to pedestal/foundation requirements in accordance with the plans and specifications	/	_____ x _____ =	
MFWS-107-04	Conformance to the anchoring/embedment requirements of the anchor bolts	/	_____ x _____ =	
MFWS-107-05	Conformance to the required number and location of bitts, cleats and bollards as per plans and specifications	/	_____ x _____ =	
MFWS-107-06	Conformance to the type and installation requirements for sealers of anchor bolts and nuts	/	_____ x _____ =	
MFWS-107-07	Non-occurrence of corrosion	/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
MFWS-107-03	Conformance to pedestal/foundation within the approved/specified tolerances	/	_____ x _____ =	
MFWS-107-07	Non-occurrence of rust	/	_____ x _____ =	
MFWS-107-08	Supplied/installed mooring fixtures and accessories within the approved/specified tolerances	/	_____ x _____ =	
		/	_____ x _____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **Mooring Facilities
for Power Barges**

ITEM: **Take- Off Structures
and Fenders**

_____ VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 108 Take-off Structures				
Major	<i>* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects</i>			
MFWS-108-01	Conformance to the design configuration dimensions and elevations of the structures.	/	_____ x _____ =	
MFWS-108-02	Conformance to the correct section, dimensions and elevation of pile caps.	/	_____ x _____ =	
MFWS-108-03	Conformance to the design plumbness and inclination (batter) of the driven piles shown in the drawings.	/	_____ x _____ =	
		/	_____ x _____ =	
Minor				
MFWS-108-04	Conformance within the approved/specified tolerance for dimension	/	_____ x _____ =	
MFWS-108-05	Conformance within the approved/specified tolerance for plumbness/verticality	/	_____ x _____ =	
MFWS-108-06	Conformance within the approved/specified tolerance for slope and batter.	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 109 Rubber Fender				
Major*	<i>* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects</i>			
MFWS-109-01	Conformance with the cross-sectional dimensions per design and specifications	/	_____ x _____ =	
MFWS-109-02	Conformance to the required diameter/ length as per design and specifications	/	_____ x _____ =	
MFWS-109-03	Free from damages such as chipped-off edges, etc. during transport and handling	/	_____ x _____ =	
MFWS-109-04	Installation in accordance with the locations as per design and specifications	/	_____ x _____ =	
MFWS-109-05	Installation in accordance with the designed elevation	/	_____ x _____ =	
MFWS-109-06	Proper alignment of installed fenders	/	_____ x _____ =	
MFWS-109-07	Complete installation of fixtures and accessories	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **Mooring Facilities
for Power Barges**

ITEM: **Reclamation/Dredging
/Form Works**

_____ VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 110 Reclamation Works				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
MFWS-110-01	Excavation/displacement of unsuitable materials to required depth	/	_____ x _____ = _____	
MFWS-110-02	Conformance to lines and grades as per plans and specifications	/	_____ x _____ = _____	
MFWS-110-03	Use of suitable filling materials	/	_____ x _____ = _____	
MFWS-110-04	Conformance to the required compaction as per specifications	/	_____ x _____ = _____	
MFWS-110-05	Unsuitable materials are properly disposed to the approved disposal sites	/	_____ x _____ = _____	
MFWS-110-06	Installed approved surcharge materials, drain materials	/	_____ x _____ = _____	
MFWS-110-07	Provision of drainage for surface run-off	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Item 111 Dredging Works				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
MFWS-111-01	Conformance to the dredging limits or areas to be dredged	/	_____ x _____ = _____	
MFWS-111-02	Conformance to the dredged depth as per plans and specifications	/	_____ x _____ = _____	
MFWS-111-03	Conformance to the appropriate dredging and support equipments as per specifications	/	_____ x _____ = _____	
MFWS-111-04	Proper disposal of dredged materials to the designated disposal area/site	/	_____ x _____ = _____	
Minor				
MFWS-111-02	Conformance to the allowable or approved tolerance for dredged depth	/	_____ x _____ = _____	
MFWS-111-05	Marking buoys evident on designated areas to be dredged	/	_____ x _____ = _____	
Item 112 Form Works				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
MFWS-112-01	Conformance to the required type of formworks in accordance with approved shop/working drawings	/	_____ x _____ = _____	
MFWS-112-02	Forms coated with mould oil as required	/	_____ x _____ = _____	
MFWS-112-03	Sufficient bracing/support provided	/	_____ x _____ = _____	
MFWS-112-04	No loose knots, splits, cracks, etc.	/	_____ x _____ = _____	
MFWS-112-05	Provision of required concrete or steel spacer	/	_____ x _____ = _____	
MFWS-112-06	Conformance to dimensions, location, plumbness and alignment	/	_____ x _____ = _____	
MFWS-112-07	Provision of camber during construction stage	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) = _____		CAR Total
Entered by: _____		No. of Indicators (b) = _____		
Date: / /		Rate = (a) / (b) = _____		
		Rate = _____		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **Mooring Facilities
for Power Barges**

ITEM: **Reinforcing Bars and
Concrete Works**

_____ VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Item 113 Reinforcing Steel Bars (including tendons for Pre/Post-stressed concrete)				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
MFWS-113-01	Conformance of in-placed materials according to plans & specifications	/	= <u> X </u>	
MFWS-113-02	Non-appearance of corrosion on steel reinforcement	/	= <u> X </u>	
Minor				
MFWS-113-02	Non-appearance of rust on steel reinforcement	/	= <u> X </u>	
MFWS-113-03	Conformance to approved bar cutting schedule, proper spacing, anchorage, adequate reinforcements	/	= <u> X </u>	
MFWS-113-04	No sign of oil, paint and other deleterious materials on reinforcements	/	= <u> X </u>	
MFWS-113-05	Conformance to jointing requirement, i.e. splicing, welding, etc.	/	= <u> X </u>	
MFWS-113-06	Conformance to the required installation of ducttube e.g. (spacing, location and distance)	/	= <u> X </u>	
MFWS-113-07	Conformance to the required steel plate and lock	/	= <u> X </u>	
MFWS-113-08	Conformance to the number of bundles of tendons and number of pieces of bundles of tendons	/	= <u> X </u>	
		/	= <u> X </u>	
Item 114 Concrete Works				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
MFWS-114-01	No through cracks	/	= <u> X </u>	
MFWS-114-02	No honeycomb or spalling (no exposed rebars/aggregates)	/	= <u> X </u>	
MFWS-114-03	No chipping off of concrete cover	/	= <u> X </u>	
MFWS-114-04	Proper and adequate vibration	/	= <u> X </u>	
MFWS-114-05	Conformance to finishing/plastering requirement	/	= <u> X </u>	
MFWS-114-06	Conformance to the required concrete cover for rebars	/	= <u> X </u>	
MFWS-114-07	Conformance to the batching, mixing, transporting and discharge time requirements	/	= <u> X </u>	
MFWS-114-08	Conformance to placing requirement that will not result segregation of aggregates, cold joints and misalignment	/	= <u> X </u>	
MFWS-114-09	Conformance to the jointing requirement	/	= <u> X </u>	
MFWS-114-10	Proper curing	/	= <u> X </u>	
MFWS-114-11	Conformance to required dimensions, lines, grades/elevation locations and crown (for pier)	/	= <u> X </u>	
MFWS-114-12	Conformance to the required quality of concrete mix	/	= <u> X </u>	
Minor				
MFWS-114-02	No honeycomb or spalling	/	= <u> X </u>	
MFWS-114-13	No sagging or bulging	/	= <u> X </u>	
MFWS-114-14	No water ponding on bearing plates	/	= <u> X </u>	
MFWS-114-15	Conformance to elevation of expansion joints	/	= <u> X </u>	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a)		CAR Total
Entered by: _____		No. of Indicators (b)		
Date: / /		Rate = (a) / (b)		
		Rate		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **Mooring Facilities
for Power Barges**

ITEM: **Catwalk/Piping/
Painting Works**

_____ VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score _____ x factor	Action Monitor
Item 115 Catwalk/Stair Landing/Ladder				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
MFWS-115-01	Conformance to the correct dimensions as per design and specifications	/	_____ x _____ =	
MFWS-115-02	Conformance to the required number of steps and risers	/	_____ x _____ =	
MFWS-115-03	Conformance as to the correct opening of wire mesh and the size of wire and GI Pipe handrails as shown in the drawings and in the specification.	/	_____ x _____ =	
Minor				
MFWS-115-01	Conformance within the approved/specified tolerance for dimensions	/	_____ x _____ =	
	For reinforced concrete structure: refer to Common Items of Work - MFWS 112, 113 and 114	/	_____ x _____ =	
		/	_____ x _____ =	
Item 116 Piping Works				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
MFWS-116-01	Conformance to the correct alignment, position, location and elevation.	/	_____ x _____ =	
MFWS-116-02	Conformance to the required height and dimensions as indicated in the drawings and specifications.	/	_____ x _____ =	
MFWS-116-03	Conformance to the pedestal requirements in accordance with the plans and specifications	/	_____ x _____ =	
MFWS-116-04	Conformance to the required number of anchor bolts and their embedment length as indicated in the drawings and specifications.	/	_____ x _____ =	
MFWS-116-05	Conformance to jointing and welding requirements in accordance with the plans and specifications	/	_____ x _____ =	
Minor				
MFWS-116-01	Conformance within the approved/specified tolerance for alignment and locations	/	_____ x _____ =	
		/	_____ x _____ =	
Item 117 Painting Works				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
MFWS-117-01	Surface prepared according to specifications	/	_____ x _____ =	
MFWS-117-02	Required neutralizers, etc. applied	/	_____ x _____ =	
MFWS-117-03	Applied paint appropriate to the surface	/	_____ x _____ =	
MFWS-117-04	Specified number of coats applied	/	_____ x _____ =	
MFWS-117-05	Surfaces evenly painted, proper opacity	/	_____ x _____ =	
MFWS-117-06	No discoloration and peeling-off of paint	/	_____ x _____ =	
MFWS-117-07	Paints conform to specification/requirements	/	_____ x _____ =	
MFWS-117-08	Surface properly applied with putty/patching compound	/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **Mooring Facilities
for Power Barges**

ITEM: **Electrical Works**

_____ VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 118 Electrical Works				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
MFWS-118-01	Conduits installed according to plans and laid out according to approved construction drawings	/	_____ x _____ = _____	
MFWS-118-02	Pipes, hangers, boxes, gutters, cable trays properly installed and painted, sharp edges of pipes removed	/	_____ x _____ = _____	
MFWS-118-03	Pipes properly bended	/	_____ x _____ = _____	
MFWS-118-04	Allowable number of wires in a pipe properly observed	/	_____ x _____ = _____	
MFWS-118-05	Splicing and connection provided with adequate rubber and pvc tapes	/	_____ x _____ = _____	
MFWS-118-06	Adequate length of wire provided for termination and splicing	/	_____ x _____ = _____	
MFWS-118-07	Wire color coding complied and observed	/	_____ x _____ = _____	
MFWS-118-08	Wire insulation not damaged during pulling	/	_____ x _____ = _____	
MFWS-118-09	Adequate number, correct size and gauge of pull boxes installed and properly covered	/	_____ x _____ = _____	
MFWS-118-10	Boxes and enclosures provided according to intended purpose	/	_____ x _____ = _____	
MFWS-118-11	Fittings and accessories provided and properly installed	/	_____ x _____ = _____	
MFWS-118-12	Block-outs and sleeves provided and properly secured	/	_____ x _____ = _____	
MFWS-118-13	Cable ties provided	/	_____ x _____ = _____	
MFWS-118-14	Blank covers provided for outlets and switches that are not utilized	/	_____ x _____ = _____	
MFWS-118-15	Use of tools and equipment properly observed	/	_____ x _____ = _____	
MFWS-118-16	Lighting fixtures, panel boards, circuit breakers, etc. properly installed and free from any form of damages	/	_____ x _____ = _____	
MFWS-118-17	Meager, clamp, phase sequence tests and load test conducted	/	_____ x _____ = _____	
MFWS-118-18	Shop drawings, as-built plan maintained	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
No. of Indicators (b)	
Rate = (a) / (b)	
Rate	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____

PROJECT TYPE: **Mooring Facilities
for Power Barges**

ITEM: **Grounding System**

_____ VISIT

LOCATION: _____

DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 119 Grounding System				
Major*	* Refer to Section 11.4.a of the CPES Guidelines for definition of Major Defects			
MFWS-119-01	Installed according to approved plans and specifications	/	_____ x _____ = _____	
MFWS-119-02	Grounding connections are properly welded/bolted	/	_____ x _____ = _____	
MFWS-119-03	Conducted and passed all required ground resistance tests.	/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
		/	_____ x _____ = _____	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a)		
Entered by: _____		No. of Indicators (b)		
Date: / /		Rate = (a) / (b) = _____		
		Rate = _____		

A N N E X 2-J

CHECKLIST FOR SITE DEVELOPMENT

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CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Site Development
 _____ VISIT LOCATION/LOT: _____

ITEM:
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 100 Clearing and Grubbing				
SDWS-100-02	Conformance to the approved/specified tolerance for extent of clearing and grubbing work.	/	_____ x _____ =	
		/	_____ x _____ =	
Item 101 Excavation				
SDWS-101-01	Conformance to the approved/specified tolerances for lines, grades, dimensions, elevations	/	_____ x _____ =	
SDWS-101-02	Conformance to the excavation support systems, e.g. angle of repose, bracing, shoring, sheet piling	/	_____ x _____ =	
Item 102 Earthfill				
SDWS-102-01	Conformance of in-placed materials to plans and specifications	/	_____ x _____ =	
SDWS-102-02	Conformance to the required thickness of fill or backfill per layer	/	_____ x _____ =	
SDWS-102-03	Conformance to the required density or degree of compaction	/	_____ x _____ =	
Item 103 Planting of Trees and Shrubs				
SDWS-103-01	Conformance to the specified plant specie, variety and culture.	/	_____ x _____ =	
SDWS-103-02	Conformance to the specified topsoil/ garden soil and other soil mixtures and fertilizers.	/	_____ x _____ =	
SDWS-103-03	Conformance to the required/ specified supports (e.g. stakes, guy wires, temporary fence, etc.)	/	_____ x _____ =	
SDWS-103-04	Conformance to the specified quantity, spacings and minimum size (during delivery and nursery stage).	/	_____ x _____ =	
SDWS-103-05	Conformance to the specified planting methodology and handling.	/	_____ x _____ =	
SDWS-103-06	Plants are free of damages, disease, insect pests and dying branches, leaves and branch tips).	/	_____ x _____ =	
		/	_____ x _____ =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate= (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Site Development
 LOCATION: _____

ITEM: Common Items of Work
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score _____ x factor	Action Monitor
Item 200 Formworks				
SDWS-200-01	Conformance to the required type of formworks in accordance with approved shop/working drawings	/	_____ x _____ =	
SDWS-200-02	Forms coated with mould oil as required	/	_____ x _____ =	
SDWS-200-03	Sufficient bracing/support provided	/	_____ x _____ =	
SDWS-200-04	No loose knots, splits, cracks, etc.	/	_____ x _____ =	
SDWS-200-05	Provision of required concrete or steel spacer	/	_____ x _____ =	
SDWS-200-06	Conformance to dimensions, location, plumbness and alignment	/	_____ x _____ =	
SDWS-200-07	No use of dilapidated/salvage forms (use more than 3x)	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 201 Reinforcing Steel Bars (including tendons for Pre/Post-Stressed concrete)				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SDWS-201-01	Conformance of in-placed materials to plans & specifications	/	_____ x _____ =	
SDWS-201-02	Non-appearance of corrosion on steel reinforcement	/	_____ x _____ =	
Minor				
SDWS-201-02	Non-appearance of rust on steel reinforcement	/	_____ x _____ =	
SDWS-201-03	Conformance to approved bar cutting schedule, proper spacing, anchorage, adequate reinforcements	/	_____ x _____ =	
SDWS-201-04	No sign of oil, paint and other deleterious materials on reinforcements	/	_____ x _____ =	
SDWS-201-05	Conformance to jointing requirement, i.e. splicing, welding, etc.	/	_____ x _____ =	
SDWS-201-06	Conformance to proper bending of stirrups	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b)	
Date: / /			Rate = (a) / (b)	
			=	
			Rate	
			=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Site Development
 LOCATION: _____

ITEM: Common Items of Work
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 300 Concrete Works				
Major*	* Refer to Section 11.4a of the CPES Guidelines for definition of Major Defects			
SDWS-300-01	No through cracks	/	_____ x _____ =	
SDWS-300-02	No honeycomb (no exposed rebars/aggregates)	/	_____ x _____ =	
SDWS-300-03	No sagging or bulging (if tolerance exceeded)	/	_____ x _____ =	
SDWS-300-04	Conformance to required quality of concrete mix	/	_____ x _____ =	
Minor				
SDWS-300-01	No cracks	/	_____ x _____ =	
SDWS-300-02	No honeycomb	/	_____ x _____ =	
SDWS-300-03	No sagging or bulging	/	_____ x _____ =	
SDWS-300-05	Proper and adequate vibration	/	_____ x _____ =	
SDWS-300-06	Conformance to finishing/plastering requirement	/	_____ x _____ =	
SDWS-300-07	No chipping off of concrete cover	/	_____ x _____ =	
SDWS-300-08	Conformance to the required concrete cover for rebars	/	_____ x _____ =	
SDWS-300-09	Conformance to the batching, mixing, transporting and discharge time requirements	/	_____ x _____ =	
SDWS-300-10	Conformance to placing requirement that will not result segregation of aggregates, cold joints and misalignment	/	_____ x _____ =	
SDWS-300-11	Conformance to the jointing requirement	/	_____ x _____ =	
SDWS-300-12	Proper curing	/	_____ x _____ =	
SDWS-300-13	Conformance to required dimensions, lines, grades/elevation, and location	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b)	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Site Development
 LOCATION: _____

ITEM: Masonry Works
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS				
Sub-item Code	<i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 301 CHB Wall				
Major				
SDWS-301-01	Conformance to required quality of CHB	/	_____ = _____ x _____	
SDWS-301-02	Conformance to required quality of mortar mix	/	_____ = _____ x _____	
Minor				
SDWS-301-03	Conformance to specified tolerances for dimension, location, plumbness and alignment	/	_____ = _____ x _____	
SDWS-301-04	Proper spacing of horizontal and vertical bars	/	_____ = _____ x _____	
SDWS-301-05	Rebars used free from corrosion	/	_____ = _____ x _____	
		/	_____ = _____ x _____	
		/	_____ = _____ x _____	
		/	_____ = _____ x _____	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score (a)	CAR Total
=	
No. of Indicators (b)	
=	
Rate = (a) / (b)	
=	
Rate	
=	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Site Development
 LOCATION: _____

ITEM:
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor =	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 400 Paver Blocks/ Concrete Blocks				
SDWS-400-01	Installed blocks free from chipping, cracks or any form of damages and discoloration.	/	_____ x _____ =	
SDWS-400-02	Conformance to specified sand bedding or compacted soil or base course.	/	_____ x _____ =	
SDWS-400-03	Joints are perfectly aligned and consistent	/	_____ x _____ =	
SDWS-400-04	Blocks are evenly levelled to a tolerable extent	/	_____ x _____ =	
SDWS-400-05	Conformance to specified perforation and water absorption method.	/	_____ x _____ =	
SDWS-400-06	Block color are consistent with each other.	/	_____ x _____ =	
		/	_____ x _____ =	
Item 401 Stamped Concrete				
SDWS-401-01	Adherence to the methodology and preparation.	/	_____ x _____ =	
SDWS-401-02	Conformance with the design layout, pattern and color scheme.	/	_____ x _____ =	
SDWS-401-03	Conformance with the specified compaction and base course.	/	_____ x _____ =	
SDWS-401-04	Free from any form of damages	/	_____ x _____ =	
SDWS-401-05	Concrete material conform to specification and mixture/ proportion as per plan.	/	_____ x _____ =	
		/	_____ x _____ =	
Item 402 Grass Pavers				
SDWS-402-01	Installed pavers free from chipping, cracks or any form of damages and discoloration.	/	_____ x _____ =	
SDWS-402-02	Conformance to specified sand bedding or compacted soil or base course.	/	_____ x _____ =	
SDWS-402-03	Joints are perfectly aligned and consistent	/	_____ x _____ =	
SDWS-402-04	Pavers are evenly levelled to a tollerable extent	/	_____ x _____ =	
SDWS-402-05	Pavers color are consistent with each other	/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Site Development
 LOCATION: _____

ITEM:
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

INDICATORS		Results	Score _____ x factor =	Action Monitor
Sub-item Code	Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).			
Item 403 Trowelled Finish/ Broomed Finish				
SDWS-403-01	Aherence to the desired roughness and consistency specified design pattern.	/	_____ x _____ =	
SDWS-403-02	No cracks, discoloration and any form of damages.	/	_____ x _____ =	
SDWS-403-03	No sign of deflection/settlement/ water ponding.	/	_____ x _____ =	
SDWS-403-04	Adherence to the specified/ approved sand/ gravel base or sub-base course.	/	_____ x _____ =	
		/	_____ x _____ =	
Item 404 Pebble Wash-out				
SDWS-404-01	Installed pebbles are evenly distributed and selected according to size and color.	/	_____ x _____ =	
SDWS-404-02	No cracks, discoloration and any form of damages.	/	_____ x _____ =	
SDWS-404-03	Installed pebbles surface are thoroughly clean from cement or grout stains.	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 405 Decorative Boulders				
SDWS-405-01	Conforms to approved/specified size, shape and color/ shade according to plan.	/	_____ x _____ =	
SDWS-405-02	Conforms to the approved design scheme/layout/pattern.	/	_____ x _____ =	
SDWS-405-03	No cracks, chipping-off or any form of damages.	/	_____ x _____ =	
SDWS-405-04	Correctly installed and put in place with stability, free of any movement.	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____		Total Score (a) =		CAR Total
Entered by: _____		No. of Indicators (b) =		
Date: / /		Rate = (a) / (b) =		
		Rate =		

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Site Development
 LOCATION: _____

ITEM:
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score _____ x factor	Action Monitor
Item 406 Garden Tile/ Stone Finish				
SDWS-406-01	Installed tiles free from chipping, cracks or any form of damages	/	_____ x _____ =	
SDWS-406-02	Joints are perfectly aligned and consistent with skirting tiles.	/	_____ x _____ =	
SDWS-406-03	Tiles are evenly placed/layed according to specified design pattern and color sheme.	/	_____ x _____ =	
SDWS-406-04	Installed tiles are true to alignment and properly levelled.	/	_____ x _____ =	
SDWS-406-05	Adherence to the specified/ approved sand/ gravel base or sub-base course.	/	_____ x _____ =	
		/	_____ x _____ =	
Item 407 Wall Bricks/ Stone Finish				
SDWS-407-01	Smooth and evenly bonded to wall.	/	_____ x _____ =	
SDWS-407-02	Free from cracks, chips, stains, discoloration and any form of damages.	/	_____ x _____ =	
SDWS-407-03	Installed according to specified size, shape, color/ shade type and design pattern.	/	_____ x _____ =	
Item 408 Plaster Finish				
SDWS-408-01	Conformance to designed mixture of plastering materials.	/	_____ x _____ =	
SDWS-408-02	Conformance to specified method of application and thickness.	/	_____ x _____ =	
SDWS-408-03	True to alignment, plumbness and smoothness.	/	_____ x _____ =	
SDWS-408-04	Free from any form of damages e.g. cracks, peeled-off plaster finish	/	_____ x _____ =	
Item 409 Cladding				
SDWS-409-01	Panels properly anchored/ bonded to wall.	/	_____ x _____ =	
SDWS-409-02	True to alignment, plumbness and smoothness.	/	_____ x _____ =	
SDWS-409-03	Free from any form of damages	/	_____ x _____ =	
SDWS-409-04	Panels conforms to construction procedure/ methodology.	/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____ Entered by: _____			Total Score (a) = No. of Indicators (b) = Rate = (a) / (b) = Rate =	CAR Total

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: Site Development
 LOCATION: _____

ITEM:
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 500 Painting				
SDWS-500-01	Surface prepared according to paint specification.	/	_____ x _____ =	
SDWS-500-02	Required neutralizers, and paint preparation materials applied.	/	_____ x _____ =	
SDWS-500-03	Surface are properly applied with putty/patching compound.	/	_____ x _____ =	
SDWS-500-04	Applied paint appropriate to the surface.	/	_____ x _____ =	
SDWS-500-05	Specified number of coats applied.	/	_____ x _____ =	
SDWS-500-06	Surfaces evenly painted, proper opacity.	/	_____ x _____ =	
SDWS-500-07	No discoloration and peeling-off of paint.	/	_____ x _____ =	
SDWS-500-08	Paints conform to specification as to type and color.	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____VISIT

PROJECT TYPE: Site Development
 LOCATION: _____

ITEM:
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 600 Play Facilities				
SDWS-600-01	Conformance to the specified type, dimensions, quantities, color, etc. according to plans.	/	_____ x _____ =	
SDWS-600-02	Installed/ fixed in place according to plan.	/	_____ x _____ =	
SDWS-600-03	Free from any form of unsafe and dangerous connections, installations, etc.	/	_____ x _____ =	
SDWS-600-04	Free from any form of damages.	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 601 Trellis/ Gazebo				
SDWS-601-01	Conformance to the specified type, dimensions, quantities, color, etc. according to plans.	/	_____ x _____ =	
SDWS-601-02	Installed/ fixed in place according to plan.	/	_____ x _____ =	
SDWS-601-03	Free from any form of unsafe and dangerous connections, installations, etc.	/	_____ x _____ =	
SDWS-601-04	Free from any form of damages.	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 602 Moulding/ Moulding Strips				
SDWS-602-01	True to size, design profile, color, texture, material, elevation and alignment.	/	_____ x _____ =	
SDWS-602-02	Installed materials are free from any form of damages	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a) =	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT NO.: _____
 _____ VISIT

PROJECT TYPE: Site Development
 LOCATION: _____

ITEM:
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <i>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</i>	Results	Score _____ x factor	Action Monitor
Item 603 Entrance Gate				
SDWS-603-01	True to alignment, plumbness in conformance to the approved/specified tolerance	/	_____ x _____ =	
SDWS-603-02	Gates are properly fixed to wall or posts and are welded or fastened accordingly.	/	_____ x _____ =	
SDWS-603-03	Gate accessories installed according to plans, e.g. locksets, hinges	/	_____ x _____ =	
SDWS-603-04	Free from any form of damages	/	_____ x _____ =	
SDWS-603-05	Gate conforms to specification requirements as to material, dimensions and design motif according to plans.	/	_____ x _____ =	
		/	_____ x _____ =	
Item 604 Park Fence				
SDWS-604-01	True to alignment, plumbness in conformance to the approved/specified tolerance	/	_____ x _____ =	
SDWS-604-02	Fences are properly fixed to wall or posts and are welded or fastened accordingly.	/	_____ x _____ =	
SDWS-604-03	Fence accessories installed according to plans.	/	_____ x _____ =	
SDWS-604-04	Free from any form of damage	/	_____ x _____ =	
SDWS-604-05	Fence conforms to specification requirements as to material, dimensions and design motif according to plans.	/	_____ x _____ =	
		/	_____ x _____ =	
Item 605 Railings				
SDWS-605-01	Installed according to plans	/	_____ x _____ =	
SDWS-605-02	Free from dents, scratches or any form of damage	/	_____ x _____ =	
SDWS-605-03	Bends and curves are smooth	/	_____ x _____ =	
SDWS-605-04	Conforms to approved tolerance size, dimension, height and type e.g. concrete, steel, stainless, aluminum, etc.	/	_____ x _____ =	
SDWS-605-05	Safely and rigidly fixed to walls, post or floors.	/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Total Score (a)	CAR Total
Entered by: _____			No. of Indicators (b) =	
Date: / /			Rate = (a) / (b) =	
			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____ PROJECT TYPE: Site Development
 _____VISIT LOCATION: _____

ITEM: Basic Services
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score _____ x factor	Action Monitor
Item 700 Plumbing				
SDWS-700-01	Pipes installed according to plans, e.g. slope, alignment, location, bracings/supports	/	_____ x _____ =	
SDWS-700-02	Conducted and passed the required leak test	/	_____ x _____ =	
SDWS-700-03	Pipes not clogged	/	_____ x _____ =	
SDWS-700-04	Free from any form of damages	/	_____ x _____ =	
SDWS-700-05	Fixtures and accessories installed according to plans, e.g. height, alignment, location	/	_____ x _____ =	
SDWS-700-06	Adhesive conform to specification	/	_____ x _____ =	
SDWS-700-07	Water closet, lavatory conform to specification	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Item 701 Sanitary				
SDWS-701-01	Pipes installed according to plans, e.g. slope, alignment, location, bracings/supports	/	_____ x _____ =	
SDWS-701-02	Conducted and passed the required pressure/leak test	/	_____ x _____ =	
SDWS-701-03	Pipes not clogged	/	_____ x _____ =	
SDWS-701-04	Free from any form of damages	/	_____ x _____ =	
SDWS-701-05	Fixtures and accessories installed according to plans, e.g. height, alignment, location	/	_____ x _____ =	
SDWS-701-06	Adhesive conforms to specification	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner : _____			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
Entered by: _____			Rate = (a) / (b) =	
Date: / /			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____VISIT

PROJECT TYPE: Site Development
 LOCATION: _____

ITEM: Electrical
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score _____ x factor	Action Monitor
Item 800 Electrical Works				
SDWS-800-01	Pipes installed according to plans and laid out according to approved construction drawings	/	_____ x _____ =	
SDWS-800-02	Pipes, hangers, boxes, gutters, cable trays properly installed and painted, sharp edges of pipes removed	/	_____ x _____ =	
SDWS-800-03	Pipes properly bended	/	_____ x _____ =	
SDWS-800-04	Allowable number of wires in a pipe properly observed	/	_____ x _____ =	
SDWS-800-05	Splicing and connection provided with adequate rubber and pvc tapes	/	_____ x _____ =	
SDWS-800-06	Adequate length of wire provided for termination and splicing	/	_____ x _____ =	
SDWS-800-07	Wire color coding complied and observed	/	_____ x _____ =	
SDWS-800-08	Wire insulation not damaged during pulling	/	_____ x _____ =	
SDWS-800-09	Adequate number, correct size and gauge of pull boxes installed and properly covered	/	_____ x _____ =	
SDWS-800-10	Boxes and enclosures provided according to intended purpose	/	_____ x _____ =	
SDWS-800-11	Fittings and accessories provided and properly installed	/	_____ x _____ =	
SDWS-800-12	Block-outs and sleeves provided and properly secured	/	_____ x _____ =	
SDWS-800-13	Cable ties provided	/	_____ x _____ =	
SDWS-800-14	Blank covers provided for outlets and switches that are not utilized	/	_____ x _____ =	
SDWS-800-15	Use of tools and equipment properly observed	/	_____ x _____ =	
SDWS-800-16	Lighting fixtures, panel boards, circuit breakers, etc. properly installed and free from any form of damages	/	_____ x _____ =	
SDWS-800-17	Meager, clamp, phase sequence tests and load test conducted	/	_____ x _____ =	
SDWS-800-18	Shop drawings, as-built plan maintained	/	_____ x _____ =	
		/	_____ x _____ =	
		/	_____ x _____ =	
Was subcontractor used? If yes, name of company and owner : _____			Total Score (a) =	CAR Total
			No. of Indicators (b) =	
Entered by: _____			Rate = (a) / (b) =	
Date: / /			Rate =	

CPES CHECKLIST FOR WORKMANSHIP

PROJECT ID/NO.: _____
 _____VISIT

PROJECT TYPE: Site Development
 LOCATION: _____

ITEM: Sewer & Drainage System
 DATE OF VISIT: / /

Factor : "During Construction" = 0.40; "Upon Completion" = 0.50

Sub-item Code	INDICATORS <small>Note: Spots with a single major defect shall forfeit all points for the rest of the indicators in the said spot. Further, if the number of complying spots is less than fifty percent (50%) of the total number of spots, the rating for that specific item of work is zero (0).</small>	Results	Score _____ x factor	Action Monitor
Item 900 Pipe Culvert and Storm Drain				
SDWS-900-01	Bedding and backfill materials compacted to the required density	/	_____x_____ =	
SDWS-900-02	Proper jointing of pipes	/	_____x_____ =	
SDWS-900-03	Mortar for jointing of reinforced concrete culvert pipes conforms to specified mixture type	/	_____x_____ =	
SDWS-900-04	Adequate collaring of reinforced concrete culvert pipes	/	_____x_____ =	
SDWS-900-05	Conformance to the approved/specified tolerance for elevation, slope, and alignment	/	_____x_____ =	
SDWS-900-06	Cracks, honeycomb, chipping-off within specified tolerances	/	_____x_____ =	
SDWS-900-07	Sufficient collaring & flushing	/	_____x_____ =	
SDWS-900-08	Conformance to the approved quality of concrete mix	/	_____x_____ =	
SDWS-900-09	Spacing and sizes of rebars conform to specification	/	_____x_____ =	
		/	_____x_____ =	
Item 901 Manholes, Inlets and Catch Basin				
SDWS-901-01	Conformance to approved/specified tolerances for dimensions, elevations	/	_____x_____ =	
SDWS-901-02	Covers and gratings well fitted and can easily be opened during maintenance work	/	_____x_____ =	
SDWS-901-03	Honeycomb, cracks, spalling, etc. within specified tolerance	/	_____x_____ =	
SDWS-901-04	Conformance to approved quality of concrete mix	/	_____x_____ =	
SDWS-901-05	Spacing and sizes of rebars conform to specification	/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
		/	_____x_____ =	
Total Score (a)				CAR Total
No. of Indicators (b)				
Rate = (a) / (b)				
Rate				

Was subcontractor(s) used? If yes, name of company(ies) and sub-item:

Entered by: _____ Date: / /

A N N E X 3

CHECKLIST FOR MATERIALS

ITEM: _____

A N N E X 4

CHECKLIST FOR TIME

**CONSTRUCTORS PERFORMANCE EVALUATION SYSTEM CHECKLIST
FOR TIME (During Construction)**

PROJECT ID/NO.: _____
_____ VISIT

PROJECT TYPE: _____
DATE OF VISIT: / /

Sub-item Code	I N D I C A T O R S	Results	Score	Action Monitor
TME-I-01	On or ahead of schedule per approved Bar chart & S-curve		0.15	
TME-I-02	With less than 15% negative slippage Formula: Score = 15% - Slippage = _____%			
TME-I-03	With negative slippage of 15% or more		0.00	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Rate =	

Entered by: _____

Date: / /

DELAY FAULT OF: _____ Constructor _____ Project Owner _____ Others

CAUSES OF DELAY (Please indicate codes as listed below): _____

Constructor-related Problems

- C-WO1 Insufficient manpower deployed in project site
- C-EO1 Breakdown of equipment/equipment not operational
- C-EO2 Lack/Insufficient/Inadequate equipment deployed in project site
- C-MO1 Lack/Inadequate/Insufficient supply of construction materials
- C-RO1 Lack of financial resources

Agency-related Problems

- A-VO1 Delays in the approval of variation orders
- A-TO1 Delays in the approval of contract time extension
- A-SO1 Delays in the approval of suspension order
- A-DO1 Changes in construction designs
- A-FO1 Delays in the releases of funds
- A-RO1 Right-of-Way (ROW) acquisition problem (squatter relocation problems,
 relocation of utilities, i.e. PLDT, MERALCO posts and other similar cases)
- A-PO1 Delays in acquisition of necessary permits

Other-related Problems

- O-WO1 Unfavorable weather condition (occurrence of natural calamities; occurrence
 of flooding/siltation on site; unworkable ground condition)
- O-PO1 Insurgence or peace and order problems/civil disturbances
- O-TO1 Third party intervention

Note: In rating time, only delays that are attributable to the constructor should be reflected in the rating

**CONSTRUCTORS PERFORMANCE EVALUATION SYSTEM CHECKLIST
FOR TIME (*Upon Completion*)**

PROJECT ID/NO.: _____
FINAL VISIT

PROJECT TYPE: _____
DATE OF VISIT: / /

Sub-item Code	I N D I C A T O R S	Results	Score	Action Monitor
TME-F-01	On or ahead of schedule per approved Bar Chart & S-Curve		0.30	
TME-F-02	With less than 10% negative slippage Formula: Score = [(10% - Slippage) x 0.30]/10			
TME-F-03	With negative slippage of 10% or more		0.00	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Rate =	

Entered by: _____

Date: / /

DELAY FAULT OF: _____ Constructor _____ Project Owner _____ Others

CAUSES OF DELAY (Please indicate codes as listed below): _____

Constructor-related Problems

C-WO1 Insufficient manpower deployed in project site
C-EO1 Breakdown of equipment/equipment not operational
C-EO2 Lack/Insufficient/Inadequate equipment deployed in project site
C-MO1 Lack/Inadequate/Insufficient supply of construction materials
C-RO1 Lack of financial resources

Agency-related Problems

A-VO1 Delays in the approval of variation orders
A-TO1 Delays in the approval of contract time extension
A-SO1 Delays in the approval of suspension order
A-DO1 Changes in construction designs
A-FO1 Delays in the releases of funds
A-RO1 Right-of-Way (ROW) acquisition problem (squatter relocation problems,
 relocation of utilities, i.e. PLDT, MERALCO posts and other similar cases)
A-PO1 Delays in acquisition of necessary permits

Other-related Problems

O-WO1 Unfavorable weather condition (occurrence of natural calamities;
 occurrence of flooding/siltation on site; unworkable ground condition)
O-PO1 Insurgence or peace and order problems/civil disturbances
O-TO1 Third party intervention

Note: In rating time, only delays that are attributable to the constructor should be reflected in the rating

CONSTRUCTORS PERFORMANCE EVALUATION SYSTEM CHECKLIST
FOR TIME (During Construction - for contracts with no materials
or materials are supplied by the owner)

PROJECT ID/NO.: _____
 _____ VISIT

PROJECT TYPE: _____
 DATE OF VISIT: / /

Sub-item Code	I N D I C A T O R S	Results	Score	Action Monitor
TME-I-01	On or ahead of schedule per approved Bar chart & S-Curve		0.20	
TME-I-02	With less than 15% negative slippage Formula: Score = [(15% - Slippage) x 0.20]/15			
TME-I-03	With negative slippage of 15% or more		0.00	
Was subcontractor used? If yes, name of company and owner: _____ & _____			Rate =	

Entered by: _____

Date: / /

DELAY FAULT OF: _____ Constructor _____ Project Owner _____ Others

CAUSES OF DELAY (Please indicate codes as listed below): _____

Constructor-related Problems

C-WO1 Insufficient manpower deployed in project site
 C-EO1 Breakdown of equipment/equipment not operational
 C-EO2 Lack/Insufficient/Inadequate equipment deployed in project site
 C-MO1 Lack/Inadequate/Insufficient supply of construction materials
 C-RO1 Lack of financial resources

Agency-related Problems

A-VO1 Delays in the approval of variation orders
 A-TO1 Delays in the approval of contract time extension
 A-SO1 Delays in the approval of suspension order
 A-DO1 Changes in construction designs
 A-FO1 Delays in the releases of funds
 A-RO1 Right-of-Way (ROW) acquisition problem (squatter relocation problems,
 relocation of utilities, i.e. PLDT, MERALCO posts and other similar cases)
 A-PO1 Delays in acquisition of necessary permits

Other-related Problems

O-WO1 Unfavorable weather condition (occurrence of natural calamities; occurrence
 of flooding/siltation on site; unworkable ground condition)
 O-PO1 Insurgence or peace and order problems/civil disturbances
 O-TO1 Third party intervention

Note: In rating time, only delays that are attributable to the constructor should be reflected in the rating

CONSTRUCTORS PERFORMANCE EVALUATION SYSTEM CHECKLIST
FOR TIME (Upon Completion - for contracts with no materials
or materials are supplied by the owner)

PROJECT ID/NO.: _____
 FINAL VISIT

PROJECT TYPE: _____
 DATE OF VISIT: / /

Sub-item Code	I N D I C A T O R S	Results	Score	Action Monitor
TME-F-01	On or ahead of schedule per approved Bar Chart & S-Curve		0.50	
TME-F-02	With less than 10% negative slippage Formula: Score = [(10% - Slippage) x 0.50]/10			
TME-F-03	With negative slippage of 10% or more		0.00	
			Rate =	
Was subcontractor used? If yes, name of company and owner: _____ & _____				

Entered by: _____

Date: / /

DELAY FAULT OF: _____ Constructor _____ Project Owner _____ Others

CAUSES OF DELAY (Please indicate codes as listed below): _____

Constructor-related Problems

C-WO1 Insufficient manpower deployed in project site
 C-EO1 Breakdown of equipment/equipment not operational
 C-EO2 Lack/Insufficient/Inadequate equipment deployed in project site
 C-MO1 Lack/Inadequate/Insufficient supply of construction materials
 C-RO1 Lack of financial resources

Agency-related Problems

A-VO1 Delays in the approval of variation orders
 A-TO1 Delays in the approval of contract time extension
 A-SO1 Delays in the approval of suspension order
 A-DO1 Changes in construction designs
 A-FO1 Delays in the releases of funds
 A-RO1 Right-of-Way (ROW) acquisition problem (squatter relocation problems, relocation of utilities, i.e. PLDT, MERALCO posts and other similar cases)
 A-PO1 Delays in acquisition of necessary permits

Other-related Problems

O-WO1 Unfavorable weather condition (occurrence of natural calamities; occurrence of flooding/siltation on site; unworkable ground condition)
 O-PO1 Insurgence or peace and order problems/civil disturbances
 O-TO1 Third party intervention

Note: In rating time, only delays that are attributable to the constructor should be reflected in the rating

A N N E X 5

CHECKLIST FOR FACILITIES

PROJECT ID/NO.: _____
 _____ Visit

PROJECT TYPE: _____
DATE OF VISIT: / /

5-1

A N N E X 6

CHECKLIST FOR ENVIRONMENTAL, SAFETY AND HEALTH

CONSTRUCTORS PERFORMANCE EVALUATION SYSTEM CHECKLIST FOR ENVIRONMENTAL, SAFETY AND HEALTH

PROJECT ID/NO.: _____

PROJECT TYPE: _____

_____ VISIT

DATE OF VISIT: / /

Sub-item Code	INDICATORS*	Results	Score	Action Monitor
Environmental				
ESH-100-01	Waste materials are collected, stored and transported to approved dumps/disposal area.	1 or 0	x 0.07 =	
ESH-100-02	Construction activities are carried out in specific time of the day as approved by local officials..	1 or 0	x 0.07 =	
ESH-100-03	Compliance to Environmental Clearance Certificate requirements.	1 or 0	x 0.07 =	
Safety and Health				
ESH-200-01	Safety and Health program approved by DOLE/Implementing Office (IO).	1 or 0	x 0.07 =	
ESH-200-02	Safety and Health committee established and maintained in accordance with Rule 1410 of Occupational Safety and Health Standards.	1 or 0	x 0.07 =	
ESH-200-03	Certified/Qualified Safety and Health personnel employed and detailed at site.	1 or 0	x 0.07 =	
ESH-200-04	Appropriate personal protective equipment (e.g. helmets, safety shoes, safety belt/lifeline, eye protection, ear plug, dust mask, etc.) provided and worn by all workers/staff.	1 or 0	x 0.07 =	
ESH-200-05	Heavy equipment operated by certified/qualified operators only.	1 or 0	x 0.07 =	
ESH-200-06	Critical construction work done by certified/qualified skilled workers only.	1 or 0	x 0.07 =	
ESH-200-07	Heavy equipment are tested and certified to be in good running condition.	1 or 0	x 0.07 =	
ESH-200-08	Safety practices and procedures in general construction observed and implemented at construction site (electrical, fire protection, lighting, construction of safe walkways, protection from falling materials, shoring, scaffolding, etc.).	1 or 0	x 0.07 =	
ESH-200-09	First aid cabinets are fully equipped and readily available for treatment of sicknesses and injuries.	1 or 0	x 0.07 =	
ESH-200-10	ESH signs are clearly visible to construction staff, workers and public	1 or 0	x 0.07 =	
ESH-200-11	Conduct of regular safety meeting.	1 or 0	x 0.07 =	
ESH-200-12	Monthly construction safety and health report submitted to DOLE.	1 or 0	x 0.07 =	

Was subcontractor used? If yes, name of company and owner:

_____ & _____

Entered by: _____

Date: / /

Total Score(a)

No. of Indicators (b)

(a) / (b) =

Rate =

A N N E X 7

CHECKLIST FOR RESOURCES DEPLOYMENT

PROJECT ID/NO.: _____ PROJECT TYPE: _____
 _____ VISIT DATE OF VISIT: / /

7-1

ANNEX 8

CPES EVALUATION FORM

Part I

General Information Sheet

8-1

Part II During Construction Rating Sheet

8-2

Part III Upon Completion Rating Sheet

8-3

CPES EVALUATION FORM

- ☐ Road ☐ Bridge ☐ Housing ☐ Building ☐ Irrigation ☐ Flood Control
☐ Port and Harbor ☐ Power Transmission Line ☐ Substation ☐ Diesel Power Plant
☐ Mooring Facilities for Power Barges ☐ Site Development ☐ Others _____

Project Owner	:	
Project Implementing Office	:	

PART I. GENERAL INFORMATION

Name of Constructor/s
% Share of each Firm (if Joint Venture)
Name of AMO
Address
Valid License Number & Category/ARC-C
Nationality (Local/Foreign)

Date of Evaluation	:	
Project Type	:	
Project Name	:	
Project Location/Region	:	
Funding Source	:	
Scope of Work	:	
Status	:	

Name of Constructor/Gov't Proj Manager	:	
Name of Constructor/Gov't Proj Engineer	:	
Name of Constructor/Gov't Mat'ls Engineer	:	
Name of Constructor Cost Engineer	:	
Consultant/Consulting Firm	:	

Contract Cost, Original	:	P		Revised	:		as of	
Contract Duration, Original	:			Revised	:		as of	
Scheduled Start Date	:			Revised	:		as of	
Actual Date Started	:				:			
Scheduled Completion Date	:			Revised	:		as of	

% Planned Physical Accomplishment for the Month	:	
% Actual Physical Accomplishment for the Month	:	
Slippage for the Month	:	
Variation Order (Php, M)	:	
Time Extension	:	

PART II. DURING CONSTRUCTION RATING SHEET

Date of ____ Visit / / /

Items of Work/Description	% Weight	Relative % Weight	Workmanship [Max 0.40]		Materials [Max. 0.30]	
			Rate	Relative Rate	Rate	Relative Rate
Total						

Summary of Ratings

Workmanship [Max. 0.40]
 Materials [Max. 0.30].....
 Time [Max. 0.15]
 Facilities [Max. 0.03]
 Environmental, Safety & Health [Max. 0.07]
 Resource Deployment [Max. 0.05]

RATING

Sum of Ratings "During Construction" (a)
 Average Rating "During Construction" (b)
 Appropriate Weight for Kind of Project (c)

(A) WEIGHTED RATING FOR "DURING CONSTRUCTION" (b x c)

CPE Head/Individual

Designation, Office

Signature

CPE Members

Designation, Office

Signature

Resource Persons/Witnesses

Designation, Office

Signature

(Note: This form maybe reproduced depending on the number of visits)

Date of ____ Visit / / / /

Item of Work/Description	% Weight	Relative % Weight	Workmanship [Max 0.50]		Materials [Max. 0.20]	
			Rate	Relative Rate	Rate	Relative Rate
Total						

Summary of Ratings

Workmanship [Max. 0.50].....

Materials [Max. 0.20]

Time [Max. 0.30]

RATING (a)

Appropriate Weight for Kind of Project (b)

(B) WEIGHTED RATING FOR "UPON COMPLETION" (a x b)

OVER-ALL CPES RATING (A of Part II + B of Part III) x 100%

$$= \left(\frac{\quad}{\quad} + \frac{\quad}{\quad} \right) \times 100\% = \quad\%$$

QUALITATIVE DESCRIPTION

[] Outstanding **>96%**

[] Very Satisfactory $>89\% \leq 96\%$

[] Satisfactory $>82\% \leq 89\%$

[] Unsatisfactory $\geq 75\% < 82\%$

[] Poor $< 75\%$

■ ■ ■

CPE Head/Individual

Designation, Office

Signature

CPE Members

Designation, Office

Signature

Resource Persons/Witnesses

Designation, Office

Signature

A N N E X 9

CORRECTIVE ACTION REQUEST (CAR) FORM

Project Data

Non-Conformance Findings (to be submitted by Evaluator):

This image shows a single sheet of white paper with horizontal ruling lines. The lines are evenly spaced and run across the width of the page. There are no margins, text, or other markings on the paper.

Position

Printed Name

Signature

____/____/____
Date

CORRECTIVE ACTION PLAN (CAP) & PREVENTIVE ACTION PLAN (PAP)
(To be Submitted by Constructor)

Project Data

Project Owner : _____
Project Implementing Office : _____
Project Type : _____
Project Name : _____
Project Location : _____
Constructors Name : _____
Date of Evaluation : _____

Proposed Corrective Action Plan (CAP)

[] Remove & Replace [] Repair [] Variation

Sub-Item Code: Location/Detail

Proposed Preventive Action Plan (PAP)

Sub-Item Code: Location/Detail

Position Printed Name Signature ____/____/____
Date

ASSESSMENT OF CORRECTIVE ACTION PLAN

Project Data

Project Owner : _____
Project Implementing Office : _____
Project Type : _____
Project Name : _____
Project Location : _____
Constructors Name : _____
Date of Evaluation : _____

Assessment by the Head of the Implementing Office:

Sub-Item Code: Location/Detail

☐ Approved ☐ Not Approved

Reasons _____

Position Printed Name Signature ____/____/____
Date

Verification: (Verified by Owner's Project Engineers)

☐ Implemented Corrected Action

☐ Unsatisfactory

Signature ____/____/____
Date

☐ Ongoing

Signature ____/____/____
Date

☐ Satisfactorily Completed

Signature ____/____/____
Date

A N N E X 10

CONSTRUCTORS PERFORMANCE SUMMARY REPORT

General Information Sheet	10-1
Non-Compliance Findings	10-2
List of Problems Encountered	10-3
Proposed Corrective Actions	10-3

Note: This summary report shall be submitted by the CPES-IU to CIAP based on the evaluation results.

CONSTRUCTORS PERFORMANCE SUMMARY REPORT

Project Owner	:	
Project Implementing Office	:	

General Information

Name of Constructor/s	:	
% Share of each Firm (if JV)	:	
Name of AMO	:	
Address	:	
Valid License Number	:	
PCAB/ARC Category	:	
Contractors Association	:	
Nationality (Local/Foreign)	:	

Project Data

Date of Evaluation	:	
Project Type	:	
Project Name	:	
Project Location	:	
Funding Source	:	
Scope of Work	:	
Status	:	
Name of Constructor/Gov't Proj Manager	:	
Name of Constructor/Gov't Proj Engineer	:	
Name of Constructor/Gov't Mat'ls Engineer	:	
Name of Constructor Cost Engineer	:	
Consultant/Consulting Firm	:	

Contract Cost, Original	:	P		Revised	:		as of	
Contract Duration, Original	:			Revised	:		as of	
Scheduled Start Date	:			Revised	:		as of	
Actual Date Started	:				:			
Scheduled Completion Date	:			Revised	:		as of	
% Planned Physical Accomplishment for the Month							:	
% Actual Physical Accomplishment for the Month							:	
Slippage for the Month							:	
Variation Order (Php, M)							:	
Time Extension (C. D.)							:	

Summary of Ratings

No. of Visit		:	
Workmanship	(0.40/0.50)	:	
Materials	(0.30/0.20)	:	
Time	(0.15/0.30)	:	
Facilities	(0.03)	:	
Environment, Safety & Health	(0.07)	:	
Resources Deployment	(0.05)	:	
VISIT RATING				

FINAL RATING	:		
QUALITATIVE DESCRIPTION	:		

CPE FINDINGS

A. Non-Compliance Findings Based on CPES Checklist

Notes: The list of non-compliance findings on the different aspects covered must be based on its requirement for Corrective Action Request (CAR)

Workmanship

Item-Code	Description	*R
	<u>Constructors Challenges Encountered</u>	

*** Results, R = Non-Compliance/Number of spots**

Materials

Item-Code	Description
	<u>Constructors Challenges Encountered</u>

Time

Item-Code	Description
	<u>Challenges Encountered</u> <i>(Please indicate codes as listed below)</i>

CONSTRUCTOR-RELATED PROBLEMS

- C-W01 Insufficient manpower deployed in projects site
- C-E01 Breakdown of equipment/equipment not operational
- C-E02 Lack/Insufficient/Inadequate equipment deployed in project site
- C-M01 Lack/Inadequate/Insufficient supply of construction materials
- C-R01 Lack of financial resources

AGENCY-RELATED PROBLEMS

- A-V01 Delays in the approval of variation orders
- A-T01 Delays in the approval of contract time extension
- A-S01 Delays in the approval of suspension order
- A-D01 Changes in construction designs
- A-F01 Delays in the releases of funds
- A-R01 Right-of-Way (ROW) acquisition problem (squatter relocation problems, relocation of utilities, i.e. PLDT, MERALCO posts and other similar cases)
- A-P01 Delays in acquisition of necessary permits

OTHER-RELATED PROBLEMS

- O-W01 Unfavorable weather condition (occurrence of natural calamities, flooding/siltation on site; unworkable ground condition)
- O-P01 Insurgence or peace and order problems/civil disturbances
- O-T01 Third party intervention
- O-C01 Additional Commission on Audit (COA) requirements

Facilities

Item-Code	Description
	<u>Constructors Challenges Encountered</u>

Environmental, Safety and Health

Item-Code	Description
	<u>Constructors Challenges Encountered</u>

Resources Deployment

Item-Code	Description
	<u>Constructors Challenges Encountered</u>

B. List of Challenges Encountered by Agency and Other Related Challenges Encountered

CHALLENGES ENCOUNTERED			
AGENCY		OTHER RELATED	
Code	Description	Code	Description

C. Proposed Corrective Action Plan by the Contractor

Item-Code	Corrective Action

D. Narrative Reports

- Please highlight major positive and negative performances of constructor in summary form.
- Non-compliance of Corrective Action Request (CAR) of (no. Visit)
- Others/Remarks:

CPES EVALUATORS:

	Name	Signature
Team Leader	_____	_____
Members	_____	_____
	_____	_____
	_____	_____

Noted by:

Head, CPES-IU

A N N E X 11

SCHEDULE OF MINIMUM TEST REQUIREMENTS GOVERNING ITEMS OF WORK OF THE DPWH STANDARD SPECIFICATIONS FOR HIGHWAYS, BRIDGES AND AIRPORTS

A. Applicable for Irrigation and Flood Control Projects

Part C	Earthworks (Items 102, 103, 104, 105, 106)	11-1
Part D	Sub-base and Base Course (Items 200, 201, 202, 203, 204, 205, 206, 207)	11-1
Part E	Surface Course (Items 300, 301, 302, 303, 304, 305, 306, 307, 308, 309, 310)	11-3
Part F	Bridge Construction (Items 311, 400, 401, 402, 403, 404, 405, 406, 407, 408, 409, 410, 411)	11-7
Part G	Drainage and Slope Protection (Items 500, 501, 502, 503, 504, 505, 506, 507, 508, 509)	11-9
Part H	Miscellaneous Structure (Item 600, 601, 602, 604, 605, 606, 607, 608, 609, 610, 611)	11-10
Part I	Materials Details (Items 700, 701, 702, 703, 703A, 704, 705, 706, 707, 708, 709, 710, 711, 712, 713, 714)	11-11

**SCHEDULE OF MINIMUM TEST REQUIREMENTS GOVERNING ITEMS OF
WORK OF THE DPWH STANDARD SPECIFICATIONS FOR HIGHWAYS,
BRIDGES AND AIRPORTS, 1998, (VOLUME II)**

PART C - EARTHWORK

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 100 - Clearing & Grubbing	None
Item 101 - Removal of Structures & Obstruction	None
Item 102 - Excavation	Same tests as for Items 103, 104 and 105, whichever is applicable.
Item 103 - Structure Excavation If excavated materials are wasted, the volume involved shall be reported so that Quality Control requirements may be adjusted accordingly. Submit Project Engineer Certificate of Waste	If excavated materials are incorporated into the work: For every 1500 cu.m. or fraction thereof: 1-G, Grading Test 1-P, Plasticity Test (LL, PL, PI) 1-C, Laboratory Compaction Test For every 150 mm layer in uncompacted depth: 1-D, Field Density
Item 104 - Embankment	For every 1500 cu.m. or fraction thereof: 1-G, Grading Test 1-P, Plasticity Test (LL, PL, PI) 1-C, Laboratory Compaction Test For each 500 sq. m. of each layer of compacted fill or fraction thereof at least one group of three in-situ density tests. The layers shall be placed not exceeding 200 mm in loose measurement or based on the result of compaction trials.
Item 105 - Sub-grade Preparation	Same tests as for Item 104
Item 106 - Compaction Equipment and Density Control Strips	Same tests as for Items 104, 105, 200, 201, 202, 203, 204, 205, 206 and 300.
Item 107 - Overhaul	None

PART D - SUBBASE AND BASE COURSE

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 200 - Aggregate Subbase Course	For every 300 cu.m. or fraction thereof: 1-G, Grading Test 1-P, Plasticity Test (LL, PL, PI) For every 1500 cu.m. or fraction thereof: 1-C, Laboratory Compaction Test For every 2500 cu.m. or fraction thereof: 1-CBR, California Bearing Ratio Test For every layer of 150 mm of compacted depth/ based on the results of compaction trials: At least one group of three in-situ density tests for each 500 sq.m. or fraction thereof.

Item 201 - Aggregate Base Course	<p>For every 300 cu.m. or fraction thereof:</p> <p>1-G, Grading Test</p> <p>1-P, Plasticity Test (LL, PL, PI)</p> <p>For every 1500 cu.m. or fraction thereof:</p> <p>1-Q, Quality Test for : (Grading, Plasticity and Abrasion)</p> <p>1-C, Laboratory Compaction Test</p> <p>For every layer of 150 mm of compacted depth/ based on the results of compaction trials:</p> <p>At least one group of three in-situ density tests for each 500 sq.m. or fraction thereof.</p>
----------------------------------	--

PART D - SUBBASE AND BASE COURSE

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 202 - Crush Aggregate Base Course	<p>Same tests as for Item 201</p> <p>For every 1500 cu.m. or fraction thereof:</p> <p>1-F, Fractured Face</p>
Item 203 - Lime Stabilized Road Mix Base Course Amount of Lime to be added: 3 to 12 mass percent of dry aggregate	<p>A. <u>Soil Aggregate</u></p> <p>For every 300 cu.m. or fraction thereof:</p> <p>1-G, Grading Test</p> <p>1-P, Plasticity Test (LL, PL, PI)</p> <p>For every 1500 cu.m. or fraction thereof:</p> <p>1-Q, Quality Test for : (Grading, Plasticity and Abrasion)</p> <p>B. <u>Mix</u></p> <p>For every 300 cu.m. or fraction thereof:</p> <p>1-C, Laboratory Compaction Test</p> <p>1-UC, Unconfined Compression Test</p> <p>1-CBR, California Bearing Ratio Test</p> <p>C. <u>Compacted Base Course</u></p> <p>For every layer of 150 mm of compacted depth:</p> <p>1-D, Field Density Test for every 150m or fraction thereof</p> <p>D. <u>Hydrated Lime</u></p> <p>For every 100 t or fraction thereof:</p> <p>1-Q, Quality Test</p>
Item 204 - Portland Cement Stabilized Road Mix Base Course Amount of Cement to be added: 6 to 10 mass % of dry soil aggregate	<p>A. <u>Soil Aggregate</u></p> <p>Same tests as for Item 203</p> <p>B. <u>Cement</u></p> <p>1-Q Quality Test for every 2000 bags of fraction thereof</p> <p>C. <u>Water</u></p> <p>1-Q, Quality Test/Project Engineer's Certificate</p> <p>D. <u>Mix</u></p> <p>For every 300 cu.m. or fraction thereof:</p> <p>1-C, Laboratory Compaction Test</p> <p>1-UC, Unconfined Compression Test</p> <p>1-CBR, California Bearing Ratio Test</p> <p>E. <u>Compacted Base Course</u></p> <p>For every layer of 150 mm compacted depth</p> <p>1-D, Field density Test for every 150m or fraction thereof</p> <p>1-T, thickness determination for every 150 m or fraction thereof</p>

Item 205 - Asphalt Stabilized Road Mix Base Course Amount of Asphalt to be added: 6 to 10 mass % of dry soil aggregate.	A. <u>Soil Aggregate</u> Same tests as for Item 203 B. <u>Emulsified Asphalt</u> 1-Q, Quality Test for every 40 to 200 drums or fraction thereof C. <u>Mix</u> Same tests as for Item 203 D. <u>Compacted Base Course</u> Same tests as for Item 203
Item 206 - Portland Cement Treated Plant Mix Base course Amount of Asphalt to be added: 6 to 10 mass % of dry soil aggregate	A. <u>Soil Aggregate</u> Same tests as for Item 203 B. <u>Portland Cement</u> For every 2000 bags of fraction thereof: 1-Q, Quality Test C. <u>Water</u> 1-Q, Quality Test/Project Engr's Certificate

PART D - SUBBASE AND BASE COURSE

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
	D. <u>Same tests as for Item 204</u> E. <u>Compacted Base Course</u> For every layer of 150 mm compacted depth 1-D, Field Density Test for every 150 m or fraction thereof 1-T, Thickness determination for every 150m or fraction thereof
Item 207 - Aggregate Stockpile	Same tests as specified in Item No. of the Specs.

PART E - SURFACE COURSE

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 300 - Aggregate Surface Course	For every 300 cu. m. or fraction thereof: 1-G, Grading Test 1-P, Plasticity Test (PI, LL, PI) For every 1500 cu.m. or fraction thereof: 1-C, compaction Test for: (Grading, plasticity and Abrasion) For every layer of 150 mm of compacted depth/based on the results of compaction trials. At least on group of three in-situ density tests for each 500 sq. m. or fraction thereof. For crushed Gravel or Crushed Stone, 1500 cu.m. or fraction thereof: 1-F, Fractured face
Item 301 - Bituminous Prime Coat	Quantity: 1 to 2 L/sq.m. 1-Q, quality Test for every 40 t or 200 drums
Item 302 - Bituminous Tack Coat	Quantity: 0.2 to 0.7 L/sq.m. 1-Q, Quality test for every 40 t or 200 drums
Item 303 - Bituminous Seal Coat	A. <u>Bituminous Materials</u> Quantity: 0.2 to 1.5 L/sq.m. 1-Q, Quality Test for every 40t or 200 drums B. <u>Cover Aggregates</u> Quantity: From 5 to 14 kg/s.q. m. For every 75 cu.m./200 kg. or fraction thereof : 1-G, grading Test

Item 304 - Bituminous Surface Treatment	<p>A. <u>Aggregates</u> Quantity: Using Cut-Back Asphalt or Asphalt Cement – 13.6 to 38.0 kg/sq.m. Using Emulsified Asphalt - 13.6 to 19.04 Kg/sq.m. For every 75 cu.m./200 kg. or fraction thereof: 1- G, grading Test 1- P, Plasticity Test (PL, LL, PI) For every 1500 cu.m. or fraction thereof: 1- Q, Quality Test for: (Grading, Plasticity, Abrasion, Stripping and Bulk specific Gravity) 1-F, Fractured Face</p> <p>B. <u>Bituminous Materials</u> Quantity: Using Cut-back Asphalt or Asphalt Cement - 1.58 to 2.04 L/sq.m. Using Emulsified asphalt - 1.58 to 2.04 L/sq.m. Same test as for Item 301</p>
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PART E - SURFACE COURSE

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 305 - Bituminous Penetration Macadam Pavement	<p>A. <u>Aggregates</u> Quantity: 1. Using Asphalt Cement or Rapid Curing Course (Crushed) -----90 Kg/sq.m. Key (Crushed) --- (13 & 11) -----24 kg/sq.m. Cover Crushed & Screened) -----8 kg/sq.m. 2. Using Emulsified Asphalt Course (Crushed) -----90 kg/sq.m. Choker (Crushed) -----10 kg/sq.m. Key (Crushed) -----18 kg/sq.m. Cover (Crushed or Screened) ----- 8 kg/sq.m. Same test as for Item 304</p> <p>B. <u>Bituminous Materials</u> Quantity: 7.2 to 11 L/sq.m. Same tests as for for Item 301</p>

Item 306 - Bituminous Road Mix Surface Course	<p>A. <u>Aggregates</u> Same tests as for Item 304</p> <p>B. <u>Bituminous Materials</u> Quantity: 1. Using Cut-Back Asphalt - 4.5 to 7.0 mass % of total dry aggregate 2. Using Emulsified Asphalt - 6.0 to 10.0 mass % of total dry aggregate Same test as for Item 301</p> <p>C. <u>Mix</u> Tests: For every 75 cu.m./130 t or fraction thereof: 1-G, grading Test 1-Ext., Extraction 1-Sty., Stability 1-C, Laboratory Compaction</p> <p>D. <u>Hydrate Lime</u> For every 100 t or fraction thereof: Tests: 1-Q, quality Test</p> <p>E. <u>Compacted pavement</u> For each full day's operation: Tests: D & T (Density and Thickness Test) - at least one (1) but not more than (3) samples shall be taken.</p>
Item 307 - Bituminous Plant-Mix Surface Course General	<p>A. <u>Aggregates</u> For every 75 cu.m./200 t or fraction thereof: 1-G & P, Grading and Plasticity Tests for every 1500 cu.m. of fraction thereof: 1-Q, quality Test for: (Grading, Plasticity, Abrasion, Stripping and Bulk Specific Gravity) 1-F, Fractured Face</p> <p>B. <u>Bituminous Materials</u> Quantity: 5.0 to 8.0 mass % of total dry aggregate Tests: 1-Q, Quality Test for each 40 t of fraction thereof</p> <p>C. <u>Mix</u> For every 75 cu.m. /130 t of fraction thereof: 1-G, Grading Test 1-Ext., Extraction 1-Sty., Stability 1-C, Laboratory Compaction</p>

PART E - SURFACE COURSE

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
	<p>D. <u>Hydrated Lime</u> For every 100 t or fraction thereof</p> <p>E. <u>Mineral filler</u> For every 75 cu.m. or fraction thereof: 1-G & P, grading and Plasticity Tests (LL, PL, PI) For each full day's operation: D & T (Density and Thickness Tests) - at least one (1) but not more than three (3) samples shall be taken.</p>

Item 308 - Bituminous Plant Mix, Surface Course, Cold laid	<p>A. <u>Aggregate</u> Same tests as for Item 307</p> <p>B. <u>Bituminous Material</u> Quantity: Using Cut-Back Asphalt - 4.5 to 7.0 mass % of total dry aggregate Using Emulsified Asphalt - 6.0 to 10.0 mass % of total dry aggregate Tests: 1-Q, Quality Test for every 40t or 200 drums</p> <p>C. <u>Mix</u> Same tests as for Item 307</p> <p>D. <u>Hydrated Lime</u> Same tests as for Item 307</p> <p>E. <u>Mineral Filler</u> For every 75 cu.m. or fraction thereof: 1-G & P, Grading and Plasticity Tests (LL, PL, PI)</p> <p>F. <u>Compacted Pavement</u> Same tests as for Item 307</p>
Item 309 - Bituminous Plant Mix (Stockpile Maintenance Mixture)	<p>A. <u>Aggregate</u> Same tests as for Item 307</p> <p>B. <u>Bituminous Materials</u> Quantity: 4 to 10 Mass % of total mix Tsts: 1-Q, Quality Test for every 40t or 200 drums</p> <p>C. <u>Mix</u> Same tests as for Item 307</p> <p>D. <u>Hydrated Lime</u> Same tests as for Item 307</p> <p>E. <u>Mineral Filler</u> Same tests as for Item 307</p> <p>F. <u>Compacted Pavement</u> Same tests as for Item 307</p>
Item 310 - Bituminous Concrete Surface Course, Hot-Laid	<p>A. <u>Aggregate</u> Same tests as for Item 307</p> <p>B. <u>Bituminous Materials</u> Quantity: 5 to 8 Mass % of total dry aggregates</p> <p>C. <u>Mix</u> Same tests as for Item 307</p> <p>D. <u>Hydrated Lime</u> Same tests as for Item 307</p> <p>E. <u>Mineral Filler</u> Same tests as for Item 307</p> <p>F. <u>Compacted Pavement</u> Same tests as for Item 307</p>

PART E - SURFACE COURSE

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
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<p>Item 311 - Portland Cement Concrete Pavement</p>	<p>A. <u>Cement</u> Quality: 9.00 bags cu.m. (40Kg/bag) Tests: For every 2000 bags or fraction thereof 1-Q, Quality Test</p> <p>B. <u>Fine Aggregate</u> Quantity: 1 0.05 cu.m./cu.m. concrete (if rounded coarse aggregate is used) 2. 0.54 cu.m./cu.m. concrete (if angular coarse aggregate is used) Tests: For every 1500 cu.m. or fraction thereof: a. For a coarse not yet tested, or failed in previous quality test: 1-Q, Quality Test For: Grading, Elutriation (Wash), Bulk Specific Gravity, Absorption Mortar Strength, Soundness, Organic Impurities, Unit Weight, % Clay Lumps and Shale. b. For a source previously tested and passed Quality Test: 1-Q, Quality Test for: Grading, Elutriation (Wash), Bulk Specific Gravity, Absorption Mortar Strength. For every 75 cu.m. or fraction thereof 1-G, Grading Test</p> <p>C. <u>Course Aggregate</u> Quantity: 1. 0.77 cu.m/cu.m concrete (if rounded coarse aggregate is used) 2. 0.68 cu.m/cu.m concrete (if angular coarse aggregate is used) Tests: For every 1500 cu.m or fraction Thereof a. For a source previously tested and passed quality tests: 1-Q, Quality Test for: Grading, Bulk Specific Gravity, Absorption and Abrasion For every 75 cu. m or fraction thereof: 1-G Grading Test</p> <p>D. <u>Water</u> Tests: 1-Certificate from Project Engineer or 1-Q, Quality Test, if source is questionable</p> <p>E. <u>Joint Filler</u> 1. Poured Joint Filler 1-Q, Quality Test on each type of ingredient for each shipment 2. Premolded Joint Filler 1-Q, Quality Test on each thickness of filler for each shipment</p> <p>F. <u>Special Curing Agents</u> 1-Q, Quality Test for each shipment</p> <p>G. <u>Steel Bars</u> For every 10,000 kg. or fraction thereof for each size 1-Q, Quality Test for Bending, Tension and Chemical Analysis</p>
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ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
	<p>H. <u>Concrete</u> Flexural Strength Test on Concrete Beam Sample 1-set consisting of 3 beam samples shall represent a 330 sq. m of pavement, 230 mm depth or fraction thereof placed each day. Volume of concrete not more than 75 cu.m.</p> <p>I. <u>Completed Pavement</u> Thickness determination by concrete core drilling on a lot basis Five (5) holes per km per lane or five (5) holes per 500 m when 2 lanes are poured concurrently.</p>

PART F - BRIDGE CONSTRUCTION

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 400 - Piling	<p>A. <u>Timber Piles</u> 1-Inspection Report for each size and shipment of timber</p> <p>B. <u>Concrete Piles</u> a. Concrete Same tests as for Item 405 b. Reinforcing Steel Same tests as for Item 404</p> <p>C. <u>Structural Piles</u> 1-Q, Quality Test/Mill Test Certificate 1-IR, Inspection Report</p>
Item 401 - Railings	<p>A. <u>Concrete</u> Same tests as for Item 405, Class C</p> <p>B. <u>Reinforcing Steel</u> Same tests as for Item 404</p>
Item 402 - Timber Structures	<p>1-Q, Quality Test on Manufacturer's Certificate for each type of materials used 1-Inspection Report for each type and shipment of timber</p>
Item 403 - Metal Structures	<p>1-Q, Quality Test or Mill Test Certificate for each type of materials used 1-Inspection Report for each type and shipment of metal used</p>
Item 404 - Reinforcing Steel	<p>A. <u>Bar Reinforcement for Concrete</u> for every 10,000 kg or fraction thereof for each size: 1-Q, Quality Test for Bending, Tension and Chemical Analysis</p> <p>B. <u>Wire and Wire Mesh</u> 1-Q, Quality Test</p>
Item 405 - Structural Concrete	<p>A. <u>Cement</u> Quantity: (40 kg/bag) Class A ----- 9.0 bags/cu.m. of concrete Class B ----- 8.0 bags/cu.m. of concrete Class C ----- 9.5 bags/cu.m. of concrete Class P ----- 11.0 bags/cu.m. of concrete Tests: For every 2000 bags or fraction thereof 1-Q, Quality Test</p>

PART F - BRIDGE CONSTRUCTION

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS																														
	<p>B. <u>Fine Aggregate</u> Quantity: cu.m./cu.m. of concrete</p> <table><tr><td></td><td><u>For Rounded</u></td><td><u>For Angular</u></td></tr><tr><td>Class A -----</td><td>0.50 -----</td><td>0.54</td></tr><tr><td>Class B -----</td><td>0.45 -----</td><td>0.52</td></tr><tr><td>Class C -----</td><td>0.53 -----</td><td>0.59</td></tr><tr><td>Class P -----</td><td>0.44 -----</td><td>0.47</td></tr></table> <p>Tests: For every 1500 cu.m or fraction thereof</p> <p>a. For a source not yet tested or failed in previous quality test</p> <p>1-Q, Quality Test for: Grading, Elutriation (Wash), Bulk Specific Gravity, Absorption, Mortar Strength, Soundness, Organic Impurities, Unit Weight, % Clay Lumps and Shale</p> <p>b. For a source previously tested and passed quality test:</p> <p>1-Q, Quality Test for: Grading, Elutriation (Wash), Bulk Specific Gravity, Absorption, and</p> <p>Mortar Strength</p> <p>For every 75 cu.m. or fraction thereof:</p> <p>1-G, Grading Test</p> <p>C. <u>Coarse Aggregates</u> Quantity: cu.m./cu.m. of concrete</p> <table><tr><td></td><td><u>For Rounded</u></td><td><u>For Angular</u></td></tr><tr><td>Class A -----</td><td>0.77 -----</td><td>0.68</td></tr><tr><td>Class B -----</td><td>0.82 -----</td><td>0.73</td></tr><tr><td>Class C -----</td><td>0.70 -----</td><td>0.68</td></tr><tr><td>Class P -----</td><td>0.68 -----</td><td>0.65</td></tr></table> <p>Tests: For every 1500 cu.m or fraction thereof</p> <p>a. For a source not yet tested or failed in previous quality tests:</p> <p>1-Q, Quality Test for: Grading, Bulk Specific Gravity, Absorption, Abrasion, Soundness and Unit Weight</p> <p>b. For a source previously tested and passed quality test:</p> <p>1-Q, Quality Test for Grading, Absorption, Bulk Specific Gravity and Abrasion</p> <p>For every 75 cu.m. or fraction thereof:</p> <p>1-G, Grading Test</p> <p>D. <u>Water</u> 1-Certificate from Project Engineer 1-Q, Quality Test, if source is questionable</p> <p>E. <u>Premolded Filler for expansion joints</u> 1-Q, Quality Test on each thickness of filler for each shipment</p> <p>F. <u>Steel Reinforcement</u> 1-Q, Quality Test for every 10,000 kg or fraction thereof for each size</p> <p>G. <u>Concrete</u> Compressive strength test on concrete cylinder samples. 1 set consisting of 3 concrete cylinder samples shall be taken from each day's pouring and to represent not more than 75 cu.m of concrete or fraction thereof</p>		<u>For Rounded</u>	<u>For Angular</u>	Class A -----	0.50 -----	0.54	Class B -----	0.45 -----	0.52	Class C -----	0.53 -----	0.59	Class P -----	0.44 -----	0.47		<u>For Rounded</u>	<u>For Angular</u>	Class A -----	0.77 -----	0.68	Class B -----	0.82 -----	0.73	Class C -----	0.70 -----	0.68	Class P -----	0.68 -----	0.65
	<u>For Rounded</u>	<u>For Angular</u>																													
Class A -----	0.50 -----	0.54																													
Class B -----	0.45 -----	0.52																													
Class C -----	0.53 -----	0.59																													
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Class P -----	0.68 -----	0.65																													

PART F - BRIDGE CONSTRUCTION

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 406 - Prestressed Concrete Structures	<p>A. <u>Concrete</u> Same tests as for Item 405, Class P</p> <p>B. <u>Steel Reinforcement</u> Same tests as for Item 404</p> <p>C. <u>Wire Strand</u> 1-Q, for every 20 t or fraction thereof</p>
Item 407 - Concrete Structures	Same tests as for Items 403, 404, 405 and 411. Elastomeric Bearing Pad will be tested to determine its quality
Item 408 - Steel Bridges	<p>Same tests as for Items 403 and 411</p> <p>Painting: 1-Q, One 20-L can for every 100 cans or fraction thereof or</p> <p>1-Q, One 4-L can for every 100 cans or fraction thereof</p>
Item 409 - Welded Structural Steel	Same tests as for Item 403 and Inspection Report
Item 410 - Treated or Untreated Timber	<p>Inspection Report for Timber</p> <p>1-Q, Quality Test for preservatives</p>
Item 411 - Paint	<p>1-Q, One 20-L can for every 100 cans or fraction thereof or</p> <p>1-Q, one 4-L can for every 100 cans or fraction thereof</p>

PART G - DRAINAGE AND SLOPE PROTECTION

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 500 - Pipe Culverts and Storm Drains	<p>A. <u>Pipes</u> Pipe for every 50 pieces: Strength, Absorption and Dimension Alternative Requirements: 1-set consisting of 3 concrete cylinder samples for not more than 25 pipes cast in the field, and 1- Inspection Report for each size for not more than 25 pipes cast in the field</p> <p>B. <u>Mortar for Joint</u> Cement, Fine Aggregates and Water - Same tests as for Item 405</p>
Item 501 - Underdrains	<p>A. <u>Concrete Pipe (Non-Reinforced)</u> 0.5% of the number of pipes of each size but not less than 2, for strength, absorption and dimension Alternative Requirements: 1-set consisting of 3 concrete cylinder samples for not more than 25 pipes cast in the field, and 1- Inspection Report for each size for not more than 25 pipes cast in the field.</p> <p>B. <u>Clay Pipe</u> 1-Pipe for every 200 pieces each size, with a minimum of 2 specimens for strength, absorption and dimension.</p>
Item 502 - Manholes, inlets and Catch Basins	<p>A. <u>Concrete</u> Same tests as for Item 405, Class A</p> <p>B. <u>Lids, Cast Iron Frames and Grating</u> Inspection Report</p>

PART G - DRAINAGE AND SLOPE PROTECTION

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 503 - Cleaning and Reconditioning Existing Drainage Structures	Inspection Report
Item 504 - Riprap and Grouted Riprap	Same tests as for Item 505
Item 505 - Stone Masonry	<p>A. <u>Cement</u> Quantity: 2 bags/cu.m. of concrete Tests: For every 2,000 bags or fraction thereof: 1-Q, Quality Tests</p> <p>B. <u>Fine Aggregate</u> Quantity: 0.17 cu.m./cu.m. of concrete Tests: for every 2,000 bags or fraction thereof 1-Q, quality Test for: (Same as for Item 405) For every 75 cu.m. or fraction thereof:</p> <p>C. <u>Stone</u> Inspection Report</p> <p>D. <u>Water</u> 1-Certificate from Project Engineer or 1-Q, quality Test, if source is questionable</p>
Item 506 - Hand-Laid Embankment	Inspection Report
Item 507 - Sheet Piles	<p>A. <u>Timber Sheet Piles</u> Inspection Report</p> <p>B. <u>Concrete Sheet Piles</u> Same tests as for Item 400</p> <p>C. <u>Steel Sheet Piles</u> Same tests as for Item 403</p>
Item 508 - Concrete Slope Protection	<p>A. <u>Bed Course</u> Same tests as for Item 200</p> <p>B. <u>Steel Reinforcement</u> Same tests as for Item 404</p> <p>C. <u>Concrete</u> Same tests as for Item 405</p>
Item 509 - Gabions	1-Q, Quality Test for each shipment

PART H - MISCELLANEOUS STRUCTURE

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 600 - Curb and/or Gutter	<p>A. <u>Concrete</u> Quantity: 0.078 cu.m./m (Curb only) 0.092 cu.m./m (Curb and Gutter, type A) 0.149 cu.m./m (Curb and Gutter Type B) 0.074 cu.m./m (Curb and Gutter Type C) Same tests as for Item 405</p> <p>B. <u>Joint Filler</u> Same tests as for Item 311</p>
Item 601 - Sidewalk	<p>A. <u>Concrete</u> Same tests as for Item 405, Class A</p> <p>B. <u>Premolded Expansion Joint Filler</u> Same tests as item 311</p>

Item 602 - Monuments, Markers and Guide Posts	A. <u>Concrete</u> Same as for Item 405 B. <u>Reinforcing Steel</u> Same tests as for Item 404 C. <u>Timber</u> Same tests as for Item 410 D. <u>Paint</u> Same tests as for Item 411
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PART H - MISCELLANEOUS STRUCTURE

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 604 - Fencing	A. <u>Barbed Wire, Chain Link Fabric</u> 1-Q, Quality Test B. <u>Concrete Post</u> Same tests as for Item 405 Steel Reinforcement: Same test as for Item 404
Item 605 - Road Sign	Inspection Report
Item 606 - Pavement Markings	Same tests as for Item 411
Item 607 - Reflective Pavement Studs	Inspection Report
Item 608 - Topsoil	Inspection Report
Item 609 - Sprigging	Inspection Report
Item 610 - Sodding	Inspection Report
Item 611 - Tree Planting	Inspection Report

PART I - MATERIALS DETAILS

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 700 - Hydraulic Cement	Same tests as for Item 405
Item 701 - Construction Lime (Hydrated)	1-Q, Quality test for every 100 t or fraction thereof
Item 702 - Bituminous Materials	Same tests as for Items 301, 302, 303, 306, 307, 308, 309 and 310
Item 703 - Aggregates	Same tests as for Item of Work specified in the Bill of Quantities
Item 703A - Mineral filler	Same tests as for Item 307
Item 704 - Masonry Units	1-Q, Quality Test for every 10,000 units or fraction thereof
Item 705 - Joint Materials	Same tests as for Item 311 and 500
Item 706 - Concrete, Clay, Plastic and Fiber Pipes	A. <u>Concrete Pipes</u> Same tests as for Item 500 B. <u>Clay and other types of pipes</u> Refer to the applicable requirements of AASHTO Test and Specification
Item 707 - Metal Pipe	Same tests as for Item 400
Item 708 - Concrete Curing Materials & Admixtures	1-Q, Quality Test for each shipment
Item 709 - Paints	Same tests as for Item 411
Item 710 - Reinforcing Steel and Wire Rope	A. <u>Reinforcing Steel</u> Same tests as for Item 404 B. <u>Wire Rope</u> Same tests as for item 406

Item 711 - Fence and Guardrail	A. <u>Fence</u> Same tests as for Item 604 B. <u>Guardrail</u> Same tests as for Item 603
Item 712 - Structural Metal	Same tests as for Items 403 and 409
Item 713 - Treated and Untreated Timber	Same tests as for Item 410
Item 714 - Water	1-Certificate from Project Engineer or 1-Q, Quality Test, if source is questionable

A N N E X 11-B

SCHEDULE OF MINIMUM TEST REQUIREMENTS GOVERNING ITEMS OF WORK OF THE DPWH STANDARD SPECIFICATIONS FOR HIGHWAYS, BRIDGES AND AIRPORTS AS PRACTICED BY THE NATIONAL TRANSMISSION CORPORATION (TRANSCO)

Part C	Earthworks (Items 100, 101, 102, 103, 104, 105)	11B-1
Part D	Sub-base and Base Course (Items 200, 201, 202)	11B-1
Part E	Surface Course (Items 311)	11B-2
Part F	Bridge Construction (Items 400, 404, 405, 407)	11B-3
Part G	Drainage and Slope Protection (Items 504, 505, 508)	11B-4
Part H	Miscellaneous Structure (Item 600, 601)	11B-4
Part I	Materials Details (Items 704, 708)	11B-4

**SCHEDULE OF MINIMUM TEST REQUIREMENTS GOVERNING ITEMS OF WORK OF THE DPWH
STANDARD SPECIFICATIONS FOR HIGHWAYS, BRIDGES AND AIRPORTS USING TEST REQUIREMENTS
AS PRACTICED BY THE NATIONAL TRANSMISSION CORPORATION (TRANSCO) FOR POWER
TRANSMISSION LINE AND SUBSTATION PROJECTS**

PART C - EARTHWORK	
ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 100 - Clearing & Grubbing	None
Item 101 - Removal of Structures & Obstruction	None
Item 102 - Excavation	Same tests as for Items 103, 104 and 105, whichever is applicable. (same as per DPWH Standard)
Item 103 - Structure Excavation If excavated materials are wasted, the volume involved shall be reported so that quality control requirements may be adjusted accordingly. Submit Project Engineer Certificate of Waste.	If excavated materials are incorporated into the work: For every 1500 cu.m. or fraction thereof: 1- Specific Gravity 1- Grading Test 1- Plasticity Test (LL, PL, PI) 1- Laboratory Compaction Test
Item 104 - Embankment/Backfill	For every 1500 cu.m. or fraction thereof per source: 1- Specific Gravity 1- Grading Test 1- Plasticity Test (LL, PL, PI) 1- Laboratory Compaction Test A. Substations A.1 Grading Fill * 1 - Field Density Test for each 200 sq. m. of each layer of compacted fill A.2 Roadways * 1 - Field Density Test for each 50 sq. m. of each layer of compacted fill * The layers shall be placed not exceeding 200 mm in loose measurement and compacted with approved vibro-roller weighing not less than 10 tons. B. Transmission Lines B.1 Backfill 1- Field Density Test for each tower
Item 105 - Sub-grade Preparation	Same tests as for Item 104 above
PART D - SUBBASE AND BASE COURSE	
ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 200 - Aggregate Subbase Course	For every 300 cu.m. or fraction thereof per source: 1- Grading Test 1- Abrasion Test 1- Plasticity Test (LL, PL, PI) 1- Laboratory Compaction Test For every 50 sq.m. per layer of 150 mm of compacted depth: 1- Field Density Test
Item 201 - Aggregate Base Course	Same tests as for Item 200 above
Item 202 - Crushed Aggregate Base Course	Same tests as for Item 200 above

PART E -SURFACE COURSE

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 311 - Portland Cement Concrete Pavement	<p>A. <u>Cement</u> Splg.: For every 1,000 bags/brand or fraction thereof per brand: 1 - bag (40 kg/bag) Tests: 1 - Time of Setting using Vicat Apparatus 1 - Mortar Strength Test</p> <p>B. <u>Fine Aggregate</u> Tests: a. For each new source (no previous tests) 1- Gradation Test 1- Decantation Test 1- Bulk Specific Gravity & Absorption 1- Unit Weight Determination b. For each approved source (with previous acceptable test results) 1- Gradation Test 1- Decantation Test 1- Unit Weight Determination</p> <p>C. <u>Coarse Aggregate</u> Tests: a. For each new source (no previous tests) 1- Gradation Test 1- Bulk Specific Gravity & Absorption 1- Unit Weight Determination 1- Abrasion Test b. For each approved source (with previous acceptable test results) 1- Gradation Test 1- Unit Weight Determination</p> <p>D. <u>Water</u> Tests: Certificate from Project Engineer</p> <p>E. <u>Joint Filler</u> None</p> <p>F. <u>Special Curing Agents</u> None</p> <p>G. <u>Steel Bars</u> Per 10,000 kg or fraction thereof of steel bars/delivery/ per size Tests: 1 - Mill Certificate 1 - Quality Test for Bending, Tension and Unit Weight Determination in every size.</p> <p>H. <u>Concrete</u> Mix Prop.: As determined by Transco thru Trial Mix conducted Tests: Per 25 m³ or fraction thereof per pouring schedule 1 - set of 3 concrete cylinder samples for Compressive Strength Test.</p> <p>I. <u>Completed Pavement</u> None</p>

PART F - BRIDGE CONSTRUCTION/TOWER FOOTINGS, EQUIPMENT FOUNDATIONS, AND OTHER STRUCTURES.

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 400 - Piling	<p>B. <u>Concrete Piles</u></p> <p>a. Concrete Same tests as for Item 405 below</p> <p>b. Reinforcing Steel Same tests as for Item 404 below</p> <p>C. <u>Structural Piles</u> 1 - Mill Test Certificate</p>
Item 404 - Reinforcing Steel	<p>A. <u>Bar Reinforcement for Concrete</u> Per 10,000 kg or fraction thereof of steel bars Tests: 1 - Mill Certificate 1 - Quality Test for Bending, Tension and Unit Weight determination in every size.</p> <p>B. <u>Wire and Wire Mesh</u> - None</p>
Item 405 - Structural Concrete	<p>A. <u>Cement</u> Splg.: For every 1,000 bags/brand: 1 - bag (40kg/bag) Tests: 1 - Time of Setting using Vicat Apparatus 1 - Mortar Strength Test</p> <p>B. <u>Fine Aggregates</u> Tests: a. For each new source (no previous test) 1 - Gradation Test 1 - Decantation Test 1 - Bulk Specific Gravity and Absorption 1 - Unit Weight Determination b. For each approved source (with previous acceptable test results) 1 - Gradation Test 1 - Decantation Test 1 - Unit Weight</p> <p>C. <u>Coarse Aggregates</u> Tests: a. For each new source (no previous test) 1 - Gradation Test 1 - Bulk Specific Gravity and Absorption 1 - Unit Weight Determination 1 - Abrasion Test b. For each approved source (with previous acceptable test results) 1 - Gradation Test 1 - Unit Weight Determination</p> <p>D. <u>Water</u> Tests: Certificate from Project Engineer</p> <p>E. <u>Premolded Filler for expansion joints</u> None</p>

PART F - BRIDGE CONSTRUCTION/TOWER FOOTINGS, EQUIPMENT FOUNDATIONS, AND OTHER STRUCTURES.

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
	<p>F. <u>Concrete</u> Mix Prop.: As determined by Transco thru Trial Mix conducted Tests: 1 - set of 3 conc. cylinder samples for: a. Every leg of transmission tower b. Every equipment foundation/cluster of related foundations c. Every 25 m³ or fraction thereof per pouring schedule.</p>
Item 407 - Other Concrete Structures	Same tests as for Item 405 above

PART G - DRAINAGE AND SLOPE PROTECTION

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 504 - Riprap and Grouted Riprap	Same tests as for Item 505 below
Item 505 - Stone Masonry	<p>A. <u>Cement</u> Mix Prop.: 1:3 of cement to clean fine aggregates Tests: Same tests as for Items 405 - A above B. <u>Fine Aggregate</u> Tests: Same tests as for Items 405 - B above C. <u>Boulder</u> Tests: Unit weight, specific gravity, Weight</p>
Item 508 - Concrete Slope Protection	<p>A. <u>Bed Course</u> Same tests as for Item 200 DPWH Standard B. <u>Steel Reinforcement</u> Same tests as for Item 404 DPWH Standard C. <u>Concrete</u> Same tests as for Item 405 above</p>

PART H - MISCELLANEOUS STRUCTURE

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 600 - Curb and/or Gutter	<p>A. <u>Concrete</u> Same tests as for Item 405 above B. <u>Joint Filler</u> None</p>
Item 601 - Sidewalk	<p>A. <u>Concrete</u> Same tests as for Items 311 DPWH Standard and 405 above B. <u>Premolded Expansion Joint Filler</u> None</p>

PART I - MATERIALS DETAILS

ITEMS OF WORK	MINIMUM TEST REQUIREMENTS
Item 704 - Masonry Units	1 - Compressive strength test every specimen taken at random representing 500 units delivered at site or fraction thereof.
Item 708 - Concrete Curing Materials & Admixtures	<p>1-Quality Tests for each shipment 1-Specific Gravity</p>

A N N E X 12

PHILIPPINE NATIONAL STANDARDS (CONSTRUCTION MATERIALS) FOR MANDATORY IMPLEMENTATION

**LIST OF PHILIPPINE NATIONAL STANDARDS (CONSTRUCTION MATERIALS)
FOR MANDATORY IMPLEMENTATION**

CLASSIFICATION/NAME OF MATERIALS	BPS DESIGNATION NO.
<i>Cement and Lime</i>	
Portland cement – Specification	PNS 7:2005
Pozzolan cement – Specification	PNS 63:2006
<i>Ceramic and Ceramic Products</i>	
Sanitary wares- Specification	PNS 156:1992
<i>Electric Wires and Cables</i>	
Unplasticized polyvinyl chloride (uPVC) electrical conduit- Specification	PNS 14:1983
Thermoplastic Electric Wires and Cables	PNS 35:1990
Electrical products- Polyvinyl chloride insulated flexible cords- Specification	PNS 163: 1994
<i>Lamps and Related Equipment</i>	
Ballast for tubular fluorescent lamps – General and safety requirements	PNS 12-1:1997
Ballast for tubular fluorescent lamps – Performance requirements	PNS 12-2:1997
Ballast for high pressure mercury vapor lamps – Specification	PNS 105:1986
AC supplied electronic ballasts for tubular fluorescent lamps Part 1: General and safety requirements	PNS 135-1:1997
AC supplied electronic ballasts for tubular fluorescent lamps Part 2: Performance requirements	PNS 135-2:1997
Circuit breakers, Moulded case – Specification	PNS 519:1997
Low voltage switchgear and controlgear Part 2: Circuit Breaker	PNS 1573:1997
Unplasticized polyvinyl chloride (uPVC) electrical conduit – Specification	PNS 14:1987
Double-capped fluorescent lamps- Performance specifications	PNS IEC 60081: 2001
Lamps- Self ballasted lamps for general lighting services- Part 1: Safety requirements	PNS 603-1:1993
Lamps- Self ballasted lamps for general lighting services- Part 2: Performance requirements	PNS 603-2:1993
Lamps and related equipment- Electromagnetic ballast- Energy standards and labeling requirements	PNS 12-3:2000
Single-capped fluorescent lamps- Performance specification Section 1: General	PNS 1261:1995
Class H Fuses – Specification	PNS 13:1999
Fuseholders – Specification	PNS 56:1996
Edison screw lampholders – Specification	PNS 80:1997
Safety specifications for incandescent lamps- Part 1: Tungsten filament lamps for domestic and similar general lighting purposes	PNS 38-1:1995
Tungsten filament lamps for domestic and similar general lighting purposes- Part 2: Performance requirements	PNS 38-2:1995
Lampholders for tubular fluorescent lamps and starterholders – Specification	PNS 42:1997
Liquid tight flexible steel conduit – Specification	PNS 164:1988
Plugs and socket-outlets for household and similar purposes Part 1: General requirements	PNS 1486-1:1996
Plugs and socket-outlets for domestic and general use standards	PNS 1572-1:1997
Electrical products- Boxes for rigid metal conduits	PNS 1829:1999
Pressure sensitive PVC tapes for electrical insulation – Specification	PNS 79:1992
Glow-starters for fluorescent lamps	PNS 45:1997

CLASSIFICATION/NAME OF MATERIALS	BPS DESIGNATION NO.
Knife switches – Specification Snap switches for general use – Specification Switches for household and similar fixed-electrical installations Part 1: General requirements Pressure sensitive adhesive polyvinyl chloride (PVC) tapes- PVC electrical tapes	PNS 118:1992 PNS 57:1996 PNS 1485-1:1996 PNS 79:1992
<i>Lumber and Wood Products</i>	
Plywood – Specification	PNS 196:2000
<i>Pipes and Fittings</i>	
High density polyethylene (PE) pipes for potable water supply – Specification Polybutylene (PB) pipes for potable water supply – Specification Unplasticized polyvinyl chloride (uPVC) pipes for potable water supply – specification Grey iron pipes for pressure water lines- Specification	PNS 55:1986 PNS 152:1987 PNS 65:1993 PNS 1991:2002
<i>Steel</i>	
Steel- Black & hot-dipped zinc-coated (galvanized) longitudinally welded steel pipes for ordinary use – Specification Re-rolled steel bars for concrete reinforcement – Specification Steel bars for concrete reinforcement – Specification Galvanized steel sheets and coils – Specification Galvanized steel sheets & coils, pre-painted – Specification Cold-reduced carbon steel sheet of commercial and drawing qualities: Specification Hot-dip zinc-coated carbon steel sheets Continuous hot-dip aluminum zinc-coated steel sheets Continuous hot-dip zinc /5% aluminum alloy coated steel sheets Steel wire nails – Specification	PNS 26:1992 PNS 211:2000 PNS 49:2000 PNS 67:2000 PNS 201:1990 PNS 127:2004 PNS 1990:2004 PNS 1993:2004 PNS 2003:2004 PNS 136:2000



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