## **SCHEDULE 11**

## **QUALITY MANAGEMENT**

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## PART 1 DEFINITIONS

The following definitions shall have the following meanings:

- (a) "Construction Quality Management Plan" or "CQMP" means the plan for the quality management of the Works prepared by Project Co in accordance with Appendix C Construction Quality Management Plan to this Schedule 11.
- (b) "Corrective Action" means an action to eliminate the cause of an existing Non-Conformance, defect or other undesirable situation to prevent its recurrence.
- (c) "Design Quality Management Plan" or "DQMP" means the plan for the quality management of the design of the project prepared by Project Co in accordance with Appendix B Design Quality Management Plan to this Schedule 11.
- (d) "External Quality Audit" means either or both:
  - (i) a second party Quality Audit conducted by parties having an interest in Project Co or the relevant Project Co Party, such as parties with commercial contracts with Project Co or a relevant Project Co Party or customers/clients of Project Co or a relevant Project Co Party; and
  - (ii) a third party Quality Audit conducted by an external independent organization such as a certification or registration body.
- (e) "Environmental Quality Management Plan" or "EQMP" means the plan for environmental management of the Works prepared by Project Co in accordance with Appendix F Environmental Quality Management Plan to this Schedule 11.
- (f) "Inspection and Test Plan" means the plan prepared in accordance with Section C.1(f) of Appendix C of this Schedule 11.
- (g) "Internal Quality Audits" means a first party Quality Audit of Project Co's or a Project Co Party's own processes conducted by or on behalf of the relevant organization.
- (h) "ISO 9001 Lead Auditor Course" means an accredited ISO 9001 course for lead auditors who meet the training portion of the requirements for current certification of individual quality system auditors with the International Register of Certified Auditors.
- (i) "ISO/IEC" International Organization for Standardization / International Electrotechnical Commission.
- (j) "Non-Conformance" means any failure by Project Co to perform any of its obligations under the Project Agreement in respect of any aspect of the Works or Maintenance and which failure is not rectified by Project Co within the applicable time period, if any, stipulated in this Project Agreement.

- (k) "Non-Conformance Report" means a document issued by either the City or Project Co pursuant to Section 7.1 Non-Conformance Reporting Process of this Schedule 11 detailing the description of an identified Non-Conformance and the proposed rectification and action taken or to be taken to deal with such Non-Conformance.
- (l) "Non-Conformance Tracking System" means a system to track Non-Conformance Reports issued by the City or Project Co as set out in Section 7.2 of this Schedule 11.
- (m) "Maintenance and Rehabilitation Quality Management Plan" or "MRQMP" means the plan for the quality management of the Maintenance prepared by Project Co in accordance with Appendix D Maintenance and Rehabilitation Quality Management Plan to this Schedule 11.
- (n) "**Performance Monitoring Report**" has the meaning given in Part 8 Performance Reporting of this Schedule 11.
- (o) "**Preventive Action**" means an action to eliminate the cause of a potential Non-Conformance or other undesirable situation in order to prevent its occurrence.
- (p) "QMS 2000 Auditor" means a quality auditor certified by the International Register of Certified Auditors in the "QMS 2000 Auditor" grade of certification.
- (q) "Quality Audit" means a systematic, independent and documented process for obtaining audit evidence and evaluating it objectively to determine the extent to which audit criteria are fulfilled.
- (r) "Quality Audit Plan" means Project Co's audit plan defining the Internal Quality Audits and External Quality Audits that Project Co shall perform or cause to be performed on its own processes and the processes of Project Co Parties.
- (s) "Quality Director" has the meaning given in Section 3.1 (a) of this Schedule 11.
- (t) "Quality Management Plans" includes the DQMP, EQMP, MRQMP, CQMP and any other quality management plan required for the purposes of undertaking any material and substantial aspect of the Works.
- (u) "Quality Management System" means the quality management system to be developed and implemented by Project Co in accordance with this Schedule 11.
- (v) "Quality Manager" means an individual quality manager responsible for each of the Quality Management Plans as described in Section (c) of each of the appendices B-F of this Schedule 11.
- (w) "Quality Manual" means Project Co's quality manual meeting the requirements set out in Appendix A Quality Manual to this Schedule 11.
- (x) "Quality Objectives" means the objectives related to quality that are measurable and consistent with the Quality Policy and which are to be formally expressed and recorded in

- the Quality Manual in accordance with this Schedule 11, provided that, alternatively, each Quality Management Plan may have its own Quality Objectives which are directly related to the applicable Quality Policy expressed or recorded in the Quality Manual.
- (y) "Quality Policy" means the overall intentions and direction of Project Co related to quality applicable to Project Co and all Project Co Parties involved in performing the Works which are to be formally expressed and recorded in the Quality Manual in accordance with this Schedule 11, provided that, alternatively, each Quality Manual may have its own Quality Policy which is directly related to applicable Quality Objectives expressed or recorded in the Quality Manual.
- (z) "Quality Records" has the meaning given in Section 6.8 of this Schedule 11.
- (aa) "Surveillance Quality Audits" means Quality Audits conducted by or on behalf of City as contemplated in Section 5.3 City's Quality Audits of this Schedule 11.
- (bb) "**Traffic Control Plan**" means the sub-plan or sub-plans of the Traffic Management Plan prepared by Project Co in accordance with Part 7, Article 6 Traffic and Transit Management Plan of Schedule 15-2 Design and Construction.
- (cc) "**Traffic Quality Management Plan**" or "**TQMP**" means the plan for the traffic management during construction of the project prepared by Project Co in accordance with Appendix E Traffic Quality Management Plan to this Schedule 11.

# PART 2 QUALITY MANAGEMENT SYSTEM

#### 2.0 Timing Principle

For the avoidance of doubt, this Schedule 11 – Quality Management System shall be interpreted in accordance with the Timing Principle set out in Section 1.5(c) of this Agreement.

#### 2.1 Quality Management System

(a) Project Co shall develop and implement a Quality Management System in accordance with the requirements of this Schedule. Project Co acknowledges and agrees that Project Co is solely responsible for the quality of the Works and the Maintenance and that a comprehensive Quality Management System is critical for the proper and timely completion of the Works and the Maintenance.

### 2.2 Project Co Responsibilities

(a) Project Co is responsible for all quality assurance and quality control activities set out in this Schedule that are required to manage its own processes as well as those of the Project Co Parties throughout the Project Term. Project Co shall ensure that all aspects of the Project are the subject of a Quality Management System that complies with the provisions of this Schedule, and shall comply with and cause all Project Co Parties to comply with the requirements of such Quality Management System. For greater certainty and without limiting Project Co's ability to contractually assign responsibilities and obligations to Project Co Parties in accordance with this Project Agreement, Project Co shall not be relieved of any of Project Co's responsibilities or obligations set out in this Schedule by the assignment of such responsibilities or obligations to Project Co Parties.

#### 2.3 Quality Management System Requirements

- (a) The Quality Management System shall, at a minimum, include the Quality Documentation described in Part 6 Quality Documentation of this Schedule and shall comply with:
  - (i) the requirements and principles of the ISO 9001:2008 Standard and any other applicable standards specified in this Schedule;
  - (ii) Good Industry Practice; and
  - (iii) all other requirements set out in this Schedule and this Project Agreement.

## 2.4 Compliance

- (a) Specific Requirements
  - (i) The Quality Management System must be compliant with ISO 9001:2008 within 90 days from Financial Close.
  - (ii) Compliance shall be subject to review and must be approved by the City, which compliance shall be maintained by Project Co throughout the Project Term.
  - (iii) The scope of compliance for the Quality Management System should be clearly defined to address the Works, including traffic management and environmental considerations in respect of the Project.
  - (iv) Project Co shall update its Quality Management System and all Quality Documentation as required to ensure that the Quality Management System and all Quality Documentation are and at all times remain in full compliance with the ISO 9001:2008 Standard and the requirements of this Schedule.

#### 2.5 **Documentation Deliverables**

- (a) Deliverables and Performance Measures
  - (i) Without limiting the generality of Section 2.3 Quality Management System Requirements of this Schedule, Project Co will prepare and submit to the City, by the dates shown in Table 2.5.1, each of the following:

**Table 2.5.1 – Schedule of Plans and Reports (Response Time Measures)** 

Performance Measure*	Deliverable Name	Schedule 11 Specification Reference	Due Date	Submitted under the Review Procedure
n/a	Quality Manual	Appendix A	Submitted 30 days following Financial Close	Yes
n/a	Design Quality Management Plan	Appendix B	Submitted 45 days following Financial Close	Yes
n/a	Construction Quality Management Plan	Appendix C	Submitted 60 days following Financial Close	Yes
n/a	Maintenance and Rehabilitation Quality Management Plan	Appendix D	Submitted 90 days following Financial Close	Yes

Performance Measure*	Deliverable Name	Schedule 11 Specification Reference	Due Date	Submitted under the Review Procedure
n/a	Traffic Quality Management Plan	Appendix E	Submitted 45 days following Financial Close	Yes
n/a	Environmental Quality Management Plan	Appendix F	Submitted 30 days following Financial Close	Yes
n/a	Other Quality Management Plans (as required by Section 2.5 (b))	Section 2.5	Submitted 45 days following Financial Close	Yes
n/a	Quality Audit Plan	Section 5.1	Submitted 30 days following Financial Close	Yes
PQ5.1	Quality Audit Plan updates	Section 5.1	At twelve monthly intervals following Quality Audit Plan submittal	Yes
PQ6.9	Monthly Quality Management System reports	Section 6.9	By 15th of each month (in respect of previous month)	No
PQ5.2b	Quality Audit reports	Section 5.2	Submitted 14 days following audit completion	No
PQ5.3	Corrective Action plan	Section 5.3	Submitted 20 Business Days following the closing meeting	No

(ii) Where specified, the documents listed above shall be submitted to the City for approval in accordance with the Review Procedure.

### (b) Specific Requirements

(i) Project Co shall prepare and submit a Quality Management Plan for the Construction Contractor and the Maintenance Contractor, in each case in respect of the activities covered by that party's contract with Project Co and meeting the requirements of the Quality Manual, and Project Co shall cause all other contractors engaged by Project Co for the purposes of undertaking any material or

substantial aspect of the Works or the Maintenance to comply with the Quality Manual.

### (c) Timing of Implementation

(i) The Quality Manual and all Quality Management Plans must be fully implemented within 180 days from Financial Close. Project Co shall not commence or permit the commencement of any aspect of the Works or the Maintenance before those parts of the Quality Documentation that concern such aspect of the Works or the Maintenance have been submitted to the City in accordance with this Schedule.

## (d) Compliance with Quality Management System

- (i) Project Co shall ensure that:
  - (A) Project Co complies with the Quality Management System detailed in the Quality Manual;
  - (B) the Design Team complies with the Design Quality Management Plan in connection with its design activities;
  - (C) the Construction Contractor complies with the Design Quality Management Plan, the Construction Quality Management Plan, the Traffic Quality Management Plan and the Environmental Quality Management Plan in connection with all activities under the Construction Contract;
  - (D) the Maintenance Contractor complies with the Maintenance and Rehabilitation Quality Management Plan, the Traffic Quality Management Plan and the Environmental Quality Management Plan in connection with all activities under the Maintenance Contract;
  - (E) any other contractor engaged by Project Co either complies with Project Co's relevant Quality Management Plan prepared and implemented pursuant to Specific Requirements of this Schedule in connection with the activities covered by that party's contract with Project Co or provides evidence of the contractor's own quality system and the required quality assurance interfaces to Project Co; and
  - (F) Project Co shall ensure that any Project Co Party who performs any portion of the Works or the Maintenance shall comply with the Quality Management System as it relates to that portion of the Works or the Maintenance.

#### 2.6 Continuous Improvement in Quality Management System

(a) Project Co shall implement a program and shall have mechanisms in place, such as management reviews and Quality Audit programs, to allow all identified opportunities for

- improvement of the effectiveness of the Quality Management System to be recorded, tracked and implemented or closed out.
- (b) Project Co shall ensure that all Project Co Parties are aware of the importance of continuous improvement and are actively engaged in its implementation in connection with the performance of the Works and the Maintenance.

# PART 3 QUALITY DIRECTOR

### 3.1 Appointment and General Responsibilities

- (a) At all times during the Project Term, Project Co shall employ a Quality Director who shall,
  - (i) irrespective of such person's other responsibilities, have defined authority for ensuring the establishment and maintenance of the Quality Management System and auditing and reporting on the status of, and compliance with the Quality Management System, including the requirements set forth in Section 3.2 (a) of this Schedule; and
  - (ii) be a certified QMS 2008 Auditor or shall have experience in a similar quality management representative role for a transit project of a similar scope and shall have successfully completed an ISO 9001 Lead Auditor Course.
- (b) The identity of the Quality Director (and any replacement thereof) and his/her job specification and responsibilities shall be subject to the approval of the City (such approval not to be unreasonably withheld or delayed), and the Quality Director shall be a Key Individual.

## 3.2 Specific Responsibilities

- (a) Without limiting the generality of the foregoing, the job specification and responsibilities of the Quality Director shall include the following:
  - (i) developing, implementing and maintaining, and ensuring the effective operation of, the Quality Management System;
  - (ii) initiating management reviews, not less frequently than annually, and taking other actions necessary to ensure the effective operation and continuous improvement of the Quality Management System;
  - (iii) preparing Quality Audit Plans and scheduling and coordinating Internal Quality Audits and External Quality Audits of key processes with the relevant Project Co Parties;
  - (iv) ensuring that all Quality Audits required under Section 5.2 Project Co's Quality Audits of this Schedule and under the Quality Documentation are conducted, and reporting the findings of such audits to the City;
  - (v) having the authority to immediately stop any work or activity which is not being performed or carried out in accordance with the Quality Documentation applicable thereto;

- (vi) liaising with the City and acting as the primary representative for Project Co on all matters relating to quality management;
- (vii) coordinating all matters and issues relating to the certification of the Quality Management System;
- (viii) preparing and submitting to the City monthly Quality Management System reports;
- (ix) ensuring that relevant Quality Records are retained in accordance with the Quality Management System and the requirements of Schedule 26 of the Project Agreement Record Provisions;
- (x) developing and implementing a program for Corrective Action and Preventive Action for Non-Conformances; and
- (xi) carrying out any other matters which, in accordance with this Project Agreement, are the responsibility of the Quality Director.

## PART 4 TESTING

### 4.1 Testing Requirements

(a) Where Project Co is required by this Project Agreement or any Quality Documentation to carry out any calibration, sample, test or trial, such calibration, sample, test or trial shall be carried out in accordance with the provisions of this Part 4 and the provisions of the relevant Quality Documentation.

#### 4.2 Accreditation Standards

- (a) All on and off site calibrations, samples, tests and trials shall be carried out by laboratories that are duly accredited for the carrying out of such calibrations, samples, tests and trials.
- (b) Laboratory accreditation shall be in accordance with ISO/IEC 17025, as amended, updated or replaced from time to time, provided that, for specific activities, the City may accept other industry-recognized accreditation in lieu of ISO/IEC 17025, including:
  - (i) concrete and concrete materials: CSA A283-00, "Qualification Code for Concrete Testing Laboratories", to the appropriate category for the tests being done;
  - (ii) structural steel and welding: CSA W178.1-02, "Certification of Welding Inspection Organizations", to the level appropriate for the inspection being carried out;
  - (iii) aggregates, bituminous paving mixtures: "Canadian Council of Independent Laboratories", as appropriate to the work being carried out; and
  - (iv) protective coatings: "National Association of Corrosion Engineers", as appropriate to the work being carried out.
- (c) Project Co may request the approval of the City to use other industry-recognized accreditations, which approval shall not be unreasonably withheld or delayed if such other accreditation is applicable to the Works or the Maintenance for which it is proposed and meets the intent of ISO/IEC 17025.

#### 4.3 Remedial Work

(a) Project Co shall be responsible at its own cost for any remedial work required as a result of any failure to pass any calibration, sample, test or trial required in accordance with this Project Agreement or any Quality Documentation or as a result of any laboratory not being duly accredited as required by Section 4.2 – Accreditation Standards of this Schedule.

# PART 5 QUALITY AUDITS AND MONITORING

#### 5.1 Quality Audit Plans

- (a) Specific Requirements
  - (i) Project Co shall provide a Quality Audit Plan to the City within 30 days after Financial Close and provide an updated Quality Audit Plan at twelve month intervals thereafter.
  - (ii) The Quality Audit Plan shall detail the Internal Quality Audits and the External Quality Audits that will be conducted by Project Co on its own processes and those of Project Co Parties, and the planned dates of such Quality Audits.
- (b) Project Co shall provide an updated Quality Audit Plan at twelve month intervals following submission of the initial Quality Audit Plan.

## 5.2 Project Co's Quality Audits

- (a) General
  - (i) Project Co shall conduct Internal Quality Audits and External Quality Audits of its own processes and those of Project Co Parties in accordance with the requirements of this Schedule, and the Quality Documentation, including the Quality Audit Plan referred to therein. These audits shall be conducted at least quarterly or as agreed upon with the City. The purpose of Project Co's quality auditing process is to confirm that all activities comprising the Works and the Maintenance are in compliance with the Quality Manual and Quality Management Plans, to identify all Non-Conformances and necessary Corrective Actions and Preventive Actions and to facilitate continuous improvement.
  - (ii) The Quality Director shall schedule Internal Quality Audits and External Quality Audits at least quarterly or as agreed upon with the City.
  - (iii) Within 14 days of completion of any Quality Audit, Project Co shall document, or cause to be documented, the results of such Quality Audit in an audit report and make such report available to the City upon request.

#### (b) Specific Requirements

- (i) The Quality Director shall schedule Internal Quality Audits and External Quality Audits to ensure that all key processes are reviewed regularly (at least quarterly or as agreed upon with the City).
- (ii) Where necessary, follow-up audits shall be scheduled to ensure that identified Corrective Actions and Preventive Actions are carried out in a timely fashion.

(iii) Internal Quality Audits and External Quality Audits shall be scheduled taking into account the status and importance of the processes being audited as well as the results of previous audits.

## 5.3 City's Quality Audits

#### (a) General

- (i) The City shall, following the submission of the Quality Documentation in accordance with this Schedule, review the Quality Documentation to identify the critical activities and processes described in the Quality Manual and Quality Management Plans on which City's auditing efforts and resources should be directed. City shall determine the frequency of auditing through regular and ongoing review of Project Co's performance and management systems. Procedures and activities relating to the Works and the Maintenance that show good audit performance may have the frequency of auditing decreased, while those that show poor performance or increased risk of Non-Conformances may have the frequency of auditing increased. Without limiting Project Co's obligations under the Project Agreement, Project Co shall provide and shall ensure Project Co Parties provide City's auditors with all documentation, records, access, facilities and assistance requested in connection with City's Quality Audit activities.
- (ii) Project Co shall prepare a Corrective Action plan, and, if appropriate, a Preventive Action plan, and submit it to the City within 20 Business Days of the closing meeting.

### (b) Specific Requirements

(i) City reserves the right to conduct follow up reviews on reasonable, but not less than one Business Day's, notice to Project Co to determine if Project Co's Corrective Action plan or Preventive Action plan has been implemented and completed.

#### (c) Types of Quality Audits

- (i) The following two types of Quality Audits may be conducted by, or on behalf of, City in its discretion:
  - (A) <u>Surveillance Quality Audits</u> scheduled or unscheduled field audits conducted on a random basis or on specific areas of interest throughout the Project Term. The objective of these surveillance audits is to monitor Project Co's activities involving the Works and the Maintenance, including but not limited to workmanship, performance measures and general quality of materials. The City shall, during the performance of Surveillance Quality Audits, record any observations and inform Project Co of any deficiencies that require further evaluation. Any noted

- deficiencies shall be resolved to the satisfaction of the City through evidence of Project Co's deficiency evaluation findings or the Non-Conformance process set forth in Part 7 of this Schedule; and
- (B) Quality Management System Audits scheduled audits conducted at specific times to assess the performance of and compliance with the Quality Management System. City's lead auditor shall contact the Quality Director and confirm the scope and schedule of the audit, and schedule for associated audit meetings. At the audit opening meeting with Project Co, City's lead auditor shall review the audit scope and objectives. City's auditors shall conduct audit interviews, and document any observations on prepared checklists. At the end of the audit interviews, City's lead auditor shall evaluate the observations and identify observed procedural or performance Non-Conformance that require Corrective Action. At the audit closing meeting, occurring as soon as reasonably possible after completion of the audit, City's lead auditor shall discuss the observations and inform Project Co of any observed Non-Conformances and audit recommendations.
- (ii) Additional information relating to City Quality Audits with respect to particular Quality Management Plans is identified in the appendices to this Schedule.

## 5.4 City Monitoring

(a) In addition to carrying out any scheduled and unscheduled External Quality Audits of the Quality Management System (including audits relating to compliance with all Quality Documentation) as provided in Section 5.3 – City's Quality Audits of this Schedule, the City may, at its discretion, monitor and verify the operation of the Quality Management System by, inter alia, carrying out spot checks and making independent inspections and tests of any Works, Maintenance, or material including any Works, Maintenance, or material which fails any test or is suspected by the City of not complying with the requirements of this Project Agreement.

## 5.5 Deficient Quality Audits

- (a) If either:
  - (i) the City reasonably believes that Project Co is failing to conduct Quality Audits of its Quality Management System as required by this Project Agreement in any material respect or if such Quality Audits are not conducted in compliance with the ISO 9001:2008 Standard by personnel competent to conduct such Quality Audits; or
  - (ii) any auditing, monitoring or spot-checks of the Quality Management Systems reveals material deficiencies in the Quality Management System or the implementation thereof,

City may carry out increased levels of External Quality Audits (whether in number, duration or detail) of all or any aspect of the Quality Management System until such time as the City is reasonably satisfied that none of the circumstances described in this Section continue to exist.

#### 5.6 Costs of Audits

(a) If the City carries out any audit pursuant to Section 5.3 – City's Quality Audits, Section 5.4 – City Monitoring or Section 5.5 – Deficient Quality Audits of this Schedule, and the results of such audit shows any Non-Conformance that materially interferes with the delivery of the Works or the Maintenance in accordance with the Output Specifications, Quality Manual and Quality Management Plans, then without limiting any other rights and remedies of City, Project Co shall compensate City for all costs incurred in carrying out such audit (including the relevant administrative expenses of City, including an appropriate sum in respect of general staff costs and overheads). All other audits carried out by the City pursuant to Section 5.3 – City's Quality Audits, Section 5.4 – City Monitoring or Section 5.5 – Deficient Quality Audits, of this Schedule shall be at City's cost.

### 5.7 Third Party Audits

- (a) Third party Quality Audits shall be conducted as required under the ISO 9001:2008 Standard on the Quality Management System by an accredited certification agency acceptable to City and Project Co, each acting reasonably, and audit reports in respect of such External Quality Audits initiated by Project Co shall be made available to the City upon request.
- (b) The first Third Party Quality Audit shall be conducted following 120 days after Financial Close. Subsequent Third Party Quality Audits shall be conducted annually or as agreed upon with the City.

#### 5.8 Traffic Management Auditing

- (a) For the purpose of facilitating the conduct of Internal Quality Audits and External Quality Audits relating to traffic management during both the Works and the Maintenance, Project Co shall develop and implement a checklist (a "site condition rating checklist") acceptable to City, for use by each of Project Co and City.
- (b) The site condition rating checklist shall provide the framework for auditing the safety and overall management of traffic against the requirements contained in the Traffic and Transit Management and Mobility Plan, the requirements of Part 7 Traffic and Transit Management and Construction Access of the Output Specifications.
- (c) The site condition rating checklist, at a minimum, shall include the following information categories:

- (i) <u>Traffic and Transit Management and Mobility Plan</u> in relation to the approved site specific plan as required by Article 7 Traffic and Transit Management and Mobility Plan of Part 7 Traffic and Transit Management and Construction Access of the Output Specifications; and
- (ii) <u>General Traffic Management Requirements</u> in relation to Article 1 General Traffic Management Requirements of Part 7 Traffic and Transit Management and Construction Access of the Output Specifications, including:
  - (A) Storage of materials;
  - (B) Traffic control devices;
  - (C) Roadside barriers;
  - (D) Drop-offs; and
  - (E) Temporary Pavement Markings.
- (d) The requirements of this Section 5.8 Traffic Management Auditing are in addition to, and do not limit, Project Co's other obligations under this Schedule, including Project Co's obligations under Part 7 Non-Conformances of this Schedule.

# PART 6 QUALITY DOCUMENTATION

## 6.1 Principles

(a) The minimum requirements and principles which apply to the Quality Documentation are set out in appendices A to F inclusive to this Schedule. Project Co's Quality Management System shall also comply with the requirements and principles of the ISO 9001:2008 Standard and this Schedule.

#### **6.2 ISO Reference Documents**

- (a) Without limiting the requirement of the Quality Management System to comply with the ISO 9001:2008 Standard, Project Co's Quality Management System shall also incorporate the requirements of the following reference documents:
  - (i) ISO 9001:2008 Quality Management Systems Requirements;
  - (ii) ISO 9000:2008 Quality Management Systems Fundamentals and Vocabulary; and
  - (iii) ISO 19011:2002 Guidelines for Quality and/or Environmental Management Systems Auditing.

## 6.3 Quality Documentation Requirements

- (a) The minimum documentation requirements for the Quality Management System are:
  - (i) the Quality Manual as required pursuant to Section 2.5 Documentation Deliverables of this Schedule;
  - (ii) the Quality Management Plans for all aspects of the Works and the Maintenance as required pursuant to Section 2.5 Documentation Deliverables of this Schedule:
  - (iii) that each Quality Management Plan includes quality system procedures and process flow charts documenting who performs the Works, what they do, and what evidence shall be generated that they have performed quality related aspects of the Works correctly;
  - (iv) the Quality Audit Plan required pursuant to Section 5.1 Quality Audit Plans of this Schedule; and
  - (v) the Quality Records required pursuant to Section 6.8 Quality Records of this Schedule.

## 6.4 Submission of Quality Documentation

(a) If any Quality Documentation relies on or incorporates any supporting Quality Documentation then such supporting Quality Documentation or the relevant parts thereof shall (unless the City otherwise agrees) be submitted to the City at the time that the relevant Quality Documentation or part thereof or change, addition or revision to the Quality Documentation is submitted in accordance with the Review Procedure and the contents of such supporting Quality Documentation shall be taken into account in the consideration of the relevant Quality Documentation or part thereof or change, addition or revision to the Quality Documentation in accordance with the Review Procedure. The City may require the amendment of any such supporting Quality Documentation to the extent necessary to enable the relevant Quality Documentation to satisfy the requirements of this Schedule.

#### 6.5 Project Co Obligation to Update

(a) Project Co shall be responsible for proactively updating its Quality Management System and all Quality Documentation from time to time, in accordance with the procedures set forth in this Project Agreement, to ensure that the Quality Management System and all Quality Documentation are, and at all times remain, in full compliance with the ISO 9001:2008 Standard and the requirements of this Project Agreement.

## 6.6 Changes to Quality Documentation

- (a) Project Co shall submit to the City in accordance with the Review Procedure any proposed changes or additions to or revisions of any of the Quality Documentation.
- (b) If Project Co does not propose any change, pursuant to Section 6.6 (a) of this Schedule, which City determines to be required then City may propose such change and it shall be dealt with as though it had been proposed by Project Co pursuant to Section 6.6 (a) of this Schedule and shall not be treated as a Variation. Any dispute between the Parties in respect of any such change shall be resolved in accordance with the Dispute Resolution Procedure.

#### 6.7 Amendment of Quality Documentation

(a) If there is no unresolved objection by the City under the Review Procedure to a part of the Quality Documentation pursuant to Section 6.4 – Submission of Quality Documentation of this Schedule or to a change, addition or revision proposed pursuant to Section 6.6 (a) – Changes to Quality Documentation of this Schedule, then the Quality Documentation shall be amended to incorporate such part, change, addition or revision.

#### 6.8 Quality Records

(a) Project Co shall establish and maintain complete and accurate quality management records (the "Quality Records").

(b) The Quality Records shall provide objective evidence of conformance with all requirements of this Project Agreement, compliance with the ISO 9001:2008 Standard and the effective operation of the Quality Management System.

#### 6.9 Quality Management System Reports

(a) For each month of the Project Term, Project Co shall prepare, and submit to the City within 15 Business Days of the start of the following month, a comprehensive Quality Management System report.

#### (b) Specific Requirements

- (i) The monthly Quality Management System report shall address all quality management activities under each of the Quality Management Plans for that month and any outstanding quality issues from prior months.
- (ii) The monthly Quality Management System reports shall, at a minimum, include the following information separately identified for the Quality Manual and for each Quality Management Plan:
  - (A) a Non-Conformance Report log summarizing all Non-Conformance Reports opened, closed, or still open from the previous report, in the relevant month and providing the following: "date open", "date closed", "status" (open, pending, closed), "disposition" (repair, rework, reject) and "description of status" which describes the current status of the Non-Conformance Report and if closed, when and how it was closed;
  - (B) Corrective Action and Preventive Action logs providing details of the Corrective Actions and Preventive Actions performed during the month and their close-out status;
  - (C) a summary of any inspection and testing activities conducted during the month;
  - (D) Internal Quality Audits and External Quality Audits performed during the month and a four month look-ahead schedule for planned future Quality Audits;
  - (E) any continual improvement initiatives taken during the month;
  - (F) any other information required to be included in the monthly Quality Management System reports pursuant to any of the appendices to this Schedule or the terms of the relevant Quality Management Plan; and
  - (G) any changes made to the Quality Management System or the Quality Documentation in compliance with the provisions of this Project Agreement.

(iii) Project Co's monthly Quality Management System reports shall include a summary of all environmental quality management activities during each month.

### 6.10 Additional Information

(a) Notwithstanding any other provision of this Schedule, Project Co shall provide the City with such information as the City may request from time to time to demonstrate compliance with this Schedule.

## PART 7 NON-CONFORMANCES

## 7.1 Non-Conformance Reporting Process

- (a) The Non-Conformance reporting process, from initial creation through to closeout of a Non-Conformance, shall follow the process outlined below:
  - (i) If Project Co or City discovers a Non-Conformance, it shall initiate a Non-Conformance Report in compliance with the ISO 9001:2008 Standard as follows:
    - (A) <u>Project Co initiated Non-Conformance Reports</u> Project Co shall provide a Non-Conformance Report identifying the Non-Conformance to the City within 2 Business Days of discovery of the Non-Conformance; or
    - (B) <u>City initiated Non-Conformance Reports</u> If at any time City is notified, or otherwise becomes aware, that there is any Non-Conformance relating to the Works or the Maintenance, the City may issue a Non-Conformance Report, without prejudice to any other right or remedy available to City, including the assignment of quality failure points pursuant to Schedule 20 Payment Mechanism.
  - (ii) A Non-Conformance Report initiated by either Party is issued to the Quality Director, thereby activating the Non-Conformance Report. The date of issue shall be recorded denoting the commencement of the time period for which the Non-Conformance Report has an 'open' status.
  - (iii) The Quality Director shall in response to the Non-Conformance Report describe a disposition of the Non-Conformance and a Corrective Action in compliance with the ISO 9001:2008 Standard. Acceptable responses are set out in Table 7.1 for various scenarios.

**Table 7.1** 

Non-Conformance Status	Disposition	Corrective Action
Physical rectification has been undertaken	Provide confirmation that the rectification work has remedied the Non-Conformance	Describe any improvements to delivery process
Physical rectification is proposed	Provide a plan committing to scope and timing of rectification works	Describe any improvements to delivery process
No physical rectification is proposed	Objection	N/A

- (iv) Project Co shall investigate and respond to all Non-Conformance Reports.
- (v) Project Co may object to the issuance of any Non-Conformance Report by the City. If such objection has not been resolved by mutual agreement between the City and Project Co within 5 Business Days of delivery by Project Co to the City of a notice of the objection, then either Party may refer the matter to the Dispute Resolution Procedure for determination.
- (vi) If Project Co fails to object to the issue by the City of a Non-Conformance Report within 5 Business Days, Project Co is deemed to have accepted that Non-Conformance Report.
- (vii) If there is no outstanding notice of objection, and an acceptable disposition and Corrective Action are documented, the Quality Director records the date denoting the end of the time period for which the Non-Conformance Report has an 'open' status. The Quality Director shall then change the Non-Conformance Report status to 'closed' once the nonconformity has been implemented and verified, and shall provide a copy of the Non-Conformance Report to the City within 2 Business Days thereafter.

## 7.2 Non-Conformance Report Tracking System

- (a) Project Co shall implement and maintain a Non-Conformance Tracking System to monitor the status of all Non-Conformance Reports initiated by City and Project Co.
- (b) The Non-Conformance Tracking System shall be fully operating, with the following minimum requirements, within 90 days from Financial Close:
  - (i) comprise a single repository containing both Project Co and City initiated Non-Conformance Reports;
  - (ii) have the ability to attach supporting material such as photos and documents;
  - (iii) provide live access to the current Non-Conformance Report status to both Project Co and City;
  - (iv) record quality failure points in accordance with Part E of Schedule 20 Payment Mechanism; and
  - (v) produce monthly summary reports for delivery to the City of "open" Non-Conformance Reports, quality failure points accrued within each performance threshold category in any given month, and the total quality failure points accrued across all performance threshold categories in any given month.

#### 7.3 Performance Measures

(a) Project Co shall resolve Non-Conformances within the response time specified on the Non-Conformance Reports.

#### 7.4 Non-Conformance Records

- (a) In addition to the maintenance of the Non-Conformance Tracking System under Section 7.2 Non-Conformance Report Tracking System of this Schedule, Project Co shall maintain and make available to City upon request, records of:
  - (i) each Non-Conformance;
  - (ii) the reference numbers of all Non-Conformance Reports;
  - (iii) a description of all Non-Conformance Reports;
  - (iv) the proposed actions by Project Co to rectify each Non-Conformance;
  - (v) the date at which each Non-Conformance was identified; and
  - (vi) the date and time at which a Non-Conformance specified in a Non-Conformance Report was rectified.

## PART 8 PERFORMANCE REPORTING

## 8.1 Obligation to Report

- (a) Project Co shall prepare a report (a "**Performance Monitoring Report**") in respect of each Payment Period. The Performance Monitoring Report shall be submitted to the City within 5 Business Days following the end of each Payment Period, and shall describe performance of the Maintenance Services for the purposes of Schedule 20 Payment Mechanism in respect of the relevant Payment Period. The Performance Monitoring Report shall set out Project Co's calculation of each of the following (each stated separately), and shall be in accordance with the Daily Operating Reports for the relevant Payment Period:
  - (i) Scheduled Revenue Service Vehicle Kilometres for the relevant Payment Period, for both Peak Period and Off-Peak Period;
  - (ii) Revenue Service Vehicle Kilometres for the relevant Payment Period, for both Peak Period and Off-Peak Period;
  - (iii) Total Vehicle Kilometers for the relevant Payment Period, including amounts for pull-in/pull-out movements and for training purposes;
  - (iv) Total of all Revenue Service Vehicle Kilometres credited to Project Co for the relevant Payment Period due to a Non-Project Co. Cause;
  - (v) Total of all Scheduled Station Hours for the relevant Payment Period (broken down by station name and station group);
  - (vi) Total of all Station Availability Failure Hours (broken down by Peak Period, Off-Peak Period, station name and station group);
  - (vii) any Service Failures and associated Service Failure Points, in respect of that month;
  - (viii) any Quality Failures and associated Quality Failure Points in respect of that month; and
  - (ix) total of all Failure Points assigned due to Station Availability Failure and/or Vehicle Availability Failure.
- (b) The following aspects of Performance Monitoring Reports are addressed in Schedule 20 Payment Mechanism:
  - (i) the applicability of Performance Monitoring Reports to the Payment Mechanism;
  - (ii) claims regarding errors or omissions in a Performance Monitoring Report; and

(iii) failure by Project Co to monitor or report.

# PART 9 PERFORMANCE MEASURES

## 9.1 Application of Performance Criteria

(a) The Quality Failures set out below and associated payment penalties shall not be applicable until following the Revenue Service Availability Date.

### 9.2 Performance Criteria

FE Type	Category	Response	Rectification / Remedial	Recording Frequency
AF = Availability Failure SF = Service Failure QF = Quality Failure	Major Medium Minor Veh. Avail. = Captured by the Vehicle Availability deduction regime St. Avail = Captured by the Station Availability deduction regime	N/A = Not Applicable	N/A = Not Applicable ND = Correct by start of service the following day	PR = Per Request PE = Per Event D = Daily W = Weekly M = Monthly Q = Quarterly B = Bi-Annually A = Annually R = Randomly, At Any Moment in Time

Ref	Parameter	Failure Type	Category	Resp. Time	Rect. or Rem. Time	Recording Frequency	Application (Maximum Project Co Exposure)
5.1(b)	Project Co shall provide an updated Quality Audit Plan at twelve month intervals following submission of the initial Quality Audit Plan.	QF	Medium	NA	1 Month	M	1 QF per Contract Month

Ref	Parameter	Failure Type	Category	Resp. Time	Rect. or Rem. Time	Recording Frequency	Application (Maximum Project Co Exposure)
5.2(ii)	The Quality Director shall schedule Internal Quality Audits and External Quality Audits at least quarterly or as agreed upon with the City.	QF	Medium	NA	1 day	Q	1 QF per day
5.2(iii)	Within 14 days of completion of any Quality Audit, Project Co shall document, or cause to be documented, the results of such Quality Audit in an audit report and make such report available to the City upon request.	QF	Medium	NA	1 day	PE	1 QF per day
5.3(ii)	Project Co shall prepare a Corrective Action plan, and, if appropriate, a Preventive Action plan, and submit it to the City within 20 Business Days of the closing meeting.	QF	Medium	NA	1 day	PE	1 QF per day

Ref	Parameter	Failure Type	Category	Resp. Time	Rect. or Rem. Time	Recording Frequency	Application (Maximum Project Co Exposure)
6.9(a)	For each month of the Project Term, Project Co shall prepare, and submit to the City within 15 Business Days of the start of the following month, a comprehensive Quality Management System report.	QF	Medium	NA	1 day	PE	1 QF per day
7.3	Project Co shall resolve Non-Conformances within the response time specified on the Non-Conformance Reports.	QF	Medium	NA	1 day	PE	1 QF per day
8.1	The Performance Monitoring Report shall be submitted to the City within 5 Business Days following the end of each Payment Period.	QF	Medium	NA	1 day	PE	1 QF per day

## APPENDIX A QUALITY MANUAL

### A.1 Quality Manual

- (a) Project Co shall provide a comprehensive Quality Manual that describes the Quality Management System for all aspects of the Works and the Maintenance. The Quality Manual shall establish the Quality Policy and Quality Objectives for all aspects of the Works and the Maintenance and, in compliance with the requirements of the ISO 9001:2008 Standard, shall describe the processes that shall be established, implemented, controlled, and continually improved to achieve the established Quality Objectives.
- (b) The Quality Objectives shall be measurable, consistent with the Quality Policy and linked to meeting the needs and performance expectations of City in respect of the Project. The Quality Management System described in the Quality Manual shall include all the activities required to achieve these Quality Objectives, including project controls such as scope, cost, schedule and general document control management activities. All of these activities shall be subject to Internal Quality Audits and External Quality Audits.
- (c) The Quality Manual shall describe the Project Co Parties involved in performing the Works and the Maintenance and how key management activities (such as Project control, traffic management and management of Project design, Construction Activities, the Maintenance and environmental matters) shall interface with each other. The Quality Manual shall also provide the organization chart identifying the authority and responsibilities of all Key Individuals and other key personnel involved with the aforementioned aspects of the Project. The Quality Manual shall also show how the various levels of Quality Management System documentation are linked together.
- (d) The Quality Manual shall clearly define the reporting function and authority of Project Co's Quality Director who shall liaise with the City and act as the single point representative of Project Co for all matters relating to quality management.

## APPENDIX B DESIGN QUALITY MANAGEMENT PLAN

## **B.1** Design Quality Management Plan

- (a) Project Co shall provide a comprehensive Design Quality Management Plan ("**DQMP**") that describes how it intends to manage the design processes for the Project in compliance with the ISO 9001:2008 Standard, its Quality Manual and the provisions of this Project Agreement. The DQMP is to apply throughout the Works and for rehabilitation work throughout the Project Term.
- (b) The DQMP shall contain an organizational chart identifying Key Individuals and other key personnel responsible for design management and their relationship (see Appendix D) with the Quality Director for Project Co's overall Quality Management System as documented in Project Co's Quality Manual. It shall also contain a description of the responsibilities, qualifications, and authority of the above personnel and the organizational interfaces between those responsible for design management and other engineering and construction management disciplines.
- (c) Project Co shall appoint a Quality Manager who shall be responsible for the DQMP and shall:
  - (i) have experience in a similar role on a successful project of similar scope and have successfully completed an ISO 9001 Lead Auditor Course; and
  - (ii) report to the Quality Director.
- (d) The DQMP shall, at a minimum, include or reference detailed quality system procedures and process flow charts for the following processes:
  - (i) design input and output review;
  - (ii) design verification to ensure that design input requirements have been met;
  - (iii) design validation to ensure that the completed project is capable of meeting its intended use;
  - (iv) design changes;
  - (v) quality assessment and procurement of Project Co Parties responsible for design;
  - (vi) External Quality Audits of Project Co Parties responsible for design;
  - (vii) Internal Quality Audits;
  - (viii) Corrective Actions, Preventive Actions and opportunities for improvement;
  - (ix) document management; and

- (x) control of Quality Records.
- (e) The above procedures and flow charts shall document who does the work, what they do, and what evidence is generated that they have done the work correctly.

# APPENDIX C CONSTRUCTION QUALITY MANAGEMENT PLAN

## **C.1** Construction Quality Management Plan

- (a) Project Co shall provide a comprehensive Construction Quality Management Plan ("CQMP") that describes how it intends to manage the Construction Activities in compliance with the ISO 9001:2008 Standard, its Quality Manual and the provisions of this Project Agreement. The CQMP is to apply throughout the Project Term.
- (b) The CQMP shall contain an organizational chart identifying Key Individuals and other key personnel responsible for construction management and their relationship (see Appendix D) with the Quality Director for Project Co's overall Quality Management System as documented in Project Co's Quality Manual. It shall also contain a description of the responsibilities, qualifications, and authority of the above personnel and the organizational interfaces between those responsible for construction management and other disciplines such as design management, Maintenance, environmental management and traffic management.
- (c) Project Co shall appoint a Quality Manager who shall be responsible for the CQMP and shall:
  - (i) have experience in a similar role on a successful project of similar scope and have successfully completed an ISO 9001 Lead Auditor Course; and
  - (ii) report to the Quality Director.
- (d) The CQMP shall, at a minimum, include or reference detailed quality system procedures and process flow charts for the following processes:
  - (i) construction safety audits;
  - (ii) inspection, testing and monitoring;
  - (iii) materials identification and traceability;
  - (iv) quality assessment and procurement of Project Co Parties responsible for construction;
  - (v) External Quality Audits of Project Co Parties responsible for construction;
  - (vi) Internal Quality Audits;
  - (vii) control of nonconforming product;
  - (viii) Corrective Actions, Preventive Actions and opportunities for improvement;
  - (ix) document management; and

- (x) control of Quality Records.
- (e) The above procedures and flow charts shall document who does the work, what they do, and what evidence is generated that they have done the work correctly.
- (f) The CQMP shall also include or reference an inspection and test plan, which if referenced, shall also be submitted through the Review Procedure, detailing all major on and off site inspection and test activities for Works performed by Project Co and the Project Co Parties. The inspection and test plan shall, at a minimum, include:
  - (i) a description of the inspection, testing and monitoring activity;
  - (ii) frequency of inspections, tests and monitoring;
  - (iii) reference to standards, codes, specifications, and acceptance criteria;
  - (iv) reports and checklists required;
  - (v) personnel responsible for inspection, testing and monitoring activity;
  - (vi) quality assurance review, witness and hold points; and
  - (vii) description and frequency of geotechnical instrumentation monitoring and adherence to acceptance criteria.

# APPENDIX D MAINTENANCE AND REHABILITATION QUALITY MANAGEMENT PLAN

### D.1 Maintenance and Rehabilitation Quality Management Plan

- (a) Project Co shall provide a comprehensive Maintenance and Rehabilitation Quality Management Plan ("MRQMP") that describes how it intends to monitor and measure its performance of the Maintenance in compliance with the ISO 9001:2008 Standard, its Quality Manual and the provisions of this Project Agreement. The MRQMP shall also be aligned with all relevant Project Agreement performance measures. The MRQMP is to apply following Substantial Completion.
- (b) The MRQMP shall contain an organizational chart identifying Key Individuals and other key personnel responsible for management of Maintenance and their relationship with the Quality Director for Project Co's Quality Management System as documented in Project Co's Quality Manual. It shall also contain a description of the responsibilities, qualifications, and authority of the above personnel and the organizational interfaces between those responsible for management of Maintenance and other disciplines such as design management, construction management, environmental management and traffic management.
- (c) Project Co shall appoint a Quality Manager who shall be responsible for the MRQMP and shall:
  - (i) have experience in a similar role on a successful project of similar scope and have successfully completed an ISO 9001 Lead Auditor Course; and
  - (ii) report to the Quality Director.
- (d) Project Co shall develop documented quality system procedures and process flow charts to ensure that all Project Agreement requirements in respect of the Maintenance are met or exceeded. These procedures and flow charts shall document who does the work, what they do, and what evidence is generated that they have done the work correctly.
- (e) The MRQMP shall include a compliance monitoring process to track compliance with all performance measures. The performance measures compliance monitoring process must clearly describe the approach taken in assessing compliance, and define the frequency and method of monitoring and reporting such compliance. The City shall review Project Co's performance measures compliance monitoring process and may request changes that the City considers appropriate to facilitate the accurate and appropriate monitoring and reporting of compliance with the performance measures and otherwise to meet the requirements of this Project Agreement. Project Co shall promptly implement any such changes requested by the City. Project Co's performance measures compliance monitoring process shall be subject to ongoing review by the City throughout the Project Term.

## APPENDIX E TRAFFIC QUALITY MANAGEMENT PLAN

## **E.1** Traffic Quality Management Plan

- (a) Project Co shall provide a comprehensive Traffic Quality Management Plan ("**TQMP**") that describes how it intends to administer the traffic management processes in connection with the Project in compliance with the ISO 9001:2008 Standard, its Quality Manual and the provisions of this Project Agreement. The TQMP is to apply throughout the Project Term.
- (b) The TQMP shall contain an organizational chart identifying Key Individuals and other key personnel responsible for traffic management and their relationship with the Quality Director for Project Co's overall Quality Management System as documented in Project Co's Quality Manual. It shall also contain a description of the responsibilities, qualifications, and authority of the above personnel and the organizational interfaces between those responsible for traffic management and other disciplines such as design management, construction management, the Maintenance and environmental management. The TQMP shall address the manner in which traffic management relates to Project design, Construction Activities and Maintenance.
- (c) Project Co shall appoint a Quality Manager who shall be responsible for the TQMP and shall:
  - (i) have experience in a similar role on a successful project of similar scope and have successfully completed an ISO 9001 Lead Auditor Course; and
  - (ii) report to the Quality Director.
- (d) The TQMP shall at a minimum, include or reference detailed quality system procedures and process flow charts for the following processes:
  - (i) major processes outlined in the Traffic Management Plan and the associated sub plans listed in Part 3, Article 7 of the Design and Construction Specifications;
  - (ii) External Quality Audits of Project Co Parties responsible for traffic management;
  - (iii) Internal Quality Audits;
  - (iv) management of Non-Conformances;
  - (v) Corrective Actions and Preventive Actions;
  - (vi) document management; and
  - (vii) control of Quality Records.

- (e) The above procedures and flow charts shall document who does the work, what they do, and what evidence is generated that they have done the work correctly.
- (f) When the above processes are already covered as part of another Quality Management Plan, the process heading still needs to be identified as part of the TQMP; however the details can be minimized to a reference to the other Quality Management Plan and section or paragraph where the details are provided. The referenced Quality Management Plan and section or paragraph must indicate specific requirements with regards to the above processes as it relates to traffic quality management. Notwithstanding the above, processes that fall within the specific requirements of the Traffic Management Plan must include detailed quality system procedures and process flow charts under the TQMP.

## APPENDIX F ENVIRONMENTAL QUALITY MANAGEMENT PLAN

## F.1 Quality Management Plan – Environmental

- (a) Project Co shall provide as part of a comprehensive Quality Management Plan ("QMP") a section that describes how it intends to manage the environmental components of the Project in compliance with Project Co's Environmental Management Plan the requirements of which are described in Schedule 17, its Quality Manual and the provisions of this Project Agreement. The QMP for the environmental component is to apply throughout the Project Term.
- (b) The environmental component of the QMP shall contain reference to Project Co's Environmental Management Plan as described in Schedule 17, an organizational chart identifying Key Individuals and other key personnel responsible for environmental management and their relationship with the Quality Director for Project Co's overall Quality Management System as documented in Project Co's Quality Manual. It shall also contain a description of the responsibilities, qualifications, and authority of the above personnel and the organizational interfaces between those responsible for environmental management and other discipline such as management of Project design, construction and maintenance and rehabilitation disciplines.
- (c) Project Co shall appoint a Quality Manager who shall be responsible for the environmental component of the QMP and shall:
  - (i) have experience in a similar role on a successful project of similar scope and have successfully completed an ISO 9001 Lead Auditor Course; and
  - (ii) report to the Quality Director.
- (d) The environmental component of the QMP shall include or reference detailed quality system procedures and process flow charts for the following processes:
  - (i) satisfying and ensuring compliance with Project Co's environmental obligations, including compliance with the Environmental Approvals and in particular, the preparation and implementation of an Environmental Management System and specific plans as detailed elsewhere in this Project Agreement;
  - (ii) obtaining and maintaining applicable Permits, Licences and Approvals;
  - (iii) environmental monitoring and reporting;
  - (iv) environmental incident reporting and tracking;
  - (v) External Quality Audits of Project Co Parties responsible for environmental aspects of the Project;
  - (vi) Internal Quality Audits;

- (vii) control of Non-Conformances;
- (viii) Corrective Actions, Preventive Actions and opportunities for improvement;
- (ix) document management; and
- (x) control and retention of Quality Records.
- (e) The above procedures and flow charts shall document who does the work, what they do, and what evidence is generated that they have done the work correctly.
- (f) The City, in the course of its Quality Documentation review, shall pay special attention to Project Co's environmental component of the QMP to verify that Project Co has taken full responsibility for all of the environmental requirements as specified in Schedule 17 Environmental Obligations and elsewhere in the Project Agreement, including obtaining approvals from relevant Governmental Authorities.

## APPENDIX G AUDIT OF TEMPORARY TRAFFIC MANAGEMENT – SAMPLE SITE REPORT

Contractor		Location
		Activity
Auditor		Date & time
	N = All – Some – No	
Advanced Warning Area	9	
<ul> <li>Signage</li> </ul>		
<ul> <li>Visibility</li> </ul>		
<ul> <li>Placement</li> </ul>		
<ul> <li>Quality</li> </ul>		
Transition Area, Buffer	Space Work Are	
<ul> <li>Signage</li> </ul>		
Visibility		
Placement		
Quality		
Delineation		
<ul> <li>Placement</li> </ul>		
Quality		
<ul> <li>Spaced Correctly</li> </ul>		
Other issues		
Excavations		Y/N
Pedestrians from wo	nrk .	Y/N
<ul> <li>Pedestrians from tra</li> </ul>		Y/N
<ul> <li>Cyclists from work</li> </ul>	iiio	Y/N
<ul> <li>Cyclists from traffic</li> </ul>		Y/N
Advance Warning as	rea	A - S - N
Transition area		A - S - N.
Buffer Space		A - S - N
Work Area		A - S - N
<ul> <li>Warning lights</li> </ul>		A - S - N
<ul> <li>Vehicles operating v</li> </ul>	vith traffic flow	A - S - N
<ul> <li>Vehicles parked with</li> </ul>		A - S - N
<ul> <li>Vehicles outside zor</li> </ul>	ne	A - S - N
<ul> <li>Entering/leaving with</li> </ul>	n traffic flow	A - S - N
<ul> <li>Workers safety</li> </ul>		A - S - N
<ul> <li>Traffic Control Plan</li> </ul>	(TCP)	
or TCP Supervisor	on site	Y / N
<b>Termination Area</b>		
<ul> <li>Sign placement</li> </ul>	A - S - N	
<ul> <li>Sign quality</li> </ul>	A-S-N	
General Observations		

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