

PARRAMATTA LIGHT RAIL STAGE 1

Supply, Operate and Maintain Contract

Quarterly Environment Report – 2021 Q4

PLR1SOM-GLR-ALL-PE-RPT-001006

Document Number	PLR1SOM-GLR-ALL-PE-RPT-001006
------------------------	-------------------------------

Version History Control Box

Date	Version Number	TeamBinder Revision	Author	Comments
05/01/2022	A	NA	██████████	Draft
11/01/2022	0	0	██████████	Final

Approval Box

Action	Responsible Person
Approved by	██████████ Contractors Representative
Document ██████████	██████████ Environment, Planning and Sustainability Manager

Contents

1	Amendments from Previous Quarterly Reports	3
2	Progress this Quarter	3
2.1	Planning Approvals and Management Plan Status	3
2.1.1	Pre-Construction Minor Works Approval Status	3
2.1.2	Consistency Assessments Status	3
2.2	Environmental Audits and Training	3
2.3	Interface Matters	3
2.4	Conditions of Approval	4
2.5	Environmental Design Requirements	4
2.6	Trees and Vegetation Management Requirements	4
2.6.1	Tree Register	4
2.6.2	Tree Protection Plans	4
2.6.3	Progress of the Tree Plantings	5
2.7	Compliance reporting against the CEMP	5
3	Conclusion	6

Appendices

Appendix A Planning Approval Reporting Requirements and Status for SOM – Package 5

Tables

Table 1	EDRR Status – Q4 2021	4
Table 2	ER Inspections in 2021	5
Table 3	Stormwater Discharge Monitoring in 2021	6

1 Amendments from Previous Quarterly Reports

Nil.

2 Progress this Quarter

This Quarterly Environment Report covers 2021 Quarter 4 (Q4 – from 01/10/2021 to 31/12/2021).

2.1 Planning Approvals and Management Plan Status

At the end of the reporting period, the Construction Environmental Management Plan (CEMP) and all sub-plans had been endorsed or approved as required by the Project Approval.

During the reporting period, three plans were submitted to the Environmental Representative (ER) for endorsement and were endorsed by the ER:

- Construction Soil and Water Management Plan (Rev 2)
- Construction Traffic, Transport and Access Management Plan (Rev 3)
- Construction Waste and Resources Management Plan (Rev 1).

Environmental Protection Licence 21606 was issued by the Environment Protection Authority to GRCLR on 14/12/2022. Under the Protection of the Environment Operations Act (POEO Act), GRCLR is required to prepare and implement a Pollution Incident Response Management Plan (PIRMP). The PIRMP was being drafted at the end of the reporting period.

2.1.1 Pre-Construction Minor Works Approval Status

No longer required as CEMP and sub-plans are endorsed or approved.

2.1.2 Consistency Assessments Status

Submitted by GRCLR this reporting period and approved by TfNSW:

- Nil.

Currently being considered by GRCLR:

- Tetra masts.

Prepared (with review by GRCLR) and approved by TfNSW:

- Nil.

2.2 Environmental Audits and Training

Project Audit Schedule developed to ensure project audit requirements are met.

A Construction Readiness Audit for the Traction Power Substation (TPS) sites was undertaken by TfNSW on 29/11/2021. Draft results of this audit were received during the reporting period. No non-conformances or observations were made with regard to environmental management.

Environmental management training packages in development and training/toolbox meeting schedule drafted for implementation, commencing in 2022 Q1.

2.3 Interface Matters

Interface meetings with PCPLR were held on 07/10/2021, 04/11/2021 and 02/12/2021.

Weekly GRCLR/Remediation Contractor interface meetings and workshops ceased from October 2021 following handover of the SaMF site by Ventia.

2.4 Conditions of Approval

Reports and notifications to DPIE required under Schedule 1 of the Project Approval are listed below in Appendix 1, which includes a SOM – Package 5 status update reflecting progress against each reporting requirement.

Detailed compliance reporting addressing GRCLR progress against the requirements of the Conditions of Approval (CoAs), Environment Performance Objectives (EPOs) and Revised Environmental Mitigation Measures (REMMs) is undertaken quarterly in INX.

Of note, meetings were held with DPIE and TfNSW on 03/11/2021 and 01/12/2021 to discuss progress on preparation of the Operational Noise and Vibration Report (ONVR).

2.5 Environmental Design Requirements

The GRCLR Environment, Planning and Sustainability (EPS) team has been working closely with the Design team to review design packages and ensure compliance with the CoA, EPOs and REMMs relevant to design.

Environmental Design Review Reports (EDRRs) are being prepared with each design package submitted for review. Status of the EDRRs at the end of the reporting period is provided in Table 1. All packages are Approved for Construction (AFC) except for SOM 36 – SaMF Maintenance Plant.

Table 1 EDRR Status – Q4 2021

Design Package EDRR	Design Gate*	Design Package EDRR	Design Gate*	Design Package EDRR	Design Gate*
SOM 1	AFC	SOM 16	AFC	SOM 31	AFC
SOM 2	AFC	SOM 17	AFC	SOM 32	AFC
SOM 3	AFC	SOM 18	AFC	SOM 33	AFC
SOM 4	AFC	SOM 19	AFC	SOM 34	AFC
SOM 5	AFC	SOM 20	AFC	SOM 35	AFC
SOM 6	DDR	SOM 21	AFC	SOM 36	DDR
SOM 7	AFC	SOM 22	AFC	SOM 37	AFC
SOM 8	AFC	SOM 23	AFC	SOM 38	AFC
SOM 9	AFC	SOM 24	AFC	SOM 39	AFC
SOM 10	AFC	SOM 25	AFC	SOM 40	AFC
SOM 11	AFC	SOM 26	AFC	SOM 41	AFC
SOM 12	AFC	SOM 27	AFC	SOM 42	AFC
SOM 13	AFC	SOM 28	AFC	SOM 43	AFC
SOM 14	AFC	SOM 29	AFC	SOM 44	AFC
SOM 15	AFC	SOM 30	AFC	SOM 45	AFC

* AFC = Approved for Construction, DDR = Detailed Design Review and NA = Not Applicable

2.6 Trees and Vegetation Management Requirements

2.6.1 Tree Register

The PLR Tree Register is received from the Independent Arborist at irregular intervals as it is updated by the various PLR contractors. GRCLR has not required any updates to the register this reporting period.

2.6.2 Tree Protection Plans

No tree protection plans were required for GRCLR works during this reporting period.

2.6.3 Progress of the Tree Plantings

No tree planting activities were planned or undertaken by GRCLR during this reporting period.

2.7 Compliance reporting against the CEMP

The CEMP is now an active document following commencement of construction works at the Stabling and Maintenance Facility (SaMF) site during the reporting period.

2.7.1.1 Inspections

Six ER inspections were undertaken at the SaMF site during Q4 2021. These inspections were attended by TfNSW and GRCLR representatives. Details of these inspections are provided in Table 2.

Table 2 ER Inspections in 2021

Inspection No.	Date	Issues Identified	Cumulative Issues Identified	Issues Closed	Cumulative Issues Closed
001	06/10/2021	3	3	0	0
002	19/10/2021	1	4	0	0
003	09/11/2021	2	6	3	3
004	23/11/2021	0	6	3	6
005	07/12/2021	2	8	0	6
006	21/12/2021	0	8	1	7

In addition, weekly inspections of the SaMF site and sections of the alignment were undertaken by environmental management professionals from GRCLR and subcontractors.

2.7.1.2 Noise and Vibration Monitoring

No noise and vibration monitoring of construction was undertaken during the reporting period, as no sensitive receivers are located close to the SaMF facility.

2.7.1.3 Soil and Water Monitoring

Testing of soil for contamination was undertaken at the SaMF site during the reporting period. This testing has primarily been undertaken to ensure the health and safety of the construction teams.

Monitoring of volume and quality of water at the SaMF site has been undertaken during the reporting period to meet the requirements of the Long Term Environmental Management Plan (LTEMP) for the site. Excessive volumes of groundwater have been measured at one of the capillary break layer (CBL) pits and investigations into the cause of these measurements are ongoing.

Stormwater discharge monitoring was undertaken during the reporting period to ensure captured stormwater met the water quality parameters identified in the project Soil and Water Management Plan prior to discharge offsite. Monitoring data is provided below in Table 3.

Table 3 Stormwater Discharge Monitoring in 2021

Date	Water Source	Discharge to:	Turbidity	pH	Oil & Grease
29/11/2021	SaMF - Tank 1	Stormwater	24.4	8.11	Nil
29/11/2021	SaMF - Tank 2	Stormwater	17.6	7.92	Nil
29/11/2021	SaMF - Tank 3	Stormwater	1.4	7.98	Nil
29/11/2021	SaMF - Tank 4	Stormwater	8.3	7.6	Nil
29/11/2021	SaMF - Tank 5	Stormwater	2.2	7.61	Nil
30/11/2021	SaMF - Northeast Excavation	Stormwater	42.5	8.02	Nil
1/12/2021	SaMF - Tank 2	Stormwater	29.4	7.83	Nil
1/12/2021	SaMF - Tank 3	Stormwater	44.1	7.98	Nil
1/12/2021	SaMF - Tank 4	Stormwater	28.4	7.95	Nil
6/12/2021	SaMF - Northeast Excavation	Stormwater	47.6	8.18	Nil
7/12/2021	SaMF - Northeast Excavation	Stormwater	35.6	8.37	Nil
15/12/2021	SaMF - Northeast Excavation	Stormwater	43.3	7.96	Nil
20/12/2021	SaMF - Northeast Excavation	Stormwater	46.8	8.08	Nil
10/01/2022	SaMF - Northeast Excavation	Stormwater	18.5	8.35	Nil
11/01/2022	SaMF - Northeast Excavation	Stormwater	11.6	8.48	Nil

2.7.1.4 Air Quality Monitoring

Dust monitoring equipment was established for the SaMF site but needed to be replaced following damage by vandals. GRCLR were awaiting results at the time of reporting.

3 Conclusion

There were no environmental non-compliances for Q4 2021. The design has progressed with input from the EPS team. Construction commenced at the SaMF site during the reporting period.

Appendix A Planning Approval Reporting Requirements and Status for SOM – Package 5

Condition	Report/Notification/ Appointment	Timing	Purpose	Status for SOM – Package 5
Part A – Administrative				
A30/A31	Compliance Tracking Program	At least one month before the commencement of works	Information	Compliance against all conditions is reported in INX on a quarterly basis
A34	Pre-Construction Compliance Report	No later than one month before the commencement of construction (or each stage of construction in staging report)	Information	Pre-Construction Compliance Report submitted to DPIE on 14/05/2021
A37	Construction Compliance Reports	Every six months from the date of commencement of construction	Information	Construction commenced this reporting period and GRCLR will contribute to the August 2021 to January 2022 Construction Compliance Report as requested by TfNSW
A38	Pre-Operation Compliance Report	No later than one month before commencement of operation	Information	Operation not due to commence until 2023 hence Pre-Operation Compliance Report was not required in this reporting period
A40	Environmental Audit Program	No later than one month before commencement of operation	Information	Submitted for construction by TfNSW to DPIE prior to this reporting period, will be submitted for operations prior to commencement of operations
A43	Environmental Audit Reports	Within six weeks of completing the audit	Information	No audits have been conducted in this reporting period
A44	Notification of Incidents	Immediately after the Proponent becomes aware of an incident	Notification	No incidents notified in this reporting period
A45	Incident Report	Within one week of notification of an incident	Information	No incidents to report in this reporting period
A47	Notification of Incident notified under POEO	Within 24 hours after notification give to EPA	Information	No incidents notified in this reporting period
Part B – Communication Information and Reporting				
B9/B10	Complaints	On request	Information	No complaints were received regrading SOM works in this reporting period
B11	Provision of electronic information	On request	Information	Information will be supplied to TfNSW as required
Part C – Construction Environmental Management				
C7	Construction Environmental Management Plan	No later than one month before the commencement of construction	Approval	CEMP approved by DPIE

Condition	Report/Notification/ Appointment	Timing	Purpose	Status for SOM – Package 5
C13	Construction Monitoring Program	At least one month before the commencement of construction	Information	Construction Noise and Vibration Monitoring and Grey Headed Flying Fox Monitoring Programs accepted by DPIE
C18	Site Establishment Management Plan (SEMP)	One month before establishment of any construction ancillary facility	Approval	SEMP for SaMF site approved by DPIE
Part D – Operation Environmental Management				
D3/D6/D7	Operational Environmental Management Plan (OEMP)	No later than one month before the commencement of operation	Information	Operation not due to commence until 2023 hence OEMP was not required in this reporting period
Part E – Key Issues				
Traffic and Transport				
E14	Pedestrian and Cyclist Network and Facilities Strategy	Before construction of pedestrian/cyclist permanent built works	Information	Addendum to the Pedestrian and Cyclist Network and Facilities Strategy accepted by DPIE
E19	Operational Traffic, Transport and Access Performance Review	Within one month of completion	Information	Operation not due to commence until 2023 hence Operational Traffic, Transport and Access Performance Review was not required in this reporting period
Noise and Vibration				
E28	Out-of-Hours Work Protocol	Before commencement of any out-of-hours works	Approval	Out-of-Hours Work Protocol approved by DPIE
E39	Out-of-Hours Work Respite	Following consultation at three monthly intervals	Information	Not required in this reporting period, but requirement address in Construction Noise and Vibration Management Plan approved by DPIE
E48	Operational Noise and Vibration Review (ONVR)	Before the implementation of mitigation measures	Approval	ONVR preparation continued in this reporting period with submission to TfNSW, ER, AA for review and to CoPC for consultation
E58	Noise and Vibration Compliance Assessment Report	Within one month of its completion	Information	Operation not due to commence until 2023 hence Noise and Vibration Compliance Assessment Report was not required in this reporting period
E59	Noise and Vibration Compliance Assessment Report – Update	Within one month of its completion	Information	Operation not due to commence until 2023 hence no update to the Noise and Vibration Compliance Assessment Report was required in this reporting period
Heritage				
E75	Archaeological Excavation Report	Within 12 months of completing archaeological investigations	Information	No archaeological relics were discovered during this reporting period hence no Archaeological Excavation Reports were required

Condition	Report/Notification/ Appointment	Timing	Purpose	Status for SOM – Package 5
Urban Design and Visual Amenity				
E87	Urban Design Requirements Report (UDRR)	Following review by the Design Review Panel	Approval	Project-wide UDRR was prepared by PCPLR with input from GRCLR
Biodiversity and Revegetation				
E106	Tree Register	Before the removal, damage or pruning of a tree for the purposes of the CSSI	Information	Construction Flora and Fauna Management Plan has been approved by DPIE and addresses GRCLR interactions with the Independent Arborist and the Tree Register
Socio-Economic, Land Use and Property				
E113	Flood Management Design Report	At each design stage with potential to cause adverse flooding impacts	Information	Project-wide Flood Management Design Report was prepared by PCPLR with input from GRCLR
E114	Operational Flood Management Plan	Before commencement of operations	NA	Operation not due to commence until 2023 hence Operational Flood Management Plan was not required in this reporting period
E117	Electromagnetic Management Plan	Before commencement of operations	Information	Operation not due to commence until 2023 hence Electromagnetic Management Plan was not required in this reporting period
E132	Final Hazard Analysis and Construction Safety Study	Before commencement of construction of any hazardous works or works adjacent to hazardous infrastructure	Approval	Construction of this nature did not commence this reporting period hence no Final Hazard Analysis and Construction Safety Study was required
E133	Post-Startup Compliance Report	Three months after commencement of operations	Information	Operation not due to commence until 2023 hence Post-Startup Compliance Report was not required in this reporting period

The information here contained has been prepared by Great River City Light Rail and is of a general and indicative nature only. The information is current at the time of writing, and is subject to change without notice. The information is not intended to be relied upon unless expressly stated by an authorised person of GRCLR, nor is it to be a substitute for information or documentation submitted as part of a formal process. GRCLR accepts no responsibility, and shall have no liability for, any loss or damage which may arise from, or be related to, using or relying on this information or documentation.