

GYSBI PMO

# SCOPE OF WORK DOCUMENT

**BUSINESS UNIT:** AES PROJECTS

**SITE / ASSET:** GYSBI CITY (GCT)

**PROJECT TITLE:** GCT INFRASTRUCTURE PROJECT

**PROJECT NO:** GY01-0013

**DOCUMENT NO:** GY01-0013-EN-SOW-001-01  
**REVISION:** C1

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## REVISION / ISSUE TABLE:

REV	DATE	DESCRIPTION	INITIATED	REVIEWED	APPROVED
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C1	27/02/2026	APPROVED FOR CONSTRUCTION	SJL	GP	NN

## REVISION HISTORY:

REVISION	SUMMARY OF CHANGES MADE	SECTIONS AFFECTED
A1	N/A – FIRST ISSUE	N/A
C1	N.A – NO CHANGE	N/A

## TABLE OF ACRONYMS & ABBREVIATIONS:

ACRONYM	DEFINITION
ANPR	AUTOMATIC NUMBER PLATE RECOGNITION
ATS	AUTOMATIC TRANSFER SWITCH
AV	AUDIO-VISUAL
ASTM	AMERICAN SOCIETY FOR TESTING AND MATERIALS
ASME	AMERICAN SOCIETY OF MECHANICAL ENGINEERS
BS	BRITISH STANDARDS
CCTV	CLOSED-CIRCUIT TELEVISION
CEN	EUROPEAN COMMITTEE FOR STANDARDIZATION
COMM'G	COMMISSIONING
DLP	DEFECTS LIABILITY PERIOD
EPC	ENGINEERING, PROCUREMENT & CONSTRUCTION
EPA	ENVIRONMENTAL PROTECTION AGENCY
FF&E	FURNITURE, FIXTURES & EQUIPMENT
GA	GENERAL ARRANGEMENT
GPL	GUYANA POWER AND LIGHT
GSB	GYSBI SHORE BASE
GYSBI	GUYANA SHORE BASE INC.
GCT	GYSBI CITY
HSSE	HEALTH, SAFETY, SECURITY & ENVIRONMENT
ICT	INFORMATION AND COMMUNICATIONS TECHNOLOGY
IEC	INTERNATIONAL ELECTROTECHNICAL COMMISSION
ISO	INTERNATIONAL ORGANIZATION FOR STANDARDIZATION
ITT	INVITATION TO TENDER
ITP	INSPECTION & TEST PLAN
LV	LOW VOLTAGE
MEP	MECHANICAL, ELECTRICAL & PLUMBING
NCR	NON-CONFORMANCE REPORT
NFPA	NATIONAL FIRE PROTECTION ASSOCIATION
O&M	OPERATION & MAINTENANCE
OEM	ORIGINAL EQUIPMENT MANUFACTURER
PPE	PERSONAL PROTECTIVE EQUIPMENT
PTW	PERMIT TO WORK
QA	QUALITY ASSURANCE
QC	QUALITY CONTROL
RAID	REDUNDANT ARRAY OF INDEPENDENT DISKS
RAMS	RISK ASSESSMENT & METHOD STATEMENT
SIMOPS	SIMULTANEOUS OPERATIONS
SOW	SCOPE OF WORK
TMP	TRAFFIC MANAGEMENT PLAN
UPS	UNINTERRUPTIBLE POWER SUPPLY
WBS	WORK BREAKDOWN STRUCTURE

# 1 PURPOSE

This Scope of Work (SOW) defines the technical, engineering, procurement, construction, testing, commissioning, statutory approval, and handover requirements for the execution of the GCT Infrastructure Project at GCT (GYSBI City).

The project comprises the integrated upgrade and permanent establishment of critical site infrastructure, including:

- Engineered stormwater drainage
- Permanent electrical grid integration
- Industrial-grade yard and perimeter lighting
- Integrated CCTV and security systems

The objective of the project is to eliminate existing operational deficiencies and establish a robust, compliant, and scalable infrastructure platform capable of supporting current site operations and future development, including the planned GYSBI HQ office and industrial estate expansion.

The Works shall be delivered under a single Turnkey Engineering, Procurement & Construction (EPC) contract on a fixed-price basis.

This SOW establishes:

- Scope boundaries
- Technical requirements
- Performance standards
- Responsibilities
- Deliverables
- Governance controls

Commercial terms, payment structure, and contractual conditions are defined separately within the Invitation to Tender (ITT) and Contract documentation.

## 1.1 Strategic Intent

The GCT Site Readiness Project represents Phase 1 enabling infrastructure works forming part of GYSBI's longer-term development strategy for GCT.

Accordingly, all systems designed and installed under this SOW shall:

- Be permanent installations (temporary solutions are not acceptable)
- Incorporate provisions for future expansion
- Align with anticipated HQ and industrial estate development

The Contractor shall adopt a lifecycle-focused engineering approach prioritising durability, maintainability, and operational resilience in tropical climatic conditions typical of Guyana.

## 1.2 Design Life Requirements

All infrastructure delivered under this SOW shall meet the following minimum design life expectations:

ASSET CATEGORY	MINIMUM DESIGN LIFE
CIVIL & DRAINAGE INFRASTRUCTURE	20–25 YEARS
ELECTRICAL INFRASTRUCTURE (TRANSFORMERS, SWITCHGEAR, DISTRIBUTION)	20 YEARS
LIGHTING POLES & STRUCTURAL SUPPORTS	20 YEARS
LIGHTING LUMINAIRES	10–15 YEARS
CCTV INFRASTRUCTURE (CABLING, POLES, ENCLOSURES)	15–20 YEARS
CCTV HARDWARE (CAMERAS, SERVERS, STORAGE)	7–10 YEARS

The Contractor shall select materials and equipment consistent with these design life expectations and shall provide manufacturer warranties and technical documentation demonstrating compliance.

Short-term, low-cost, or temporary-grade materials are not acceptable.

## 1.3 Quality Expectations

GYSBI's intent is to deliver infrastructure of a standard suitable for continuous industrial operations. The Works shall not represent minimum-cost solutions but shall reflect long-term asset reliability, operational safety, and lifecycle value.

All materials, equipment, and installations shall:

- Be industrial-grade and suitable for heavy-duty use
- Be corrosion-resistant and appropriate for high-humidity environments
- Comply with applicable Guyana regulations and international standards
- Be selected with lifecycle cost considerations in mind

Where standards are not explicitly defined, the Contractor shall adopt best industry practice consistent with industrial ports, logistics hubs, and heavy construction environments.

## 1.4 Document Hierarchy

This Scope of Work shall be read in conjunction with the full Tender Package documentation, including:

- Invitation to Tender (ITT)
- Tender Clarifications Log
- Contractor Proposal / Submittal
- Applicable Laws, Codes & Standards
- Contract Agreement

In the event of conflict, the order of precedence shall be defined within the ITT.

## 1.5 Reference Documents

The following documents form part of the Tender Package and shall be read in conjunction with this Scope of Work. In the event of conflict, the order of precedence shall be defined in the Invitation to Tender (ITT).

REF.	DOCUMENT TITLE	DOCUMENT NUMBER	OWNER
<b>R-01</b>	INVITATION TO TENDER (ITT)	GY01-0013-CM-ITT-001-01	GYSBI
<b>R-02</b>	SCOPE OF WORK (SOW) - THIS DOCUMENT	GY01-0013-EN-SOW-001-01	GYSBI
<b>R-03</b>	TENDER CLARIFICATIONS LOG	GY01-0013-CM-LOG-001-01	GYSBI
<b>R-04</b>	CONTRACTOR PROPOSAL / SUBMITTAL FORM	GY01-0013-CM-SUB-001-01	GYSBI
<b>R-05</b>	TENDER EVALUATION CRITERIA & METHODOLOGY	GY01-0013-CM-EVA-001-01	GYSBI

## 2 PROJECT OVERVIEW

### 2.1 General Description

The GCT Site Readiness Project comprises the integrated upgrade and permanent installation of essential infrastructure systems at GCT (GYSBI City).

The Works are intended to:

- Eliminate operational constraints caused by inadequate drainage
- Replace temporary generator-dependent power arrangements with permanent grid-connected infrastructure
- Establish compliant, industrial-grade yard and perimeter lighting
- Implement a new integrated CCTV and site security system
- Construct a permanent controlled site entrance including security gate and gatehouse
- Implement structured traffic management and site speed control systems
- Enable future site development including planned HQ and industrial estate expansion

The project shall be executed as a single, coordinated turnkey EPC package to ensure technical integration, cost control, accountability, and long-term operational resilience.

All infrastructure systems shall be delivered as permanent installations and shall be engineered to accommodate future site expansion in accordance with the strategic intent defined in Section 1.

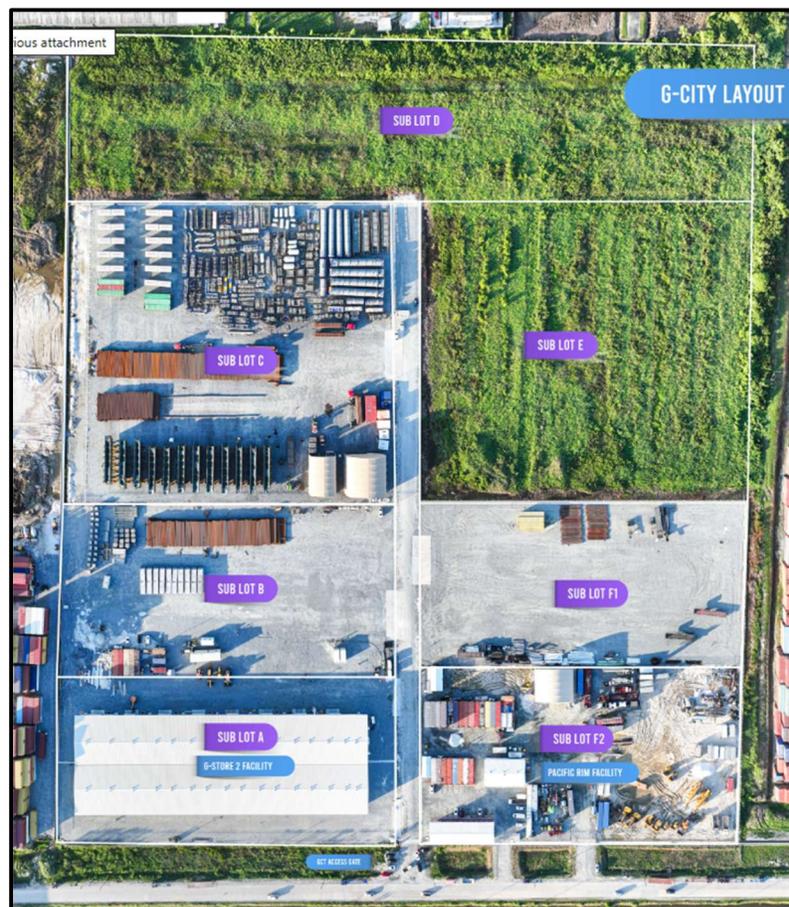
## 2.2 Site Location & Context

The Works shall be executed within the GCT (GYSBI City) site footprint. The site is:

- Actively operational
- Utilized by multiple third-party contractors
- Subject to heavy vehicle movement, including trucks and industrial equipment
- Exposed to tropical rainfall and high humidity conditions

The Contractor shall familiarize themselves with existing site conditions prior to submission of their proposal.

Minor SIMOPS (Simultaneous Operations) conditions exist; however, no major shutdowns are anticipated. The Contractor shall plan and sequence works to minimise disruption to ongoing operations.



**FIG 1: AERIAL OVERVIEW OF GCT & SUB PLOT LOCATIONS**

## 2.3 Existing Conditions

### 2.3.1 Drainage:

The site currently experiences standing water during periods of heavy rainfall, attributed to:

- Inadequate surface grading
- Poor gravel compaction
- Lack of engineered stormwater collection and discharge system

Natural drainage gullies and canals typical of Guyana exist to the south, in proximity to the site. The Contractor shall assess their suitability for controlled discharge, subject to regulatory approvals.

### 2.3.2 Electrical Power:

The site is presently powered via generator-based temporary arrangements.

Permanent integration into the national grid via Guyana Power and Light (GPL) is required.

Existing generators shall remain operational and be incorporated into an emergency backup configuration.

### 2.3.3 Lighting:

Existing lighting is insufficient for:

- Industrial operations
- Night-time heavy vehicle traffic
- Security monitoring

A complete engineered yard and perimeter lighting solution is required. As per Conceptual Lighting layout included in Appendix C of this document.

### **2.3.4 Security & Surveillance:**

No permanent integrated CCTV system currently exists.

A new industrial-grade commercial CCTV system shall be installed to provide full perimeter, yard, and gatehouse coverage.

The system shall be scalable to accommodate future expansion.

## **2.4 Project Execution Strategy**

The project shall be delivered under a single Turnkey EPC contract to:

- Ensure technical integration across all infrastructure systems
- Prevent scope fragmentation
- Maintain unified accountability
- Streamline statutory approvals
- Reduce interface risk

The Contractor shall assume full responsibility for design coordination between civil, electrical, lighting, and security disciplines.

## 2.5 Commercial Structure & Pricing Matrix

The GCT Site Readiness Project shall be tendered as a Turnkey Engineering, Procurement & Construction (EPC) contract.

GYSBI has intentionally not disclosed a project budget. Tenderers are required to submit competitive, fully compliant pricing structured in accordance with the Pricing Matrix defined below.

For the current phase of works, pricing shall be submitted for Sub Lots A, B, C and F1 only, as identified on the approved G-City Layout.

Sub Lots D and E are not included in the current execution scope. However, the Contractor shall incorporate appropriate future-proofing provisions, including duct banks, service corridors, and infrastructure stubs to facilitate future extension into Sub Lots D and E without major rework.

GYSBI reserves the right to award the Contract in whole or in part.

### 2.5.1 Mandatory Pricing Matrix

Tenderers shall submit:

- A. Total Lump Sum Price – Current Phase Combined  
AND
- B. Detailed Pricing Matrix by Sub Lot and Infrastructure Element

Pricing shall be structured as follows:

SUB LOT	DRAINAGE	POWER	LIGHTING	CCTV	CIVIL / GRADING IMPROVEMENTS	OTHER (SPECIFY)	SUB LOT TOTAL
Sub Lot A	Lump Sum	As Required	Lump Sum				
Sub Lot B	Lump Sum	As Required	Lump Sum				
Sub Lot C	Lump Sum	As Required	Lump Sum				
Sub Lot F1	Lump Sum	As Required	Lump Sum				

#### Note:

1. Each infrastructure element within each Sub Lot shall be separately priced.
2. The Sub Lot Total shall equal the sum of its respective infrastructure elements.
3. The Overall Contract Sum shall equal the total of all Sub Lot Totals.

### **2.5.2 Future-Proofing Requirements (Sub Lots D & E)**

Although Sub Lots D and E are not part of the current construction scope, the Contractor shall:

- Provide main duct banks sized for future extension
- Install capped service stubs at logical tie-in points
- Size primary power distribution for scalable expansion
- Design CCTV backbone architecture to allow seamless extension
- Ensure drainage routing does not obstruct future development
- Identify future tie-in points on drawings

Any required enabling works to avoid future disruption shall be included within the current pricing.

No future extension works shall require demolition of newly installed infrastructure.

### **2.5.3 Engineering & Project Management**

Engineering, detailed design, project management and supervision shall be:

- Proportionally distributed across Sub Lots  
OR
- Clearly identified as a separate summary line item (with allocation methodology explained)

Transparency of overhead allocation is mandatory.

### **2.5.4 Pricing Conditions**

Tenderers shall confirm pricing includes:

- Seasonal rainfall typical of Guyana
- Live operational interfaces
- Utility coordination
- Regulatory approvals
- Logistics and importation
- Testing and commissioning

Foreseeable site and weather conditions shall not constitute grounds for variation.

### **2.5.5 Award Flexibility**

GYSBI reserves the right to:

- Award selected Sub Lots only
- Award partial infrastructure elements within a Sub Lot
- Self-deliver selected elements
- Phase works geographically
- Negotiate cell-level pricing adjustments
- Submission of pricing does not constitute any commitment to award the full scope.

## 2.6 Project Schedule

The overall project duration is anticipated to be between 6 and 12 months from the date of Contract Award through to full commissioning and formal handover of the GCT Site Readiness works.

The Contractor shall develop and submit a detailed integrated project schedule for approval within 14 days of award. The schedule shall clearly identify:

- Engineering and design activities
- Procurement and long-lead items
- Civil and infrastructure works
- Electrical and lighting installation
- Drainage and grading works
- Security systems installation (CCTV, ANPR, gatehouse, traffic management systems)
- Testing and commissioning
- Final inspections and handover

The program shall:

- Be logic-linked and resource-loaded
- Identify critical path activities
- Include key milestones
- Clearly show commissioning and handover stages
- Allow for phased or sectional completion where beneficial

The Contractor shall provide monthly progress updates against the approved baseline schedule and highlight any risks to completion, along with proposed mitigation measures.

Early completion is encouraged where practicable, provided quality, safety, and technical compliance are not compromised.

## 2.7 Interfaces & Dependencies

The Works shall interface with:

- Ongoing site operations
- Existing generator infrastructure
- Natural drainage pathways and canals
- Utility provider requirements
- Existing graded areas (Plots A, B, C & F)
- Future expansion corridors

The Contractor shall:

- Identify all interfaces
- Develop an Interface Management Plan
- Maintain operational continuity
- Coordinate tie-ins and outages

Foreseeable interface conditions shall be deemed included in the pricing.

## 2.8 Future Development Considerations

This project forms Phase 1 of GYSBI's long-term GCT development strategy.

Accordingly, all infrastructure shall be designed and installed to allow seamless extension into future development zones, including Sub Lots D and E, without demolition or major rework.

### 3 DETAILED SCOPE OF WORK

The Contractor shall be fully responsible for the complete engineering, coordination, procurement, construction, integration, testing, commissioning, and handover of all infrastructure systems required to deliver the GCT Site Readiness Project.

The Works shall be executed as a fully integrated infrastructure upgrade and shall not be treated as independent or fragmented packages. All civil, electrical, lighting, and security systems shall be technically coordinated, spatially integrated, and sequenced to minimise disruption to ongoing operations.

All installations shall be permanent in nature and shall comply with the design life requirements defined in Section 1.2. Infrastructure shall be sized to accommodate a minimum 30% future growth capacity aligned with planned site expansion, including the anticipated HQ office and industrial estate development.

The scope comprises the following principal infrastructure elements:

- Engineered stormwater drainage system
- Permanent electrical grid integration with retained generator backup
- Industrial-grade yard and perimeter lighting
- Integrated CCTV and security monitoring system
- Permanent site access control and traffic management infrastructure

The Contractor shall adopt a lifecycle-driven engineering approach prioritising durability, maintainability, regulatory compliance, and operational reliability under tropical environmental conditions typical of Guyana.

## 3.1 GCT SOUTH DRAINAGE SOLUTION

The drainage works form a critical component of the Site Readiness Project and are intended to eliminate standing water, improve storm resilience, and establish a permanent engineered stormwater management system capable of supporting both current operations and future site development.

### 3.1.1 Engineering Requirements

The Contractor shall undertake all necessary investigations and analysis required to develop a technically sound drainage solution. This shall include:

- Full topographic survey of affected site areas
- Identification and mapping of existing culverts and discharge routes
- Surface water runoff assessment
- Hydraulic modelling based on minimum 10-year and 25-year storm events

Natural drainage gullies and canals typical within Guyana may be utilised where technically suitable; however, discharge into such channels shall only occur following engineering validation and receipt of all required statutory approvals.

### 3.1.2 Design Requirements

The drainage system shall:

- Provide positive and continuous surface fall
- Eliminate persistent ponding under normal rainfall conditions
- Prevent erosion at discharge interfaces
- Accommodate anticipated increases in hardstanding area
- Be accessible for inspection and maintenance

The system shall be robust, durable, and maintainable using locally available equipment and skills.

Minimum design life: 20–25 years.

### **3.1.3 Construction Scope**

The Contractor shall provide all civil works necessary to implement the engineered drainage system. This may include:

- Yard regrading and reshaping
- Sub-base improvement and compaction correction
- Installation of reinforced concrete catch pits
- Underground stormwater piping network
- Reinforced concrete manholes
- Culverts at access crossings
- Outfall structures
- Erosion protection works
- Oil-water separation where required

Retention or attenuation basins shall only be included where hydraulic modelling demonstrates that controlled discharge cannot otherwise be achieved.

### **3.1.4 Performance Criteria**

Upon completion, the system shall:

- Demonstrate effective drainage during heavy rainfall events
- Prevent operational disruption due to surface water
- Maintain structural integrity under vehicle loading
- Pass functional flow testing prior to handover

## 3.2 PERMANENT POWER & UTILITY INFRASTRUCTURE

The electrical infrastructure upgrade shall replace the existing generator-dependent supply with a permanent, grid-connected solution while retaining generator capability for emergency backup.

Grid integration shall be coordinated with Guyana Power and Light (GPL).

### 3.2.1 Engineering Requirements

GYSBI has performed their own load assessment of existing facilities and will free issue this document to the contractor.

GYSBI has procured and will free issue a 1MW GPL approved transformer

The Contractor shall perform comprehensive electrical engineering analysis including:

- Grid connection application and technical submission
- Coordination with GPL for inspections and approvals
- Power supply to G-store 2, perimeter lighting, utility / security building and CCTV
- Duct bank infrastructure installed to all subplots

All required permits and approvals shall be secured by the Contractor.

### 3.2.2 Design Requirements

The electrical system shall:

- Provide stable and reliable supply
- Incorporate surge protection and grounding systems
- Include lightning protection
- Provide spare breaker capacity
- Include spare duct banks for future expansion – refer Conceptual Layout drawings included in Appendix C of this document
- Have minimum design life: 20 years.

### 3.2.3 Construction Scope

The Contractor shall design, supply (excluding the free-issued transformer), install, and commission:

- Transformer(s)
- HV/LV switchgear
- Main distribution boards
- GPL-compliant metering
- Underground duct banks
- Cable containment systems
- Earthing and grounding infrastructure
- Lightning protection system
- Independent sub plot power metering

### **3.2.4 Generator Integration**

Existing generators shall:

- Remain operational
- Be integrated via automatic transfer switch (ATS)
- Provide emergency supply capability
- Be configured to allow future synchronization if required

### **3.2.5 Performance Criteria**

The completed system shall:

- Achieve successful energisation by GPL
- Demonstrate stable voltage and load performance
- Seamlessly transfer between grid and generator supply
- Pass full commissioning and load testing

## 3.3 YARD & PERIMETER LIGHTING SYSTEM

The lighting installation shall provide safe and effective illumination for industrial operations, heavy vehicle movement, and site security.

### 3.3.1 Engineering Requirements

The Contractor shall undertake a full detailed lighting design, including:

- Lux level calculations
- Uniformity analysis
- Glare control assessment
- Pole spacing optimisation
- Mounting height determination
- Luminaire selection
- Load calculations
- Control system architecture

Conceptual layouts (see Appendix C) and preliminary calculations have been previously developed and will be made available for reference only. The Contractor shall take full ownership of the final engineering design and performance compliance.

The final design shall be signed off by a qualified electrical engineer.

### 3.3.2 Illumination Performance Requirements

The lighting system shall achieve, as a minimum:

- 30 lux average horizontal illuminance at yard and perimeter areas
- Enhanced lighting levels at:
  - Gatehouse and access control points
  - Pedestrian interaction zones
  - Loading / unloading areas
  - High-risk operational zones

Uniformity ratio (Average to Minimum) shall not exceed 3:1 unless otherwise approved.

Lighting design shall:

- Minimise glare to drivers and equipment operators
- Avoid light spill into neighbouring properties
- Avoid shadowing that could compromise CCTV performance

### 3.3.3 Technical Requirements

The system shall:

- Utilise industrial-grade LED luminaires
- Be rated minimum IP66
- Be corrosion resistant (coastal/tropical environment suitable)
- Incorporate surge protection
- Include zoned switching and automation
- Allow integration into central control (if required)
- Be designed to allow future expansion into Sub Lots D & E

All poles, brackets, fixings, and structural supports shall have:

- Minimum 20-year design life
- Hot-dip galvanised or equivalent corrosion protection
- Wind loading design suitable for local conditions

### 3.3.4 Maintenance & Reliability

The lighting system shall be designed to:

- Minimise maintenance access requirements
- Allow safe access for future maintenance
- Provide minimum 50,000-hour LED lifespan (L70 or better)
- Include accessible isolation points

### 3.3.5 Performance Criteria

The lighting system shall:

- Achieve specified lux levels
- Demonstrate uniform illumination
- Operate reliably under tropical environmental conditions
- Pass night-time verification testing prior to handover

## 3.4 INTEGRATED CCTV & SECURITY SYSTEM

The CCTV installation shall establish a comprehensive surveillance platform providing full perimeter and yard coverage, scalable for future expansion and aligned with long-term GCT development plans.

The system shall be designed as a permanent industrial-grade installation suitable for tropical environmental conditions and continuous 24-hour operation.

The Contractor shall be fully responsible for engineering, procurement, installation, integration, configuration, testing, and commissioning of the complete CCTV and security monitoring system.

### 3.4.1 Engineering Requirements

The Contractor shall develop a detailed security layout designed to eliminate blind spots and provide overlapping coverage across all critical operational areas including:

- Perimeter fencing and boundary lines
- Main entrance gate and gatehouse
- Internal yard areas
- High-value operational zones
- Critical electrical infrastructure

System architecture shall incorporate:

- Secure network design
- Cybersecurity considerations
- Redundancy where appropriate
- Scalable infrastructure allowing future expansion

A full camera placement layout and field-of-view study shall be submitted during the design phase.

### 3.4.2 Design Requirements

The system shall include, as a minimum:

- Fixed perimeter cameras
- PTZ (Pan-Tilt-Zoom) yard cameras
- Central recording server with RAID redundancy
- Minimum 30-day video storage capacity
- UPS-backed power supply
- Fiber optic backbone with spare capacity for expansion
- CCTV monitoring capability within the gatehouse

### **ANPR (Automatic Number Plate Recognition) – Desired Optional Feature**

ANPR capability shall be treated as a desired but optional feature, subject to available budget within the approved project cap.

The Contractor shall:

- Design the CCTV architecture to allow future ANPR integration
- Provide infrastructure readiness (power, data connectivity, mounting positions, server capacity allowance)
- Ensure no rework to civil or primary infrastructure would be required for future ANPR installation
- Submit ANPR as a separately priced optional item within the Tender

If ANPR is not awarded at this stage, the base CCTV system shall remain fully functional and compliant with all other performance requirements.

Design Life Requirements:

Minimum infrastructure design life: 15–20 years

Hardware refresh cycle: 7–10 years

#### **3.4.3 Construction Scope**

The Contractor shall provide:

- Camera poles and mounting structures
- Corrosion-resistant foundations and supports
- Fiber optic network installation
- Network switches and communications equipment
- Server racks and control room equipment
- Integration with lighting and electrical systems
- Configuration, calibration, and commissioning

All equipment shall be industrial-grade and suitable for high-humidity tropical conditions. Temporary or consumer-grade systems are not acceptable.

#### **3.4.4 Performance Criteria**

Upon completion, the system shall:

- Provide continuous perimeter coverage
- Deliver clear imagery in both daylight and night-time conditions
- Record and store footage for a minimum of 30 days
- Allow efficient incident retrieval and playback
- Integrate fully with access control and gate systems
- Demonstrate full operational functionality during commissioning

All systems shall be fully tested prior to handover and documented within the Commissioning Dossier.

## 3.5 SITE ACCESS CONTROL & TRAFFIC MANAGEMENT

The Site Access Control and Traffic Management works shall establish a controlled, secure, and professionally managed entrance to GCT (GYSBI City), ensuring safe vehicle movement, controlled personnel access, and compliance with operational HSSE requirements.

The system shall be designed as a permanent installation suitable for long-term industrial operations and future site expansion. All components shall be industrial-grade, durable, corrosion-resistant, and suitable for tropical environmental conditions.

The scope shall include the engineering, design, procurement, construction, installation, integration, testing, and commissioning of the complete access control and traffic management system.

### 3.5.1 Main Entrance Gate Infrastructure

A permanent and secure vehicular access gate system shall be constructed at the primary site entrance.

The gate system shall:

- Accommodate articulated heavy goods vehicles and abnormal loads
- Provide controlled entry and exit lanes (subject to available footprint)
- Incorporate heavy-duty sliding or swing security gates
- Include automatic barrier arms for vehicle control
- Allow emergency vehicle override functionality
- Be integrated with the CCTV and access control system
- Be illuminated for safe night-time operation

Civil works shall include all required foundations, reinforced concrete bases, ducting, and service routing necessary to support the installation.

Gate structures shall have a minimum 20-year design life.

### **3.5.2 Gatehouse (Security Office)**

A permanent or semi-permanent gatehouse facility shall be installed adjacent to the main entrance and shall function as the central access control point for the site.

The gatehouse shall include:

- Climate-controlled environment suitable for 24-hour operation
- Workstations for minimum two security personnel
- Visitor sign-in and access logging facilities
- CCTV monitoring station
- Network and communications infrastructure
- Power supply with UPS backup
- External covered waiting area for visitors and drivers (where practicable)
- The structure shall be robust, secure, and suitable for long-term industrial operation.
- The gatehouse is to be set back from the main road, allowing for multiple vehicles, to prevent traffic congestion on main road
- Washroom facilities to be included
- Kitchenette and lockers are to be offered by the contractor

The Contractor shall coordinate architectural, civil, electrical, ICT, and security systems integration within the gatehouse facility.

### **3.5.3 Access Control System**

An integrated access control system shall be installed to regulate and record all personnel and vehicle access to the site.

The system shall include:

- Electronic access control for authorized personnel
- Visitor management capability
- Vehicle entry authorization control
- Integration with CCTV recording system
- Data logging and audit trail capability
- Scalable architecture allowing future expansion

The Contractor shall ensure compatibility between access control hardware, CCTV systems, and gate barrier mechanisms.

Minimum infrastructure design life: 15–20 years.

Hardware refresh cycle: 7–10 years.

### 3.5.4 Internal Traffic Management & Speed Control

A structured traffic management system shall be implemented to ensure safe movement of vehicles and pedestrians within the operational site.

The internal site speed limit shall be set at 15 kmph.

The Contractor shall provide:

- Permanent 15 kmph speed limit signage at the site entrance
- Repeater signage at appropriate internal intervals
- Directional signage for deliveries, visitors, emergency assembly areas, and operational zones
- Stop signs at designated junctions
- Pedestrian crossing signage and road markings where required
- Industrial-grade road markings including directional arrows and lane delineation
- All signage shall be durable, reflective, and suitable for industrial yard conditions.

### 3.5.5 Speed Monitoring & Driver Awareness Systems

To support enforcement of site speed restrictions and enhance driver awareness, the Contractor shall install radar-based digital speed display screens at strategic locations.

At a minimum, the system shall include:

- A radar speed display unit at the main site entrance
- Additional internal display(s) subject to final traffic risk assessment
- Illuminated digital display visible in daylight and night conditions
- Electrical connection and protective mounting structure
- Integration with site power infrastructure

The system shall function as a driver awareness tool and shall not require external enforcement integration unless otherwise specified.

### 3.5.6 Performance Criteria

Upon completion, the Site Access Control and Traffic Management system shall:

- Provide controlled and monitored access to the site
- Prevent unauthorized entry
- Support safe vehicle movement under operational conditions
- Provide clear and enforceable 15 mph speed control
- Integrate fully with CCTV, lighting, and electrical infrastructure
- Demonstrate full operational functionality during commissioning

All systems shall be fully tested prior to handover and documented within the Commissioning Dossier.

### 3.6 INTEGRATION & COORDINATION REQUIREMENTS

The Contractor shall ensure full coordination between all infrastructure systems, including drainage works, electrical duct banks, lighting pole placement, CCTV routing, generator integration, gate infrastructure, gatehouse services, access control systems, and traffic management installations.

Coordination shall include, but not be limited to:

- Drainage trenching and electrical duct banks
- Lighting pole locations and drainage layout
- CCTV pole placement and underground services
- Generator infrastructure and grid connection equipment
- Gate foundations and underground service routing
- Gatehouse electrical, ICT, and security integration
- Speed display power supply and data routing
- Road signage placement relative to traffic flow and future expansion corridors

No infrastructure installation shall obstruct anticipated future building zones, service corridors, or expansion areas identified within the long-term development strategy.

All systems shall be delivered as an integrated, operational, and coordinated infrastructure platform.

## 4 IN-SCOPE WORK

The Contractor's scope under this SOW comprises the complete turnkey delivery of the GCT Site Readiness Project. The Contractor shall assume full responsibility for all activities necessary to design, engineer, procure, construct, integrate, test, commission, and hand over fully operational infrastructure systems in accordance with the requirements defined herein.

The Contractor's obligation extends to all works reasonably required to achieve a complete and functional installation, whether or not each individual item is explicitly detailed, provided that such works are consistent with the technical intent and performance requirements of this SOW.

Without limitation, the scope shall include the following principal obligations.

### 4.1 Design & Engineering

The Contractor shall develop and deliver complete engineering solutions for all civil, electrical, lighting, and security systems. This shall include preparation of concept design, detailed design, calculations, drawings, specifications, and coordination documents necessary to construct the Works.

Engineering activities shall include hydraulic modelling for drainage, electrical load studies and protection coordination, lighting design and lux level verification, CCTV system architecture design, structural design for poles, foundations and gatehouse, and integration planning between all disciplines.

All designs shall comply with applicable laws, regulations, and standards in force within Guyana, together with relevant international standards where appropriate.

### 4.2 Statutory Approvals & Utility Coordination

The Contractor shall be responsible for identifying, applying for, and obtaining all statutory approvals required for the execution and commissioning of the Works, with GYSBI being kept in copy for all correspondence.

This includes coordination with utility providers, regulatory authorities, and inspection bodies. Grid integration shall be coordinated and approved by Guyana Power and Light (GPL), and all required documentation, inspections, and energisation approvals shall be managed by the Contractor.

Where drainage discharge approvals or environmental permits are required, the Contractor shall prepare submissions and obtain formal approval prior to implementation.

### **4.3 Procurement**

The Contractor shall procure and supply all materials, equipment, and systems required to deliver the Works in full. Procurement activities shall include sourcing, quality verification, logistics, importation (where applicable), delivery, storage, and protection of materials until installation.

All procured equipment shall meet the design life and quality requirements defined in Section 1 and shall be industrial-grade, durable, and appropriate for tropical environmental conditions.

### **4.4 Construction & Installation**

The Contractor shall execute all construction and installation activities required to implement the approved designs. This shall include civil works, trenching, drainage installation, electrical infrastructure installation, lighting pole and luminaire installation, CCTV system installation, generator integration, cable installation and termination, reinstatement, and site restoration.

The Contractor shall sequence the Works to minimise disruption to ongoing site operations and shall coordinate activities to prevent conflict between drainage, electrical, and security infrastructure installations.

All installations shall be permanent, robust, and completed to a professional standard consistent with industrial infrastructure works.

### **4.5 Testing & Commissioning**

The Contractor shall perform all testing and commissioning activities necessary to demonstrate full compliance with performance requirements.

This shall include functional testing of drainage flow, electrical energisation and load testing, automatic transfer switch testing, lighting lux verification, CCTV coverage validation, and integrated system testing.

All systems shall be fully operational and verified prior to handover.

### **4.6 Documentation & Handover**

The Contractor shall provide complete project documentation at handover, including as-built drawings, operation and maintenance manuals, equipment data sheets, warranties, test certificates, asset registers, spare parts registers, and training records.

The Contractor shall provide training to GYSBI personnel sufficient to operate and maintain the installed systems.

A twelve (12) month Defects Liability Period shall apply to all Works.

## **4.7 Maintenance Spares**

The Contractor shall identify, procure, supply, and formally hand over a recommended set of maintenance spares sufficient to support twelve (12) months of operation following commissioning of the GCT Site.

The spares provision shall be based on manufacturer recommendations, equipment criticality, operating conditions, and lead times. At a minimum, this shall include critical electrical components, lighting equipment, CCTV/ANPR components, gate automation parts, and essential consumables.

A detailed spares register shall be provided identifying item description, OEM reference, quantity supplied, and storage requirements.

Refer to Appendix B for further details.

## 5 OUT-OF-SCOPE WORK

The following activities are expressly excluded from the Contractor's scope unless formally approved through the Change Control process defined elsewhere in this document.

This SOW does not include the construction of new HQ buildings or industrial estate vertical developments. It does not include long-term operation or maintenance of the infrastructure beyond the Defects Liability Period. Major off-site utility upgrades beyond the defined grid connection point are excluded unless specifically identified within the Contractor's approved proposal.

Any activity not expressly included within Section 4, or not reasonably inferable from the technical intent of this SOW, shall be deemed out-of-scope unless approved in writing through formal Change Control.

No verbal instruction, informal communication, or assumption shall constitute approval of additional scope.

## 6 WORK BREAKDOWN STRUCTURE (WBS)

The Contractor shall develop and maintain a Work Breakdown Structure (WBS) appropriate to the size and complexity of the Project. The WBS shall align with this Scope of Work and the approved project schedule and shall be used to support planning, coordination, progress reporting, and overall execution management.

The WBS should clearly identify major work elements and interfaces across civil, drainage, electrical, lighting, and security disciplines. The level of detail below Level 2 shall be at the Contractor's discretion and suitable for effective delivery of the Works.

As guidance, the Project may be structured broadly in line with the following Level 2 framework:

### Indicative Level 2 Structure:

WBS CODE	DESCRIPTION
1.0	Project Management & Coordination
2.0	Design & Engineering
3.0	Drainage Infrastructure Works
4.0	Electrical Infrastructure & Grid Integration
5.0	Lighting Installation
6.0	CCTV & Security Systems
7.0	Site Access & Traffic Infrastructure
8.0	Testing & Commissioning
9.0	Handover & Close-Out

The Contractor may further develop subordinate levels as required for execution and internal control, provided the overall scope defined within this SOW remains unchanged.

The WBS shall:

- Be consistent with the approved project schedule
- Support clear progress measurement
- Identify key interfaces between disciplines
- Reflect the integrated nature of the Works

Any significant restructuring that materially alters scope allocation or sequencing should be discussed and agreed during project execution to maintain alignment with the overall Project objectives.

## 7 DELIVERABLES

The Contractor shall prepare, submit, and obtain approval for all deliverables required to design, execute, test, commission, and hand over the Works in accordance with this Scope of Work.

Deliverables shall be sufficient to demonstrate full technical compliance, regulatory compliance, and operational readiness.

All submissions shall be prepared in a professional format suitable for formal project record and audit purposes.

### 7.1 Design & Engineering Deliverables

The Contractor shall provide all documentation necessary to demonstrate the technical adequacy and completeness of the design.

REF	DELIVERABLE	SUBMISSION STAGE	APPROVAL
D-01	CONCEPT DESIGN PACKAGE	EARLY DESIGN	GYSBI
D-02	DETAILED DRAINAGE DESIGN & CALCULATIONS	DESIGN PHASE	GYSBI
D-03	ELECTRICAL LOAD STUDY & PROTECTION STUDY	DESIGN PHASE	GYSBI
D-04	LIGHTING LUX STUDY & LAYOUT	DESIGN PHASE	GYSBI
D-05	CCTV LAYOUT & NETWORK ARCHITECTURE	DESIGN PHASE	GYSBI
D-06	CIVIL & STRUCTURAL CALCULATIONS	DESIGN PHASE	GYSBI
D-07	INTEGRATED SERVICES ROUTING DRAWINGS	DESIGN PHASE	GYSBI
D-08	ISSUED-FOR-CONSTRUCTION (IFC) DRAWINGS	PRE-CONSTRUCTION	GYSBI
D-09	GATE & ENTRANCE CIVIL LAYOUT DRAWINGS	DESIGN PHASE	GYSBI
D-10	GATEHOUSE GENERAL ARRANGEMENT (GA) DRAWINGS	DESIGN PHASE	GYSBI
D-11	ACCESS CONTROL SYSTEM ARCHITECTURE & SCHEMATICS	DESIGN PHASE	GYSBI
D-12	TRAFFIC MANAGEMENT & ROAD SIGNAGE LAYOUT	DESIGN PHASE	GYSBI
D-13	SPEED DISPLAY SYSTEM SPECIFICATION & LOCATION PLAN	DESIGN PHASE	GYSBI

### 7.2 Statutory & Regulatory Deliverables

The Contractor shall provide documentation evidencing compliance with applicable authorities and utility providers.

REF	DELIVERABLE	SUBMISSION STAGE	APPROVAL
R-01	GRID CONNECTION APPLICATION (GPL)	PRE-CONSTRUCTION	GPL / GYSBI
R-02	ENVIRONMENTAL / DRAINAGE DISCHARGE APPROVAL	PRE-CONSTRUCTION	AUTHORITY
R-03	ELECTRICAL INSTALLATION CERTIFICATION	PRE-COMMISSIONING	AUTHORITY
R-04	FIRE & SAFETY COMPLIANCE (IF APPLICABLE)	PRE-COMMISSIONING	AUTHORITY
R-05	ENTRANCE MODIFICATION / TRAFFIC AUTHORITY APPROVAL (IF REQUIRED)	PRE-CONSTRUCTION	AUTHORITY

### 7.3 Construction Planning Deliverables

The Contractor shall submit planning and execution documentation prior to commencement of works.

REF	DELIVERABLE	SUBMISSION STAGE	APPROVAL
C-01	CONSTRUCTION EXECUTION PLAN	PRE-CONSTRUCTION	GYSBI
C-02	DETAILED PROJECT SCHEDULE	PRE-CONSTRUCTION	GYSBI
C-03	METHOD STATEMENTS	PRIOR TO ACTIVITY	GYSBI
C-04	INSPECTION & TEST PLANS (ITPS)	PRIOR TO ACTIVITY	GYSBI
C-05	RISK REGISTER	ONGOING	GYSBI
C-06	TRAFFIC MANAGEMENT PLAN (TMP) – CONSTRUCTION PHASE	PRE-CONSTRUCTION	GYSBI
C-07	GATE INSTALLATION METHOD STATEMENT	PRIOR TO ACTIVITY	GYSBI

### 7.4 Testing & Commissioning Deliverables

The Contractor shall submit all testing documentation demonstrating compliance with performance criteria.

REF	DELIVERABLE	SUBMISSION STAGE	APPROVAL
T-01	DRAINAGE FLOW TEST REPORT	COMMISSIONING	GYSBI
T-02	ELECTRICAL ENERGISATION & LOAD TEST REPORT	COMMISSIONING	GYSBI
T-03	ATS & GENERATOR INTEGRATION TEST REPORT	COMMISSIONING	GYSBI
T-04	LIGHTING LUX VERIFICATION REPORT	COMMISSIONING	GYSBI
T-05	CCTV FUNCTIONAL TEST REPORT	COMMISSIONING	GYSBI
T-06	INTEGRATED SYSTEMS TEST REPORT	COMMISSIONING	GYSBI
T-07	GATE & BARRIER FUNCTIONAL TEST REPORT	COMMISSIONING	GYSBI
T-08	ACCESS CONTROL SYSTEM TEST REPORT	COMMISSIONING	GYSBI
T-09	SPEED DISPLAY CALIBRATION & FUNCTION TEST REPORT	COMMISSIONING	GYSBI
T-10	TRAFFIC SIGNAGE INSTALLATION INSPECTION RECORD	COMMISSIONING	GYSBI

## 7.5 Handover & Close-Out Deliverables

The Contractor shall provide a complete handover dossier prior to Final Acceptance.

REF	DELIVERABLE	SUBMISSION STAGE	APPROVAL
H-01	AS-BUILT DRAWINGS (ALL DISCIPLINES)	HANDOVER	GYSBI
H-02	OPERATION & MAINTENANCE MANUALS	HANDOVER	GYSBI
H-03	ASSET REGISTER	HANDOVER	GYSBI
H-04	WARRANTY CERTIFICATES	HANDOVER	GYSBI
H-05	SPARES REGISTER & SUPPLIED SPARES	HANDOVER	GYSBI
H-06	TRAINING RECORDS	HANDOVER	GYSBI
H-07	FINAL HANDOVER DOSSIER	COMPLETION	GYSBI
H-08	ACCESS CONTROL USER MANUAL & ADMIN GUIDE	HANDOVER	GYSBI
H-09	GATE & BARRIER O&M MANUAL	HANDOVER	GYSBI
H-10	TRAFFIC SIGNAGE & SPEED SYSTEM ASSET REGISTER	HANDOVER	GYSBI

## 8 SCOPE GOVERNANCE & CHANGE CONTROL

This Scope of Work, together with the referenced Tender Package documents, forms the approved technical scope baseline for the GCT Site Readiness Project.

The Contractor shall plan, execute, and deliver the Works strictly in accordance with this baseline. No deviation from the approved scope, specifications, or performance requirements shall be implemented without formal written approval.

### 8.1 Scope Governance

GYSBI shall exercise governance and oversight of the Works through its appointed Project Management function.

Governance activities shall include, but not be limited to:

- Review and approval of design submissions
- Review and approval of construction deliverables
- Monitoring of progress against schedule
- Verification of compliance with technical requirements
- Oversight of testing and commissioning activities
- Interface coordination with ongoing site operations

The Contractor shall provide full cooperation, access, and information to support governance activities, including access to design documents, calculations, schedules, procurement status, and risk registers.

Approval of submissions by GYSBI does not relieve the Contractor of responsibility for the adequacy, accuracy, or compliance of the design or execution of the Works.

### 8.2 Change Control

No change to the approved scope, design, specifications, materials, routing, performance criteria, or execution methodology shall be implemented without prior written approval from GYSBI.

All proposed changes shall be managed through a formal Change Control process, which shall include:

- Submission of a documented Change Request
- Clear description of the proposed change
- Technical justification
- Assessment of cost impact
- Assessment of schedule impact
- Assessment of operational impact
- Assessment of regulatory impact

No verbal instruction, informal communication, site discussion, or assumption shall constitute approval of a scope change.

Any work undertaken by the Contractor outside the approved scope baseline and without formal written approval shall be performed entirely at the Contractor's risk and cost.

### **8.3 Clarifications During Execution**

Where ambiguities arise in the interpretation of this SOW, the Contractor shall formally request clarification in writing.

No interpretation shall be made unilaterally by the Contractor where such interpretation may alter the scope, technical intent, or performance requirements defined in this document.

All clarifications shall be documented and recorded in the project correspondence register.

### **8.4 Design Responsibility**

The Contractor remains fully responsible for the completeness, coordination, and technical adequacy of all designs, calculations, and specifications prepared under this Contract.

Review or approval by GYSBI shall not transfer design responsibility to the Client.

## 9 ACCEPTANCE & HANDOVER

The Works shall be subject to formal inspection, testing, verification, and acceptance by GYSBI prior to Final Acceptance.

Completion of construction activities alone shall not constitute acceptance. The Works shall only be considered complete when all systems — including drainage, electrical infrastructure, lighting, CCTV, site access control, gatehouse systems, and traffic management installations — are fully operational, tested, documented, and formally accepted in writing.

### 9.1 Pre-Commissioning

Prior to commissioning, the Contractor shall:

- Complete all installation works across all disciplines
- Rectify all identified defects
- Submit required documentation and test procedures
- Ensure all systems are safe and ready for energisation and testing
- Confirm that access control, gate mechanisms, and speed display systems are mechanically and electrically ready for functional testing

No system shall be energised or commissioned without prior approval.

### 9.2 Testing & Commissioning Requirements

The Contractor shall perform all testing and commissioning activities necessary to demonstrate full compliance with this SOW.

As a minimum, the following shall be completed and documented:

- Drainage flow testing under simulated or actual rainfall conditions
- Electrical energisation and load testing
- Generator-to-grid transfer testing (ATS functionality)
- Lighting lux level verification across defined areas
- CCTV field-of-view verification and blind-spot validation
- CCTV recording and storage validation (minimum 30-day capacity)
- Gate mechanical operation testing (open/close cycles under load)
- Barrier arm operation and safety sensor validation
- Access control functionality testing (credential verification, logging, override capability)
- Speed display radar calibration and functional verification
- Inspection of traffic signage installation and visibility

- Integrated systems testing demonstrating coordination between power, CCTV, access control, and gate systems

All tests shall be witnessed by GYSBI where required.

Failure of any system to meet performance criteria shall require corrective action and re-testing at the Contractor's cost.

### **9.3 Documentation for Handover**

Final Acceptance shall not be granted until the Contractor has submitted and obtained approval for the complete Handover Dossier, including:

- Approved as-built drawings (all disciplines)
- Operation and Maintenance manuals
- Equipment data sheets
- Test and commissioning reports
- Warranty certificates
- Asset register (including access control and traffic systems)
- Approved spares register
- Training records
- Final updated risk register
- Access control administration manuals
- Gate and barrier O&M documentation

All documentation shall be complete, accurate, and consistent with the installed Works.

### **9.4 Training**

The Contractor shall provide training to designated GYSBI personnel sufficient to operate and maintain the installed systems safely and effectively.

Training shall include, as applicable:

- Electrical system overview and emergency response
- Generator transfer procedures
- Lighting control systems
- CCTV monitoring and system management
- Access control system administration
- Gate and barrier manual override procedures
- Speed display system overview and maintenance
- Traffic management controls and signage maintenance guidance

Training attendance records shall form part of the Handover Dossier.

## 9.5 Final Acceptance

Final Acceptance shall only be granted when:

- All Works have been completed in accordance with this SOW
- All testing and commissioning activities have been successfully completed
- All statutory approvals have been secured
- All documentation has been approved
- All defects and punch list items have been closed

Partial acceptance may be granted at GYSBI's discretion; however, such acceptance shall not relieve the Contractor of responsibility for completing the full scope of Works.

## 9.6 Defects Liability Period (DLP)

A twelve (12) month Defects Liability Period shall commence from the date of Final Acceptance.

During this period, the Contractor shall rectify, at its own cost, any defects arising from defective materials, workmanship, design, or system integration — including gate mechanisms, access control systems, and speed display equipment.

## 10 INTERFACES & DEPENDENCIES

The Contractor shall actively identify, manage, and coordinate all interfaces and dependencies necessary for the successful execution of the Works.

The GCT Site Readiness Project is being executed within an operational industrial environment. The Contractor shall plan and execute the Works in a manner that maintains site functionality, safety, and continuity of operations.

Failure to properly identify or manage interfaces shall not relieve the Contractor of responsibility for delays, rework, or additional cost.

### 10.1 Operational Interfaces (SIMOPS)

The site remains operational during execution of the Works. Third-party contractors, visitors, and heavy vehicles may be present on site at all times.

The Contractor shall:

- Coordinate access routes during gate installation works
- Maintain safe pedestrian and vehicle movement
- Implement temporary traffic management measures where required
- Minimise disruption to operational areas
- Ensure trenching and excavation works are secured and protected
- Maintain controlled access during gate and barrier installation
- Prevent unauthorized access during transition from temporary to permanent access control systems

Any temporary obstruction or restriction shall be planned and approved in advance.

### 10.2 Utility & Grid Interface

Grid integration shall be coordinated with Guyana Power and Light (GPL).

The Contractor shall:

- Manage all technical submissions
- Coordinate inspection timelines
- Align construction schedule with utility requirements
- Ensure compliance with GPL standards
- Ensure gatehouse and access control systems are properly integrated into permanent electrical supply

Delays caused by incomplete submissions or non-compliance shall be the responsibility of the Contractor.

### 10.3 Drainage & Environmental Interface

Where drainage discharge connects to natural gullies or canals, the Contractor shall:

- Confirm technical suitability
- Obtain all required regulatory approvals
- Ensure erosion protection and environmental compliance
- Prevent adverse impact on adjacent land or infrastructure

The Contractor shall also ensure that:

- Gate foundations and access road modifications do not obstruct surface drainage
- Road signage foundations do not interfere with underground drainage networks

Discharge arrangements shall not create downstream flooding or environmental risk.

### 10.4 Infrastructure Coordination Interface

The Contractor shall ensure coordination between all infrastructure systems, including:

- Drainage trenching and electrical duct banks
- Lighting pole locations and drainage layout
- CCTV pole placement and underground services
- Generator infrastructure and grid connection equipment
- Gate foundations and underground service routing
- Gatehouse electrical, ICT, and security integration
- Access control cabling and fibre backbone
- Speed display system power supply and protective routing
- Road signage placement relative to traffic flow and underground services

Service routing shall not obstruct planned HQ or industrial estate development areas.

### 10.5 Existing Infrastructure & Unknown Services

The Contractor shall verify the presence of any existing underground services prior to excavation.

Discovery of previously unidentified services shall be reported immediately. The Contractor shall implement safe isolation, protection, or diversion measures as required.

Particular care shall be taken during:

- Gate foundation excavation
- Roadway modifications
- Installation of signage bases
- Installation of speed display poles

Failure to conduct appropriate verification shall not constitute grounds for variation.

## 10.6 Future Development Considerations

This project forms Phase 1 of a longer-term development strategy.

Accordingly, the Contractor shall:

- Preserve future building footprints
- Maintain service corridors for expansion
- Provide spare electrical capacity
- Install scalable CCTV backbone infrastructure
- Allow for future expansion of access control systems
- Ensure gatehouse design does not obstruct future entrance reconfiguration
- Ensure drainage accommodates future hardstanding expansion

All installations shall support long-term site growth and scalability.

## 11 ROLES & RESPONSIBILITIES

Clear allocation of roles and responsibilities is essential to ensure effective delivery of the GCT Site Readiness Project. The Contractor shall be fully accountable for execution of the Works in accordance with this Scope of Work.

Nothing within this Section shall relieve the Contractor of overall responsibility for the performance, quality, and compliance of the Works.

### 11.1 Contractor Responsibilities

The Contractor shall have full responsibility for the planning, coordination, execution, and completion of the Works, including but not limited to the following:

- Provision of competent management, engineering, supervisory, and skilled personnel
- Preparation and coordination of all engineering designs and calculations
- Integration of civil, electrical, lighting, and CCTV disciplines
- Procurement of all materials and equipment
- Quality control of all installations
- Compliance with statutory and regulatory requirements
- Coordination with utility providers, including Guyana Power and Light (GPL)
- Implementation of safe systems of work
- Management of subcontractors and suppliers
- Preparation and submission of required deliverables
- Testing and commissioning of all systems
- Rectification of defects during the Defects Liability Period
- The contractor is to adhere to the GYSBI QHSSE handbook

The Contractor shall ensure that all personnel and subcontractors are suitably qualified and experienced for the tasks undertaken.

The Contractor remains fully responsible for the technical adequacy and integration of all designs and installations.

## 11.2 GYSBI Responsibilities

GYSBI shall provide project oversight and governance through its appointed Project Management function.

GYSBI responsibilities shall include:

- Review and approval of design submissions and deliverables
- Monitoring of progress against schedule
- Coordination with internal stakeholders
- Facilitation of site access where required
- Participation in testing and commissioning witnessing
- Issuance of formal approvals and acceptance documentation

Review or approval by GYSBI does not transfer design or execution responsibility to the Client.

## 11.3 Utility Provider Responsibilities

Utility providers, including Guyana Power and Light (GPL), shall be responsible for:

Review and approval of grid connection applications

Inspection of installations as required

Final energisation of grid connection

The Contractor shall coordinate all required submissions and inspections.

## 11.4 Subcontractor Management

Where the Contractor engages subcontractors, the Contractor shall remain fully responsible for their performance, compliance, and integration.

Subcontracting shall not dilute the Contractor's responsibility for delivering the Works in accordance with this SOW.

## 12 RISK

The Contractor shall identify, assess, and actively manage all risks associated with the execution of the Works. The Contractor shall maintain a live Project Risk Register from commencement through to Final Acceptance. The Risk Register shall identify risk description, potential impact, mitigation measures, responsible party, and status.

The existence of risks identified in this Section does not relieve the Contractor of responsibility for managing and mitigating such risks.

### 12.1 Site & Environmental Risks

The Works are being executed within a tropical climate subject to heavy rainfall and high humidity.

Risks may include:

- Adverse weather impacts during construction
- High groundwater levels
- Soil instability or poor compaction
- Erosion at drainage discharge points

The Contractor shall plan and sequence works to accommodate seasonal rainfall patterns and implement appropriate temporary protection measures.

### 12.2 Utility & Regulatory Risks

Grid integration and drainage discharge may require coordination with external authorities.

Risks may include:

- Delays in approval from Guyana Power and Light (GPL)
- Delays in environmental or discharge approvals
- Inspection scheduling delays

The Contractor shall ensure submissions are complete, technically compliant, and made in a timely manner to minimise such risks.

## 12.3 Operational & Interface Risks

The site remains operational during execution.

Risks may include:

- Conflict with heavy vehicle movements
- Restricted access to work zones
- Interference with existing temporary generator systems
- Discovery of undocumented underground services

The Contractor shall coordinate closely with GYSBI to mitigate operational disruption.

## 12.4 Technical & Integration Risks

The integrated nature of the Works introduces coordination risks, including:

- Clash between drainage and electrical trenching
- Lighting pole positioning affecting drainage routes
- CCTV routing conflicts
- Generator integration complexities

The Contractor shall ensure full design coordination prior to construction and shall not rely on post-installation adjustments.

## 12.5 Procurement & Supply Chain Risks

Risks may include:

- Long lead times for transformers or switchgear
- Importation delays
- Equipment availability constraints

The Contractor shall plan procurement activities accordingly and shall not rely on expedited supply as a mitigation strategy.

## 12.6 Financial & Commercial Risks

The Works are to be delivered under a fixed-price contract.

The Contractor shall price the Works inclusive of all reasonably foreseeable risks associated with:

- Weather conditions
- Site conditions
- Regulatory processes
- Coordination requirements

Failure to account for such risks shall not constitute grounds for variation unless expressly approved through formal Change Control.

## 13 REPORTING

The Contractor shall provide structured and timely reporting to enable GYSBI to monitor progress, performance, compliance, and risk throughout the execution of the Works.

Reporting shall be accurate, transparent, and supported by verifiable data.

Failure to provide required reports may result in suspension of approvals or other corrective measures at GYSBI's discretion.

### 13.1 Weekly Progress Reporting

The Contractor shall submit a weekly progress report summarising:

- Activities completed during the reporting period
- Planned activities for the following period
- Percentage progress by WBS element
- Key risks and mitigation measures
- Safety observations and incidents (if any)
- Site photographs demonstrating progress

The report shall clearly identify any emerging issues that may affect schedule, coordination, or compliance.

### 13.2 Monthly Progress Reporting

A more detailed monthly report shall be submitted, including:

- Updated project schedule
- Progress curves
- Summary of engineering status
- Procurement status of long-lead items
- Regulatory approval status
- Risk register update

Testing and commissioning status (when applicable)

The monthly report shall include a narrative assessment of overall project health.

### 13.3 Schedule Management

The Contractor shall maintain an updated project schedule reflecting:

- Approved baseline schedule
- Actual progress
- Forecast completion dates
- Critical path identification

Any deviation from the approved baseline schedule shall be formally identified and explained.

## 13.4 Meetings

The Contractor shall attend and participate in:

- Weekly coordination meetings (if required)
- Monthly progress review meetings
- Technical review meetings as necessary
- Commissioning and testing coordination meetings

Meeting minutes shall be issued and recorded as part of the project documentation.

## 13.5 Reporting Format

Reports shall be submitted in electronic format and structured consistently throughout the Project.

All reports shall reference the approved WBS structure to maintain consistency in progress measurement and scope alignment.

## 14 APPENDICES

The following appendices form part of this Scope of Work and define mandatory standards, submission requirements, and handover documentation formats applicable to the Works.

These appendices shall be read in conjunction with the main body of this SOW. In the event of conflict, the order of precedence defined within the Tender documentation shall apply.

APPENDIX	TITLE	PURPOSE
A	Applicable Laws, Codes & Standards	Defines mandatory regulatory and technical standards applicable to the Works
B	Operational & Maintenance Spares Register	Defines format and requirements for spares to be supplied at handover
C	Concept Layouts & Reference Drawings	Provides conceptual site layouts to define scope intent and spatial coordination requirements

**Note:** The conceptual drawings and layouts contained within Appendix C are historic documents developed by GYSBI PM over a number of years. The project has been on hold for a period of time and, as such, these drawings should not be considered current, complete, or fully verified.

They are provided for information only and are intended to assist the Contractor in developing and defining their own detailed design and scope of work.

Electronic copies can be made available upon request.

## APPENDIX A – APPLICABLE LAWS, CODES & STANDARDS

The Contractor shall comply with all applicable laws, regulations, codes, and standards in force in Guyana at the time of execution.

Where multiple standards apply, the more stringent requirement shall govern unless otherwise approved in writing.

REF	LAW / CODE / STANDARD	APPLICATION
A-01	National Building Codes (Guyana)	Civil & Structural Works
A-02	Environmental Protection Regulations	Drainage & Discharge Compliance
A-03	Occupational Safety & Health Regulations	Site Safety & Worker Protection
A-04	Fire Safety Regulations	Electrical & Infrastructure Compliance
A-05	IEC Standards	Electrical Installations
A-06	NFPA Standards (as applicable)	Electrical & Fire Systems
A-07	ISO 9001	Quality Management
A-08	ISO 14001	Environmental Management
A-09	ISO 45001	Occupational Health & Safety
A-10	Utility Provider Standards	Grid Connection Requirements

The Contractor shall identify any additional specialist standards required and submit them for approval prior to implementation.

## APPENDIX B – OPERATIONAL & MAINTENANCE SPARES REGISTER

The Contractor shall identify, supply, and hand over all operational and general maintenance spares required to support the installed systems.

A minimum of twelve (12) months of operational spares shall be provided from the date of Final Acceptance.

The Contractor remains responsible for completeness and adequacy of the spares, whether or not individually identified within this SOW.

### Register Format

The Contractor shall submit the Spares Register in the following format:

ITEM	SYSTEM / EQUIPMENT	MANUFACTURER	MODEL	SPARE DESCRIPTION	OEM PART NO.	QTY	TYPE (Operational / Maintenance)	COVERAGE (Months)	REMARKS

All spares shall be OEM-approved and compatible with installed equipment.

Final Acceptance shall not be granted until all approved spares have been delivered, verified, and accepted.

## **APPENDIX C – CONCEPT LAYOUTS & REFERENCE DRAWINGS**

Appendix C contains conceptual layouts and reference drawings issued to define the intended spatial arrangement, routing philosophy, and integration intent of the GCT Site Readiness Project.



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READINESS REF PAC

Note: A copy of the Information Pack will be uploaded to the tendering platform for Contractors to download and review.