FEDERAL GOVERNMENT OF SOMALIA

Ministry of Health and Human Services (MoH)

Improving Health Care Services in Somalia Project (Damal Caafimaad) (P178876)

Environmental and Social Management Plan (ESMP)

Galgadug Regional Hospital: Rehabilitation Works
Galmudug State

Amended 20 November 2025

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LIST OF ACRONYMS AND ABBREVIATIONS

CoC	Code of Conduct
E&S	Environmental & Social
EHSG	Environmental, Health and Safety Guidelines
ESF	Environmental and Social Framework
ESMF	Environmental and Social Management Framework
ESMP	Environmental and Social Management Plan
ESS	Environmental and Social Standard
FGS	Federal Government of Somalia
FMS	Federal Member State
GBV	Gender-Based Violence
GIIP	Good International Industry Practices
GRM	Grievance Redress Mechanisms
IDP	Internally Displaced Person
LMP	Labor Management Procedures
MDR-TB	Multi-drug-resistant TB
OHS	Occupational Health and Safety Standards
PCIU	Project Coordination and Implementation Unit
PPE	Personal Protective Equipment
PSEA	Prevention of Sexual Exploitation and Abuse
SEA	Sexual Exploitation and Abuse
SEP	Stakeholder Engagement Plan
SH	Sexual Harassment
SMP	Security Management Plan
UNOPS	United Nations Office for Project Services
WB	The World Bank
WCBA	Women of Childbearing Age

Executive Summary

The Improving Healthcare Services in Somalia Project (Damal Caafimaad) has been implemented since May 2021 and is planned to end in December 2026. Its Project Development Objective (PDO) is to 'improve the coverage of essential health and nutrition service in project areas and strengthen stewardship capacity of Ministries of Health'. The project seeks to scale up high-impact health services across the population in project target regions and develop the Federal And State Ministry of Health services across the population in project target regions and develop the Federal and State Ministry of Health capacities to act as stewards of the health sector, effectively governing and building core functions that will be able the Government to lead and manage the sector.

One of the health facilities slated to benefit from this activity is the Galgadug Regional Hospital[1]. The hospital currently has 60 beds, and receives patients from Galgadug and Mudug regions. It offers general medicine, surgery, emergency, obstetrics and gynaecology, and maternity services. Located in the Southwestern part of Dhuusamareeb town, its compound covers over 12,600 square metres of land and can be accessed by road transportation, as it is located by the side of the main road.

Galgadud Regional Hospital faces a number of challenges, including the age of the buildings, the utilization of temporary structures for critical service delivery, old medical equipment and a critical shortage of equipment. The proposed rehabilitation works include the demolition of some buildings and the construction of a main building of the general hospital as well as service buildings. The flowing key functions are included in the design of the new General Hospital: Emergency Unit; Inpatient wards for male and female; Operations Theater; Intensive Care Unit (ICU); Laboratory; Pharmacy; Service buildings including kitchen, medical laundry, power house, medical plant, morgue, waste management block, incinerator, guard rooms etc.).

The proposed rehabilitation of the Galgdug Regional Hospital was originally planned under the Somalia COVID-19 Emergency Vaccination Project (P176956), which is a World Bank-funded initiative designed to support the Government of Somalia in addressing COVID-19 through effective vaccine deployment. However, the Project is currently closing, and the planned rehabilitation is shifted to the Improving Healthcare Services in Somalia Project (Damal Caafimaad). The government, through the Ministry of Health, has, with the support of the United Nations Office for Project Services (UNOPS) opted to invest in the refurbishment of health facilities. With UNOPS technical backstopping, the sub-project will enhance health facilities.

To identify, manage, and mitigate the environmental and social risks in the demolition and construction phase, the project team has prepared this ESMP. In consultation with the local health authorities, UNOPS has designed the rehabilitation works.

There are significant positive impacts that are expected from the demolition of parts of the

Hospital and the construction of new parts. The primary beneficiaries are the surrounding populations that use the Hospital, stemming from Galgadug and Mudug regions. Adverse risks and impacts are mainly associated with the demolition and construction works and include risks related to occupational health and safety (OHS) of workers, such as increased level of dust, noise and vibration from moving of vehicles and machinery. Furthermore, community health and safety risk, risks associated with labor rights and management, e.g. child labor and/or forced labor and sexual exploitation and abuse – sexual harassment due to increase in labor related population in the project site, have been identified.

Environmental concerns during the demolition and construction works include dust and air pollution, as the dismantling of structures generates a significant amount of airborne particulate matter. This dust can affect air quality in the surrounding area, impacting patients, nearby residents, and the workforce. To manage this, dust suppression techniques will be employed, such as regularly spraying water over debris and work areas, which helps reduce dust dispersion. Additionally, barriers will be installed around the demolition site to contain particles, while all workers will be provided with appropriate PPE, including masks and respirators, to protect them from inhaling harmful particulates.

Noise and vibrations from demolition and construction activities present another risk, especially given the proximity of patients and local residents who may be disturbed by the constant sounds of heavy machinery. To mitigate this, all works will be restricted to daytime hours to minimize disruption during resting periods. Noise-dampening equipment will be used when possible, and communities nearby will be informed and consulted about the nature, duration, and timing of demolition-related noise. Workers will also be provided with ear protection, and a buffer zone will be established around the site to shield the community from the brunt of the noise.

Occupational health and safety (OHS) risks are a top priority, as demolition and construction tasks inherently expose workers to hazards such as falling debris, heavy machinery, and potential exposure to harmful materials. To address these risks, all workers will undergo safety training covering work protocols and emergency response procedures. Workers will be supplied with essential PPE, including hard hats, gloves, steel-toed boots, and safety harnesses for high-risk tasks. Clear access controls will be set up to prevent unauthorized entry into the work zones, and first-aid facilities will be available onsite for immediate response to any injuries.

Waste management during demolition and construction is another consideration, as especially the demolition phase will generate a substantial amount of solid waste. Without proper management, this waste could lead to environmental contamination. Where feasible, materials such as bricks and metals will be sorted for reuse or recycling, minimizing the overall waste footprint of the project.

Community health and safety is a priority, as residents, hospital visitors and staff could be

exposed to hazards such as falling debris, dust, and increased heavy vehicle traffic. To ensure public safety, fencing and prominent warning signs will be installed around the demolition area. Traffic control measures will be implemented, with designated routes established for demolition vehicles to avoid populated areas. Additionally, community engagement efforts will keep local residents informed of the work timeline, site hazards, and safety protocols in place.

Social impacts, include potential disruptions to hospital functions and community inconvenience due to noise and dust, child labour, Sexual Exploitation and Abuse / Sexual Harassment among others. The Project's Stakeholder Engagement Plan (SEP) will be adopted and implemented in the context of the site to keep the community involved and informed about the interventions. To facilitate responsive communication, UNOPS, in addition to the already available Project GRM, will also put in place a site-specific grievance redress mechanism (GRM) for the workers, residents and users of the health facility to voice concerns or complaints and receive timely responses. Communicating the benefits of the project and expected timelines will help address community concerns and feedback and foster positive perceptions of the development.

Following the detailed E&S screening of the proposed sub-project, as per the process described in the previous project's approved ESMF[1], the sub-project was classified as 'Moderate Risk', as per the levels defined in the ESMF. The project team agreed that an Environmental and Social Management Plan (ESMP) would best guide the risk management for the sub-project.

This Environmental and Social Management Plan (ESMP) specifies the means through which the adverse environmental and social risks and impacts of the Project associated with the Rehabilitation activities are either avoided or mitigated. It identifies, characterizes and manages the potential risks and impacts. The ESMP lists the project-specific risks and impacts and mitigation measures, lays out institutional arrangements for implementing and monitoring the risk mitigation measures and proposes monitoring indicators for measurement and monitoring of E&S performance. It shows what must be done, by whom, when, and to what standard; and also shows who will monitor its implementation and when and what the budget implications for mitigation measures and monitoring activities are. It further includes a description of the Project Grievance Redress Mechanism (GRM), which needs to be applied during the construction period, and reiterates stakeholder consultations that have been conducted in the lead up to the project design.

[1] Ministry of Health, Environmental and Social Management Framework, Somalia COVID-19 Emergency Vaccination Project (P176956), March 2022, p.103

1. Introduction

1.1 Project Background

The overall Project will support the delivery of a package of health services to beneficiaries, which includes procurement of health commodities (including medicines), procurement of key equipment including provision of solar power generation and green cooling equipment, and development of policies and mechanisms that would regulate safer disposal of obsolete cold chain equipment, as well as developing capacity of the regional level to manage health service delivery including support for HMIS, and supportive supervision.

In addition, the Damal Caafimaad project aims to respond to the institutional, operational, and technical capacity needs in Somalia's Ministries of Health (MoHs). At the request of the Federal Ministry of Health (FMoH), this project will strengthen the FMoH public financial management capacity (PFM) in fiduciary and contract management in the short, medium and long-term. Short-term activities will be supported during project preparation using WB executed financing, and longer-term activities will help build credible PFM systems in Somalia's MoHs in a consistent and phased approach. The FP initiative expands the EPHS with a dedicated family planning service line, offering short and long contraceptive methods free of charge through private providers.

The Project has four components as described in the sections below:

(i) Component 1: Expanding the coverage of high-impact health and nutrition services in select geographic areas.
(ii) Component 2: Strengthening Government's stewardship to enhance service delivery.
(iii) Component 3: Project Management and Knowledge Management and Learning.
(iv) Component 4: Contingency Emergency Response Component (CERC).
(v) Under AF, new interventions and activities are introduced under Components 1 and 3.

Galgadug Regional Hospital currently has 60 beds, and receives patients from Galgadug and Mudug regions. It offers general medicine, surgery, emergency, obstetrics and gynaecology, and maternity services. Located in the Southwestern part of Dhuusamareeb town, its compound covers over 12,600 square metres of land and can be accessed by road transportation, as it is located by the side of the main road.

Galgadud Regional Hospital faces a number of challenges, including the age of the buildings, the utilization of temporary structures for critical service delivery, old medical equipment and a critical shortage of equipment. The proposed rehabilitation works include the demolition of some buildings and the construction of a main building of the general hospital as well as

service buildings. The flowing key functions are included in the design of the new General Hospital: Emergency Unit; Inpatient wards for male and female; Operations Theater; Intensive

Care Unit (ICU); Laboratory; Pharmacy; Service buildings including kitchen, medical laundry, power house, medical plant, morgue, waste management block, incinerator, guard rooms etc..).

The sub-project team has undertaken an E&S screening of the sub-project, as per process described in the Annex I-A (Environmental and Social Screening Template) of the previous Project Environmental and Social Management Framework (ESMF)[3]. The screening resulted in classifying the sub-project as 'moderate, as per the levels defined in the ESMF (p.105). It was decided that an ESMP would best instrument for the risk management for the sub-project.

1.2 Purpose of the ESMP

This ESMP lists the typical environmental and social (E&S) risks and impacts and associated mitigation measures that need to be considered at minimum in the context of the Rehabilitation of some of the old structures at Galgadud Regional Hospital . The purpose of the ESMP is to provide a consolidated summary of all the Environmental and Social (E&S) commitments relevant for the construction works, including Occupational Health & Safety (OHS). The measures focus on environmental aspects such as emissions, environmental contamination and social aspects, such as communication with local stakeholders and safety of workers and communities. The ESMP lists the sub-project-specific risks and impacts and mitigation measures, lays out the institutional arrangements of the implementation and monitoring of the risk mitigation measures, and proposes monitoring indicators for measurement and monitoring of E&S performance.

The objective of this ESMP is to provide management actions to mitigate adverse risks and impacts, in consistence with national framework and relevant WB Environmental and Social Standards (ESSs) and the IFC Environmental, Health and Safety Guidelines (EHSGs), for both general and healthcare facilities, as well as General International Industry Practices (GIIP), such as technical guidance by the World Health Organization (WHO).

[3] Ministry of Health, Environmental and Social Management Framework, Somalia COVID-19 Emergency Vaccination Project (P176956), March 2022, p.103

2. Policy and Legal Framework

A summary of the national policies, laws and the World Environment and Social Standards is highlighted below.

2. 1. National Framework

2.1.1. The Provisional Constitution of the Federal Republic of Somalia

Article 10 – Human Dignity: Human dignity is the basis for all human rights. It is inviolable and must be protected by all. The State power must not be exercised in a manner that violates human dignity.

Article 11 – Equality: All citizens, regardless of sex, religion, social or economic status, political opinion, clan, disability, occupation, birth or dialect shall have equal rights and duties before the law. The State must not discriminate against any person on the basis of age, race, color, tribe, ethnicity, culture, dialect, gender, birth, disability, religion, political opinion, occupation, or wealth. Thus, all laws, or political and administrative actions that are designed to achieve full equality for individuals or groups who are disadvantaged, or have suffered from discrimination in the past, shall be deemed to be not discriminatory.

Article 24 – Labor Relations: Every person has the right to fair labor relations. All workers, particularly women, have a special right of protection from sexual abuse, segregation and discrimination in the workplace. And, every labor law and practice shall comply with gender equality in the workplace.

Article 31 – Language and Culture: The state shall promote the positive traditions and cultural practices, whilst striving to eliminate customs and emerging practices, which negatively impact the unity, civilization and wellbeing of the Somali society. And, the state shall promote the cultural practices and local dialects of minorities.

Article 32 – Right of Access to Information: Every person has the right of access to information held by the state, and the right of access to any information that is held by another person which is required for the exercise or protection of any other just right.

Article 111J – The Office of the Ombudsman: The office is protected against interference from any other person or entity. As such, independence, integrity and effective service delivery are also maintained. The Ombudsman shall: (i) Investigate complaints against government workers regarding: allegations/ outright violations concerning basic rights and freedom, abuse of power, unfair behavior, mercilessness, lack of clemency, indiscipline or disrespect, corruptive act, illegal behavior, or those that

could lead to mischief or injustice; (ii) Investigate complaints in relation to the activities of the Public Service Commission and other administrative institutions of the government, including defense and police forces that could lead to unequal services, unfair recruitment, or administration; (iii) Take appropriate steps to rectify or change items mentioned in earlier clauses through a fair, and appropriate process of consultations and sacrifices among the people concerned; (iv) Report on the complaints and issues raised and submit to the head of the offender; (v) Forward cases to the Attorney General and bring them before a court, as appropriate.

Article 45 (—Environment‖) states that the government shall give priority to the protection, conservation, and preservation of the environment against anything that may cause harm to natural biodiversity and the ecosystem. Furthermore, all people have a duty to safeguards and enhance the environment and participate in the development, execution, management, conservation and protection of the natural resources and the environment. The FGS and the governments of the FMS affected by environmental damage shall take urgent measures to clean up hazardous waste dumped on the land or in the waters of the FGS; take necessary measures to reverse desertification, deforestation and environmental degradation, and to conserve the environment and prevent activities that damage the natural resources and the environment of the nation, among other measures.

Article 115 (—Civil service‖) outlines civil service values and protection of their rights.

2.1.2 Relevant National Policies

Somalia's National Environmental Policy was approved by Cabinet, on February 13, 2020 the stated goal of environmental policy is to improve the health and quality of life of the Somali people. The Federal Government has drafted, or is in the process of drafting, the following policy, legal and regulatory frameworks: National Environmental Protection and Management Act 2024; Draft National Environmental and Social Impact Assessment Regulations; Draft National Ozone Layer Protection Regulation; Draft National Forest Management Policy; and Draft National Charcoal Policy. All of these have some relevance, in one way or another, for the Somalia COVID-19 Additional Financing Project.

Somalia National Gender Policy (2016) includes strategies to eradicate harmful traditional practices such as female genital mutilation/cutting (FGM/C) and child marriage and to improve services for the management of GBV/SEAH cases.

2.1.3 Environmental Protection and Management Act, 2024

The act guarantees the right to a clean, safe and healthy environment, provides requirements for waste management including hazardous wastes. The act requires the application of the polluter pay and precautionary principle in environment

management. The Galgadug Hospital Rehabilitation project is required to adhere to all the relevant requirements prescribed by the act.

2.1.4 Environmental and Social Impact Assessment and Audit Regulations (ESIA) 2024

Part III, regulations 13, 16 and 17, guides public participation, collection and incorporation of views from the general public.

The project's approved ESMF[4] lists applicable local laws and regulations including corrective measures to overcome gaps and responsibilities (*please see ESMF for more details*). Given that the project is financed by the World Bank, the environmental and social risks likely to be encountered during the sub-projects implementation will be managed using the Somalia legislation and World Bank's Environmental and Social Framework (ESF) and in particular the five Environmental and Social Standards (ESS) that apply to the project and which are as follows:

ESS1 – Assessment and Management of Environmental and Social Risks and Impacts: This standard is fundamental for all project activities, requiring, where necessary, ESMPs to manage potential risks. For the Galgadug Regional Hospital demolition, ESS1 necessitates an ESMP specifically addressing issues like dust, waste management, and community health and safety during demolition and construction.

ESS2 – Labour and Working Conditions: This standard ensures safe and fair labour practices, including working conditions, worker health and safety, and grievance redress mechanisms for workers. The demolition and construction work at the Hospital require strict adherence to ESS2 to protect workers from hazards like heavy equipment use.

ESS3 – Resource Efficiency and Pollution Prevention and Management: ESS3 is relevant to managing pollution and ensuring resource efficiency. For the Hospital site, it applies to managing dust, noise, and waste during demolition, ensuring minimal environmental impact, and applying best practices in resource usage during reconstruction.

ESS4 – Community Health and Safety: Focused on protecting the health and safety of nearby communities, ESS4 is critical for the Galgadug Regional Hospital Rehabilitation sub-project to mitigate potential risks from dust, debris, noise, and hazardous material exposure. Measures include fencing, safety signage, controlled traffic access, and communication with residents about safety precautions.

[4] https://moh.gov.so/so/wp-content/uploads/2023/10/COVID-19-Additional-Financing-ESMF-updated-29-May-clean.pdf

ESS8 – Cultural Heritage: ESS8 seeks to protect cultural heritage. This project may trigger chance finds during construction works.

ESS10 – Stakeholder Engagement and Information Disclosure: ESS10 emphasizes the need for ongoing community engagement and information dissemination. For the Galgadug Hospital project, this involves informing stakeholders about rehabilitation timelines, risks, and benefits and establishing a grievance mechanism to address concerns.

3. Biophysical and Socio-Economic Environment

This section provides a description of the baseline conditions in Dhuusamareeb District in Galmudug State, Somalia. It outlines the biophysical environment, as well as the socio-economic aspects of the sub-project area, which includes Galgadud Regional Hospital and its surrounding environment. The biophysical environment of the district is in principle similar to that generally in Somalia, with minor variations.

3.1 Proposed Sub-Project Location

Galmudug State is located in the middle part of Somalia. Galmudug is a relatively new Federal Member State (FMS), which was established in June 2015. Dhuusamareeb is the capital city of Galmudug State, located in central Somalia, approximately 500 km north of Mogadishu, and 210 km from the sea. The city serves as an important administrative, economic, and cultural centre for the region. Dhuusamareeb is bordered by the districts of Guri Ceel to the west and Ceel Buur to the east.

Figure 1 Location of Galmudug State and Dhuusamareeb town in Somalia

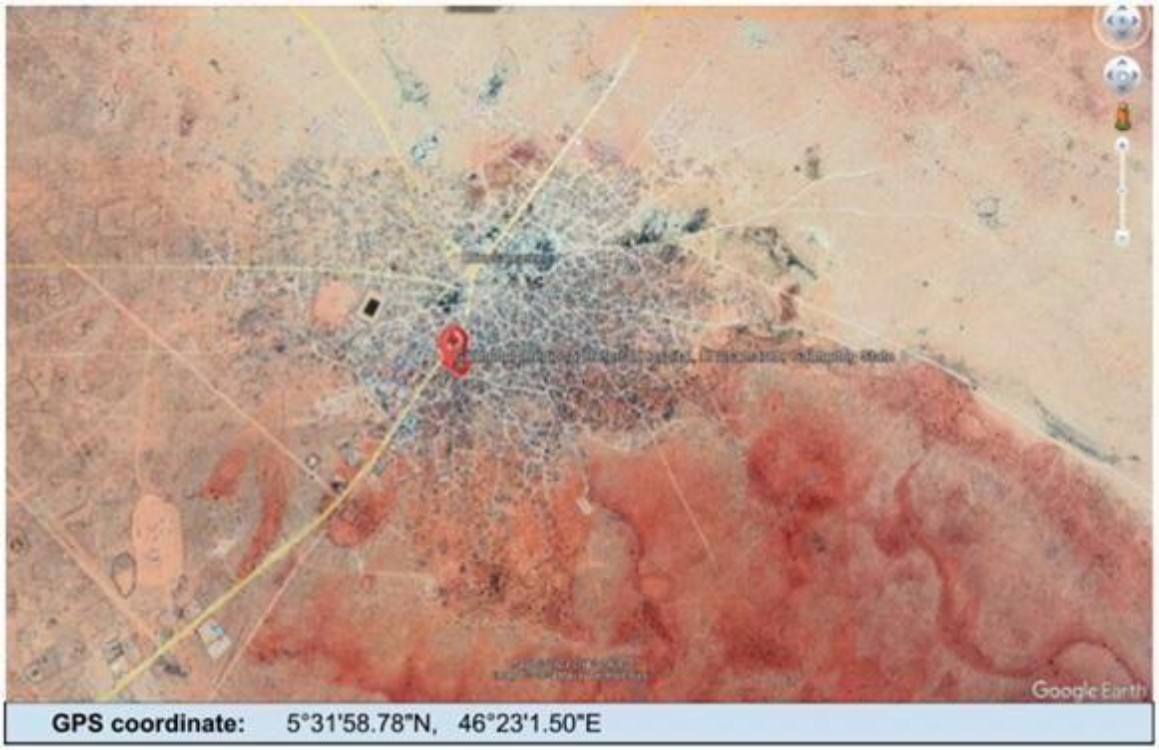

Figure 2 Aerial view of Dhusaamareeb town and hospital

Figure 3 Aerial View of hospital with area for new general hospital indicated in blue

The Hospital occupies app. 12,600 m2 of land, of which 7,000 m2 are allocated for the Primary General Hospital. They are allocated at the southeastern side, marked in blue in the above map. The plot has almost no slope. The adjacent southern street is the lowest point.

3.2 Physical Environment

Topography: Dhuusamareeb is generally flat, situated at an altitude of approximately 300-400 metres above sea level. The region is characterised by semi-arid plains with occasional rocky outcrops.

Geology and Soil: The geology of Somalia is built on more than 700-million-year-old igneous and metamorphic crystalline basement rock. It is covered in thick layers of sedimentary rock formed in the last 200 million years.[5] The project area is part of Somalia's central plateau, underlain by sedimentary rocks dating back to the Jurassic period. Soils consist mostly of sandy loam and clayey types, which are susceptible to erosion, especially during the infrequent but heavy rains. Soil degradation is a major concern due to deforestation, overgrazing, and unsustainable agricultural practices[6], all of which have impacted the local environment.

Climate: Dhuusamareeb experiences a hot, semi-arid climate[7] with annual temperatures ranging between 25°C and 35°C. The area has two rainy seasons: the *Gu* rains (April to June) and the *Deyr* rains (October to December). On average, the region receives about 300-400 mm of rainfall annually, which makes it prone to drought conditions. During the hottest months, March and April, temperatures can soar to as high as 40°C.

[5] Geology of Somalia, accessed at: Mogadishu topographic map, accessed at: https://en-gb.topographic-map.com/map-d3w1h/Mogadishu/?center=1.60067%2C49.87364&popup=1.98015%2C45.39276&zoom=15

[6] FAO Somalia: Climate and Environmental Baseline Report, 2021, https://openknowledge.fao.org/server/api/core/bitstreams/4778ae90-6fa9-404f-b2ad-6c7a5e7ee333/content

[7] Climate Promise Progress Report, UNDP, 2021, https://www.undp.org/sites/g/files/zskgke326/files/2021-05/undp-climate-promise-progress-report-april-2021.pdf

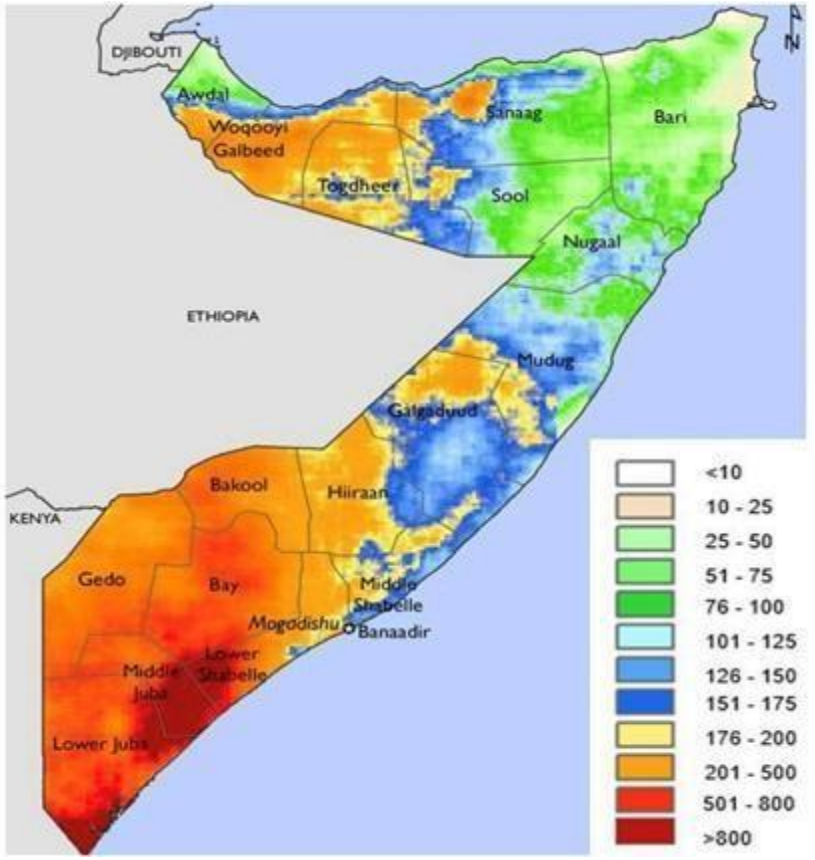

Figure 4 Annual Rainfall in Somalia with Galmudug State

DHUUSAMAREEB Weather by Month Averages

	January	February	March	April	May	June	July	August	September	October	November	December
Avg. Temperature °C	26.2 °C	26.9 °C	28.5 °C	28.9 °C	28.5 °C	28.5 °C	27.7 °C	28.1 °C	28.7 °C	27.4 °C	26.7 °C	26.7 °C
Min. Temperature °C	20.5 °C	20.7 °C	22.4 °C	23.9 °C	24. °C	23.5 °C	22.6 °C	22.5 °C	23. °C	23.1 °C	22.2 °C	21.5 °C
Max. Temperature °C	32.8 °C	33.9 °C	35.4 °C	34.5 °C	33.7 °C	33.9 °C	33.1 °C	34. °C	35. °C	32.6 °C	32. °C	32.8 °C
Precipitation / Rainfall mm	1.0	0.0	3.0	59.0	49.0	1.0	1.0	0.0	3.0	50.0	44.0	8.0
Humidity(%)	49 %	47 %	48 %	57 %	60 %	50 %	48 %	47 %	48 %	62 %	60 %	51 %
Rainy days (d)	0.0	0.0	0.0	6.0	6.0	0.0	0.0	0.0	1.0	7.0	5.0	1.0
avg. Sun hours (hours)	9.5	9.4	9.0	8.9	9.6	10.0	9.9	10.1	9.8	8.3	8.1	9.5

Figure 5 Average annual temperature in Dhuusamareeb

Water Resources and Hydrology: Dhuusamareeb lacks significant surface water bodies, unlike some other regions in Somalia. Groundwater, drawn from shallow wells and boreholes, serves as the primary water source[8] for both domestic use and agriculture. However, water scarcity is

[8] FAO Somalia Water Resources Management Report, 2007, https://www.faoswalim.org/resources/site_files/W-11%20Water%20Resources%20of%20Somalia_0.pdf

a persistent issue, particularly during prolonged dry seasons. Rainwater harvesting systems and other water-saving technologies may be essential for the hospital's sustainable operation. While the area is not prone to flooding, drought[9] and water shortages represent major risks to the community. The water supply for the hospital comes from a private water supply company.

Vegetation: The vegetation in Dhuusamareeb reflects typical semi-arid conditions, with scattered acacia trees, thorny bushes, and drought-tolerant grasses. Agricultural activities are limited to small-scale rainfed farming, with crops like millet, sorghum, and maize being grown. Within the city, urbanisation has reduced natural vegetation, but the project area remains surrounded by pastoral lands. Incorporating drought-tolerant species into any landscaping efforts around the hospital would help conserve water resources.

Fauna: Dhuusamareeb's fauna largely consists of domesticated animals, including camels, goats, sheep, and cattle, which are the mainstay of the local economy. Due to habitat degradation and human activity, wildlife is relatively scarce, though small antelope species like dik-dik, along with various bird species, may still be found in rural areas. The urban nature of the project site minimises the likelihood of significant wildlife presence, although care should be taken to avoid conflicts with local livestock.

3.3 Socio-economic Environment

Demographics: The population of Dhusaamareeb District is estimated around 150,000 people.[10] This population is predominantly composed of ethnic Somalis, many of whom are pastoralists or traders who settled in the area, mostly for business, work, and education purposes. As the capital of Galmudug State, Dhuusamareeb has experienced rapid growth in recent years, with a growing urban population and expanding infrastructure.

Education: The city has a number of primary and secondary schools, although access to education remains limited, especially for girls and rural residents. Dhuusamareeb is home to Galmudug University, which offers programs in public administration, health sciences, and business, among others. Despite these educational institutions, approximately 40 percent of the population remains without access to formal education[11] due to a lack of infrastructure and teaching resources.

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[9] Somalia Drought Monitoring Report, OCHA, 2020, https://www.unccd.int/sites/default/files/country_profile_documents/FINAL%20NATIONAL%20DROUGHT%20PLAN%20FOR%20SOMALIA%28final%29%2016%20Dec%202020%28%20PDF%20version%29.pdf

[10] City Population, Dhusamareeb, accessed at: https://www.citypopulation.de/en/somalia/admin/galgaduud/1901__dhuusamareeb/

11 Galmudug State Ministry of Education, "Education Sector Progress Report," 2021, https://moe.gov.so/wp-content/uploads/2022/07/Somalia-Education-Sector-Analysis-Jan-2022-1.pdf

Infrastructure: Infrastructure[12] development in Dhuusamareeb is ongoing but faces numerous challenges. Most roads are unpaved, limiting transportation and access during the rainy season. Access to clean water and sanitation services is also restricted, with many households relying on shallow wells or water trucking services. Electricity is mainly supplied through private generators, as the region lacks a reliable grid system. Improving the hospital's infrastructure, including water and energy supply systems, will be crucial to ensuring the long-term sustainability of the rehabilitation project.

Livelihoods and Employment: The economy of Dhuusamareeb is largely dependent on livestock herding, small-scale agriculture, and trade. The city's markets serve as a hub for pastoralists trading livestock and agricultural products. Additionally, remittances from the Somali diaspora play a significant role in supporting local livelihoods. Economic diversification is still limited, with few industries outside of trade and pastoralism. The majority of the population engages in livestock herding, particularly of camels, goats, and sheep, while others cultivate drought-resistant crops such as sorghum, maize, and millet. The local market in Dhuusamareeb serves as a hub for the trade of livestock and agricultural products. In recent years, the city has also seen the development of small-scale businesses and trade, contributing to employment opportunities. However, recurrent droughts and insecurity in the region continue to pose significant challenges to livelihoods[13], making food security an ongoing concern.

Health Services: Dhuusamareeb Hospital is the only major public health facility in the region, providing essential healthcare services[14] to an estimated catchment population of 516,036 people across Galmudug State. The hospital receives patients from nearby districts such as Guri El, El Buur, and Adado, as well as referrals from distant rural areas. Despite its critical role in healthcare delivery, the hospital faces infrastructure challenges, limited access to medical supplies, and understaffing, which affects service delivery. Only app. 38 percent of the population of Galmudug has access to basic health services.

Administration and Governance: Dhuusamareeb is governed by a district administration appointed by the Galmudug State government, which includes a District Administrator and a council of elders. The elders, representing various sub-clans, play a significant role in mediating conflicts and addressing local resource disputes, particularly over water and grazing land. This decentralised governance structure is instrumental in maintaining social cohesion and peace in the region, especially in the context of clan dynamics and local security issues.

Conflict Dynamics: Dhuusamareeb has historically experienced inter-clan conflicts, primarily between pastoralist and agricultural groups over access to water and grazing lands, exacerbated by recurring droughts. Al-Shabaab continues to control parts of the rural areas

12 Somalia Infrastructure Development Report, African Development Bank, 2020, https://www.afdb.org/sites/default/files/documents/projects-and-operations/multi-partner_somalia_infrastructure_fund_-_indepedent_review_removed.pdf

13 FAO, "Somalia Livelihoods and Food Security Report," 2022, https://openknowledge.fao.org/server/api/core/bitstreams/4561fb2e-a5dd-4f64-8f6f-0a07ed1f4037/content

14 Galmudug State Ministry of Health, "Health Sector Strategic Plan," 2022, https://moh.gov.so/so/wp-content/uploads/2022/11/Health-Sector-Strategy-Plan-III.pdf

surrounding the city. Local conflict resolution mechanisms, often led by the council of elders, are essential in maintaining peace and resolving disputes.

IDP Population: Dhuusamareeb hosts a significant population of internally displaced persons (IDPs), primarily due to ongoing conflict and environmental factors such as drought and flooding in neighbouring regions . According to UNHCR, an estimated 35,000 IDPs are living in and around Dhuusamareeb as of 2023, many of whom reside in overcrowded camps with limited access to basic services. These populations are particularly vulnerable to food insecurity, water shortages, and health risks, including cholera outbreaks[15].

Gender-Based Violence (GBV): GBV is a critical issue in Dhuusamareeb, particularly affecting women and girls in IDP camps who are vulnerable to sexual violence and exploitation. High levels of insecurity, limited access to justice, and deeply entrenched gender norms[16] make it difficult for victims to report GBV incidents, and perpetrators often go unpunished. Efforts to improve legal protection and provide psychosocial support to survivors are needed to address this issue.

Access to Water and Electricity: Water access in Dhuusamareeb is primarily reliant on shallow wells, boreholes, and rainwater harvesting systems. However, water scarcity remains a persistent issue, particularly during prolonged dry seasons. Many households rely on water trucking services, which increases the cost of water and reduces access for low-income families. Electricity is largely supplied by privately owned generators, with limited access to off-grid renewable energy sources[17]. The electrical system in the Hospital is mainly powered by grid supply from a private company and a set of diesel generators. There are further two units of PV system.

Solid Waste Disposal: Solid waste management in Dhuusamareeb is inadequate, with waste often being dumped in open areas or poorly managed landfills on the outskirts of the city. The lack of a formal waste disposal system poses serious public health risks, particularly in IDP camps, where unsanitary conditions have contributed to cholera outbreaks and other waterborne diseases. Improving waste management infrastructure will be essential for safeguarding public health and reducing the environmental impact of the hospital rehabilitation project. The waste management at the Hospital is not adequate. Solid domestic and some medical wastes are collected in open fields within the hospital compound. At the MDR-TB unit the medical waste is properly managed through an autoclave and incinerator.

15 United Nations Population Fund (UNFPA), "Somalia Population and Housing Census," 2022, https://somalia.unfpa.org/sites/default/files/pub-pdf/unfpa_humanitarian_preparedness_and_response_plan_-_17march2022.pdf

16 Somali Women's Care, "Gender-Based Violence in Somalia: Report," 2022, https://www.ecoi.net/en/file/local/2060580/2021_09_EASO_COI_Report_Somalia_Targeted_profiles.pdf

17 Ministry of Energy, "Somalia Renewable Energy Assessment," 2021, https://www.afdb.org/sites/default/files/hareact_project_esia_study-final-rev01.pdf

4. Project Description

4.1 The Galmudug Regional Referral Hospital

The Hospital (*5°31'57.86"N, 46° 23' 1.16"E*) is located in Dhuusamareeb City, and is accessible all year-round. Originally built in 1958, the land on which it is built is owned by the hospital.

The entire compound area exceeds 12,600 square metres and despite unprecedented heavy rain experienced in Dhuusamareeb town earlier in 2023, leading to significant flooding, displacing more than 50 percent of the resident population in villages like Dayax, Hodan, Waxarcade, and Waaberi, the hospital's village, Horseed, which is situated at a slightly higher elevation, remained unaffected by the floods. However, local improvement on drainage is required near the North-Western section of the compound.

Figure 6 Existing Site Structures and Structural Integrity Status

Several additional building units have been built since 1958, with the structures including a stone masonry wall with RC slab buildings and RC frame concrete block structures. Because of ageing, lack of adequate and timely maintenance, several structures currently exhibit severe structural defects, inclusive of extremely corroded reinforcement, cracks on structural

elements, and partially failed members. Critical service delivery units have buildings with excessive and uncontrolled cracking of the structural element that has resultantly weakened the adhesion of the reinforcement present in it, significantly reducing the tightness of concrete and deteriorating its durability and raising justifiable concerns on the structural durability itself. Visual inspection of the buildings and none-to-semi-destructive tests were undertaken, revealing major defects and damages. The site assessment indicated seven of the existing buildings have extremely deteriorated and are in dire need of replacement.

Galgadud Regional Hospital strives to provide the services of a referral hospital – especially given the vast catchment area around it - despite the various challenges which include the building structures which were not designed for a hospital, lack of permanent structures, the ageing and deterioration of several of the service units, and lack of medical equipment, as identified during the stakeholder engagement meetings in November 2023.

Figure 7 Aerial View of the Hospital Ground

Figure 8 Galgadug Regional Hospital

The hospital can be easily accessed by road, accessible all year round. The allocated site is accessible through direct access from two streets, where the main street is a divert from the adjacent major 'Siinaay Road'. The land is owned by the hospital and all the intervention under the COVID-19 Project will be confined to the existing hospital and its premises. Therefore, there will be no impact on land acquisition and involuntary resettlement. The site is secured and has a perimeter wall that identifies the land boundaries. The design allows for new perimeter walls equipped with gates for both pedestrians and vehicles, controlled by guard from guard rooms.

The hospital receives patients from the Galgaduud region, as well as from the nearby Mudug region. It offers general medicine, surgery, emergency, obstetrics and gynaecology, and maternity services. Located in the southwestern part of Dhuusamareeb City, its' compound covers over 12,600 square metres of land and can be accessed by road transportation, seeing as it's located by the side of the main road. The catchment population for the hospital is estimated to be just north of 250,000 people. The range of medical services currently within Dhuusamareeb Hospital is highlighted in the table below:

Table 1 Medical Services and Building Blocks Currently within Galgadud Regional Hospital

Sl. No	Name of the Services
1	IPD (In-Patient Department)
2	Training and Meeting Area
3	Laboratory (Microbiology, PCR)
4	Store and Autoclave
5	Mortuary
6	Staff Accommodation
7	Kitchen
8	Staff room, Security
9	X-Ray, TB Room
10	Maternity Ward
11	Medical Examination Rooms – Emergency, Gyn & Obs, Paediatric, Surgical, etc
12	Central Pharmacy and Laboratory
13	Oxygen Plant
14	Admin building
15	Cold Chain
16	Generator Houses (3 No.)
17	Incinerator

The design team has estimated the following users per workshift:

Shift	From	To
Shift 1	8:00 AM	4:00 PM
Shift 2	4:00 PM	12:00 AM
Shift 3	12:00 AM	8:00 AM

User Category	Shift 1	Shift 2	Shift 3
Staff Doctors	8	4	2
Staff Nurses	14	10	8
Staff Operations	15	10	4
Inpatient Beds	30	30	30
ICU Beds	9	9	9
ER & Outpatient	80	55	20
Visitors\Companions	160	110	40
Totals	316	228	113

4.2. Proposed Facilities

The allocated site contains some buildings, most of which are recommended for demolition. A standardized design has been developed for the main building of the general hospital and the service buildings. The location for the new buildings in clearly indicated in blue in Figure 3 above. The design includes the meeting of all needs of women, girls, and persons with disabilities, as per UNOPS Gender Equality and Social Inclusion (GESI) Guidelines.

The flowing key functions are included in the design of the new General Hospital:

- Emergency Unit
- Inpatient wards for male and female
- Operations Theater
- Intensive Care Unit (ICU)
- Laboratory
- Pharmacy
- Service buildings including kitchen, medical laundry, power house, medical plant, morgue, waste management block, incinerator, guard rooms etc..)
- The building should be structurally designed to be qualified for vertical expansion up to two additional floors.
- Photovoltaic systems and medical equipment are excluded from the design.

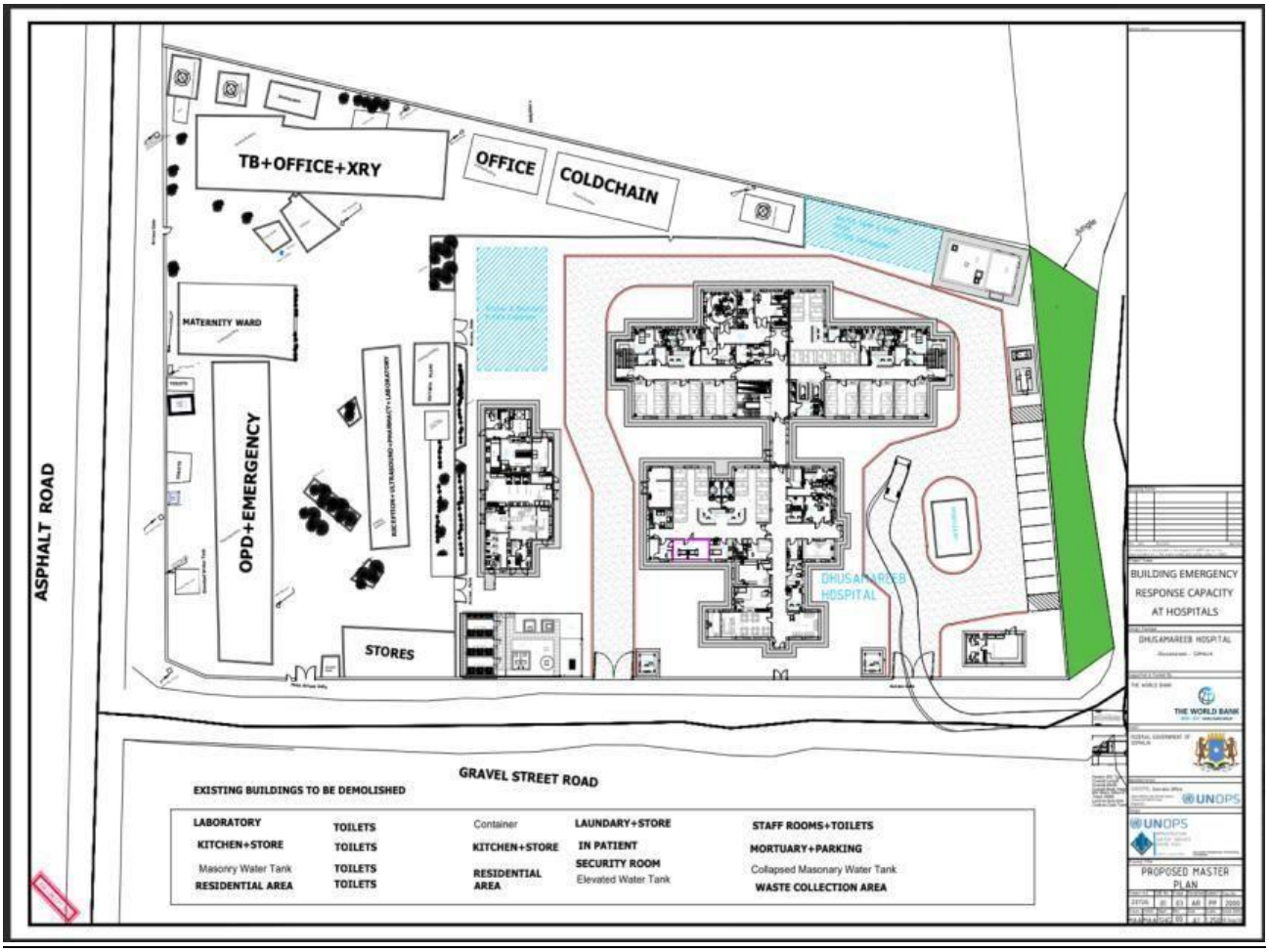

Figure 9 Proposed Master Plan for the hospital

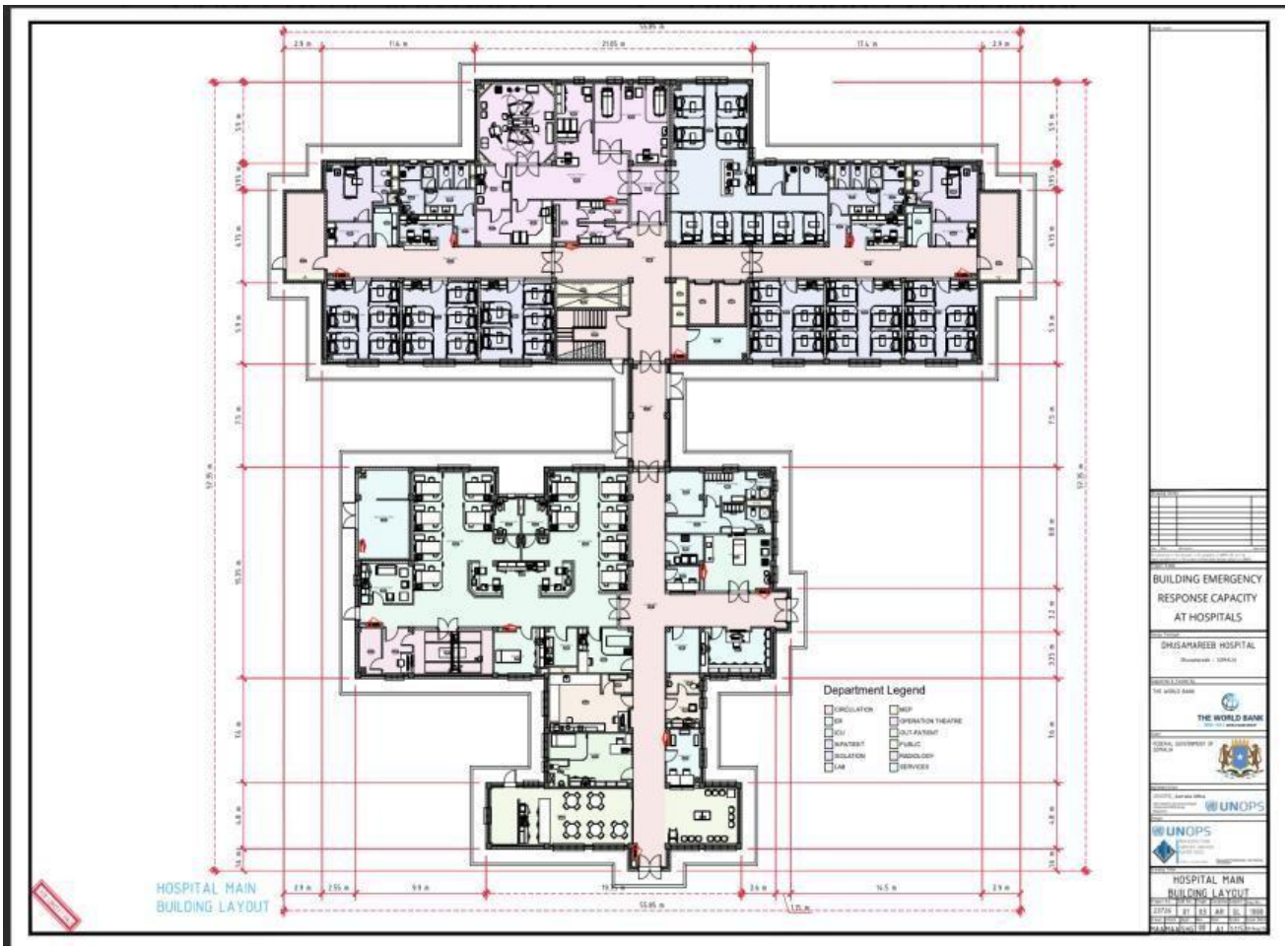

Figure 10 Hospital Main Building layout

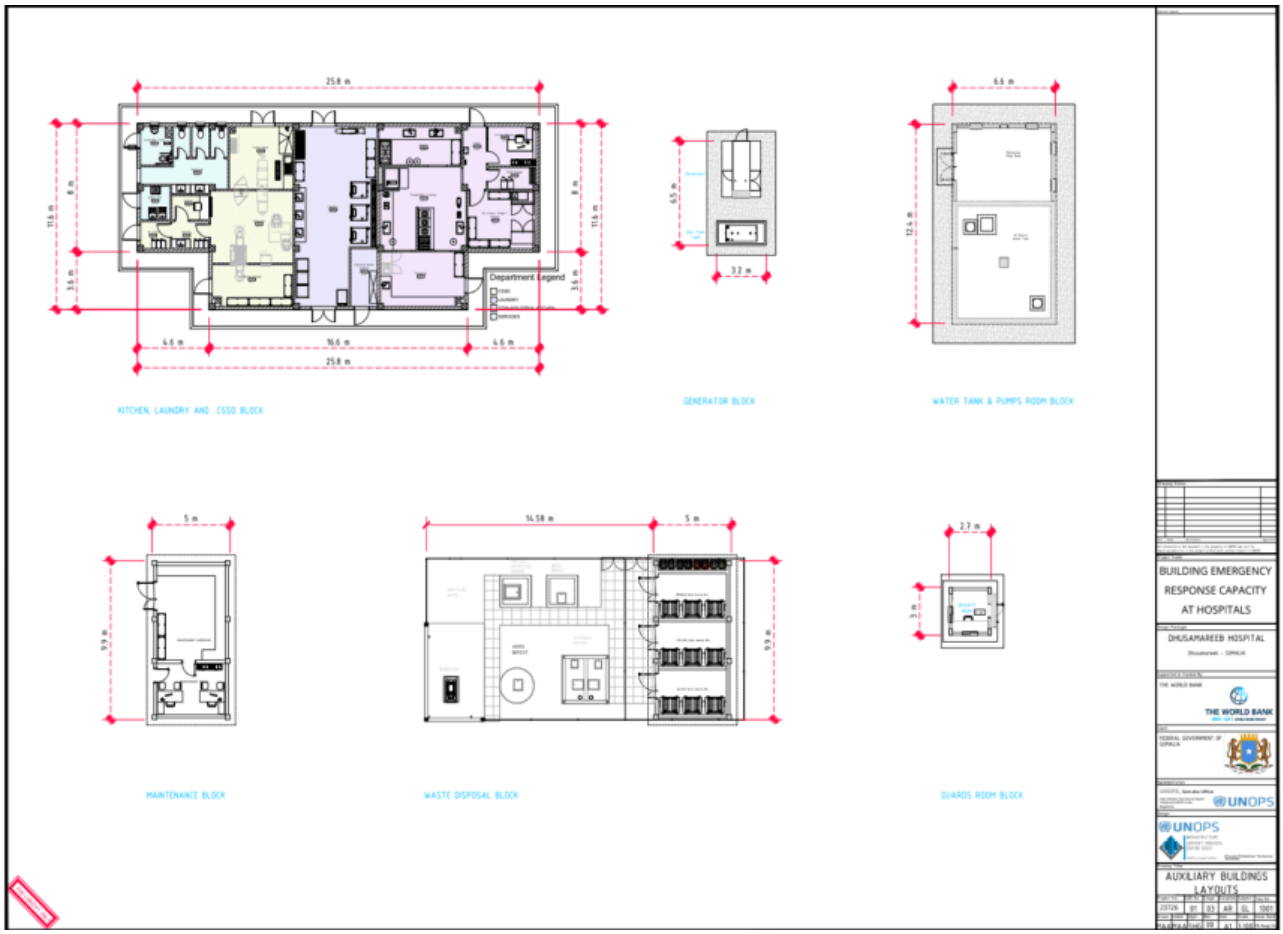

Figure 11 Auxiliary Buildings layout

Furthermore, the project will engage local personnel for manual removal of non-structural elements such as interior walls, doors, windows, to manually collect and segregate small debris, to operate water spray systems to suppress and for safety inspection and enforcement and other labour requirements. These local labourers will be coming from within the local community and therefore there will be no need for the establishment of a workers' campsite. The engineers and supervisors will likely be from the city and not require accommodation. There will be a site office within the designated project area but there will not be any need for a workers' camp.

4.3 Design Standards

Applicable Regulations, Codes and Standards:

- UK Health Building Note 00-01: General design guidance for healthcare buildings
- UK Health Building Note 00-03: Clinial and Clinical support spaces
- UK Health Building Note 00-04: Circulation and communication spaces
- UK Health Building Note 00-07: Planning for a resilient healthcare system
- UK Health Building Note 00-09: Infection control in the vbuilt environment

- UK Health Building Note00-10: Design for flooring, Walls, ceilings, sanitary ware and windows
- UK Health Building Note 04-01: adult in-patient facilities
- UK Health Building Note 04-02: Critical care units
- UK Health Building Note6: Designing facilities for diagnostic imaging
- UK Health Building Note 10-02: Day surgery facilities
- UK Health Building Note13: Streile services department
- UK Health Building Note 14-02: Medicines storage in clinical areas
- UK Health Building Note 15-01: Accident and emergency departments
- International Building Code
- UNOPS Design Manual for Buildings 2014
- UNOPS CAD-Drawing-Guidelines-Version 1.0
- Neufert – Architects Data
- ACI 318-09
- ASCE-7-5

The structural design will adopt the following applicable standards and codes:

- UNOPS design planning manual for buildings
- Building Code Requirements for Structural Concrete (ACI 318-19) and Commentary.
- ASCE standards (ASCE 7-16) for minimum Design Loads for Buildings and Other Structures.

The design of the building includes separate rooms for female staff and patients; accessibility for persons with disabilities; and for environmental issues it includes a stormwater discharge system and for the hot climate it includes 2 types of openings and narrow windows.

Design Description and Core Activities

The structural system will be composed of isolated and strip reinforced concrete foundations; ground beams and clab on grade; reinforced concrete columns and walls; reinforced concrete solid slabs. The design also includes the site structural components related to the external works, including kitchen, laundry and cssd block; water tank and pumps room block; generator block; maintenance block; waste disposal block; guards room block; internal roads and paving; and storm water drainage channels.

The facility will be provided with:

- A rainwater collection system to drain rainwater from the flat roof to free discharge on site;
- A complete system of soil, waste and vent pipe work which serve all sanitary facilities and all wet areas.
- A connection with the existing water source.

- A firefighting system to address requirements for the facility in accordance with the UNOPS design and planning manual for buildings.
- Mechanical ventilation for rooms with WCs which do not have natural ventilation; and Air conditioning for some of the key functions
- An electrical and low-current system, to be fed from the current private electricity company the required centralized medical gasses system.

4.4 Project Activities

Design Phase:

- Site Assessment
- Stakeholder Engagement
- Design of demolition package
- Design of main hospital and auxiliary buildings

Demolition Phase

- Installation of temporary site offices, toilets and space for stores for the workers.
- Provision of water and electricity within the site for the duration of the contract.
- Approval of method statement of the works.
- Clearing up of the site.
- Demolition of the existing buildings (old, dilapidated buildings) at the site.
- Disposal of the material from the demolition to the disposal site.
- Levelling the ground in preparation for the new construction.

Construction of Facilities

- Excavation works for a new foundation.
- Backfilling.
- Foundation works for the stone strip foundation.
- Structural works (strip reinforced concrete foundations; ground beams and slab on grade; reinforced concrete columns and walls; reinforced concrete solid slabs)
- External walling
- Doors, windows and grills; complete with all accessories
- Rainwater collection system
- Soil, waste and vent pipe for drainage
- Electrical and low current system
- Site structural components related to the external works, including kitchen, laundry and cssd block; water tank and pumps room block; generator block; maintenance block; waste disposal block; guards room block; internal roads and paving; and storm water drainage channels
- Centralized medical gasses system

- Ventilation and air conditions
- Firefighting system
- Cabling works.
- Testing and commissioning.

The basic material requirements to undertake the construction of the hospital are building sand, stone aggregates, cement, concrete blocks, plumbing accessories etc. Labor requirements and risk mitigation measures listed below also apply for this process. For building sand and aggregate, the contractor shall have the responsibility to source for a legal site where sand can be extracted from and this shall be approved by the engineer prior to engagement, in consultation with the local authority and any other relevant government institutions. The rest of the material can easily be sourced from block making sites. Plumbing materials shall be procured locally unless this proves a challenge; the material can be sourced from other towns.

Operational Phase:

- Training of the health workers in the management of generated clinical and other waste and recycling opportunities.
- Establishment of Standard Operating Procedures for the hospital, including emergency response procedures.
- Ensuring adherence to OHS standards for the workers
- Operation of the hospital in compliance with the ICMWMP provided towards the end of this document (Project ESMF).
- Management of community exposure to health problems arising from ineffective infection control and inadequate healthcare waste management

5. Environmental and Social Risks and Impacts

Positive Impacts: The health sector needs have been vast and vulnerable to recurrent natural and man-made disasters, including fluctuating levels of conflict, poverty, economic crunch, political uncertainties, drought, floods and epidemics. The burden of diseases has been heavily dominated by communicable diseases, reproductive health and undernutrition issues whereas issues related to non-communicable diseases are also on the rise. The reconstruction of Galgadug Regional Hospital shall provide increased access to health care for the community in the town. There will be improved access to medical health care services for the local community and positive impacts on the environment; benefitting communities and staff as a result of enhancing safety, managing effluents and exploiting less resources.

Negative Risks and Impacts: The activities associated with the demolition and construction of the main hospital building and the auxiliary buildings likely generate adverse site-specific risks and impacts, including:

Design Phase:

- Inadequate consultation
- Exclusion of social groups from consultations
- Lack of access to GRM

Demolition Phase:

- Management and disposal of material generated from demolition activities,
- Management of rubble (solid waste) from the existing buildings,
- Soil and Groundwater contamination during demolition
- Increased level of dust, noise and vibration from moving of construction vehicles and machinery,
- Increased level of air pollution through operation of heavy equipment and vehicles for construction,
- Fall of material or bricks
- Generation of construction waste
- Security for project operations including the protection of project workers and beneficiaries,
- Labor influx and associated risks such as GBV/SEAH,
- Risks associated with labor and working conditions, e.g., child labor or forced labor,
- Occupational health and safety of workers, including risk of slips and trips; working at height; working in confined spaces; work with electrical equipment; working in hot environment
- Transport/road hazards
- Challenges in access to beneficiaries for meaningful stakeholder and community engagements as well as grievance redress and monitoring,

- Disruption in healthcare services for the current and potential patients.
- Traffic risks during demolition.

Construction Phase

- Sourcing of materials, an activity which may degrade the surrounding environment,
- Use of existing borrow pits which may further deteriorate the surrounding environment,
- Increased level of dust, noise and vibration from moving of construction vehicles and machinery,
- Increased level of air pollution through operation of heavy equipment and vehicles for construction,
- Fall of material or bricks,
- Generation of construction waste,
- Security for project operations including the protection of project workers and beneficiaries,
- Labor influx and associated risks such as GBV/SEAH,
- Risks associated with labor rights and management, e.g., child labor or forced labor,
- Occupational health and safety of workers, including risk of slips and trips; working at height; working in confined spaces; work with electrical equipment; working in hot environment,
- Transport/road hazards,
- Challenges in access to beneficiaries for meaningful stakeholder and community engagements as well as grievance redress and monitoring,
- Disruption in healthcare services for the current and potential patients,
- Traffic risks during construction,
- Potential impacts to patients and health care workers who will be using the existing facility,
- Stormwater (build stormwater discharge system),
- Hot climate: narrow windows to reduce solar radiation with double glazed aluminium profiles),
- Security for project operations including the protection of project-affected persons.

Operational Phase:

- Community health and safety risk: water and sanitation safety, life and fire safety, protection from infectious disease.
- Potential impacts to patients and health care workers who will be using the existing facility
- Waste management
- Medical wastes, wastewater and air emissions leading to contamination of the environment and the workers,
- Risk of infection among health professionals,
- Risk of infection to the handlers

- Physical hazards (for example, handling of sharps),
- Electrical and explosive hazards,
- Fire,
- Ergonomic hazard; OHS hazards related to healthcare and non-healthcare daily operations,
- Radioactive hazard,
- Poor sanitation conditions at the facility leading to discomfort and poor aesthetic values
- Community health and safety: carriage of healthcare waste through public streets can be a risk in case of an accident or spill of health care waste.
- Lack of access for vulnerable groups, including women, disabled, minorities
- Exclusion from ongoing consultations of vulnerable groups
- Risks of GBV/SEA for persons with disability and other vulnerable groups
- Risks related to incinerator operation, increased air emissions.

6. Risks/Impacts and Mitigation Measures

The table below lays out the specific adverse risks and impacts anticipated for the activities of the sub-project and the respective mitigation measures required to reduce or eliminate the risks and impacts. This matrix forms the core of the ESMP, since it shows what must be done and by whom.

Table 2 Table with risk mitigation measures

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
ESS 1: Assessment and Management of Environmental and Social Risks and Impacts						
	Risk of poor implementation of the respective mitigation measures against the negative impacts identified in this ESMP	Enhance capacity of all implementers on E&S risk assessment and mitigation measures through training sessions Provide capacity building opportunities to the E&S teams working on the subprojects on understanding and implementing assessment and management requirements of the WB's ESF and WBG's EHSGs. Provide H&S training to the construction workforce (including subcontractors, temporary workers, and drivers). Raise awareness of workers regarding the implementation of the ESMP tailored to the project scope, through toolbox talks and other platforms	Implementation: UNOPS Monitoring: PCIU	1000 USD	# of awareness sessions provided to workers # of training sessions provided to project team	Monthly PCIU budget
ESS 2: Labour and Working Conditions						
Demolition and Construction						
	Lack of implementation of the mitigation measures	Provide H&S training to the workforce Raise awareness of workers regarding the implementation of the ESMP tailored to the project scope, through toolbox talks and other platforms	Contractor Monitoring: UNOPS	100 USD for logistics	# of H&S Training session # of awareness raising session or toolbox talks	At the beginning of construction activity UNOPS budget
	Risk of insecurity affecting project workers	PCIU to provide actions according to the Project Security Management Framework and UNOPS adopt actions and cascade them to contractors. Contractors to implement SRM mitigation measures according to SMF.	PCIU / Contractor	Costs for security risk implementation as part of contractor budget	# Security Risk Assessments updated # of SMPs	Prior to commencement of activity and during construction activities

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
					# of security incidents PCIU budget	
	Labor and working conditions are not in compliance with WB and Somali legislation	Implement and monitor the LMP and ensure each employee has a contract or defined terms of engagement. Listing of all staff and titles, new hires and departure Site visited and review of records, major findings, and actions taken by contractor, engineer, or others, including authorities—to include date, inspector or auditor name	Implementation by Contractors Monitoring by PMT/PCIU eng ineering Firm	Incl. in contractor staff costs	Availability of register Availability of logbook showing site visited and actions taken	Monthly Cost of monitoring is included in the project/ operational cost.
	OHS risks, including impacts of dust, noise, vibration, ergonomics, extreme temperatures, struck by objects, slips and trips, working at height, working in confined spaces	<u>Dust</u>: Watering the soil to dampen the surface to be used to reduce dust Wear PPE (including safety glasses and gloves and dust masks) Use dust suppression techniques, such as water spraying on demolition sites and debris. Use dust barriers or screens around the site to contain airborne particles. Ensure all workers wear appropriate personal protective equipment (PPE), like masks and respirators <u>Noise</u>: Provide hearing protection where necessary (when sound level over 8 hours reaches 85 dB(A))	UNOPS/Contractor Monitoring: PCIU E&S specialist to monitor adherence to requirements	Incl in Contractor budget	Frequency of watering and number of dust masks provided to staff and being used % of workers that have been provided with hearing protection # of equipment with potential to cause vibrations fitted with vibration-dampening pads or devices # of equipment with vibration-dampening pads or devices	Monthly PCIU budget

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
		Use of acoustic insulating materials, isolation of noise source, and other engineering controls No noise from machine breakers if used during evening hours <u>Vibration</u>: Control vibration through choice of equipment, installation of vibration dampening pads or devices, and limiting the duration of exposure <u>Heat</u>: Provide temporary shelters to protect against the elements during working activities or for use as rest areas. Monitor weather forecast for outdoor work Adjust work and rest periods according to temperature Use of mechanical assists to eliminate or reduce exertions required to lift materials, hold tools and work objects Implement quality control and maintenance programs that reduce unnecessary forces and exertions <u>Confined spaces/excavations:</u> Safe access and egress into the excavation area, for example a sufficiently long & secured ladder. Daily and weekly inspections to be carried out as per excavation permit and daily checklist			# of temporary shelters available # of trainings for industrial vehicle operators conducted # of rest and stretching breaks per work day # of OHS related incidents % of workers with appropriate PPE # of health and safety work plans # of site speed limit signs at construction site Records of rest and stretching break Records of heath awareness and edcation sessions -Signage for designated and restricted waste drop zone	

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
		Fencing to be erected around the excavations area, external site fencing with visible signage to be installed to prevent unauthorised entry Ensure materials are located/ unloaded in designated locations and not adjacent to excavation edges Workers/operatives to use appropriate PPE <u>Ergonomics</u> Incorporate rest and stretching breaks into work processes and conduct job rotation <u>Struck by objects</u> Use designated and restricted waste drop or discharge zone Conduct sawing, cutting, grinding with proper guards and anchoring Provide appropriate PPE, including safety glasses with side shields, face shields, hard hats and safety shoes <u>Working at height</u> Use of temporary fall protection measures Training and use of personal fall arrest systems Use of safety harness with land yards <u>General</u>: Preparation of an Emergency Preparedness Plan and emergency alert systems Provision of adequate PPE (safety harness, gloves, safety glasses, hard hat, safety			# of temporary fall protection measures -Records of safety harness with lanyards provided -Record of emergency preparedness and response plans -Records o PPE provided and reports on usage Training records Health and safety plan records Record of method statement provided to UNOPS	

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
		boots, dust mask, safety vests) Regular training for workers on workplace safety Preparation of health and safety plan Contractor shall provide UNOPS with method statements for the works to be implemented in a safe manner.				
	Risk of labor influx leads to increase of GBV cases	All workers to sign CoCs. (see Annex 3) Dedicated reporting channel for victims through Project GRM Provide GBV awareness training to workers	UNOPS/Contra ctor Monitoring: PCIU	Incl in contractor staff costs / PCIU costs	% of workers that signed COCs # of training sessions provided	At commencement of project activity PCIU budget
	Discrimination against women and vulnerable in employment	Contractor to develop recruitment and retention policies that enable fair working conditions and women's safe and equitable participation. Comply with LMP	Contractor Monitoring: UNOPS	Incl. in staff costs	Record of contractor's recruitment and retention policy in place	At start of project UNOPS budget
	Delayed payment or underpayment of workers, leading to complaints and conflict	Ensure provision of timely and equitable payment Ensure provision of workers' GRM Ensure information on workers' GRM is provided	Contractor Monitoring: UNOPS	Incl. in contractor staff costs	% of payments made on time # of workers' complaints filed and handled	Monthly UNOPS budget

	Child and forced labor resulting in employing of underage children and human trafficking	Implementation of GRM to ensure their voices / complaints are heard Contractor to maintain staff records, ID copies	Contractor / PCIU Monitoring: UNOPS	Incl in contractor staff costs	# of workers' grievances filed # of GRM cases filed # of child and forced labor reported	Throughout project implementation UNOPS budget

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
		Minimum age for workers to be set at 18 Regular monitoring inspections			Record of all workers IDs and contract or consent to work. Number of workers' grievances filed and/orof GRM cases filed, resolved or pending Records of cases of child and forced labor reported	
	Risk of SEA/SH among workers	All workers to sign CoC. Dedicated reporting channel for victims through Project GRM Provide GBV awareness training to workers	Contractor / PCIU	Incl. budget of PCIU and contractor	% of workers that signed COCs # of training sessions provided	Monthly PCIU budget
Operational Phase						
	Risk of medical wastes, wastewater and air emissions leading to contamination of the environment and the workers	Ensure waste is segregated at point of generation to the extent possible for easy handling Ensure the segregated waste is appropriately packaged in colored containers using standard clinical waste color codes for respective waste type, and stored for final disposal consistent with the WHO standards[18] Rigorously segregate waste so that no PVC	Galgadug Regional Hospital administration Monitoring: MoH	Incl. budget of HCF	# of labelled secure bags for generated medical waste # of wastewater and air emissions analytical results available	Quarterly MoH Budget

[18] https://www.who.int/publications-detail-redirect/9789241548564

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
		(IVs, etc.) waste is incinerated and instead directed to the appropriate waste bag for appropriate disposal				
	Risks of physical hazards (for example, handling of sharps); Electrical and explosive hazards; Fire; Chemical use OHS hazards related to healthcare and non-healthcare daily operations	Ensure a local risk assessment (identification of risks at work) is conducted for each process step, that is, from sample collection to disease isolation to identify specific hazards and for each identified risk, appropriate risk control measures must be defined. Provide safety training in the management of hazards identified other than those related to sample handling Provide review of Infectious Preventive Control training for the health care facility staff, including Health Care Workers charged with the responsibility to handle and dispose of the medical waste Ensure conducting regular fire drills. All fire and life safety measures follow applicable good practice standards such as those under ESS4, and the IFC EHSG for Fire Prevention and Life Safety (see Annex 6)	Galgadug Regional Hospital administration Monitoring: MoH	Incl. budget of MoH	# Local risks assessment conducted every year and specific hazards identified for each and way forward # of regular safety training provided # of reviews of training provided # of fire drills conducted # of OHS incident reports	Monthly

	Risk of infection among health professionals	Ensure appropriate training on Infection Prevention and Control for healthcare workers and other staff. WHO prescribed protocols for personal protection of healthcare professionals is to be enforced at all times Ensure training in Health care Infection Control and Medical Waste Management Plan (ICMWMP), which enable health care waste to be managed responsibly,	MoH	Incl. budget of MoH	# of training sessions held and workers who has been trained # of protocols available at location	At start of the clinical operations MoH budget

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
		without harming the community or the environment.				
	Risk of GBV/SEAH among workers	All workers to sign CoCs (see Annex 3). Dedicated reporting channel for victims through Project GRM Provide GBV awareness training to workers	Galgadug Regional Hospital administration Monitoring: MoH	Incl. budget of MoH	% of signed COCs # of training sessions provided	Monthly MoH budget
	OHS risks for hospital workers	Provision of adequate PPE Regular training for workers on workplace safety Preparation and implementation of health and safety plan	Galgadug Regional Hospital administration Monitoring: MoH	Incl. budget of MoH	# of training sessions provided # of health and safety plans available	Monthly MoH budget
ESS 3: Resource Efficiency and Pollution Prevention and Management						
Demolition and Construction Phase						
	Lack of management and disposal of material generated from Rehabilitation activities, including rubble / waste management	Contractor to provide Waste Management Plan for site, including specifications of waste disposal. Reuse and recycling of the waste generated should be prioritized Ensure disposal of generated solid waste at designated and authorized disposal site in consistence with the local and international requirements (see WBG General EHS Guidelines)[1], such as: • Institute good housekeeping and operating practices - including inventory • Control to reduce the amount of	Contractor Monitoring: UNOPS	Incl in contractor budget	Records of amount of solid waste re-used, recycled, disposed, where and when Records of waste tracing sheets from the premises to the disposal sites Grievances filed related to waste management Report on implementation of the	Quarterly UNOPS budget

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
		waste • Institute procurement measures that recognize opportunities to return usable materials • Implement stringent waste segregation to prevent mixing hazardous and non-hazardous wastes • Identify potentially recyclable materials • Disposal at permitted facilities specially designed to receive waste • Provide on-site or off-site transportation of waste to prevent or minimise spills, releases and exposure to employees and public • Ensure mechanisms exist for community to bring forth any complaints/feedback concerning the waste disposal by the contractor – Project GRM Carry out disposal of solid waste in a manner that does not negatively affect the drinking water sources, the existing waste management system in the area, local routes, and general aesthetic value of the area.			waste management	
	Air quality impacts from construction machinery and material transport	Install emission control devices, such as diesel particulate filters or oxidation catalysts on older machinery	UNOPS/Contractor	Incl. in contractor budget	Availability of emission control device Record of maintenance	Throughout construction phase

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
		Ensure equipment or vehicle is properly maintained to operate efficiently and emit fewer pollutants			is available	
	Risk of water consumption	Manage water consumption, including through - On-site water recycling - Rainwater harvesting Conduct regular inspections to identify and fix leaks in pipes, hoses and tanks	UNOPS/Contractor	Incl. in contractor budget	Availability of water recycling Availability of inspection record	Throughout construction phase
	Prevention of spills during refuelling	Apply spill containment trays Inspect and maintain fuel hose and connection to prevent leaks.	UNOPS/Contractor	Incl. in contractor budget	Availability of containment trays Availability of inspection record	Throughout construction phase
	Hazardous material storage and disposal	Empty paints cans store in closed drums or isolated area from soil and water at Contractor store, then handle as recycled metal scrap. Store any chemicals and hazardous waste at designated areas, insulated from the ground Ensure trained personnel handle hazardous chemicals and wastes.	UNOPS/Contractor	Incl. in contractor budget	Availability of material safety data sheets in areas where chemicals are used or stored Availability of eye wash stations Training records on handling of hazardous chemicals	Throughout construction phase
	Poor sanitation facilities and sanitation conditions at work site	Provide proper water closet toilet facilities at work sites. Do not allow water to run out at toilets. Maintain all toilets in clean and sanitary condition.	Contractor Monitoring: UNOPS	Budget of contractor	# of water closet toilet facilities available % of toilets leaking # of Toilets are well maintained	Monthly UNOPS budget

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
		Do not allow site workers to defecate in the open anywhere on the site or in its vicinity. Add the use of sanitation arrangements in toolbox talks			# of toolbox talks with Sanitary arrangements	
	Risk of pollution from construction wastes and water use on groundwater	Through accurate estimation of the sizes and quantities of materials required, order materials in the sizes and quantities they will be needed, rather than cutting them to size, or having large quantities of residual materials. Develop and implement waste management plan, including specifying disposal site for solid waste. Encourage efficient use of materials to minimize wastage. Ensure that construction materials left over at the end of construction will be used in other projects rather than being disposed of. Ensure that damaged or wasted construction materials will be recovered for refurbishing and use in other projects Donate recyclable/reusable or residual materials to local community groups, institutions and individuals or homeowners. Dispose waste more responsibly by disposal	Contractor Monitoring: UNOPS	Incl. in contractor staff costs	volume of construction materials left over at the end Volume of waste at construction site is disposed of appropriately # of waste bins available at construction sites # of waste related complaints	Throughout project implementation UNOPS budget

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
		at designated dumping sites. Waste collection bins to be provided at designated points on site Create awareness on the available GRM channels for waste related complains.				
Operational Phase						
	Stormwater	Build stormwater discharge system	Contractor Monitoring: UNOPS	UNOPS Contractor budget	Availability of stormwater discharge system	During construction phase UNOPS budget
	Hot Climate	Build narrow windows to reduce solar radiation with double glazed aluminium profiles	Contractor Monitoring: UNOPS	UNOPS Contractor budget	Availability of narrow windows	During construction phase UNOPS budget
	Risk of medical wastes, wastewater leading to contamination of the environment and the workers	Rigorously segregate waste so that no PVC (IVs, etc.) waste is incinerated and instead directed to the appropriate waste bag for appropriate disposal Implement the ICMWMP (see Project ESMF)	HCF	Incl. budget of HCF	# records of PVC waste segregated Report on implementation of the medical waste management plan.	Quarterly
	Impacts of air emissions from incinerator	Conduct preventative periodic maintenance of incinerator Ensure compliance with national standards and the Stockholm Convention's Best Available techniques (BAT) and Best Environmental Practice (BEP) Do not use single-chamber, drum and brick incinerators	Galgadug Regional Hospital administration	Hospital budget	# of maintenance events # of routine inspections	During operational phase

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
		Operate through qualified personnel only Ensure auditing and reporting systems Conduct routine inspections of the furnace and air pollution control systems Implement ICMWMP (See Project ESMF)				
ESS 4: Community Health and Safety						
Demolition and construction phase						
	Increased GBV/SEAH cases and risks of sexual exploitation and abuse or sexual harassment, such as requests for sexual favors by project workers	GBV awareness sessions for community members GBV awareness sessions for workers Engage a dedicated service provider to support oversight and management of these risks Workers to sign COC Provide continuous awareness on GRM for SEA/SH channels to all workers Implement the SEA/H action plan.	PCIU / UNOPS	Incl. in PCIU staff and travel costs	Records of GBV awareness sessions to staff and the community members % of workers that have signed CoC # of GBV-related incidents reported	monthly
	Spread of communicable diseases (Sexually Transmitted Diseases SIIs , HIV/AIDS, etc..) between workers and the community	Periodic community and workers awareness sessions on communicable diseases including HIV/AIDS Provide hand washing stations for workers Provide mosquito nets for workers	Contractors / PCIU / UNOPS Monitoring: UNOPS	Incl. in PCIU staff costs and contractor budget	# of community sensitization % of workers that have signed CoC # of related complaints filed in GRM	Monthly UNOPS budget

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
	Exposure of community members to physical hazards on project sites.	Undertake safety precautions to address safety hazards for the nearby community, Sensitize the local community and inform them about construction risks and the restricted access to the site Restrict access to construction site through signage Remove hazardous conditions on site that cannot be controlled effectively with site access restrictions, such as covering openings to small confined spaces, ensuring means of escape for larger openings Lock storage of hazardous material	Contractor Monitoring: UNOPS	Incl. in Contractor budget	# of sensitization measures for communities # of signage available around construction site % of small openings that have been covered % of larger openings that have an escape opening # of locked storage for hazardous materials	Throughout activity UNOPS budget
	Increased level of dust, noise and vibration from moving of construction vehicles and machinery	High level maintenance of the project vehicles to reduce the vibrations Selecting equipment with lower sound power levels Installing suitable mufflers on engine exhausts and compressor components equipment casing Planning activities in consultation with local communities so that activities with the greatest potential to generate noise are planned during periods of the day that will result in least disturbance.	Contractor Monitoring: UNOPS	Incl. in Contractor budget	% of vehicles well maintained % of engine exhausts with mufflers installed % of activities implemented during the days	Throughout activity UNOPS budget

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
		Spray work area with water to avoid dust Install no hooting sign and ensure it is enforced				
	Disruption in health services for current and future patients	Ensure alternative and accessible health centers are communicated	Galgadug Regional Hospital administration Monitoring; PCIU	Incl. in MoH budget	# of GRM cases filed in relation to site closure	Throughout activity PCIU staff time
	Potential impacts to patients and health care workers who will be using the existing facility	Provide signage and fencing to guard access between the demolition site and the remaining hospital site	Contractor Monitoring: UNOPS	Incl. in contractor budget	# of GRM cases filed	Throughout activity NOPS budget
	Transport/road hazards and traffic risks during construction	Prepare implement a traffic management plan Training and licensing of industrial vehicle operators in the safe operation of specialized vehicles. Ensure drivers undergo medical surveillance Establish rights of way, site speed limits, vehicle inspection requirements, operating rules and procedures CoC signing by drivers and operators Ensure drivers undergo medical surveillance Establish rights of way, site speed limits, vehicle inspection requirements, operating	Contractor Monitoring: UNOPS	Incl. in contractor budget	% of industrial vehicle operators with license % of drivers and equipment operators who have signed the CoC % of vehicle operators who have undergone medical surveillance Traffic signage installed Record of traffic management plans Grievances related to traffic and vehicle operations	Monthly UNOPS budget

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
		rules and procedures Ensure the vehicle are in good and serviceable conditions Avoid traffic in the night or when and where there are no sufficient lights Ensure there are visible traffic signs in and around the construction site.				
	Exclusion of women from the workforce	Encourage contractor to recruit women for the works in view of creating gender parity Maintain lists of workers indicating their gender	Contractor Monitoring: UNOPS	Incl. in contractor budget	# of women included in the workforce	Monthly UNOPS budget
Operational Phase						
	Risk of poor sanitation conditions at the HCF leading to discomfort and poor aesthetic values	Provide cleaning staff with adequate cleaning equipment, materials and disinfectant. Provide adequate facilities to disinfect the cleaning equipment and dispose of the used consumables in a safe manner; Review general cleaning systems, training cleaning staff on appropriate cleaning procedures and appropriate frequency in high use or high-risk areas. Train cleaners in proper hygiene (including handwashing) prior to, during and after conducting cleaning activities; how to safely use PPE (where required); in waste control (including for used PPE and cleaning	Galgadug Regional Hospital Administration	Incl. budget of MoH	# of cleaning equipment available % of cleaners trained	monthly

WB ESS	E&S Risks and Impacts	Mitigation Measures	Responsibility	Budget for mitigation (in USD)	Monitoring Indicator	Monitoring Frequency
		materials)				
	Communities' exposure to health problems arising from ineffective infection control and inadequate health care waste management	Implement MWMP	Galgadug Regional Hospital Administration	running costs of Galgadug Regional Hospital Administration	See MWMP	Monthly
ESS 8: Cultural Heritage						
	Risk of Chance Finds	Implement Chance Find procedures (see Annex 4)	Contractor Monitoring: UNOPS		Report on Chance find procedures	Monthly UNOPS budget
ESS 10: Stakeholder Engagement and Information Disclosure						
	Challenges in access to beneficiaries for meaningful stakeholder and community engagements as well as grievance redress and monitoring	Implementation and monitoring of GRM Implementation of Project SEP on stakeholders engagement especially those living around the hospital vicinity	PCIU / UNOPS	PCIU and UNOPS GRM costs	% of complaints filed have been addressed # of site-specific incident logs	monthly
	Risks of lack of information on access to GRM leads to lack of accountability	Awareness raising on GRM and all the available channels	PCIU / UNOPS	PCIU and UNOPS budget for GRM	# of awareness sessions of GRM	quarterly
	Lack of information disclosure leads to lack of transparency and suspicions of mismanagement of the sub project	Conduct in- depth community engagement, providing information on the sub project Implement SEP on information disclosure	PCIU	PCIU budget for stakeholder engagement	# of community engagement sessions held	quarterly

7. Implementation Arrangements

7.1 Government and UNOPS Institutional Responsibilities

The overall responsibility for the works sits with the Ministry of Health (MoH) as the main recipient and implementer of the project. The work is overseen by the Project Coordination and Implementation Unit (PCIU) embedded within the Project's institutional structures. The PCIU contracted UNOPS as a sub-implementer for the rehabilitation and reconstruction of 6 hospitals, including Galgadud Regional Hospital. UNOPS has designed the works and is preparing the bidding documents for contractors to be recruited to perform the works. UNOPS will oversee the works and the compliance with the ESMP-specific E&S mitigation measures. The construction companies will implement the project including all Environmental and Social (E&S) mitigation measures defined in this ESMP. For Galgadud Regional Hospital Rehabilitation works, one contractor will be hired.

Below is the list of Government institutions involved in TB Unit reconstruction implementation, with their respective roles and interests.

Table 3 Institutional Partners Responsibilities

MoH	The MoH is responsible for the overall implementation of the Project. It will deploy supervision consultants to monitor the implementation of the Project. Specifically the PCIU Environmental and Social Team are responsible for the E&S risk mitigation of the project and are responsible for monitoring the implementation of this ESMP.
Hospital Administration	The Hospital Administration has agreed to the design of the Rehabilitation works and will support the Rehabilitation.
UNOPS	UNOPS Engineers and E&S safeguard team have prepared the design for the works and this ESMP. They will oversee the implementation of the works by the contractor.
Contractor	The contractor will implement the Rehabilitation works at Galgadud Regional Hospital based on the agreed design and this ESMP.

7.2 Contractor

The contractor is responsible for complying with requirements for all field activities covered by this ESMP, the contractor is also responsible to ensure that all its sub-contractors follow the

ESMP and other ESF instruments that apply to this sub project. The contractor will have contractual clauses specifying compliance with the mitigation measures listed in the ESMP and in the WBG EHS Guidelines, in addition to national requirements and to indicate measures taken in cases of non-compliance. The contractor is also responsible for the actions of any subcontractors they may engage. Sub-contractors also must comply with all E&S standards as laid out in this ESMP. Contractor's responsibilities include:

- Ensure that all operations comply with the ESS and mitigation measures laid out in this ESMP, for which the contractor is responsible.
- Ensure that the control measures provided for in the ESMP are both understood and implemented by site personnel.
- Comply with accident and incident reporting as laid out in the ESMF. All severe incidents must be reported to UNOPS/PCIU within 48 hours of occurrence.
- Set up plans for action to be taken in the event of spills or leakages of hazardous materials, and other environmental emergencies.
- Monitor the ESMP implementation, against the monitoring indicators laid out in the ESMP Table.
- Participate in Community Consultative Meetings.
- Identify additional significant matters pertaining to environmental and social compliance.
- Liaise with UNOPS on the need for corrective action in the event of unexpected environmental or social problems emerging during operations.
- Communicate with all staff regarding E&S compliance requirements and other matters of importance.
- Identify additional environmental mitigation or corrective measures that are deemed to be necessary during project implementation.
- Prepare reports on all aspects of E&S compliance.
- Maintain lists of all workers, including their age and gender.
- Maintain a workers' grievance mechanism.
- Prepare and maintain an OHS Plan and provide training to all workers on OHS Plan.
- Ensure signing of code of conduct by every worker, including issues of Sexual Harassment, Gender-Based Violence (GBV) and Sexual Exploitation and Abuse.
- Implement the Security Management Plan.
- The contractor is obliged to implement this ESMP with all risk mitigation measures assigned to it.

<u>E&S Safeguards or Environmental Health and Safety (EHS) Specialist:</u> The contractor will deploy an E&S or EHS Specialist as an addition to the team to ensure operationalization of this ESMP, including monitoring, supervision and reporting on mitigation measures. The key tasks of the Specialist include the following.

- Ensure PPE for workers is available and workers are trained in its use
- Provide OHS training to all workers, based on the OHS Plan

- Ensure health and safety of all workers at the construction site
- If necessary, stop the works to ensure safety
- Maintain records of accidents and incidents and ensure appropriate reporting of incidents to the PCIU
- Ensure waste management procedures are followed closely
- Ensure availability of water and sanitation facilities for all workers at site and at the campsite
- Conduct toolbox talks for workers
- Train all workers in the CoC and ensure that CoC is signed by every worker
- Liaise closely with the UNOPS on training workers on GBV issues, as well as community awareness on GBV
- Maintain workers' lists indicating age and gender
- Liaise closely with UNOPS on the implementation of Project GRM
- Maintain records of Workers' GRM

8. Reporting on ESMP Compliance

UNOPS will prepare periodic monitoring reports, including inputs from the contractor and on the status of implementation of this ESMP. The reports will be submitted to the PCIU for its review and feedback. Details of these reports and their content are given in the Table below. A template for E&S Monitoring report is included in Annex 2.

Table 4 ESMP Monitoring and Compliance Reports

#	Title of the Report	Contents of the Report	Frequency of Report Preparation	Report to be prepared by
1	ESHS Monitoring Report to UNOPS	Compliance status of the Project with the E&S mitigation and monitoring measures. The report should cover: Environmental incidents; Health and safety incidents, child and forced labor; Health and safety supervision; Usage of PPEs by workers; Highlights of inspection; Training conducted, and workers participated; Workers' grievances.	Monthly	Contractor
2	ESMP Monitoring Report to PCIU	Compliance status of overall Project with ESMP requirements	Monthly	UNOPS
3	Incident Reports to PCIU	Incident investigation reports for all major incidents covering details of the incident, root cause analysis, and actions taken to address the future recurrence of this event	Initial investigation report for severe incidents within 24 hours. Detailed Investigation Report within ten days	UNOPS

#	Title of the Report	Contents of the Report	Frequency of Report Preparation	Report to be prepared by
4	Incidents reports from PCIU to WB	Incident investigation reports for all major incidents covering details of the incident, root cause analysis, and actions taken to address the future recurrence of this event	Initial investigation report for severe incidents within 48 hours. Detailed Investigation Report within ten days	PCIU

9. Capacity Building and Training

The implementation of this ESMP is highly dependent on the available existing capacity and awareness of the contractors' staff, the surrounding community and the concerned stakeholders. Training workshops are required to increase the awareness of all individuals concerned with the Project and to train and follow up with the workers who are specifically involved in the site operation.

On-site workers should receive appropriate training to undertake the duties of implementing the necessary mitigation measures. The training workshops should be undertaken prior to commencement of construction activities. The recipients of the training are all construction workers. The training are to be included in the budget of the contractor. The only trainings to be provided by the UNOPS include GBV/SEA/SH prevention. One initial training on mitigation measures will be provided to the contractor.

The training for the workers should cover at least the following issues:

- Occupational and public health and safety.
- Mitigation measures to be applied.
- GBV/SEA/SH prevention
- Accidents and emergency plans
- Roll-out of GRM among workers and communities
- Appropriate segregation, transportation, final disposal of solid waste.
- COC

The E&S induction training for the contractors is currently scheduled for 18 December 2025.

This will be achieved through the implementation of small workshops in the induction phase for the workers. During the construction phase, refresher training will be held.

- Next to the training of workers, communities at the site will receive awareness raising sessions on the following topics:
- Heighten awareness of environmental and social risks and impacts and mitigation measures including trainings on (not exhaustive):
- GRM
- GBV prevention

The Project team will further sensitize the Hospital leadership on the requirements for a Hospital Workers' Grievance Redress Mechanism (GRM) to be implemented during the operational phase.

10. Stakeholder Consultations

The preparation of the ESMP and of the project selection and design was highly dependent on stakeholder consultations, conducted as per the the previous Project Project Stakeholder Engagement Plan (SEP).

Once the rehabilitation of the Galgadud Regional Hospital was decided on, follow-on site visits and stakeholder engagements were undertaken. Initial assessment meetings were held on 28th, 29th and 30th of November 2023, with district and community-level stakeholders, including key figures from the hospital and the Ministry of Health convened to address critical aspects of health provision, challenges and proposed recommendations. Primary objectives of this initial assessment were to comprehend and identify current challenges in health services, provide recommendations for service delivery enhancement, assess the suggested hospital rehabilitation, and anticipate environmental and social risks. Additionally, the meetings aimed at discussing impact on land ownership and livelihoods, suggesting an effective grievance redress mechanism, and identifying vulnerable stakeholders for future consultations.

Figure 12 Meeting with the Director General of the MoH at the State Level

The meeting was adjourned with a consensus on the importance of the hospital rehabilitation project, and a commitment to address the identified risks and challenges.

Figure 13 Consultative Meeting with the MoH, Galmudug State

The DG outlined that the ministry's role in health provision in the district encompassed a multifaceted approach, aimed at ensuring comprehensive healthcare services are provided. Crucial aspects that the MoH is involved in, he noted, include but are not limited to emergency preparedness and response, strategic planning and policy implementation, capacity building and training as well as resource allocation and management.

Lack of adequate supplies, inadequate infrastructure – including poor and impassable roads and ramps within the hospital facility - and shortage of healthcare workers, it was noted, severely plague Galgadud Regional Hospital as the sole referral centre for a vast catchment area covering two regions within Galmudug State, accentuating the urgency to address these challenges.

Key suggestions emphasised in the meetings were to prioritise the enhancement of the hospital's capacity, ensuring it is fully equipped to deliver comprehensive primary health care services, including secondary and tertiary health care, so it can cover both Galguduud and Gedo regions.

At the community level, the Horsed Village Committee members and the Hospital Committee members indicated that there was a broad consensus that the hospital is currently underperforming. They indicated that the most vulnerable community members that require health services are mothers with children under the age of five; elderly individuals who face mobility challenges; and people with disabilities who require special care. Asked for environmental risks in relation to the works, community members pointed out that there may be some risks, such as noise and vibration, air pollution and dust, as well as challenges with

waste and wastewater. Members of vulnerable groups stated that there is a risk of the exclusion of vulnerable individuals form project benefits and employment opportunities. They were particularly concerned about elite capture. Other community members pointed out the possibility of tensions arising if some community members do not feel well represented in the process. Women expressed concerns to be excluded from the workforce and wage-earning opportunities.

Figure 14 Community-level Consultation with the Horseed Village Committee

Figure 15 Combined Hospital and Village Stakeholder Committee Meeting

11. Grievance Redress Mechanisms

Project GRM

One of the key objectives of ESS 10 (Stakeholder Engagement and Information Disclosure) is 'to provide project-affected parties with accessible and inclusive means to raise issues and grievances and allow borrowers to respond and manage such grievances[19]. This Project GRM facilitates the Project to respond to concerns and grievances of the project-affected parties related to the environmental and social performance of the project. The Project provides mechanisms to receive and facilitate resolutions to such concerns. This section lays out the grievance redressal mechanisms (GRM) for the Project.

The MoH has the responsibility to resolve all issues related to the Project in accordance with the laws of FGS and the World Bank ESSs through a clearly defined GM that outlines its process and is available and accessible to all stakeholders. The entry point for all grievances is the social specialists at the FGS and FMS/ GRA levels, who receive grievances by phone, text or email to publicised mobile phone lines and email addresses. The social safeguards specialists will acknowledge, log, forward, follow-up grievance resolution and inform the complainant of the outcome. The complainant has the right to remain anonymous, in which case the identifying details will not be logged. The PCIU senior social specialist will carry out training of FMS/ GRA social officers and project officers on complaints handling and reporting. Grievances may also be submitted to UNOPS or the contractor. Both will aim to handle grievances and solve them, or feed the cases into the established Project GRM described here where applicable.

A Grievance Committee (GC) is established at federal level, consisting of the project coordinator, and relevant staff, with the Social Safeguards Specialist acting as the secretary to the meeting and taking minutes and following up the grievance resolution process. The GRM offers different channels to enable a confidential and sensitive approach to GBV-related cases that ensures the safety of survivors and enables survivor-centred care. The GC meets every two months throughout the project implementation period to review non-urgent appeals and the functioning of the GM.

The previous PCIU conducts public awareness campaigns about the Project GRM to inform all communities and staff on the mechanism. A one-pager provides summary details on the GM, while a poster and leaflet are prepared for the project site. Various mediums are used to sensitize the communities on the project GRM including social media and FM radio to reach out to communities at the Project locations, including call-ins with panels including community and government representatives. UNOPS will conduct it own awareness for its GRM in the vicinity of the site.

The GRM details will are also published on the MoH website indicating a phone number, email address and physical address for further information (see below). The GRM is represented in simple visual formats as well as in Somali dialects, as needed.

The GRM includes an appeals process if the complainant is not satisfied with the proposed resolution of the complaint. Once all possible means to resolve the complaint have been proposed and if the complainant is still not satisfied, then he/she should be advised of his/her right to legal recourse. Anonymous grievances can be raised and addressed.

Uptake channels include:
- *Toll-free telephone hotline/Short Message Service (SMS) line.*
- *E-mail.*
- *Letter to Grievance Focal Points at local health facilities and vaccination sites.*
- *Complaint form to be lodged via any of the above channels; and*
- *Walk-ins may register a complaint on a grievance logbook at healthcare facility or suggestion box at clinic/ hospitals.*

To avoid the risk of stigmatisation, exacerbation of the mental/psychological harm and potential reprisal, the GRM has different channels and protocols to enable a confidential and sensitive approach to GBV/SEAH related cases that ensures the safety of survivors and enables survivor-centred care. Women, girls and other at-risk groups often have less access to information and available services. They are also more likely to receive inaccurate information due to existing unequal power structures and/or create opportunities for exploitation. Specifically, targeted information campaigns, radio and other means of communication modalities will be used. The information shared includes messages on GBV/SEAH risks related to the Project and potential response services.

The Project will identify clear channels for reporting as well develop tools to track complaints related to GBV/SEAH. Where such a case is reported to the GRM, actions taken will ensure confidentiality, safety and survivor-centred care for survivors. Any survivors reporting through the GRM are offered immediate referral to the appropriate service providers based on their preference and with informed consent, such as medical, psychological and legal support, emergency accommodation, and any other necessary services. Project workers will also have the right to lodge complaints related to GBV/SEAH through the GM operator, with any supervisor at any level, with the IP in the case of a subcontractor, or directly with the PCIU. All personnel shall be trained appropriately in receiving such cases and in providing appropriate referrals. Only the nature of the complaint (what the complainant says in her/his own words), whether the complainant believes the perpetrator was associated with Project and additional demographic data, such as age and gender, will be collected and reported, with informed consent from the survivor. If the survivor does not wish to file a formal complaint, referral to available services will still be offered. The preference of the survivor will be recorded, and the case will be considered closed. Recorded GBV/SEAH cases should be reported to the World Bank project team within 24 hours.

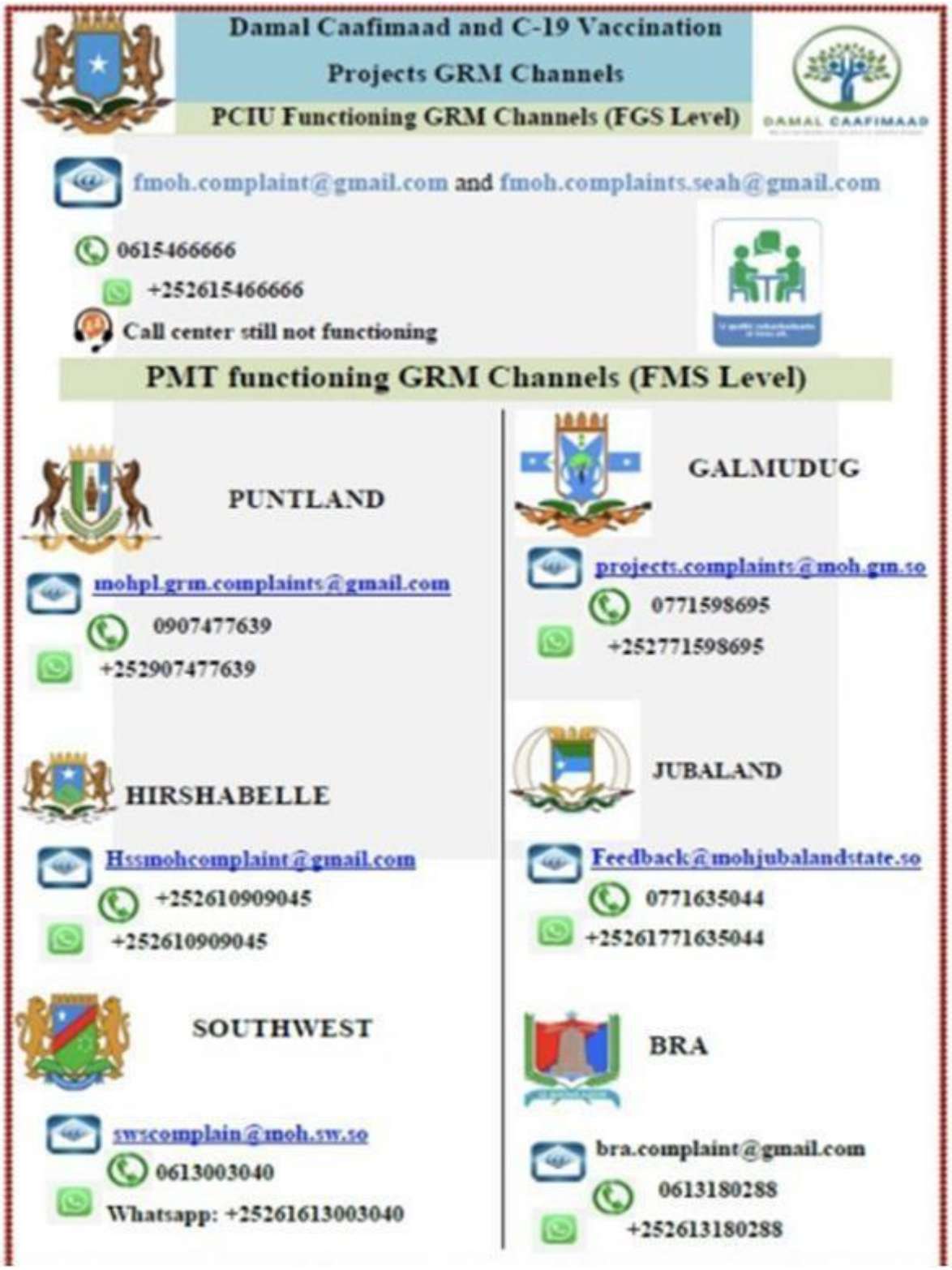

Figure 16 GRM contacts

12. Implementation Budget

Table 5 Implementation Budget

	Required Resources	Costs
UNOPS – Monitoring of ESMP		
1.	Human Resources: 1 E&S/EHS Specialist (50 percent of time)	UNOPS staff costs
3.	1 Security Specialist (20 percent of time)	UNOPS staff costs
4.	Logistics / Travel	UNOPS travel budget
5.	ESMP monitoring costs	UNOPS budget
6.	GRM Costs	UNOPS budget
Implementation of Risk Mitigation Measures Contractor		
7.	Human Resources 1 EHS Specialist x 4 months	Bidder to assess and estimate
8.	Cost of PPE	Bidder to assess and estimate
9.	Costs of machines and equipment	Bidder to assess and estimate
10.	Cost of OHS and other mitigation measures and Training	Bidder to assess and estimate
11.	Demolition and Construction Waste Disposal	Bidder to assess and estimate
12.	Safety Signages	Bidder to assess and estimate
13.	Community engagement	Bidder to assess and estimate
14.	Latrines	Bidder to assess and estimate

Annex 1: Community Consultations: Stakeholders Consulted

Meeting Minutes - Dhusamareeb Hospital Initial Assessment

Date: 27th, 28th and 29th /Nov/2023
Section One: District Level Stakeholders
Attendees:

- Dr. Abuukar Ali, Director General of Dhusamareeb Hospital
- Dr. Yahya Ali Bare, Secretary and Supervisor of the OT
- Dr. Abdi Wali, Director General of the Ministry of Health of Galmudug State
- Dr. Yasin Abdi, MoH in Galmud State

Agenda:

- Current role of organizations/Ministry in health provision
- Current challenges in health provision
- Recommendations for strengthening health service delivery
- Assessment of suggested hospital rehabilitation
- Anticipation of environmental and social risks
- Impact on land ownership and livelihoods
- Suggestions for effective grievance redress mechanism
- Additional stakeholders to be consulted
- Closing:

The meeting concluded with a consensus on the importance of the hospital rehabilitation project and a commitment to addressing the identified challenges and risks.

Table 6 Participants of Stakeholder Meeting on 28, 29 and 30 November 2023 (1/2)


Stakeholder contact record

Table 7 Participants of Stakeholder Meeting on 28, 29 and 30 November 2023 (2/2)


Stakeholder contact record

Meeting Minutes - Dhusamareeb Hospital Concept Design

Date: 02 July 2024

Attendees:

1. Dr. Abdiwali Ahmed Mohamed- DG MOH
2. Dr. Salad Halane- SHSS Advisor
3. Dr. Abukar Ali Farah- Hospital Director
4. Solomon Gebremedhin-UNOPS PM
5. Ala Arman- UNOPS
6. Abdishakur Abdullahi- UNOPS PE
7. Lul Hassan Salad-Community member
8. Safiyo Mumin Hassan-Community member
9. Dahabo Adan Mohamud-Community member
10. Ubah Hassan Ugas-Community member
11. Abdihakin Yasin Abtidoon-Community member
12. Mohamed Abdi Jimale- Community member
13. Mohamed Ciye Mohamed-Community member
14. Said karshe Aden
15. Omar Abdullahi Arab
16. Sheikh Abdiweli Haaji Diiriye
17. Abdullahi Mohamud Maalin
18. Jamal Abdishakur Mohamud

Introductions, Opening remarks and Meeting Overview

The meeting was chaired by the Director-General, Dr. Abdiwali Ahmed and commenced by appreciating all in attendance for making time to attend the meeting to resolve the outstanding issues.

The chairman warmly welcomed all and expressed his gratitude to all the hospital community members and the Hospital Director for their swift organization of the event and their presence on such short notice.

He extended special thanks to the UNOPS team for traveling to Dusamareb, Galmudug, to engage in final community consultations and to present the proposed final designs for the construction and renovation of new sections at the Dusamareb State Referral Hospital.

Dr. Abdiwali highlighted the significance of this project, which is part of the COVID-19 funds program. Under this project, contracted by the Federal Ministry of Health to UNOPS, there is a plan to construct six (6) new hospitals across all states of Somalia. He emphasized the critical role of community engagement and input in ensuring that the renovation efforts are led and owned by the community, reflecting their needs and aspirations.

Addressing the urgency of the timeline, Dr. Abdiwali requested the UNOPS team to expedite the preparation and finalization of the designs, bidding, and tender processes. He noted that the project is scheduled to end by December 31, 2025, leaving approximately a year and a half to complete the construction of the new hospital facilities.

Furthermore, Dr. Abdiwali encouraged the community members to actively participate in the discussion, to provide valuable insights, and to seek clarifications on any aspect of the project. He stressed that this meeting was a crucial opportunity for all stakeholders to contribute effectively to the project's success.

Presentation of the concept (proposal) design

Solomon Gebremedhin provided an overview of the project and detailed the project's scope and the status of the project. He also introduced the design team to the meeting and detailed discussion on the requirements of the hospital, the priorities of the hospital, the location of the site for the priorities, preparatory works that can be done in parallel while the design proceeds were discussed.

Following the background briefing of the hospital, Ala Arman took the floor to delve into the proposed designs for the new sections of the hospital. He provided a detailed walkthrough of the architectural plans, highlighting key areas such as the emergency department, triage, inpatient services, kitchen, police rooms, standard operation theatre, waiting areas, cafeteria, and ample parking facilities. Each section was shown through detailed drawings, giving stakeholders a comprehensive view of the planned facilities.

Mr. Arman explained that a thorough assessment of the existing hospital structures had been conducted. The findings revealed that several older buildings are beyond repair and pose a risk of collapse, potentially endangering patients' safety. Consequently, these structures will require complete demolition followed by the construction of new facilities as part of this comprehensive project.
He also pointed out that not all buildings would need demolition. Structures in good condition, such as the cold chain section, the oxygen plant, the outpatient department, and the mosque, will be preserved and maintained. Furthermore, these areas will be enhanced with landscaping and fully paved with interlocking paving stones to improve aesthetics and functionality. Enough space for future expansion will be reserved during constructions. Increasing the emergency and inpatients hospital beds for at least 30 beds, expansion of inpatient section, and additional gender segregated latrines and constructing a new morgue room were among the key areas of concern from the community and UNOPS team have taken note of these requests and promised to do their best to accommodate community inputs and requests.

During the construction phase, adequate space will be reserved to allow for future expansions, ensuring that the hospital can adapt to increasing healthcare demands. Key enhancements will include the increasing of at least 30 beds to the inpatient sections. This expansion aims to significantly improve the hospital's capacity to manage higher patient volumes from referrals effectively.
Additionally, the construction plan includes the expansion of the inpatient section and the addition of gender-segregated latrines to enhance privacy and accessibility. Responding to a critical need identified by the community, plans for constructing a new morgue room are also underway.

The UNOPS team has acknowledged these community concerns and requests, committing to incorporate them into the hospital design wherever feasible. They have pledged to make every effort to address these needs, reflecting the community's input in the final implementations.

- **Discussions, questions, and feedback**

Summary of key questions and concerns from the community:

1. Impact of Demolition- UNOPS to liaise with the hospital and the hospital to undertake preparations to address the concerns related to the demolition of old structures and its impact on hospital operations.
2. Capacity of Emergency and Inpatient Beds- Reevaluate the proposed number of beds to ensure adequacy for emergency and inpatient care and increase up to 30 beds.
3. Gender-Segregated Latrines- Plan the inclusion of additional gender-segregated latrines for the emergency department to enhance accessibility and privacy.
4. Patient Privacy Measures-Discussed measures to ensure patient privacy, particularly in bed arrangements and ward designs.
5. Expansion of Emergency Section- Consider increasing space in the emergency section to accommodate a larger number of referral patients from the state in as much as the budget allows.
6. Preservation of the Mosque- Confirm plans to maintain the existing mosque within the hospital premises.
7. Standardisation Across New Sections- Ensure that all new sections of the hospital meet standardisation criteria for healthcare facilities.
8. UNOPS was requested for contributions. However, this was clarified that UNOPS is an agency that works on cost recovery and implements projects based on agreed budget and scope.
9. UNOPS will ensure strong foundation of the building that can accommodate additional one more floor in the future.

- **AOB**

Finally, Director-General Abdiwali concluded the discussions and officially closed the meeting. In a subsequent side meeting between the Ministry of Health (MOH) and UNOPS, the following action points were agreed upon

Action Points:

#	Action point	Responsible Person	Deadline
1	The Ministry of Health will send the draft meeting minutes to UNOPS for review and input.	Dr. Abdiwali	Done
2	The UNOPS project team and engineers will reassess the current proposal and designs, incorporating all feedback and requests from the community and the Ministry of Health. They will then submit the revised version to Galmudug MoH for final review and approval .	UNOPS	As soon as possible
3	The Ministry of Health will compile and deliver written comments and community feedback to UNOPS for incorporation into concept proposal design.	Dr. Abdiwali	Done.
4	The UNOPS project team will expedite the bidding and tender process to initiate construction work without delay.	UNOPS	As soon as the detailed design is approved

Meeting and site Visit Photos

The Meeting was concluded at 8:30 p.m.

Annex 2: Environmental and Social Monitoring Template

This annex presents a template that should be used for the E&S monitoring process by the UNOPS E&S team. This template will be based on the EMSP Table above, it will list all the above-mentioned risks and impacts, mitigation measures, indicators, responsibilities, monitoring frequency as per the table above. Prior to the commencement of the works, targets will be added to the indicators, after consultation with the contractors. The findings and observation column will be filled upon reviews, supervision and inspection as well as based on reporting by the contractors. The corrective action column will be filled in when non-compliances have been discovered, and corrective actions have been agreed on jointly with the contractor.

Table 8 Environmental and Social Monitoring Template

Risks and Impacts	*Mitigation Measures*	*Indicators*	*Responsibility*	*Monitoring Frequency*	*Findings/Observations*	*Corrective Action*

Annex 3: Code of Conduct for Workers

I, _____acknowledge that adhering to environmental, social, health and safety (ESHS) standards, following the project's occupational health and safety (OHS) requirements, and preventing gender-based violence (GBV) and violence against children (VAC) is important. All forms of GBV or VAC are unacceptable in the workplace or when interacting with communities. The organization considers that failure to follow ESHS and OHS standards or to partake in GBV or VAC activities, constitute acts of gross misconduct and are therefore grounds for sanctions, penalties or potential termination of employment. Prosecution of those who commit GBV, or VAC may be pursued if appropriate.

I agree that while working on the project I will:

- Attend and actively partake in training courses related to ESHS, OHS, HIV/AIDS, GBV and VAC as requested by my employer.
- Follow my employers' guidance on prevention of the spread of infectious diseases, including Covid 19;
- Follow my employers' guidance on security and safety, including not causing conflict or exposing myself, other colleagues, stakeholders including community members, project facilities or assets to risks;
- Treat women, children (persons under the age of 18), and men with respect regardless of race, color, language, religion, political or other opinion, national, ethnic or social origin, property, disability, birth or other status.
- Not use language or behavior towards women, children or men that is inappropriate, harassing, abusive, sexually provocative, demeaning or culturally inappropriate.
- Not participate in sexual contact or activity with children (anyone age 18 or under) – including grooming or contact through digital media. Mistaken belief regarding the age of a child is not a defense. Consent from the child is also not a defense or excuse.

Not engage in any form of sexual harassment of a co-worker - for instance, making unwelcome sexual advances, requests for sexual favors, and other verbal or physical conduct, of a sexual nature, including subtle acts of such behavior. E.g. Looking somebody up and down; kissing, howling or smacking sounds; hanging around somebody; whistling and catcalls; giving personal gifts; making comments about somebody's sex life etc. Sexual harassment constitutes acts of serious misconduct and are therefore grounds for disciplinary measures, including summary dismissal.

- Not engage in any form of sexual exploitation or abuse – for instance, exchanging money, employment, goods or services for sex or sexual favors, or making promises or favorable treatment dependent on sexual acts – or other forms of humiliating, degrading or exploitative behavior. This includes any project-related assistance due to community members. Sexual exploitation and sexual abuse constitute acts of serious misconduct and are therefore grounds for disciplinary measures, including summary dismissal.
- Not engage in sexual misconduct, use the project resources or funds to exploit community members.
- Report any suspected or actual GBV or VAC by a fellow worker, whether employed by my organization or not or any breaches of this Code of Conduct through the reporting
- mechanism.

The standards set out above are not intended to be an exhaustive list. Other types of sexually exploitive or sexually abusive behaviour may be grounds for administrative action. With regard to children under the age of 18:

- Wherever possible, ensure that another adult is present when working in the proximity of children.
- Not invite unaccompanied children unrelated to my family into my home unless they are at immediate risk of injury or in physical danger.
- Use any computers, mobile phones, or video and digital cameras appropriately, and never to exploit or harass children or to access child pornographic material through any medium (see also "Use of children's images for work-related purposes" below).
- Refrain from physical punishment or discipline of children.
- Refrain from hiring children for domestic or other labor, which is inappropriate given their age or developmental stage, which interferes with their time available for education and recreational activities or places them at significant risk of injury.
- Comply with all relevant local legislation, including labor laws in relation to child labor.
- Use of children's images for work-related purposes
- When photographing or filming a child for work-related purposes, I must:
- Before photographing or filming a child, assess and endeavor to comply with local traditions or restrictions for reproducing personal images.
- Before photographing or filming a child, obtain informed consent from the child and a parent or guardian of the child. As part of this I must explain how the photograph or film will be used.
- Ensure photographs, films, videos and DVDs present children in a dignified and respectful manner and not in a vulnerable or submissive manner. Children should be adequately clothed and not in poses that could be seen as sexually suggestive.
- Ensure images are honest representations of the context and the facts.
- Ensure file labels do not reveal identifying information about a child when sending images electronically.
- Sanctions
    - I understand that if I breach this Individual Code of Conduct, my employer will take disciplinary
      action, which could include:
    - Informal warning.
    - Formal warning.
    - Additional training.
    - Loss of up to one week's salary.
    - Suspension of employment (without payment of salary), for a minimum period of 1 month up to a maximum of 6 months.
    - Termination of employment; and
    - Report to the police if warranted.

I hereby acknowledge that I have read the foregoing Individual Code of Conduct, agree to comply with the standards contained therein and understand my roles and responsibilities to prevent and respond to ESHS, OHS, GBV and VAC issues. I understand that any action inconsistent with this Individual Code of Conduct or failure to take action mandated by this Individual Code of Conduct may result in disciplinary action and may affect my on-going employment.

Signature: _____Name_____
Title: _____Date: _____

Annex 4: Chance Find Procedures

This procedure was developed in accordance with the World Bank's ESS8 (to protect cultural heritage from the impacts of project activities and support its preservation, to address cultural heritage as an integral aspect of sustainable development, to promote meaningful consultation with stakeholders regarding cultural heritage. To promote the equitable sharing of benefits from the cultural heritage).

This procedure is included as a standard provision in the implementation of Public Works contracts to ensure the protection of cultural heritage (Archaeological and Historical Sites). All implementers / contractors will be required to observe this procedure as documented hereafter.

Excavation in sites of known archaeological interest should be avoided. Where this is unavoidable, prior discussions must be held with the PIU and the World Bank in order to undertake pre-construction excavation or assign an archaeologist to log discoveries as construction proceeds. Where historical remains, antiquity or any other object of cultural or archaeological importance are unexpectedly discovered during construction in an area not previously known for its archaeological interest, the following procedures should be applied:

- Stop construction activities;
- Delineate the discovered site area;
- Secure the site to prevent any damage or loss of removable objects. In case of removable antiquities or sensitive remains, a full-time guard should be present until the responsible authority takes over;
- Notify the responsible foreman, who in turn should notify the PIU and the World Bank and local authorities (within less than 24 hours);
- The significance and importance of the findings will be assessed according to various criteria relevant to cultural heritage including aesthetic, historic, scientific or research, social and economic values;
- Decision on how to handle the finding will be reached based on the above assessment and could include changes in the project layout (in case of finding an irrevocable remain of cultural or archaeological importance), conservation, preservation, restoration or salvage;
- Implementation of the decision concerning the management of the finding;
- Construction work can resume only when permission is given from the respective authorities, PIU and World Bank after the decision concerning the safeguard of the heritage is fully executed
- In case of delay incurred in direct relation to archaeological findings not stipulated in the contract (and affecting the overall schedule of works), the contractor may apply for an extension of time. However, the contractor will not be entitled for any kind of

compensation or claim other than what is directly related to the execution of the archaeological findings works and protections.

Annex 5: E&S Screening Results

This E&S screening form was completed in view of the sub-project design.

Subproject Name	Galgadud Regional Hospital Hospital, GALMUDUG STATE of Somalia
Subproject Location	Dhusamareeb
Subproject Proponent	
Estimated Investment	US$1.87 million
Start/Completion Date	Feb 2025 - Oct 2025

Questions	Answer		ESS relevance	Due diligence Actions
	Yes	no		
Does the subproject involve civil works including new construction, expansion, upgrading or rehabilitation of healthcare facilities, vaccine cold storage units and/or waste management facilities?	yes		ESS1	ESIA/ESMP, SEP
Does the subproject involve land acquisition and/or restrictions on land use?		No	ESS5	
Does the subproject involve acquisition of assets for quarantine, isolation or medical treatment purposes?	Yes		ESS5	ESIA/ESMP, SEP

Is the subproject associated with any external waste management facilities such as a sanitary landfill, incinerator, or wastewater treatment plant for healthcare waste disposal?	Yes	No	ESS3	ESIA/ESMP, SEP Septic tank on site
Is there a sound regulatory framework and institutional capacity in place for healthcare facility infection control and healthcare waste management?		No	ESS1	ESIA/ESMP, SEP
Does the subproject have an adequate system in place (capacity, processes and management) to address waste?	Yes			
Does the subproject involve recruitment of workers including direct, contracted, primary supply, and/or community workers?	Yes		ESS2	LMP, SEP
Does the subproject have appropriate OHS procedures in place, and an adequate supply of PPE (where necessary)?	Yes			SEP
Does the subproject have a GRM in place, to which all workers have access, designed to respond quickly and effectively?		No		GRM, ESMP, SEP
Does the subproject involve transboundary transportation (including Potentially infected specimens may be transported from healthcare facilities to		No	ESS3	ESIA/ESMP, SEP

testing laboratories, and transboundary) of specimen, samples, infectious and hazardous materials?				
Does the subproject involve use of security or military personnel during construction and/or operation of healthcare facilities and related activities?	Yes		ESS4	ESIA/ESMP, SEP, SMP
Is the subproject located within or in the vicinity of any ecologically sensitive areas?		No	ESS6	ESIA/ESMP, SEP
Are there any indigenous groups (meeting specified ESS7 criteria) present in the subproject area and are they likely to be affected by the proposed subproject negatively or positively?		No	ESS7	Indigenous Peoples Plan/other plan reflecting agreed terminology
Is the subproject located within or in the vicinity of any known cultural heritage sites?		No	ESS8	ESIA/ESMP, SEP
Does the project area present considerable Gender-Based Violence (GBV) and Sexual Exploitation and Abuse (SEA) risk?	Yes		ESS1	ESIA/ESMP, SEP
Does the subproject carry risk that disadvantaged and vulnerable groups may have unequitable access to project benefits?	Yes		ESS1	ESIA/ESMP, SEP Low risk
Is there any territorial dispute between two or more countries in the subproject and its ancillary aspects and related activities?		No	*OP7.60 Projects in Disputed*	Governments concerned agree

			Areas	
Will the subproject and related activities involve the use or potential pollution of, or be located in international waterways[38]?		No	*OP7.50 Projects on International Waterways*	Notification (or exceptions)

Conclusions:

1. **Proposed Environmental and Social Risk Ratings (High, Substantial, Moderate or Low). ESMP will be required**

2. **Proposed E&S Management Plans/ Instruments - ESMP will be required**

Annex 6: Emergency Preparedness and Response Plan

During construction, and as the hospital enters its operational phase, an "***Emergency Preparedness and Response Plan"*** (EPRP) is essential to ensure safety, efficiency, and resilience in handling emergencies. This plan focuses on preparedness, response, and recovery measures for Galgadug Regional Hospital's specific context, in alignment with international best practices, ensuring that the hospital is resilient and well-prepared for emergencies, enhancing patient and staff safety while ensuring continuity of healthcare services.

Emergency Risk Assessment

This risk assessment identifies potential hazards based on Galgadug Regional hospital's location, infrastructure, and operational environment.

Overview of Risks, Impact Levels and Mitigation Measures

Risk Category	Potential Hazards	Impact Level	Mitigation Measures
2.1 Natural Disasters	Earthquakes, floods, droughts	High	Seismic reinforcement, flood barriers, emergency water supply
2.2 Fire Hazards	Electrical faults, flammable materials	High	Fire alarms, extinguishers, evacuation routes
2.3 Health Emergencies	Disease outbreaks (cholera, COVID-19, malaria)	High	Infection control, isolation units, vaccination programs
2.4 Security Threats	Armed conflict, terrorism, theft	High	Perimeter security, emergency lockdown procedures
2.5 Technological Failures	Power outages, IT system failure	Medium	Backup generators, redundant IT systems

Emergency Preparedness Measures

Preparedness ensures that Galgadug Regional hospital is equipped to handle emergencies effectively

Overview of Emergency Preparedness Measures for Galgadug Regional Hospital

Preparedness Component	Measures Implemented
3.1 Emergency Response Team (ERT)	Establishes a trained multidisciplinary team for rapid response
3.2 Training & Drills	Conducts regular fire drills, CPR training, and active shooter drills
3.3 Early Warning Systems	Installs alarms for fire, biohazards, and security threats
3.4 Medical Supplies	Maintains emergency stockpiles (medications, PPE, oxygen)
3.5 Evacuation Planning	Develops and posts clear evacuation routes
3.6 Emergency Communication	Implements radio and satellite phone backup communication

3.7 Community Engagement	Engages with local authorities for coordinated response

Emergency Response Protocols

This section outlines actions during emergencies based on the type of incident.

Overview of Emergency Response Protocols for Galgadug Regional Hospital

Emergency Type	Response Steps	Details
4.1 Fire Response	4.1.1 **Alert**	Activate fire alarm and notify the Fire Department.
	4.1.2 **Evacuate**	Follow designated exit routes and use stairwells.
	4.1.3 **Contain**	If safe, use fire extinguishers to control small, manageable fires.
	4.1.4 **Assist**	Help vulnerable patients evacuate safely.
	4.1.5 **Assess & Report**	Document incident(s) and review fire safety measures.
4.2 Disease Outbreak Response	4.2.1 **Detection**	Isolate symptomatic patients and notify public health authorities.
	4.2.2 **Containment**	Implement infection control protocols (PPE, sanitation, restricted access).
	4.2.3 **Treatment**	Provide medical care based on protocols (antivirals, antibiotics, IV fluids).
	4.2.4 **Communication**	Issue public health advisories and coordinate with the Ministry of Health.
	4.2.5 **Recovery**	Conduct decontamination and review hospital's policies.
4.3 Security Threat Response	4.3.1 **Lockdown**	Secure all hospital entrances and limit movement.
	4.3.2 **Alert Authorities**	Notify police/ military for assistance.
	4.3.3 **Patient & Staff Safety**	Move non-essential personnel to safe areas.
	4.3.4 **Incident Management**	Coordinate security response and debrief staff.
	4.3.5 **Post-Incident Review**	Assess security vulnerabilities and improve protocols.

Recovery and Business Continuity

Post-emergency recovery ensures a smooth return to normal hospital operations.

Overview of Post-emergency Recovery Actions for Galgadug Regional Hospital

Recovery Phase	Actions
5.1 Damage Assessment	Identify affected hospital areas and necessary repairs
5.2 Patient Care Continuity	Arrange temporary care facilities if needed

5.3 Staff Support	Provide psychological/ psychosocial first aid for affected personnel
5.4 Infrastructure Restoration	Restore power, water, and medical supplies
5.5 Policy Review	Update emergency protocols based on lessons learned

Summarised Schedule of Coordination with External Agencies

The table below outlines the structured coordination with external emergency response agencies under the Benadir Regional Administration framework, and is intended to ensure efficient emergency response, reduce response time, and enhance Galgadug Regional Hospital's preparedness to handle health crises effectively.

Coordination Schedule for Galgadug Regional Hospital with External Agencies

Agency	Role	Coordination Frequency	Formal Agreement
Regional Health Office	Supervision and outbreak response coordination.	Quarterly & during emergencies	MoU with Ministry of Health
Fire and Rescue Department	Fire safety, emergency evacuation, and fire drills.	Bi-annual training & drills	Emergency Response Protocol
Ambulance Service	Patient transfer and emergency medical support.	As needed & annual review	Service Agreement
Police Force	Security support during emergency responses and hospital safety.	Monthly review meetings	Security Collaboration Agreement
WHO & UN Agencies	Technical support for infection prevention and control.	Annual assessment & emergency responses	UN Coordination Framework
Environmental Health Department	Waste management and environmental health inspections.	Quarterly audits	Compliance MoU

Key Actions:

Annual review of agreements with external agencies to ensure effectiveness.
Joint simulation exercises with emergency responders every six months.
Centralized emergency response hotline to facilitate rapid response.

Emergency Evacuation Plan (EEP) for Galgadug Regional Hospital

Introduction

The Emergency Evacuation Plan (EEP) for the Hospital ensures the safe, rapid, and coordinated evacuation of all individuals in the event of a fire, security threat, natural disaster, or other emergency. This plan aligns with regional risks specific to the Region, including security challenges and limited emergency response capacity.

Objectives

Objectives of the Emergency Evacuation Plan (EEP) for the Hospital

Objective	Description
Safe Evacuation	Ensure all patients, staff, and visitors evacuate quickly and safely.
Minimize Panic	Implement structured procedures to avoid confusion during emergencies.
Assist Vulnerable Groups	Provide priority evacuation for ICU, maternity, and disabled patients.
Coordination with Emergency Services	Ensure seamless interaction with fire, ambulance, and police services.
Regular Drills	Conduct scheduled drills to maintain high preparedness levels.

Evacuation Procedures

Overview of the 4-Step Evacuation Procedure for the Hospital

Step	Action
Step 1: Alert & Notification	Activate alarms and notify emergency services.
Step 2: Staff Response & Coordination	Assign personnel to assist with patient movement.
Step 3: Evacuation & Assembly	Guide evacuees to designated **safe zones** outside the hospital.
Step 4: Headcount & Reporting	Conduct roll calls and report missing individuals.

Evacuation Routes & Exits

Overview of the Proposed Evacuation Routes & Exits for the Hospital

Element	Specification
Exit Signage	Clearly marked, illuminated, and unobstructed.
Stairwell Access	NO elevator use during fire/ power failures. Wide staircases prioritized.
Assembly Points	Pre-designated areas away from the hospital for regrouping.

Evacuation for Special Needs Patients

Overview of the Proposed Evacuation Protocols for Special Needs Patients

Category	Evacuation Plan
Non-Ambulatory (ICU, Disabled)	Use **stretchers and wheelchairs**, assigned evacuation teams.
Critical Care Patients	Immediate transfer with **life support assistance**.
Maternity & Pediatric Patients	Nurses assist **mothers with newborns** for safe relocation.
Visitors & General Staff	Directed to the **nearest exits** by security personnel.

Coordination with External Agencies

Overview of Evacuation Coordination Measures with External Agencies

Agency	Role in Evacuation	Coordination Frequency
Mogadishu Fire & Rescue Service	Fire suppression, rescue operations, hazard control.	Bi-annual training & drills.
Benadir Ambulance Service	Emergency transport for critical patients.	On-demand response.
Mogadishu Police	Security management, crowd control, protection.	Quarterly security drills.
Benadir Regional Health Office	Medical support coordination, outbreak control.	Annual review.

Emergency Drills & Training

Overview of Emergency Drills & Trainings

Activity	Frequency	Responsible Team
Full Evacuation Drill	Twice a year	Emergency Response Team (ERT)
Fire Safety Training	Quarterly	Fire & Rescue Service
Security Threat Response Drill	Every 6 months	Mogadishu Police
Evacuation Route Updates	Annually	Hospital Safety Committee

Emergency Equipment & Communication

Overview of Emergency Equipment and Communication Infrastructure for the Hospital

Equipment	Location	Maintenance Frequency
Fire Extinguishers	Every hospital wing	Monthly inspections
Emergency Lighting	Stairwells, corridors	Quarterly maintenance
First Aid Kits	Nurses' stations, exits	Bi-monthly replenishment
Emergency Call System	All hospital wards	Monthly system test
Evacuation Maps	Posted in hallways	Reviewed annually

Post-Evacuation Procedures

Overview of Post-Evacuation Procedures for the Hospital

Action	Responsibility
Headcount & Accountability	Supervisors confirm all evacuees are accounted for.
Medical Assessments	Emergency medical teams treat injuries.
Incident Report & Review	Management documents events for process improvement.
Debriefing Sessions	Staff feedback gathered to enhance future responses.

Fire Safety Equipment Inspection and Maintenance Schedule

This section outlines minimum requirements for fire extinguishers, fire alarm systems, and associated safety devices. All inspections must be documented in the Fire Safety Logbook and reported to the Safety and Security Officer.

1. Fire Extinguishers

1.1 Monthly Visual Inspection

- Verify extinguishers are present, mounted properly, and unobstructed.
- Check pressure gauge is in the operable range.
- Ensure safety pin and tamper seal are intact.
- Confirm no visible damage, corrosion, leakage, or blocked nozzle.
- Record inspection date, initials, and any noted deficiencies.

1.2 Annual Maintenance (by certified technician)

- Conduct full mechanical inspection and internal condition assessment.
- Weigh extinguishers (if applicable) to verify correct charge.
- Replace tamper seals and clean equipment.
- Repaint or replace damaged labels and operating instructions.
- Perform hydrostatic testing according to manufacturer's schedule (typically every 5 years).

2. Fire Alarm and Detection Systems

2.1 Weekly/Monthly Checks

- Confirm control panel shows normal operation (no trouble signals).
- Test manual call points/alarms on a rotating schedule to avoid disruption.
- Inspect smoke/heat detector locations for dust, obstruction, or damage.

2.2 Quarterly Testing

- Test a representative sample of smoke detectors, heat detectors, and notification devices (sirens, strobes).
- Verify battery backup functionality.

2.3 Annual System Test (by qualified technician)

- Full functional test of all detectors, alarm circuits, annunciator panels, and communication links.
- Clean smoke detectors following manufacturer instructions.
- Document all faults and corrective actions.

3. Emergency Lighting and Exit Signs

Monthly Inspection

- Check lights and signs for proper illumination.
- Ensure batteries or backup power systems are operational.

Annual Test

- Conduct a full 90-minute discharge test of emergency lighting systems.

4. Fire Hose Reels, Hydrants, and Sprinkler Systems (if present)

Monthly

- Confirm equipment is accessible and free of obstruction.
- Check hoses, nozzles, valves, and fittings for visible wear.

Annual (or per manufacturer standard)

- Pressure-test hose reels and hydrants.
- Inspect pumps, tanks, and sprinkler valves.
- Conduct flow tests and verify adequate water pressure.

5. Documentation and Reporting

- All inspections should be recorded using standardized forms.
- Any deficiencies must be reported immediately to the Safety Officer and corrected within agreed timelines.
- Maintain maintenance records for a minimum of 5 years or as required by hospital policy.

Annex 7: Occupational Health and Safety Plan

The purpose of this OHS Plan is to provide guidance for the systematic identification, evaluation, prevention and control of general workplace hazards, specific job hazards, potential hazards and environmental impacts that may arise during the implementation of the hospital rehabilitation. The measures are based on the IFC's Environmental, Health and Safety Guidelines (EHSG).

This plan shall be followed by all workers of the sub-project.

Types of Incidents & Their Reporting: The three categories of Incident are as follows:

Non-Reportable Cases: An incident where the injured person is given medical help and discharged for work without counting any lost time.

Reportable Cases: In this case the injured person is disabled for 48 hours or more and is not able to perform his duty.

Injury Cases: These are covered under the heading of non-reportable cases. In these cases, the incident caused injury to the person, but he/she still continues his duty.

HSE ORGANIZATION

Number of Safety Officers: The contractor must deploy one safety officer. In addition, there must be one safety-steward/safety-supervisor for every 100 workers.

Responsibilities

Site In -Charge of Contractor

- Shall engage qualified safety officer(s) and steward (s) as per clause;
- Shall adhere to the rules and regulations mentioned in this code, practice very strictly in his area of work in consultation with his concerned engineer and the safety coordinator;
- Shall screen all workers for health and competence requirement before engaging for the job and periodically thereafter as required;
- Shall not engage any employee below 18 years of age;
- Shall arrange for all necessary PPEs like safety helmets, belts, full body harness, shoes, face shield, hand gloves etc. before starting the job;
- Shall ensure that no person lifts, carries or move any load which, by reason of its weight, is likely to injure his health or jeopardize his safety;
- Shall ensure that all Tools & Plants (T&Ps) engaged are tested for fitness and have valid certificates from competent person;

- Shall ensure that provisions for the welfare of the employees such as canteen, rest rooms/washing facilities are provided for at the site;
- Shall adhere to the instructions laid down in Operation Control Procedures (OCPs) available with the site management;
- Shall ensure that person working above 2.0 meter should use Safety Harness tied to a lifeline/stable structure;
- Shall ensure that materials are not thrown from height. Cautions to be exercised to prevent fall of material from height;
- Shall report all incidents (Fatal/Major/Minor/Near Miss) to the Site engineer /HSE officer;
- Night work is forbidden;
- Shall ensure that all personnel working under contractor are working safely and do not create any Hazard to self and to others;
- Shall ensure display of adequate signage/posters on OHS;
- Shall ensure conductance of OHS audit, mock drills, medical camps, induction training and training on OHS at site;
- Shall ensure full co-operation during OHS audits;
- Shall ensure submission of look-ahead plan for procurement of HSE equipment's and PPEs as per work schedule;
- Shall ensure good housekeeping;
- Shall ensure adequate valid fire extinguishers are provided at the worksite;
- Shall ensure availability of sufficient number of toilets /restrooms and adequate drinking water at work site and labor colony;
- Shall ensure adequate emergency preparedness;
- Shall be member of site OHS committee and attend all meetings of the committee;
- Temporary fencing should be done for open edges if Hand – railings and Toe-guards are not available.

Health, Safety and Environment Officer of Contractor

- Carry out safety inspection of Work Area, Work Method, workers, Machine & Material, processes and materials and other tools;
- Facilitate inclusion of safety elements into Work Method Statement;
- Highlight the requirements of safety through toolbox talks/ other meetings;
- Help concerned heads of sections to prepare Job Specific instructions for critical jobs;
- Conduct investigation of all incident/dangerous occurrences & recommend appropriate safety measures;
- Advice & co-ordinate for implementation of HSE permit systems;
- Convene HSE meeting & minute the proceeding for circulation & follow-up action;
- Plan procurement of PPE & Safety devices and inspect their healthiness;
- Report to OHS specialist on all matters pertaining to status of safety and promotional program at site level;
- Facilitate administration of First Aid;
- Facilitate screening of workmen and safety induction;
- Conduct fire Drill and facilitate emergency preparedness;

- Design campaigns, competitions & other special emphasis programs to promote safety in the workplace;
- Notify site personnel non-conformance to safety norms observed during site visits / site inspections;
- Recommend to Site In-Charge, immediate discontinuance of work until rectification of such situations warranting immediate action in view of imminent danger to life or property or environment;
- To decline acceptance of such PPE / safety equipment that do not conform to specified requirements;
- Encourage raising Near Miss Report on safety along with, improvement initiatives on safety.

Mobilization of Machinery/Equipment/Tools by Contractor: As a measure to ensure that machinery, equipment and tools being mobilized to supplier or consultant are fit for purpose and are maintained in safe operating condition and complies with legislative and owner requirement, inspection shall be arranged by in-house competent authority for acceptance as applicable.

Mobilization of Personpower by Contractor

- The Contractor shall arrange induction and regular health check of their employees as per requirement in the Labor Code.
- The Contractor shall take special care of the employees affected with occupational diseases. The employees not meeting the fitness requirement should not be engaged for such a job.
- Ensure that the regulatory requirements of excessive weight limit (to carry/lift/ move weights beyond prescribed limits) for male and female workers are complied with.
- Appropriate accommodation to be arranged for all workers in hygienic condition.

Provision of PPEs: PPEs, in adequate numbers, will be made available at site & their regular use by all concerned will be ensured.

- All the PPEs shall be checked for their quality before issue and the same shall be periodically checked. The users shall be advised to check the PPEs themselves for any defect before putting them on. The defective ones shall be repaired/ replaced.

- The issuing agency shall maintain register for issue and receipt of PPEs.
- The helmets shall have logo or name (abbreviation of agency name permitted) affixed or printed on the front.

Drinking water: Drinking water shall be provided and maintained at suitable places at different elevations. Container should be labeled as “Drinking Water”

Washing Facilities: In every workplace, adequate and suitable facilities for washing shall be provided and maintained. Separate and adequate cleaning facilities shall be provided for the use of male and female workers. Such facilities shall be conveniently accessible and shall be kept in clean and hygienic condition and dully illuminated for night use.

Latrines and Urinals

- Latrines and urinals shall be provided in every workplace.
- They shall be adequately lit and shall be maintained in a clean and sanitary condition at all times, by appointing a designated person.
- Separate facilities shall be provided for the use of male and female worker if any.

Provision of Shelter During Rest: Proper Shed & Shelter shall be provided for rest during break.

Medical Equipment: To be available nearby/at site:

Medical Centre
First Aider
First Aid Box
Health Check Up

HSE Induction Training: All persons entering into the project site shall be given HSE induction training by the HSE officer of Contractor before being assigned to work**.**

In-house induction training subjects shall include but not limited to:

- Briefing of the Project details.
- Safety objectives and targets.
- Site HSE rules.
- Site HSE hazards and aspects.
- First aid facility.
- Emergency Contact No.
- Incident reporting.
- Fire prevention and emergency response.
- Rules to be followed in the camp
- Proper safety wear & gear must be issued to all the workers being registered for the induction (i.e., Shoes/Helmets/Goggles/Leg guard/Apron etc.)
- They must arrive fully dressed in safety wear & gear to attend the induction.

- Anyone failing to conform to this safety wear & gear requirement shall not qualify to attend.
- On completing attending Contractor's in-house HSE induction, each employee shall sign an induction training form to declare that he/she has understood the content and shall abide to follow and comply with safe work practices. They may only then be qualified to be issued with a personal I.D. card, for access to the work site

HSE Toolbox Talk: HSE toolbox talk shall be conducted by frontline foreman/supervisor of Contractor to specific work groups prior to the start of work. The agenda shall consist of the followings:

- Details of the job being intended for immediate execution.
- The relevant hazards and risks involved in executing the job and their control and mitigating measures.

- Specific site conditions to be considered while executing the job like high temperature, humidity, unfavorable weather etc.
- Recent non-compliances observed.
- Appreciation of good work done by any person.
- Any doubt clearing session at the end.
- Tool box talk to be conducted at least once a week for the specific work.

HSE Training During Project Execution

- Other HSE training shall be arranged by Contractor as per the need of the project execution and recommendation of HSE committee of site.
- The topics of the HSE training shall be as follows but not limited to:
    - Hazards identification and risk analysis (HIRA)
    - Work Permit System
    - Incident investigation and reporting
    - Fire fighting
    - First aid
    - Fire-warden training
    - T&Ps fitness and operation
    - Storage, preservation & material handling
    - A matrix shall be maintained to keep an up-to-date record of attendance of training sessions carried out.

HSE Promotion-signage, Posters, Competition, Awards etc

Display of HSE posters and banners: Site shall arrange appropriate posters, banners, slogans in local languages at workplace

Display of HSE signage: Appropriate HSE signage shall be displayed at the work area to aware workmen and passersby about the work going on and dos and don'ts to be followed

Competition on HSE and award: Contractor shall arrange HSE awareness program periodically on different topics including medical awareness for all personnel working at site

Incident Reporting: The Contractor shall submit report of all incidents, fires and property damage etc., not later than 24 hours of the occurrence. The Engineer shall report the same to the OHS Specialist immediately. Such reports shall be furnished in the manner prescribed by the implementer. (Refer to HSE procedure for incident investigation, analysis and reporting for details).

In addition, periodic reports on safety shall also be submitted by the Contractor to the implementer from time to time. Compiled monthly reports of all kinds of incidents, fire and property damage to be submitted to the Specialist as per prescribed formats.

HSE incidents of site shall be reported to the implementer site Management as per Procedure for Incident Investigation and Reporting. Corrective action shall be immediately implemented at the

workplace and compliance shall be verified by the implementer's OHS Specialist and until then, work shall be put on hold by the Construction Manager.

Work Permit System: "HSE Procedure for Work Permit System" shall be followed while implementing permit system.

- Permit applicant shall apply for work permit of particular work activity at particular location before starting of the work with Job Hazard Analysis.
- Permit signatory shall check that all the control measures necessary for the activity are in place and issue the permit to the permit holder.
- The permit holder shall implement and maintain all control measures during the period of permit. He will close the permit after completion of the work.
- The closed permit shall be archived in HSE Department of site.

Safety During Work Execution: Respective Operation Control Procedures are to be followed and adhered to and the same would be contractually binding.

Electrical Handling

- Providing an adequate number of 24 V sources and ensuring that no hand lamps are operating at voltage level above 24 Volts.
- Fulfilling safety requirements at all power tapping points.
- High/ Low pressure welders to be identified with separate color clothing. No welders will be deployed without passing appropriate tests and holding valid welding certificates. Approved welding procedure should be displayed at workplace.
- The Contractor shall not use any hand lamp energized by Electric power with supply voltage of more than 24 volts in confined spaces like inside water boxes, turbine casings, condensers etc.
- All portable electric tools used by the Contractor shall have a safe plugging system to source of power and be appropriately earthed. Only electricians licensed by appropriate statutory authority shall be employed by the Contractor to carry out all types of electrical works. Details of earth resources and their test date to be submitted to OHS specialist.
- The Contractor shall use only properly insulated and armored cables which conform to the requirement.

- The implementer reserves the right to replace any unsafe electrical installations, wiring, cabling etc. at the cost of the Contractor.
- All electrical appliances used in the work shall be in good working condition and shall be properly earthed.
- No maintenance work shall be carried out on live equipment.
- The Contractor shall maintain adequate number of qualified electricians to maintain his temporary electrical installations.
- Area wise Electrical safety inspection is to be carried out on monthly basis as per "Electrical Safety Inspection checklist' and the report is to be submitted to the implementer's safety officer

- Adequate precautions shall be taken to prevent danger to electrical equipment. No materials on any of the sites of work shall be so stacked or placed as to cause danger or inconvenience to any person or the public
- The Contractor shall carefully follow the safety requirement of the implementer/ the purchaser with regard to voltages used in critical areas.

Fire Safety

- Providing appropriate firefighting equipment at designated workplace and nominating a fire officer/warden adequately trained for his job.
- Contractor shall provide enough fire protection equipment of the types and numbers at his office, stores, temporary structure in labor colony etc. Such fire protection equipment shall be easy and kept open at all times.
- The fire extinguishers should be properly refilled and kept ready, which should be certified at periodic intervals. The date of change should be marked on the Cylinders.
- All other fire safety measures as laid down in the emergency preparedness and response plan shall be followed.
- Non-compliance with the above requirement under fire protection shall in no way relieve the Contractor of any of his responsibility and liabilities to a fire incident occurring either to his materials or equipment or those of others.
- Emergency contact numbers must be displayed at prominent locations
- Tarpaulin being inflammable should not be used (instead, only non-infusible covering materials shall be used) as protective cover while preheating, welding, stress relieving etc. at site.

Lifting Safety

- It will be the responsibility of the Contractor to ensure safe lifting of the equipment, taking due precaution to avoid any incident and damage to other equipment and personnel.
- All requisite tests and inspection of handling equipment, tools & tackle shall be periodically done by the Contractor by engaging only the Competent Persons as per law.
- Defective equipment or uncertified goods shall be removed from service.
- Any equipment shall be loaded more than its recommended safe working load.

Environmental Control: Environmental damage is a major concern of the principal Contractor and every effort shall be made, to have effective control measures in place to avoid pollution of Air, Water and Land and associated life. Chlorofluorocarbons such as carbon tetrachloride and trichloroethylene shall not be used. Waste disposal shall be done in accordance with the guidelines laid down in the Waste Management Plan. Any chemical, including solvents and paints, required for construction shall be stored in designated bonded areas around the site as per Material Safety Data Sheet (MSDS).

In the event of any spillage, the principle is to recover as much material as possible before it enters drainage system and to take all possible action to prevent spilled materials from running off the site. The Contractor shall use appropriate MSDS for clean-up technique.

All Contractors shall be responsible for the cleanliness of their own areas.

The Contractors shall ensure that noise levels generated by plant or machinery are as low as reasonably practicable. Where the Contractor anticipates the generation of excessive noise levels from his operations the Contractor shall inform the Construction Manager accordingly so that reasonable and practicable precautions can be taken to protect other persons who may be affected. The Contractor shall carry out periodic air and water quality check and illumination level checking in his area of workplace and take suitable control measure.

Housekeeping: Keeping the work area clean/ free from debris, removed scaffoldings, scraps, insulation/sheeting wastage /cut pieces, temporary structures, packing woods etc. will be in the scope of the Contractor. Such cleanings have to be done by Contractor on a daily basis by an identified group. If such activity is not carried out by Contractor is not satisfied, then the implementer may get it done by other agency and actual cost along with overheads will be deducted from contractor's bill. Such decisions shall be binding on the Contractor.

- Proper housekeeping to be maintained at workplace and the following are to be taken care of on a daily basis.
- All surplus earth and debris are removed/disposed of from the working areas to identified locations.
- Unused/Surplus cables, steel items and steel scrap lying scattered at different places/elevation within the working areas are removed to identified locations.
- All wooden scrap, empty wooden cable drums and other combustible packing materials, shall be removed from the workplace to identified locations. Sufficient waste bins shall be provided at
- Different workplaces for easy collection of scrap/waste. Scrap chute shall be installed to remove scrap from high location.
- Access and egress (staircase, gangways, ladders etc.) path should be free from all scrap and other hindrances.
- Workmen shall be educated through toolbox talk about the importance of housekeeping and encourage not to litter.
- Labor camp area shall be kept clear and materials like pipes, steel, sand, concrete, chips and bricks, etc. shall not be allowed in the camp to obstruct free movement of men and machineries.
- Fabricated steel structures, pipes & piping materials shall be stacked properly.
- No parking of trucks/trolleys, cranes and trailers etc. shall be allowed in the camp, which may obstruct the traffic movement as well as below LT/HT power line.
- Utmost care shall be taken to ensure overall cleanliness and proper upkeep of the working areas

Waste Management: Take suitable measures for waste management and environment related laws/legislation as a part of normal construction activities. Compliance with the legal requirements on storage/ disposal of paint drums (including the empty ones), Lubricant containers, Chemical Containers, and transportation and storage of hazardous chemicals will be strictly maintained.

Inspection on HSE for different activities being carried out at site shall be done to ensure compliance to HSE requirements. The Contractor shall maintain and ensure necessary safety measures as required for inspection and tests as applicable, to enable inspection agency for performing Inspection. If any test equipment is found not complying with proper safety requirements, then the Inspection Agency may withhold inspection, till such a time the desired safety requirements are met.

HSE PERFORMANCE

- Contractor shall be assessed on a monthly basis for HSE Compliance by Safety In-charge at the site.
- The implementer shall reserve the right to use this assessment for evaluating bidder's capacity for future tenders
- Suitable HSE reward system shall be developed at site level to promote HSE compliance amongst workmen by the Contractor. To decide HSE reward, performance towards HSE shall be evaluated for workers and it shall be awarded regularly in public gathering.
- If safety record of the Contractor in execution of the awarded job is to the satisfaction of safety department of the implementer, issue of an appropriate certificate to recognize the safety performance of the Contractor may be considered by the implementer after completion of the job.

NON-COMPLIANCE: *NONCONFORMITY OF SAFETY RULES AND SAFETY APPLIANCES WILL BE VIEWED SERIOUSLY AND UNOPS HAS THE RIGHT TO IMPOSE PENALTIES ON THE CONTRACTOR FOR EVERY INSTANCE OF VIOLATION NOTICED:*

HSE AUDIT/INSPECTION: Regular HSE Audit/inspection shall be carried out by Contractor as per Site HSE audit calendar. HSE checklist shall be used for carrying out audit/inspection and report shall be submitted to site management.

All non-conformities and observations on HSE identified during internal or external HSE audit shall be disposed of by site in a time bound manner and reported back the implementation status

Corrective action and Preventive action on HSE issues raised by certification body issued by Regional HQs shall be implemented by site and reported to Site management.