Amulsar Gold Project

Footprint Management Plan

Version 2
June 2016

Revision History

Revision	Date	Details	Prepared	Checked	Approved
V1	February 2016	Draft for v10 ESIA	AJB	US	
V2	June 2016	Update, based on consultations and review	WAI	US	

Plan approved by _____ Date _____

Health, Environmental, Safety and Security Manager

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Glossary

AQNVMP	Air Quality, Noise and Vibration Monitoring Plan
ARDMP	Acid Rock Drainage Management Plan
BMP	Biodiversity Management Plan
BRSF	Barren Rock Storage Facility
CHMP	Cultural Heritage Management Plan
EBRD	European Bank for Reconstruction and Development
EMP	Environmental Monitoring Plan
ESIA	Environmental and Social Impact Assessment
ESMP	Environmental and Social Management Plan
ESMS	Environmental and Social Management System
FMP	Footprint Management Plan
Geoteam	Geoteam CJSC
HLF	Heap Leach Facility
IFC	International Finance Corporation
Lydian	Lydian International Ltd
MP	Management Plan
PR	Performance Requirement (of EBRD)
PS	Performance Standard (of IFC)
RA	Republic of Armenia
SOP	Standard Operating Procedure
SWMP	Surface Water Management Plan
TMP	Transport Management Plan

1 INTRODUCTION

Lydian International Ltd (Lydian) and its wholly-owned Armenian subsidiary, Geoteam CJSC (Geoteam), are developing the Amulsar Gold Project (the Project) in the central part of the Republic of Armenia (RA). The proposed Project will develop the gold deposit via open-pit mining and heap-leach processing using dilute cyanide solution.

A Mining Right (MR) for the Project was granted by the RA government in November 2014. This was based, in part, on the approval of the regulatory Environmental Impact Assessment (EIA) for the Project in October 2014. Some permits also exist for ongoing exploration and development activities with additional permits required for the construction and operation phase. The Project is currently in the early stages of development, with construction activities planned to start during the second quarter 2016 subject to financing.

In parallel with the EIA, an Environmental and Social Impact Assessment (ESIA) was undertaken in compliance with, amongst others, the Performance Standards (PS) of the International Finance Corporation (IFC) and the Performance Requirements (PR) of the European Bank for Reconstruction and Development (EBRD).

In mid-2015, a Value Engineering (VE) and Optimization process was initiated, with Lydian commissioning Samuel Engineering Inc. (Samuel) and other consultants to perform engineering design on several identified VE and Optimization concepts. The objective was to reduce capital expenditure without increasing operating costs or environmental and social impacts. The results from this work done in 2015, which were published in the NI “43-101 Technical Report: Amulsar Value Engineering and Optimization” in November 2015, included reduced capital and operational costs, making the Project more viable in a challenging economic environment.

Changes to the Project design as a result of the VE and Optimization work have resulted in the need to prepare a revision to the new EIA approved in October 2014 and amend the ESIA completed and disclosed in April 2015. The EIA was approved on 28th April 2016. The Project has also been subject to various health, safety, environmental and community/social (HSEC) commitments arising from the ESIA undertaken in compliance with the IFC PS and EBRD PR. The final version of the ESIA, denoted v10, published for public review and comment in June 2016, follows a series of public consultations and disclosure meetings in May & June 2016.

Both the EIA and ESIA make a number of commitments pertaining to the mitigation and management of E&S impacts. These commitments and requirements must be fulfilled as the

Project moves forward. To facilitate implementation, all commitments made in the ESIA have been compiled into a full Commitments Register (CR) which will be used by Lydian for tracking purposes throughout the Project. Although many of the commitments apply to E&S management during Project implementation (construction, operation and closure), some apply to the Project design and engineering phase and must be addressed before construction works starts on site. The implementation of many of the commitments depends not only on the actions of full Project team.

E&S commitments are being managed by Lydian and Geoteam using the Environmental and Social Management System (ESMS). The ESMS includes the Management Plans (MPs), such as this one, that detail requirements that Geoteam and its contractors will follow in order to fulfil the Project's environmental and social commitments. For the purpose of this MP, "Contractor" means any all project participants, such as contractors working in the field on the project including but not limited to drilling contractors, construction contractors, camp service contractors, engineers, fabricators, suppliers, etc. Contractors should implement parts of the plans relevant to their activities, issuing their own management plans in line with the Geoteam ESMS, smaller contractors may fall directly under Lydian's OHSMS and ESMS and subject to specific training in the procedures relevant to the contract.

1.1 COMMITMENTS

The commitments contained within this Footprint Management Plan (FMP) do not duplicate those repeated in other management plans contained in Chapter 8 of the Amulsar ESIA. This FMP should be read alongside the following relevant management Plans:

- Environmental Monitoring Plan (EMP) - ESIA Appendix 8.12
- Cultural Heritage Management Plan (CHMP) – ESIA Appendix 8.17
- Biodiversity Management Plan (BMP) – ESIA Appendix 8.21
- Land Access and Livelihood Restoration Plan (LALRP) – ESIA Appendix 8.23
- Biodiversity Action Plan (BAP) – ESIA Appendix 8.20
- Air Quality Noise and Vibration Management Plan (AQNVMP) – ESIA Appendix 8.14
- Transport Management Plan (TMP) – ESIA Appendix 8.10
- Preliminary Mine Reclamation and Closure and Rehabilitation Plan (PMRCRP) – ESIA Appendix 8.18
- Surface Water Management Plan (SWMP) – ESIA Appendix 8.22
- Emergency Preparedness and Spill Response Plan (EPSRP) – ESIA Appendix 8.9

The commitments outlined below relate solely to the measures designed to limit the effects of the project outside the development footprint.

ID	Condition/actions	CR.ID	Monitoring and compliance	Cross references to other MPA	Responsibility
FMP1	The footprint of soil disturbance areas will be clearly delineated prior to excavation; soil storage areas will be similarly delineated in advance. Haul routes between soil strip and stockpile areas will be clearly defined. Vehicular and foot traffic will be restricted to existing roads and paths, and planned access and haul roads, to avoid disturbance of natural vegetation and soils outside the Project footprint. Redundant access tracks will be progressively restored based on the reinstatement of turf or soils and reseeding. Areas to be disturbed during construction and operation will be clearly delineated and marked out in advance, and	SL2 SL9 BIO17 LV10	Visual inspection of onsite activities as well as an examination of a regularly updated site working progress plans. These will be compared with the approved working plans that accompanied the ESIA to ensure that the footprint is correct.	Biodiversity Management Plan	Environmental Manager

	encroachment outside these areas will not be permitted.				
FMP2	No access will be permitted to areas outside the Project footprint except as authorised according to the procedures set out in this FMP.	BI02	Visual inspection of site activities and review of latest site working progress drawings which will be available electronically for remote inspection	N/A	Environmental Manager
FMP3	As a fundamental design principle, the footprint of Project infrastructure and the areas of land to be cleared will be minimised. Opportunities for further footprint reduction will be sought during the design process. Each of the proposed Project components will be subject to detailed engineering design iterations in consultation with the relevant specialist consultants in an attempt to reduce impacts. In particular, it is considered that a number of identified landscape and visual impacts can be	BIO8 LDUS1 LV48	If applicable, a record will be maintained of the design changes made to reduce the footprint of the project components. This record will be available for remote inspection.	Biodiversity Management Plan	Environmental Manager

	mitigated further in this way.				
FMP4	Prior to any development expansion beyond the ESIA footprint, a photographic and topographical survey will be undertaken of the land subject to the extension.		An electronic record containing this information will be maintained on site and will be available for remote inspection.	N/A	Environmental Manager
FMP5	Only the minimum artificial lighting necessary to ensure safety will be employed and it will be restricted to agreed working hours. Downward-directed lighting will be employed to minimise light pollution for sensitive receptors including communities and nocturnal species.	BIO37 BIO41 LV31	Visual inspection	N/A	Environmental Manager
FMP6	Any additional land requirements that arise during Project execution must be identified at least three months prior to the proposed start date for use of the proposed area(s).		Any additional land take must be undertaken in compliance with the Procedure for Land Clearance. If required, appropriate approval from the national permitting or financier will be gained prior to the works commencing.	N/A	Environmental Manager

FMP7	Any additional land requirement outside the ESIA footprint will be assessed following the checklist contained in Section 3.1 of this management plan		A record will be kept cross referencing to the checklist noting the dates and details of the steps undertaken (e.g. time and dates for ecological and cultural heritage clearance)		Environmental Manager
FMP8	Where practicable and necessary for security and protection of wildlife and livestock the project infrastructure will be appropriately fenced to delineate the extent of the site footprint.		Site fencing details will be noted on the working progress plan which will be regularly updated and will be available for inspection on site or remotely.	N/A	Environmental Manager
FMP9	Haul roads and mine access roads will be protected using a road berm to deter access by livestock and wildlife. This will also limit the extent of the site footprint.		Haul roads and mine access details including the location of berms, will be noted on the working progress plan which will be regularly updated and will be available for inspection on site or remotely.	N/A	Environmental manager
FMP10	Once temporary additional sites outside of the project footprint have been completed and restored, a record detailing the location, area, remaining erosion controls and likely ongoing		This report with be available for inspection on site or remotely	N/A	Environmental manager

	maintenance requirements.				

1.2 PURPOSE

This Footprint Management Plan (FMP) has been prepared to define how the physical footprint of the Project will be managed and limited during construction and operation of the mine. The FMP applies to all aspects of the Project, including temporary and permanent land take, as such this plan should be read in conjunction with a number of other supporting management plans listed in section 1.1.

The FMP addresses management procedures and application of relevant mitigation measures identified in both the Project EIA undertaken for state approvals, and the ESIA undertaken to comply with international standards including the IFC PS and EBRD PR.

The FMP also provides a mechanism for assessing the performance and for maintaining records of any changes in the scope of the Project i.e. additional land beyond the ESIA defined footprint of the Amulsar project.

The FMP aims to record data that is required for inclusion in the Amulsar Annual Monitoring Report (AMR) and the Lydian Sustainability Report, particularly with respect to ground disturbance and subsequent rehabilitation.

1.3 SCOPE, BACKGROUND AND CONTEXT

Footprint management requirements apply to all activities undertaken during construction, operation and closure of the Project.

The Project footprint is described and illustrated throughout the ESIA that accompanies this management plan. 'Footprint' as defined in this FMP refers to the physical area occupied by Project facilities and infrastructure (defined in Figure 3.1 of the ESIA), and the operations that occur within and around them.

The potential environmental effects of the project are wide ranging, covering a variety of subjects. The management of these individual effects is primarily addressed in ESIA and the topic specific management plans appended to Chapter 8 of the Amulsar ESIA.

This FMP is focused on requirements to minimise and control ground disturbance and the occupation of land; to manage facility and equipment siting, and vehicle movements; to

manage and handle soil; and to manage run-off and control erosion. It also addresses dust, noise, visual and biodiversity impacts related directly to footprint issues.

For clarity, the FMP does not address the Project's carbon footprint (see the Carbon & Energy Management Plan in Appendix 8.24 for this aspect).

1.4 RESPONSIBILITIES

Geoteam is responsible for the implementation of this FMP and for:

- Communicating the requirements of the FMP to all employees and contractors;
- Ensuring that adequate resources (staff, equipment and budget) are available for the effective implementation of the FMP;
- Documenting the implementation of the FMP and particularly the included ESIA commitments; and
- Monitoring, inspecting and auditing the FMP's implementation, including by contractors.

Specific Responsibilities for Geoteam personnel relating to this plan are as follows:

Project Director	Responsible for ensuring that the Amulsar Project complies with the requirements of this plan. Ensures that designated managers understand their responsibilities and that they have sufficient resources to carry out their functions effectively. Reviews all risk assessments with regard to site works and ensures that any resulting recommendations are duly implemented.

Senior Health, Environmental, Safety and Security Manager	Responsible for monitoring compliance with procedure and developing training and auditing tools that will raise awareness. Ensures that all employees and contractors undergo environmental and health and safety inductions. Ensures that appropriate records and documentation are maintained for all areas of work. Responsible for the preparation, review and update of this management plan in order to ensure its on-going compliance with the requirements of the mine's licence to operate and other applicable RA legislation. Participates in risk assessments. Coordinates audits of site activities. Responsible for liaison with the competent authorities, including periodic/routine reporting and incident notifications. Responsible for dissemination of information and instructions to all staff and contractors regarding activities in compliance with this management plan. Provides suitable training – including emergency response training - on the intent and requirements of this management plan. Training records will be maintained and monitored to ensure that training is updated at regular intervals (e.g. refresher training at least every 6 months). Reports outcomes to the Project Director.
Site Environmental Manager	Implements this plan and related procedures. Ensures that staff and contractors follow this plan and related procedures, and maintain safe working practices. Monitors and audits the implementation of the plan. Reports on plan implementation to the Health, Environmental, Safety and Security Manager
Heads of Department	Train personnel in this plan and related procedures. Participate in risk assessments. Reporting any unsafe or unsatisfactory conditions to the HESS Manager Initiating incident response actions in accordance with this plan

Contractors	Responsible for reading, understanding, and implementing this management plan within their areas of work and responsibility. Communicate the contents of this management plan to their workforce and provide the necessary training. Ensure that the procedures established in this management plan are complied with by their workers and any subcontractors. Ensure that any environmental incidents are reported and dealt with effectively in accordance with the Incident Reporting and Investigation Procedure. Keep Geoteam fully informed of any site issues related to the management plan or its implementation. Ensure that staff attend compulsory environmental and health and safety inductions or training sessions as required by Geoteam. Report any unsafe or unsatisfactory conditions to the Environmental, Health, Safety and Security Manager.

2 REQUIREMENTS

The ESIA addresses a fixed Project footprint including the mine pit outlines, process areas, infrastructure corridors, and haul and access roads. This footprint will be clearly identified on Project site drawings, and will be marked out on site as appropriate. No access will be permitted to areas outside the Project footprint except as authorised according to the procedures set out in this FMP.

The primary instrument for implementing the FMP is the Procedure for Land Clearance and it's associated Land Clearance Permit. No work on, or clearance of, land is permitted without this procedure having been completed.

Several subsidiary procedures, which are required for the implementation of the FMP are in development, including the Topsoil Management Procedure and an Invasive Species Management Plan. Geoteam will draw on the expertise of its biodiversity, archaeology, water and environmental consultants to continually improve this FMP and associated procedures as the Project progresses.

These will be incorporated into the Project ESMS prior to the commencement of construction.

Any additional land requirements that arise during Project execution must be identified at least three months prior to the proposed start date for use of the proposed area(s). The notification must include a preliminary environmental and social assessment. Geoteam environmental

and social staff will then determine whether the work can continue subject to the Procedure for Land Clearance, or whether formal assessment for national permitting or financier requirements is necessary.

3 FOOTPRINT MANAGEMENT

The major activities for the development of the Amulsar mine are discussed in the EIAs, ESIA and relevant operational control documents. Prior to any development taking place within the site, an evaluation process will include a cross reference to all relevant management plans, including but not exclusive to the following:

LALRP
CHMP and Chance Finds Procedure
BMP, and
EMP

The flow diagram in Figure 1 will be used to confirm that activities have been addressed in the ESIA.

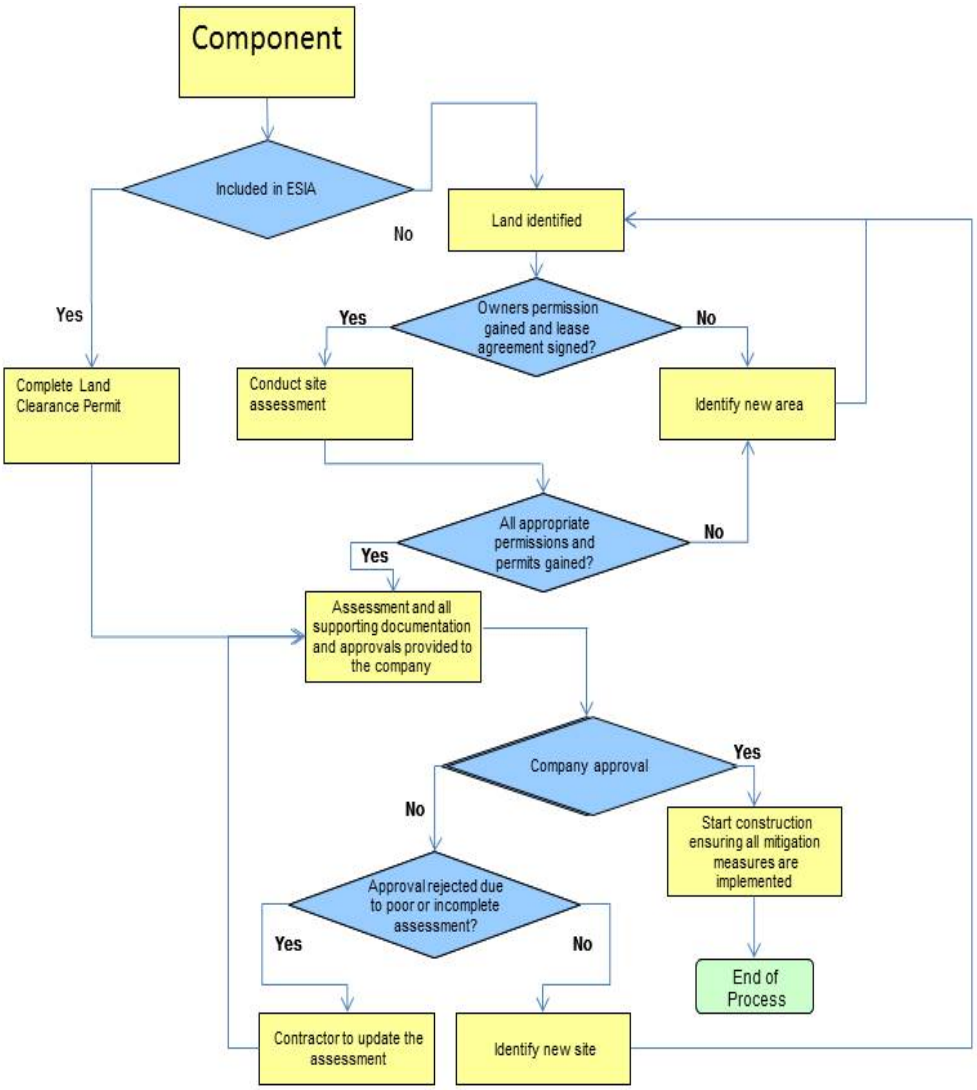

Fig 1: Assessment process Development included in ESIA

For developments considered in the ESIA, the Land Clearance Permit system will be used to summarise and document the mitigation measures to be implemented during the phase of development. The Land Clearance Form is to be completed in accordance with the Land Clearance Procedure.

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3.1 DEVELOPMENT NOT INCLUDED IN ESIA FOOTPRINT

Additional land take requirements, not identified in the ESIA will be identified by Geoteam, at least 3 months prior to the proposed start date for construction and use of the proposed area(s). The notification shall include a preliminary environmental and social assessment of any additional land area that will be required to undertake the works. This assessment shall be reviewed by Geoteam and approval granted once all requirements have been satisfied, and will include a permit for land clearance.

The level of detail required within each assessment will depend on the proposed land use, present ecological sensitivities and current usage of the area. However, the assessment shall include as a minimum:

Cultural Heritage Management Plan (CHMP) – Appendix 8.17 of the ESIA

The Cultural Heritage Management Plan (CHMP) defines a series of steps to minimise impacts upon cultural heritage from the Amulsar project. The CHMP provides appropriate guidance and requirements for meeting the Project's cultural heritage responsibilities. These responsibilities have been established by a combination of Armenian national requirements; lender requirements; and Lydian's commitments as they relate to cultural heritage. The CHMP defines a series of commitments for the protection of cultural heritage sites based on the measures outlined in the Project Environmental and Social Impact Assessment (ESIA) 2014. The CHMP applies to Lydian and its contractors during the construction, operation, closure and post-closure phases of the Project and defines the roles and responsibilities of Lydian International personnel, contractors and external stakeholders in the management and protection of cultural heritage.

When proceeding into new areas outside the ESIA development footprint the following relevant actions for the CHMP must be followed:

- Areas to be disturbed must be cleared by cultural heritage consultant prior to being incorporated within the footprint. The heritage consultant will either confirm that there are no potential additional effects, or if any points of archaeological interest are present they are recorded prior to operations continuing.
- Chance Finds Procedure (CFP) is to be followed throughout the construction phase of the activity. The CFP defines a series of steps to minimize Project impacts to undiscovered cultural heritage resources by providing a procedure for monitoring of ground disturbing activities.

- Check that the new area does not encroach into the buffer zones around known cultural heritage sites. Known cultural heritage sites are clearly marked on Figure 4.19.1
- Biodiversity Action Plan (BAP) and Biodiversity Management Plan (BMP) and - Appendix 8.20 and 8.21

The Biodiversity Management Plan (BMP) identifies a number of monitoring requirements, including day-to-day observations and formal, periodic surveys undertaken by specialists. The BMP addresses actions to be taken in relation to the implementation of the Project on site. A separate document, the Biodiversity Action Plan (BAP), is concerned with actions that need to take place in the wider region (for example the establishment of a biodiversity offset) and which will generally be undertaken by specialist teams.

In accordance with the relevant requirements of these documents the following steps must be undertaken if additional areas outside the ESIA footprint are to be incorporated:

- Immediately prior (one or two days) to construction surveys will be undertaken to check for important biodiversity;
- The new areas must minimise habitat fragmentation and where practicable Caucasian endemic plant species (*Fritillaria armena*, *Phelypaea tournefortii* and *Juniperus polycarpu*), will be translocated if to be affected by earthworks;
- Does not encroach into the Arshak set aside (Figure 4.10.1). A formal set-aside (referred to as the "Arshak set-aside") was identified to avoid and safeguard a viable proportion of the population south of Arshak Peak. This set aside preserves important breeding habitat for *Ursus arctos* (Brown Bear), high quality examples of sub-alpine meadow vegetation including *Potentilla porphyrantha*, habitat for other species of conservation importance (Eurasian Lynx, Wolf, Bezoar Goat) and habitat for bird species included on the RA Red List.
- Small mammals, reptiles and amphibians will be excluded from working areas. Any individuals that become trapped within working areas will be removed by a suitably qualified ecologist.
- As far as possible, construction activities will be scheduled to avoid disturbance of Brown Bear breeding habitat in early spring, between March and June.
- If any land take is required from critical habitat areas a loss/gain calculation for natural habitat offset will be undertaken in accordance with the requirements of the BAP and BMP. The calculation must demonstrate that there is no net loss in critical habitat.

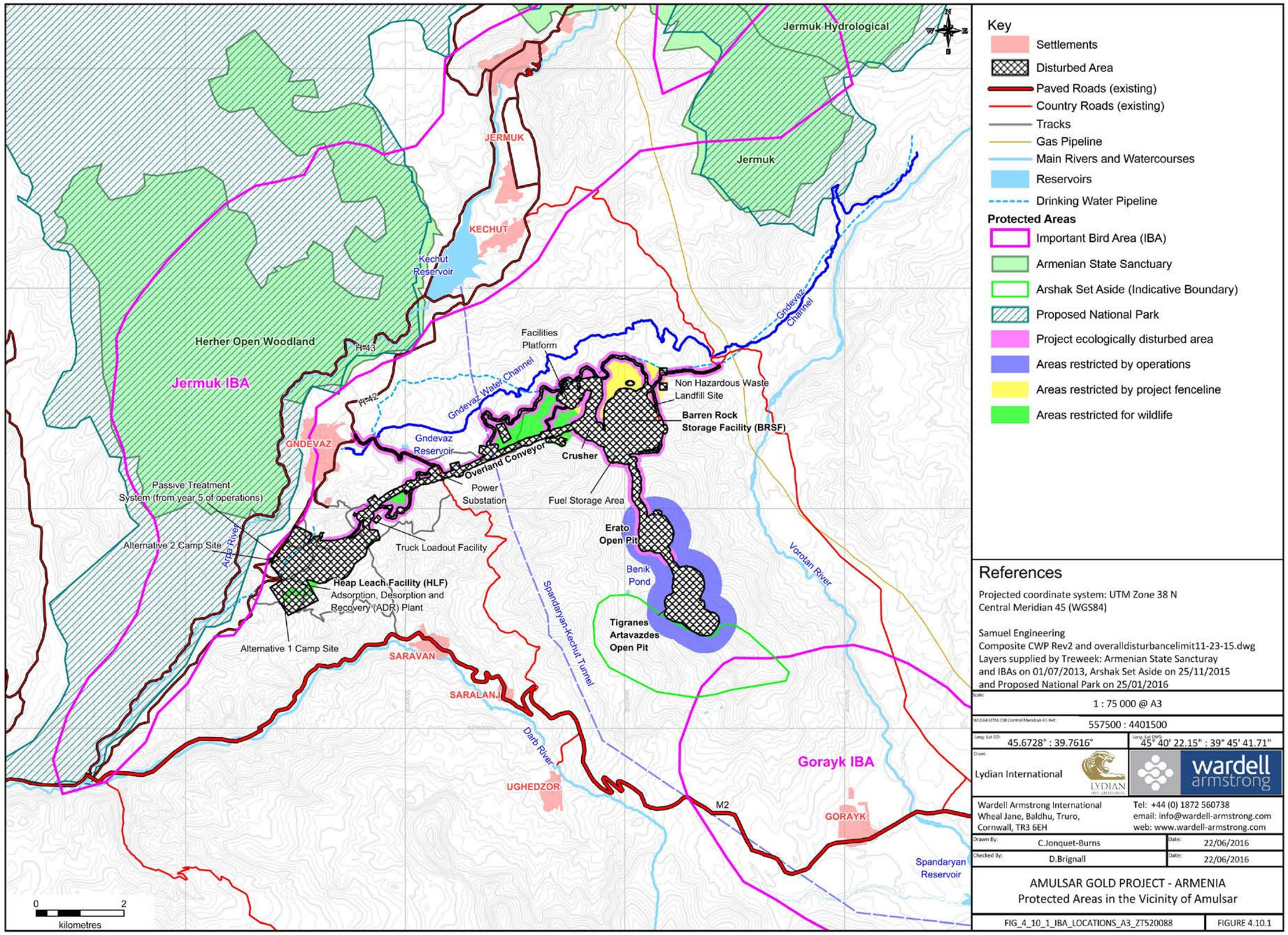

Figure 2: Arshak set aside

3.1.1 Surface water management plan (SWMP) –Appendix 8.22 of the ESIA

The SWMP defines how surface water within the Project footprint will be managed, where required, during the construction and operation of the mine. The SWMP addresses surface water management procedures and application of relevant mitigation measures identified in the ESIA. Any additional land take incorporated into the development footprint must conform to the following requirements taken from the SWMP:

- Any surface water flow collected from the newly exposed areas of bare earth is directed into site drainage ditches and treatment areas prior to discharge into a water course;
- Any new water crossings will be culverted

It is important to note that development of additional land may be subject to formal assessment for national permitting requirements, and/or an addendum to the international ESIA. Such requirements will be determined by Geoteam prior to the issue of the Land Clearance Permit.

The Land Clearance Permit is to be approved and a signed copy filed prior to any works commencing, in accordance to the relevant procedure. Geoteam's Environmental officers will visit the proposed site both prior to and after receipt of the environmental assessment, but prior to approval of the Land Clearance Permit.

3.2 RECORDING OF LAND-TAKE

Topographic surveys of all areas and facilities, including ground elevations, together with a record of all perimeter GPS coordinates, will be used to validate that the entire footprint proposed for land take is included in the Project footprint. The survey will also be used to identify and record the existing social uses of the land, including but not limited to land use and water use. A photographic record of the condition of the land will be maintained. All above data, including GPS coordinates shall be provided electronically to Geoteam for inclusion into the GIS system.

Any additional land incorporated into the project footprint but not included as part of the original ESIA will also be subject to the same recording practices.

3.3 PROCEDURES

Contractors shall be responsible for ensuring that all environmental and social aspects set out in Geoteam's ESMP are satisfactorily considered in all Procedures and Standard Operating

Procedures (SOPs) for the construction and operation of facilities. The Procedures shall be reviewed by Geoteam's environmental department, prior to works commencing. These Procedures/SOPs are to be strictly adhered to and any proposal to deviate from the works set out in the document shall be submitted to Geoteam for review and approval prior to implementation.

3.4 DOCUMENT REVIEW

All documents submitted for approval, including but not limited to Construction Procedures, pre-construction surveys, and environmental assessments and Inspections are subject to a minimum of a 5 working-day review period, dependent upon the amount of information made available. Should this require extension, reviewers will notify the applicant in advance of the timeline expiring. Documents will not be considered as 'Approved for Implementation' until the Contractor satisfactorily addresses all comments that have been raised during the review, and a signed Land Clearance Permit (Ref GEOTEAM-ENV-FM0203) has been filed.

4 SPECIFIC ACTIVITIES

Certain activities throughout the construction and operational phases of the mine will require specific management actions. While these are generally considered in the ESIA, a summary of the key activities and the requirements associated with them is provided below. These particular activities are highlighted as they have the potential to require additional land outside of the existing ESIA footprint.

4.1 OPERATIONAL REQUIREMENTS

4.1.1 Excess Material and Topsoil Stockpiles

Earth work excavations may require the storage or disposal of excess material. This material is to be assessed prior to disposal for both content (i.e. whether is topsoil or not) and for acid generation potential. Topsoil is to be stockpiled in accordance with the Topsoil Strip and Management Procedure. Acid generation potential material is to be assessed in accordance with the Acid Rock Drainage Management Plan. In the event that stockpiled material is neither topsoil nor acid generating, these stockpiles need to be protected against erosions. Acid generating material will need to be handled in accordance to the ARD Management Plan and disposed in the BRSF.

4.1.2 Extraction Sites (Borrow Pits)

Before any material is extracted from a new borrow pit or quarry, the applicant will ensure that all of the appropriate permits and approvals have been issued as per the Commitment Register. If a new site is proposed, the applicant shall inform the Environment Manager at least 20 days in advance, to allow an ecological and archaeological site inspection and environmental/social assessment of the area. A report will be provided with the application for land take. The assessment shall also include the proposed site reinstatement criteria and methods.

4.2 MAINTENANCE OF ROADS AND TRACKS

4.2.1 Improvements to Existing Roads outside the project footprint

Where required, the applicant shall perform an initial assessment of the condition of existing roads to be widened including bridges, drainage structures and other road infrastructure (see TMP). This report must include photographs and related documentation necessary to establish the current condition of the road infrastructure. Following the initial analysis, the applicant shall ensure that the necessary approvals are obtained from the regulatory agencies and also from Geoteam, prior to commencing any necessary upgrade works. Upon completion of the upgrade works, the applicant will obtain acceptance of works performed from the relevant authority, as required.

Access roads may be upgraded to provide safe access for the duration of the Project development. This work may consist of clearing, rehabilitation of the road surface, and expansion of some curves so that the vehicles carrying materials and supplies can travel safely. The widths of roads and curves shall be established, bridges shall be strengthened and drainage works restored. If necessary, safety structures shall be built in areas affected by the project (dry walls, containment walls, etc.). Repairs to be done shall be agreed upon with the appropriate government agency and any affected land owners before repair work is begun.

Highway drainage systems shall be restored and improved as necessary, with emphasis on maintenance (reconstruction of gutters, clearing of storm drains and improvement of drainage ditches).

Clear records of the following shall be maintained:

- Permissions and approvals (from regulatory bodies, government agencies and land owners);

- Details of the upgrades and improvements undertaken including a description of the works and start and finish dates; and
- Photographs of the completed road upgrades and improvement measures.

4.2.2 Construction of New Roads outside the project footprint

The development of new access roads will be in accordance with the Project objective to minimise land take or temporary usage during exploration and construction. The applicant shall therefore consider alternatives to new roads, in the assessment required above.

Where new roads are unavoidable, the applicant shall obtain any necessary approvals from the regulatory agencies and agree design and construction details with the HSEC and Technical Services departments before beginning construction. This includes biodiversity and archaeological assessment, as well as community notification of project changes. The applicant shall also agree the requirement for, and details of, any reinstatement works required if the road is required for temporary use only. All roads shall have drainage systems and erosion controls to minimise impacts on the natural drainage of the area. Upon completion of the upgrade works, the applicant will obtain acceptance of works performed from the relevant authority, as required.

- Clear records of the following shall be maintained:
- Permissions and approvals (from regulatory bodies, government agencies and land owners);
- Details of construction undertaken including a description of the works and start and finish dates; and
- Photographs of the completed road and photographs of the road following reinstatement, if required.

4.3 FURTHER EXPLORATION ACTIVITIES

Additional or future exploration activities may require the construction of access roads and drill pads. The construction of access roads is discussed in Section 5.4 above. Drill pad construction will require a similar process. The development of drill pads will be minimised as far as possible, in accordance with the Project objective to minimise land take or temporary usage during such exploration and ground investigation.

Prior to the construction of drill pads, Geoteam geological department shall confirm that drill pads are scheduled in the annual exploration/drill plan. The design and construction details should be confirmed with the HESS department, including biodiversity and archaeological

assessment, in accordance to the Land Clearance Permit Procedure. In the event of drill pads outside of the scope of the annual exploration plan, changes are to be highlighted and undergo community notification. Upon completion of the upgrade works, the applicant will ensure that all closure and rehabilitation activities comply with the Amulsar Closure management Plan with clear records maintained.

1.1.1 Erosion and sediment control

All works within additional areas should comply with the requirements of the SWMP. The Persons conducting exploration earthworks are expected to implement the following erosion and sedimentation control measures which are reflected in the SWMP:

- Train workers to install and maintain erosion and sediment control devices, with suitable training records maintained
- Ensure that the boundaries of Project sites are clearly identified and that work remains within the demarcated area; and
- Implement traffic management rules such as:
    a. Prohibiting vehicles from making unauthorized detours off access roads/tracks/routes;
    b. Restricting traffic over virgin grass cover; and
    c. Suspending work/traffic when soil moisture levels would result in compaction or erosion

Where possible, design and schedule decisions will be made to minimise the potential for erosion and sedimentation. In particular:

- Works will be scheduled to restrict ground excavation and travel along or adjacent to soil slopes immediately after or during seasons of heavy rainfall;
- New or widened access roads will be designed with adequate slope and cross-fall drainage to channel storm water safely to off-road sediment traps and soakaways without causing erosion or siltation;
- Development of new roads will be minimised, with existing roads being used for accessing new areas wherever possible; and
- Roads will be designed to minimise erosion (i.e. placement on ridgelines rather than slopes, and following contours where possible).

1.1.2 Engineering Controls

The following engineering controls should be considered for use at exploration sites where erosion and sedimentation control has been assessed as being required:

- Installing soil stabilisation and erosion prevention techniques

- Installing transverse drainage (e.g. grips and berms) where necessary to divert run-off from Project sites towards stable vegetated areas;
- Installing sedimentation prevention techniques such as:
    a. Silt fences
    b. Settling ponds
    c. Silt traps; and
- Installing gabions and gabion mattresses where there is a requirement to form retaining walls for earth retention or stabilise steep slopes.

1.1.3 Winterisation

During Project development, construction and exploration works are anticipated to continue through the winter. In the event that any construction or additional exploration works are required to cease during winter, the following activities will need to be implemented to prepare areas that will not be required during winter periods;

- Install any necessary erosion and sedimentation control devices at drill sites, temporary access roads and other temporary areas;
- Erect barriers at the entrance of temporary access roads; and
- Ensure that all temporary fencing is adequately braced.

During the winter periods and when weather conditions allow, the Environmental department will inspect Project sites to check for:

- Damage to erosion and sedimentation control devices; and
- Evidence of erosion or sedimentation caused directly or indirectly by Project activities.

The results of the inspections will be recorded and where necessary Non-conformance Reports raised and tracked to closure in accordance with the Non-conformance and Corrective Action Plan.

5 REINSTATEMENT OF TEMPORARY SITES

The reinstatement of any land use from temporary activities outside of the footprint will depend on the final use of the area. It is important that drainage and erosion control measures are maintained where necessary to prevent damage by erosion or sedimentation of all areas prior to closure or outside the mine infrastructure.

5.1.1 Site Clearance and Stabilisation

Following completion of the works, it is expected that the contractor will:

- Remove all equipment, consumables, waste etc. from the site (waste shall be managed in accordance with the Project's Waste Management Plan that any contaminated soil is remediated in accordance with the requirements of the Environmental Spill Prevention and Response Plan;
- Install any long-term erosion control measures which have been determined as required in conjunction with the Site Environmental, Health and Safety Manager; and
    a. Send the Site Environmental, Health and Safety Manager a written record of Project sites including:
        i. Location
        ii. Area
        iii. Erosion and sedimentation control measures that remain in place
        iv. Likely requirements for the maintenance of those control measures; and
    b. Recommended winterisation measures

The Site Environmental, Health and Safety Manager will in turn:

- Confirm that the control measures indicated are satisfactory;
- Verify that rehabilitation and revegetation is satisfactory; and
- Establish on-going monitoring to observe the success of rehabilitation measures.

5.1.2 Specific Requirements for Reinstatement of Roads

Roads that existed prior to the exploration and operation phases of the Project are subject to reinstatement. Once the temporary area is no longer required, all pre-existing access roads used shall be repaired and improved to, at least, their previous (pre-upgrade) condition. Before any repairs or improvements to existing roads are classified as acceptable, the applicant must ensure that it has been previously accepted in writing and approved by the appropriate governing authority, as required by local regulations.

New roads constructed for access to the site may benefit local communities. Prior to closure of these roads, Geoteam will perform an environmental and social review of any proposals made by landowners or municipalities to keep these new access roads open. This will identify any ecological, environmental, archaeological, social, and health and safety impacts of keeping the road open and identify any mitigation measures necessary to address them. Access roads in ecologically sensitive areas and in areas subject to increased risks will only be left open in exceptional circumstances and only after a comprehensive review by Geoteam.

6 PERFORMANCE MONITORING

6.1 VERIFICATION AND MONITORING

Geoteams's assurance monitoring will be undertaken as described in the Amulsar Site Monitoring Plan. Whenever monitoring indicates a non-conformance related to Project standards, requirements and commitments, Geoteam reserves the right to issue a Non-conformance Report (NCR), Corrective Action Request (CAR), Work Improvement Notice (WIN) and Temporary Work Suspensions (TWS) to the relevant applicant, which will include a time frame for addressing the issue.

In addition to internal verification and monitoring and audits conducted by Geoteam, external audits may also be carried out by recognised third parties including Armenian regulatory authorities.

6.2 REVIEW OF NON COMPLIANCES

Geoteam shall investigate fully any non-conformances with this plan. In the event that such a non-conformance invokes an external investigation, Geoteam will cooperate fully with the competent authorities in any investigation and review of non-compliances with this plan.

6.3 REGULAR INSPECTIONS

Regular inspections will be carried out to ensure that the Project complies with this plan and does not encroach on areas outside of its footprint (as determined through the ESIA). All construction works will be regularly monitored to ensure that the required approvals are in place and Procedures being followed. Any control measures specified in this plan will be included in these inspections. Control measures will be inspected for damage after major storm events and annually after the spring thaw.

6.4 ANNUAL AUDIT

The Senior Manager HESS shall ensure that all activities and contingency plans covered by this Plan are subject to an ESMS audit (the minimum frequency shall be annual). The results of audits are to be discussed during annual management meetings, where the Senior Manager HESS shall provide information on the performance of the site and recommendations for further improvement.

7 AUTHORIZATION

Approved By: _____ _____

Executive Vice President Sustainability Date