PREFACE TO THE APPLICATION

PURPOSE OF THE APPLICATION

IDM Mining Ltd. (IDM, the proponent) is proposing to develop the Red Mountain Underground Gold Project (the Project), located approximately 15 km northeast of Stewart, in a mountainous area of northwest British Columbia (BC), adjacent to the Cambria ice field and the Bromley Glacier. The proposed Project is an underground gold mine that is designed to process approximately 1,000 tonnes per day (tpd) [275,000 tonnes per year (tpy)] of ore over a six- to seven-year mine life. During the life of mine operations, the Project will produce an anticipated 425,000 ounces of gold and 1,173,000 ounces of silver.

IDM submitted a Project Description to the BC Environmental Assessment Office (EAO) and Canadian Environmental Assessment Agency (the Agency) on September 25, 2015. The Executive Director of EAO issued an Order under Section 10 (the Section 10 Order) of the *BC Environmental Assessment Act* (BCEAA) on November 2, 2015, designating the Project as a reviewable project under BCEAA and requiring that IDM obtain an Environmental Assessment Certificate (EAC) before the proposed Project can proceed.

An Order under Section 11 of BCEAA (the Section 11 Order) for the Project was issued by EAO on February 10, 2016, which outlines the scope, procedures, and methods for the provincial environmental assessment (EA), including government agency, public, and Aboriginal consultation requirements. Schedule B of the Section 11 Order determines that EAO will invite Nisga'a Nation, as represented by the Nisga'a Lisims Government (NLG), to the EAO-led Working Group for the Project and delegates procedural aspects of consultation with Nisga'a Nation to IDM. Schedule C of the Section 11 Order determines that Tsetsaut Skii km Lax Ha (TKSLH) will receive notifications from EAO regarding the Project's EA.

IDM submitted a further Supplemental Information document to EAO that updated the location and layout of proposed Project components on March 17, 2016, and an Order under Section 13 of BCEAA (the Section 13 Order) amending the provincial EA for the proposed Project was issued by EAO on April 13, 2016.

The proposed Project is also a designated project pursuant to Section 16(c) of the Regulations Designating Physical Activities (SOR/2012-147) under the *Canadian Environmental Assessment Act, 2012,* (CEAA 2012) as the production rate is proposed to exceed the threshold for a gold mine of 600 tpd. The Agency commenced an EA and issued Guidelines for the Preparation of an Environmental Impact Statement pursuant to CEAA 2012 for the proposed the Project (the EIS Guidelines) in January 2016. The EIS Guidelines identify Nisga'a Nation, as represented by NLG, as an Aboriginal Group whose Treaty rights may be affected by the proposed Project. The EIS Guidelines also identify TSKLH and Métis Nation BC (MNBC) as Aboriginal Groups who will be less affected by the proposed Project.

The purpose of the information, analyses, and findings of this Application for an EAC / Environmental Impact Statement (Application/EIS) is to satisfy both the provincial and federal requirements such that

the necessary provincial and federal EA approvals are issued, allowing IDM to develop the Project. This Application/EIS has been developed pursuant to the federal EIS Guidelines and provincial Application Information Requirements (AIR) approved by EAO in March 30, 2017. The AIR was approved after considering comments from federal and provincial government agencies, Aboriginal Groups, local and regional governments, stakeholders, and the public.

EAO established a Working Group to participate in the Pre-Application and Application Review phases of the Project's EA. Pre-Application phase Working Group meetings were held on March 3, 2016, and July 28, 2016, and a Working Group site visit was held on July 27, 2016. The Working Group includes representatives from the following organizations (broken down by jurisdiction):

Aboriginal

- Nisga'a Nation, as represented by NLG

Regional/Municipal

- Regional District of Kitimat-Stikine
- Northern Health
- District of Stewart

Provincial

- BC Environmental Assessment Office
- BC Ministry of Transportation and Infrastructure
- BC Ministry of Forests, Lands, and Natural Resource Operations
- BC Ministry of Energy and Mines
- BC Ministry of Community, Sport, and Cultural Development
- BC Ministry of Environment
- BC Regional Economic Operations, Economic Development Division

Federal

- Natural Resources Canada
- Natural Resources Canada – Major Projects Management Office
- Fisheries and Oceans Canada
- Canadian Wildlife Service
- Health Canada
- Environment and Climate Change Canada
- Canadian Environmental Assessment Agency

Other

- Alaska Department of Natural Resources
- US Environmental Protection Agency, Region 10

The EAO-led Working Group has reviewed and commented on key EA documents, including the draft Valued Component Scoping document and the draft AIR, and is a significant mechanism through which Project information has been and will continue to be exchanged.

The public has also had opportunities to comment on the proposed Project via the public comment periods on the Project Description (federal), draft EIS Guidelines (federal), and draft AIR (provincial) and through proponent-led engagement activities with local and regional governments, community members, and stakeholders. The public will have additional opportunities to review and provide comment on the Project during the provincial and federal public comment periods during the Application Review phase and through ongoing proponent-led engagement efforts.

ORGANIZATION OF THE APPLICATION

The Application/EIS is organized as follows:

- Document Map: provides an overview of the location of Application/EIS components, chapters, and appendices based on volume number.
- Preface: identifies the purpose and describes the organization of the Application/EIS and identifies the consultants who contributed to or provided information for the Application/EIS.
- Executive Summary: provides a standalone document containing sufficient information to equip the reader with an overview of the proposed Project and the findings of the Application/EIS.
- Table of Contents: provides a detailed listing of the major content headings of the Application/EIS.
- List of Tables: provides a full listing of all tables found in the Application/EIS.
- List of Figures: provides a full listing of all figures found in the Application/EIS.
- Acronyms and Abbreviations: comprises a list of commonly used abbreviations and acronyms used in the Application/EIS.
- Glossary: comprises a list of commonly used terms and phrases and their definitions used in the Application/EIS.
- Tables of Concordance: indicates where the information specified in the AIR and EIS Guidelines can be found in the Application.

PART A. INTRODUCTION AND BACKGROUND

Chapter 1. Project Overview

This chapter presents general information on IDM, the Project's geographical and regional setting and history, Project geology and mineralization, Project tenure, Project scope and schedule, and Project benefits.

Chapter 2. Assessment Process

This chapter describes the provincial and federal EA processes relevant to the Project, provides an overview of federal and provincial EA requirements, and identifies key provincial and federal

authorizations required to allow the Project to proceed. This chapter also addresses the role and relevance of the Nisga'a Final Agreement (NFA) in the Project's EA.

Chapter 3. Information Distribution and Consultation Overview

This chapter provides an overview of the information distribution and consultation activities that were undertaken with Aboriginal Groups, provincial and federal government agencies, local and regional governments, community members, stakeholders, and the public. Information distribution and consultation activities planned during the Application Review phase are also described.

Chapter 4. Alternative Means of Undertaking the Project

This chapter describes the processes and criteria used to develop, evaluate, and eventually screen the alternative options for developing the Project and summarizes how alternatives have influenced design changes to the proposed Project.

Chapter 5. Reclamation and Closure

This chapter presents a conceptual closure and reclamation plan, which includes an overview of the relevant regulatory frameworks, IDM's scope of objectives of closure and reclamation, IDM's conceptual plans for closing and reclaiming each Project component, and estimated scheduling, monitoring, costs, and Post-Closure activities.

PART B. ASSESSMENT OF ENVIRONMENTAL, ECONOMIC, SOCIAL, HERITAGE, AND HEALTH EFFECTS

Part B contains the effects assessments of the valued components (VCs) of the biophysical, socio-economic, heritage, and human health environment subject areas, in Chapters 6 to 24, comprising:

Chapter 6. Environmental Assessment Methodology

Chapter 7. Air Quality Effects Assessment

Chapter 8. Noise Effects Assessment

Chapter 9. Landforms and Natural Landscapes Effects Assessment

Chapter 10. Hydrogeology Effects Assessment

Chapter 11. Groundwater Quality Effects Assessment

Chapter 12. Hydrology Effects Assessment

Chapter 13. Surface Water Quality Effects Assessment

Chapter 14. Sediment Quality Effects Assessment

Chapter 15. Vegetation and Ecosystems Effects Assessment

Chapter 16. Wildlife and Wildlife Habitat Effects Assessment

Chapter 17. Aquatic Resources Effects Assessment

Chapter 18. Fish and Fish Habitat Effects Assessment

Chapter 19. Economic Effects Assessment

Chapter 20. Social Effects Assessment

Chapter 21. Heritage Effects Assessment

Chapter 22. Health Effects Assessment

Each of these chapters includes the following:

- A description of the relevant regulatory frameworks and the existing conditions pertaining to the particular VC subject area;
- A rationale for the selection and identification of the VCs;
- Definition of the spatial and temporal boundaries applied to the subject area;
- A description of the outcomes of the effects assessment in terms of potential effects, possible mitigation measures, residual effects remaining after mitigation, and possible risk analyses where levels of significance or confidence warrant it;
- An assessment if the residual effects interact cumulatively with any past, present, or reasonably foreseeable projects within a defined spatial and temporal area; and
- A summary of the effects assessment in terms of the determination of significance and conclusions.

Chapter 23. Accidents and Malfunctions

This chapter presents an assessment of potential accidents and malfunctions and their potential residual environmental effects on subject areas following implementation of design standards as well as preventative and contingency measures.

Chapter 24. Effects of the Environment on the Project

This chapter presents an assessment of the potential effects of the environment on the proposed Project, including physical activities related to the Project.

PART C. ABORIGINAL CONSULTATION

Part C makes special reference to affected Aboriginal Groups, comprising:

Chapter 25. Tsetsaut Skii km Lax Ha

Chapter 26. Métis Nation BC

Chapter 27. Nisga'a Nation

These chapters provide an overview of the Project's potential effects on Aboriginal and Treaty rights and interests, including the assessments required under paragraphs 8(e) and 8(f) of the NFA. These chapters also include the legal, constitutional, and policy frameworks guiding the assessment, an overview of the Aboriginal Groups considered in the assessment, and a summary of IDM's consultation and engagement efforts undertaken to support the assessment.

PART D. PUBLIC CONSULTATION

Chapter 28. Public Consultation

This chapter provides a summary of IDM's consultation efforts with local community members, stakeholders, and the public in support of the assessment. It provides the legal and policy frameworks guiding IDM's consultation efforts, an overview of the stakeholders and communities IDM has consulted with regarding the Project, the potential effects of the Project on stakeholders' interests in the Project area, and a summary of feedback received through stakeholder and public consultation.

PART E. MANAGEMENT PLANS AND MONITORING

Part E contains the chapter that focuses on the environmental management framework and specific environmental management plans and reporting:

Chapter 29. Management Plans

Chapter 30. Monitoring and Follow-up Programs

These chapters provide a summary of environmental management and monitoring plans for an array of subject areas. Each plan generally includes a description of the relevant regulatory and policy, definition of the relevant performance objectives, a description of the relevant environmental protection measures, a description of the required monitoring and work planning to bring about the protection measures, a description of follow-up actions (where necessary), and a description of reporting requirements.

PART F. CONCLUSIONS

Part F includes the following chapter:

Chapter 31. Conclusions

This chapter provides an overall summary of and conclusion to the Application/EIS. The chapter includes summaries of the residual Project-related and cumulative adverse biophysical, socio-economic, heritage, and human health environmental effects and associated mitigation measures, provides an outline for follow-up programs, a table of IDM's commitments, and includes a final conclusion with respect to whether the Project is predicted to result in significant adverse residual biophysical, socio-economic, heritage, or human health environmental effects.

APPENDICES

The appendices provide materials in support of the main body of the Application/EIS, including volumes of baseline information for all aspects of the biophysical socio-economic, heritage, and human health environment, detailed effects assessment modelling reports, and engineering design reports.

AUTHORSHIP

Falkirk Resource Consultants Ltd. (Falkirk) was retained by IDM to manage the EA process for the Project, including preparation of documentation for the Application/EIS. The Application/EIS was prepared by a core team of contributors to the Application/EIS as summarized below.

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Key information, reports, and data used to support the development of the Application/EIS have included input from a range of consulting groups and companies, listed below. Acknowledgements are included as appropriate in the individual reports appended to the Application/EIS.

Contributing Organization	Appendices	
BC Stats	Appendix 19-A	BC Input-Output Model Report: Red Mountain (with Hatfield Consulting)
Core6 Environmental Ltd.	Appendix 22-A	Human Health Risk Assessment Report
	Appendix 22-B	Screening Level Ecological Assessment Report

Contributing Organization	Appendices	
Ecologic Environmental Consulting	Appendix 1-C	Highway 37 and 37A Traffic Impact Study
	Appendix 9-A	Ecosystems, Vegetation, Terrain, and Soils Baseline Report
Hatfield Consulting	Appendix 20-A	Socio-Economic Baseline
	Appendix 20-B	Visual Quality Assessment
IDM Mining Ltd.	Appendix 1-F	Underground Geological Cross Section
	Appendix 1-G	Mineral Tenures in the Regional Study Area
	Appendix 9-C	Terrain Stability Assessment for the Project Footprint Study Area
	Appendix 27-A	Aboriginal Consultation Report #2
	Appendix 28-A	Public Consultation Report #2
Knight Piésold Ltd.	Appendix 1-A	2016 Geotechnical Site Investigation Report
	Appendix 1-D	Bromley Humps TMF Seepage and Stability Analysis
	Appendix 1-H	Tailings and Water Management Design Report
	Appendix 1-I	Feasibility Study Design Drawings
	Appendix 1-J	Tailings Best Available Technology Assessment
	Appendix 10-B	Bromley Humps Baseline Hydrogeology Report
	Appendix 23-A	Tailings Dam Breach Analysis
Northlink Consultants Limited Partnerships	Appendix 16-A	Baseline Wildlife Resources Reports
	Appendix 18-A	Baseline Fisheries and Aquatic Resources
	Appendix 18-B	Details of Baseline Fisheries Statistics
Palmer Environmental Consulting Group Inc.	Appendix 14-B	Water Quality Assessment of the Reasonable Upper Limit Case
SNC Lavalin Inc.	Appendix 9-B	Red Mountain Geophysical Baseline
SRK Consulting (Canada) Inc.	Appendix 1-B	Geochemical Characterization of Waste Rock, Ore and Talus
	Appendix 1-E	Underground Geotechnical Design
	Appendix 1-K	Geochemical Characterization of Metallurgical Tailings
	Appendix 1-L	Geochemical Characterization of Construction Materials
	Appendix 10-A	Mine Area Hydrogeology Report
	Appendix 12-A	Baseline Climate and Hydrology Report (with Avison Management Serviced Ltd.)
	Appendix 14-A	Surface Water and Groundwater Quality Baseline Report
	Appendix 14-C	Water and Load Balance Model Report

Contributing Organization	Appendices	
Terra Archaeology Limited	Appendix 21-A	Archaeological Overview Assessment
	Appendix 21-B	Preliminary Field Reconnaissance
WSP Canada	Appendix 7-A	Air Quality Modelling Report
	Appendix 8-A	Noise Modelling Report

DISCLAIMER

The information contained in the Application/EIS reflects IDM's best estimate of its plan for developing the Red Mountain Underground Gold Project. It is based on the information that is currently available and believed by IDM and its consultants and advisors to be reliable. In the event of conflicting data, it is assumed the most recent data are correct. Estimates and forecasts of the rate of mining, the sequence of mining, the metal grades, and the levels of metal production have been prepared for the purposes of the environmental assessment process and may not necessarily reflect the final detailed operation plan. Similarly, descriptions of proposed infrastructure represent IDM's best estimate for the purposes of the environmental assessment process and do not necessarily reflect the final detailed plans to be used for construction purposes, which will be refined during and subsequent to the permit application stage. In presenting this information, IDM has relied on the work of its consultants and advisors. The effectiveness of recommended mitigation measures and best practices contained herein cannot be guaranteed if standard operating procedures to implement, maintain, and monitor mitigation works is not undertaken by Qualified Professionals.

This information has been prepared to address provincial and federal environmental assessment requirements for the Project and has not been prepared in accordance with securities regulatory requirements in Canada and the United States pertaining to disclosure of forward-looking information or forward-looking statements. Accordingly, this information may not be relied upon for investment purposes.

All reserve and resource estimates included in this Application/EIS were calculated in accordance with National Instrument 43-101: Standards of Disclosure for Mineral Projects, developed by the Canadian Securities Administrators.

REFERENCES

British Columbia Environmental Assessment Office (EAO). 2017. *Red Mountain Underground Gold Project: Application Information Requirements for IDM's Application for an Environmental Assessment Certificate*. Prepared by the British Columbia Environmental Assessment Office: Victoria, BC.

Canadian Environmental Assessment Act (CEAA 2012), 2012, SC. C. 19, s. 52.

Environmental Assessment Act, SBC. 2002. Regulations Designating Physical Activities, SOR/2012-147. *Reviewable Projects Regulation*, BC. Reg. 370/2002. C. 43.