# THE UNITED REPUBLIC OF TANZANIA MINISTRY OF MINERALS

# **MINING COMMISSION**



# FORMAT FOR PREPARING MINING PLAN

#### 1. COVER PAGE

- 1.1 Name of The Project
- 1.2 Consultant Name
- 1.3 Date
- 1.4 Address

#### 2. EXECUTIVE SUMMARY

**Executive Summary should include:** Purpose and objectives of project, Project descriptions includina location. scale. and scope. Cut-off Resource/Reserve Estimates, Life of Mine (LoM), Mining Method, Equipment and Infrastructure for Mining & Processing, Production Targets, Tonnages of waste Materials (Overburden & Waste rocks), Safety & Environmental Plan, Water Management system, Cost Estimations (Capital costs, Operational costs, & Revenue Projections), Quality Control (Ore mining & Ore processing), (Including Annual Environmental budget for progressive Reclamation rehabilitation) and Mine closure plan

# 3. INTRODUCTION

- 3.1 Location and Accessibility
- 3.2 Topography and Climate
- 3.3 Site/Mine Layout
- 3.4 Mineral Tenure and Surface Rights

# 4. GEOLOGY AND RESOURCE

- 4.1 Regional and local Geology
- 4.2 Drilling
- 4.3 Resource model
- 4.4 Mineral Resource/Reserve Estimates

#### 5. MINING

- 5.1 Geotechnical
- 5.2 Mining Design
- 5.3 Drilling
- 5.4 Blasting and Haulage

Brief description of

- broad blasting parameters like powder factor (powder factor in ore and overburden, waste, development heading, stopes,
- blasting pattern,
- charge per delay, typical number of holes blasted per day or in a round,
- method and sequence of firing
- type of explosives used or to be used
- secondary blasting if needed,
- -storage of explosives in terms of capacity and type of explosive magazine.
- 5.5 Mine operation

Briefly describe the following:

mine layout using longitudinal sections and level plans where necessary indicates

- i) sizes and intervals of levels and raises
- ii) projection of extent of development expected in five years plan with supporting systems
- Method of stopping or any other selected method used for mining
- Ventilation systems and ventilation plan if exist
- 5.6 Equipment Selection

Brief description of

- Mechanization of mine: i.e. calculation for supporting proposed equipment used in different mining operations. e.g. Drilling machine, haulage and transport equipment, here you can tabulate necessary parameters like equipment capacity, diameter.
- 5.7 Stockpiles
- 5.8 Production rate, Mining sequence and Scheduling
- 5.9 Waste rock management

# 6. DRAINAGE AND HYDROLOGY

Provide description of:

- Depth of water table based on hydrology of the mine site
- Water balance around the mine and quality of water
- Water management system including pumping arrangements and places where the mine water is discharged

#### 7. MINERAL PROCESSING

- 7.1 Processing Layout
- 7.2 Crushing and Grinding
- 7.3 Equipment Selection
- 7.4 Tailing Storage Facility

# 8. MINE INFRASTRUCTURE, EQUIPMENT AND POWER SUPPLY

- 8.1 Technology & Equipment Selection
- 8.2 Maintenance plans
- 8.3 Power sources and Supply

# 9. ENVIRONMENT AND SOCIAL COMPLIANCE

- 9.1 Environmental and Social Management programs
- 9.2 Local Content Plan
- 9.3 Mine closure programs

# **10. FINANCIAL EVALUATION**

- 10.1 Capital costs
- 10.2 Operating costs
- 10.3 Market and Price
- 10.4 Project risk and Assessments
- 10.5 Revenues
- 10.6 Government payments (Royalty, Corporate tax, Service levy)
- 10.7 Financial model for at least 5 years projections (include sensitivity analysis)

# 11. CONCLUSION AND RECOMMENDATIONS