



**MINISTRY
OF MINES
& PETROLEUM**

MINING in
ETHIOPIA

**INVESTOR
GUIDE**

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ACRONYMS

ASSM	Artisanal and Small-Scale Miners
CIRDI	Canadian International Resources and Development Institute
COMESA	Common Market for Eastern and Southern Africa
CFTA	Continental Free Trade Area
E-EITI	Ethiopia's Extractive Industry Transparency Initiative
EFCCC	Environment, Forest and Climate Change Commission
EIA	Environmental Impact Assessment
EIC	Ethiopian Investment Commission
EIGS	Ethiopian Institute of Geological Survey
EMDSC	Ethiopian Mineral Development Share Company
EMPBFC	Ethiopian Minerals, Petroleum and Bio Fuel Corporation
EPA	Environmental Protection Agency
ERCA	Ethiopian Revenues and Customs Authority
GDP	Gross Domestic Product
GTP	Growth and Transformation Plan
GSE	Geological Survey of Ethiopia
IGAD	Intergovernmental Authority on Development
MoMP	Ministry of Mines and Petroleum
PLC	Private Limited Company
SMEs	Small and Medium Enterprises
SDGs	Sustainable Development Goals
SOP	Sulphur of Potash
SUMM	Support to the Ministry of Mines Ethiopia
TIN	Tax Identification Number
VMS	Volcanogenic Massive Sulfid
UNDP	United Nations Development Program

01



WELCOME TO

OUR MINING INVESTOR GUIDE

WELCOME TO

OUR MINING INVESTOR GUIDE

Ethiopia is the perfect mining destination for companies looking to invest in a high potential mining jurisdiction. With impressive mineral resources and a government willing and able to execute ambitious economic reforms, the building blocks are in place to create a world-class mining sector.

This guide is designed to provide you the investor with a clear picture of Ethiopia's extraordinary mineral resources, their geology, and the nature of the opportunity for each commodity. It sets out clearly the legal and regulatory framework for Ethiopian mining, including taxation, the environment and community engagement. It also outlines the different players in Ethiopia's mining sector, Federal and Regional, and their respective roles.

You will read that Ethiopia's mining sector has undertaken a major reform programme in recent years. These reforms are designed to make it easier than ever to invest in Ethiopia, encourage exploration and mining, and unlock the sector's full potential and value. These reforms extend from geodata to the licensing process to the management of the artisanal mining sector, and the process is ongoing. Read more about this important work later in the guide.

The Ministry of Mines and Petroleum (MoMP) is the first port of call for all investors interested in Ethiopia's mining (or petroleum) sectors. The MoMP can direct you to the most up-to-date geodata available, guide you to the right legislation and regulations for their businesses, and help you apply for any licenses required. The MoMP also provides straightforward guidance on how to go about investing in Ethiopia's abundant natural resources.



02

★
A QUICK GUIDE TO
ETHIOPIA
AS YOUR
MINING
DESTINATION
OF CHOICE



2 | A QUICK GUIDE TO **ETHIOPIA** AS YOUR MINING DESTINATION OF CHOICE

The country covers 1.14 million square kilometres and has a population of 102 million people, making it Africa's second most populous nation.

Ethiopia has enjoyed international acclaim for its impressive and sustained economic growth and the visionary political leadership of Nobel Laureate, Prime Minister Dr. Abiy Ahmed. Mining reform is high on Prime Minister Abiy's agenda, who intends mining to make up 10% of the country's Gross Domestic Product (GDP) by 2025. To achieve this, the Prime Minister launched the 'Home-Grown Economic Reform Agenda', which seeks to implement the following macroeconomic, sectoral and structural reforms.

HOME GROWN ECONOMIC REFORM AGENDA	
Macroeconomic reforms	<ul style="list-style-type: none">• Strengthening public sector finances;• Correcting foreign currency imbalances;• Controlling inflation;• Safeguarding financial stability; and• Improving access to finance and developing capital markets.
Mining reforms	<ul style="list-style-type: none">• Formalising and supporting artisanal and small-scale mining;• Review gold pricing to reduce incentives for contraband trade;• Address political and legal issues with local communities and incentivising miners to engage and invest in local communities;• Address technical and institutional barriers against large-scale mining projects; and• Develop policies and institutional capacities to create a sustainable and inclusive mining sector with strengthened geological information and diversified product base with industrial input focus.

1 HIGH MINERAL POTENTIAL

Ethiopia has a mining pedigree dating back more than three millennia, with many of its ancient gold mines still in operation and more being uncovered in archaeological excavations.

And gold is just the tip of the iceberg. With known occurrences of more than 30 metallic, industrial, agro and construction minerals as well as rare gemstones, the mineral potential is vast.

Ethiopia is also home to one of the oldest Geological Surveys on the continent, the Geological Survey of Ethiopia (GSE). The data it provides makes both exploration and the acquisition of brownfield projects vastly easier for investors. Available maps include:

- ★ Geoscience and hydro-geology;
- ★ Airborne geosurvey;
- ★ Ground gravity;
- ★ Engineering geology and geohazard; and
- ★ Mineral exploration.

2 PRO-INVESTOR APPROACH TO SETTING UP YOUR MINING COMPANY

Any high-quality investment is built on a foundation of predictability, stability and security of tenure. Ethiopia's government is acutely aware of this, and has put in place world-class safeguards for investors.

3 ONE-STOP SHOP

A total of 16 public and private offices have signed an agreement to offer a one-stop-shop service to investors. These include the following ministries:

Revenues, Trade and Industry, Agriculture, Science and Innovation, Transport, and Mines and Petroleum. Other government agencies include: The National Bank of Ethiopia, Customs Commission, Ethiopian Investment Commission and the Information Network Security Agency. This system is key to increase Ethiopia's trade competitiveness and it will help offices to deliver simple, predictable, efficient and fast services. It will increase revenue and satisfaction of clients, reduce corruption, bring transparency and encouraging export trade.

4 INCENTIVES

The investment policy in Ethiopia is generally established under the principle and practices of a free market driven economy. The government has enacted a very competitive legal and fiscal regime that has attracted many local and foreign mining companies from exploration through to mining activities. The government provides a number of incentives to encourage private investment and promote the inflow of foreign capital and technology in to Ethiopia, the incentives are both fiscal and non-fiscal covering custom duty exemptions, income tax exemptions, and export incentives provided to both domestic & foreign investors.

SUMMARY OF PROVISIONS FOR INVESTORS

LEGISLATIVE FRAMEWORK AND FISCAL REGIME	<ul style="list-style-type: none">• 25% corporate tax rate and permits 10 years loss carry forward;• Attractive royalties:<ul style="list-style-type: none">• 2% for geothermal• 5% for metallic minerals• 4% for industrial minerals• 7% for gold.• Formalising and supporting artisanal and small-scale mining;• Retention of portions of foreign currency earnings and remittance of profits, dividends, principal and interest on a foreign loan out of Ethiopia;• Exemption from customs duties and taxes on equipment, machinery and vehicles necessary for the mining operations; and• 100% exploration cost recovery for successful companies that commenced mining operation.
MINERAL MARKETING	Guarantee licensee's right to sell minerals locally or abroad.
DISPUTE RESOLUTION	Provide for dispute settlement through negotiation & arbitration.
OWNERSHIP	5% government equity.
INVESTOR INCENTIVES	
MARKET FREEDOM	Company or mining licence holder has right to sell minerals domestically or overseas.
COST RECOVERY	All mineral exploration or pre-production costs are 100% recoverable.
EXEMPTION FROM CUSTOMS DUTIES AND TAXES	The mining law provides exemption from customs duties and taxes on equipment, machinery, vehicles and spare parts necessary for the mineral operations.
OPENING OF THE FOREIGN CURRENCY ACCOUNT IN ETHIOPIA	The mining law guarantees the opening and operation of a foreign currency account in Ethiopia.

4 DELIVERY-ORIENTED GOVERNMENT

Ethiopia is rapidly executing high value infrastructure investments carefully designed to give the mining sector the space it needs to grow. These investments ensure that mining companies will have the infrastructure they need to mine at scale, access global markets, and import production inputs quickly and smoothly.

★ ENERGY

The 1,870MW Gibe III hydropower project – which doubled Ethiopia's electricity output – was completed in 2016. Ethiopia is also developing what will be Africa's biggest hydroelectric power plant in the form of 6,000MW Grand Renaissance Dam. This is due for completion in 2022.

★ RAIL

Further expansion is underway with a 656km rail line connecting Ethiopia and to the port of neighbouring Djibouti currently under construction.

★ PORTS

As the port of Djibouti is Ethiopia's main gateway for trade, The Federal Government has taken a stake in the port in order to develop the facilities there. It is also supporting the construction of a dedicated road connecting Ethiopia to the sea through the Eritrean port.

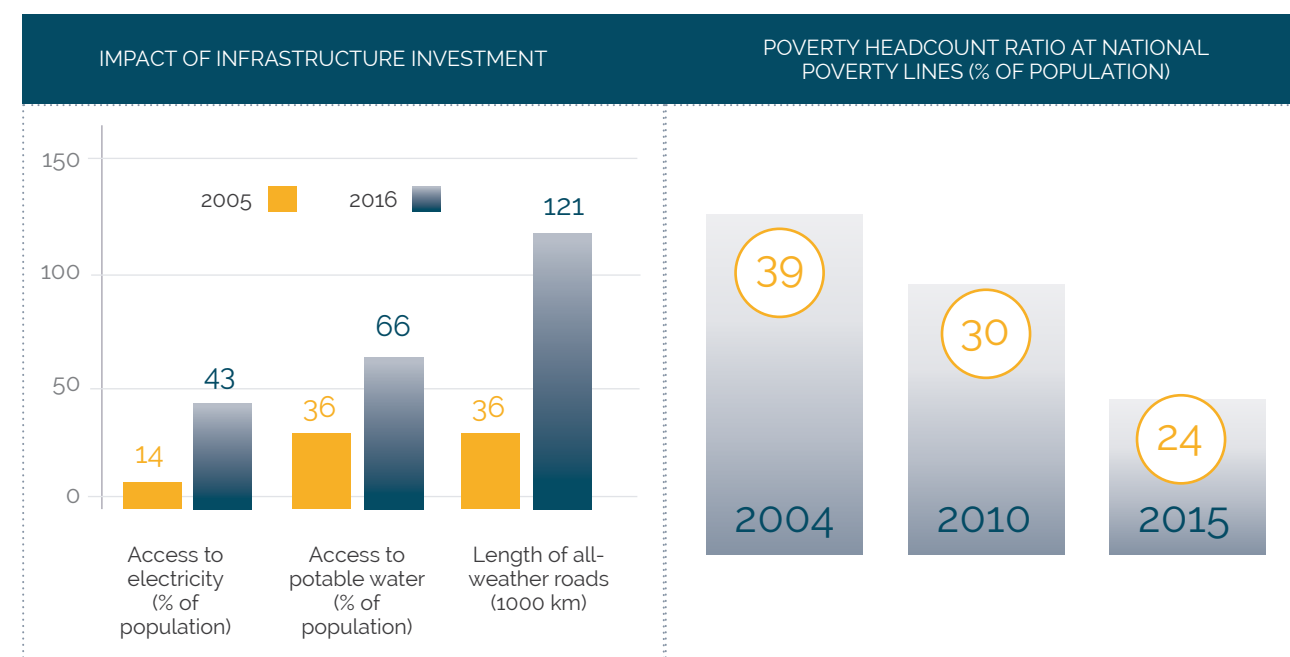
★ ROAD

Between 2010 and 2015, Ethiopia's road network more than doubled to reach 110,414km.

★ AIR

Ethiopian Airways is Africa's largest carrier with access to 70 international destinations, and Addis Ababa airport is now the largest hub on the continent.

Since 2005 there have been significant improvements in access to electricity, potable water, and roads as shown in the chart. This has drastically reduced the poverty headcount.



03

★ ETHIOPIA AT A GLANCE



3 | ETHIOPIA AT A GLANCE



Ethiopia is strategically located in the Horn of Africa, giving it easy transport links to key export markets.

KEY COUNTRY INFORMATION

Bordered by Sudan, South Sudan, Kenya, Somalia, Eritrea and Djibouti.

SURFACE AREA: 1.14 million Km²

CAPITAL CITY: Addis Ababa

POPULATION: 103 million

GOVERNMENT:

Federal Democratic Republic

9 National Regional States

2 city administrations

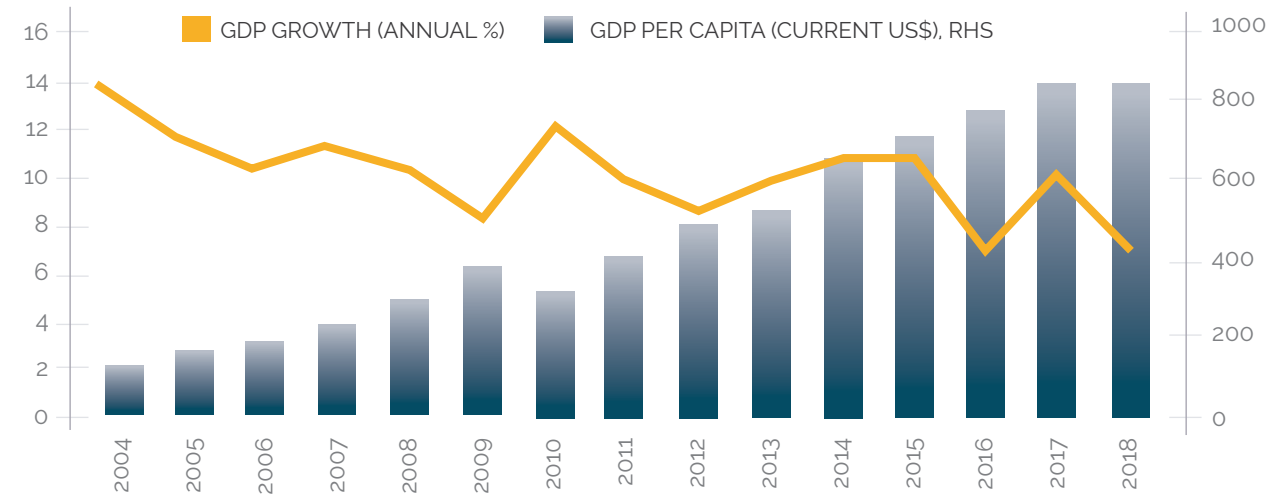
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3.1 A SOARING ECONOMY

Ethiopia is one of the world's most consistently high-performing economies, having an average GDP growth of 9% over the past decade, due in large part to Ethiopia's increased industrial output over that same period. This spectacular increase is the direct result of a carefully implemented state-led growth and development programme, the Growth and Transformation Plan (GTP). This programme is now in its second phase (GTP II) which aims to build on the first phase's successes. The GTP II is also supported by the Home-Grown Economic Reform Agenda.

GDP PERFORMANCE



3.2 GETTING TO KNOW THE GROWTH AND TRANSFORMATION PLAN II

GTP II's primary goal to help Ethiopia achieve low middle-income country status by 2025.

THE PLAN HAS FOUR KEY PILLARS:

i Lower-middle income economy: To achieve and maintain a real GDP growth rate of 11% within a stable macroeconomic environment.

ii Regional hub for innovation & manufacturing: To develop a local domestic manufacturing, engineering and fabrication capacity to improve productivity, quality and international competitiveness. It also seeks to spur structural transformation to reposition Ethiopia as a regional leader in technological innovation and manufacturing.

iii Public participation & local ownership: To build upon and solidify the on-going public mobilisation and organised participation. This is to ensure the Ethiopian public become both owners of, and beneficiaries from, the outcomes of Ethiopia's development.

iv Political stability: To strengthen Ethiopia's democratic institutions.

GTP II also has specific aims for the mining sector; it aims to increase mining revenues to USD3.7 billion by 2025.



04

★ REFORMING THE MINING SECTOR

4] REFORMING THE MINING SECTOR

The Government of Ethiopia has set out a clear "Pathway to Prosperity" through its newest **Home-Grown Economic Reform Agenda**, enabling Ethiopia to reach the status of a middle-income country by 2030.

Great strides have already been taken. Double digit growth and over six-fold increase per capita during 2004-18 led to a 15 percentage points decline in the rate of poverty in Ethiopia (poverty headcount ratio of 39% of the population in 2004 to 24% of the population in 2018).

As part of this ambitious agenda for the country, encouraging private sector investment, streamlining bureaucratic and regulatory procedures, updating policies, and building institutional capacity are all vital. Specific reforms for the mining sector are identified in the Home-Grown Economic Reform Agenda.

THESE ARE:

i

Formalise and support artisanal and small-scale mining;

ii

Review gold pricing to reduce incentives for contraband trade;

iii

Address political and legal issues with local communities and incentivising miners to engage and invest in local communities;

iv

Address technical and institutional barriers against large-scale mining projects; and

v

Develop policies and institutional capacities to create a sustainable and inclusive mining sector with strengthened geological information and diversified product base with industrial input focus.

4.1 NATIONAL PLAN FOR JOB CREATION

Ethiopia's National Plan for Job Creation (2020 – 2025) targets mining as a key sector to achieve its goal to create 14 million jobs by 2025, to absorb the currently unemployed, and to ensure that jobs are waiting for new entrants to the labour market.

Mining has an untapped potential in Ethiopia due to several institutional and technical constraints. Strategies to improve pricing, formalise Artisanal and Small Scale Miners (ASSM) miners and improve large-scale miners' relationships with local communities in the sector are underway to unlock the sector's potential in direct and indirect job creation.

STRATEGY 1

Building a robust policy framework and enabling environment, by formalising ASSMs in order to facilitate government provision of business development support, enforcing the existing legal framework to promote artisanal miners, and improving the ease of access to licenses and finance for Small to Medium Enterprises (SME) and large-scale miners working in mining value addition.

STRATEGY 2

Improving horizontal and vertical integration in the mining sector, by promoting and marketing Ethiopia's mining potential to the international market, improving the accessibility of licensed buyers to artisanal miners, providing competitive prices for gold and similar precious stones, encouraging the formation of Micro, Small, and Medium Enterprises to aggregate artisanal miners' production, and creating incentives for artisanal miners supplying to licensed buyers.

STRATEGY 3

Designing tailor-made skill development programs, by creating a fellowship program targeting professionals in the mining sector, developing SME skills and readiness to provide auxiliary services and products to large-scale firms, integrating training on mineral exploration methodologies into business development support to formalise SMEs, and providing vocational training in value addition practices.

STRATEGY 4

Designing and implementing innovative flagship projects/programs, such as introducing lease capital for the purchase of equipment - e.g., as part of formalisation support, and support geo-chemical atlas mapping.

Reforms in Ethiopia's mining sector are well underway. The Ministry of Mines and Petroleum (MoMP) is already several years into its own ambitious reform programme.

The case for mining sector reform focusses on five areas:

INTERVENTION	ACTIVITIES UNDERWAY
Implementing strategy and improving policy	<ul style="list-style-type: none"> Development of Mineral and National Petroleum Policy. Formalisation of ASSM activities
Revising the legal framework	<ul style="list-style-type: none"> Review of the Mining Operation Proclamation and Regulation Review the Petroleum Operation Proclamation Review of Transaction of Precious Minerals Proclamation
Developing institutional capacity	<ul style="list-style-type: none"> Restructuring of Ministry of Mining and Petroleum to improve coordination between federal and regional mining bureaus, simplifying licensing process Set-up of Mineral Excellence Centre for exploration
Developing human resources	<ul style="list-style-type: none"> Right-sizing of staff complement to attract and retain talent Partnering with higher education institutions to build capacity
Enhancing facilitation through information and technology	<ul style="list-style-type: none"> Operationalisation of a modern and sophisticated cadastre system Digitisation of existing maps and existing data

The MoMP is currently developing a 10-year strategic plan to guide its activities and refine its long-term vision.

To accelerate delivery of this reform agenda, the Support to the Ministry of Mines Ethiopia (SUMM) project was invited by the MoMP to assist in realising the vision for modernisation.

SUMM is a 5-year, CAD\$15 million project launched in 2016, funded by Global Affairs Canada and implemented by the Canadian

International Resources and Development Institute (CIRDI). The project's objective is to support MoMP and the GSE in their efforts to accelerate the development of a sustainable mining sector in Ethiopia. It does so by sharing expertise about improving the organisational and regulatory structures of Ethiopia's mining sector, and building the MoMP's and GSE's operational and strategic capacities.

Reforms at the MoMP began in 2016, and since commencement significant progress has been made. Highlights of progress with reforms so far include:

- ★ Upgrading the mining cadastre system with Regional States fully integrated.
- ★ Moving the mining license application process entirely online via e-portal to the mining cadastre website.
- ★ Refreshing Ethiopia's Mineral Development Policy.
- ★ Developing Ethiopia's National Petroleum Policy.
- ★ Significantly increasing the number of exploration and mining licences issued by the MoMP per year.
- ★ Restructuring of organisational levels inside the MoMP and the GSE to meet current industry needs and enhance service delivery.
- ★ Delivering an ASSM national strategy roadmap, which will see the formalisation of the sector for better management.
- ★ Streamlining federal and regional licences and licencing systems to improve consistency, via in-depth consultations with the regional mining bureaus.
- ★ Establishing the Mineral Excellence Centre inside the MoMP and providing IT equipment and furniture to maximise its utility as a e-learning platform.
- ★ Completing a substantive review of all legal instruments regulating the mining sector in Ethiopia. In addition, the mapping, review and consolidating all federal and regional mining administrative and licensing procedures was delivered.
- ★ Recommending improvements to existing regulations and directives governing the licensing process.
- ★ Establishing the Gender Equality Working Group; which oversees the integration of gender concerns in policies, legislation, strategies, plans and budgets, as well as monitoring and evaluation - including development of gender competence - of MoMP staff.
- ★ Introducing an investor engagement strategy. In the past 4 years, Ethiopian delegations have attended the Prospectors and Developers Association Conference in Toronto (Canada) and the annual 'Invest in African Mining Indaba' conference in Cape Town (South Africa). Promotional materials aimed at investors have also been developed, including the new MoMP website.
- ★ Holding the Ethiopian International Mineral Conference and Exhibition in Addis Ababa in November 2019, to shine a spotlight on the sector for investors.
- ★ Developing a Mining Scorecard for Ethiopia, to identify and track indicators for the governance of the extractive sector.

05



WHAT YOU NEED TO KNOW

ABOUT ETHIOPIA'S MINERALS

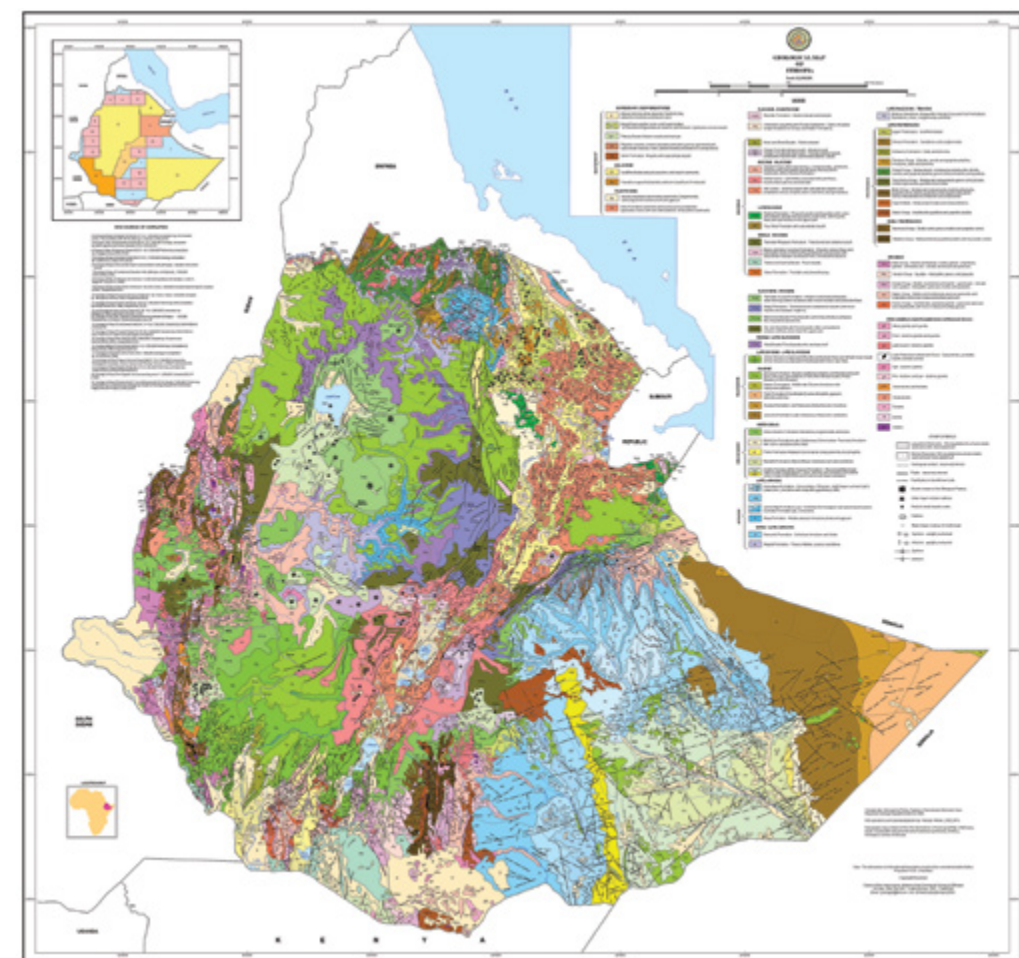
5 | WHAT YOU NEED TO KNOW ABOUT ETHIOPIA'S MINERALS

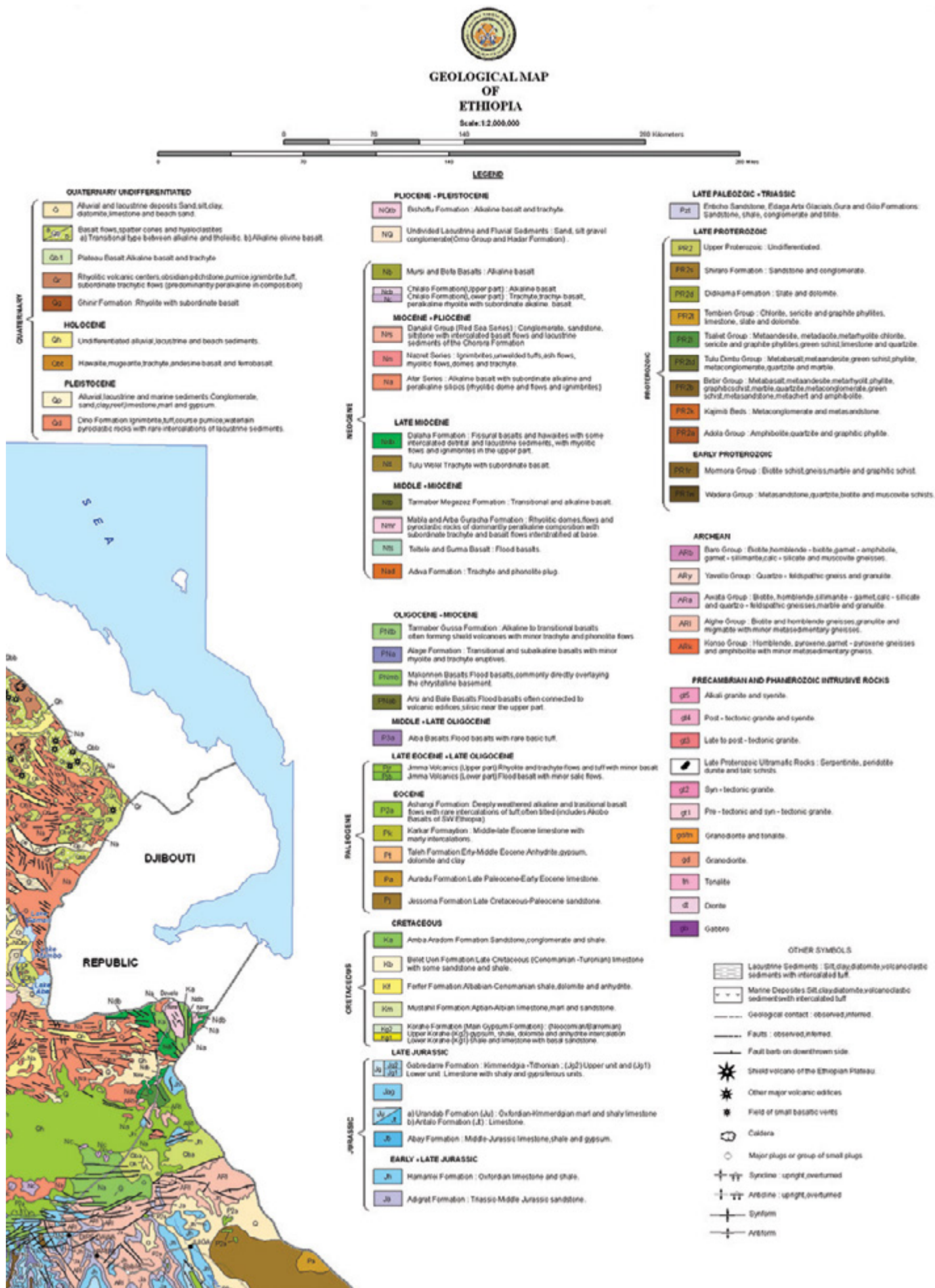
ETHIOPIA'S TERRAIN PRIMARILY CONSISTS IN ROCKS FROM FOUR GEOLOGICAL PERIODS: THE PROTEROZOIC, MESOZOIC, TERTIARY & QUATERNARY PERIODS.

The oldest rocks to be found in Ethiopia are of late Proterozoic age (900-540Ma), and cover slightly less than 25% of the country. In the main, these rocks are exposed in the northern, the western and southern parts of Ethiopia. A scattering of such rocks, however, can be

also found around Harar in the east. Ethiopia's Proterozoic Basement sits partly in the Arabian-Nubian shield that continues to the north into Sudan, Egypt and Saudi Arabia and partly in the Mozambique Belt, which makes up much of the geological basement throughout eastern Africa.

The Proterozoic Basement includes a variety of sedimentary volcanic and intrusive rocks. In general, gneisses are more common and metamorphic grade is higher, in the southern and western terrain compared to the northern terrain. The northern terrain is predominantly made up of volcanic and sedimentary rocks of lower metamorphic grade. So-called "greenstone belts" occur in all three areas.





Mesozoic (251-66Ma) and some slightly older marine, continental and sedimentary rocks cover another 25% of the country. These Mesozoic formations include rocks like sandstone, shale, limestone and gypsum. Eastern Ethiopia contains exceptionally large areas of these kinds of rock – most notably, in the Ogaden Basin. But there are also two sedimentary basins in the centre and to the north of the country.

The remaining 50% of the country is covered by Tertiary (65 – 2.6Ma) and Quaternary (2.6Ma – present time) volcanic and sedimentary rocks. These originate from the formation of the Ethiopian rift, a subsection of the greater East African rift. The Ethiopian rift runs from northeast to southwest across Ethiopia. As such, the Ethiopian highlands are underlain mainly by thick sequences of flood basalt that erupted 65-13 million years ago, while the rift valley itself is covered mainly by Quaternary (<2.6Ma) volcanic rocks and associated sedimentary rocks. Quaternary sediments also occur in other parts of the country and tertiary sediments in the far east.

5.1.1 About the GSE

The Geological Survey of Ethiopia (GSE) is an autonomous institution, with accountability to the MOMP. It is responsible for carrying out basic geological mapping, mineral exploration and related geological activities. The GSE also provides services such as data dissemination, and drilling and laboratory analysis.

The GSE was established in 1968 as a department, becoming autonomous in 1982 as the Ethiopian Institute of Geological Survey (EIGS), before finally being established in its current form in 2000. The GSE is proud to have completed geological and hydro-geological mapping at a scale of 1:250000, for the entire country, and identified several targets for metallic, industrial, energy and construction minerals. This work provides the critical foundation for mineral exploration and mining development projects in Ethiopia. The GSE also plays a vital role in developing critical skills in the field of geo-science.

We invite you to visit the GSE's Data Catalogue online ([access it via www.momp.et.gov](http://www.momp.et.gov)), where you can find the following information:

- ★ High quality geological maps at 1: 2000000 scale (100% complete)
- ★ Ground Gravity maps at 1: 500000 scale (100% complete)
- ★ Geoscience and hydro-geology maps at 1:250000 scale (100% complete)
- ★ Engineering geology and geohazard mapping at 1: 250000 (50.54% complete as of end 2019)
- ★ Airborne geophysics maps (30% complete as of end 2019)
- ★ Mineral exploration maps at various scales.

The GSE is also working to improve the quality of data it can make available to investors. Under the GTP II, the GSE aims to achieve the following by 2025:

- ★ To increase its airborne geophysics survey coverage from 30% to 100%;
- ★ To increase its geo-hazard study coverage (at a scale of 1:250,000) from the current 42% to 100%;
- ★ To make rapid progress mapping the whole country at a scale of 1:100,000 (The GSE has completely mapped Ethiopia at a scale of 1:250,000); and
- ★ To geochemically map the entire country at a scale of 1:1,000,000 scale and provide a Global Geochemical Baseline.

5.2 ETHIOPIA'S MINERAL POTENTIAL

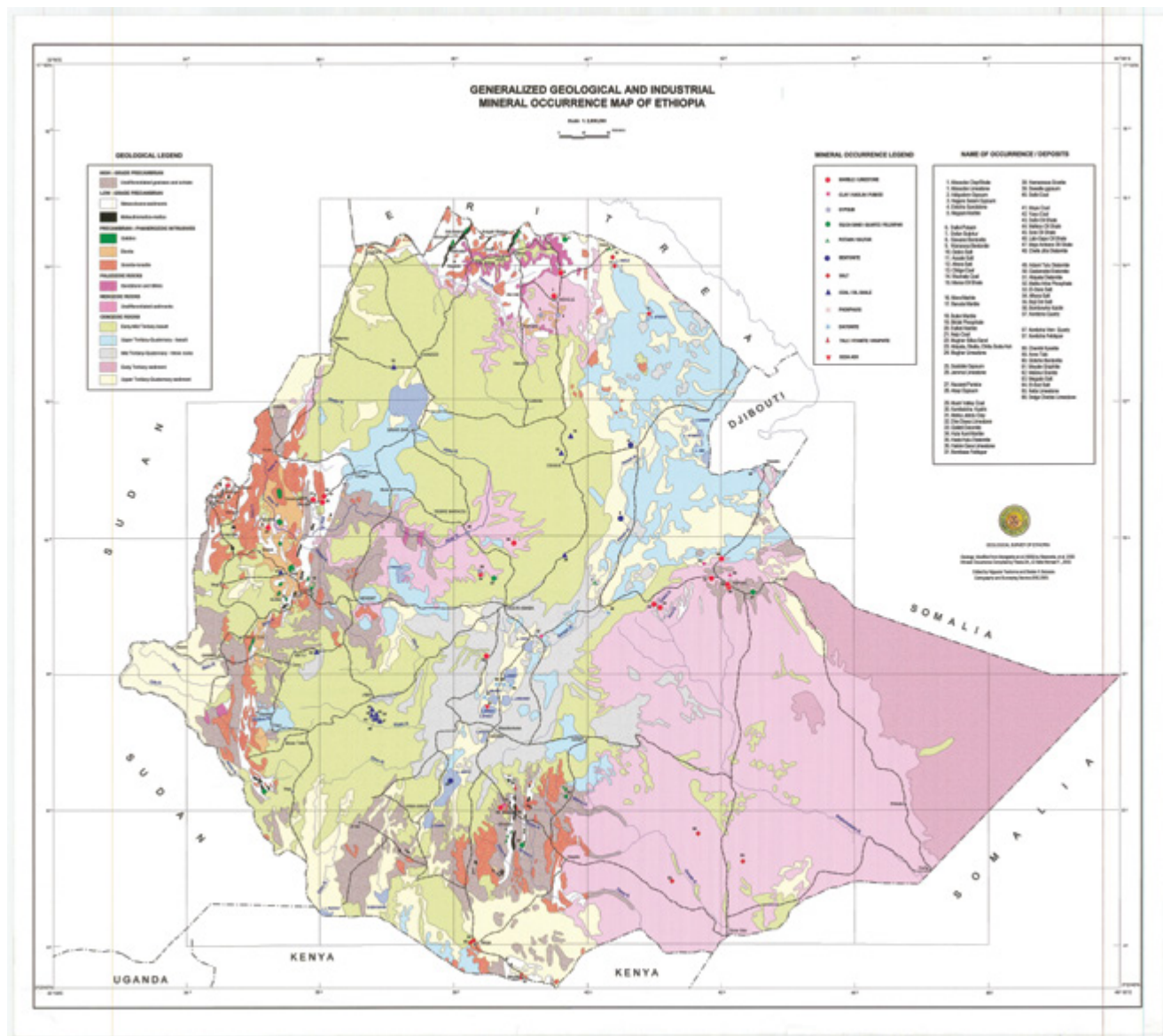
Ethiopia has known occurrences of more than 30 minerals. These include:

- ★ Metallic minerals (gold, platinum, iron, nickel, chromite and base metals)
- ★ Energy minerals (lithium, graphite, tantalum and coal)
- ★ Cement raw minerals (limestone, gypsum, clay, pumice)
- ★ Fertiliser raw minerals (potash and phosphate)
- ★ Ceramics raw minerals (kaolin, feldspar)
- ★ Glass raw minerals (silica sand)
- ★ Dimension stones (marble, granite, limestone, sandstone, diatomite, bentonite, soda ash, salt, graphite and sulphur)
- ★ Gemstones (fiery opals, emeralds, sapphires)

Detailed information and maps on Ethiopia's mineral potential are available on the MoMP website. The Meta data of the mineral exploration reports, conducted by GSE and foreign exploration companies can be obtained from GSE's meta data catalogue that is available online at:
<http://catalog.gse.gov.et/gsemdportal/srv/eng/catalog.search#/home>.

More interactive maps on the geology and mineral potential of Ethiopia will become available soon on GSE's portal at:
<http://gis.gse.gov.et/geoportal/home/gallery.html#c-organization&o=modified>
 and pdf reports and pdf, various format maps will be available for download from:
<http://repository.gse.gov.et/home/>.

The Ethiopian mining cadastre portal has an updated 1:2,000,000 scale geological map of Ethiopia and mineral occurrence points along with the various licenses operated in the country more updated geological maps at 1:250,000 scale and updated mineral points will be available soon on the dynamic map at:
<https://ethiopian.portalminingcadastre.com/MapPage.aspx?PageID=a16a9300-7c58-4f81-9e5c-97e13b22b0c6>.





COMMODITY	RESERVES	UNIT	SIGNIFICANCE
Gold	>200	metric tons	Around Adola, Myale, Metekel, Tulu kape, Dul, Odagodere, Benshangul, Akobo, Tigray
Coal	>360	million metric tons	Around Moye, Delbi, Yayu, Chilga, Gojeb, Mush, Sar wiha kunzila, Wuchale, Haik, Dese, Mersa, Arjo, Mendi, Kindo halal, Morka, Jeren, Lalosapo.
Tantalum	19435	metric tons	Around Adola/Keneticha
Platinum	12.5	metric tons	Around Yubdo, Oromia.
Iron	68.4	million metric tons	Around Bikilal, Melka arba and others.
Nickel	17	million metric tons	Around Adola.
Manganese	207563	metric tons	Around Afar/ Inkafala.
Limestone	>900	million metric tons	Around Mekele, Abay, Butajira, Ogaden, Denakil, Diredawa, Harar.
Gypsum	57.4	million metric tons	Around Tigray, Oromia, Amhara.
Clay	21.6	million metric tons	Around Mossobo, Diredawa, Melka jebdu, Debrebirhan, Burayu.
Potash	1.3	billion metric tons	Around Afar.
Phosphate	181	million metric tons	Around Bikilal, Melka arba.
Marble	100	million metric tons	Around Daletti, Mora, Baruda, Bullen, Hulakuni, Tigray.
Granite	70	million metric tons	
Silica sand	3.4	million metric tons	
Feldspar	500	thousand metric tons	
Quartz	400	thousand metric tons	
Dolomite	2	million metric tons	
Kaolin	>20	million metric tons	
Datomite	>120	million metric tons	
Bentonite	172	million metric tons	
Soda ash	460	million metric tons	
Salt	4.3	billion metric tons	
Sulfur	6	million metric tons	
Graphite	460	thousand metric tons	
Kyanite	>10	million metric tons	
Talc	118,175	metric tons	

5.2.1 Gemstones

Beautiful gemstones are loved and admired the world over, and Ethiopia has them in abundance. From agates and amethysts to shining blue aquamarines, from garnets to multicoloured tourmaline, the opportunities available to investors in the gemstone sector are significant.

1 ETHIOPIAN EMERALDS

COMMERCIAL EMERALDS ARE A REAL & URGENT OPPORTUNITY FOR INVESTORS.

The vibrant green stone is one of jewellery's most beautiful and popular gemstones. Until recently, emerald mining in Ethiopia has largely been carried out by artisanal miners who are organised into unions and cooperatives. As such, emerald mining is emerging as a major sector, creating job opportunities for more than 30,000 Ethiopians. Most emeralds are then exported to Switzerland, Australia and the United States. International gem forums were buzzing in 2017 with the news of the high quality and size of Ethiopia's very recently identified emerald deposits. Discovered in August of 2016 by artisanal miners looking for tantalum, these new finds are comparable to those mined in Colombia in terms of hue and quality. The emerald deposits are located in the Sebo Boru district in the beautiful coffee-producing Oromia Region in southern Ethiopia, where the rural villages of Kenticha and Dermi host particularly high-quality deposits. Ethiopia is currently exploring ways to establish a traceability and identification protocol for emeralds, in order to certify their origin and maximise their value.

2 ETHIOPIAN FIERY OPALS

Ethiopia is well on course to become the first challenger to Australian opals. In 2008, the discovery of spectacular Wollo opals in northern Ethiopia changed the game. This high quality, structurally stable and strikingly beautiful opal was exhibited at the Tucson Gem and Mineral Show in 2010, and Ethiopian opals have been unstoppable ever since.

Between 2000 and 2014 alone, Ethiopia's exports of opals increased by 136.6%. More discoveries followed – **there are now four types of opals being mined in Ethiopia, with the majority only discovered in the last decade:**

SHOWA AND MEZEZO OPALS

These opals were discovered in 1980s on the highland plateau located in the central Shewa province of Ethiopia, 2,500 to 3,299 meters above sea level and covering a large area of 100 to 200 square kilometres. This is a variable opal, including stones with chocolate, honey and fire colours and qualities.

WOLLO OPAL

As mentioned above, the 2008 discovery of the Wollo opal took the gemstone world by storm. The play of colours in the Wollo gemstone often goes through the whole piece of the rough stone, producing a striking form with remarkable patterns. The opal mines extend from the Wollo and Gonder zones over 400 square kilometres in Amhara Regional State. This opal is mined 2,500 meters above sea level in this mountainous terrain.

BLACK OPAL

Ethiopia's most recently identified deposit, Black opal was discovered in 2013 at the Stayish mine just 100 kilometres from the famous and historic town of Lalibela in northern Ethiopia. This is where the stone derives its alternative name - Lalibela opal. Mined in a distinct opal-bearing layer in a mountainous area of around 3,000 meters in altitude, the general body tone of the rock is dark in colour, hence the name 'black' opal. But the opal itself has a vivid play-of-colour.

AFAR OPAL

The Afar opal is commonly fiery, with minor opalescence and a distinctive character. It was discovered as recently as 2010 in the Afar Regional State, in northern Ethiopia. Artisanal and small-scale mining of Afar opals currently takes place in Ethiopia, but large-scale mining has not yet been realised.

3 QUALITY SAPPHIRES ARE FOUND IN ETHIOPIA

Did you know that the top-end Apple Watch has sapphire glass in its screen? It does.

But despite such industrial uses, this most beautiful gemstone is best known - and loved - for its breath-taking appearance in jewellery. Deriving its name from the Greek word sappheiros, sapphires have been used in jewellery for thousands of years. The best-known sapphires are the brilliant blue variety, but they actually come in every colour of the rainbow - including orange, green, yellow and pink. Red sapphires are better known as rubies, although both are varieties of the mineral corundum.

The gemstone world was rocked in November 2016 with the news that high-quality deposits of new and unique sapphire had been found in Tigray.

Early samples taken near the villages of Awaet, Adi-Shumbro and Chila confirm the sapphires are of an impressive quality, good size and with a wide variety - easily comparable to the sapphires of Madagascar. These deposits fall within the western greenstone belts that run from the northeast to the south-west of Tigray, which is primarily an agricultural and cattle farming region.

These sapphires are dominated by a blue-yellow-green series but they also include exciting varieties such as red, purple, white, orange, yellow and even a deep pink. All indications are that Ethiopia's newly discovered deposits are ripe for commercial exploitation. Limited geological and geochemical work in the belt to define the mode of occurrence means that the field is wide open for investors to bring these extraordinary gemstones to a global market.

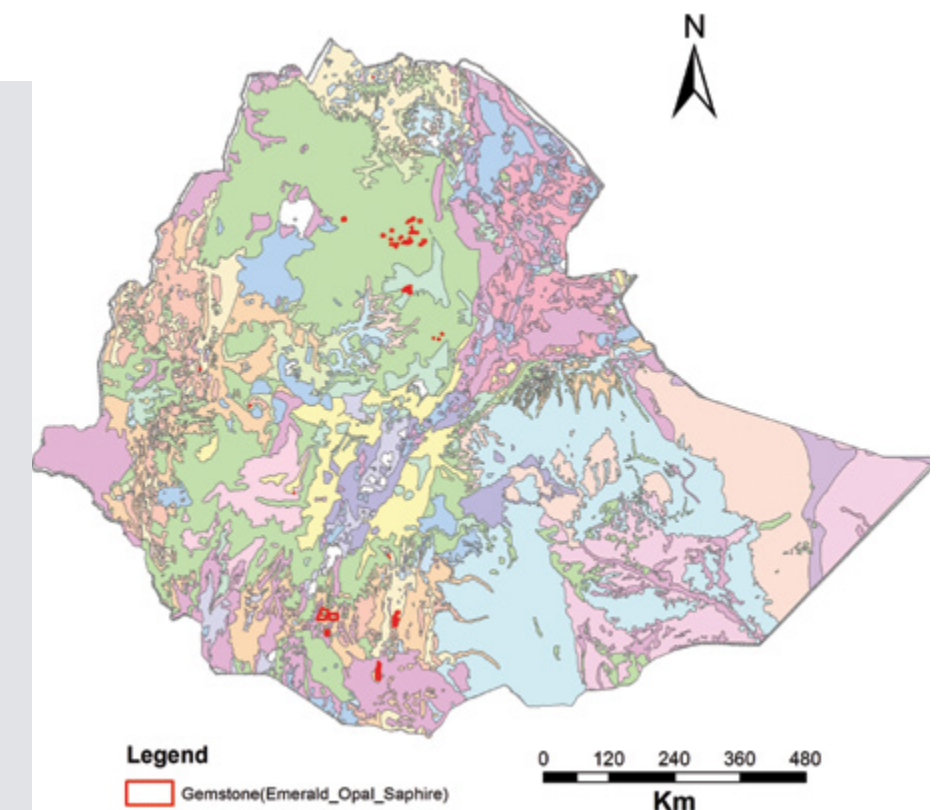


Ethiopians have been mining sapphires artisanally for many years in Tigray, the northern-most of the nine regions of Ethiopia, particularly around a local town called Chila.

There are three well-known types of sapphire in Ethiopia. Blue Star sapphire and Fancy sapphire are common, but it is the 'colour-changing' sapphire from the areas surrounding Chila which is of highest quality and commercially sought.

These colour changing gemstones feature a blue, star and green series and can be classified as either 'High-Fe' sapphire or 'Low-Fe' sapphire, and are formed by magmatic and metamorphic processes. Ethiopia also produces the rare and coveted pink sapphires known as 'padparadscha' (from the Sinhalese word meaning aquatic lotus blossom), which has seen renewed interest since England's Princess Eugenie revealed her salmon padparadscha engagement ring in early 2018.

GEMSTONE
MAP WITH
LITHOLOGY



5.2.2 Metallic Minerals

FOCUS ON ETHIOPIA'S GOLD RESOURCES

The exploitation of placer gold in Ethiopia dates back at least 3,500 years and large quantities of gold have been produced to date, chiefly from placer deposits. Mineral exploration began in the late 1890's by foreign companies. However, modern mineral exploration started in 1968 with the founding of the Geological Survey of Ethiopia (GSE) in collaboration with United Nations Development Program (UNDP).

Since the establishment of the Ethiopian Institute of Geological Surveys (EIGS) in 1983 and later the Geological Survey of Ethiopia, various geological mapping and mineral exploration projects have been undertaken by the government, both on its own and with the assistance of donor organisations. The Ethiopian government has created a favorable business environment to attract mining investors. As a result, a number of companies have been participating in gold exploration activities dating back to the mid-1990s. Current gold deposits of economic

interest have been outlined in several localities of Ethiopia that belong to the Arabo-Nubian shield of late Proterozoic age, developed as a result of PanAfrican tectono-thermal orogeny.

In Southern Ethiopia, the Lega Dembi and Sakaro are the only primary gold mines. However, a number of others gold mines, including Tulu Kapi, Dish and Jilaye (in western Ethiopia), Okote (southern Ethiopia), and Meli (northern Ethiopia) have reached the advanced stages of exploration and are heading towards development.

Precambrian occurrences are being explored and exploited in the southern, western and northern greenstone belts of Ethiopia. Precambrian rocks are the most important repositories for gold deposits. Most gold deposits and occurrences in Ethiopia are genetically related to Orogenic type, though Skarn-related, Intrusive-related, Epithermal and Volcanogenic Massive Sulfid (VMS) types are currently identified. Apart from the deposits of epithermal gold, all of these targets belong to Ethiopia's greenstone belts.

1 SOUTHERN GREENSTONE BELT

The Southern greenstone belt includes the separate Adola-Kenticha, Ageremariam, Arero and Moyale areas, which are associated with gold mineralisation.

★ ADOLA-KENTICHA BELT

Predominantly known as the Adola belt, the Adola-Kenticha belt comprises the primary gold deposits and occurrences of Lega-Dembi, Sakaro, Okote, Wollena, Kumudu, Megado-Serdo, Dawa-Digati, Bore, Abab River, Haranfama (northern Kenticha) and many others. The Adola belt is a major Neoproterozoic shear belt within the Pan-African orogeny, which hosts major primary gold deposits confined in metavolcano-sedimentary assemblage.

★ HAGEREMARIAM AND ARERO GREENSTONE REGION

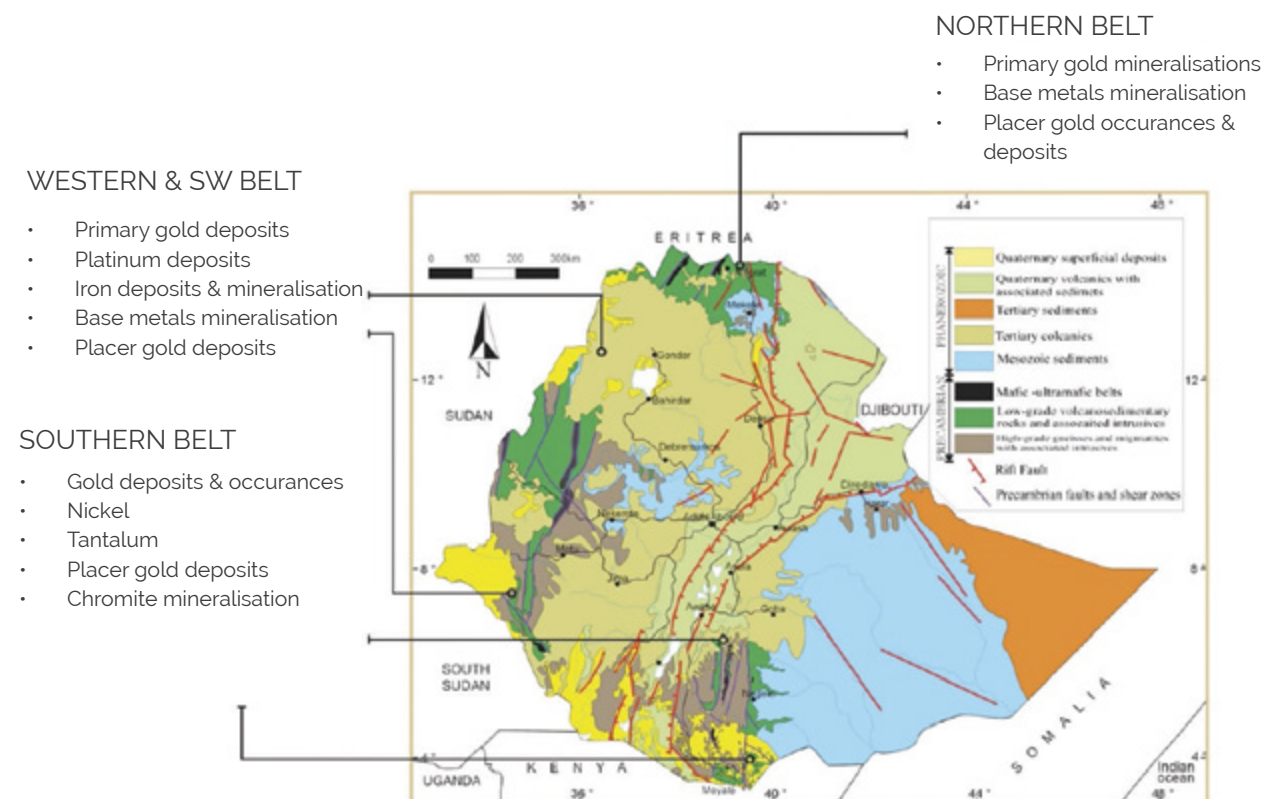
This region hosts pyrite-bearing gold in meta-basic and metaultrabasic rocks as well as gold-bearing quartz veins in intermediate to acid alkaline intrusive rocks.

★ MOYALE GREENSTONE REGION

This region consists of the Haramsam, Hassamte and Chamuk gold prospect areas underlain by meta-granodiorite, amphibolites, gabbroamphibolite, and gabbro and amphibolite schist, which hosts auriferous quartz veins.

MINERAL POTENTIAL OF ETHIOPIA: METALLIC MINERALS

The **placer gold potentials** and so AM activities are mainly confined and located within the **Greenstone Belts** in different parts of the country.



2 WESTERN GREENSTONE BELT

The western greenstone belt stretches more than 600 kilometers from Akobo-SW Ethiopia, and its average width varies from 50 to 200 kilometers. This belt comprises chlorite, sericite and graphitic schist, phyllites, quartzites, and andesitic to rhyolitic volcanics, hosting auriferous veins and alteration zones.

The belt comprises major regions of Gambela, Western Wollega, and Benishangul Gumuz, which include gold prospects at Chamo, Akobo, Guraferda, Gezana, Tumet, Godare, Baro, Ankori, Tulu Kapi, Tulu Kami, Dimma, Baruda, Oda Godare, Mengie, Ashashire, Dul, Gambella mountain, Indaka, Bekoji Motisha, Suken, Egambo, Kilaji, Wombera, Metekel (Jilaye), Guba and other sites.

★ GAMBELA REGION

The Akobo narrow greenstone sub-belt is a high potential target for gold exploration. Akobo's geological setting comprises mafic schists, meta-ultramafic rocks, meta-sedimentary schists, and undifferentiated schists and gneisses.

★ WESTERN WOLLEGA REGION

Gold deposit prospects include Tulu Kapi, Ankori, Tulu Kami, Laga Baguda, Chokorsa, Kata, Nejo, Yubdo, Oda-Godere, and many others. In these areas gold bearing quartz veins are hosted in schists and syenite, as carbonate veins, and in auriferous zones within sheared metavolcanics interbedded with chert and carbonate lenses.

★ **THE TULU KAPI AND ANKORE AREA**, underlain by metasediments, consists of sandstone, phyllites and quartzites at the central part, followed by metamorphosed intrusive units including granites, syenites, and diorite-granodiorites to gabbro in the western and eastern parts of the area. There are also talc schists, chlorite schists, and mica schists. The gold is specifically hosted in the mafic and felsic syenite units. The gold mineralisation in the Tulu Kapi main area is associated with sheared, altered syenite unit. KEFI Minerals Ltd's Tulu Kapi Project has reached an advanced exploration stage. It has established probable reserves of 16.9Mt @1.82g/t (totally 986,000oz Au) and indicated and inferred resources of 24.9Mt @2.34g/t (totally 1,900,000oz Au).

★ BENSHANGUL-GUMUZ REGION

This region consists of meta-volcanic and meta-sedimentary sequences, mafic-ultramafic mega lenses and minor intrusions, as well as composite mafic to felsic plutonic complexes of batholithic dimensions. Gold deposit and occurrence prospects include: Galesa (Tambish, Cholo, Jilaye, Fite, Abaydar), Ablarus, Epar, Dull, Ashashire, Dish, and other areas. The gold deposits and occurrences in Gelasa area are genetically related to the skarn type gold deposit, amounting to more than 40 tons at an average of about 3g/t Au. The Ablarus and Epar gold mineralizations are related to quartz mica schist and metagabbro, and the sericitized metagranite shows low grade mineralisation range from an average of 0.4g/t to 1.19g/t gold. There is also a probability of gold occurrences related to intermediate dyke/sill swarms, skarns and brecciated, hematite quartz veins with minor occurrences in which sulfides (pyrite, pyrrhotite, chalcopyrite, arsenopyrite) are disseminated.



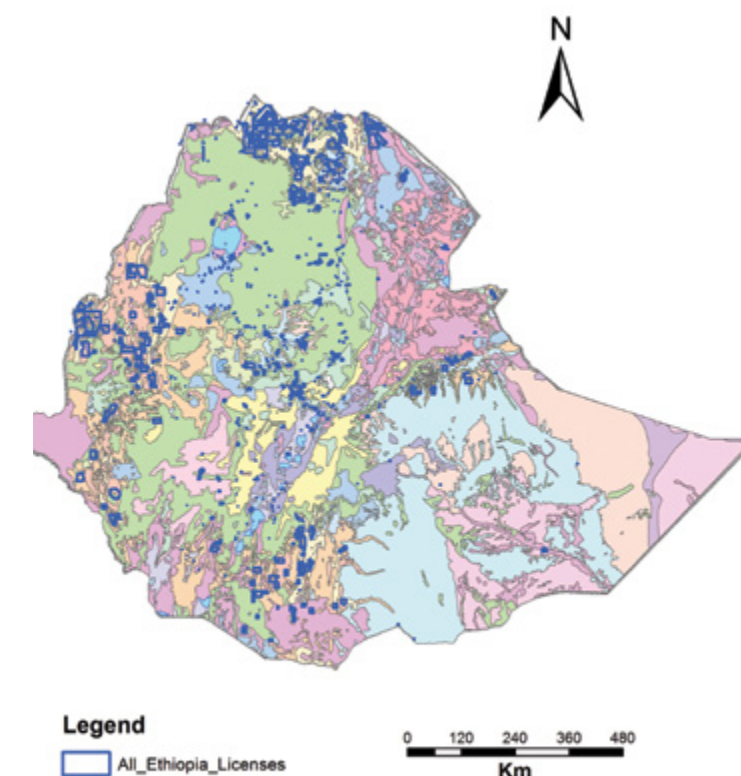
3 NORTHERN GREENSTONE BELT

The third major greenstone belt in northern Ethiopia comprises several meta-volcano sedimentary belts and sub-belts, bounded by mafic-ultramafic rocks, hosting gold and base-metal occurrences. The primary gold occurrences of Terakimti, Adi Zeresenay, Zager, Asgede, Mia Koka, and Niraqqe as well as the base metals of Tsehafi Emba and others are identified. Volcanogenic Massive Sulfide (VMS) type of gold deposits, the southward extension of Bisha VMS gold deposit being mined in Eritrea, has currently been discovered at Meli and Daro, and gold mining from the secondary enrichment of overlying gossan body has already started at Meli by Ezana Mining Ltd. The gold deposits and occurrences of northern greenstone belt are principally hosted in quartz veins of sheared intermediate meta-volcanic porphyry, in a carbonised talc-tremolite-epidote schist, as well as in sericite-chlorite and quartz sericite schists in addition to the sporadic occurrence of graphite.

4 RIFT VALLEY OF ETHIOPIA

Epithermal gold:

A low grade epithermal gold deposit was discovered at Tendaho, in the Afar region of eastern Ethiopia. Geothermal drilling revealed highly silicified zones returning grades of 1 g/t gold. Currently foreign investors are exploring how to best define targets of epithermal gold in the rift system of Afar Region. Other parts of the Rift Valley possess very low-grade gold occurrences, including those reported at Gedemsa caldera, near Adama town. Epar, Dull, Ashashire, Dish, and other areas. The gold deposits and occurrences in Gelasa area are genetically related to the skarn type gold deposit, amounting to more than 40 tons at an average of about 3g/t Au. The Ablarus and Epar gold mineralizations are related to quartz mica schist and metagabbro, and the sericitized metagranite shows low grade mineralisation range from an average of 0.4g/t to 1.19g/t gold. There is also a probability of gold occurrences related to intermediate dyke/sill swarms, skarns and brecciated, hematite quartz veins with minor occurrences in which sulfides (pyrite, pyrrhotite, chalcopyrite, arsenopyrite) are disseminated.



5 PLACER GOLD

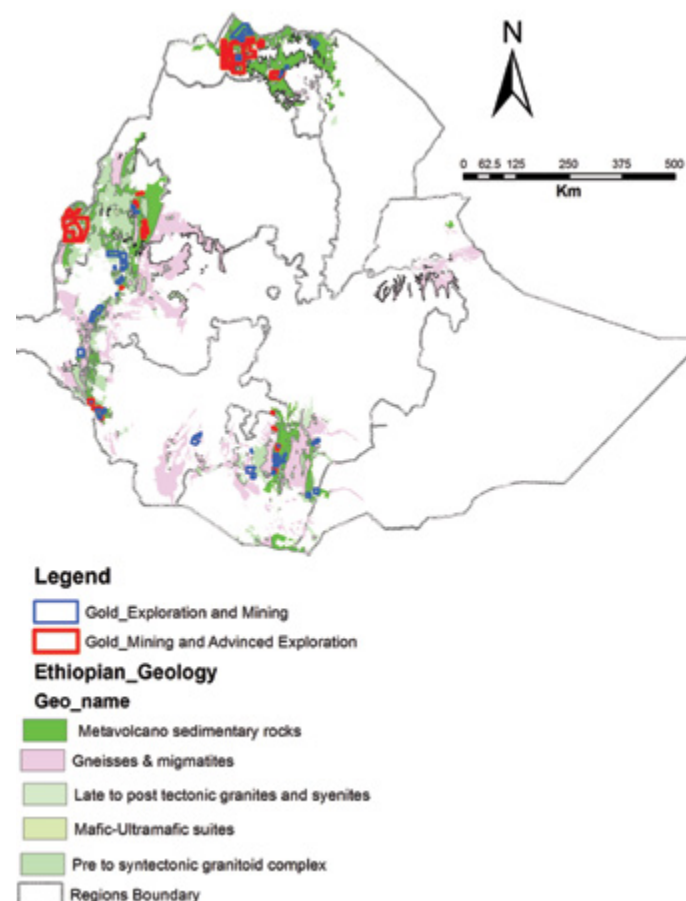
Placer gold has long been considered a prime source of income for local people. Systematic placer gold exploration and prospecting activities have been carried out in different parts of the country, particularly in Adola area of southern Ethiopia since the Italian aggression during World War II. The Ethiopian Government issued a proclamation in 2010 establishing a system to encourage traditional and artisanal mining, which has helped to attract foreign investment. Some significant localities of placer gold, which were recently studied by the GSE, include:

ADOLA-HGEREMARIAM AREA:

Haranfam, Dembloko and Abaya (lower Mormora River), Meleka (Busa-Idra and Haro Dida), Genale Korcha, Barsisa Kochore, Gidicho, Ababa River basin (Abab Gumi and Ababa-Ankora), Raro River basin, Kilenso-Babicho, Meleka and Ropi (Kedida 1,2 and Tritra), Medano and Dogo, Burkuke, Logita, and many others.

GAMBELLA-WESTERN WOLLEGA-BENISHANGUL-GUMUZ:

Placer gold has traditionally been mined in several localities of Akobo Basin, Godare, Guba, Mangie, Sirba, Sirkole, Tumet, Dabus and others.



5.2.3 Industrial Minerals

FOCUS ON ETHIOPIA'S POTASH RESOURCES

Of all of Ethiopia's mineral potential, potash has garnered some of the greatest interest. 95% of world's potash is mined for use in fertilizers, while the rest is used for feed supplements and industrial production.



Potash was known to be mined in Ethiopia as early as the 14th century, from one of the world's largest deposits, located in Dallol. In Dallol, there are extraordinary deposits of evaporite, particularly in the Danakil Depression. Prospectors have been aware of the Danakil Depression's potential since the early 1900s, and efforts to launch small-scale production were made prior to World War II.

Much of the geological setting of the Afar region of northeastern Ethiopia is dominated by Quaternary lacustrine sediments and volcanic rocks of the East Africa rift valley. Interbedded volcano-sedimentary series (SRRS) occur on both sides of Danakil depression and the central section is covered by a thick evaporite succession (the salt formation), which is partially covered by Quaternary volcanic. The salt formation in the depression is composed of a thick evaporite succession of gypsum, anhydrite, interstratified halites and potash salts, as well as shale.

In Danakil Depression, the potash deposit occurs within the evaporite sequence, confined to the limits below sea level. The salt formation is about 450 square miles in surface area. The gypsum beds form the outer most units of the evaporite sequence. The deepest hole drilled in salt recorded the sequence to a depth of 1 kilometer. Several potash horizons are recognised, although only the upper most ones have been exposed. Previous activities carried out by various companies have revealed the presence of two ore bodies at Dallol – the Crescent and Musely ore bodies.

The Crescent ore body is one kilometer southwest of Mt. Dallol. It has an irregular shape, covering a relatively flat lying area of about 1 kilometer long and 100 meters wide. The deposit

surrounds a bubbling spring of magnesium chloride (named Black Mountain) and occurs at depth of 300 feet, mainly in the form of carnalities and some sylvite with a maximum thickness of 200 feet.

Musely ore body is located 4.5 kilometers west of Mt. Dallol, close to a large alluvial formed at the mouth of Musely canyon. It extends over a length of about 4 kilometers and is about 1.5 kilometers in width along the trend of NNE. Musely's largest potash deposit was extensively explored during 1960s, within a thick sequence of halite. The potash-rich interval consists of sylvite (upper most), carnallite, and basal kainite. This interval was explored at Musely by drilling at 300 meters spacing, by shaft-sinking (90m) and by some 800m underground working to evaluate minability. Drilling indicates the presence of a potash bearing horizon of 500-meter depth, in line with what was found by the underground and shallow drilling work.

During earlier investigations, the ore reserve was estimated at over 12 million tons, based on the cut-o. value of 25% KCL. However currently there are companies with successful ongoing potash operations. Yara Dallol and CIRCUM Minerals Ltd are two companies operating in the Danakil Depression. Both have undertaken feasibility studies in recent years, with significant reserves of natural resources for the production of Sulphur of Potash (SOP) identified in their allocated exploration areas. The current resource drill covered about 40% of concession area. Seismic data confirms continuity of the potash layers throughout the rest of the area. This suggests an overall resource potential size of 11 to 12 billion tons of potash bearing salt beds, making the Danakil depression potentially one of the world's largest undeveloped potash mineral deposits.

POTASH MINERAL RESOURCES

CATEGORY	TONNAGE (MT)	KCL (%)	KCL MT)
MEASURED	1,229.9	18.8	231.7
INDICATED	1,603.8	18.3	294.1
MEASURED & INDICATED	2,883.7	18.6	525.8
INFERRED	2,098.5	17.5	366.5
TOTAL	4,932.2	18.1	892.3

Focus on Ethiopia’s Tantalum resources

Today tantalum capacitors are used in almost every kind of eletronic device, and the increaing penetration of the smartphone market means tantalum demand is only set to grow in the coming years. Ethiopia is already the sixth biggest producer of tantalum in the world with the potential to dramatically increase its standing.

The known potential prospects of tantalum and niobium occurs in the Kenticha granite pegmatite field, with an area of 2,500 km2, in the Neoproterozoic greenstone basement of Southern Ethiopia. The Ta bearing pegmatite deposit in Kenticha Field is exposed over a 2.5-kilometer-long and 40 to 70-meter-wide area occurring in a package of steeply dipping serpentinites and talc-tremolite schists. The thickness of the pegmatite varies. In locations where both hanging and foot wall contacts are exposed, thickness ranges from 40 to 70 meters. The upper part of the ore body is strongly weathered to a variety of clay minerals. The tantalite occurs in grain size from a few millimeters up to about 5 cm. Weathering has affected the feldspar and most of the lithium-bearing minerals, whereas the tantalite is unaffected by the weathering.

The deeper part of the ore body is hardrock, non-weathered pegmatite. This ore body has about the same tonnage as the weathered ore body, but has not yet been exploited. The

POTASH PROVEN & PROBABLE RESERVES

CATEGORY	KCL IN RES. (MT)	CONVERSION FACTOR (%)	KCL (MT)
PROVEN	191.0	23.765	45.3
PROBABLE	263.1	23.765	62.4
TOTAL	454.1	23.765	107.8

Kenticha pegmatites display complex zoning. Apart from columbite, a number of lithium minerals such as lepidolite and spodumene are found. Furthermore small amounts of beryl and sulphides occur.

Mining of tantalum niobium, which focused principally on the main Kenticha pegmatite site, 50 kilometers south east of the gold mining town Shakiso, contributes to about 10% of world consumption. Other rare metal bearing pegmatite (Bupo, Kilkile, Dermidama) lie along the northern and southern in the extension as well as in the eastern sub parallel trends of Kenticha pegmatite.

The rare metal bearing pegmatite with the main Kenticha deposit has proved to be a world class ore reserve of tantalite with subordinate niobium, lithium beryllium bearing minerals in addition to high quality ceramic grade quartz-feldspar, and other industrial minerals. The complex ore is associated with a primary granitepegmatite body and to a lateritic mantle of weathering developed over the primary pegmatite.

In general three types of the deposit have been recognized:

- PRIMARY ORE:
- ★ Tantalite bearing granitepegmatite with complex Ta-Nb-Li-Be mineralization.
 - ★ Lateritic type Ore: The mantle of weathering developed over pegmatite and granite.
 - ★ Elluvial, delluvial and alluvial placer ore: The weathered ore developed over the primary ore of pegmatite represents the huge rare-metal resources of the Kenticha deposit.

Ethiopia has been mining and exporting tantalite via the Ethiopian Mineral Development Share Company (EMDSC). About 100-120 T of Ta2O5 per equivalent concentrate containing 50–60 wt.% of Ta2O5 to the metallurgical industries which are providers of Nb and Ta for 60 wt% production of the capacitor. The mine is estimated to contain primary ore with a probable reserve of approximately 17,000 tons containing 0.017% Ta2O5. The probable reserve of primary ore is 2,400 tons at a grade of 0.015% Ta2O5. Ethiopia hosts important rare metals, in particular tantalum mineralization, however it has not been fully utilised. Ethiopia Minerals, Petroleum, and Biofuel Corporation plan to increase the production of tantalum through its successive expansion projects and to improve the quality of the products. It also wishes to work in joint venture investment in exploration, development, mining of mineral resources and producing value added materials from tantalite concentrate in Ethiopia.

5.3 ASSM IN ETHIOPIA

Ethiopia's long history of artisanal mining spans three millennia. The gold deposits in Ethiopia's rivers, for example, have been exploited for thousands of years by small scale miners.

Today ASSM happens all around the country and still plays an extremely important role in Ethiopia. However, much artisanal mining activity remains informal, and historically the sector has not benefitted from much formal support or regulation from the Government. Due to this, developing and formalising the Artisanal and Small-Scale Mining sector has become a high priority both for Ethiopia's

Homegrown Reform Agenda and for the MoMP. Significant reforms are underway to transform ASSM activity into a sustainable livelihood, enabling government to increase revenue from the sector; create responsible, inclusive small enterprises to engage safely and legally in the mining sector; create jobs, and pave the way for the collaborative coexistence with large-scale mining that led to sustainable development.

5.3.1 Ethiopia's Artisanal, Special Small-Scale Mining National Strategy

Ethiopia has recently put in place a comprehensive ASSM National Strategy for all strategic minerals mined at the Artisanal level. With the aim to modernaise the process and make the mining sector an attractive jurisdiction for large-scale investment. The strategy plays a vital role to advance the development of the sector to contribute in a more meaningful way and increase its overall contribution and help capture the revenues in a systematic manner.

Its primary objective is to formalise the artisanal mining sector and promote responsible, inclusive and productive operations that contribute to sustainable development. In order to achieve this, the Government of Ethiopia has adopted a coordinated approach to deliver on the following key objectives:

- 1 Strengthen ASSM governance so that it is an attractive and conducive jurisdiction for investment as part of the formal economy. Three aspects of good governance need to be strengthened; namely, law and regulation, structural management, and geosciences data.
- 2 Increase efficiency, productivity and competitiveness of local mineral producers at ASSM level. This incorporates promoting access to capital, access to technology, and access to skilled labour.
- 3 Enhance value addition and maximise earnings by ensuring access to local processing facilities and markets and developing supplier and diversified businesses.

4

Foster an environmentally and socially responsible ASSM sector that complies with appropriate environmental, community, health and safety standards.

5

Promote two important issues that crosscut in each of the other four objectives; namely, women's fair participation and beneficiation in ASSM and utilisation of indigenous knowledge.

5.3.2 Artisanal mining today and in history

As noted earlier, the history of artisanal mining in Ethiopia spans three millennia – particularly for gold. Some historians have estimated that the oldest mine in the world, dating back more than 6 000 years, was in western Ethiopia near the Sudanese border. The numerous placer gold deposits in Ethiopia's rivers have been exploited for thousands of years by small-scale miners using rudimentary techniques in the water and river sands.

Currently, artisanal and small-scale miners are producing clay, crushed stone, diatomite, a wide variety of gemstones including opal and emeralds, gold, gypsum, salt, sand, silica sand, and tantalum. However, it primarily still focusses on gold, gemstones (especially opals) and tantalum.

Well known Artisanal mining areas in Ethiopia's rich greenstone belts are displayed in the map below:

5.3.3 Artisanal mining, employment and the economy

A 2016 ASSM study concluded by Ethiopia's Extractive Industry Transparency Initiative (E-EITI) uncovered the following interesting facts:

- ★ Artisanal mining contributes about 65% of Ethiopia's foreign exchange earnings
- ★ It directly employs around 1.26 million people
- ★ It is a source of livelihood for a further 7.5 million people.
- ★ Those who engage in artisanal mining are highly dependent on that income stream, with an estimate 74% of their livelihoods coming from mining.

Artisanal mining also plays an important role in discovering new mineral deposits and in curbing rural to urban migration.

5.3.4 Improving market access and increasing earnings

While Ethiopia has an artisanal mineral operations licensing process in place, around 94% of active artisanal miners are unlicensed. Relatedly, only around 20% of the royalties owed by artisanal miners are actually collected. This means that, with better sector oversight, ASSM has the potential to be a far more potent contributor to Ethiopia's fiscus.

Another related challenge is that much of the trade in the minerals produced by the ASSM sector is illegal. The E-EITI's ASSM study estimated that the volume of mineral marketed through formal (legal) channels is only 39% of the total production.

The minerals that are collected by legal buyers at production site (from both legal and informal producers) is directly channelled to the National Bank of Ethiopia for export. However, the remaining balance (61%) goes through informal channels, and is largely absorbed in the local markets, with some possibly exported.

The MoMP, along with a host of other ministries and stakeholder groups, is actively seeking to address this issue by developing centralised

formal market centres close to mining areas that are legally connected with central regional, national and international markets.

5.3.5 Profile of an artisanal miner in Ethiopia

Artisanal miners tend to be at the peak productive age of 18-45 years old, meaning that Artisanal Mining is an important source of employment for Ethiopia's youth, especially in rural areas. The majority of artisanal miners are men. Studies find that women (as well as children and the elderly) are participating less and less in the sector, due to surface mining becoming increasingly untenable as placer gold in Ethiopia has been almost entirely depleted. This means that Artisanal mining increasingly requires digging or tunneling, activities that are dominated by men.

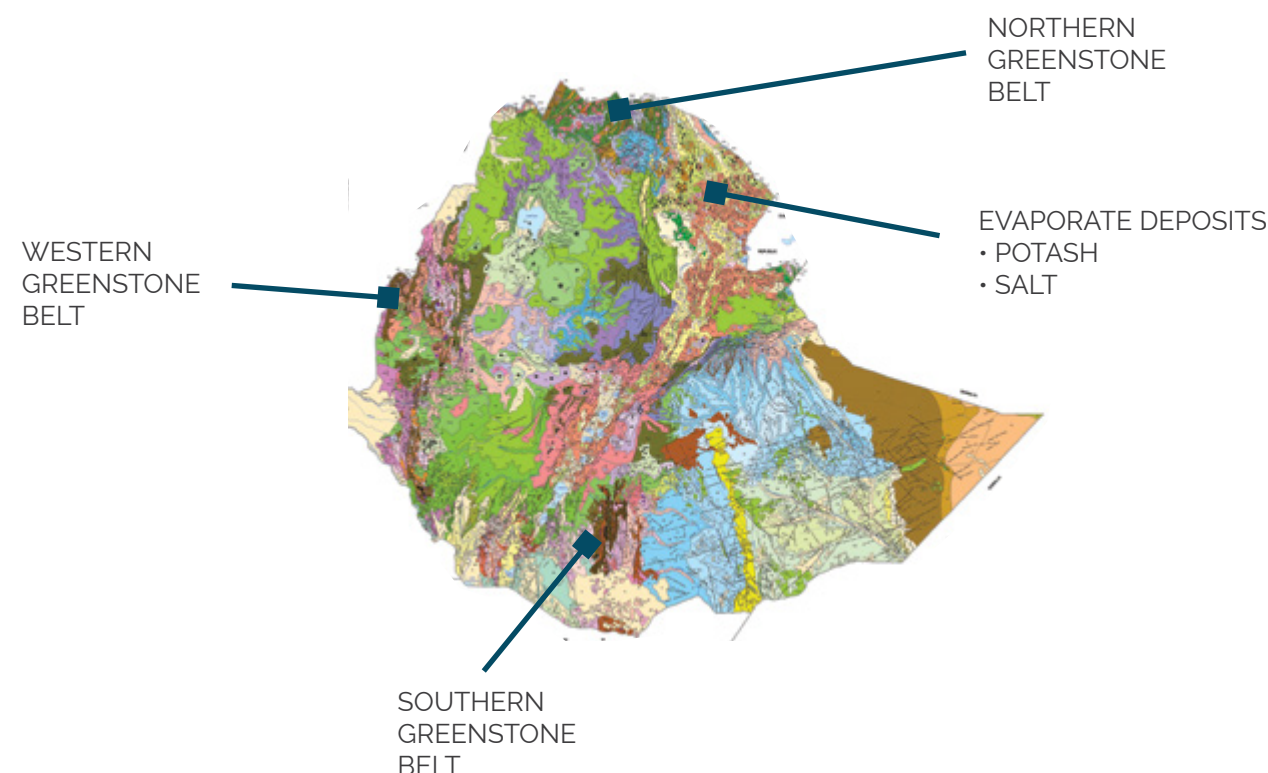
5.3.6 Prioritising women in the ASSM sector

Ethiopia has taken measures to tackle gender inequality in mining broadly and in artisanal mining in particular. A Gender Equality Working Group (GEWG) has been established to help improve gender equality in Ethiopia's mining community.

The main focus of the working group is on integrating gender concerns and opportunities into all relevant policies, legislations, strategies, program designs, plans and budgets coming out of the MoMP. The GEWG mandate also included a systematic contribution to the development of the mining sector, achievement of the Ethiopian Home Grown Economic Agenda objectives with equitable benefits accruing to Ethiopian women and men actors in alignment with the Sustainable Development Goal and Agenda 2030. It is currently actively engaged in (1) reviewing and analyzing Ethiopia's existing policies, legislations, regulations, plans and budgets from gender perspective and (2) enhancing the gender competence of human resources to ensure that gender principles, values, norms and practices are adopted into the MoMP's organizational culture. This will include reforms and advances made in relation to the ASSM sector. In addition, MoMP is currently developing a Gender Equality Strategy benchmarking international leading practices for the Mining Sector to ensure the inclusion of Gender mainstreaming and

ARTISANAL (± SMALL SCALE) MINING AREAS IN ETHIOPIA

The **placer gold potentials** and so AM activities are mainly confined and located within the **Greenstone Belts** in different parts of the country.



Sustainable Development approaches in its organizational policies, systems, processes and accountability mechanism.

5.3.7 Environmental impact

As artisanal mining increasingly requires digging or tunneling, its environmental impact is also on the increase.

Unfortunately, few ASSM miners are aware of the harmful effects of mining, which can cause deforestation (excessive tree felling), soil erosion and land degradation. In general, artisanal miners do not take any rehabilitative or restorative measures to ameliorate the environmental impacts caused by mining.

The MoMP has taken steps to lessen the environmental impact of artisanal mining by providing a set of guidelines for artisanal miners, local communities surrounding artisanal mining sites and licensing authorities. These guidelines will help artisanal miners become aware of the potential dangers of their activities and help them mine in a more sustainable way. It will also improve the management of the artisanal mining sector by providing the licensing authorities with a set of checks and balances they did not previously have. **(Guide available on MoMP website).**



06



INVESTING IN

ETHIOPIA'S MINING SECTOR

6] INVESTING IN ETHIOPIA'S MINING SECTOR

Ethiopia's Home-Grown Economic Reform Agenda seeks to propel Ethiopia into becoming the African icon of prosperity by 2030. Key in this agenda are macroeconomic, structural and sectoral reforms that will pave the way for job creation, poverty reduction, sustainable and inclusive growth.

Key reforms geared towards investment enhance ease of doing business in the country:

1 ONE-STOP SHOP POLICY

At the beginning of 2020 a total of 16 public and private offices signed today an agreement to offer a one-stop-shop service to clients.

These include:

Revenues, Trade and Industry, Agriculture, Science and Innovation, Transport, and Mines and Petroleum ministries, The National Bank of Ethiopia, Customs Commission, Ethiopian Investment Commission and the Information Network Security Agency. This system is key to increase our trade competitiveness and it will help offices to deliver simple, predictable, efficient and fast services. For Ethiopia it will increase

revenue and satisfaction of clients, reduce corruption, bring transparency and encouraging export trade.

2 MINING CADASTRE SYSTEM

Ethiopia has introduced a digital mining cadastre system, the first of its kind in Africa as it covers both federal and regional licences as well as artisanal and small-scale licences issued and managed by the region, which handles all licence applications and also provides users with vital mining-related information. This multipurpose portal allows investors to engage directly with the Ministry and regional mining authorities with online registration. It should be the first point of contact for any investor wishing to apply for a mining licence, pay royalties, submit environmental impact assessments, or check their health and safety compliance status. (<https://ethiopian.portal.miningcadastre.com>)

3 INFORMATION AVAILABILITY

The Ministry of Mines and Petroleum has revamped its website making it more user friendly with detailed information regarding all mining processes.

6.1 HOW TO APPLY FOR A LICENSE

The MoMP issues seven types of mining license in total, which are:



1

A Reconnaissance License



4

An Artisanal Mineral Operations License



7

A Large-Scale Mineral Operations License



2

An Exploration License



5

A Special Small-Scale Mineral Operations License



3

A Retention License



6

A Small-Scale Mineral Operations License

TYPE OF LICENSE	DETAILS
Reconnaissance License 	Allows its holders to do a general search for any mineral in a particular region. It is issued for an 18-month period, and is non-renewable and non-exclusive.
Exploration License 	Allows its holders to search for any mineral in a specified region by means of photographs, images, geological, geochemical, geophysical or drilling. This License is exclusive, and is initially issued for 3 years. An Exploration license can be issued and renewed for a maximum of 10 years. However, upon each renewal the license holder is required to relinquish a portion of the licensed exploration area unless they can declare a resource.
Retention license 	It can be issued to an applicant that has discovered a mineral resource of economic significance, but which cannot be developed immediately due to adverse market conditions or because the required processing technology might be unavailable. This is an exclusive license that is initially issued for 3 years. After the 3-year period it may be renewed once more for an additional 3 years.
Artisanal Mineral Operations License 	This is issued either to an individual or a small or micro enterprise whose mining operation is mostly manual and does not involve employed workers. It is exclusive, non-renewable and is issued for a maximum of 2 years.
Special Small-Scale Mineral Operations License 	This is issued to holders of an Artisanal Mineral Operations License who now have the capacity to employ machinery in their mining operations. A Special Small-Scale Mineral Operations License is exclusive, and is only issued to holders of an Artisanal Mineral Operations License. It is initially issued for 10 years, after which it needs to be renewed every 5 years.
Small-Scale Mineral Operations License 	This is issued a mining operation whose annual run-of-mine ore does not exceed a specified amount. The maximum allowed run-of-mine ore amount varies depending on the relevant mineral. A Special Small-Scale Mineral Operations License is exclusive, is initially issued for 10 years, and after the initial 10-year period, it needs to be renewed every 5 years. The maximum run-of-mine ore for a Small-Scale Mineral Operations License is highlighted in the table below:
Maximum run-of-mine ore for a Small-Scale Mining license For metallic minerals (e.g. iron, lead, copper or nickel) the maximum is <ul style="list-style-type: none"> 150, 000 tons for an open pit mine, or 75, 000 tons for underground operations For industrial minerals (e.g. kaolin, bentonite, diatomite, dolomite, quartz or coal) the maximum is <ul style="list-style-type: none"> 120, 000 tons For construction minerals the maximum is <ul style="list-style-type: none"> 80, 000 cubic metres for material like sand, gravel, pumice, ignimbrite or clay 10, 000 cubic metres for dimension stones (e.g. marble or granite) For salts extracted from brine the maximum is <ul style="list-style-type: none"> 14, 000 tons For precious or semi-precious stones, the maximum is <ul style="list-style-type: none"> 100, 000 cubic metres for a placer operation 75, 000 tons for a primary deposit mining operation 	
For more details, see Proclamation No. 678-2010.	
Large-Scale Mineral Operations License 	This is issued to a mining operation whose annual run-off of mine ore exceeds the maximums amounts allowed under a small-scale license. It is exclusive, initially issued for 20 years, and after the initial 20-year period, it needs to be renewed every 10 years.

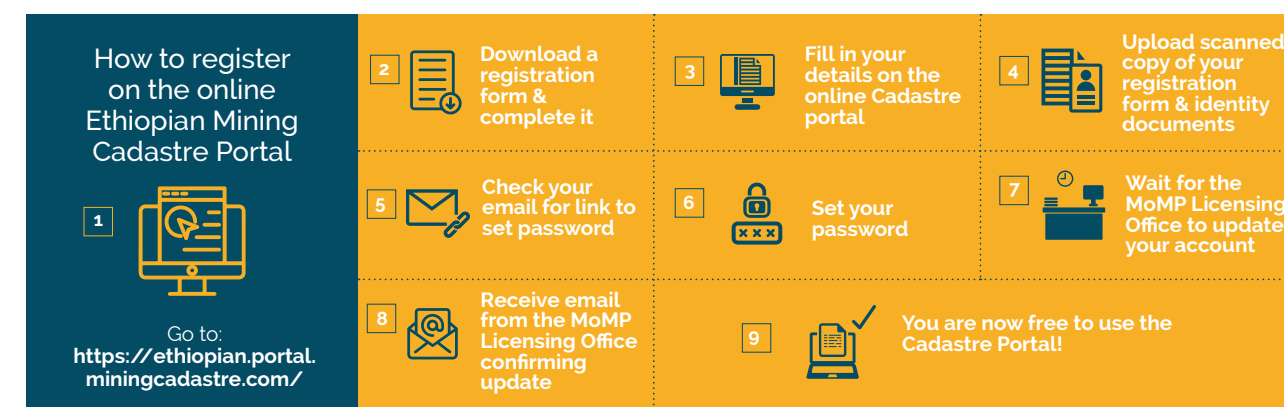
6.2 MINING LICENSE APPLICATION PROCESS

As part of Ethiopia's ongoing reforms, the application process for any and all mineral operations licenses from the MoMP is now entirely paperless and is done via an e-portal.

(<https://ethiopian.portal.miningcadastre.com/>).

Applicants simply need to register on the Ethiopian Mining Cadastre Portal. Once registered, users will be able to submit all applications and supporting documentation electronically via the Portal.

CADASTRE REGISTRATION PROCESS



LICENSE APPLICATION PROCESS



6.3 WHAT YOU NEED TO KNOW ABOUT ETHIOPIA'S LEGAL & REGULATORY FRAMEWORK

For investors wanting to get up to speed with Ethiopia's legal and regulatory framework, there are a number of proclamations and regulations for mining operations in Ethiopia, all of which are available for download via the MoMP's website. A number are highlighted on the following page:

THEME	PROCLAMATION
Core mining legislation and regulations	<ul style="list-style-type: none"> • Mining Operation Proclamation No.678/2010 (as amended by Proclamation No 813/2013) • Mining Regulation Proclamation No. 423/2018 • Transaction of Precious Minerals Proclamation No. 651/2009 • Transaction of Precious Minerals Proclamation No. 651/2009
Tax	<ul style="list-style-type: none"> • Income Tax Proclamation. No. 979/2016 • Mining Income Tax Proclamation No. 53/1993 • Mining Income Tax (Amendment) Proclamation No. 802/2013
Environment	Environmental Impact Assessment (EIA) Proclamation No. 299/2002
Commercial licensing	Commercial Registration and Licensing Proclamation No. 980/2016
Human Rights and Civil Society	<ul style="list-style-type: none"> • Ethiopian Human Rights Commission Proclamation No. 210/2000 • Cooperative Society Proclamation No. 985/2016 • Organisations of Civil Societies Proclamation No. 1113/2019 • Establishment of Cooperative Association Proclamation No.274/2002
Land use	Rural Land Administration and Land Use Proclamation No. 456/2005
Labour	Labour Proclamation No. 377/2003

6.3.1 Mining legislation and regulations

Mining Regulation Proclamation No. 423/2018

This is the key legislation that regulates the mining sector. It was amended in 2018. The Proclamation seeks to give effect to the principle of the custodianship of the country’s mineral resources by the Government; promote socio-economic growth of the country; promote employment and advance the social and economic welfare of all Ethiopians; provide for security of tenure for all investors in respect of exploration and mining operations; and ensure that the country’s mineral resources are developed in an orderly and sustainable manner. The amendments provided for additional incentives, government participation, royalty regulations, social responsibility as well as the size of the license area.

Mining Operation Proclamation No.678/2010 (as amended by Proclamation No 813/2013)

This proclamation promotes sustainable

development of mineral resources. It governs the conduct of all mining operations and related activities within Ethiopia. Its purpose is to ensure that the country’s mineral resources are developed in an orderly and suitable manner. Key provisions state that no mining licences may be granted within areas reserved for natural habitats or national parks or within 500 metres from the boundary of a village, city or water reservoir or dam without the consent of the competent body. It emphasises that a licence may be revoked if there is a breach of the approved environmental impact assessment, and safety and health standards. The proclamation has in place measures to ensure community development plans are established within the licence area. Even after a mine closure certificate has been issued the licensee must continue to monitor environmental effects.

Transaction of Precious Minerals Proclamation No. 651/2009

This Proclamation applies to govern the conduct of all transactions of precious minerals within the territory of Ethiopia. Any person who has been issued a license in accordance with the appropriate mining laws is not required to have a certificate of competence or license pursuant to this Proclamation in order to sell locally or export abroad the precious minerals it produces. It also highlights the different licenses for precious minerals as well as the eligibility, application and obligations of said licenses.

6.3.2 Tax

Income Tax Proclamation. No. 979/2016

This legislation supports the economic development of the country. For mining it is key because a mine site, oil or gas well, quarry or other place of exploration or extraction of natural resources is considered a permanent establishment which is subject to provisions under this proclamation. It highlights the different schedules of income and obligations to pay income tax. Comprehensive tax rates are also listed. There are provisions for taxation of licensees and contractors as well as provisions for expenditure incurred during the phases of the mining cycle.

Mining Income Tax Proclamation No. 53/1993

It provides for the payment of tax on income from Mining Operations. It highlights tax allocations for different operations. i.e. large-scale mining operations will provide allocations to joint federal & regional governments while small scale and artisanal mining operations to regional states. The Joint federal – regional income tax from large scale mining operations is allocated based on 50%- 50% ratio. It also highlights that mining income tax from large scale operations is administered by ERCA; The mining income tax law gives power to adjust income and expenditures between affiliated parties to the licensing authority while the tax is administered by the revenue authority.

Mining Income Tax (Amendment) Proclamation No. 802/2013

The Mining Income Tax Proclamation was amended to state that “a large-scale mining license holder is subject to 25% of taxable income”.

6.3.3 Environment

Environmental Impact Assessment (EIA)

Proclamation No. 299/2002

This proclamation prescribes that no person shall commence any new development activity under any category listed as a project without an environmental impact assessment or authorisation of the Environmental Protection Authority. The Authority or the relevant regional environmental agency may decide that the possible impact of the project is significant and therefore that no EIA shall be carried out.

6.3.4 Commercial licensing

Commercial Registration and Licensing

Proclamation No. 980/2016

The proclamation is applicable to any business persons, sectoral associations, commercial representatives and any other person engaged in commercial activity. The provisions provided include commercial registration and retrieval of tax identification numbers, registration of trade names, obtaining a business licence, franchise registration, determination of export and import of goods and various penalties.

6.3.5 Human rights and civil societies

Ethiopian Human Rights Commission

Proclamation No. 210/2000

Defines the objectives of the Commission, the rules for appointing members, the powers and duties of appointees, the rules of procedure of the Commission as well as administration of the Council of Commissioners and staff of the Commission. The commission was formed in order to educate the public be aware of human rights see to it that human rights are protected, respected and fully enforced as well as to have the necessary measure taken where they are found to have been violated. This proclamation gives provisions on rules and procedures of the Commission, lodging complaints, and remedies.

Cooperative Society Proclamation No. 985/2016

This Proclamation provides for the creation, registration and administration of cooperatives and provides rule with respect to their operations, winding up, etc. It also defines the objectives of a cooperative and provides for the establishment of cooperative societies unions and cooperative societies federations. Cooperative societies may, according to their nature, be established at different levels from primary up to federation level. Any cooperative society shall be registered by the appropriate authority (i.e. the Federal Cooperative Agency, or an organ established at regional levels to execute the cooperative societies proclamation, lead and regulate the cooperative sector). The Proclamation also establishes a Cooperative Advisory Council, which is accountable to the Ministry of Agriculture and Natural Resource. Furthermore, the Proclamation defines duties of cooperative societies with respect to the environment.

Organisations of Civil Societies Proclamation No. 1113/2019

This new proclamation is expected to create an enabling environment for CSOs to carry out their vital role, particularly in democratic building and promotion of human rights. It provides for the formation of Civil Society Groups within Ethiopia and its purpose is to regulate Civil Societies Organisations to ensure accountability and maximum public benefit from the sector. This proclamation applies to organisations operating in two or more regional states; foreign organisations; organisations established in Ethiopia to work on International, Regional or Sub Regional issues or not operate abroad; organisations operating in the City Administration of Addis Ababa or Dire Dawa; and, charitable organisations established by religious Institutions.

Establishment of Cooperative Association Proclamation No.274/2002

This proclamation guides the establishment and governance of Cooperative associations and societies. It provides for the institutionalisation of the cooperative movements and was developed to establish the Federal Cooperative Commission for organising, promoting and strengthening the cooperative movement at national level.

6.3.6 Land use

Rural Land Administration and Land Use Proclamation No. 456/2005

It highlights that it has become necessary to sustainably conserve and develop natural resources and pass over to the coming generation through the development and implementation of a sustainable rural land use planning based on the different agro-ecological zones of the country. The proclamation provides for the establishment of an information database that enables the government to identify the size, direction and use rights of 'the different types of landholdings in the country such as individual and federal and regional states holdings. It also provides for the resolution of problems that arise in connection with encouraging individual farmers, pastoralists and agricultural investors and establish a conducive system of rural land administration.

6.3.7 Labour

Labour Proclamation No. 377/2003

This proclamation acknowledges the key role of a skilled and disciplined workforce to Ethiopia's industrialisation efforts and improve its global competitiveness by recognising the need to create a favorable environment for investment. It provides more obligations to employers; increased the minimum working age; added employee benefits; extended probation periods, adjusted overtime and work and payment and provided new rules on sexual harassment and sexual violence.

6.4 ASSM LICENSING, LEGISLATION & REGULATIONS

6.4.1 Licensing

The MoMP issues two types of mining license that relate to artisanal mining.

They are:

1 AN ARTISANAL MINERAL OPERATIONS LICENSE

2 A SPECIAL SMALL-SCALE MINERAL OPERATIONS LICENSE

(More details under types of licenses).

The 2013 amendment to the Mining Operations Proclamation first introduced the Special Small-Scale Mineral Operations License, and, at the same time, reduced the maximum period for an Artisanal Mineral Operations License from 9 years down to 2 years. These changes encourage Artisanal miners to see ASSM as a stepping stone to other economic activities, rather than a final destination, and to encourage them to upgrade their operation to a higher level of mechanisation and increase productivity. **More detail can be found in Mining Operation Proclamation No.678/2010 (as amended by Proclamation No 813/2013).**

6.4.2 Royalties and taxes

Holders of an artisanal or special small-scale License are required to pay both royalties and income tax at levels that are determined by laws of the Regional State in which their license is issued. The MoMP would ask holders of such licenses to contact the relevant Regional State official to determine the amounts they are required to pay in royalties and income taxes.

6.5 Environment & safety regulations

Ethiopia is committed to economic growth that is environmentally sensitive. Sustainable development is discussed in Ethiopia's constitution, where the people's environmental rights are clearly stipulated. As the Constitution makes clear, the people of Ethiopia have a right to improved living standards, as well as a right to participate in national development and, in particular, to be consulted with respect to policies and projects affecting their community.

In addition, Constitution sets out that the people of Ethiopia have the right to a clean and healthy environment. If they have been displaced or adversely affected by state commensurate monetary or alternative means of compensation, which could include relocation with adequate state assistance.



IMPORTANT ENVIRONMENT AND SAFETY REGULATIONS

- ★ Environmental Impact Assessment Proclamation no. 299/2002
- ★ Commercial Registration and Licensing Proclamation No 980/2016
- ★ EIA Guideline for Mineral and Petroleum Operation Projects
- ★ EIA Reporting Guide
- ★ Environmental Management Guidelines for Artisanal Mining in Ethiopia
- ★ Labour-Proclamation-No.-1156-2011 revised
- ★ Environmental Pollution Control Proclamation No 300/2002)

6.5.1 Environmental Impact Assessment, rehabilitation fund and community development

Applicants for any licenses except a Reconnaissance, Retention or artisanal mining operations license, have to:

- ★ Submit an environmental impact assessment.
- ★ Allocate funds to cover the costs of rehabilitating the environment affected by its activities.
- ★ Participate in planning community development initiatives with the peoples within the license area, and allocate funds to pay for these initiatives.

More detail can be found in Mining Operation Proclamation No.678/2010 (as amended by Proclamation No 813/2013) and Environmental Impact Assessment Proclamation no. 299/2002.

6.5.2 Key environment and safety institutions

1 THE ENVIRONMENT, FOREST & CLIMATE CHANGE COMMISSION

The Environment, Forest and Climate Change Commission (EFCCC), formerly the Environmental Protection Agency (EPA), is the Federal institution managing Ethiopia's environment. Ultimately, this is the body that is responsible for evaluating Environmental Impact Assessments. It is an independent authority, acting outside the main ministerial structures and reporting directly to the Prime Minister.

2 REGIONAL ENVIRONMENTAL BUREAUS

Ethiopia's Regional governments all have established environmental bureaus, though they have each have different names and statuses. These regional bureaus are responsible for evaluating the Environment Impact Assessments of all projects that fall under the jurisdiction of the regional governments, as opposed to the Federal Government.

6.5.3 Environmental Impact Assessment

Under Ethiopian law, any mining or petroleum project would need to undertake an Environmental Impact Assessment. Any project that alters any part of Ethiopia's environmental, social, economic or cultural conditions is required to obtain approval from the relevant authority before it is allowed to proceed.

A company wishing to initiate such a project is required to conduct an Environmental Impact Assessment of the project, and submit a report of this assessment to the EFCCC (or the relevant regional agency) for review.

This report should be written up after consulting any communities likely to be affected by the project, and should contain a summary written in non-technical language.

At a minimum, an environmental impact study report should explain:

- ★ What the project is and what technological processes it involves;

- ★ The content and amount of any pollutant that will be released at any stage;
- ★ The source and amount of energy required;
- ★ Information on likely trans-regional impacts;
- ★ Nature and duration of all the estimated direct or indirect, positive or negative impacts;
- ★ What measures the company will take to eliminate, minimise, or mitigate any negative impacts;
- ★ The company's contingency plans in case of accident;
- ★ How the company intends to monitor the project during both implementation and operation; and
How complete or accurate the information the report was based on is.

By law, the EFCCC (or the relevant regional agency responsible) is required to issue a response within 15 working days of receiving the report.

They can either:

- ★ Approve the project outright;
- ★ Approve the project subject to certain specified conditions being fulfilled; and
- ★ Reject the project on the basis that a negative environmental impact cannot be satisfactorily avoided.

Please see Environmental Impact Assessment Proclamation no. 299/2002 for more detail.

6.5.4 Environmental Impact Assessment guidelines

Ethiopia has also issued two sets of guidelines to help mining or petroleum companies conduct their assessments, and submit a report that has the best chance of being approved.

The first guideline is the EIA Reporting Guide, which is written for any company required to submit an environmental impact assessment. It lays out the sections that must be included in the submitted report to give companies a good idea of the kind of information required and the way the report must be structured.

The second guideline is the EIA Guideline for Mineral and Petroleum Operation Projects.

This guideline is written for Mining and Petroleum Companies specifically, and contains a wealth of information about what impacts Ethiopia's EFCCC is most concerned about with respect to the different kinds or stages of mineral or petroleum operations. It also indicates level of mitigation that the EFCCC wants to see. The goal of this guideline is to provide mining and petroleum companies with a wealth of information about the EIA process that they can use in the early planning stage of their project. This helps ensure companies are as well positioned as possible to have their project approved.

(Reporting Guides are available on the MoMP website)

6.5.5 Regional Environmental Bureaus

Regional Environmental Bureaus are responsible for environmental monitoring, protection and regulation of all projects that fall under the jurisdiction of the region. They ensure the implementation of federal environmental standards in their respective regions or, as may be appropriate, issue and implement their own, no less stringent standards. Regional environmental bureaus periodically prepare reports on the environment and sustainable development of their respective regions and submit to the EFCCC. **More detail can be found in Environmental Protection Organs Establishment Proclamation No. 295/2002.**

Specific to mining projects the regional and city administration mining authorities have the powers and duties to review and approve the ESIA reports of special small scale mining projects, small scale mining projects for industrial minerals and small and large scale mining projects for construction minerals. The environmental approval letter obtained is simultaneously used for the application and obtaining of a mineral operations license from the regions and city administrations. **More detail can be found in Mining Operation Proclamation No.678/2010 (as amended by Proclamation No 813/2013).**

Artisanal Mineral Operations Licenses are issued at the regions by considering the minimal environmental requirements which are on Environmental Management Guidelines for Artisanal Mining in Ethiopia.

6.5.6 Environmental management guidelines for artisanal miners

The MoMP has also taken steps to lessen the environmental impact of artisanal mining by providing a set of guidelines for artisanal miners, local communities surrounding artisanal mining sites and licensing authorities.

This guideline will help artisanal miners become aware of the potential dangers of their activities and help them mine in a more sustainable way. It will also improve the management of the artisanal mining sector by providing the licensing authorities with a set of checks and balances they did not previously have. (Guidelines available on MoMP website)

6.5.7 Safety regulations

Every Environmental Impact Assessment must include an assessment of the health and safety impacts of the project. This includes both the occupational health and safety impacts and the health and safety impacts on the local communities who might be affected by the project’s activities. The EIA Guideline for Mineral and Petroleum Operation Projects contains helpful information for mining and petroleum companies about the health and safety impacts the Ethiopian government is most concerned about. (Guidelines for Mineral and Petroleum Operation Projects available on MoMP website)

It is also important to recognise that employers in Ethiopia are legally required to take all occupational health and safety precautions and to abide by the health and safety standards set by the relevant authority. For more detail, please see Labour Proclamation No1156/2011.

6.5.8 Pollution

Under Ethiopian law, polluting the environment is illegal, and the penalties for doing so are clearly spelled out. Ethiopia follows the ‘polluter pays’ principle and requires the person or entity causing the pollution to pay for any clean up.

6.6 COMMUNITY ENGAGEMENT

In order to foster sustainable investments which, benefit all stakeholders, mining companies are required to contribute to a community development fund in Ethiopia.

Important Community Engagement Regulations

- ★ Mining Operation Proclamation No.678/2010 (as amended by Proclamation No 813/2013)
- ★ Mining Regulation Proclamation No. 423/2018
- ★ Directive to regulate the allocation of a Community Development Fund

6.6.1 Community development

As has been the case for many years, applicants for any mineral operations license need to participate in planning community development initiatives with the peoples within the license area, as well allocate funds to pay for these initiatives, as explained in Ethiopia’s Mining Operation Proclamation No.678/2010 (as amended by Proclamation No 813/2013) and Environmental Impact Assessment Proclamation no. 299/2002.

In 2019, Ethiopia issued a new directive which provides guidance on how this process is to work, as well as clearly specifying both the duties and the rights of all parties involved with the community development fund.

6.6.2 Overseeing the community development fund

While holders of any kind of mining operation license and the holders of an exploration license are all required to establish a community development fund, the requirements are a little different depending on whether the license in question is an operation license or merely an exploration license.

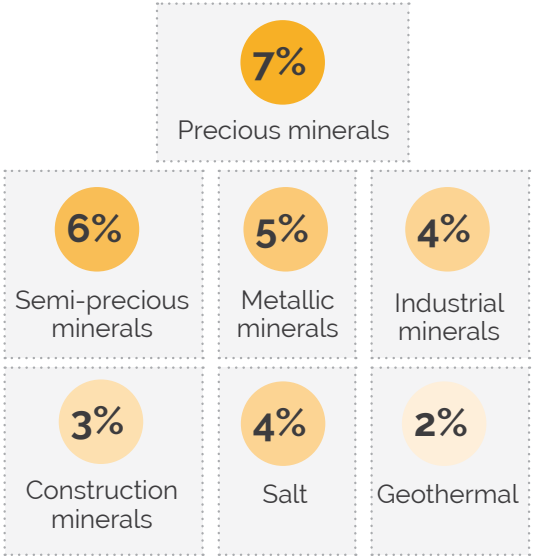
When the fund is established by those who hold a mining operation license (like, for example, a Large-Scale Mineral Operations License) a committee must be established to oversee how the fund is used. This committee should be made up of, among others, representatives for the local community, various local officials (including members of local mineral sector, the Finance and Economic Cooperation Bureau, the Women, Children and Youth Bureau) as well as a representative for each mineral operations license holder who contributed to the fund. It is responsible for consulting with the community in order to identify the appropriate development project that will be of the most value or use to the community, and then making sure that the project proceeds smoothly and without impediment.

When the fund is established by an exploration license holder, there is no need to establish such a committee, and the fund is overseen by the relevant licensing authority. It is, however, to be used for the express purpose of benefitting the communities who are directly or indirectly affected by the exploration activities.

For more detail about how the community development fund is to be managed, please see the *Directive to regulate the allocation of Community Development fund*.

6.7 FISCAL REGIME

Ethiopia has some of the most attractive royalty rates in Africa. The holders of Large-Scale Mineral Operations Licenses are required to pay royalties at the following rates:



Royalties can sometimes be waived in special circumstances. More detail can be found in Mining Operation Proclamation No.678/2010 (as amended by Proclamation No 813/2013).

The royalties that holders of artisanal, special small scale and small-scale licenses are required to pay are determined by laws of the Regional State in which that license is issued. Licensees would need to contact the relevant regional authority. Corporate income tax is at a flat rate of 25%. 60% of all mining tax revenues from mining goes to the Ministry of Finance and 40% goes to the regional governments.

Miners also enjoy some excellent benefits: mining companies are allowed a five-year (from the start of production) exemption from customs duties and tax on imported equipment, machinery, and vehicles.

The government is guaranteed a 5% minimum equity stake in all mining projects.

6.7.1 Fiscal incentives

Ethiopia offers a comprehensive set of fiscal and non-fiscal incentives to encourage investment into priority areas, including:

- ★ Customs duty exemptions of up to 100% on imports of capital goods for eligible areas of investment;
- ★ Income tax exemptions for a period ranging between 1 and 9 years, depending on the specific activity and the location of the investor;
- ★ Loss carry forward for business that suffer losses during the income tax exemption period for half of the tax exemption period; With the exception of a few products, no export tax is levied on Ethiopian export products;
- ★ Duty Drawback Scheme, Voucher Scheme and Bonded Factory and Manufacturing Warehouse Schemes;
- ★ Various non-fiscal incentives for exporters; and
- ★ Guaranteed remittance of capital for foreign investors.

6.7.2 Taxation

The Ethiopian tax system comprises direct and indirect taxes. Direct taxes include personal income tax, rental tax, withholding tax, and corporation tax, among others. The main types of indirect taxes are VAT, customs duty, excise and turn over taxes. Main taxes are summarised in the table below.

	TYPE OF TAXES	RATE
1	Corporate Income Tax	30%
2	Turn Over Tax	2% and 10%
3	Excise Tax	10% up to 100%
4	Customs Duties	0% up to 35%
5	Income Tax from Employment	0% up to 35%
6	Withholding Tax	2%
7	Value Added Tax (VAT)	15%
8	Export Tax	Nil (with exception of hides and skins-150%)
9	Royalty Tax	5%
10	Dividend Tax	10%

6.7.3 Mining incentives

The Mining Proclamation offers various incentives for holders of a mining and exploration licenses to import duty free equipment, consumables, machineries and vehicles. The Mining Regulation expanded these incentives by allowing holders of an exploration license, to import, free of customs duties and taxes, small aircraft or helicopter having seat of 6 persons for the purpose of collecting data. The incentive is available only for holders of an exploration license who can import the small aircraft or the helicopter on a temporary basis and re-export it upon completion of the work or can transfer the small air craft or the helicopter to another exploration license holder. These incentives require the prior

approval of the MoMP. In addition, exploration license holders are subject to other customs and aviation rules before and after importation of the small aircraft or helicopter.

6.8 Land allocation

All land in Ethiopia is considered public property. Individuals, companies and other organisations can, however, acquire the right to use land. There are two broad classifications of land for rent or lease purposes: rural land, mainly used for agricultural purposes, and urban land, mainly used for industrial purposes or other activities. Land lease or rental rates differ from location to location.



07



ABOUT THE MOMP

7.1 ABOUT THE MOMP

At the Ethiopia's Ministry of Mining and Petroleum, our vision is to:

- ★ Increase investment in the sector
- ★ Build the organisational and technical capacity of our institutions
- ★ Enable value addition and facilitate the industrialisation of Ethiopia's economy
- ★ Create opportunities for quality direct and indirect jobs in the sector
- ★ Improve internal revenue and increase foreign exchange earnings

To realise these objectives, and in line with Ethiopia's Homegrown reform agenda, the MoMP is preparing a 10-year strategic roadmap, which will be implemented in two 5-year strategic plans. This process is under way in 2020.

The MOMP's work is firmly guided by a number of international, continental and national ambitions. Globally, the Ministry supports the Sustainable Development Goals (SDGs). At a continental level, the MoMP supports the African's Union's Agenda2063 to build 'The Africa We Want'; the Continental Free Trade Area (CTFA); and the Africa Mining Vision. While at the sub-regional level the MoMP is a proud member of the

Intergovernmental Authority on Development (IGAD), an eight-country trade bloc in Africa; and the Common Market for Eastern and Southern Africa, COMESA.

Nationally, the Ministry's goal is to ensure Ethiopia joins the ranks of lower middle-income countries by 2030, while ensuring environmentally resilient 'Green Economic Growth and Industrialisation', and growing the private sector's role in our economy.

7.1 EXPLAINING ETHIOPIA'S FEDERAL SYSTEM: HOW THE STATE & REGIONAL GOVERNMENTS WORK

Regional Mining Bureaus

Ethiopia has a Federal administrative system comprising of nine (9) Regional States and two City Administrative Councils. The Regional States Mines Bureaus have the mandate to issue:

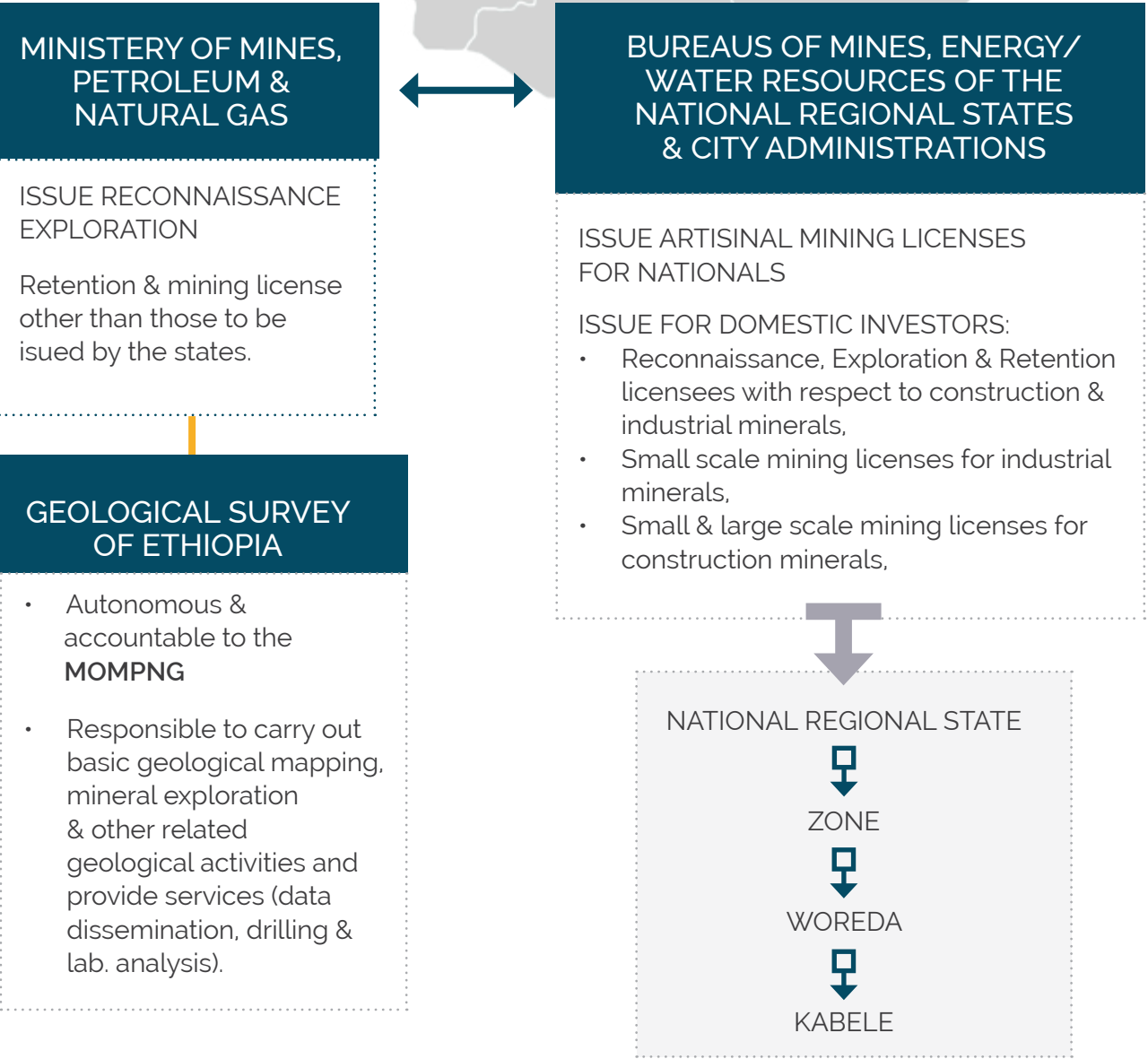
- ★ Small and Large-Scale Mineral Operations Licenses for construction minerals,
- ★ Small Scale Mineral Operations Licenses for industrial minerals,
- ★ Reconnaissance, exploration and retention licensees with respect to construction and industrial minerals.

The Regional administration also collects royalty from the small scale and artisanal production of precious minerals, industrial and construction materials.

The local Woreda and Kabele administration is effective if properly utilized (Woredais the smallest administration hierarchy in the Ethiopian federal system).

Institutional Framework

FEDERAL, 9 REGIONAL STATES & 2 CITY ADMINISTRATIONS



08



DOING BUSINESS IN ETHIOPIA

8] DOING BUSINESS IN ETHIOPIA

8.1 ETHIOPIA'S CITIZEN'S CHARTER

It has not always been clear to investors or to the Ethiopian public what exactly the MoMP does, what its values or objectives are, and what services it is set up to deliver. To redress this issue, the MoMP launched its own Citizen's Charter in 2018 .

This Charter carefully outlines the MoMP's service delivery obligations, spelling out in detail the services that Ethiopia's citizens and the MoMP's clients generally (including foreign investors) are entitled to expect from the MoMP as well as explaining . **This charter can be found on the MoMP's website.**

Citizen's charter kiosk and information

As part of this launch, an information Kiosk was set up in the lobby of the MoMP's federal office to serve as the first point of contact for the public, investors, and any other stakeholders involved with or affected by mining operations who want to know what their rights are, and levels of service they are entitled to. Any member of the public, investor or other stakeholder will be able to download all information they need from the Kiosk, and request appointments with Ministry staff. In addition, they will also be able to complain about any service -delivery failures or violations of their rights by the MoMP. Complaints are carefully tracked to ensure they are resolved in a timely manner and that areas that need improvement are acted upon to ensure the enhanced service delivery of Ministry services.

8.2 VISITING ETHIOPIA AS AN INVESTOR

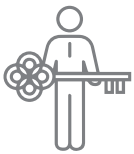
For the first visit to Ethiopia, a business visa can be obtained from an overseas diplomatic mission. Visa requirements are highlighted below:

- ★ Business or investment visa is required for all foreign visitors to Ethiopia, except for nationals of Kenya.
- ★ Visa applications can be obtained at Ethiopia's diplomatic missions overseas.
- ★ The Main Department for Immigration and Nationality Affairs issues a residence permit to a foreign investor upon submission of an investment permit issued in his/ her name.
- ★ A foreign investor who is a shareholder of a company or branch company as well as expatriate personnel who have work permit are entitled to get residence permit.
- ★ Favourable visa terms for investors in industrial parks: Multiple entry visa valid for up to five years is given for foreign investors; up to three years long visa for industrial park service providers, managers, board members and senior experts employed by foreign investors.

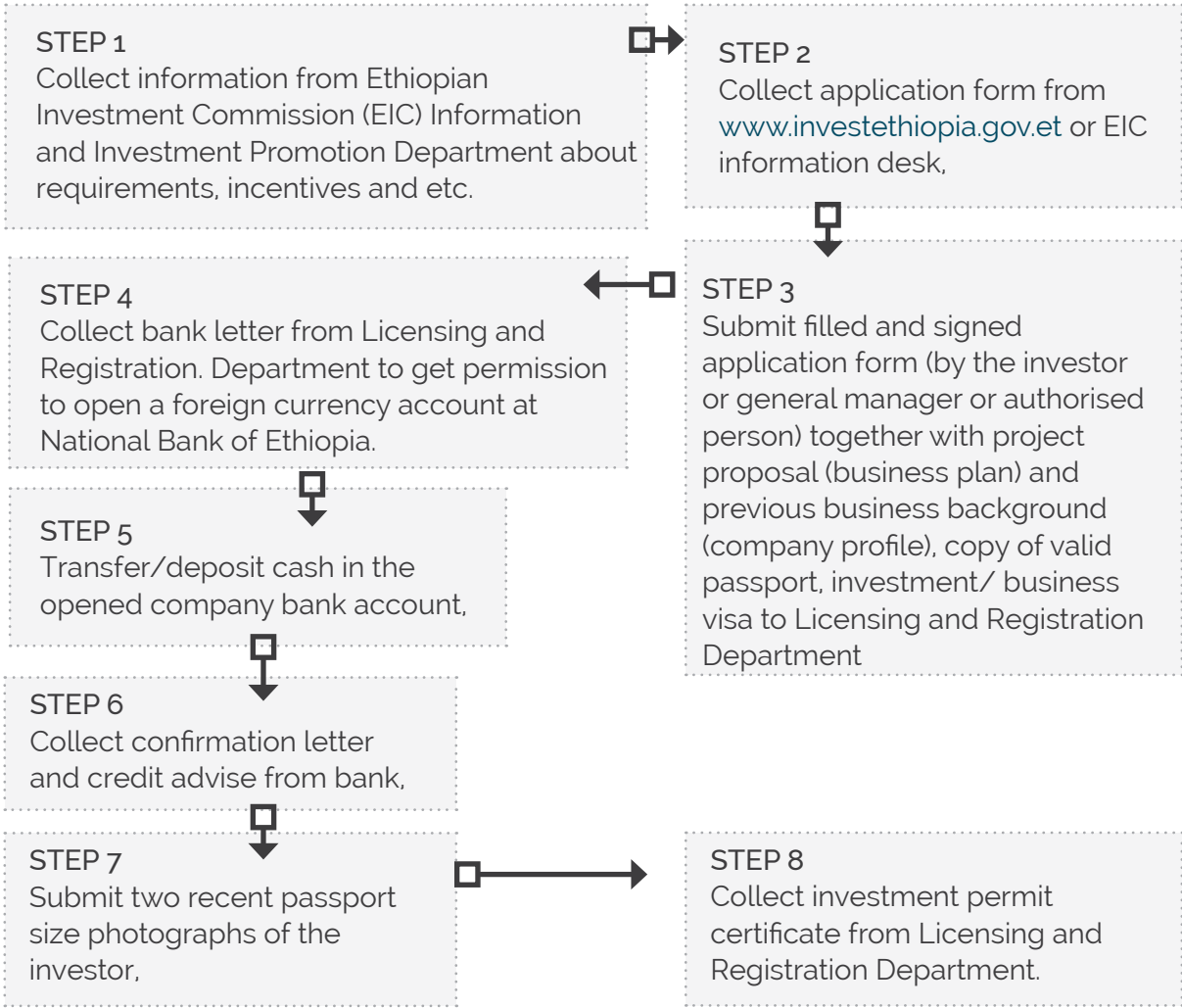
8.3 HOW TO REGISTER YOUR BUSINESS

Depending on the type of business form, investors need to take following steps to register their company after having contacted the Ethiopian Investment Commission (Information and Investment Promotion Department) for information on procedures and entitlements.

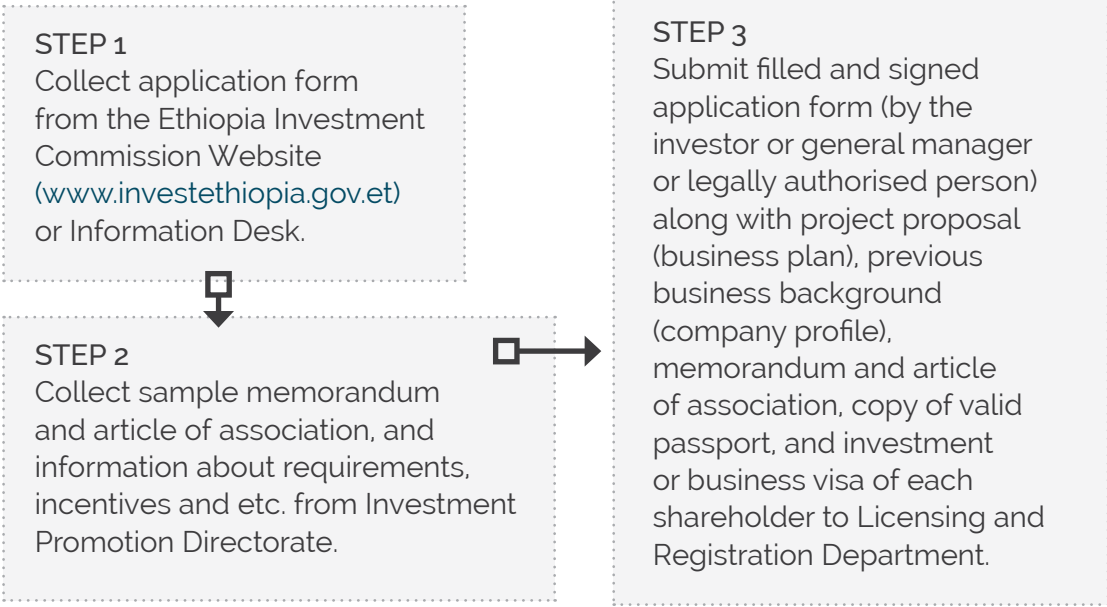
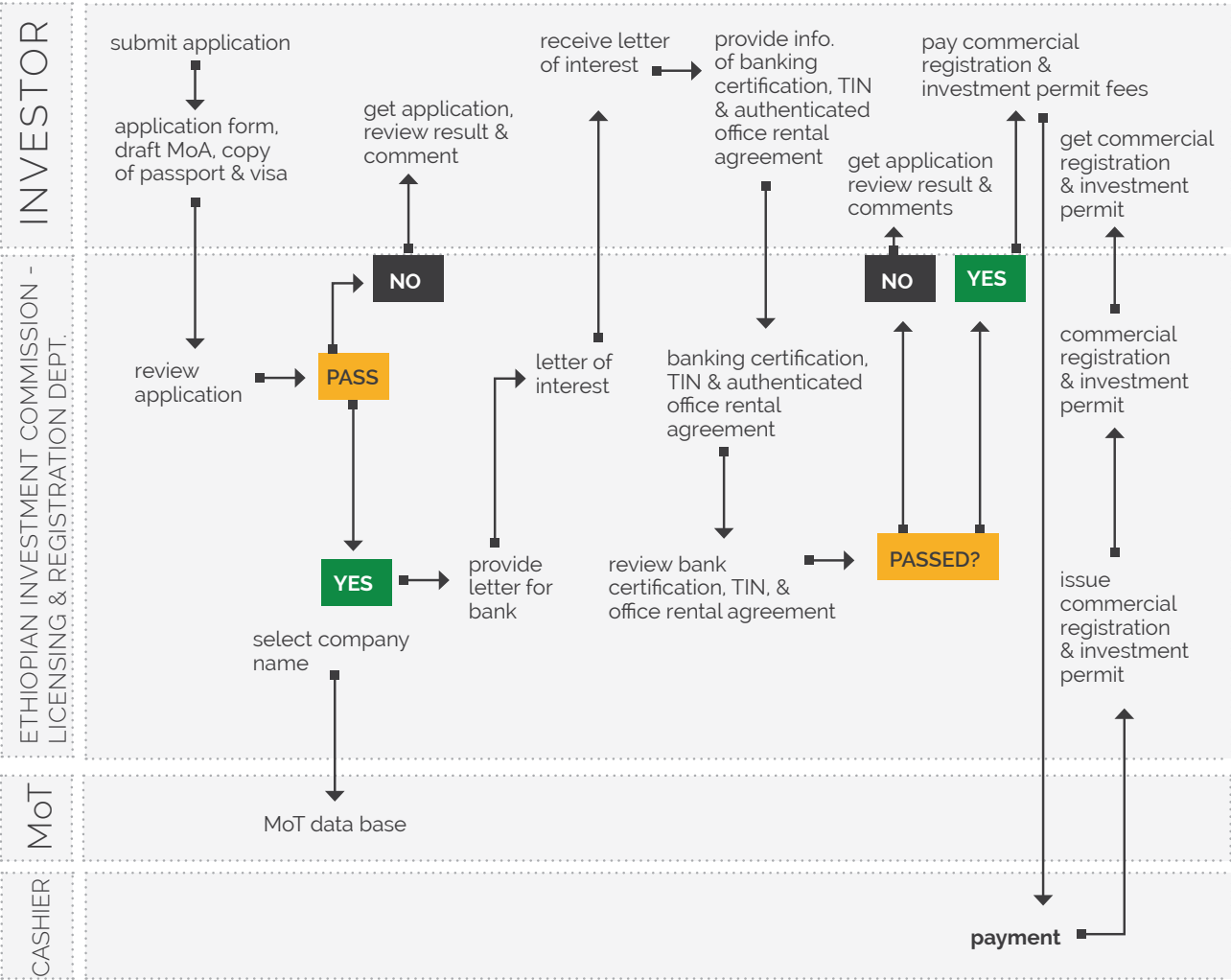
These steps vary slightly depending on the business form under which investors plan to operate their business:



1 SOLE PROPRIETORSHIP



PROCESS AUTOMATION - LICENSING & REGISTRATION MANAGEMENT PROCESS - PLC



In case a Company is a shareholder, the following additional documents shall be submitted:

In the case of a foreign company:

- ★ Notarised legal certificate of incorporation;
- ★ Notarised minutes of resolution passed by authorised organ of the parent company authorising to invest in Ethiopia;
- ★ Notarised document of its memorandum and articles of associations or similar documents of the parent company; and
- ★ Notarised Power of attorney of the agent.

In the case of a local company: -

- ★ Copy of memorandum and articles of associations;
- ★ Commercial certificate;
- ★ Minutes of resolution passed by the shareholder's; and
- ★ Notarised power of attorney of the agent.

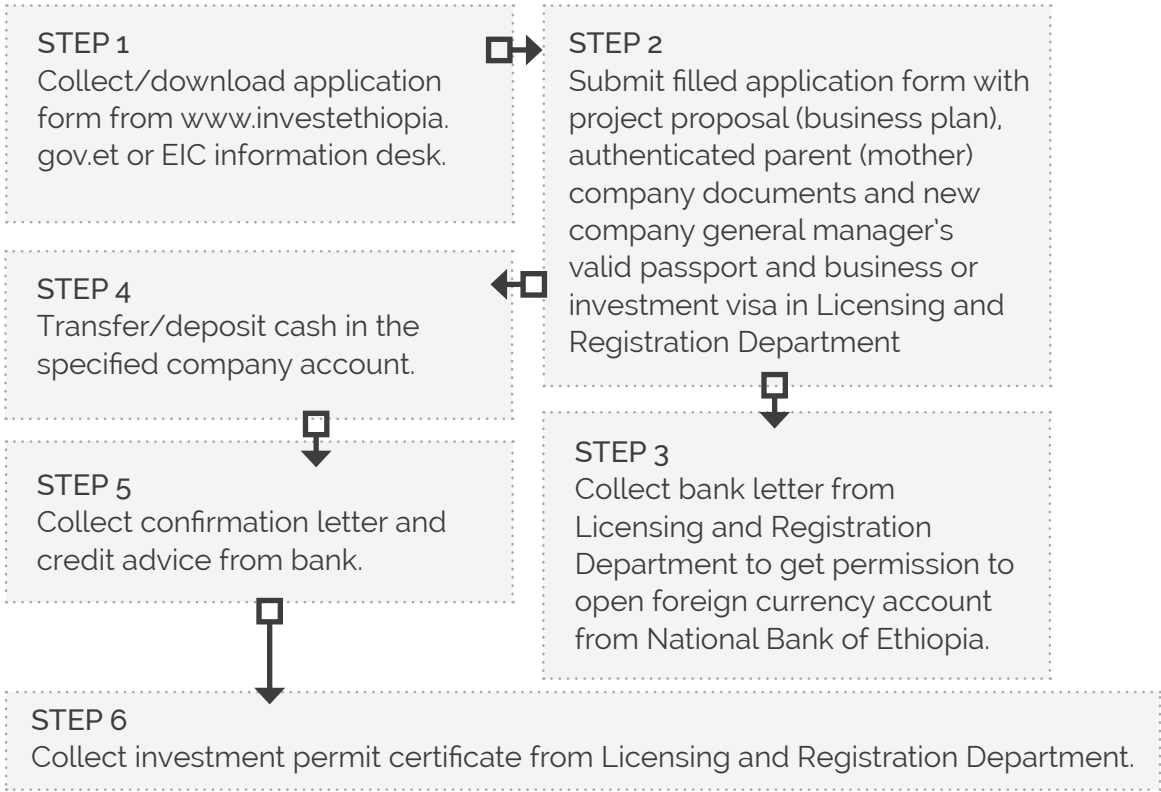


3 SHARED COMPANY OR JOINT VENTURE

The requirement for PLC also applies to a shared company and joint venture.



4 BRANCH MULTINATIONAL COMPANY



All documents whose sources are outside of Ethiopia shall be:

- ★ Authenticated by the concerned notary office and Ethiopian Embassy in the foreign country; and
- ★ Authenticated and registered by the Ministry of Foreign Affairs of Ethiopia.

Documents to be Notarised and Authenticated include:

- ★ Memorandum of Association and Article of Association
- ★ Certificate of origin
- ★ Minutes of resolution
- ★ Power of attorney

Others

- ★ Business (investment) visa copy
- ★ Passport size picture of the general manager

Minimum capital requirements

- ★ For wholly foreign owned company, the minimum capital requirement is USD 200,000 (USD 100,000 if it is architectural or engineering works or related technical consultancy services, technical testing and analysis or in publishing).
- ★ For joint venture company, the minimum capital requirement is USD150,000 USD (USD 50,000 if it is architectural or engineering works or related technical consultancy services, technical testing and analysis or in publishing).

8.4 INVESTOR PROTECTION

Ethiopia's legal framework provides mining investor with a number of protections and assurances designed to minimise their political risk. Here are some of the most important protections Ethiopia has for investors:

8.4.1 Expropriation protection

Ethiopia does allow land to be expropriated, but only when doing so is in the public interest and does not violate any other laws. And there are numerous laws that would prevent the state expropriating an investor's property. This investment guarantee is enshrined in Ethiopia's Constitution, in certain specific investment laws, and in numerous investment treaties that Ethiopia is party to.

8.4.2 Dispute settlement

Ethiopia's Constitution as well as its investment law guarantee the right of investors to lodge formal complaints about the treatment of their

investments. The Bilateral Investment Treaties (BITs) to which Ethiopia is party also provide specific dispute settlement mechanisms.

8.4.3 Repatriation of Funds

Ethiopia's investment law provides international investors with the right to receive the remittance of their profits, dividends, principal, interest payments and compensation paid, in a convertible foreign currency at the current exchange rate. This is, however, subject to the investor meeting the requirements that the National Bank of Ethiopia sets.

8.5 TRADE AGREEMENTS WITH OTHER COUNTRIES & INVESTMENT TREATIES

Ethiopia has investment treaties in place with the countries below. These treaties further enshrine protections for international investors in Ethiopian law:



ETHIOPIA

- Algeria
- Austria
- China
- Denmark
- Egypt
- Finland
- Germany
- Iran
- Israel
- Italy
- Kuwait
- Libya
- Netherlands
- Sudan
- Sweden
- Switzerland
- Tunisia
- Turkey
- Yemen

09

★ IMPORTANT AGENCIES & SUPPORTING INSTITUTIONS

9 | IMPORTANT AGENCIES & SUPPORTING INSTITUTIONS

9.1 THE ENVIRONMENT, FOREST AND CLIMATE CHANGE COMMISSION

The Environment, Forest and Climate Change Commission (EFCCC), formerly the Environmental Protection Agency (EPA), is the Federal institution managing Ethiopia's environment. It is an independent authority, acting outside the main ministerial structures and reporting directly to the Prime Minister. The EFCCC is ultimately responsible for Environmental Impact Assessments. They do, however, delegate that task to regional bureaus for any projects that fall under the jurisdiction of regional states.

The agency originally established to safeguard Ethiopia's environment was the Environmental Protection Agency in 1995. Since then, it has since been restructured twice in evolving attempts to improve its effectiveness. The EPA was upgraded to the Ministry of Environment and Forest in 2013, before becoming the Environment, Forest and Climate Change Commission in 2015.

The EFCCC in present form is designed to:

- ★ Ensure that the environment objectives provided under the constitution and the basic principles set out in the environmental policy of Ethiopia are realised.
- ★ Establish a system for environmental impact assessment of public and private projects, as well as social and economic development policies, strategies, laws and programs.
- ★ Prepare a mechanism that promotes social, economic and environmental justice and channel the major part of any benefit derived thereof to the affected communities

- ★ Reduce emissions of greenhouse gases.
- ★ Coordinate the building of a climate resilient green economy.
- ★ Establish a system for evaluating environmental impact assessments of investment projects submitted by their respective proponents, prior to granting permission in accordance with the Environmental Impact Assessment Proclamation.
- ★ Take part in the negotiations and ratification of international environmental agreements.
- ★ Establish an environmental information system.
- ★ Promote and provide formal and non-formal environmental education programmes.

9.2 ETHIOPIAN MINERAL, PETROLEUM & BIOFUEL CORPORATION

The Ethiopia Mineral, Petroleum and Biofuel Corporation (EMPBC) is the state-owned oil and mining company operating in Ethiopia. They may be required to take an equity stake in petroleum or mining projects.

The EPBC was established in 2015. Its key objectives include, among other things:

- ★ To ensure that Ethiopia benefits from its natural resources;
- ★ To build the local capacity of the mining and petroleum sector and assist companies engaged in the sector;
- ★ To invest in strategically important areas not addressed by the private sector;

- ★ To contribute to the national economy
- ★ To engage in the investment, development and production of the mineral, petroleum and bio-fuel operations
- ★ To invest in petroleum, mining and bio-fuel operations carried out by private sector investors
- ★ To provide services and training to the mining and petroleum sector

9.3 THE ETHIOPIAN INVESTMENT COMMISSION

The Ethiopian Investment Commission (EIC) is an autonomous government institution accountable to the country's Investment Board, which is chaired by the Prime Minister.

A Commissioner, who is also member of the Board, heads the EIC.

The main services provided by EIC include:

- ★ Promoting the country's investment opportunities to foreign and domestic investors;
- ★ Issuing investment permits, business licenses and construction permits;
- ★ Notarising memorandum and articles of association and amendments;
- ★ Issuing commercial registration certificates as well as renewals, amendments, replacements or cancellations;
- ★ Effecting registration of trade or firm name and amendment, as well as replacements or cancellations;
- ★ Issuing work permits, including renewals, replacements, suspensions or cancellations;
- ★ Grading first grade construction contractors;

- ★ Registering technology transfer agreements and export-oriented non-equity-based foreign enterprise collaborations with domestic investors;
- ★ Negotiating and, upon government approval, signing bilateral investment promotion and protection treaties with other countries;
- ★ Advising the government on policy measures needed to create an attractive investment climate for investors.

In addition, the EIC provides the following free, confidential and customised services to investors:

Providing information on sector-specific business opportunities, business incorporation procedures and related regulations, employment regulations.

Hand-holding and supporting the investor during the acquisition of land and utilities (water, electrical power and telecom services); the processing of loans and residence permit applications; the approval of environmental impact assessments studies for investment projects; and the issuance of a tax identification number (TIN).

9.4 OTHER IMPORTANT INSTITUTIONS

Department for Immigration & Nationality Affairs

- ★ National Bank of Ethiopia
- ★ Ministry of Trade and Industry Ethiopia
- ★ Ministry of Environment, Climate and Forest

Protection

- ★ Ministry of Labour and Social Affairs
- ★ The Private Organisations' Employees

Social Security Agency

- ★ Development Bank of Ethiopia Credit Policy
- ★ The Environmental Protection Authority

