MINERAL POTENTIAL OF THE STATE OF ERITREA

YEARLY BROCURE OF ERITREAN MINERAL SECTOR



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2009



Bisha: Plant Site Overview



Dear Investors,

On behalf of my ministry and the government of Eritrea, I am pleased to present to you this profile of investment opportunities in the minerals sector.

Eritrea, the size of England, is strategically located in the Horn of Africa. Its proximity to the Middle East and Europe, together with its major ports in the Red Sea, enhances its comparative advantage.

Geological works and recent remote sensing investigations proved that Eritrea possesses favorable geological settings. The greenstone belt of Eritrea, which hosts precious and base metals, covers 70% of the country. The recent announcements made by several exploration companies operating in Eritrea, have demonstrated the potential Eritrea possess for major mineral deposits.

A liberal economic policy with competitive tax regimes, full guarantees and protection of investments, untapped geological terrins, highly motivated, disciplined and hard working people, an administration free of corruption, a safe and free country, make Eritrea an ideal destiny for investors.

The holder of a mineral license is guaranteed the right to dispose of minerals without export tax, and to the repatriation of after-tax profits without restriction. The law also permits financial losses to be charged against gross income and to be carried forward. The Eritrean mining law, in addition, provides simple procedures for the submission and processing of license applications.

We sincerely hope that this profile, although not exhaustive, will guide you and enable you to make some meaningful decision on how to invest in the sub-sector of your choice. We invite investors to carry out investment studies to determine the viability of these opportunities.

Thank you for your interest in mineral prospecting and development in Eritrea. We look forward to assisting you to implement your investment.

Ahmed Haj Ali Minister of Energy and Mines

A highly prospective country

Eritrea joined the world community of independent states in May 1993 following a thirty year war for liberation which ended in May 1991. A UN supervised referendum held in April 1993 enabled the Eritrean people to state unequivocally to the world their strong choice for freedom and independence.

Aware of the significant and vital role the private sector has to play in the achievement of national development objectives, the Government of Eritrea has been committed to create a conducive atmosphere for the active participation of local and foreign private investors. However, since May 1998 the development of this young state has been severely curtailed by the border dispute with neighbouring Ethiopia. Despite this, the Eritrean people and Government are as resolute as ever in their commitment and endeavours to work together to rebuild their country's economy, and to secure social and economic progress.

Location, climate, geography and infrastructure

This young state is located in the north-eastern part of Africa with the Red Sea on its east coast, Sudan to the west and north, and Ethiopia and Djibouti to the south. Eritrea, with a land surface area of about 125,000 square kilometres, including hundreds of coral islands in the Red Sea, has a population of about three and a half million people. The country is home to nine ethnic groups, all with a strong sense of Eritrean national unity. Tigrinya and Tigre arethe most widely spoken indigenous languages. English is also commonly used in the business community, while Arabic and Italian are also frequently encountered.

The topography of Eritrea is exceptionally varied, from the 1,200 kilometre long coastal plain only a few metres above sea level, through the central highlands ranging up to 2,500 metres above sea level, to the low lying western and south western areas of the country. Rugged mountain chains run from the central plateau to the extreme north of the country. The climate in these different terrains correspondingly varies from arid, to semi-arid, to temperate. The mean



annual rainfall in the coastal areas is less than 300 mm per year, whilst in the highlands and the western lowlands rainfall ranges between 500 and 1,000 mm.

Eritrea's infrastructure is centered on a well developed communications network linking the capital city Asmara to the regions of the country, including the two main sea ports of Massawa and Assab, and to the neighbouring countries. Asmara and Massawa have international airports, which also serve internal flights. Inevitably, the ravages of war have left their mark on the infrastructure, and the reconstruction of the prime facilities has been a high priority. Telecommunication facilities have also been renovated and developed, and mobile phones are now a common site in the major towns.

The Department of Mines

The Ministry of Energy and Mines is the authorised Licensing Agency and is responsible for the administration, regulationand coordination of all types of mining operations in Eritrea. The Department of Mines within the Ministry encompasses, amongst other functions, the Geological Survey and the Mines Administration Division, and is also itself actively engaged in exploration and mapping activities.

Even though there are several maps produced on different scales from various sources, there have been only two geological maps, at a scale of 1:250,000, compiled until recently,

when the Eritrean Geological Survey prepared a 1:1,000,000 scale map.

The Eritrean mining sector has shown rapid development over the past few years since the Ministry of Energy and Mines started issuing licenses in 1997. Since then, several exploration companies have been involved in assessing and exploring the mineral potential of the country. In the successive years additional licenses have been issued on the first-comefirst-served principle. The Department of Mines has also been developing a national minerals database.

The Ministry has a responsibility to provide preliminary information to exploration companies interested in conducting detailed investigations in Eritrea, and to make a contribution towards enriching the geological database of the country. As part of its routine works, the Department of Mines through the Mines Administration Division issues licenses to artisanal miners, and controls and supervises exploration and mining activities so that they are in line with the directives of the Ministry and are environmentally compliant. In addition, the Department of Mines, through its research wing – the Geological Survey – has been working, together with various foreign governmental aid agencies and international organizations, to carry out geological mapping and mineral exploration.



Signing of an agreement

Some of the activities conducted in 2009 include

- Following applications by several exploration companies, evaluation was done and licenses were granted. Seven companies namely ERi-Lib Sh. Co, London Africa, Andiamo Exploration Itd, South Boulders, Beijing Donia Resources Itd, Sub-sahara Resources (Eritrea) Itd, and Zhonzang sh. co have already signed agreement and some of them actually started their exploration works. More companies are expected to sign in the near future.

- The Eritrean Geological Survey in collaboration with the Geological survey of Iceland conducted a detailed geophysical survey consisting of Magnetoteluric (MT) and Transient Electromagnetic (TEM) over the Alid geothermal prospect . The results of this survey indicates a good geothermal potential in the area.
- The first draft of Regional Geological Map of Eritrea, on 1:1,000,000 scale is finalized and is ready for distribution. In addition other geological maps on 1:250,000 scale were also produced on specific areas.

Mining law

The legal framework governing the conduct of all mining and related operations within the territory of Eritrea is embodied in the Mining Law comprising: Minerals Proclamation No 68/1995, Mining Income Tax Proclamation No. 69/1995 and Regulations on Mining Operations Legal Notice No. 19/1995, all of which were promulgated in March 1995.

Key Policy issues upon which the Mining Law is based include:

- All mineral resources in Eritrea are public property. The State has a duty to ensure the conservation and sustainable development of these resources for the benefit of the people;
- The intention is to create a favourable atmosphere for foreign investment in the mining sector. Due recognition is made of the significant role that foreign investment and skills can play in the development of this sector and of the capital intensive, long term, and risky nature of mining investments;
- The necessity for formulating regulations which ensure protection of the natural environment, together with sustainable development of the country's mineral resources, in accordance with sound principles of resource management and land use;

The Eritrean Mining Law is up-to-date, attractive and competitive, as it provides considerable benefits and incentives to investors. For example, the law provides for:

- The right to exploit any commercial discoveries made pursuant to a valid exploration license;
- The right to sell locally or export, free of all duties and taxes and without being required to obtain any other authorisation or permission from any other Government agency, all minerals produced pursuant to a mining license;
- A simple and fair taxation system which recognises the risky nature of mining investments, and hence allows:
 - * Accelerated depreciation (straight line method over 4 years) of all capital and preproduction costs;
 - * Write-offs of exploration expenditure in curred anywhere in the country;
 - * The carrying forward of losses;
 - * A generous reinvestment deduction (5% of gross income);
 - * No dividend tax
 - * A nominal rate of import duty (0,5%) on all inputs necessary for mining operations;
 - * Normal royalty rates as well as an option for the reduction, suspension or waiver of the royalty in appropriate circumstances;
- Equitable foreign exchange regulations permitting;
 - * Free and unrestricted repatriation of earn ings;
 - * Retention of a portion of foreign currency earnings abroad in external accounts;
 - * Maintenance of foreign currency accounts in banks in Eritrea.
- A simple "one-stop" licensing system enabling all the formalities for all types of licenses for mining operations to be completed by a single Government agency the Department of Mines within the Ministry of Energy and Mines.

The mineral licensing system

The Mining Law permits the following types of

Applications for any of these licenses may be made by individuals or legal entities of any nationality. All applications are to be made on specified forms that can be obtained from the Department of Mines



licenses:

- Prospecting License, valid for one year and nonrenewable;
- Exploration License, valid for an initial period of three years, but which may be renewed twice for additional terms of one year each, with an option for further renewals in appropriate circumstances; and
- Mining License, valid for a period of 20 years with optional 10-year renewals.

All of these licenses are exclusive and grant their holders an automatic right to obtain an Exploration License from within a Prospecting License and a Mining License from an Exploration License, subject to the fulfillment of the obligations under the preceding license. Although the maximum area that a single license can cover is fixed at 100km2 for a Prospecting License, 50 km2 for an Exploration License and 10km2 for a Mining License, simultaneous possession of multiple contiguous licenses is permitted.

Above the clouds

of the Ministry of Energy and Mines and must be accompanied by a nonrefundable processing (registration) fee of US\$1 per page of each application and the supporting documentation presented. Successful applicants are also subject to a payment of license fees and the first year's rental upon the issue of a license. The rate of these fees is governed by Regulation and is at present as follows:

License	License Fee (per license) US\$(approx.)	Annual rentals (per km²) US\$(approx.)
Prospecting	80	8
Exploration	240	32
Mining	960	96



Volcanic Mountain in Southern Eritrea

The Geology of Eritrea

The geological set up of Eritrea is made up of Precambrian basement rocks that are overlain unconformably by predominantly Mesozoic sedimentary rocks and Tertiary to Quaternary volcanic and sedimentary rocks.

Precambrian Basement Rocks

Basement rocks in Eritrea cover more than 60% of the surface of the country. The basement rocks of Eritrea are part of the Arabian Nubian Shield (ANS) which are exposed in north east Africa (Egypt, Sudan, Eritrea, and Ethiopia) and in Saudi Arabia, northern and northwestern parts of Yemen and part of the western Middle East.

The shield is believed to represent a mega suture between East and West Gondwana. Archean and Paleoproterozoic continental crust rocks make the older components of the shield and occupy a very small part of the basement rocks and the major part of the shield consists of Neoproterozoic (c. 870-670 Ma)

continental-marginal and juvenile intraoceanic magmatic-arc rocks.

In Eritrea, the basement rocks are not well studied despite their high mineral potential. The two geological maps so far completed cover the western part of the country (Geology of Gash River Area) and the southern part of the country (Geology of Mai Dima/Kohain Area). Compilation of geologic maps at 1:250,000 scale has recently been completed for four map sheets. Other studies, based largely on satellite image interpretation aided by limited ground controls, suggest that the rocks can be subdivided into four tectonic blocks or segments, separated by tectonic boundaries. Three of these blocks, the western, central and eastern segments, underlie northern and central Eritrea, whilst the fourth, the Danakil segment, occurs in the southeastern part of the country.

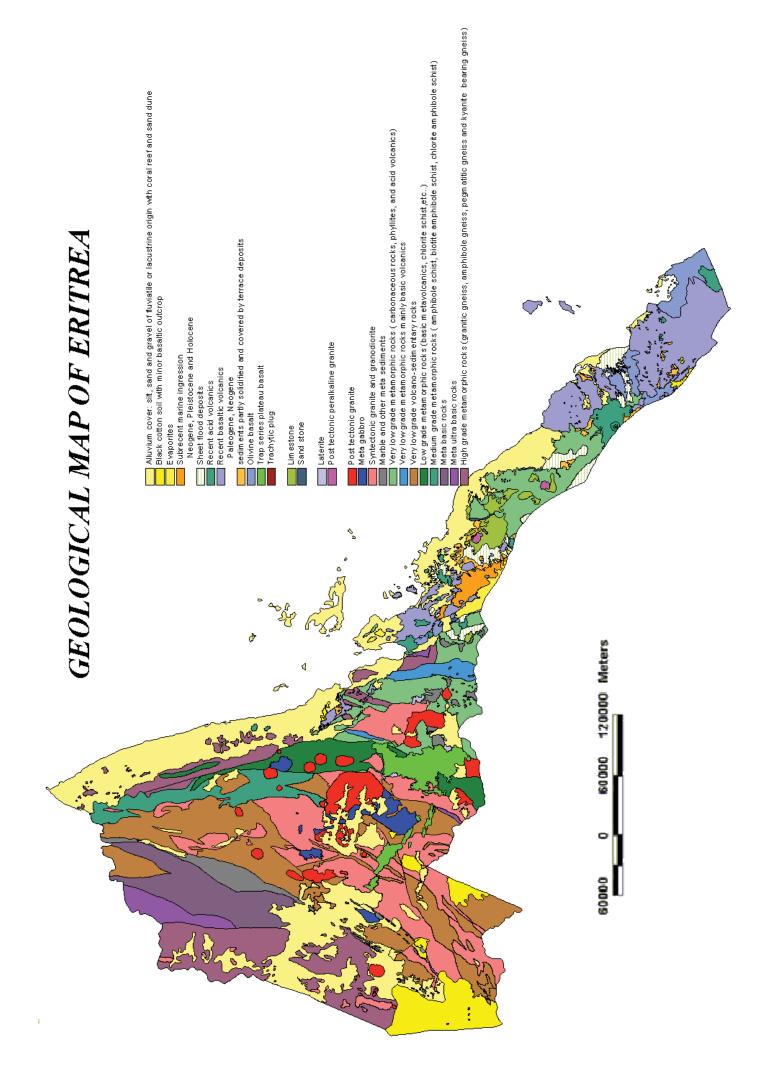
The western segment, the Barka Terrain - is exposed in the northwestern part of the country and underlies the Barka lowlands. It is made up of amphibolite, amphibolite-facies pelitic schists containing kyanite and staurolite, quartzites and marble.

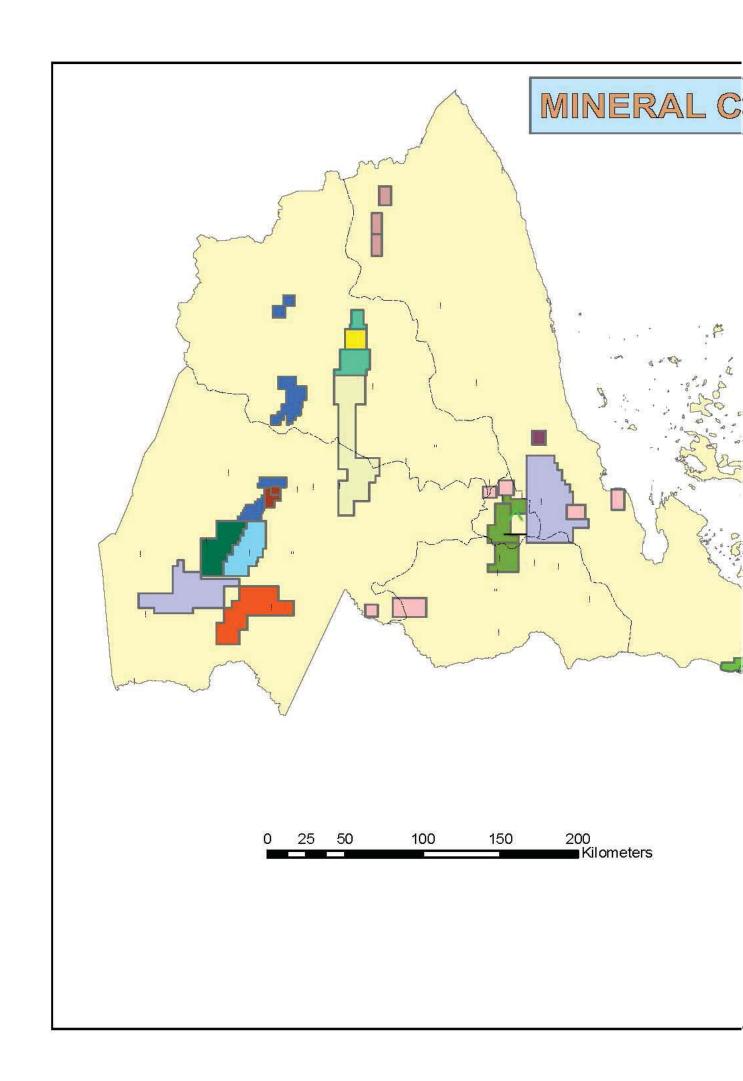
The central segment, referred to as the Hagar Terrain, extends from the Barka River up to the Adobha Abi valley in the east, and comprises several large elliptical bodies of various tectonic units that are dominantly composed of oceanic and accretionary wedge materials. Occasionally, layered sequences of chloritic schists are seen, inter-layered with epidotic and chloritic metabasalts, occasional thin and discontinuous marbles, and manganiferous and ferruginous cherts. The Hagar Terrain displays an east verging thrust contact with the adjacent segment to the east. The Hagar Terrain is known to be prospective for chromite, platinum group elements, nickel, gold and copper mineralization.

The eastern segment- the Nakfa Terrain - is bounded by the Adobha Abi valley in the west and by the Red Sea escarpment to the east. It is made up of calc-alkaline volcanic and volcaniclastic rocks conformably overlain by a metasedimentary sequence of chlorite schists, grits and polymict conglomerates with occasional pelitic sericite schists and carbonates. The metavolcanic rocks are intruded by variably deformed plutonic to hypabyssal calc-alkaline bodies. The sequence is cut in places by post-kinematic granites and gabbros and is also transected by several narrow shear zones sub-parallel to the regional strike. The Nakfa Terrain is considered to represent a relict island arc assemblage. Several VMS (Volcanogenic Massive Sulphide) base metal deposits and gold showings are associated with this tectonic unit.

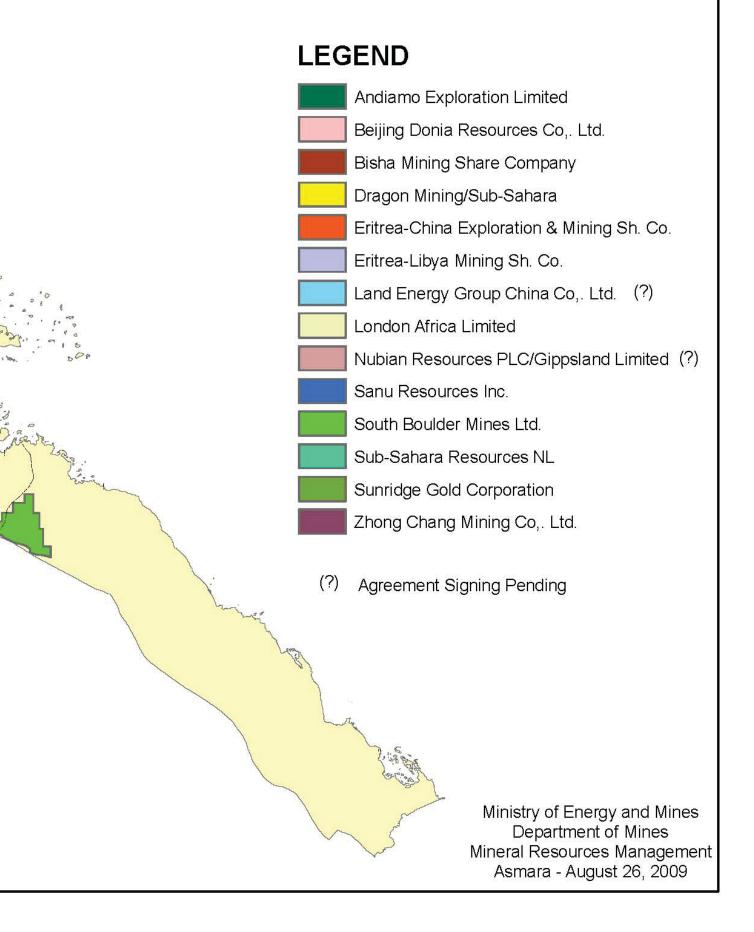
The southern segment - The Danakil Terrain - is composed of metamorphic rocks which may be grouped into three formations:-

- (1) migmatitic hornblende biotite gneisses;
- (2)a phyllitic formation consisting of schists, conglomeratic phyllites, crystalline limestones, and graphitic schists; and
- (3) post-tectonic granitoids.





ONCESSIONS OF ERITREA



Recently compiled geologic map of the whole country at 1:1,000,000 scale has divided the Precambrian basement rocks into 7 domains, 5 groups and 3 formations. It is a rather detailed presentation of the rocks units of the country.

Mesozoic Sediments

The lower Mesozoic sediments are represented by the Merbet (Adigrat) Sandstone which outcrops in the southern part of the country and in the Danakil area, and is commonly intercalated with siltstones and hematitic layers. It lies unconformably over thin layers of conglomeratic sandstones which, in places, appear to have the characteristics of a glacial deposit. Overlying the sandstone is the Jurassic Adailo (Antalo) Limestone. This unit is exposed over a large area in the Danakil and is made up of limestones that are compact, partly shelly, fossiliferous and layered. Alternations of quartzitic layers are present in the lower part, whilst towards the upper part the sequence becomes mainly gypsiferous to dolomitic. The Upper Sandstone forms pockets of sandstones that have been preserved from erosion. Commonly this sandstone is medium to coarse grained, light coloured, and dominantly quartzitic but partly conglomeratic.

Tertiary Volcanics and Sediments

The Tertiary volcanics can be divided into three units:

- (1) the plateau-forming Tertiary basalts that are predominantly olivine basalts with intercalations of intermediate lavas and tuffs;
- (2) the lower Afar stratified basalts composed of basaltic lava flows and tuffs that are usually found intercalated with sediments of the Danakil Formation; and
- (3) the Afar Basalts composed of recent lava flows and volcanic cones, with minor acid to intermediate volcanics, mainly trachytes, rhyolites and ignimbrites. The Tertiary basalts are currently actively exploited for aggregates.

The Tertiary Sediments

The Tertiary sediments lie along the Rift escarpment and in central Afar. Three sedimentary formations have been identified: the Danakil, Dogali and Desset Formations. The Danakil and Dogali Formations are of late Tertiary age and are composed mainly of limestones intercalated with conglomeratic sandstones and siltstones. They are overlain by calcareous sands with coral reefs, partly consisting of pebbles of volcanic origin, and gravels with sand, silt and clay horizons. The Desset Formation comprises sandstones, clays and fine beds of anhydrite and halite unconformably overlying the Dogali formation in the northern part of the coast, while the Red Series containing coarse clastic fresh water sediments occupies the southern part of the coast.

Quaternary Sediments

A thick evaporitic formation of bedded halite, gypsum, anhydrite, potassium and magnesium salts, with shell material fills the basin in the Danakil Depression. Deposits of sheetflood terraces, silt, sand and gravel are present in some locations occasionally covered by wind blown sands. Basaltic flows and related spatter cones represent Quaternary volcanic activity in the Danakil region.

Mineral potential of Eritrea

Although Eritrea has a long history of mining, modern mining, began at the beginning of the 20th century following the Italian colonization of the country. Following the Second World War, mining and related operations continued throughout the country, although intermittently. In the early seventies this resulted in the development of the short-lived modern mine at Debarwa, before the independence struggle forced its closure.

Eritrea is becoming a demonstrated potential to host significant VMS deposits after the discovery of Bisha, Harena, and Hambok Massive sulphide deposits in the western lowlands, Koken in the northwestern lowland. Zara shear-hosted gold and the recent findings in Harab Suit and Seroa prospects and Embaderho in the central highlands are additional examples. Moreover, more findings such as deposits which include Debarwa , Adi Nefas and Ketina and many other small prospects has made the country to be known in such type of mineralization.

The potential for shear hosted gold deposits is also demonstrated from the recent, gold discovery in Zara. Exploration work was conducted over a small area, situated along a major shear zone that runs across the country. Although there are many prospective areas waiting to be discovered, the country is not well explored.

Eritrea possesses a geological setting that is favourable for both precious metals and base metal mineralization, as well as for industrial minerals. The range of identified potential deposits covers gold and other precious metals, polymetallic massive sulphide types and quartz vein and quartz stockwork type of deposits. There is an indication of the occurrence of Nickel and chromite showings associated to the ultrabasic rocks in the far north of the country. Occurrences of potash and sulphur evaporates in the Danakil depression, and a variety of construction materials, including marble, granite and others in several parts of the country is also well known.

Gold

Recent exploration activities have proved that gold occurrences are very widespread in many parts of Eritrea and the country has a great potential in developing gold deposits. In addition to the previously known areas of primary gold occurrence in the central highlands (which includes the Hamasien gold field), those of Shillalo (in southwestern lowlands) area, and those of southern Eritrea, exploration activity in the last decade has shown the presence of economic gold deposits in the western lowlands and also in the northern part of the country. Among these are gold associated with base metals in Bisha, and gold showings in Haykota area, southeast of Tesseney areas and in northern Eritrea(Zara).

The average head grades in most of the historic vein gold mines that were active during the Italian colonial time up to the late 1950s, were reported to be as high as 25 - 45 g/t, with reasonably good recoveries.

Eritrea's gold mineralization is usually hosted in quartz veins and stockworks, and in particular in shear zones associated with felsic volcanic rocks, dioritic intrusions and in various schists that are frequently sub-parallel to the strike of the pronounced cleavage of the host rocks. Occurrences of gold within exhalative VMS deposits, and in the weathered and supergene zones overlying them, are becoming more evident with recent additional discoveries of gold in Debarwa and Adi Nefas (in the central highlands), and at Bisha and Harena (in the western lowlands).

Base Metal Deposits

NNW to NNE-trending belt of gossans, exhalative cherts and altered felsic rocks that are indicators of massive sulphide mineralization are recorded in many parts of Eritrea. The ores of these massive sulphide deposits are predominantly chalcocite, pyrite with minor amounts of sphalerite, chalcopyrite and bornite. A major belt of massive sulphide deposit with gold and base metal mineralization passes through Asmara and includes Debarwa, Adi Nefas, Embaderho and many other localities roughly within a 50 km wide belt over a strike length of 250 km, extending for more than 50 km north of Asmara and upto the Eritrean border to the south.

The belt that includes the Bisha VMS and Harena VMS deposits in the Western Low lands has already proved the presence of world class deposits and is also being explored for additional discoveries. There are VMS indications farther north of Kerkebet, Harabsuit and possibly surrounding areas. There is a belt of copper mineralization in Raba-Semait area, sulphide-rich gossanous rock in Mt Tullului(Bedeho) in Sahel, northern Eritrea and in Mt Seccar and Sheib areas in the Eastern Lowlands.

At Bisha, a world class deposit of precious and base metal VMS deposit has been found. Recent exploration work in Adi Nefas VMS shows 9.0 metres grading 11.91 g/t Au, 285 g/t Ag, 3.18% Cu and 11.05% Zn and in another test drill NG-043-D – 5.25 metres grading 10.81 g/t Au, 239.8 g/t Ag, 6.77 % Cu and 6.77% Zn has been obtained. Reserve estimation made recently has shown that minable zinc, copper and associated gold is present in Adi Nefas.

Embaderho is now emerging as a large base metals (Cu-Zn) deposit with some associated gold. Resource estimation is still going on, however at this stage it is confirmed that is big a base metal deposit.

Overall in terms of mineral potential assessement and geological work, much of the country remains unexplored, despite the several discoveries that are

being made.

Industrial Minerals

Potash, sylvite and gypsum-bearing evaporates occur at Colluli, south of Bada. Substantial deposit of the latter are found at Desset area, north-west of Massawa. Large deposits of common salt also occur at several places along the Red Sea coast.

Considerable quantities of high quality silica are found at Merbet, which has been exploited for glass manufacture. In addition, deposits of silica sand with feldspar occur at various wadis of Eritrea. High purity feldspars occur in pegmatites at Lahazen, 35 kms south of Massawa. Sub economic deposits of mica, which was once exported by the Italians, are found south east of Lahazien. Large deposits of kaolin occur in the lateritic horizon in parts of Teraimni, at Adi Koteio close to Adi Kwala, Adi Keih, Zeghib, Adi Hawusha, Adi Ahderom and west and south-west areas of Himbirti.

Extensive deposits of the raw materials for cement manufacture are found at Adailo, close to Tio with all the constituents including limestone, marl, clay and gypsum occurring close together.

Barite occurrences have been identified around the

Heneb, Meter and Gharsa wadis to the north west of Mersa Gulbub. Barite veins also occur associated with faults in the sediments of the Dogali and Desset Formations. Other barite deposits of economic significance, with reported grades of 95-97% are known to exist at Debarwa and Ketina. Gypsum deposits are also found in the Desset plains.

Construction Materials

Large deposits of marble occur as belts running north-northeast including in the Gogne area extending from Gogne to Goranda, and in the Adobha area. Other significant marble deposits occur at Afhimbol, Amberbeb, and Mt Kuruku (in the upper valley of Barka). The Kertse-Komte and Debri black and gray marble deposits occur south of Decamhare and have been exploited for a long time. Recrystallised limestone deposits with variegated colours occur at Dichinema area, in the southwest of Eritrea.

Granites of various colours and textures are exposed over large areas. Granites of dimension stone quality, which are currently being exploited, occur at Geleb (pink granite), and in the Arato, Korbaria, and Tukul areas (grey granite). The Mai-mine granite and Elabered granite are also suitable candidates for dimension stone.

A narrow outcrop of coral limestone extends along the coast from the headland of Ras Kassar to the coastline of Tio. Immense deposits of limestone occur in the Adailo-Aitosh area south-west of Tio.

Geothermal Potential

The possibility of the economic exploitation of the geothermal heat for power generation occurs in the rift area, associated with volcanic activity. Alid, Nebro, and Dubi are the main target locations where geothermal activity is known to be intensive. Lower temperature activity also occurs at Mai Wuui, 30 kms west of Massawa.

Geothermal activity, evidenced by fumaroles and hot springs with extensive alteration of the ground, are abundant in the Alid geothermal field. Studies carried out so far in this area indicate the presence of a possible sub-surface high temperature reservoir. The geothermal manifestations at Nebro and Dubbi are also promising, but further study will be required to estimate the reservoir temperature.



High temprature geothermal Fumarole at Alid

CURRENT LICENSES STATUS

The number of exploration companies operating in Eritrea (existing conpanies include Bisha Mining Sh. Co., Sub-Sahara Resources (Eritrea), SunridgeGold (Eritrea), Sanu Resources, Eritrea-China Sh. Co. and Beijing Donia) has increased with the recent newly granted licenses (which include London Africa Mining, Land Energy Group China Co.Ltd, Zhong chang Mining Ltd, Eritrea-Libya Mining Sh. Co., South Boulder Mines, Nubian Resources Ltd./Gipps land Ltd, Andiamo exploration Ltd). The regional distribution of their properties include Central, Western, South western and Northern Eritrea.

Bisha Mining Share Company

The bishadeposit is a large precious metal and base metal-rich volcanogenic massive sulphide and is a joint venture between Eritrea's ENAMCO and Canada's Nevsun Resources Ltd.

Recently Bisha Mining Sh. Co. has signed an agreement for a \$235 million financing debt and this shows that the company is well on its way to become a producing mine. Housing and infrastructure for the Project are just about complete and assembly of the Process Plant is well advanced. Production drills are already working on site and excavators and large off road haulage equipment will arrive towards the end of 2009. Most of the machinery for the project is procured and awaiting delivery including the main grinding mills. Production will commence in 2010; however inwards investment, training and employment are already beginning to take effect in the community.

Production will be:

Years 1 and 2: Average 431,000 oz Gold per year Average 702,000 oz Silver per year

Years 3 to 5: Average 170 million lb Copper per year Plus precious metal credits

Years 6 to 10: Average 220 million lb Zinc per year

Average 40 million lb Copper per year Plus precious metal credits

Sunridgegold Corp (Eritrea)

The work thus far done by Sunridge, a Canadian mineral exploration and development company, has resulted in the definition of four NI 43-101 compliant resources on the Asmara Project with total combined metal content of 1.3 million pounds of copper, 2.5 million pounds of zinc, 1.1 million ounces of gold and 32 million ounces of silver.

The largest deposit is the 63 million tonne Emba Derho copper-zinc-gold VMS deposit that is located just 12 kilometers from Asmara. An independent positive Preliminary Economic Assessment study was completed in June 2009 which shows that the deposit has the potential to become a large openpit mine producing 60 million pounds of copper, 133 million pounds of zinc and 21,000 ounces of gold per year. It is anticipated that a Pre-Feasibility Study on the Emba Derho deposit will commence in the 4th quarter of 2009.

The Asmara Project is considered to be a VMS district with many as yet undrilled targets that warrant further exploration work. Sunridge plans to drill many of these targets in the near future.

Sub-Sahara Resources (Eritrea)

Sub-Sahara has been actively exploring in Eritrea for the past eight years. The initial properties that Sub Sahara secured contained the volcanogenic massive sulphide (VMS) prospects surrounding the capital city of Asmara. The Debarwa Cu/Zn/Au/Ag deposit was successfully advanced to a 'Scoping Study' for mining before the entire land package was sold to joint venture partner Sunridge Gold Corp in 2007. During 2007, Sub Sahara accelerated exploration activities on its Zara Gold Project (in the north-west of the country) and was rewarded with definition of a +1moz gold deposit (Koka) grading 6.31g/t, in early 2008. The Koka Gold Deposit is now in development for mining through a Pre-Feasibility Study.

Work to date at the Zara Project includes over 17,000m of diamond drilling, independent resource estimates by Coffey consultation firm, metallurgical drilling and test-work, structural studies with follow-up drilling, petrographic studies, aquifer development, an environmental baseline study, ground based chargeability and resistivity geophysical surveys, regional geochemical sampling programmes and high resolution digital terrain modelling.

Sanu Resources

Based on the previous detail exploration works (geological mapping, geochemical and geophysical), Sanu continued its exploration activities in the Kerkebet and Mogoraib exploration licenses targeting VMS deposits despite the massive collapse of the world economy.

Generally most of the works that Sanu accomplished during January to July 2009 are data base entry, geological mapping and map compilation and some follow up and prospecting works in the Kerkebet and Mogoraib licenses.

The most significant activity during the year consisted of preparation of a 43-101 compliant resource calculation of the Hambok deposit. The Hambok resource estimate was prepared by G.H. Giroux of Giroux Consultants Ltd, of Vancouver, Canada and forms part of a new 43-101 report co-authored by Dr. Tucker Barrie and was released in February, 2009.

The Giroux Consultants' combined indicated and inferred resources at a cutoff grade of 2% zinc were calculated to be 10.2 million tonnes grading 3.0% zinc, 1.0% copper, 7.0 g/t silver, 0.2 g/t gold consisting of an indicated resource of 5.1 million tonnes grading 3.24% zinc, 1.12% copper, 7.8 g/t silver, 0.2 g/t gold and an additional inferred resource of 5.1 million tonnes grading 2.8% zinc, 0.96% copper, 6.2 g/t silver and 0.19 g/t gold.

Moreover, prospecting and follow ups that include detailed mapping and detailed magnetometer sur-

vey were carried out that covered about 350sq.kms in South West of Koken, Aradaib, Serarat and South of Halay in the Kerkebet License Area.

Eritrea-China Sh. Co.

In the year 2009, Eritrea China sh. co. has conducted detailed geological mapping and drilling in the Augaro exploration license area.

Beijing Donia

Beijing Donia Resources Co. Ltd (DONIA) was established in 2004 to deal with geological and mineral exploration of overseas resources. Zhonchang Mining Co. Ltd (Eritrea) is a newly registered mining company recently acquired a license in Sheib license area and is an affiliated company to Beijing Donia Resources Co. Ltd.

Beijing Donia is currently working on its license areas namely Woki-Zagir and Kenatib. The exploration works include geological mapping and geochemical sampling, trenching and magnetic survey and will be followed by drilling.

In addition to the afro-mentioned companies, the recent granted companies include Eri-Lib Sh. Co., London Africa Ltd, Andiamo Exploration Ltd, South Boulders and Zhanzang Sh. Co. Some of them have already started their exploration works (Andiamo Exploration) and others are expected to begin very soon.

Investment Opportunities

The future of Eritrea's mining industry appears bright. The prospective geology of the area and the recent discoveries of Bisha, Emba Derho and others together with an attractive and competitive investment regime makes Eritrea one of the most attractive and rewarding mining investment opportunities.

Results of the exploration activities conducted in the last ten years have proved the high mineral potential of the country, and that investing in Eritrea is rewarding. Although all areas of exploration are potentially prospective, the following are believed to be more so for investment.

Gold Prospects in South-Western and Western Fritrea

The south-western part of Eritrea is one of the most prospective gold regions in the country. It contains hundreds of small historic mines and operations that were active during the Italian occupation including the Augaro mines which was reportedly the most productive mine in Eritrea. There are also areas where artisanal gold mining is currently being undertaken by the local people. Most of these mineral showings and historical mines and old workings are associated with rocks of: the Augaro-Antore belt and Bisha VMS and Hykota-Fanco belts.

Deposits in the Augaro-Antore Belt

The Augaro-Antore belt is situated in the southeastern part of Western Lowlands of Eritrea. It stretches from the border in the south to the Barka River to the north where its extension is masked by intrusions. Localities known for gold in the lower Augaro-Antore belt include Augaro, Damishoba, Dase, Tokombia, Ranyo and Doboro. The Augaro mine appears to have been developed on a series of quartz veins and stringers, some showing sulphide mineralisation and formed in a low-pressure region associated with a regional shear zone. The mineralised system is known to extend for a distance of 2,900 metres, of which only about 350 metres was mined. The main quartz vein, about 240 metres long, and having an average width of 10 metres, ends in a stockwork of stringers. The main en-echelon system extends over a strike length of 300 metres with widths of 20 - 30 metres. The recovered gold grade is reported to have been 30 – 40 grams per tonne and production during the periods 1933 - 1941 and 1955 - 1956 is recorded at 874 kg, although it is widely believed that the actual production was greatly in excess of this estimate. The mine

was closed in 1941 due to war and all its mining equipment was removed. It was re-opened briefly in 1955 to re-treat the tailings. Other interesting localities in this belt that reached production include Damishoba, Dase, and Ranyo. Doboro, Tokombia and several others were still at the development stage, involving pitting and underground exploration, when the Italian occupation ended in 1941. In the southern part of the belt operations at Antore and Damanoshila, and in the eastern zone of the Berbere River, all were at various stages of development before the Second World War. In the northern part of the belt, at Suzena, prospecting started in 1932, and mining was carried out from 1937 – 40. Drift on three levels were developed, but work was abandoned on the fourth level due to water problems.

Gold has also been discovered by the local artisanal miners at a number of places in recent times. These are indications of the high gold potential of the area.

Deposits in the Bisha VMS Belt

Based on regional works and satellite image interpretation, the Bisha VMS and associated volcanosedimentary belt is estimated to have a maximum width of about 30 kms and extends for more than 100 kms to the south, while its northern extension is not clear. This belt is believed to be highly prospective and may continue for a substantial distance to the north as well as to the south. In addition, records of past exploration in this area indicate that quartz veins with varying gold contents have been reported from some locations including Okere (Okreb). Some of these were prospected and exploited before mining stopped due to WWII.

Gold & Base Metal Prospects in Southern Eritrea

There are indications of the continuity of the Asmara/Debarwa VMS belt for long distance to the south. Outcrops are known of gossanous rocks, exhalatives and rock assemblages (felsic and mafic) such as those of the Debarwa area, in the Ketina area. There are also many places where local people are

conducting artisanal mining. The area west of Ketina could represent another belt of mineralization, as there are areas of recently discovered artisanal workings south of Monsura area, that are its northern extension.

Gold & Base Metal mineralisation in Northern Fritrea.

There are indications of gold and base metal mineralization in several parts of northern Eritrea. Old workings and prospects, of Italian time are found in Seroa and Arruba in Harab Suit. There is a Cu-mineralization along a belt that passes through Raba and Semait areas where old workings are found. Gossanous rocks running for hundreds of metres occur in Halibet area farther north.

Recent exploration activities and the work of artisanal miners in Zara and other areas to the north is indicating the presence of auriferous quartz veins and stock works in many areas in this part of the country.

In conclusion, it can be said that mineralization in most part of the country is not well studied. It may be far more complex and extensive than is apparent. The level of technology and understanding of mineralization styles that prevailed during the Italian occupation was low, and most of the historic mines and old mining operations in Eritrea were interrupted because of the Second World War. The investment climate that existed at the time of the struggle for independence that followed was also not conducive to the development of these operations. It is therefore, no doubt that this part of the region has great potential to be well endowed with mineral deposits.

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