

Development Projects

SENEGAL

Massawa feasibility project

Work continued on the Massawa feasibility project during the quarter.

Due to the coarse nature of the gold in the Massawa Central Zone (CZ) structures, the larger RC drill sample gives a more representative result than the significantly smaller diamond drill sample. The infill RC programme was completed during the quarter and a portion of the results were received. An interim resource model update was completed on partial results and this has shown a significant shift in the grade distribution within the CZ orebody, with higher grades being confirmed in the southern portion of the pit and lower grades in the northern portion. In conjunction with the grade changes, the metallurgical modelling has confirmed higher metallurgical recovery in the higher grade material. The net result is that the revised CZ pit has more gold in the southern half than previous models due to higher grades, but has lost ounces in the northern half due to lower grades and lower recovery. The current CZ pit shell stops at the base of existing feasibility RC drilling, despite the structures continuing down dip. A conceptual model completed on the pit has simulated the projection of the current resources to depth. The \$1 000/oz whittle pit run on this simulated model shows a potential gain of up to ~500koz. This exercise justified a deep RC programme to confirm the continuation of the high grade with depth, which started in the quarter and is still in progress.

Recent feasibility RC drilling to the east of the Gabbro and Porphyry of the main Massawa CZ shear zone has identified additional footwall structures which have been included in the latest interim model. Highlights include 22m @ 3.79g/t from 18m (MWRCGC1340), 16m @ 12.2g/t from 20m (MWRCGC1341), 14m @ 27.26g/t from 46m (MWRCGC1342) and 17m @ 2g/t from 53m (MWRCGC1343). Drilling observations indicate a strike potential of at least 285m. Results are pending.

The current mine schedule has utilised a minimum selective mining unit (SMU) of 4.5m on the current CZ model which has incurred higher dilution than previously assumed during the update to the prefeasibility in 2017. This, together with the updated geological and metallurgical models, has resulted in revised financial models which support a robust internal rate of return (IRR) at current gold prices. The base case proposes the current mine schedule using an option of installed HFO power on site while an upside option utilises slightly lower upfront capital by relocating the current Morila crushing and mill circuit with the potential of introducing grid power after two years of operation.

NPV (5%) AND IRR SENSITIVITIES TO GOLD PRICE

Option	\$1 000/oz	\$1 200/oz	\$1 400/oz
Base case	\$154m	\$414m	\$670m
	15%	29%	41%
Upside	\$223m	\$481m	\$736m
	19%	33%	45%

Drilling will continue to test the CZ deeps in Q3 2018 where a conceptual model has shown the potential to boost the IRR by up to ~4% through the potential of additional high grade resources at the base of the current \$1 000/oz pit. A final updated resource model including all drill results is expected by the end of the quarter. Further mining optimisation studies are underway on the effects of SMU on dilution and ore loss, while also looking at options of phasing the stripping to improve the waste mining schedule.

Concurrent to this, final capital estimates are in progress to confirm if there are capital benefits to utilising portions of the Morila plant, principally in the areas of comminution, gravity and thickening. Other aspects of the capital design, namely Tailings Storage is progressing well and expected to be complete in the third quarter.