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## **Engineer Gold Mines Ltd. provides update on compilation & targeting work along strike from Wann River area at Anyox-Rodeo Cu-Ni-Pt-Pd showing**

Vancouver, March 15, 2023 – Engineer Gold Mines Ltd. (“the Company” or “Engineer”) (TSX-V: EAU) is pleased to provide an update on its 100%-owned **Engineer District** property, which covers 29,593.47 hectares in a 35 km-long contiguous claim grouping near Atlin in northwest British Columbia. The Property includes the historical high-grade Engineer Gold Mine, the TAG developed prospect, and several other high-grade vein and shear-hosted bulk tonnage gold targets, as shown in Figure 1 below. The Company is currently compiling prior owner and historical data to identify opportunities for development and discovery. Anyox-Rodeo is a massive sulphide showing in an under-explored area within the Wann River drill permit area, where the Company intends to focus its’ 2023 exploration efforts.

Chris Huggins, President & CEO of Engineer Gold Mines Ltd., stated “The over 5 km of unexplored strike length of the Llewellyn fault zone corridor extending southeast from the Wann River vein system towards Anyox-Rodeo and beyond offers an exciting opportunity for discovery in a historical but very under-explored area.”

The **Anyox-Rodeo** showing comprises massive pyrrhotite veins exposed on the southwest bank of the lower Wann River. Reportedly, a 6 m adit was excavated over a copper seam here in 1900 but was subsequently flooded by the Engineer Gold Mine’s hydro dam in 1924 (PF810417, BC Minfile). Historic workings include an adit and two shallow pits, from which a 2008 grab sample of massive pyrrhotite fragments and oxidized spoils returned 0.34% copper, 0.41% nickel, 0.11% cobalt, 0.07 g/t platinum, and 0.2 g/t palladium (Aspinall, 2009; AR 30601). The showing occurs within the Llewellyn fault zone corridor, approximately 1280 m along strike from the extent of known mineralization in the **Wann River** area, where precious and base-metal enriched veins have been sampled over an area of 800 m x 180 m (Pautler, 2021).

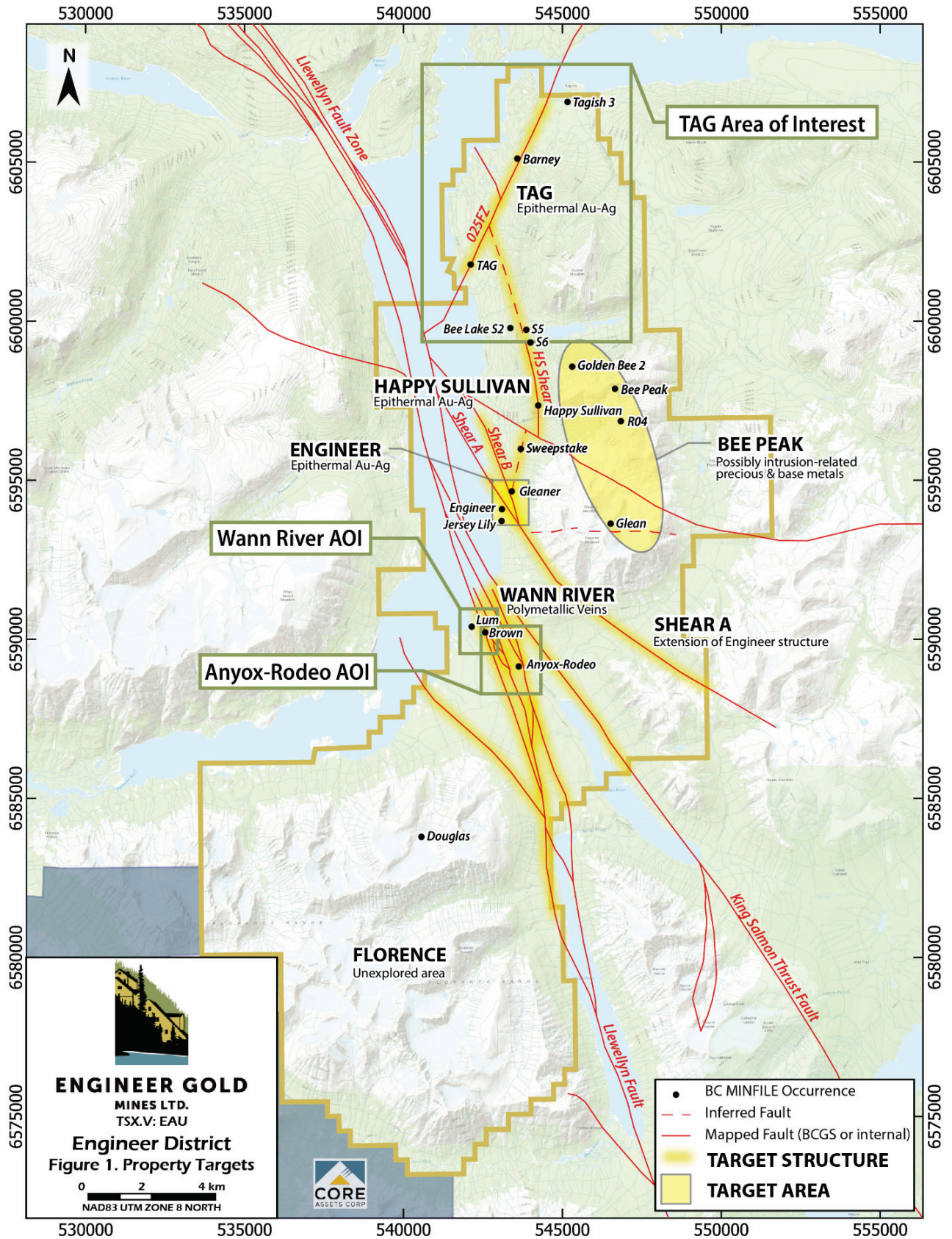
Mihalynuk (1999) describes Anyox-Rodeo as a 2 m-wide sulphide pocket where pentlandite and pyrrhotite form a matrix to pegmatitic actinolite in chlorite-actinolite schists of the Boundary Ranges Metamorphic Suite. Aspinall (2009) describes subvertical, southeast-trending 10 – 20 cm thick massive pyrrhotite veins. The mode of formation of this massive sulphide occurrence is not well understood; its geologic setting, within 200 m of the sheared contact between Stuhini Group volcanics and Boundary Ranges Metamorphic suite in an area where both units are intruded by early Cretaceous foliated diorite to monzodiorite, has prompted comparisons to nearby basaltic copper, volcanogenic massive sulphide (“VMS”) and skarn deposits (Mihalynuk et al., 1996; Mihalynuk, 1999; Aspinall, 2011; MINFILE 104M-017).

Mineralogy at Anyox-Rodeo is similar to two zones at the Bennett Plateau, approximately 65 km to the northwest along the Llewellyn fault zone: 1) At the Skarn Zone, copper amphibole-sulphide skarn mineralization with structurally-controlled quartz-actinolite-carbonate veins is hosted in

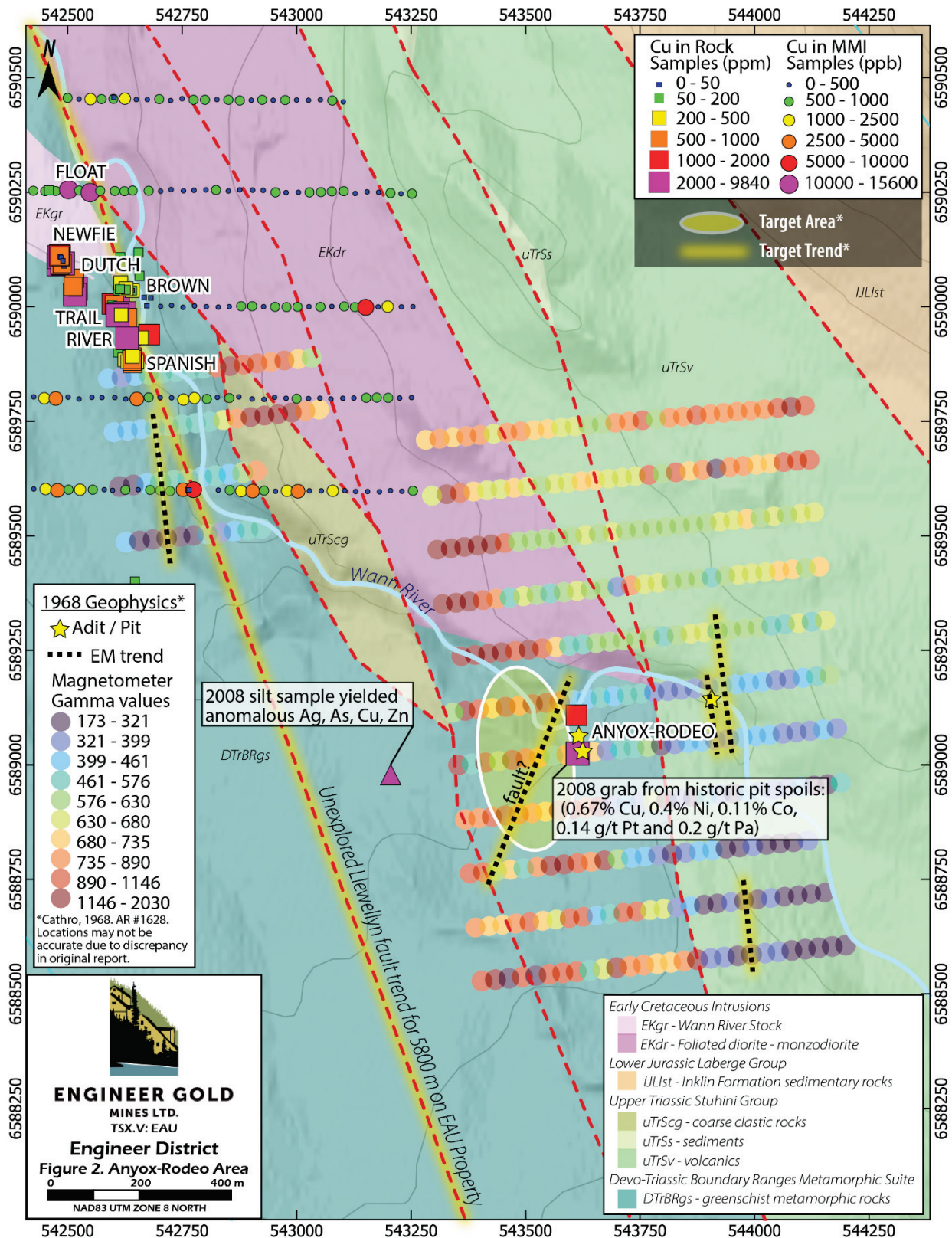
metasedimentary rocks of the Upper Triassic Stuhini Group along the sheared unconformity between the Stuhini Group and Boundary Ranges Metamorphic Suite (BC Minfile 104M 085; Castonguay et al., 2020); 2) Massive pyrrhotite veins are exposed at the Big Thing occurrence, which is interpreted as a VMS and/or intrusion-related gold occurrence. Several occurrences on Core Assets Group's neighbouring Blue property highlight the potential for carbonate replacement deposit ("CRD") systems in this geologically complex belt. Recent drill results from Core Assets Group's Jackie CRD target include up to 215 g/t Ag, 18.8% Pb+Zn, 0.36% Cu over 1.25 m within a broader intercept from surface (Core Asset News Release March 6, 2023).

Despite the discovery of Anyox-Rodeo dating to 1900, overburden cover and sporadic exploration efforts leave the area largely under-explored. Modern surface geochemistry in the vicinity is restricted to four (4) 2008 grab samples from a historic pit (all of which yielded > 0.3% Cu), a 2008 silt sample 375 m to the west (which yielded anomalous Cu, Ag, As, and Zn) (8Bcrt12), and a rock float sample yielding 0.146% Cu (9BCRWR01RF (AW 2009-8164) (Fig. 2). Ground magnetic surveys in 1968 delineated north-northwest-trending magnetic highs which are broad and relatively uniform, and thought to represent lithological contrasts (Cathro, 1968). Concurrent electromagnetic ("EM") surveys successfully identified several north-northwest-trending conductors in the vicinity of old workings thought to represent sulphide mineralization, as well as a northeast-trending EM feature that is interpreted as a fault and possible control on mineralization at Anyox-Rodeo (Cathro, 1968; Aspinall, 2009; Fig. 2). In 2017, a Mobile Metal Ions ("MMI") soil survey identified a Au-Ag-Cu anomaly in the vicinity of the northernmost conductor of Cathro (1968)(Devine, 2017). Historic geological outcrop maps (Idaho Silver Mines, Ltd. 1968) note small exposures of diorite and dolomitic limestone in the area, indicating diverse geology along the fault corridor and potential for various mineralization styles.

In 2023, the Company intends to conduct significant exploration along the Llewellyn fault zone corridor from the Wann River vein system to Anyox-Rodeo and further to the south. LiDAR-derived high-resolution topographic data and aeromagnetic imagery will be obtained to elucidate fault geometry and position transects of MMI soil sampling and ground-based EM surveys, which will be used with field investigations to refine targets along the trend before a potential fall drill program.







References

- Aspinall, N.C., 2009. Engineer – Mt. Switzer Project, prepared for Blind Creek Resources. BC Geological Assessment Report #30601.
- Aspinall, N.C., 2010a. Wann River – Engineer Project, Geological-geochemical-reconnaissance, prepared for Blind Creek Resources. BC Geological Survey AR #31376.
- Aspinall, N.C., 2010b. Wann River – Engineer Project Reconnaissance Magnetometer Survey Northwest End Edgar Lake, Atlin Mining Division, British Columbia. BC Geological Assessment Report #31500.
- Aspinall, N.C., 2011. Geochemical report on the Wann River area, prepared for Blind Creek Resources. BC Geological Survey AR #32004.
- Castonguay, S., Ootes, L., Devine, F., and Friedman., R., 2020. Superimposed Late Cretaceous and earliest Eocene gold mineralization and deformation events along the Llewellyn-Tally Ho deformation corridor in northwest British Columbia and southern Yukon; *in* Targeted Geoscience Initiative 5: Contributions to the Understanding of Canadian Gold Systems, (ed.) P. Mercier-Langevin, C.J.M. Lawley, and S. Castonguay; Geological Survey of Canada, Open File 8712, p. 223-236. <https://doi.org/10.4095/326039>
- Cathro, R.J., 1968. Geophysical Report Magnetic and Electromagnetic Surveys of Mineral Claims located near the mouth of the Wann River, for Idaho Silver Mines Ltd. BC AR #01628.
- Devine, F., 2017. Report on the 2017 MMI Soil Sampling Program Engineer Mine and Wann River Areas, Southern Tagish Lake Area, BC.
- Pautler, J., 2021. Geological and geochemical report on the Engineer Gold Mine Property, Tagish Lake, British Columbia. BC Geological Survey AR #39759.
- Mihalynuk, M., and Mountjoy, K.J., 1990. Geology of the Tagish Lake Area (104M/8, 9E), in BCGS Geological Fieldwork 1989, Paper 1990-1.
- Mihalynuk, M., 1999. Geology and Mineral Resources of the Tagish Lake Area (NTS 104M/8, 9, 10E, 15 and 104N/12W) Northwestern British Columbia. BC Geological Survey Bulletin 105.

### **Qualified Person**

The technical content of this news release has been reviewed and approved by Sue Bird, M.Sc., P.Eng., independent consultant, a qualified person, as defined by National Instrument 43-101.

### **About Engineer Gold Mines Ltd.**

**Engineer Gold Mine:** The historic Engineer Gold mine is a narrow vein past producing underground gold mine with an Inferred Mineral Resource of 41,000 t grading 19.0 g/t gold for 25,000 oz contained gold. The resource uses a cutoff grade of 5 g/t Au and assumes a 1m minimum mining width, which is similar to historical mining. It includes all material inside the mineralized shoots and is based on the payability (stope) limits. Within this resource is a higher-grade core of 14,000t grading 52.5 g/t gold (25 g/t gold Cut-Off) containing 23,600 oz contained gold. The resource grade was reconciled to a bulk tonnage sample which contained 175 tonnes at 23.9 g/t Au which is 16% higher than the resource grade of 20.6 g/t Au for the Engineer portion of the resource. This is considered acceptable for a nuggety gold deposit and exemplifies the potential conservatism of the 2018 resource. This resource estimate was initially

calculated by Snowden Mining Industry Consultants Ltd. in 2011 and re-stated in the 2018 NI 43-101 Technical Report.

Note that this resource estimate predates the 2019 CIM Guidelines for NI 43-101 reporting. The company has done no further work to confirm this historical resource.

**Tag Property:** The 1,070-hectare Tag property covers the 025 or Main zone, which contains an historical mineral resource estimate including 250,000 tonnes of Indicated material at average grades of 2.97 g/t Au and 12.09 g/t Ag, and an Inferred resource of 400,000 tonnes at average grades of 2.98 g/t Au and 9.91 g/t Ag. The resource estimate was calculated using the polygonal method with vertical section at 50m spacing, and grades composited over a minimum length of 2.0 meters. The Au was capped at a value of 4 g/t and Ag was capped at 25 g/t. Underground mining was assumed with all material having a minimum composited length of 2m, within the interpreted shapes and above the cutoff assumed to be amenable to underground mining. The cut-off grade used was 3.0 g/t gold equivalent, calculated with a silver to gold ratio of 59.927. This historical resource was published as an NI 43-101 report filed on SEDAR entitled "Technical Report on Resource Estimates for the Tag Property, Northern British Columbia", prepared for CZM Capital Corporation by Reddick Consulting Inc. and dated December 29, 2009. Note that this estimate predates the 2019 CIM Guidelines for NI 43-101 reporting. The Company has done no further work to confirm this historical resource.

**Wann River:** The Wann River project has seen grab samples from the Lum showing with up to 263 g/t Au and 1350 g/t Ag reported in 2010. Adjacent to the prolific Llewellyn fault, the Wann River project holds potential for significant further exploration and discovery.

On Behalf of the Board of Directors  
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