

Study On Geological Characteristics And Genesis Of Nancha Gold Deposit In Tonghua City, Jilin Province.

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This research is mainly concerned with a study of The Geological Characteristics And Genesis Of Nancha Gold Deposit In Tonghua City, Jilin Province. The procedure were as follows by studying the regional mineralization geological background of mineral deposit, ore district and the mineral deposit's geological characteristics, and also based on that, we combined with the test analysis of the fluid inclusion to discuss the contributing factors of mineral deposit. The technique applied is referred to as the test analysis of the fluid inclusion. The results of the experiment indicated that the ore-controlling structure is XiaoSiPing-HuangHou mountain-NanCha "S" fracture type and its secondary fracture and fold structure. Through the test analysis of the fluid inclusion get the homogenization temperature between 150°C and 260°C, peak value centers between 190°C and 200°C, reflecting the mineralization temperature is middle-low temperature; Metallogenic pressure range is between 9.49 Mpa and 20.55 Mpa; Metallogenic depth is between 0.95 km and 2.06 km; The density of ore-forming fluid is between 0.81 g/cm³ and 0.94 g/cm³, peak value centers between 0.88 g/cm³ and 0.9 g/cm³; The salinity of ore-forming fluid is between 0.18 wt% NaCl and 0.59 wt% NaCl, peak value centered between 4 and 4.6. These findings of the research led the author to the conclusion that what we confirmed is that the NanCha gold deposit is the Medium temperature hydrothermal altered rock type gold deposit which controlled by the fracture and fold structure.