HEAT FLOW IN SOUTHEASTERN ANATOLIA

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**ABSTRACT**

The geothermal energy potential of Anatolia is quite high. In this project, we worked on the Southeastern Anatolia Region located south of Bitlis-Zagros Suture Zone (BZSZ) which is in the Arabian foreland. We analysed the bottom hole temperature (BHT) data of the region and thermal conductivity parameters of rocks in order to understand the regional heat flow. The methodology was conductive thermal modeling of four fields whose names are Çukurtaş, Bakraçlı, Çelikli and Taşlıdere, by using lithology and thermal conductivity of the rocks and calculate temperature depth profiles of deep wells. Surfer and Excel programs and Gerber scale were used for this purpose. Temperature-depth graphs were drawn for each models based on the lithological information that varies depth. These graphs allowed us to obtain geothermal gradient and surface heat flow for each model.

**Key Words :** Southeastern Anatolia Region, Geothermal Energy Potential, Bitlis -Zagros Suture Zone, Bottom Hole Temperature, Thermal Conductivity, Regional Heat Flow