

Figure 1: Superconductivity achieved at 90.7 K with zero external field at cooling ratio $7 \cdot 10^3$ K/s, at 90.5 K with 0.5 T external field and cooling ratio $7 \cdot 10^3$ K/s and at 90.2 K with 0.5 T external field and cooling ratio $5 \cdot 10^3$ K/s; here resistance of a HTS sample is shown vs. temperature.

Little effect on the HTS critical current has been observed for perpendicular field up to 0.5 T (the maximum possible field at HTS coils position expected on GOLEM) and superconductivity has been achieved at 90.5 K during bench tests (Fig. 1). Here the resistance of a sample piece of the HTS tape is shown vs. the temperature measured by a thermocouple at the surface of the tape, with and without external field and at different cooling rates.