

Temperatur transformasi fasa shape memory alloy tini hasil pepaduan teknik ARC - Melting

Deskripsi Lengkap: <https://lib.ui.ac.id/detail?id=128880&lokasi=lokal>

Abstrak

Phase transformation temperature of shape memory alloy - Tini produced by arc - melting technique. The observation of phase transformation temperature of Tini alloys produced by arc - melting technique was carried out by alloying Ti - 53%w Ni. Tini alloys were tempered at 900oC and then followed by quenching at 20oC and 5oC and finally were aged at 400oC for 1,4 and 16 hours. The Ti-53%. Ni alloyed is applied to obtain as shape memory alloys base on Tini . The Tini sample was analyzed by optical microscope, X - ray diffraction and simultaneous symmetrical thermoanalyzer (STA) . The result show that the martensitic phase has a structure of BCT (bODY CENTER TETRAGONAL) formed at room temperaturure. The phase transformation temperature from martensitic - austenitic phase was taken place at (162+5)oC