

The Investigation of Phase Diagrams of Erbium Pnictides

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The phase diagrams of Er-Sb and Er-Bi have been obtained. Erbium forms three compounds with antimony as well as bismuth. The antimonides and bismuthides Er_5Sb_3 (1640°C), Er_5Bi_3 (1427°C), ErSb_2 (650°C) and ErBi_2 (595°C) are formed by peritectic reactions. ErSb (2040°C) and ErBi (1860°C) melt congruently.

Key words: Rare Earth Elements; Phase Diagram.