



---

>>Entry Name: Rhenium borides

**Molecular Formula:** [BRe]

>>Variant: Rhenium boride ( $\text{Re}_7\text{B}_2$ ), 9Cl, 8Cl

**Molecular Formula:**  $\text{B}_2\text{Re}_7$

**Molecular Weight:** 1325.071

**Accurate Mass:** 1330.708818

**Percentage Composition:** B 1.63%; Re 98.37%

**Source/Synthesis:** Synth. from elements

**Use/Importance:** Commercially available

**Other Data:** A superconductor at 3.08K

>>Variant: Rhenium boride ( $\text{ReB}_2$ ), 9Cl, 8Cl

**CAS Registry Number:** 12355-99-6

**Molecular Formula:**  $\text{B}_2\text{Re}$

**Molecular Weight:** 207.829

**Accurate Mass:** 208.974354

**Percentage Composition:** B 10.40%; Re 89.60%

**Source/Synthesis:** Synth. from elements

**Melting Point:** Mp 2400 ° (2280°)

**References:**

Aronsson, B. *et al.*, *Acta Cryst.*, 1961, **15**, 878, (*cryst struct*)

La Placa, S. *et al.*, *Acta Cryst.*, 1962, **15**, 97, (*cryst struct*)

Portnoi, K.I. *et al.*, *Poroshk. Metall. (Kiev)*, 1968, **8**, 41; *Sov. Powder Metall. Met. Ceram. (Engl. Transl.)*, 1968, 112, (*synth, phase diagram*)

*Boron Refract. Borides*, (Ed. Matkovich, V.I.), Springer-Verlag, Berlin, 1977, (*rev, bibl*)

Chapnik, I.M., *Phys. Status Solidi A*, 1977, **41**, K71, (*props*)

Kashfi, M. *et al.*, *CA*, 1986, **104**, 13297, (*cryst struct*)