

Crystal Data: Monoclinic. *Point Group:* 2. Micalike crystals, to 2 mm.

Physical Properties: *Tenacity:* Very brittle. *Hardness* = n.d. *D*(meas.) = 2.40
D(calc.) = 2.38

Optical Properties: Semitransparent. *Color:* Colorless.

Optical Class: Biaxial (+) or (-). *Orientation:* Positive or negative elongation, inclined extinction. $\alpha = 1.470(2)$ $\beta = 1.510(2)$ $\gamma = 1.579(2)$ $2V(\text{meas.}) = \sim 85^\circ$ $2V(\text{calc.}) = 78^\circ$

Cell Data: *Space Group:* $P2_1$. $a = 9.909(5)$ $b = 8.130(10)$ $c = 7.623(1)$ $\beta = 108.4(2)^\circ$
 $Z = 2$

X-ray Powder Pattern: Chelkar salt dome, Kazakhstan.

7.33 (10), 4.09 (8), 3.50 (7), 3.32 (7), 3.06 (6), 2.033 (6), 7.77 (4)

Chemistry:

	(1)	(2)
B ₂ O ₃	57.85	66.60
MgO	5.75	
CaO	4.15	
SrO	21.66	24.78
H ₂ O	11.52	8.62
Total	100.93	100.00

(1) Chelkar salt dome, Kazakhstan. (2) SrB₈O₁₁(OH)₄.

Occurrence: In the insoluble residue from a salt dome.

Association: Ginorite, boracite, halurgite, kieserite, anhydrite, preobrazhenskite, boracite, aksaite, metaborite (Chelkar salt dome, Kazakhstan).

Distribution: From the Chelkar salt dome, Ak-sai Valley, Uralsk district, and in the Inder borate deposit, Kazakhstan.

Name: For STRONTIum and BORate in the composition.

Type Material: A.E. Fersman Mineralogical Museum, Academy of Sciences, Moscow, Russia, 69851.

References: (1) Lobanova, V.V. (1960) A new borate – strontiorborite. *Doklady Acad. Nauk SSSR*, 135, 173–175 (in Russian). (2) (1961) *Amer. Mineral.*, 46, 768 (abs. ref. 1).

(3) Brovkin, A.A., N.V. Zayakina, and V.S. Brovkina (1976) Crystal structure of strontiorborite Sr[B₈O₁₁(OH)₄]. *Kristallografiya (Sov. Phys. Crystal.)*, 20, 911–916 (in Russian).