

Sapphirine - $\text{Mg}_4(\text{Mg}_3\text{Al}_9)\text{O}_4[\text{Si}_3\text{Al}_9\text{O}_{36}]$

Hardness: 7.5. Cleavage: Poor/indistinct. Excellent chemical resistance.

References

Mindat: <https://www.mindat.org/min-3531.html>

Handbook of Mineralogy: <https://www.handbookofmineralogy.org/pdfs/sapphirine.pdf>

Sinkankas, J. (1972) Gemstone & Mineral Data Book, 346 p. Winchester Press, New York.