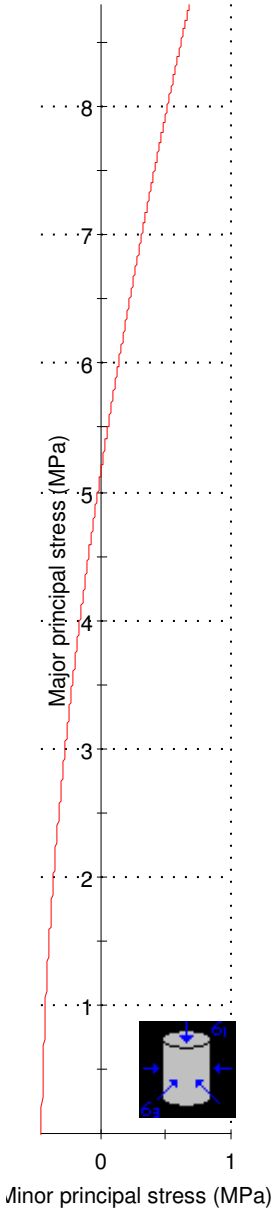
Analysis of Rock Strength using RocLab



Minor principal stress (MPa)

Hoek-Brown Classification

intact uniaxial comp. strength (sigci) = 50 MPa
GSI = 70 mi = 7 Disturbance factor (D) = 0.8
intact modulus (Ei) = 25000 MPa
modulus ratio (MR) = 500

Hoek-Brown Criterion

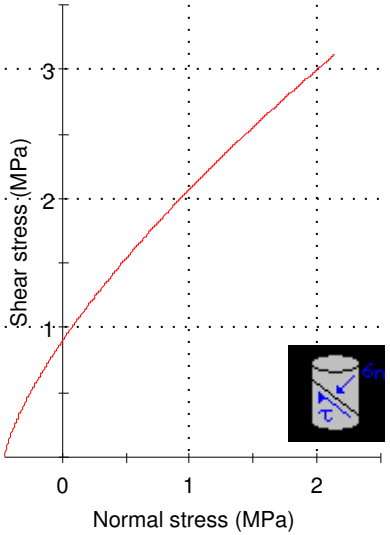
mb = 1.174 s = 0.0106 a = 0.501

Mohr-Coulomb Fit

cohesion = 0.915 MPa friction angle = 47.85 deg

Rock Mass Parameters

tensile strength = -0.452 MPa
uniaxial compressive strength = 5.120 MPa
global strength = 8.080 MPa
deformation modulus = 7320.05 MPa



Normal stress (MPa)