

High Calcium Limestone "Premix"

Nominal size: 0.250 – 1.25 mm

Production Facility: Exshaw Plant – Exshaw, Alberta

Description:

A light to dark gray microcrystalline pure limestone produced from a high-purity limestone deposit by quarrying, crushing, grinding, and screening operations. A sedimentary rock composed predominantly of calcium carbonate (CaCO₃).

Typical Chemical Properties:

	%
Calcium Carbonate (CaCO ₃), (%)	96.5
Calcium (Ca)	38.6
Magnesium Carbonate (MgCO₃)	1.8
Magnesium (Mg)	0.5
Silica (SiO ₂)	1.4
Ferric Oxide (Fe ₂ O ₃)	0.1
Alumina (Al ₂ O ₃)	0.2
Manganese Oxide (MnO) (ppm)	< 50
Total Sulfur (S)	0.03
Loss on Ignition	43.3

Classical Reference Data:

Specific Gravity (Pure Calcite)	2.71
Solubility in Water (25 °C), (mg/l)	14
pH (saturated solution (25 °C)	8 – 9
Crushing Strength (mPa)	8.3 – 195.8
Hardness (Mohs)	2 – 4
Specific Heat (38 °C) (cal/g. °C)	0.114
Dielectric Constant	8 – 12



Typical Physical Properties:

Bulk Density: Loose/packed 1442 – 1570 kg/m3 or 90 – 98 lb/ft3

Size Distribution:

Sieve (mm)	Sieve (USA)*	% Passing
1.250	No. 16	100
0.630	No. 30	87
0.500	No. 35	66
0.400	No. 40	42
0.315	No. 50	17
0.250	No. 60	6
0.200	No. 70	2

^{*} approximate USA mesh size corresponding to mm