



Cement

FLY ASH TEST REPORT

Analysis by: Edmonton Mortar Lab
Sample from : Sundance Power Plant
Average Analysis: December 2020
Test Report Number 1-21 CSA

Chemical Analysis

Silicon Dioxide (SiO ₂)	56.2 %
Aluminum Oxide (Al ₂ O ₃)	22.1 %
Iron Oxide (Fe ₂ O ₃)	4.2 %
Total (SiO ₂) + (Al ₂ O ₃) + (Fe ₂ O ₃)	82.5 %
Sulphur Trioxide (SO ₃)	0.3 %
Calcium Oxide (CaO)	9.8 %
Magnesium Oxide	1.2 %
Moisture Content	0.10 %
Loss on Ignition	1.01 %
Total Alkalies as Equivalent Na ₂ O	2.91 %

Physical Analysis

Fineness Retained on 45 um (No. 325 Sieve)	23.1 %
Strength Activity Index with Portland Cement	
% of Control at 28 Days (<i>previous month's result</i>)	91 %
Water Requirement, Percent of Control	93 %
Autoclave Expansion	0.00 %
Density	2.09 g/cm ³

We hereby certify that the composite fly ash sample above meets the chemical and physical requirements of CAN/CSA A3001 for Type F Fly Ash.

Certified : Robert S. Sheggen

WESTERN REGION

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