



Cement

FLY ASH TEST REPORT

Analysis by: Lafarge Seattle Concrete Lab
Sample from : Centralia Power Plant
Average Analysis: October 2021
Test Report Number 11-21 F CSA

Chemical Analysis

Silicon Dioxide (SiO ₂)	49.3 %
Aluminum Oxide (Al ₂ O ₃)	17.9 %
Iron Oxide (Fe ₂ O ₃)	6.0 %
Sulphur Trioxide (SO ₃)	0.7 %
Calcium Oxide (CaO)	14.1 %
Magnesium Oxide	5.4 %
Moisture Content	0.10 %
Loss on Ignition	0.29 %
Total Alkalies as Equivalent Na ₂ O	4.32 %

Physical Analysis

Fineness Retained on 45 um (No. 325 Sieve)	15.3 %
Strength Activity Index with Portland Cement	
% of Control at 28 Days (<i>previous month's result</i>)	96 %
Water Requirement, Percent of Control	93 %
Autoclave Expansion	0.01 %
Density	2.65 Mg/m 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 . _____

Rob Shogren
Technical Director

WESTERN REGION

5400 West Marginal Way SW, Seattle, Washington 98106-1517

Office: 206.923.0098 or 800.477.0100 Fax: 206.923.0388