

FLY ASH TEST REPORT

Sample from : Centralia/Kamloops Type F Fly Ash

Average Analysis: May 2025

Test Report Number Centralia/Kamloops-6-25_F_CSA

Chemical Analysis

Silicon Dioxide (SiO ₂)	53.7	%
Aluminum Oxide (Al ₂ O ₃)	12.9	%
Iron Oxide (Fe ₂ O ₃)	5.9	%
Total $(SiO_2) + (Al_2O_3) + (Fe_2O_3)$	72.5	%
Sulphur Trioxide (SO ₃)	0.2	%
Calcium Oxide (CaO)	9.8	%
Magnesium Oxide	3.2	%
Moisture Content	0.14	%
Loss on Ignition	2.80	%
Total Alkalies as Equivalent Na ₂ O	3.27	%

Physical Analysis

Fineness Retained on 45 um (No. 325 Sieve)	15.0	%
Fineness Retained on 160 um	0.3	
Strength Activity Index with Portland Cement		
% of Control at 7 Days	78	%
% of Control at 28 Days (previous month's result)	82	%
Water Requirement, Percent of Control	100	%
Density	2.67	g/cm ³
Density, Variation from Average	0.70	%
Fineness 45um Sieve, Variation from Average	3.10	%

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

Rob Shogren, P.E.

Technical Service Engineer

Robert J. Shoopen

Lafarge North America

^{*} Tested at CCIL, ASTM C1077 and AASHTO R18 Acreedited Laboratory