Polishing Grade Alumina

General Characteristics

Chemical Formula	Al_2O_3
Specific Gravity	3.9
Melting Temperature	2040° C
Refractive Index	1.76
Mohs' Hardness	9
Appearance	White Crystalline Powder

Typical Chemical Composition

Properties	AC-66	AC-5	AC-662 -325	AC-300 -325	AC-300 -325SG
Al_2O_3, %	99.5	99.5	99.5	99.4	99.4
SiO_2, %	0.01	0.01	0.01	0.02	0.02
Fe_2O_3, %	0.01	0.01	0.01	0.01	0.01
Na_2O, %	0.38	0.38	0.38	0.2	0.2
*L.O.I., %	0.14	0.14	0.14	0.3	0.3

* 300-1200° C

Typical Physical Properties

Ultimate Crystal Size, µm	4 - 6	4 - 6	4 - 6	< 1	<1
Surface Area, m^2/g	0.3 - 0.5	0.5 - 0.7	0.8	9 - 13	9 - 13
Oil Absoription	55 - 65	36 - 40	20 - 30	40 - 50	40 - 50
Specific Gravity	3.9	3.9	3.9	3.9	3.9
Bulk Density, Loose, lb/ft^3	55	66	58	24	24
Bulk Density Packed, lb/ft^3	68	74	70	30	30

Typical Tyler Standard Sieve Analysis

% on 100 mesh	1 - 10	trace	0	0	0
% on 200 mesh	60 - 90	25 - 30	0 - 1	1.5	< 1
% on 325 mesh	92 - 98	40 - 45	2 - 5	4	3
% pass 325 mesh	2 - 8	55 - 60	95 - 98	96	97
Median Particle Size by Microtrac, µm	-	-	5	3	2