

SUBMICRON ALUMINA (AL₂O₃)

Panadyne sub-micron aluminas are milled and classified with precision to reduce the potential of crystal agglomeration. Sub-micron aluminas are applied to buffing and polishing compounds. Other applications include pharmaceuticals and cosmetics.

TYPICAL ANALYSIS

Al ₂ O ₃	99.7%
SiO ₂	0.01%
Fe ₂ O ₃	0.03%
Na ₂ O	<.025%
CaO	<0.01%
MgO	<0.01%
Hardness	KNOPPS = 2000, MOHS = 9
pH	8.0-9.5
Specific Gravity	3.9 g/cc

TYPICAL APPLICATIONS

Polishing	Body and Vehicle Armor	Lapping
Structural Ceramics	Pharmaceuticals	Coatings
Technical Ceramics	Polishing	Filler



TYPICAL PROPERTIES

- High Hardness
- High Compression Strength
- Abrasion / Wear-Resistance
- Chemical Inertness
- High Degree of Refractoriness
- Superior Insulating Properties
- Resistance to Thermal Shock
- Dielectric Properties
- High Melting Point



SUBMICRON ALUMINA PRODUCT DATA

Product	D0.01%	D5%	D50%	D70%	Surface Area
PA 751	N/A	2.00-6.00	0.40-0.90	N/A	N/A
PA 752	N/A	1.10-1.70	0.40-0.60	0.20-0.50	9 – 15 m ² /g
PA 753	N/A	0.80-1.10	0.30-0.40	0.24-0.34	12 – 18 m ² /g
PA 890	2.50	0.85-1.25	0.38-0.46	0.28-0.35	6 – 16 m ² /g
PA 891	2.00	.080-1.20	0.35-0.45	0.35-0.35	11 – 16 m ² /g
PA 892	1.20	0.65-0.85	0.28-0.38	0.20-0.30	19 – 28 m ² /g