



Grinding & Polishing Consumables

Final Polishing Suspensions

Final polishing suspensions are designed to remove the final layer of surface deformation and prepare a sample for analysis. A variety of alumina and silica products are offered to meet many different application needs.

Excellent Surface Finish

While the final layer of deformation is often invisible to the naked eye, it must be removed for some analysis techniques.

Application Specific Solutions

Alumina suspensions and powders along with colloidal silica suspensions offer a solution for the wide variety of materials being processed in today's world.



MasterPrep Alumina

Sol-gel alumina suspension (0.05 μ m, ~8.5pH) is excellent for minerals, ferrous metals, carbides, precision metals, PWB's and electronics.

63-6377-006 6oz [0.18L]
 40-6377-032 32oz [0.95L]
 40-6377-064 64oz [1.9L]



MasterMet Colloidal Silica

Amorphous colloidal silica suspension (0.06 μ m, ~10pH) that provides chemo-mechanical polishing and is excellent for metals, minerals, ceramics and polymers.

40-6370-006 6oz [0.18L]
 40-6370-064 64oz [1.9L]



MasterMet 2 Colloidal Silica

Non-crystallizing amorphous colloidal silica suspension (0.02 μ m, ~10.5pH) that provides chemo-mechanical polishing action and is excellent for metals, minerals, ceramics and polymers.

40-6380-006 6oz [0.18L]
 40-6380-064 64oz [1.9L]



MasterPolish Final Polish

Blend of high purity alumina and colloidal silica (0.05 μ m, ~9pH) that contains minimal water and is optimal for water sensitive materials.

40-10084 32oz [0.95L]



MasterPolish 2 Final Polish

Iron oxide suspension (0.06 μ m, ~10pH) that provides chemo-mechanical polishing and is excellent for sapphire, glass, alumina, silicon nitride and metal/ceramic composites.

40-6376-032 32oz [0.95L]



MicroPolish Alumina Suspension

Agglomerated alumina suspensions offering high removal rates and suitable for use on magnesium, lead and their alloys.

40-10083 0.05 μ m 6oz [0.18L]
 40-10082 0.3 μ m 6oz [0.18L]
 40-10081 1 μ m 6oz [0.18L]



MicroPolish Alumina Powder

Agglomerated alumina powders offering high removal rates and suitable for use on magnesium, lead and their alloys.

40-10075 0.05 μ m 1lb [0.45kg]
 40-10077 0.3 μ m 1lb [0.45kg]
 40-10079 1 μ m 1lb [0.45kg]
 40-10076 0.05 μ m 5lb [2.3kg]
 40-10078 0.3 μ m 5lb [2.3kg]
 40-10080 1 μ m 5lb [2.3kg]



MicroPolish II Alumina Powder

High quality deagglomerated alumina powders offering good surface finish and suitable for most minerals and metals.

40-6323-016 0.3 μ m 1lb [0.45kg]
 40-6321-016 1 μ m 1lb [0.45kg]
 40-6323-080 0.3 μ m 5lb [2.3kg]
 40-6321-080 1 μ m 5lb [2.3kg]



MicroPolish II Alumina Suspension

High quality deagglomerated alumina suspensions offering good surface finish and suitable for most minerals and metals.

40-6363-006 0.3 μ m 6oz [0.18L]
 40-6363-128 0.3 μ m 1gal [3.8L]
 40-6361-006 1 μ m 6oz [0.18L]

FibrMet™ Abrasive Discs (Qty 50)

FibrMet Abrasive Discs are for fine grinding applications on glass, epoxy, or polymers and produce a fine surface finish. FibrMet Discs use Aluminum Oxide and are available with PSA backing.

Micron	4in [102mm]	8in [203mm]	12in [305mm]
0.3µm	69-3104	69-3174	69-3124
1µm	69-3103	69-3173	69-3123
3µm	69-3102	69-3172	69-3122
9µm	69-3101	69-3171	69-3121
12µm	69-3100	69-3170	69-3120

UltrPrep™ Diamond Lapping Films (Qty 5)

UltraPrep Diamond Lapping Films are for fine grinding of hard materials such as ceramics. They provide a fine surface finish and gentle material removal.

Micron	8in [203mm] PSA Backed	8in [203mm] Plain Backed
0.1µm	15-6791	15-6792
0.5µm	15-6795	15-6796
1µm	15-6801	15-6802
3µm	15-6803	15-6804
6µm	15-6806	15-6807
9µm	15-6809	15-6810
15µm	15-6815	15-6816
30µm	15-6830	15-6831

Abrasive Powders - (5lb)

Abrasive Powders are for fine grinding on cast iron, tin, or cloth-covered platens. They should be mixed with distilled water to achieve desired consistency.



Abrasive Type	Part Number	Grit Size ANSI [FEPA]	Micron
Silicon Carbide	40-6415-600-080	600 [P1200]	15µm
Silicon Carbide	40-6418-000-080	1000 [P2000]	10µm
Aluminum Oxide	40-6605-050-080	–	5µm
Aluminum Oxide	40-6603-030-080	–	3µm

Storage Cabinets

Buehler's storage cabinets are durable with easy to clean storage of platens and surfaces.

Standard Storage Cabinet



Part Number	Description
19-06-11	For 8in [203mm] / 10in [254mm] discs and platens (5 drawers)
19-06-12	For 8in [203mm] / 10in [254mm] discs and platens (10 drawers)
19-06-09	For 12in [305mm] discs and platens
19-06-10	Additional Shelves for 19-06-09

Dessicator Storage Cabinet

These cabinets are specially designed for ideal, moisture free conditions of up to 500 mounted specimens. They also hold platens, polishing cloths and abrasive discs up to 12in [305mm]. *Dessicator canisters sold separately*



Part Number	Description
20-1445	Dessicator Storage Cabinet

Accessories

20-1446	Spacer Tray, 1in [25mm]	20-8280	1in Disposable Mounting Cup
20-1447	Spacer Tray, 1.25in [32mm]	20-8281	1.25in Disposable Mounting Cup
20-1448	Spacer Tray, 1.5in [38mm]	20-8282	1.5in Disposable Mounting Cup
20-1449	Dessicant		