

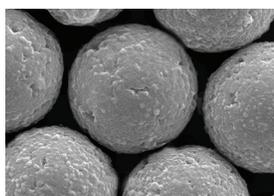
Magnetic Particles

ProMag[®] and BioMag[®] Microparticles

Superparamagnetic particles have been utilized extensively in diagnostics and other research applications for the purification of cells and biomolecules, such as antibodies, nucleic acids, and polypeptides. They confer a number of benefits, including ease of separation and suitability for automation. When coated with recognition molecules, magnetic microspheres are ideal for the efficient capture and separation of target. Unwanted sample constituents may be washed away following a simple magnetic separation step.

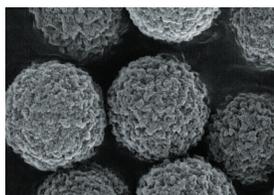
Our superparamagnetic microparticle product lines allow us to uniquely address a wide range of applications in the life sciences, from cell separations and immunoassays to suspension arrays and flow cytometry.

Antibody Isolation • Bioassays • Cell Separation • mRNA Purification • Suspension Arrays



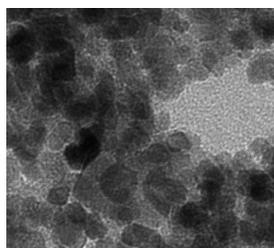
ProMag[®] HP

ProMag[®] HP (High Performance), our new generation of 3 μ m magnetic particles that has been meticulously engineered for use in assay development. ProMag[®] HP bring together the superior handling and fast separation rates of ProMag[®] with a highly optimized composition to ensure the lowest autosignal, particularly with respect to chemiluminescence and exposed iron.



ProMag[®]

ProMag[®] 1 μ m and 3 μ m magnetic microspheres are available with carboxyl or streptavidin surface functionalities. ProMag[®] support diagnostic applications that require highly uniform, high-binding beads and fast separation times. ProMag[®] have a proprietary surface to reduce nonspecific binding in protein-based systems, and for superior handling without the use of surfactant.



BioMag[®]

BioMag[®] and BioMag[®]Plus are ~1.5 μ m high-performance superparamagnetic microparticles widely used for the efficient separation of cells and purification of biomolecules. The irregular morphology of these silanized iron oxide clusters provides a much greater surface area than similarly-sized spherical particles, resulting in high binding capacities and efficient capture of target with conservative use of particles. The high iron oxide content (>90%) allows for rapid and efficient magnetic separations, even from difficult, e.g. highly viscous, samples.

Magnetic Particles cont.

ProMag® HP	
Diameters	3µm
Matrix	Polymer
Versions	COOH, Streptavidin
Density (g/cm ³)	~1.4 (3µm)
Shape	Spherical
ProMag®	
Diameters	1µm and 3µm
Matrix	Polymer
Versions	COOH Streptavidin Protein G (3µm)
Density (g/cm ³)	~1.8 (1µm); ~1.6 (3µm)
Shape	Spherical
BioMag®	
Diameters	~1.5µm
Matrix	Silanized iron oxide
Versions	COOH NH ₂ Affinity binding proteins Secondary antibodies Anti-CD antibodies Oligo dT
Density (g/cm ³)	~2.5
Shape	Irregular, cluster

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