AmMag™ MR （for 15mL and 50mL tubes)
Cat. No. L00723

AmMag™ MR-mini （for 2mL tubes)
Cat. No. L00722
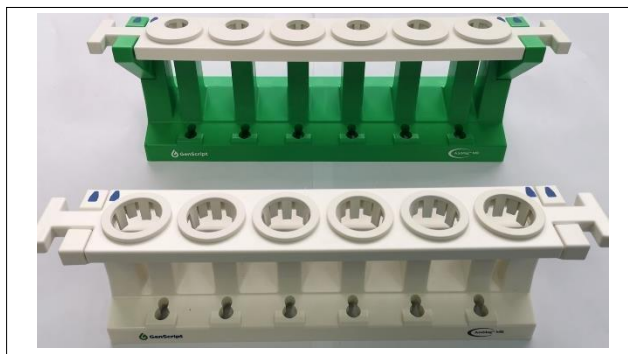
Holds: Six standard 15 mL and 50 mL tubes.

tubes. Working volume: 5mL-50mL

Holds: Eight standard 1.5- 2 mL micro-centrifuge

Working volume : <2mL

Description:

Magnetic beads can expedite protein purification by purifying multiple samples simultaneously. GenScript provides magnetic racks that help you purify proteins from small scale (≤ 2 mL), midi-scale (5 – 15 mL) and maxi-scale (15- 50 mL) samples.

Specifications:

1. AmMag™ MR-mini   (for 2mL tubes)   10.0cmx7.0cmx4.5cm
2. AmMag™ MR：
    Magnetic base support   30.5cmx8.5cmx11.4cm
    Non-Magnetic base support   30.5cmx8.5cmx11.4cm
    15ml tubes adapter   35.0cmx5.5cmx1.5cm
    50ml tubes adapter   35.0cmx5.5cmx1.5cm

AmMag™ MR   (for 15mL and 50mL tubes)

Consists of four components:

Magnetic base support;

Non-Magnetic base

support; 15ml tubes

adapter;

50ml tubes adapter.

Directions:

1. Depending on your sample size, prepare a 1.5 mL, 2 mL, 15 mL or 50 mL protease-free tube to perform the binding and washing steps.

2. Resuspension of beads
   i)   Resuspend the magnetic beads in their original container by inverting or vortexing two times for 5 seconds each.
   ii) Once the beads are resuspended, quickly take out the required volume of magnetic beads into a separate previously selected tube (step 1). Mix the beads in the container before pipetting every time in order to ensure the bead homogeneity between aliquots.

3. Using the appropriate magnetic rack, separate the beads and remove the buffer using a pipette (AmMag™ MR- mini), or draining the buffer by inverting the tubes (AmMag™ MR)*. Add equal amount of washing buffer (1X PBS), remove the tubes from the racks and mix by inversion or vortex briefly to wash the beads.

4. Add the sample containing the protein of interest into the tube. Alternatively, you can transfer the beads slurry into the culture flask.
Note: For bacterial lysates, no centrifugation or filtration is necessary. Proceed directly with step 5.

5. Incubate the tube or flask for 1 hour with constant mixing by inversion or shaking at 100 rpm at room temperature. The incubation time may be increased depending on the protein content in the sample. After the incubation, transfer the sample from the flask to an appropriate tube.

6. Place the tubes on the appropriate magnetic rack to separate the beads. Remove the supernatant. Take the tubes off the magnetic rack and wash the beads with washing buffer (0.75 x mL tube capacity, for example 1.5 mL washing buffer for a 2 mL tube). Place the tubes back on the magnetic rack and decant the buffer. Repeat the wash step 3 times.

7. Perform a 4-th wash step using 10 volumes (to the volume of beads added) of ddH$_2$O. Remove the ddH$_2$O and add the desired volume of elution buffer (based on the type of magnetic beads used – see the magnetic beads manual for directions). Mix the beads in the elution buffer by inversion for 5 minutes. Place the tubes back on the magnetic rack. Pipette out the eluate with the protein of interest.

Troubleshooting

To prevent the tubes lifting while closing the tube lids, press the front of the tubes towards the rack.

Caution

The AmMag™ MR is equipped with magnetic elements. The magnetic elements are located with warning labels of strong magnetic fields.

People who might be sensitive to strong magnetic waves, including but not limited to people with pacemakers, neurostimulators , insulin pumps or similar devices, or with ferromagnetic implants (e.g., surgical stents, artificial heart valves, prosthetics or metal fragments), should keep distance from the AmMag™ MR device and should consult with medical professional.

Work area shall be clean before AmMag™ MR using to avoid iron scraps or small iron blocks being adsorbed by magnetic components which may cause personal injury or equipment failure.

Strong magnetic field warning labels is shown below:

WARNING
strong magnetic field

For research and manufacturing use. Direct human use, including taking orally and injection are forbidden.