

A Geno Technology, Inc. (USA) brand name

SpinOUT™ G-Acryl Spin Plates

96-Well Plates with Polyacrylamide Resin for Desalting & Buffer Exchange from Peptide & Protein Solutions

(Cat. # 786-1626, 786-1627, 786-1635, 786-1636)



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INTRODUCTION

The SpinOUT[™] spin plates are versatile, spin-format, 96-well filter plates for the desalting and buffer exchange of protein and other macromolecule solutions ranging from 20µl through to 130µl sample volumes. The SpinOUT[™] spin plates are available in two MWCO sizes for >6,000 or >20,000 Dalton peptides or proteins and are suitable for samples containing as little as 20µg peptide or protein/ml.

The SpinOUT[™] G-Acryl columns consist of porous polyacrylamide beads that are extremely hydrophilic and essentially free of charge. The resin is compatible with the following reagents:

- Dilute Organic Acids
- Urea [8M]
- Guanidine-HCl [6M]
- Chaotropic Agents
- Reducing Agents (DTT, 2-mercaptoethanol)
- Detergents (SDS, CHAPS, Triton® X-100, etc)
- Alcohols (<20%)
- Formamide

The SpinOUT[™] G-Acryl columns are simply to use as the peptide or protein solution is applied and then centrifuged to recover protein with the column retaining >95% of the salts and small molecules (<100Da for SpinOUT[™] G-Acryl 100, <1,000Da for SpinOUT[™] G-Acryl 600 and <1,500 for SpinOUT[™] G-Acryl 1200).

ITEMS SUPPLIED

Cat. #	Description	Size	Wash/Collection Plates	Resin Bed Volume/well (µl)
786-1626	SpinOUT™ G-Acryl 600 Spin Plate	2 plates	4 plates	- 500
786-1627	SpinOUT™ G-Acryl 600 Spin Plate	4 plates	6 plates	
786-1635	SpinOUT™ G-Acryl 1200 Spin Plate	2 plates	4 plates	
786-1636	SpinOUT™ G-Acryl 1200 Spin Plate	4plates	6 plates	

STORAGE CONDITIONS

The plates are shipped at ambient temperature. Upon arrival, store at 4°C. If stored and handled correctly the plates have a shelf-life of 1 year.

SPECIFICATIONS

SpinOUT™ G-Acryl 600

Particle size: 90-1800µm
Flow Rate: 15-20cm/hr
Exclusion limit (M_r): 6,000

SpinOUT™ G-Acryl 1200

Particle size: 90-180µm
Flow Rate: 15-20cm/hr
Exclusion limit (M_r): 20,000

IMPORTANT INFORMATION

- Plates are compatible with variable speed centrifuges with rotors and carriers capable of handling stacked plates. Use speed of 500-1,000xg with a maximum of 1,000xg.
- Ensure the spin plates are balanced throughout all centrifugations with a duplicate plate filled with an appropriate volume of water.

Sample Load Volume

The recommended load volumes ($20-130\mu$ l) are a guideline. The actual volumes used will be dependent on your sample, the concentration of salrs and contaminants to be removed and the recovered purity desired. For optimal removal of contaminants, we recommend using a sample volume of <20% of the resin bed volume.

NOTE: Loading more than the recommended load volume will result in a higher level of contaminating salts and other molecules.

NOTE: To process >96 samples, evenly divide samples between 2 plates.

ADDITIONAL ITEMS NEEDED

- Variable speed centrifuge with rotor and carriers capable of handling stacked plates
 (4.5cm height) at 500xg or a vacuum manifold.
- Multi-channel pipettor and tips
- Buffer for buffer-exchange
- Equilibration Buffer: Any aqueous buffer, pH6.5-8.

PROTOCOL: PROTEIN DESALTING

- 1. Equilibrate the SpinOUT[™] Spin Plate to room temperature.
- 2. Remove the seal from the bottom of the plate and place on top of a wash/collection plate.
- 3. Remove the seal from the top of the plate.
- 4. Place the plate assembly in a centrifuge with a 96-well plate carrier and centrifuge at 1,000xg for 1 minute to remove the storage buffer. Discard the storage buffer.
- 5. Rinse the wash plate with deionized water, dry and save for future use.
- Place the desalting plate on a new wash/collection plate and apply 20-130μl sample to the center of the resin.

NOTE: Touch the tip to the resin to expel all the sample. For 20μ l protein samples (>300 μ g/ml), apply a 20 μ l stacker of water or buffer on top of the resin bed after the sample has fully absorbed to ensure maximal protein recovery.

7. Place the plate assembly in a centrifuge with a 96-well plate carrier and centrifuge at 1,000xg for 2 minutes to collect the desalted sample.

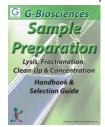
NOTE: Discard the SpinOUT[™] plate or save for future use as a balance blank.

PROTOCOL: PROTEIN DESALTING

- 1. Equilibrate the SpinOUT[™] Spin Plate to room temperature.
- 2. Remove the seal from the bottom of the plate and place on top of a wash/collection plate.
- 3. Remove the seal from the top of the plate.
- 4. Place the plate assembly in a centrifuge with a 96-well plate carrier and centrifuge at 1,000xg for 1 minute to remove the storage buffer. Discard the storage buffer.
- 5. Add $250\mu l$ of buffer to the resin bed. Centrifuge at 1,000xg for 2 minutes and discard the flow-through. Repeat this step three more times.
- 6. Rinse the wash plate with deionized water, dry and save for future use.
- 7. Place the desalting plate on a new wash/collection plate and apply $20-130\mu l$ sample to the center of the resin.
 - **NOTE**: Touch the tip to the resin to expel all the sample. For 20μ l protein samples (>300 μ g/ml), apply a 20 μ l stacker of water or buffer on top of the resin bed after the sample has fully absorbed to ensure maximal protein recovery.
- 8. Place the plate assembly in a centrifuge with a 96-well plate carrier and centrifuge at 1,000xg for 2 minutes to collect the desalted sample.
 - **NOTE:** Discard the SpinOUT[™] plate or save for future use as a balance blank.

RELATED PRODUCTS

Download our Sample Preparation Handbook



http://info.gbiosciences.com/complete-protein-sample-preparation-handbook/
For other related products, visit our website at www.GBiosciences.com or contact us.

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