

Before you start

- 1. Measure the required amount of suction-dried resin.
- 2. Wash the resin in a Buchner funnel or empty column with 5 bed volumes of DI water.
- 3. Remove the excess water by gentle suction and transfer the resin into a beaker or flask.

Charging NTA Chelating Superflow 4 with Divalent (M²⁺) metal ions

- Prepare a 75mg/mL solution of the desired Divalent metal ion (M²⁺, M = Zn, Ni, Co, Cu, etc) in DI water.
- 2. Mix until all the metal ion solution is dissolved (~5 to 10 minutes).
- 3. Pour solution into vessel containing NTA Chelating Superflow 4 resin.
- 4. Allow mixture to shake/rock for 1 hour at room temperature.
- 5. After 1 hour, the coordination of the metal ion to the NTA Chelating Superflow 4 resin is complete. Proceed to pour the charged resin into a Buchner funnel and suction dry.
- 6. Wash resin with 10-20 bed volumes of DI water to remove addition/unchelated metal ions.
- 7. Suction dry resin to remove residual water.
- 8. Place metal coordinated NTA Chelating Superflow 4 in 0.5 bed volume of 20% ethanol.
- 9. Store in 2-8°C.

NOTE: Although the use of sulfate counter ions (SO_4^{2-}) is the most used form, other counter ions such as: CI^- and NO_3^- are also acceptable.

Storage

Uncoordinated NTA Chelating Superflow 4 (cat#37410) is supplied in 20% ethanol. Store at 2-8°C. Do not freeze. Do not expose the resin to acidic or basic conditions (unless it is prescribed in the instructions).