

## CITY OF MISSION

### SPECIFICATIONS

#### Liquid Ammonium Sulfate for the Water Treatment Plants

- I. Scope of Work: The City of Mission is accepting bids for Liquid Ammonium Sulfate for the North and South Water Treatment Plants.
- II. General Information: The maximum plant flow at the North Water Plant is 17.5 mgd and the minimum plant flow is 7.0 mgd. The average plant flow is 10.5 mgd. The maximum plant flow at the South Water Plant is 8.0 mgd and the minimum plant flow is 6.0 mgd. The average plant flow is 7.0 mgd.
- III. Specifications: Please read your specifications thoroughly and be sure that the Chemicals for Water Treatment Plants offered complies with all requirements. Variations from the specifications will not be allowed. The City requires for a product bulletin and material safety data sheets to be included with bid.

1. The bidder's **Liquid Ammonium Sulfate** must be approved and registered as an **NSF Standard 60 product** for use in potable water systems.

The solution shall conform to the following:

- i. pH: 2.0 – 5.0
- ii. Solubility in water: complete
- iii. Specific gravity (water=1): 1.21 – 1.22
- iv. Appearance: clear, pale yellow liquid – no odor
- v. Shelf Life: One (1) year, minimum
- vi. Boiling point: 214° F
- vii. Freezing point: < 4° F
- viii. Viscosity: 2.07 centipose(cp)

Storage tank capacity: 10,000 gallons at North Water Plant and 5,000 gallons at South Water Plant, distance from truck unloading spot is within reasonable distance.

Order of 48,000 lbs. or truckload will be placed every three (3) months, and may be ordered more frequently during the summer months. Split loads between Treatment Plants are occasionally ordered as needed.

Pump and hoses used to unload chemical shall comply with Federal and State regulations

- IV. Delivery: Deliveries of Liquid Ammonium Sulfate for the Water Treatment Plants shall be by drivers thoroughly trained and familiar with the related hazards, safety measures, and spill clean-up procedures. **ALL SPILLS AND LEAKAGE, REGARDLESS OF SIZE, SHALL BE PROPERLY AND IMMEDIATELY CLEANED UP BY THE BIDDER'S PERSONNEL.** Proper labeling, including hazard warnings, will be required on all delivery trucks.