



M² Polymer Technologies, Inc.

P.O. Box 365

West Dundee, IL 60118 USA

Phone: 847-836-1393 Fax: 847-836-6483

PRODUCTION of WASTE LOCK® 770 Superabsorbent Polymer

Waste Lock® 770 (CAS # 09003-04-7) is a water-swellable super absorbent polymer chemically classified as "Sodium Polyacrylate, Cross-Linked". It is a petrochemical that is produced from feedstocks that are derived from natural gas or crude oil.

Natural Gas --> Propylene --> Glacial Acrylic Acid (GAA) monomer -->

GAA +
Water +
Cross-Linker (¼ – ½%)



--> Polymerization under UV Lights -->

Polyacrylic Acid, Cross-linked + NaOH --> Sodium Polyacrylate, Cross-linked + Water -->

Drying (to lower water to <5%), grinding and sizing of particles --> WASTE LOCK® 770