Producing MAP and DAP Ammonia Based Fertilisers (Phosphate Hill Process)

**PHOSPHATE HILL SITE**

- Natural Gas + Nitrogen = Ammonia
- Mon-Ammonium Phosphate
- Di-Ammonium Phosphate

**DISTRIBUTION**

- Primary Distribution Centres
  - Additives (minerals)
  - LCA (complete)
- 3rd Party Distributors
  - Electricity
  - Blending with other fertilisers
- Crop (Increased yield reduces land clearing)

**USE AT FARM**

- Soil erosion
- Phosphorus to waterways
- Soil and carbon
- Land use clearing

**Energy use and emissions**

- Very high
- Medium
- Low

**MT ISA SITE**

- Waste Sulphur (copper smelter)
- Sulphur + Water = Sulphuric Acid
- Phosphate Rock + Sulphuric Acid = Phosphoric Acid

**DISTRIBUTION**

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**USE AT FARM**

- Storage in silos
- Application to soils
- 0.4% N de-nitrification
- CO₂ e