



## PROJECT SUMMARY

### Site Investigation and Remediation

Fertiliser Manufacturing Facility, Ireland

#### KEY PROJECT ELEMENTS

- **SITE INVESTIGATION**
- **HYDRO-GEOLOGICAL ASSESSMENT**
- **LANDFILL INVESTIGATION**
- **RISK ASSESSMENT**

CRA was retained to undertake extensive site investigation works at an operating fertiliser manufacturing facility in Ireland.

The investigations included:

- Installation of eighteen groundwater monitoring wells using both down hole hammer and shell and auger techniques;
- Soil sampling using both shell and auger drilling techniques and trial pits;
- PCB sampling from surface soils; and
- Landfill gas monitoring in and around the landfill.

The investigations were undertaken in both the existing process areas and in former/operational landfill areas. The investigation identified groundwater contamination in two separate gravel aquifers from the fertiliser manufacturing process, localised leachate contamination of the groundwater, localised hydrocarbon contamination of shallow soils and the potential for contaminant migration to the adjoining river.

A subsequent risk assessment established source control and natural attenuation measures as appropriate for the long-term remediation at the site.

Additional work carried out at the site has included:

- Long term groundwater monitoring;
- Implementation of source control measures; and
- Design of capping and surface water drainage system for the former landfill areas at the site.