

Borouge Innovation Centre

Client

Abu Dhabi National Oil Company, UAE

Scope of Work

Project management
Concept design
Schematic design
Design development
Detailed design
Tender documents
Tender action

Location

Abu Dhabi, UAE

Types of Activities

Architectural
Civil works
Communications and security systems
Electrical
HVAC
Interior design
Landscape
Mechanical
Structural
Urban planning

A polymer research facility, Borouge Innovation Centre is one of only four similar initiatives developed globally. Other polymer research facilities have been developed in Austria, Sweden, and Finland.

With a total project built-up area amounting to 20,000 m², the contract involves the design development of the Borouge Innovation Centre key elements which comprise a three-floor innovation tower (1,600 m²), two-floor laboratories building (5,500 m²), an application hall

(7,800 m²), a pipe academy building (2,500 m²), ancillary and services buildings (2,600 m²) and an adjacent business and future expansion areas (25,000 m²).

To effectively support the operation of the centre's state-of-the-art manufacturing/ testing production lines, innovative products' research/manufacturing processes, and extensive business development activities. ECG's unique designs embrace leading-edge research facilities; well-planned office space;





contemporary showrooms; exhibition halls; an outdoor demonstration area; general-purpose lecture halls; a fully serviced business centre; advanced testing laboratories, and practical training rooms.

Substantial piping design, unveiling highly advanced instrumentation & control systems, is undertaken in order to accommodate the conveyance of a broad array of variable-purity industrial gases (including cryogenic liquid nitrogen, hydrogen, oxygen, argon, gaseous nitrogen, helium, compressed air, bottled air), industrial and chemical waste, and cooling and demineralized water. Moreover, approximately 8,600 meters of piping adopting various sizes and materials are deployed to reinforce the efficient execution of the development. Constructed over two phases, all buildings are designed to sustain a structural life span of fifty years.