UHDENORA receives first order for new electrolysis technology

24.02.2014 - UHDENORA and BEFAR Group Co. LTD have signed a contract for the construction of an 80,000 mtpy caustic soda plant at Binzhou City, Province of Shandong, P.R. China. The plant will be the world’s first to be based on the NaCl ODC technology owned by UHDENORA. UHDENORA is a joint venture between ThyssenKrupp Electrolysis GmbH, a 100% subsidiary of plant engineering and construction specialist ThyssenKrupp Industrial Solutions, and Industrie De Nora, an electrochemical technologies supplier based in Milan. This new, highly energy-efficient technology reduces energy consumption by up to 30% compared to the conventional membrane cell process. For the planned plant, this corresponds to an indirect reduction of annual CO2 emissions by up to 35,000 metric tons.

The project will be implemented in two phases. In the first phase, which is due to be commissioned in the second half of 2015, the plant will have a capacity of 40,000 mtpy. The second phase will follow shortly after. UHDENORA’s scope includes the license, engineering and delivery of the ODC electrolyzers as well as other key components.

Chlorine and caustic soda are an essential building block in today’s chemical industry. Electrochemical chlorine/caustic soda production is, however, one of the most energy-intensive processes in the entire sector. Chlorine is used in particular to produce plastics and also to manufacture pharmaceuticals, while caustic soda finds application in the aluminum and mining industries as well as the detergent and pulp & paper industries.