

**REPORT**  
ON  
**INDUSTRIAL VISIT**  
AT



**KRISHAK BHARTI COOPARATIVE LTD.**

**Arranged For**

**B.E-IV (SEM- 8<sup>th</sup>)**

**DEPARTMENT OF CHEMICAL ENGINEERING,  
SARVAJANIK COLLEGE OF ENGINEERING AND  
TECHNOLOGY,**

**Dr. R. K. Desai Marg**

**Athwalines, Surat-395001, Gujarat**

**India**



## **VISIT to KRISHAK BHARTI COOPARATIVE LTD. (KRIBHCO), Hazira**

**Date & Time of Visit:** 19<sup>th</sup> January, 2018 & 8:30 am to 1:30 pm

**Faculty Members:** Prof. Vishad Desai & Prof. Mazhar Multani

**Total Number of Students:** 50 (BE 4<sup>th</sup> YEAR, Chemical Engineering Students)



Ammonia is a gas which is used in manufacturing of urea and complex fertilizers. Ammonia is produced using Natural gas as the main feedstock using steam reforming process. The other inputs required are Steam and Air. The technology for Hazira Complex has been supplied by Kellogg's (now KBR) of USA. Carbon Dioxide is the by-product of ammonia plant which is used for Urea production in Urea plant. Engineers showed us LP (Low pressure), HP (High Pressure), Vacuum section along with the prilling tower which is important process for producing urea. Students also saw tube bundle, tubes and its arrangement in heat exchanger which they are designing as a part of curriculum of Process design equipment – I. Concentrated slurry of urea is sent to the prilling tower. That slurry is filled in to the basket having opening of 2 mm which is rotated at the high speed of 200-240 rpm. As the basket rotates, concentrated slurry falls down in the tower and travels a long distance. Because of this temperature decreases and slurry is converted in to the prills of urea. These prills of urea fall on to the conveyors and sent to the bagging section. Before packing of urea bags, they sprinkle "Neem Solution" on it to avoid black marketing. Reason behind it is any industry cannot use this urea, only farmers can use it. Price of the urea has been decided by the Sahakari mandli. The visit ended with lunch arranged at Canteen by KRIBHCO management for everyone. This was really a kind and appreciable gesture.

### **ACKNOWLEDGEMENT**

We would like to thank Dr. Vaishali Mungarwadi (Principal, SCET) and the management of SCET for permitting us for industrial visit at KRIBHCO, Hazira

We would also like to acknowledge HR, T & P Head & Engineers of KRIBHCO for their valuable inputs to the students and his support throughout the visit.

\*As per company rule photograph was prohibited.