

Tour Report: Visit to Distillery BCM LTD, Balarampur unit, Babhnan

Organized by: Department of Chemistry, Shri Lal Bahadur Shastri Degree College, Gonda
Date: 14 May 2024

Location: Distillery Unit,

Participants: M.Sc. Chemistry Students

Faculty Coordinators: Dr. Manoj Kumar Mishra

1. Introduction

The Department of Chemistry organized an educational tour of the Distillery BCM LTD, Balarampur unit, Babhnan on 14 May 2024 under the supervision of the head of the department Dr. Pushyamitra Mishra. The visit aimed to provide students with practical insights into the distillation process, a significant aspect of industrial chemistry. A total of 32 students from both M.Sc. Previous and M.Sc. Final-year programs participated in this tour.

2. Objective of the Visit

The primary objective of the tour was to bridge the gap between theoretical knowledge and industrial practices. Students were expected to:

- Understand the industrial-scale distillation process.
- Observe the application of chemical principles in real-world scenarios.
- Interact with industry professionals to gain insights into the operational challenges and innovations in the field.

3. Overview of the Distillery Unit

The Distillery BCM LTD is a leading producer of alcohol and spirits in the region. The unit is equipped with state-of-the-art facilities for fermentation, distillation, and packaging. The distillery primarily focuses on the production of ethanol, which is used in various industries, including beverages, pharmaceuticals, and as a biofuel.

4. Tour Details

Upon arrival at the distillery, the general manager, Mr. Manogya Gaur, welcomed the students, who provided a brief overview of the unit's operations. The students were then divided into smaller groups, each accompanied by a guide, to ensure a detailed and interactive tour.

The tour was divided into the following sections:

- **Fermentation Process:** The students were first introduced to the fermentation tanks where the raw materials, primarily molasses, are converted into ethanol by the action of yeast. The guide explained the biochemical processes involved, including the importance of temperature and pH control.
- **Distillation Process:** The next stop was the distillation columns, where the fermented mixture is subjected to fractional distillation to separate ethanol from water and other

impurities. The students observed the multi-stage distillation process and learned about the significance of maintaining purity and efficiency.

- **Quality Control Laboratory:** The students were then taken to the quality control laboratory, where they observed various analytical techniques used to ensure the quality of the final product. Techniques such as gas chromatography and spectrophotometry were demonstrated.
- **Packaging and Storage:** Finally, the tour concluded with a visit to the packaging and storage facility. The students observed the automated bottling process and learned about the storage conditions required to maintain the quality of the distilled products.

5. Interaction with Industry Professionals

Following the tour, the students had an interactive session with the industry professionals. They discussed various topics, including career opportunities in the chemical industry, challenges faced in large-scale production, and the future of biofuels. The session was highly informative and provided valuable career guidance to the students.

6. Conclusion

The visit to the Distillery BCM LTD was a resounding success, providing students with a comprehensive understanding of the industrial distillation process. It allowed them to see the practical application of their academic knowledge and inspired many to consider careers in the chemical and allied industries.

The Department of Chemistry extends its gratitude to the management and staff of the Distillery Unit for their hospitality and for providing such a valuable learning experience. The students returned with a deeper appreciation for the complexities of industrial chemistry and a renewed enthusiasm for their studies.

Submitted by:



Dr. Manoj Kumar Mishra
Assistant Professor
Department of Chemistry
SLBS Degree College, Gonda



Dr. Pushyamitra Mishra
Head
Department of Chemistry
SLBS Degree College, Gonda





SHRI LAL BAHADUR SHASTRI DEGREE COLLEGE

DEPARTMENT OF CHEMISTRY

DISTILLERY INDUSTRY-PRODUCTION OF ETHANOL

गोण्डा EDUCATIONAL TOUR

SESSION 2023-2024



S.NO	NAME	NAME	NAME	NAME
1	AKEESH KUMAR SONKAR	PRASHANT SINGH	ASTHA SINGH	PALAK SRIVASTAVA
2	AYUSHI SINGH	ASHUTOSH TIWARI	VIBHA TIWARI	CHANCHAL
3	SAUMYA SINGH	VAIBHAV SONI	BHAVANA SHUKLA	KHUSHBOO KASAUNDHAN
4	NIDHI SHUKLA	VIKASH KUMAR MISHRA	SHIVNATH	
5	MAMTA TIWARI	SAKSHAM MISHRA	MOHIT KUMAR TIWARI	
6	GIRJA SHANKAR TIWARI	ALOK SHUKLA	MONU VERMA	
7	ASHUTOSH MISHRA	SAMAR FATIMA	SATYA PRAKASH	
8	RAJESH VISHWAKARMA	ASHRAM MERAJ	SATYA OM	
9	ANAM SIDDIQUI	RAJEEV KUMAR PANDEY	ROLI TIWARI	
10		NANBABU MISHRA	NEHA PANDEY	



SHRI LAL BAHADUR SHASTRI DEGREE COLLEGE

DEPARTMENT OF CHEMISTRY

DISTILLERY INDUSTRY-PRODUCTION OF ETHANOL

EDUCATIONAL TOUR

SESSION 2023-2024



S.NO	NAME	NAME	NAME	NAME
1	AKEESH KUMAR SONKAR	PRASHANT SINGH	ASTHA SINGH	PALAK SRIVASTAVA
2	AYUSHI SINGH	ASHUTOSH TIWARI	VIBHA TIWARI	CHANCHAL
3	SAUMYA SINGH	VAIBHAV SONI	BHAVANA SHUKLA	KHUSHBOO KASAUNDHAN
4	NIDHI SHUKLA	VIKASH KUMAR MISHRA	SHIVNATH	
5	MAMTA TIWARI	SAKSHAM MISHRA	MOHIT KUMAR TIWARI	
6	GIRJA SHANKAR TIWARI	ALOK SHUKLA	MONU VERMA	
7	ASHUTOSH MISHRA	SAMAR FATIMA	SATYA PRAKASH	
8	RAJESH VISHWAKARMA	ASHRAM MERAJ	SATYA OM	
9	ANAM SIDDIQUI	RAJEEV KUMAR PANDEY	ROLI TIWARI	
10		NANBABU MISHRA	NEHA PANDEY	