



REPORT ON KALAM'S AEROSPACE CONVENTION



The Aerospace Engineering Expo was an enriching and enlightening experience for the NSS volunteers from JBIET.

Event Title: Aerospace Engineering Expo

Organized By: KIYE Foundation

Date of Event: 15/10/2024

Venue: Shilpakala Vedika

Attended By: NSS JBIET Members

Participated: 50 Members

Introduction

On 15/10/2024, a group of NSS (National Service Scheme) volunteers from J.B Institute of Engineering and Technology JBIET attended the "Aerospace Engineering Expo" held at Shilpakala Vedika, Shiplaramam. The event, which aimed to showcase the latest advancements in aerospace technologies, provided a platform for students and professionals in the field of aerospace engineering to interact, learn, and gain valuable insights into the growing aerospace industry. The event featured presentations, exhibitions, workshops, and networking opportunities with key players in the aerospace sector.

This report highlights the key activities, exhibits, and experiences that were part of the event, along with the learnings and takeaways for the NSS volunteers who participated.

Objectives of the Visit:

The primary objectives of attending the Aerospace Engineering Expo were:

- To enhance knowledge about current trends and innovations in the aerospace industry.
- To provide NSS volunteers with exposure to cutting-edge technologies and future career opportunities in the aerospace field.
- To foster interest in STEM (Science, Technology, Engineering, and Mathematics) disciplines, particularly aerospace engineering.
- To promote networking between students and professionals from the aerospace sector.
- To encourage NSS volunteers to apply their skills in service to the nation, especially in technology-driven sectors like aerospace.

Key Highlights of the Event

The event featured several interactive exhibitions from prominent aerospace companies, research institutions, and universities. Some of the notable exhibits included:

- Next-Generation Aircraft Designs: A display of concept models and prototypes for the next generation of commercial and military aircraft, including electric propulsion systems and hybrid technologies aimed at reducing carbon emissions.
- Space Exploration Technologies: Exhibits on satellite technology, Mars exploration missions, and private sector developments in space tourism and travel.
- Drones and UAVs: The latest advancements in drone technology for military, surveillance, and commercial applications, as well as new developments in autonomous flight systems.
- Flight Simulators: Visitors had the chance to try flight simulators that mimicked real-world flying experiences, offering insights into pilot training and aviation procedures.



Guest Speakers and Panel Discussions

The event featured a series of guest speakers from renowned aerospace companies, including:

Dr. G. Satheesh Reddy Garu, Senior Scientist at DRDO, spoke about the future of space exploration and the challenges faced by engineers in building sustainable habitats on other planets.

Dr. Prakash Chauhan, Director of Research at NRSC, discussed innovations in aerospace materials and their potential to revolutionize aircraft performance and safety.

Panel discussions provided attendees with insights into career opportunities in aerospace engineering, the impact of aerospace technologies on everyday life, and the future of commercial space travel.



Increased Awareness and Inspiration

The event significantly raised the level of awareness among NSS JBIET volunteers about the aerospace sector. It inspired many of the attendees to explore careers in aerospace engineering and related fields. The diverse range of exhibits, workshops, and demonstrations allowed them to understand the practical applications of aerospace technologies and their societal impact.

Understanding the Importance of Technology in National Development

The NSS volunteers recognized the critical role that the aerospace industry plays in a nation's security, technological advancement, and economic growth. Several sessions focused on India's space missions, including ISRO's contributions to satellite technology and space exploration, underscoring the importance of such technologies for national progress.

Networking with Industry Experts

The event provided an invaluable opportunity for NSS volunteers to network with industry professionals, academic experts, and students from other universities. This interaction opened up avenues for potential collaborations, internships, and learning experiences that will be beneficial in their academic and professional journeys.

Hands-on Learning and Engagement

The interactive sessions and hands-on workshops allowed NSS members to engage with practical technologies such as flight simulators and 3D printing. These experiences gave them a tangible understanding of how aerospace technologies are developed and tested, enhancing their appreciation for the engineering challenges faced in the field.



CONCLUSION

The Aerospace Engineering Expo was an enriching and enlightening experience for the NSS volunteers from JBIET. The event provided an excellent opportunity to learn about cuttingedge aerospace technologies and engage with professionals in the field. The exposure to various aspects of aerospace engineering from sustainable technologies to space exploration has motivated the volunteers to consider careers in stem fields and contributed to their overall personal and professional development. The NSS JBIET team is grateful for the opportunity to attend this prestigious event and looks forward to attending similar events in the future.

B. KISHORE KUMAR

PRINCIPAL

NSS-PO

P.C.KRISHNAMACHARY

NSS JBIET UNIT