भारतीय प्रौद्योगिकी संस्थान दिल्ली
INDIAN INSTITUTE OF TECHNOLOGY DELHI
Department of Materials Science & Engineering
हौज खास, नई दिल्ली—११००१६,भारत
Hauz Khas, New Delhi—110016, India
दूरभाष/Tel: +91-9573365386
ईमेल/E-mail: ksnvikrant@mse.iitd.ac.in ; k.s.n.vikrant@gmail.com

प्रो. सूर्यनारायण विक्रांत कर्रा
सहेयक प्रोफेसर
Prof. Suryanarayana Vikrant Karra
Assistant Professor

To Whom It May Concern,

It is my pleasure to recommend Mr. Daksh Pruthi, an exceptionally driven and intellectually gifted student from Modern School, Vasant Vihar. Daksh completed a three-month research internship under my supervision in the Department of Materials Science and Engineering, Indian Institute of Technology Delhi, during the summer of 2024.

I first met Daksh at my workshop on Materials Engineering Perspectives on Electrochemical Energy Storage Systems at IIT Delhi in April 2024. His curiosity stood out immediately-after the session ended, he remained for an extended discussion on electrochemistry and sustainable battery materials. Few school students engage at such technical depth. Following several thoughtful exchanges, Daksh joined my Battery Materials Characterization and Testing Laboratory for a summer research project.

During his internship, Daksh led a team investigating aluminum alloys for Al–Air battery applications, focusing on their composition, microstructure, and electrochemical behavior. He gained hands-on proficiency in X-ray fluorescence (XRF), optical microscopy (polishing and etching), immersion corrosion testing, and potentiodynamic polarization in alkaline electrolytes. His final report was outstanding-analytically rigorous, clearly written, and conceptually mature. It reflected his deep understanding of electrochemical aspects of aluminum alloys in KOH. Beyond technical ability, Daksh displayed remarkable initiative and leadership, guiding his team with precision and maintaining disciplined documentation throughout the project.

Even after the internship, Daksh continued collaborating with my research group on a paper exploring recycled plastics for sustainable energy applications, an idea he originally conceived while developing his sanitation innovation, ByeByeLota, which employs recyclable materials to promote hygiene in rural communities. This work, currently under review, showcases his rare ability to connect engineering design, sustainability, and materials research in a coherent and impactful manner. Daksh also initiated an academic partnership between Modern School and IIT Delhi, enabling his peers to gain similar research exposure-evidence of his collaborative and visionary approach to science education.

In my experience mentoring undergraduate and graduate researchers at IIT Delhi, Daksh ranks among the most promising young minds I have encountered. He combines scientific curiosity, analytical depth, and leadership with the maturity of a true researcher. I recommend him without reservation for admission to your undergraduate program and am confident that he will make outstanding contributions to the field of energy materials and sustainable technologies.

Sincerely,

Suryanarayana Vikrant Karra