## भारतीय प्रौद्योगिकी संस्थान मुंबई

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Aug 25th 2024, Hyderabad.

## Sun Pharma Science Foundation Research Fellowship 2024 (Dr. Aravind Kumar Rengan, IITH)

Citation (Summary):

Dr. Aravind Kumar Rengan is a physician scientist working as an associate professor in the Dept of Biomedical Engineering at IIT Hyderabad. He has more than 10 years of experience in the field of nanotechnology and biomaterials and have made contribution in the area of cancer/anti-microbial nanotheranostics. His current research has the potential to create a significant impact in the development of next-generation, translational theranostic technologies. His lab has developed a nano -transformable hydrogel that is capable of treating advanced stage cancers. This hydrogel, when injected subcutaneously transforms into nanoparticles during degradation and serves as a platform technology for delivering drugs effectively to both primary as well as (distal) secondary tumor sites. Dr. Rengan's group have been granted a US patent for this technology (March 2024). The work was published in a prestigious journal, ACS Applied Materials and Interfaces. Several nanoformulations have been developed in his lab, tested for its efficacy and the results have been reported in various peer-reviewed journals such as Materials Today -NANO, Nanoscale, Biomaterial Sciences, Langmuir, ACS Nano letters, ACS Macroletters, etc. Several patents have been filed on the technologies developed in his lab including 2 US patents. (7 patents have been granted so far, including 1 US patent)

Nominator:

प्रा. रोहित श्रीवास्त **Prof. Rohit Srivastava** 

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