IIT Delhi

Press Release

09-05-2020

IIT Delhi, PNBHFL sign MoU to develop personal protective equipment (PPE) for healthcare workers

New Delhi: Indian Institute of Technology Delhi (IIT Delhi) is being funded by PNB Housing Finance Limited (PNBHFL) towards its fight against COVID-19 by developing personal protective equipment (PPE) for healthcare workers.

IIT Delhi and PNBHFL have signed a memorandum of understanding under which, IIT Delhi start-up ETEX (https://www.etex.in/) incubated at IITD, will be working to develop and deliver smart textile solutions for Healthcare. The team has a strong expertise in textile engineering, and has technical support from researchers and professionals from interdisciplinary backgrounds including electronics, medical, material and design. The team is committed to innovate advanced technologies related to protection (against pollution and COVID 19), pain, health monitoring and posture. PNBHFL, a leader in the construction finance, will be contributing corporate social responsibility (CSR) funds towards this project.

"We are happy to associate with PNBHFL," says Prof. V. Ramgopal Rao, Director IIT Delhi. He further added that KAWACH, a product of IIT Delhi start-up, has already been launched to provide effective and cost effective mask. In its endeavour to reach out to masses and support a social cause, ETEX has partnered with ECOTATV, a social enterprise by a group of differently-abled people, in manufacturing of KAWACH, assuring their jobs and active participation in the battle against COVID 19.

"The COVID-19 pandemic has triggered an unprecedented lockdown in many geographies globally. We believe all public and private stakeholders must contribute their mite in stopping its spread. As part of our societal responsibilities, PNBHFL has joined hands with IIT Delhi in ensuring we contribute to the nation's effort in flattening the COVID-19 curve. Through this partnership, we can play a small yet meaningful role in safeguarding the well-being of our frontline warriors, who are risking their lives by putting service before self, day after day," said Mr Neeraj Vyas, Managing Director and CEO of PNB Housing Finance, Elaborating on the initiative.

"Partnership is best initiative towards the PM's vision – Make in India – strengthening environment for investment, employment and smart infrastructure" said Prof. Anurag S. Rathore, Dean, Corporate Relations, IIT Delhi. Further he added, "IT Delhi has made a concerted effort to help the country via aggressively pursuing a multitude of Covid 19 related projects – from testing to therapeutics to support equipment. This partnership between IIT Delhi and PNBHFL will help us in taking these projects forward."

"Mask - Engineered Multilayer Textile Solution against COVID 19 and pollution & Gown - Laminated Knitted textile with enhanced barrier properties," said Prof. Bipin Kumar, Department of Textile and Fiber Engineering, IIT Delhi. "Along with the challenge of meeting PPE demands in the country due to the COVID-19 crisis,

another threat looms ahead- the disposal of PPEs (including mask and coveralls) after one-time use. Though a non- woven layer is must for ensuring desired filtration level the loose fibrous structure in locally available PPE makes the product disposable after one-time use. Disposing of synthetic polypropylene non-woven PPE can result in serious environmental consequences. Finding other textile solutions that offer reusability, biodegradability, affordability and scalability for PPEs is truly the need of the hour as it serves the dual purpose of supporting healthcare workers and protecting our environment."
