

4th October 2021

NIIST team looking to develop 'vegan leather'

Eco-friendly alternative from agro-wastes

TIKI RAJWI
THIRUVANANTHAPURAM

After showing that agro-residues can be used to make chic tableware, the Council of Scientific and Industrial Research (CSIR) - National Institute for Interdisciplinary Science and Technology (NIIST) here is looking to develop 'vegan leather' from agro-wastes such as mango peels and pineapple leaves.

The research on 'vegan leather' and food packaging material from farm waste is the next step in a research programme which used rice husk, sugarcane bagasse, fruit peel and wheat bran for making durable plates and cups, a success story which won the NIIST accolades at the national level in September.

'Vegan leather' is considered an eco-friendly and ethical substitute to leather from animal skin. The NIIST is working on technologies for its cost-effective development for use in consumer goods such as bags, foot-

 **NIIST is working on technologies for cost-effective development of 'vegan leather' for use in various consumer goods.**

wear, wallets and belts, according to Anjineyulu Kothakota, NIIST scientist leading the project.

It is not just mango peel and pineapple leaves that are going into the making of vegan leather. For raw material, the researchers are also working with banana stems and mushrooms, but the technique is basically similar.

Vegan leather was durable and soft apart from being eco-friendly and cost-effective, Dr. Kothakota added.

The NIIST had kicked off the work on the technology earlier this year following requests from various quarters for a cost-effective alternative to animal leather. NIIST researchers are keeping the

exact process under wraps for the moment as their work is still in progress. However, they explained that only natural materials were used in the process.

Another area they are looking into is production of food packaging material and take-away containers manufactured from post-harvest residues as a viable alternative to plastic packs that are now widely used.

CSIR award

In September, NIIST scientists won the prestigious CSIR Award for Science and Technology Innovations for Rural Development (CAIRD) for developing technologies for making plates, cups and cutlery from agro-residues as an alternative to single-use plastics.

The award-winning team led by Dr. Kothakota, included Saju Pillai, M. Brahmakumar, Sushanth Kumar Sahoo, Partha Kundu, R.S. Praveen Raj and Venkatesh T.