## UMS undergraduates introduce beach cleaning machine

KOTA KINABALU: A group of final year civil engineering undergraduates from Universiti Malaysia Sabah (UMS) have found a more innovative and environmental-friendly method of beach cleaning.

In a project dubbed as the Environmental Engineering Sustainability Project 2019, held at UMS' Outdoor Development Centre (ODEC) recently, the students had introduced a new beach cleaning machine prototype, sponsored by the Innovation Scheme Grant of UMS.

A multi-disciplinary team of lecturers from Faculty of Engineering, comprising Assoc Prof Dr Nurmin Bolong, Assoc Prof Dr Ismail Saad and beaMohd Amran Madlan supervised the project.

Nurmin said the beach-cleaning machine is nothing new.

She said that the actual aim of the project is to create an innovative and environmental-friendly machine that could be turned into practical reality.



UMS students and lecturers with the beach cleaning machine prototype.

"The eco-beach cleaner was launched during the event and it was tested on field at UMS' ODEC – with the aim of gaining feedback from the participants and users.

"The new eco-beach cleaning machine is designed and locally manufactured by the UMS's faculty of engineering students'

team in collaboration with ES Jesselton Engineering Sdn Bhd," she said.

Nurmin said that the project also aimed to explore the possibility of making beach cleaning effortless.

"It is engineered to collect garbage/rubbish on the beach surface with simple mechanical work (chain and sprocket) using minimum electrical power and low noise impact.

"It is easy to operate and maneuverable; perfect for oneman operation in small beach with collecting containers of 20 liter capacity and can be emptied easily." she added.