UMP INVENTS FRACTURED BONE STABILIZER

MAFE helps alleviate patient's discomfort by allowing the movement of joints near the affected area and prevents deformation of the fractured bone.

A big number of the cases of fractured bones, to date, is treated using cement cast and steel implant at the affected area.

These forms of treatments not only limit a patient's movement, but also may cause permanent disability due to bacterial infection and muscle contraction, as a result of poor coordination of soft tissues redevelopment.

Research by lecturers from University Malaysia Pahang's (UMP) Faculty of Manufacturing Engineering – Zamzuri Hemedon, Badrul Akmal Hisham Md Yusoff and Khairul Azha Abd Jalal – has resulted in the development of an equipment called Multi-Axial Fixing Elements (MAFE), which helps stabilize fractured bones during recovery, through proper bridging of steel and aluminium.

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Explaining the principle behind the invention, Zamzuri said, a bone injury should not prevent a patient from moving his limb, which would otherwise help smooth blood-flow and redevelopment of soft tissues during recuperation.

The research and development of MAFE – in collaboration with orthopaedic surgeon Dr Badrul Akmal Hisham Md Yusoff from the Allianze College of Medical School, who shared his expertise and knowledge on fractured bones therapy – was in line with the efforts to boost invention of many more bio-medical equipments required by the medical industry.

MAFE has been given its due recognition when it bagged the Silver Award at the International Institutes of Higher Education's Research & Invention Expo 2009 and the Gold Medal at the British Invention Show in Alexandria Palace, London, recently.

It just goes to show that MAFE has been accepted globally and is marketable internationally.

FACILITIES I PROMOTES SOCIAL ACT

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