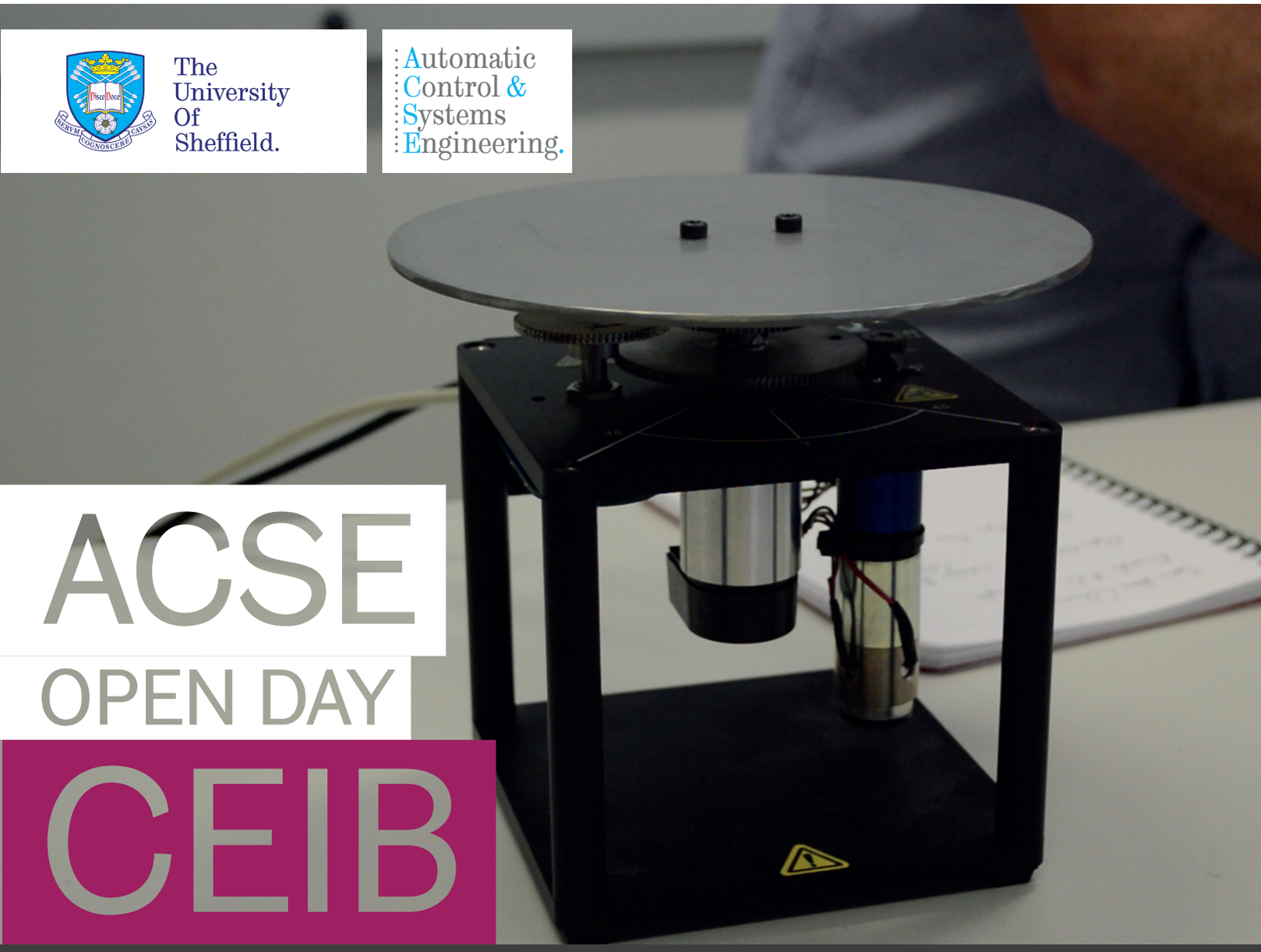
The University Of Sheffield.

Automatic Control & Systems Engineering.



ACSE

OPEN DAY

CEIB

In most robotic and mechatronic systems, control systems are needed. For example, when a car uses cruise control it keeps to a constant speed, regardless of the incline. To do this, the car uses Closed Loop Control which ensures the engine will compensate for the load and the car retains a constant speed. If the car used Open Loop Control, then the car would slow down when it came to any hill.

The **Control Equipment Interface Board (CEIB)** is a first year piece of kit which allows students to learn how to programme machines for Open Loop and Closed Loop Control. This is a fundamental part of the Control and Systems Engineering, and Mechatronics and Robotics courses as it lays the foundations for future work. The CIEB allows students to see the impact of resistance on a controlled system and how this can be compensated for.

Ben Taylor, Technician at the Diamond, said:

"The CEIB is a really important piece of kit for our students to use since it teaches them the building blocks of Open and Closed Loop control which, in turn, feeds into so many of their projects in the future."