

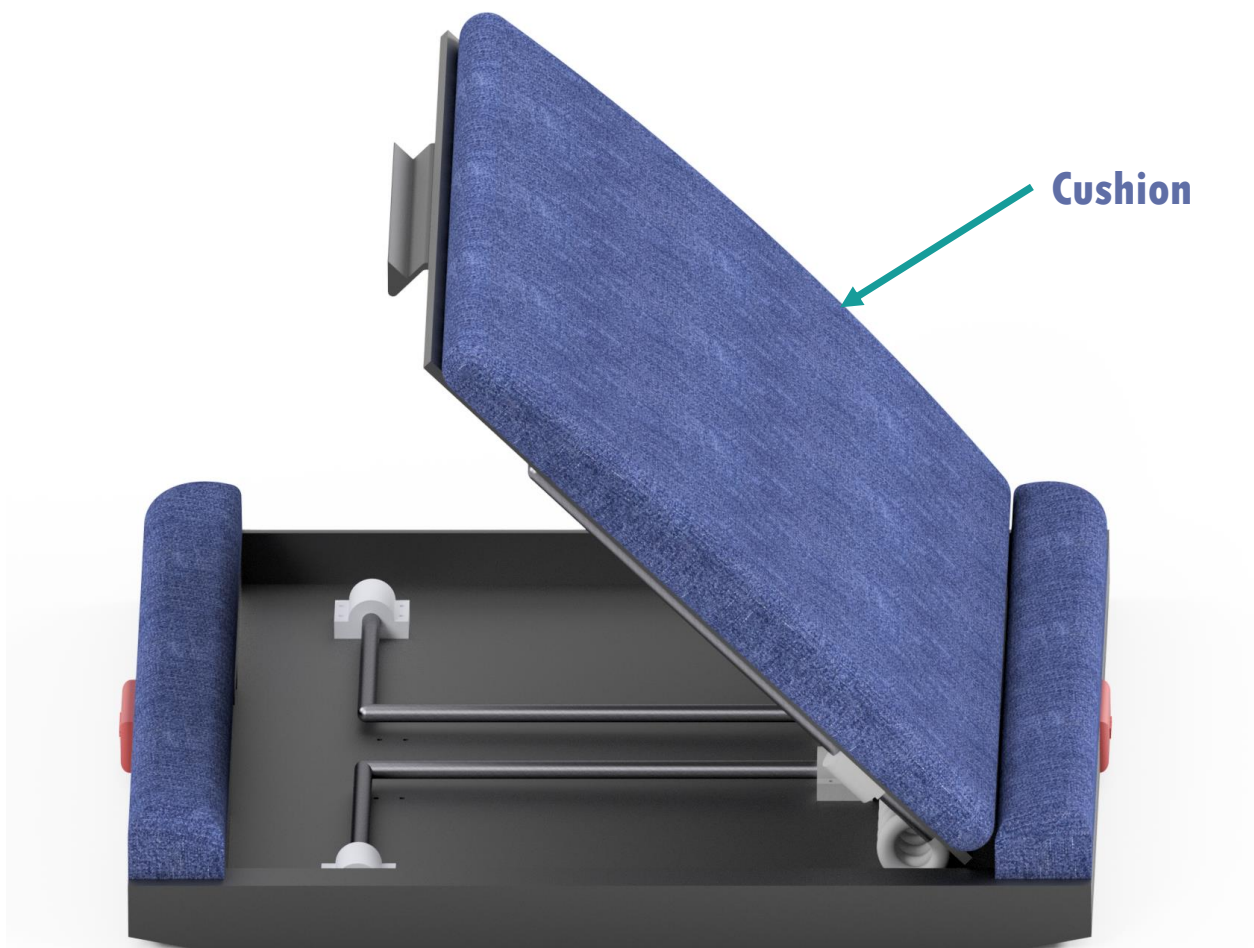
Inside the Design

bd571, jm3381, er909, jd2589

Function

This product is designed to sit atop a car seat with minimal thickness, preventing an unintentional increase in height or interference with the vehicle's existing safety feature. When exiting the car, the user will position themselves facing outwards from the car. Pressing the red button disengages the locking mechanism, allowing the top plate of the device to hinge upwards by means of two torsional springs.

Upon entering the vehicle, the user positions themselves facing outwards from the car's interior, leaning backward onto the tilted plate. The device will assist them down and automatically engage the locking mechanism. The locking mechanism ensures that the device will not impact the user's safety while they are driving.

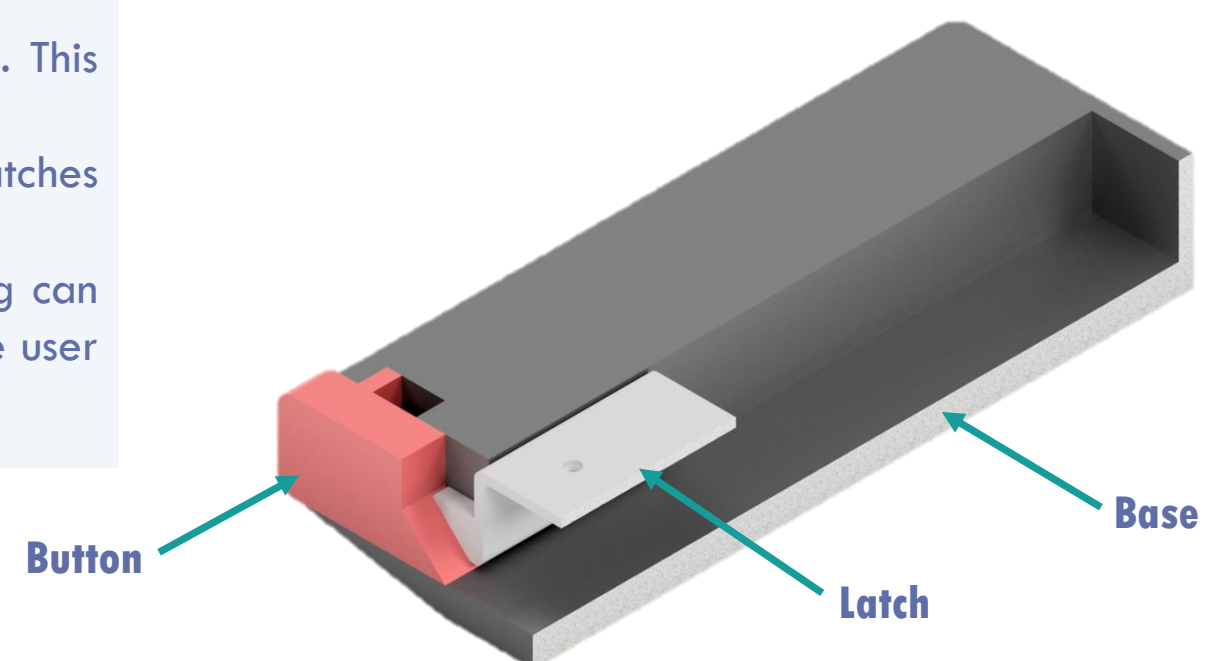


The cushions are designed to be attached by Velcro, allowing for these to be replaced and hence, increasing the product's life cycle. Additionally, the product has been designed symmetrically to function on both the driver and passenger side of the car.

The product is intended for use in small to medium cars with low ground clearance. This ensures that the user is tilted onto their feet and not dropped.

The underside of the product is sloped to fit the shape of the seat and anti-slip patches can be applied to ensure the product is secured.

To compensate for the range of weights of users, a different pre-load on the spring can be applied, meaning the torsion springs provide the correct force to slowly lower the user down and assist in tilting them on their feet.



Locking Mechanism

The latch is mounted onto the top plate. When the user sits on the top plate, the springs compress and the latch locks under the internal recess in the base. When the button is pressed, the latch is disengaged from the lip in the base, releasing the loaded torsional springs.

Tilting Mechanism

