

# Intelligent Battery Swapping System Using IOT

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**Abstract:** Having a sufficient charging infrastructure is crucial to the quick uptake of electric vehicles (EVs). The availability of such infrastructure would eliminate several barriers related to the short range of EVs. An efficient battery swapping station (BSS) is one that strategy of powering EVs while reducing lengthy wait periods at Battery Charging Stations (BCS). In contrast to the BCS, the BSS charges the batteries beforehand and gets them ready for a far faster battery replacement. These charging stations may be able to offer special advantages to the power system since they can act as a middleman between EV owners and the grid. In this paper explores the benefits of developing the BSS from a number of angles. This paper explores the benefits of developing the BSS from a number of angles. In light of this, a model for battery charging scheduling from the viewpoint of the station owner is suggested. To demonstrate how the suggested approach may assist BSS owners in managing their assets by scheduling battery charging time, an example is given.

**Keywords:** Battery Swapping Station (BSS), Battery charging Station (BCS), Electric vehicle (EV)

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