ELECTRIC VEHICLE WIRELESS CHARGING SYSTEM USING BIDIRECTIONAL CONVERTER

A PROJECT REPORT

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BONAFIDE CERTIFICATE

Certified that this project report **"ELECTRIC VEHICLE WIRELESS CHARGING SYSTEM USING BIDIRECTIONAL CONVERTER"** is the bonafide work of the following students.

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ABSTRACT

The transfer of energy from a source to a receiver has traditionally necessitated the use of a physical connection. Indeed, electrical grids and power outlets span nearly the entire globe and deliver power to billions of people worldwide. Recently, there has been much interest into the area of wireless power transfer (WPT), that is, the transmission of power without the need for a physical connection.

WPT is an extremely useful technology that has numerous applications and benefits. Cell phones, laptops and other mobile devices could function without ever having to be plugged in, cars could drive on highways burning no fossil fuels; wireless power even has the potential to solve much of the renewable energy issues we face.

Wireless power transfer (WPT) can transmit electrical energy through a relatively large air gap. It shows the advantages of flexibility, convenience, and safety. Most of the disadvantages of conductive power transfer can be overcome or diminished by using this new technology. WPT can be employed in many applications such as electric vehicles, automatic underwater vehicles, and implantable medical devices. To expand the load lifetime and achieve better performance, the output voltage/current of a WPT system should be stable.

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