CHAPTER FIVE

5.1 CONCLUSION

In this paper we present a circuit to charge 7.5V, 3700mAh rechargeable Lion battery from the solar panel. This solar Charger has current and voltage regulation and also has over voltage cut Off facilities. This circuit may also be used to power the fan at Constant voltage because output voltage is adjustable. We bought the components and done the project practically

The successful development of a solar-enabled rechargeable fan with integrated peripheral functions demonstrates the feasibility of creating a cost-effective, standalone solution for ventilation and auxiliary needs in areas with unreliable or no access to grid electricity. The system efficiently harnesses solar energy to power a DC fan while also supporting basic functionalities such as device charging and lighting. Its simplicity, portability, and independence from the grid make it especially relevant for rural and off-grid environments.

5.2 RECCOMENDATION

To improve the system further, increasing battery capacity would support longer usage or additional loads. A more robust, weather-resistant casing is recommended to improve durability, and a user interface with indicators for battery level and charging status would enhance usability. Lastly, future work may explore the integration of basic automation for smarter power management without increasing system complexity.

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