**LIST OF FIGURES**

**FIGURE NO. TITLES PAGE NO.**

3.1 Block diagram of the System 8

3.2 Circuit diagram of the dust bin monitoring unit 10

3.3 Circuit diagram of the Light automation 10

3.4 Block diagram of the power supply unit system 11

3.5 Functional circuit diagram of power supply unit 11

4.1 Pin Diagram ofPIC16F877A 12

4.2 ESP8266EX Block Diagram 16

4.3 ESP8266 Module 17

4.4 Schematic of MQ-64.7 19

4.5 Pin Diagram ofLM35 21

4.6 Pin details of HC-SR04 22

4.7 Schematic of LDR 23

4.8 Schematic of transformer 25

4.9 Transformer principles 26

6.1 Web page of the system 41

6.2 Dust bin low level 41

6.3 Dust bin overflow detected 42