

## DAFTAR GAMBAR

|                                                     |    |
|-----------------------------------------------------|----|
| Gambar 2. 1 Pancaran Sensor Ultrasonic.....         | 5  |
| Gambar 2. 2 Prinsip Kerja Sensor HC-SR04 .....      | 7  |
| Gambar 2. 3 Alur Pengukuran Strain Gauge.....       | 8  |
| Gambar 2. 4 Susunan Protocol Bluetooth .....        | 9  |
| Gambar 2. 5 Proses Konversi .....                   | 11 |
| Gambar 2. 6 Arduino Nano .....                      | 11 |
|                                                     |    |
| Gambar 3. 1 Blok Diagram Alat Pengukuran .....      | 14 |
| Gambar 3. 2 Flowchart Kerja Sistem .....            | 15 |
| Gambar 3. 3 Datasheet Arduino Nano, .....           | 17 |
| Gambar 3. 4 Sensor HC-SR04 .....                    | 18 |
| Gambar 3. 5 Sensor Loadcell .....                   | 19 |
| Gambar 3. 6 Fungsi Pin.....                         | 20 |
| Gambar 3. 7 Modul HC-05 Bluetooth.....              | 21 |
| Gambar 3. 8 Flowchart Pengerjaan Hardware .....     | 24 |
| Gambar 3. 9 Flowchart Pengerjaan Software.....      | 25 |
| Gambar 3. 10 Skematik Diagram Alat Pengukuran ..... | 26 |
| Gambar 3. 11 Use Case Diagram Aplikasi.....         | 28 |
| Gambar 3. 12 Diagram Activity Aplikasi .....        | 29 |
| Gambar 3. 13 Perencanaan Interface mPosyandu .....  | 30 |
| Gambar 3. 14 Halaman Tambah Kondisi.....            | 31 |
| Gambar 3. 15 Verifikasi Bluetooth .....             | 32 |
| Gambar 3. 16 Kondisi Bluetooth.....                 | 32 |
| Gambar 3. 17 Input Data kondisi Bluetooth .....     | 33 |
|                                                     |    |
| Gambar 4. 1 Tampilan Hardware Pengukuran.....       | 35 |
| Gambar 4. 2 Aplikasi mPosyandu.....                 | 38 |
| Gambar 4. 3 Serial Monitor Running Data .....       | 38 |
| Gambar 4. 4 Interface Aplikasi mPosyandu.....       | 39 |
| Gambar 4. 5 Pengujian Pairing Bluetooth.....        | 41 |
| Gambar 4. 6 Pengujian Alat Ukur .....               | 44 |
| Gambar 4. 7 Id Database Posyandu .....              | 47 |
| Gambar 4. 8 Database Balita.....                    | 47 |