

DAFTAR ISI

| | |
|---|------------|
| LEMBAR PENGESAHAN | i |
| LEMBAR ORISINALITAS | ii |
| ABSTRAK | iii |
| ABSTRACT | iv |
| UCAPAN TERIMA KASIH..... | vi |
| DAFTAR ISI..... | vii |
| DAFTAR GAMBAR..... | ix |
| DAFTAR TABEL | xi |
| BAB 1 PENDAHULUAN..... | 1 |
| 1.1. Latar Belakang | 1 |
| 1.2. Rumusan Masalah | 3 |
| 1.3. Tujuan dan Manfaat Penelitian | 3 |
| 1.4. Batasan Masalah..... | 3 |
| 1.5. Metode Penelitian..... | 4 |
| 1.6. Jadwal Pelaksanaan..... | 12 |
| BAB 2 TINJAUAN PUSTAKA..... | 13 |
| 2.1. Kajian Pustaka..... | 13 |
| 2.2. Landasan Teori..... | 19 |
| 2.2.1. Sampah..... | 19 |
| 2.2.2. Game Edukasi | 20 |
| 2.2.3. Game Development Life Cycle (GDLC) | 20 |
| 2.2.4. Construct 3 | 26 |
| 2.2.5. Blackbox Testing | 27 |
| 2.2.6. System Usability Scale (SUS) | 27 |
| 2.2.7. Repeated Measures Anova | 28 |
| BAB 3 PERANCANGAN SISTEM | 30 |
| 3.1. Perancangan Sistem | 30 |
| 3.1.1. Use Case Diagram | 30 |
| 3.1.2. Activity Diagram | 32 |
| 3.1.3. Struktur Navigasi | 35 |
| 3.2. Diagram Blok | 37 |

| | | |
|-----------------------|---|-----------|
| 3.3. | Fungsi dan Fitur | 39 |
| 3.3.1. | Fungsi..... | 39 |
| 3.3.2. | Fitur..... | 39 |
| 3.4. | Desain Perangkat Lunak | 40 |
| 3.4.1. | Alat dan Bahan Penelitian..... | 40 |
| 3.4.2. | <i>Initiation</i> | 40 |
| 3.4.3. | <i>Pre-Production</i> | 41 |
| 3.4.4. | <i>Production</i> | 48 |
| BAB 4 | HASIL PERCOBAAN DAN ANALISIS | 58 |
| 4.1. | <i>Testing</i> | 58 |
| 4.1.1. | <i>Blackbox Testing (Alpha)</i> | 58 |
| 4.1.2. | <i>Beta</i> | 62 |
| 4.2. | <i>System Usability Scale</i> | 63 |
| 4.3. | <i>Repeatead Measures Anova</i> | 66 |
| 4.4. | <i>Release</i> | 69 |
| 4.5. | Analisis Hasil | 70 |
| 4.5.1. | Analisis Sesudah Penggunaan <i>Game</i> | 70 |
| 4.5.2. | Perbandingan Sebelum dan Sesudah Penggunaan <i>Game</i> | 70 |
| BAB 5 | KESIMPULAN DAN SARAN | 72 |
| 5.1. | Kesimpulan | 72 |
| 5.2. | Saran..... | 72 |
| DAFTAR PUSTAKA | | 74 |
| LAMPIRAN | | 79 |