Software Requirement Specifications

INTERNET APPLICATION DEVELOPMENT

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Orphanage's Establishment System

1. Introduction

1.1 Purpose

The purpose of this document is to specify the functional and non-functional requirements for the Orphanage Management System. The system is designed to help orphanages manage children's data, donations, donors, staff activities, and inventory digitally and efficiently.

1.2 Intended Audience

2. Software Development Team
3. Project Supervisor / Instructor
4. Orphanage Administration (Client)
5. Testers

1.3 Scope

This web-based system will:
- Allow secure registration and login for admin, staff, and donors.
- Enable data-driven management of children's profiles, donation tracking, and inventory.
- Support event and activity management for the orphanage.
- Provide analytical reports for administration and donors.
- Ensure role-based access and data validation throughout.

2. Overall Description

2.1 Product Perspective

- This is a new, independent system that operates as a centralized web application. It is part of an initiative to bring digital transformation to orphanages.

2.2 Product Functions

- User authentication and authorization
- CRUD operations for child records
- Donation submission and tracking
- Staff management and task tracking
- Reports generation (PDF/Excel)
- Alerts for events, low inventory, or donor actions

2.3 User Classes and Characteristics

User Type	Description	Access Level
Admin	Orphanage manager	Full access
Staff	General caretakers	Limited (no donor info)
Donor	External contributor	Donation Module only

2.4 Operating Environment

- **Frontend**: ASP.NET Web Forms, HTML/CSS
- **Backend**: VB.NET
- **Database**: SQL Server
- **Hosting**: IIS or public web host
- **Browser Compatibility**: Chrome, Firefox, Edge

3 Functional Requirements

Requirement 1: User Authentication

- Users must log in using email and password.

- Forgot password feature using email reset.

Requirement 2: Child Profile Management

- Add, edit, delete, and search for children.

- Track health, education, and guardianship status.

Requirement 3: Donations

- Accept one-time or recurring donations.

- Donors can view history and generate receipts.

Requirement 4: Inventory Management

- Manage daily stock items (food, medicines).

- Alerts on low stock.

Requirement 5: Reports

- Generate reports on children, donations, and events.

- Export as PDF/Excel.

Requirement 6: Role-Based Dashboard

- Admin, Staff, and Donor dashboards with different widgets.

4 Non-Functional Requirements

Requirement 1: Performance

- Load within 3 seconds on standard broadband connection.

Requirement 2: Security

- Passwords hashed and stored.

- Session timeout after 45 minutes of inactivity.

Requirement 3: Usability

- Accessible and mobile responsive.

- Use of tooltips and validations for guidance.

Requirement 4: Reliability

- 99% uptime

- Automatic backup every 24 hours.

5. Assumptions and Dependencies

- Internet access is available to all users.
- The orphanage has one system administrator.
- Email services are available for notifications.