

KARONGI COLLEGE

Module Details		Learner's Details		
SECTOR:	ICT	Regno:		
SUB-SECTOR:	Information Technology (IT)	Class:	Level 6 IT (Year 1)	
CERTIFICATE:	TVET Certificate VI in Information Technology	Trainer's Details		
Module (Code & Name):	ITLDF601 – Frontend development	Names:	SAFARI Cyprien	
Competence:	Develop Frontend	Duration:	240min	
Training Centre:	RP Karongi College	Date:	April 03, 2025	
Type of evidence:	Performance evidence	Signature:		

PROJECT BASED PRACTICAL ASSESSMENT /100 marks

Objectives

This practical assessment assesses students' ability to develop a frontend for a **Child's Day Care Management System** using React.js. The project should provide an intuitive interface for managing child registrations, attendance tracking, caregiver assignments, and progress monitoring.

Scenario

A daycare center wants to digitize its operations by implementing a **Child's Day Care Management System** that enables parents to register their children, book daycare sessions, and track daily activities. The system must allow admins to manage child records, assign caregivers, and monitor attendance.

General Requirements & Guidelines

- Students must work individually on the project.
- The project should be built using **React.js** with a proper component-based architecture.
- **React Router** must be implemented for navigation between pages.
- Material UI must be used for styling, including icons, tables, data tables (for automatic sorting, filtering, and pagination), and form components.
- **Recharts** should be used to display analytics, such as attendance tracking and caregiver performance.
- The UI should include both **Dark Mode and Light Mode**, with a toggle button in the header using a half-moon icon.
- Additionally, **Dark and Light buttons** should be placed in the aside section for mode selection.
- Data tables should include **View and Delete** action buttons for managing child and caregiver records.
- Forms with image upload must display a preview of the uploaded profile picture.
- Each section must include an "Add New" button for adding new children, caregivers, and daycare schedules.

• Form validation must be implemented to ensure data integrity and prevent empty or incorrect submissions.

• Validation requirements:

- o Fields should not be left empty.
- o Email fields must have a valid email format.
- Password fields must include a minimum of 8 characters, at least one uppercase letter, one number, and one special character.
- o Phone number fields should accept only numeric values with a proper length constraint.
- o Image uploads should accept only specific file types (JPEG, PNG, etc.) and limit file size.

Technical Requirements

- 1. **Routing**: React Router must be implemented with proper navigation between pages (e.g., Home, Children, Caregivers, Attendance, Admin Panel).
- 2. Material UI: Icons, tables, forms, and layout components should be used for consistency.
- 3. **Data Tables**: Sorting, filtering, and pagination should be handled automatically using Material UI for child and caregiver lists.
- 4. **Recharts**: Attendance trends, caregiver performance, and child activity reports should be displayed using charts.

5. Dark/Light Mode:

- o Toggle button (half-moon icon) in the header.
- o Separate Dark and Light buttons in the aside section.

6. Table Actions:

- View button to open a modal or separate page displaying detailed child or caregiver information.
- o Delete button to remove a record with a confirmation prompt.

7. Day Care Features:

- o Parents should be able to register their children and book daycare slots.
- Caregivers should be assigned to children based on availability.
- o Admins should be able to manage attendance and child progress.

8. Admin Panel:

- o Admins should be able to monitor caregiver efficiency and child activity reports.
- o View real-time analytics using Recharts.

9. **Registration Forms**:

- o Fields for child and caregiver registration.
- o Image upload with preview before submission.
- Add New button to create new records.
- o Form validation to prevent empty or incorrect data submission.

Assessment Checklist

Category Criteria		Marks	Yes	No
Project Structure & UI	Proper folder structure and component-based architecture			
Responsive design implemented using Material UI Dark and Light modes correctly toggle and persist		5		
		5		
Routing & Navigation	Navigation bar correctly links to all required pages	5		
	React Router properly handles routing between pages			
	Dynamic route handling for viewing child details			
Data Management & Tables	Data tables support sorting, filtering, and pagination	10		
	View button displays detailed child/caregiver info			
	Delete button prompts confirmation before removal	5		
Day Care Features	Parents can register and book daycare slots	5		
	Caregivers can be assigned to children	5		
	Admin can add, edit, and delete children/caregivers	5		
	Attendance tracking displayed using Recharts	5		
Forms & Image Upload	Registration form includes all required fields	5		
	Image upload feature shows a preview before submission	5		
	"Add New" button successfully adds new entries	5		
	Form validation implemented to prevent incorrect input	5		
	Email validation ensures proper format	5		
	Password validation follows security criteria	5		
Code Quality & Submission	Well-structured and readable code	5		
	Proper use of React.js best practices	5		
Total Marks	100			