***Secure-POS Description***

**Overview (Idea):**

The primary objective of this project is to develop a secure Point of Sale (POS) system with a user-friendly interface accessible to employees with non-technical backgrounds. The focus will be on key security aspects, including implementing role-based access control (RBAC) for user permissions, using strong authentication methods like multi-factor authentication (MFA), encrypting sensitive data, and implementing logging and monitoring for incident detection. The goal is to create a system that is secure enough for managers to trust and rely on.

**Users**:

* Manager
* Customer
* Account Department
* Supplier
* Employee

**Authentication:**

Authentication is required for all users’ access. The following users require 2F authentication:

* Manager
* Customer
* Account Department
* Employee

**Access Control:**

|  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- |
|  | **Item Information** | **Customer Information** | **Supplier Information** | **Sales Information** | **Employee Information** |
| **Manager** | Read, Modify, Approve | Read, Modify | Read, Modify | Read, Modify | Read, Modify |
| **Customer** | Read | Read, Update, Approve | - | - | - |
| **Account Department** | Read | - | Read | Read, Calculate | Read |
| **Supplier** | Read, Approve | - | Read, Approve | - | - |
| **Employee** | Read, Modify | Read, Modify | Read, Modify | Insert | Read, Approve |