### Data Dictionary

|  |  |
| --- | --- |
| **Entity Data dictionary: describe content of all entities** | |
| **Entity Name** | **Description** |
| Account | Describe all accounts of users in the system. |
| Account Status | Describe status of account. One account has only one status. |
| Amenity | Describe all amenities in system. |
| Amenity Group | Describe groups of amenity. One amenity is only in one group. |
| Appointment | Describe all appointment requests of customer. |
| Appointment Status | Describe status of appointment request. One appointment has only one status. |
| Category | Describe category of office. One office is only in one category. |
| Contract | Describe all contracts in the system. |
| Contract Status | Describe status of contract. One contract has only one status. |
| Email Queue | Describe all emails have to send to customer in the system. |
| Office | Describe all offices in the system. |
| Office Amenity | Describe all amenities in one office. One office can have more than one amenity. |
| Office Group | Describe group of the office for searching office. One office is only in one group |
| Office Status | Describe status of the office. One office has only one status. |
| Payment Term | Describe time for the payment |
| Price Term | Describe the way that money is calculated base on. |
| Profile | Describe information of the account |
| Rental | Describe all rental requests from customer |
| Rental Detail | Describe all rental items for one rental request |
| Rental Item | Describe all rental items in system |
| Rental Status | Describe status of rental request. One rental request has only one status. |
| Repair | Describe all repair requests from customer |
| Repair Detail | Describe all amenities need to repair for one repair request |
| Repair Status | Describe status of repair request. One repair request has only one status. |
| Request Amenity | Describe all amenities in one request office |
| Request Office | Describe all requests office from customer |
| Role | Describe role of account. One account has only one role. |

#### Table Account

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Account | Username{PK} | Unique identifier of an account, username for login to system | nvarchar(50) | No |
| Password | Password for login to system | varchar(50) | No |
| Email | Email of this account | varchar(50) | No |
| RoleId{FK} | Role of this account. Foreign key references to table Role | int | No |
| StatusId{FK} | Status of this account. Foreign key references to table Account Status | int | No |
| Unique Key: Email | | | | |

#### Table Account Status

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Account Status | Id{PK} | Unique identifier of an account status, automatically increase | int | No |
| Name | Name of this status | nvarchar(50) | No |
| Description | Description for this status | nvarchar(50) | Yes |

#### Table Amenity

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Amenity | Id{PK} | Unique identifier of an amenity, automatically increase | int | No |
| Name | Name of this amenity | nvarchar(50) | No |
| Description | Description for this amenity | nvarchar(250) | Yes |
| Weight | Weight of amenity in one group | int | Yes |
| AmenityGroupId{FK} | Group of this amenity. Foreign key references to table Amenity Group | int | Yes |
| Priority | Priority of amenity in one group | int | Yes |
| Unique Key: Weight | | | | |

#### Table Amenity Group

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Amenity Group | Id{PK} | Unique identifier of an amenity group, automatically increase | int | No |
| Name | Name of amenity group | nvarchar(50) | No |
| Description | Description for amenity group | nvarchar(250) | Yes |

#### Table Appointment

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Appointment | Id{PK} | Unique identifier of an appointment, automatically increase | int | No |
| CustomerUsername{FK} | Username of customer. Foreign key references to table Account | nvarchar(50) | No |
| AssignedStaff{FK} | Staff who is responsibility for the appointment. Foreign key references to table Account | nvarchar(250) | Yes |
| OfficeId{FK} | Office where customer want to make appointment. Foreign key references to table Office. | int | No |
| Time | Time for appointment | datetime | No |
| StatusId{FK} | Status of the appointment. Foreign key references to table appointment status. | int | No |
| CreateTime | Time when customer create appointment | datetime | No |
| UpdateTime | Time when manager update the appointment | datetime | Yes |

#### Table Appointment Status

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Appointment Status | Id{PK} | Unique identifier of an appointment status, automatically increase | int | No |
| Name | Name of appointment status | nvarchar(50) | No |
| Description | Description for appointment status | nvarchar(50) | Yes |

#### Table Category

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Category | Id{PK} | Unique identifier of a category for office, automatically increase | int | No |
| Name | Name of category | nvarchar(50) | No |
| Description | Description for category | nvarchar(250) | No |
| Unique Key: Name | | | | |

#### Table Contract

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Contract | Id{PK} | Unique identifier of a contract, automatically increase | int | No |
| CustomerUsername{FK} | Username of customer. Foreign key references to table Account | nvarchar(50) | No |
| OfficeId{FK} | Office where customer want to make contract. Foreign key references to table Office. | int | No |
| StartDate | Date when contract starts. | date | No |
| EndDate | Date when contract ends. | date | No |
| PaymentFee | Fee for the contract | int | No |
| PaymentTerm{FK} | Payment term for the contract. Foreign key references to table Payment Term. | int | No |
| StatusId{FK} | Status of the contract. Foreign key references to table contract status. | int |  |

#### Table Contract Status

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Contract Status | Id{PK} | Unique identifier of a contract status, automatically increase | int | No |
| Name | Name of contract status | nvarchar(50) | No |
| Description | Description for contract status | nvarchar(50) | Yes |

#### Table Email Queue

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Email Queue | Id{PK} | Unique identifier of an email queue, automatically increase | int | No |
| Username{FK} | Username of the customer. Foreign key references to table Account. | nvarchar(50) | No |
| OfficeIds | List office that system suggests to customer | nvarchar(50) | Yes |
| CreateTime | Time when customer create request | datetime | Yes |

#### Table Office

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Office | Id{PK} | Unique identifier of an office, automatically increase | int | No |
| Name | Name of the office. | nvarchar(50) | No |
| CategoryId{FK} | Category of the office. Foreign key references to table Category. | int | No |
| StatusId | Status of the office. Foreign key references to table Office Status. | int | No |
| Description | Description for the office | ntext | No |
| Price | Price of the office | bigint | Yes |
| PriceTerm{FK} | Price term of the office. Foreign key references to table Price Term. | int | No |
| FloorNumber | Number of floor in the office | int | No |
| Area | Area of the office | float | No |
| ImageUrls | Link of the images of office | text | Yes |
| OtherDetail | Some detail of the office | ntext | Yes |
| Address | Address of the office | nvarchar(150) | No |
| Latitude | Latitude of the office | float | Yes |
| Longitude | Longitude of the office | float | Yes |
| District | District of the office | nvarchar(50) | Yes |
| City | City of the office | nvarchar(50) | Yes |
| ParentOfficeId{FK} | Parent Office ID of the office. Foreign key references to table Office. | int | Yes |
| CreateDate | Date when office create in database | datetime | No |
| ViewCount | Number views when customer see detail of office | int | Yes |

#### Table Office Amenity

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Office Amenity | Id{PK} | Unique identifier of a contract status, automatically increase | int | No |
| OfficeId{FK} | Id of office. Foreign key references to table Office. | int | No |
| AmenityId{FK} | Amenity of this office Foreign key references to table Amenity. | int | No |

#### Table Office Group

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Office Group | OfficeId{PK, FK} | Id of office. Foreign key references to table Office. | int | No |
| OfficeGroup | Group after system run algorithm of this office | int | No |

#### Table Office Status

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Office Status | Id{PK} | Unique identifier of an office status, automatically increase | int | No |
| Name | Name of office status | nvarchar(50) | No |
| Description | Description for office status | nvarchar(250) | Yes |

#### Table Payment Term

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Payment Term | Id{PK} | Unique identifier of a payment term, automatically increase | int | No |
| Name | Name of term for payment | nvarchar(50) | No |
| PaymentTime | Number months of the payment | int | No |
| Description | Description for payment term | nvarchar(100) | Yes |
| Unique Key: PaymentTime | | | | |

#### Table Price Term

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Price Term | Id{PK} | Unique identifier of a price term, automatically increase | int | No |
| Name | Name of term for price | nvarchar(50) | No |
| Description | Description for price term | nvarchar(250) | Yes |
| Unique Key: Name | | | | |

#### Table Profile

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Profile | Username{PK, FK} | Unique identifier of an account. Foreign key references to table Account. | nvarchar(50) | No |
| Title | Gender of the profile | char(4) | No |
| FullName | Full name of this profile | nvarchar(50) | No |
| Company | Company of this profile | nvarchar(100) | Yes |
| Phone | Phone of this profile | varchar(15) | No |
| Address | Address of this profile | nvarchar(150) | Yes |
| Birthday | Birthday of this profile | datetime | Yes |

#### Table Rental

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Rental | Id{PK} | Unique identifier of a rental request, automatically increase | int | No |
| ContractId{FK} | Contract which customer send rental request. Foreign key references to table Contract. | int | No |
| AssignStaff{FK} | Username of staff who responsibility for this rental request. Foreign key references to table Account. | nvarchar(50) | Yes |
| StatusId{FK} | Status of this rental request. Foreign key references to table Rental Status. | int | No |
| Description | Description of rental | ntext | Yes |
| CreateTime | Time when customer create this rental request | datetime | No |
| UpdateTime | Time when manger or staff change status | datetime | Yes |
| AssignedTime | Time when manager assign to staff | datetime | Yes |

#### Table Rental Detail

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Rental Detail | Id{PK} | Unique identifier of a rental detail, automatically increase | int | No |
| RentalItemId{FK} | Item rental for the rental request. Foreign key references to table Rental Item. | int | No |
| RentalId{FK} | Id of Request rental. Foreign key references to table Rental. | int | No |
| UnitPrice | Price of one item | float | Yes |
| Quantity | Quantity of rental item for the rental request | int | Yes |

#### Table Rental Item

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Rental Item | Id{PK} | Unique identifier of a rental item, automatically increase | int | No |
| Name | Name of the item | nvarchar(150) | No |
| Description | Description for the item | ntext | Yes |
| Price | Price of the item | float | Yes |
| Quantity | Quantity of the item | int | Yes |
| ImageUrl | Link image of the item | nvarchar(250) | Yes |

#### Table Rental Status

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Rental Status | Id{PK} | Unique identifier of a rental status, automatically increase | int | No |
| Name | Name of rental status | nvarchar(50) | No |
| Description | Description for rental status | nvarchar(50) | Yes |

#### Table Repair

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Repair | Id{PK} | Unique identifier of a repair request, automatically increase | int | No |
| ContractId{FK} | Contract which customer send repair request. Foreign key references to table Contract. | int | No |
| AssignStaff{FK} | Username of staff who responsibility for this repair request. Foreign key references to table Account. | nvarchar(50) | Yes |
| RepairStatusId{FK} | Status of this repair request. Foreign key references to table Repair Status. | int | No |
| Description | Description of repair | ntext | Yes |
| CreateTime | Time when customer create this repair request | datetime | No |
| UpdateTime | Time when manger or staff change status | datetime | Yes |
| AssignedTime | Time when manager assign to staff | datetime | Yes |

#### Table Repair Detail

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Repair Detail | Id{PK} | Unique identifier of a repair detail, automatically increase | int | No |
| RepairId {FK} | Id of repair request. Foreign key references to table Repair. | int | No |
| AmenityId{FK} | Amenity of this repair request. Foreign key references to table Amenity. | int | No |

#### Table Repair Status

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Repair Status | Id{PK} | Unique identifier of a repair status, automatically increase | int | No |
| Name | Name of repair status | nvarchar(50) | No |
| Description | Description for repair status | nvarchar(50) | Yes |

#### Table Request Amenity

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Request Amenity | Id{PK} | Unique identifier of a request amenity, automatically increase | int | No |
| RequestOfficeId{FK} | Id of request office. Foreign key references to table Request Office. | int | No |
| AmenityId{FK} | Amenity of this request. Foreign key references to table Amenity. | int | No |

#### Table Request Office

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Request Office | Id{PK} | Unique identifier of a request office, automatically increase | int | No |
| CustomerUsername{FK} | Username of customer. Foreign key references to table Account | nvarchar(50) | No |
| CategoryId{FK} | Category of the office. Foreign key references to table Category. | int | Yes |
| Price | Price of the office. | int | Yes |
| Area | Area of the office | float | Yes |
| District | District of the office | nvarchar(50) | Yes |
| CreateDate | Time when customer create this request. | datetime | No |
| ScheduleDate | Date when system check this request | datetime | Yes |
| OfficeSuggested | List offices that are suitable with request | nvarchar(250) | Yes |

#### Table Role

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Entity name** | **Attributes** | **Description** | **Type** | **Null** |
| Role | Id{PK} | Unique identifier of a role, automatically increase | int | No |
| RoleName | Name of role | nvarchar(50) | No |
| Unique Key: RoleName | | | | |