QuickManage

Software Requirements Specification

<1.0>

Revision History

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Software Requirements Specification

# Introduction

## Purpose

This document provides a detailed description of QuickManage system. It includes the explanation of system’s feature, the flow process, the design interface of software and how system deal with error. This SRS document is intended for both stakeholders and project team.

## Scope

QuickManage is a Java desktop program that manages the daily operation of a local music and art school in HCMC. This software will be designed to make a convenience for both manager and staffs. The system is designed for 2 type of user: manager and staffs.

## Assumptions and Dependencies

## References

* <http://www.agilemodeling.com/essays/agileModelingRUP.htm>
* Priestley, M. (2004). *Practical Object-Oriented Design with UML.* Mc Graw Hill.

# Specific Requirements

* **QuickManage** is the application that manages activities of music and art school. Thus, it provides adding, editing, deleting, deactivating, activating.

## Actors

The application will contain three kinds of account which are manager and staffs.

+Manager account can be created by default manager. The username and password of this type of account is the same which is “admin”. This administrator will primary manage types of account in this program such as: adding new staff, viewing and editing staff’s information and delete staff’s account.

+ Staff account which is created by manager. Staff has the role of adding, editing deleting teacher’s information, deactivating and activating teacher. Moreover, staff also controls classes in responsibility of adding, editing, copying, deleting classes. Finally, staff can add, edit, delete, deactivate, activate and enroll students.

## C:\Users\s3255203\Desktop\Main.jpgUse Case Diagram

## Use Case Specifications

### **Login**

|  |  |
| --- | --- |
| Use Case Name: log in | ID: UC001 |
| Actors: Authorized user | Priority: High |
| Brief description: Authenticate the user. | |
| Pre-conditions: Account must have been created. | |
| Trigger: Validate user. | |
| Post-conditions: User must log out to ensure the security for the system. | |
| Normal flow: + User types username, password, and then pressing “Enter” or clicking on “Login” Button. | |
| Exceptional flows:  +If wrong username or password, a warning popup show up and ask user to re-type username and pass word.  +If the username and password fill boxes are empty, system will ask user to enter username and password. | |

### **Logout**

|  |  |
| --- | --- |
| Use Case Name: User log out | ID: UC002 |
| Actors: Authorized user | Priority: Normal |
| Brief description: Log out | |
| Pre-conditions: User must log in first | |
| Trigger: User finishes using the system | |
| Post-conditions: Logged out | |
| Normal flow: User clicks “Log out” Button. | |
| Exceptional flows: | |

### **Add new Account**

|  |  |
| --- | --- |
| Use Case Name: Add new account | ID: UC003 |
| Actors: Manager | Priority: Normal |
| Brief description: Add new account of staff or manager. | |
| Pre-conditions: Manager must log in; the creating new account is not duplicated with the existing account on the system. | |
| Trigger: The new account has been employed. | |
| Post-conditions: Manager logs out after finishing. | |
| Normal flow: +Admin must press the icon of adding new User, and then the popup will occur.  +Admin can fill in username, password and other information fields.  +Press “Enter” or button “OK” to finish the action of adding new account. | |
| Exceptional flows: A warning frame show up if there exist invalid format information or the account that is going to create has been existed in the system. | |

### **Edit Account**

|  |  |
| --- | --- |
| Use Case Name: Edit account | ID: UC004 |
| Actors: Manager | Priority: 5 |
| Brief description: Edit information of staff or manager. | |
| Pre-conditions: Manager must login; Accounts must be created first. | |
| Trigger: Manager wants to change staff information. | |
| Post-conditions: Admin logs out; Information will be changed. | |
| Normal flow: + Manager chooses the account that manager want to edit information.  + Manager clicks on Edit button, and then fills in or change necessary information.  +Press “Enter” or Button “Edit” to finish the action. | |
| Exceptional flows: If the changing information is not valid, a warning will tell manager where the errors are. | |

### **Delete Account**

|  |  |
| --- | --- |
| Use Case Name: Delete account | ID: UC005 |
| Actors: Manager | Priority: Normal |
| Brief description: Delete account | |
| Pre-conditions: Manager must log in first; | |
| Trigger: Manager wants to delete unused account | |
| Post-conditions: Manager can view existing accounts or log out | |
| Normal flow: + Manager chooses the accounts that manager want to delete. Then click the delete button to remove the account. | |
| Exceptional flows: The manager accounts can be deleted but it must exist one default manager account | |

### **View Account**

|  |  |
| --- | --- |
| Use Case Name: View account | ID: UC006 |
| Actors: Manager | Priority: Normal |
| Brief description: Manager can view all available accounts in the system. | |
| Pre-conditions: Manager must login. | |
| Trigger: After manager log in. | |
| Post-conditions: Manager can add, edit, delete, deactivate and activate account. | |
| Normal flow: Manager views available account with full information directly after logging to the system. | |
| Exceptional flows: There is no available account in the system except admin account. | |

### **Add Teacher**

|  |  |
| --- | --- |
| Use Case Name: Add teacher | ID: UC007 |
| Actors: Manager or Staff | Priority: 5 |
| Brief description: Adding teacher | |
| Pre-conditions: Manager or Staff must log in | |
| Trigger: Manager or Staff wants to add teacher’s information to the list | |
| Post-conditions: Manager or Staff can view the teacher list | |
| Normal flow: + Manager or Staff clicks on the button “Add Teacher”, and then the system displays a form for manager and staff to input the teacher’s information.  +After finishing inputting teacher’s information, manager or staff can press “Enter” or click button “OK” to finish the action of adding new teacher’s information. | |
| Exceptional flows: If the changing information is not valid, a warning will tell manager where the errors are. | |

### **Delete Teacher**

|  |  |
| --- | --- |
| Use Case Name: Delete teacher | ID: UC008 |
| Actors: Manager and Staff | Priority: 5 |
| Brief description: Delete Teacher information | |
| Pre-conditions: Manager or Staff must log in | |
| Trigger: Manager or Staff wants to delete the teacher information from the list | |
| Post-conditions: Manager or Staff can view the teacher list after deleting | |
| Normal flow: Manager or staff chooses the teacher that manager want to delete. Then click the delete button to remove teacher information. | |
| Exceptional flows: Manager or Staff has not chosen any teacher information to delete, system do nothing. | |

### **Edit Teacher**

|  |  |
| --- | --- |
| Use Case Name: Edit Teacher | ID: UC010 |
| Actors: Manager or Staff. | Priority: 5 |
| Brief description: Edit teacher information | |
| Pre-conditions: Manager or Staff must log in the systems | |
| Trigger: Manager or Staff wants to edit teacher | |
| Post-conditions: Manager or Staff can view the teacher list that has been edited | |
| Normal flow: + Manager or staff chooses the teacher that users want to edit information.  + Manager or staff clicks on Edit button, and then fills in or change necessary information. | |
| Exceptional flows: The information of teacher being edited is not valid. | |

### **View Teacher**

|  |  |
| --- | --- |
| Use Case Name: View teachers | ID: UC011 |
| Actors: Manager or Staff. | Priority: 5 |
| Brief description: Allow user to view list of song | |
| Pre-conditions: Manager or Staff must log in to the system. | |
| Trigger: User wants to view the list of teachers | |
| Post-conditions: User can view the teacher with pagination | |
| Normal flow: User clicks on page number to browse between teacher list | |
| Exceptional flows: The list does not have any teacher | |

### **Add Student**

|  |  |
| --- | --- |
| Use Case Name: Add Student | ID: UC007 |
| Actors: Manager or Staff | Priority: 5 |
| Brief description: Adding student | |
| Pre-conditions: Manager or Staff must log in | |
| Trigger: Manager or Staff wants to add student’s information to the list | |
| Post-conditions: Manager or Staff can view the student list | |
| Normal flow: + Manager or Staff clicks on the button “Add Student”, and then the system displays a form for manager and staff to input the student’s information.  +After finishing inputting student’s information, manager or staff can press “Enter” or click button “OK” to finish the action of adding new student’s information. | |
| Exceptional flows: If the changing information is not valid, a warning will tell manager where the errors are. | |

### **Delete Student**

|  |  |
| --- | --- |
| Use Case Name: Delete student | ID: UC008 |
| Actors: Manager and Staff | Priority: 5 |
| Brief description: Delete Teacher information | |
| Pre-conditions: Manager or Staff must log in | |
| Trigger: Manager or Staff wants to delete the teacher information from the list | |
| Post-conditions: Manager or Staff can view the teacher list after deleting | |
| Normal flow: Manager or staff chooses the teacher that manager want to delete. Then click the delete button to remove teacher information. | |
| Exceptional flows: Manager or Staff has not chosen any student information to delete, system do nothing. | |

### **Edit Student**

|  |  |
| --- | --- |
| Use Case Name: Edit Student | ID: UC010 |
| Actors: Manager or Staff. | Priority: 5 |
| Brief description: Edit student information | |
| Pre-conditions: Manager or Staff must log in the systems | |
| Trigger: Manager or Staff wants to edit student | |
| Post-conditions: Manager or Staff can view the student list that has been edited | |
| Normal flow: +Staff clicks on the student information and clicks on the “Edit Button”  + The form for editing will occur and Manager or Staff can edit the information of students.  +Finally, press “Enter” or button “Edit” to finish the action of editing student. | |
| Exceptional flows: The information of student being edited is not valid. | |

### **View Student**

|  |  |
| --- | --- |
| Use Case Name: View student | ID: UC011 |
| Actors: Manager or Staff. | Priority: 5 |
| Brief description: Allow user to view list of student | |
| Pre-conditions: Manager or Staff must log in to the system. | |
| Trigger: User wants to view the list of student | |
| Post-conditions: User can view the teacher with pagination | |
| Normal flow: User clicks on page number to browse between student list | |
| Exceptional flows: The list does not have any student. | |

### **Add Class**

|  |  |
| --- | --- |
| Use Case Name: Add Class | ID: UC007 |
| Actors: Manager or Staff | Priority: 5 |
| Brief description: Adding class | |
| Pre-conditions: Manager or Staff must log in | |
| Trigger: Manager or Staff wants to add class’s information to the list | |
| Post-conditions: Manager or Staff can view the class list | |
| Normal flow: + Manager or Staff clicks on the button “Add class”, and then the system displays a form for manager and staff to input the class’s information.  +After finishing inputting class’s information, manager or staff can press “Enter” or click button “OK” to finish the action of adding new class’s information. | |
| Exceptional flows: If the changing information is not valid, a warning will tell manager where the errors are. | |

### **Delete Class**

|  |  |
| --- | --- |
| Use Case Name: Delete Class | ID: UC008 |
| Actors: Manager and Staff | Priority: 5 |
| Brief description: Delete Class information | |
| Pre-conditions: Manager or Staff must log in | |
| Trigger: Manager or Staff wants to delete the class information from the list | |
| Post-conditions: Manager or Staff can view the class list after deleting | |
| Normal flow: Manager or staff chooses the class that manager want to delete. Then click the delete button to remove class information | |
| Exceptional flows: Manager or Staff has not chosen any class information to delete, system do nothing. | |

### **Edit Class**

|  |  |
| --- | --- |
| Use Case Name: Edit Class | ID: UC010 |
| Actors: Manager or Staff. | Priority: 5 |
| Brief description: Edit class information | |
| Pre-conditions: Manager or Staff must log in the systems | |
| Trigger: Manager or Staff wants to edit class | |
| Post-conditions: Manager or Staff can view the class list that has been edited | |
| Normal flow: +Users clicks on the class information and clicks on the “Edit Button”  + The form for editing will occur and Manager or Staff can edit the information of classes.  +Finally, press “Enter” or button “Edit” to finish the action of editing class. | |
| Exceptional flows: The information of student being edited is not valid. | |

### **View Class**

|  |  |
| --- | --- |
| Use Case Name: View class | ID: UC011 |
| Actors: Manager or Staff. | Priority: 5 |
| Brief description: Allow user to view list of class | |
| Pre-conditions: Manager or Staff must log in to the system. | |
| Trigger: User wants to view the list of class | |
| Post-conditions: User can view the class with pagination | |
| Normal flow: User clicks on page number to browse between class list | |
| Exceptional flows: The list does not have any class. | |

### **Enroll student**

|  |  |
| --- | --- |
| Use Case Name: Enroll student | ID: UC011 |
| Actors: Manager or Staff. | Priority: 5 |
| Brief description: Allow user to enroll student into the class. | |
| Pre-conditions: Manager or Staff must log in to the system. | |
| Trigger: User wants to enroll student into the class | |
| Post-conditions: User can view the enrollment information. | |
| Normal flow: User choose the class first and then choose the student into class as well as choosing teacher. | |
| Exceptional flows: The users do not enter anything. System does nothing. | |

## Non-Functional Requirements

### **Installability**

* **QuickManage** will be written as a java desktop program which can operate on multiple platforms such as Window (XP/7) or Linux (Fedora 17, 18 or Ubuntu 12.04/12.10+). Moreover, the minimum hardware for this application will be the Pentium 3 with 1GB RAM, 1GB free hard disk space.
* **QuickManage** will be provided as the executable jar file named “QuickManage” instead of the source code. Thus, after installing the jar file to the computer, user can run the application directly through the icon logo of the program.

### **Usability**

**SMART** will provide the easy understanding interactive interface that every user can adapt the **QuickManage** immediately. Moreover, there is a User Guide that can help users clearly about show to use each function in the program.

### **Performance**

* **QuickManage** support a friendly interface which helps users can control the system easily. They can add, edit , delete the account , teacher, student etc. faster by using the tool button panel .Moreover , QuickManage can adapt all requirement in music school like enroll student , copy class. This software also provide a schedule which is clear by drag and drop the class time.

### **Scalability**

* The application will have the GUI that fit with the optimized resolution of 1024 x 768 pixels.