Spring 7-1-2017

Sales Management Portal

Krishna Reddy Battu
Governors State University

Naveen Kumar Gujjari
Governors State University

Ahtesham Hussein Mohammed
Governors State University

Sudeepthi Monajigari
Governors State University

ABSTRACT

This is a conceptual design for a company's sales pipeline database portal, at which sales staff enters clients' information into pipeline by keeping logs of contacts and activities, opportunities and proposals, and eventually projects. The portal enables management to oversee works and track progresses, and in the meantime to interact with and provide guidance to sales staff timely.

This portal should have a responsive design so it will adjust to diverse resolutions, making it easy for users to navigate the portal on their own devices.

Sales management portal can perform a number of important functions, including:

Sales management portal is designed to offer time-saving services:

- Search: Allows users to staff find clients by names, either on complete or partial match.
- A filter for browsing: can shorten list and separate prospects from current clients.
- A sign-in form
- Manager console: Managers can create user accounts, view and update entries, leave comments on entries, and send messages to staff, etc.
- Pipeline reports: Managers should also be able to run various reports such as lists of prospects, reports of opportunities or proposals by dates, sales projections by month or by salesperson, project tracking, etc.

To design and implement the Sales Management project is to build a software application in addition to its wide product offering, GSU Sales Management portal is designed to offer time-saving services.

Table of Content

1 Project Description

GSU Sales Management portal allows number of sales employees to create their clients information and client pipeline information and manage clients data and pipeline data and employees can easily search clients' data. Employees can easily views the clients and pipeline data and create clients and manage clients and search client data. Employees or Managers can easily create an account in Sales Management portal and they can easily search clients or manage employees users by Manager.

GSU Sales Management portal user friendly web site and time-less to search lot of clients.

Current Implementation Modules:

- **Sign Up.**
- **Sign In.**
- **Search client information**
- **Manager manages Sales Employees.**
- **View / Create / Update / Delete Clients.**
- **View / Create / Update / Delete Contacts.**
- **View / Create / Update / Delete Notes.**
- **View / Create / Update / Delete Opportunities.**
- **View / Create / Update / Delete Proposals.**
- **View / Create / Update / Delete Projects.**
- **Scheduling Proposal Report**

Sign Up:-

- New Sales Employees or Managers can easily create an account to GSU Sales Management portal.

Login:-

- Existing Sales Employees or Managers with login credentials to logged into GSU Sales Management portal to manage their own tasks.

Manage Clients:-

- View / Add / Update / Delete Clients by Sales Employees.

Manage Client Contacts:-

- View / Add / Update / Delete Client Contacts by Sales Employees.

Manage Client Notes:-

- View / Add / Update / Delete Client Notes by Sales Employees.

Manage Client Opportunities:-

- View / Add / Update / Delete Client Opportunities by Sales Employees.

Manage Client Proposals:-

- View / Add / Update / Delete Client Proposals by Sales Employees.

Manage Client Projects:-

- View / Add / Update / Delete Client Projects by Sales Employees.

Manage Sales Employees:-

- View / Add / Update / Delete Sales Employees by Sales Manager.

Search Clients:-

- Sales Employees can easily find his/her clients information using Search.

Scheduling Proposal Report:-

- Scheduling proposal report can easily find between selected dates start and end date.

Objectives

- Increase the accuracy of managing tasks of Users.
- Reduce the cost and fast performance.
- Reduce time and work to manage tasks of Users.

1.1 Competitive Information

Identify competitor products, applications, or services that this project will directly compete against, and whether your team has the potential to be the first to market this new project application or capability.

Creating effective Sales Managers has been a long-term problem for many organizations. Promoting highly effective salespeople to the role of sales manager seems to fail as often as it succeeds, and there is little documented evidence of sales managers independent contribution to organizational value.

A top-flight salesperson is presented to sales manager, but the organization soon discovers that the skills and knowledge that made this person is a top salesperson are not contributing to this person’s success as a sales manager and may, in fact, be removing this persons success. The failure to make this transition from effective salesperson to effective sales manager is in part due to some critical problems differences.

1.2 Relationship to Other Applications/Projects

Identify whether this project relates to other projects and/or other applications.

Sales Management project using 3rd party applications or Projects in future need. Right now, not relationship with other projects or applications.

1.3 Assumptions and Dependencies

Newly tasks like easier way to search clients in Sales Management portal and scheduling for clients or proposals or projects data between selected dates by Sales Managers.

1.4 Future Enhancements

Discuss any planned or possible evolution of the project. Some project will need to be delivered in phases; this will be the place to document your plan.

Future Implementation Modules:

- Improves CSS and Bootstraps with new designs.
- Reports for all clients or pipelines data.
- Scheduling for all clients or pipelines data.

1.5 Definitions and Acronyms

Acronym items should be included here. For each special term supply a definition here.

Software Requirements Specification: It’s a description of a software product, program or set of programs that performs a set of function in target environment.

Client: Potential customer or client or company accepted on the basis or his or her buying authority,
financial capacity and willingness to buy.

Contact: A Client lead is a good consumer of a product or service, created when an individual or business shows interest and provides contact information.

Opportunity: Opportunity is also an object which represents a potential deal.

Proposals: A client proposal is a written offer from a seller to a perticular buyer. Client proposals are often a key step in the complex sales process.

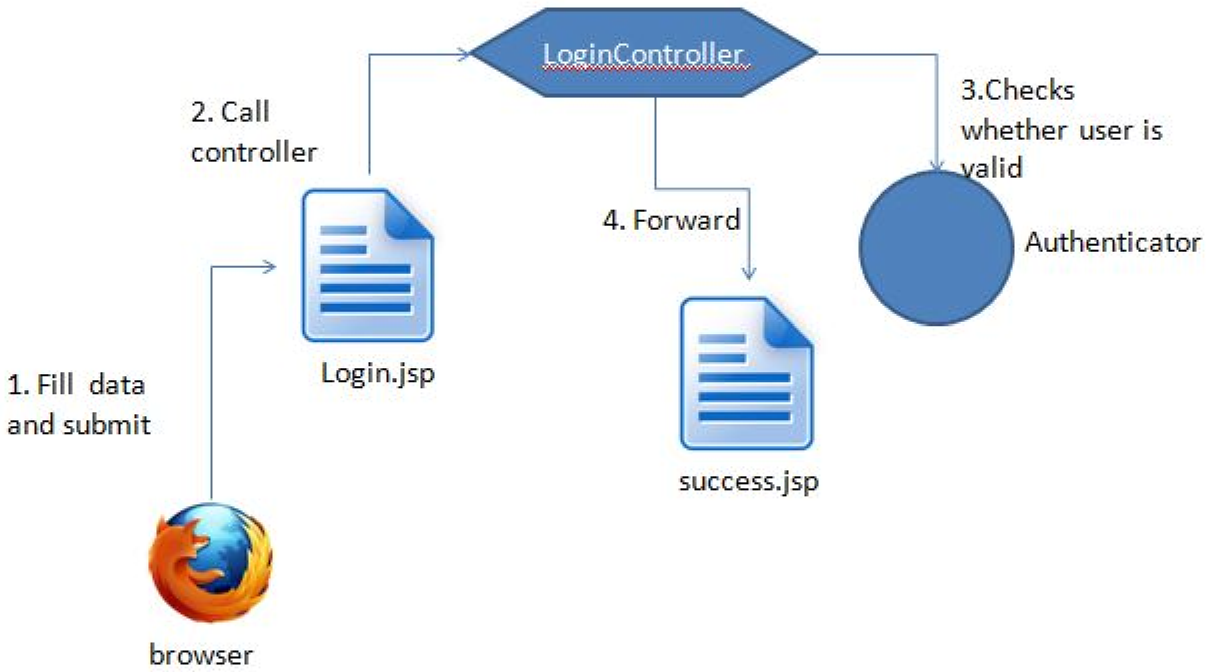
Projects: A Client project is the amount of revenue a company expects to earn at some point in the future.

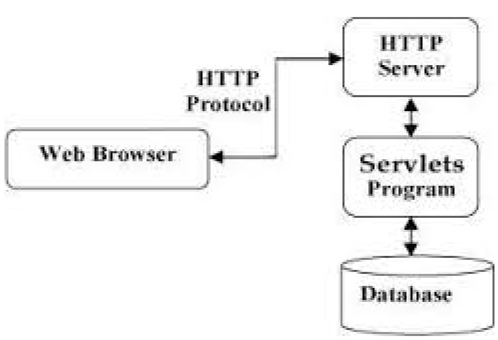
Pipeline: A pipeline is a visual representation of sales prospects and where they are in the purchasing process.

2 Project Technical Description

Give a brief overview of project design and describe the technical make-up of the project. Remember, the main reason for writing this document is to provide sufficient details for your reader and/or the developers who will implement this project. In this case, it will be your own team.

2.1 Application Architecture





In this approach, known as the Model View Controller (MVC) the original browser request/response is handled by a Servlet.

Model View Controller is a design pattern helpful separation of concerns.

- Model represents a POJO object that carries data.
- View is the layer in which the data is presented in visual format.
- Controller is the component which is responsible for communication between model and view.

A user always sees the view and communicates with the controller. We will understand this using a sample login application which will display a welcome username message and if the login fails, it will redirect to an error page. Here is what we are going to create.

- login.jsp :- this will input username and password
- myaccount.jsp :- If login is successful, then this page is displayed
- LoginController.java :- This is controller part of the application which communicates with model
- Authenticator.java :- has business logic for authentication
- Users.java:- Stores username and password for the user.

Requirements:

- Eclipse IDE
- Apache tomcat server
- JSTL jar

MVC design pattern advantages are:

- In this pattern separate presentation layer from business layer both are different layers.
- The controller performs action of invoking the model and sending data to view.
- Model is not even aware that it is used by some web application or desktop application.

2.2 Application Information flows

Provide the steps of the user process/usage for this project.

Sales Users information flows

- **Start up**

  Sales Management portal Sign In screen or Sign up screen in the home page in that the Sales users can give his/her details to create an user account to the Sales Management portal. In the Sales User portal home page shows all the user tasks like Add to Clients or Contacts etx.

- **Maintenance Clients**
  1. Sales Users can view all his/her Clients data.
  2. Sales Users can adding new Clients data.
  3. Sales Users can updating existing Clients data.
  4. Sales Users can delete existing Clients data.
- **Maintenance Client Contacts**
  1. Sales Users can view all his/her Client Contacts data.
  2. Sales Users can add new Clients Contacts data.
  3. Sales Users can update existing Clients Contacts data.
  4. Sales Users can delete existing Clients Contacts data.

- **Maintenance Client Notes**
  1. Sales Users can view all his/her Client Notes data.
  2. Sales Users can add new Clients Notes data.
  3. Sales Users can update existing Clients Notes data.
  4. Sales Users can delete existing Clients Notes data.
- **Maintenance Client Opportunities**
  1. Sales Users can view all his/her Client Opportunities data.
  2. Sales Users can add new Clients Opportunities data.
  3. Sales Users can update existing Clients Opportunities data.
  4. Sales Users can delete existing Clients Opportunities data

- **Maintenance Client Proposals**
  1. Sales Users can view all his/her Client Proposals data.
  2. Sales Users can add new Clients Proposals data.
  3. Sales Users can update existing Clients Proposals data.
  4. Sales Users can delete existing Clients Proposals data
- **Maintenance Client Projects**
  1. Sales Users can view all his/her Client Projects data.
  2. Sales Users can add new Clients Projects data.
  3. Sales Users can update existing Clients Projects data.

4. Sales Users can delete existing Clients Projects data

- **Search Clients**

1. Sales Users can search their clients easily using search functionalities and filtering.

Sales Managers information flows

- **Start up**

  Sales Management portal Sign In screen or Sign up screen in the home page in that the Sales Managers can give his/her details to create an user account to the Sales Management portal. In the Sales User portal home page shows all the manager tasks like Manager Users or Sending messages etx.

- **Maintenance Users**
  1. Sales Managers can view all Users data.
  2. Sales Managers can add new Users data.
  3. Sales Managers can update existing Users data.
  4. Sales Managers can delete existing Users data.
- **Scheduling clients proposals**
  1. Sales Managers can view all Proposals between selected dates.

2.3 Interactions with other Projects (if Any)

No Interaction with other project in Sales Management portal

2.4 Interactions with other Applications

List all possible interaction with other application, and what are needed to address these interactions.

- Find out easily Sales management data using MySql Database or Request from Browser in Servlet application.

2.5 Capabilities

Provide a list of the capabilities need to support this Project. Example: a database application must provide capabilities to support business application such as retrieving/adding/deleting/updating user data.

Sales Management portal uses MySql database for storing and retrieving pipelines or users information for using easily by users. In this we used MySql database it is open freeware source software easily creating queries and easily communicating with Java and JDBC and it can faster execution on all the queries.

2.6 Risk Assessment and Management

This section is used to identify as early as possible some of the risks that are associated with the introduction of this project. It should also contain recommendations to eliminate or minimize these risks.

In this Sales management portal project may or may not raise risks if risks comes from Database communication because MySql database working on port numbers if use that port number to other applications or anything we lost the database connection to the project.

Failures to access the risks involved in this project can be disastrous as a result of:

Damage to facilities

Damage of Database

Loss of equipment

Loss of reputation

3 Project Requirements

3.1 Identification of Requirements

This section provides a brief explanation of the use of named and enumerated requirements to identify and number requirements. For each requirement, please use the following SMART criteria as guidelines (https://en.wikipedia.org/wiki/SMART_criteria):

< GSU-Fall2016-1 User-Capability-000001>

This project must allow new users to be added, updated, or deleted by the application.

Implementation: Mandatory

Sales Management portal allows users to maintain their tasks.

< GSU-Fall2016-1 Client-Capability-000002>

This project must allow new users to be added, updated, or deleted by the application.

Implementation: Mandatory

Sales Management portal allows sales users to maintain clients.

< GSU-Fall2016-1 Contact-Capability-000003>

This project must allow new Contact to be added, updated, or deleted by the application.

Implementation: Mandatory

Sales Management portal allows sales users to maintain contacts.

< GSU-Fall2016-1 Note-Capability-000004>

This project must allow new Note to be added, updated, or deleted by the application.

Implementation: Mandatory

Sales Management portal allows sales users to maintain notes.

< GSU-Fall2016-1 Opportunities-Capability-000005>

This project must allow new Opportunities to be added, updated, or deleted by the application.

Implementation: Mandatory

Sales Management portal allows sales users to maintain opportunities.

< GSU-Fall2016-1 Proposals-Capability-000006>

This project must allow new proposals to be added, updated, or deleted by the application.

Implementation: Mandatory

Sales Management portal allows sales users to maintain proposals.

< GSU-Fall2016-1 Projects-Capability-000007>

This project must allow new projects to be added, updated, or deleted by the application.

Implementation: Mandatory

Sales Management portal allows sales users to maintain projects.

< GSU-Fall2016-1 Scheduling-Capability-000008>

This project must allow managers to schedule proposals between selected dates.

Implementation: Mandatory

Sales Management portal allows managers to schedule proposals between selected dates.

< GSU-Fall2016-1 Search-Capability-000009>

This project must allow Sales users to be searched clients.

Implementation: Mandatory

Sales Management portal allows sales users to search own clients.

3.2 Operations, Administration, Maintenance and Provisioning (OAM&P)

This is section to describe the capabilities/requirements you will be providing for your user or customer to administrate and maintain the usage of your project. (e.g., user data backup, fault recovery, routine maintenance ………)

Sales Management portal not used any backup data and fault tolerant issues and routine maintenances with MySQL. In Future it needs to create database backup using CDs or Dvds or excel or xml files to store all the Sales Management pipelines data and users data.

3.3 Security and Fraud Prevention

Replace this section with description and requirement to address possible internal and external security issues.

Hackers can hack the project from outside in this project we should write queries are in Java JDBC used Prepared Statements these are eliminating injections or hackers to hack this project do not effect to the database or any data.

3.4 Release and Transition Plan

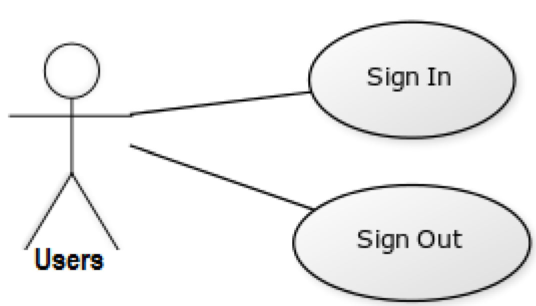
Explain how the project will be deployed to customer, or update from current release to newer release.

Sales Management portal can easily integrate on any operating system with any type of operating software like windows or Linux or OS Mac Book because we developed this software on Java so Java can run anywhere on this world once write.

This project can easily integrate with any other projects or any system and feasibility will be examined to this project with any other platforms.

4 Project Design Description

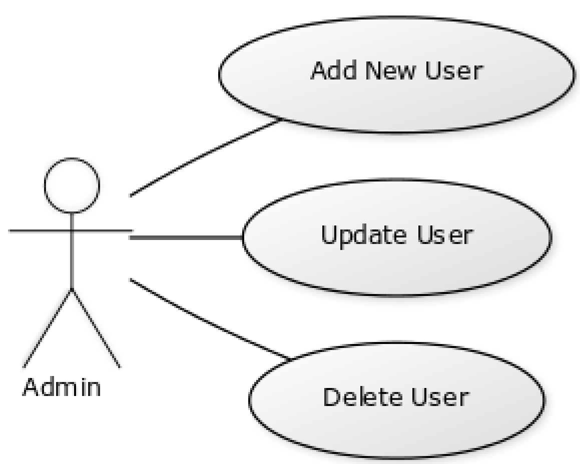
User case diagram for Sign In and Sing Out Users.



Use Case	**Sign in**
Usecase Description	Users can access as an valid user either Managers / Sales Users
Actors	Users
Events Flow	1. Users want to Sign In to the Sales Management portal. 2. Users select to Sign 3 Users enter their valid credentials of accounts 4. This project tests the credentials and can able to access to this project or shows error message.
Pre Conditions	Users has previously be set up in the system
Post Conditions	Users are authorized to the portal if requirements and exceptions are meet.
Exceptions	Username and password do not match shows error messages.

Use Case	**Sign out**
Use case Description	Remove Users access from the Sales Management Portal
Actors	Users
Events Flow	1. Users want to logout using the system logout option. 2. Users select log out. 3. System logs out the Users.
Pre Conditions	Users is currently on the system
Post Conditions	
Exceptions	There must be a Users authorized before can be logged out.

Manage Users user case diagram



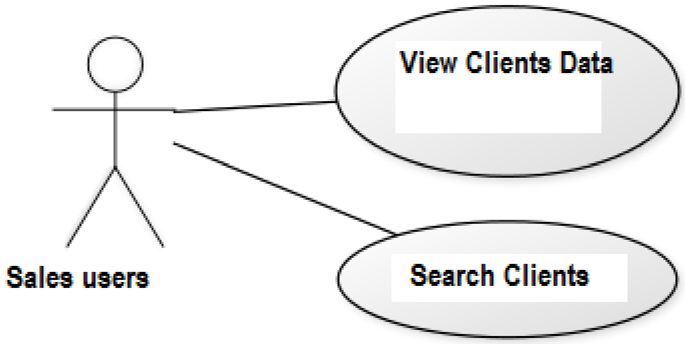
Use Case	**Add Sales User**
Usecase Description	Add user information for a new user to the Sales Management

	portal when a new user arrives in the system. For the new user userName and email and password only.
Actor	Manager
Events Flow	1. A new user arrives in to the portal. 2. Manager selects add a new user option 3. Manager enters information about the new user 4. Manager saves the user information
Pre Conditions	Manager has be authorized to the system
Post Conditions	User is added to system if requirements are meet.
Exceptions	Cannot add if already have same username account of users

Use Case	**Update Sales User**
Usecase Description	Update the existing user in the system. This happens when a correction is required or updates required.
Actor	Manager
Events Flow	1. A change or update of any one field in User information is detected. 2. Manager selects an update a user option. 3. Manager selects user to update user information. 3. Manager enters information about the user. 4. Manager selects to update the user.
Pre Conditions	Manager has be authorized in the system
Post Conditions	Existing user is updated if requirements and updates are met.
Exceptions	Validation must validated for few fields such as first name and last name when update the user.

Use Case	**Delete Sales User**
Usecase Description	Delete the information for an existing User.
Actor	Manager
Events Flow	1. User is find out that needs deletion. 2. Manager selects to delete a user option. 3. Manager selects user to delete. 4. Manager deletes user.
Pre Conditions	Manager has be authorized in the system
Post Conditions	User is deleted from database if requirements and exceptions are met.
Exceptions	Cannot delete user information when exception occurs.

Search Event use case diagram



Use Case	**Search Clients**
Use case Description	Sales Users search their clients or view their clients data
Actor	Sales Users
Events Flow	1. A search or view clients of user using search option. 2. Users select search a client and view clients data in search results page.
Pre Conditions	Users and Clients information has be authorized in the system
Post Conditions	Search Client and View Clients if requirements are meet.
Exceptions	No data found if search client data not matched.

2. CLASS DEFINITIONS:

Users

Users class defines the list of Users and their attributes.

Attributes Summary

Name
userid
firstname
lastname
username
password
email

Name
userrole
addeddate
deleteflag

Clients

Clients class defines the list of Clients and their attributes.

Attributes Summary

Name
clientid
userid
telephone
fax
address
city
state
zipcode
country
division
type
industry
website
source
companydescription
addeddate
deleteflag

Contacts

Contact class defines the list of Contacts and their attributes.

Attributes Summary

Name
contactid
clientid
firstname
lastname
title
workphone
mobilephone
fax
enews
email
addeddate
deleteflag

Notes

Notes class defines the list of Notes and their attributes.

Attributes Summary

Name
noteid
clientid
notes

Opportunities

Opportunities class defines the list of Opportunities and their attributes.

Attributes Summary

Name
opportunitiesid
addedid
opportunitiesname
chancestoclose
estimatedbudget
opportunityduration
opportunitytype
contactname
contacttelephone
opportunitydescription
opportunitynotes
addeddate
deleteflag

Proposals

Proposals class defines the list of Proposals and their attributes.

Attributes Summary

Name
proposalsid
addedid

Name
proposalname
accountmanager
createdate
chancestoclose
estimatedbudget
proposalduration
proposalamount
totalrevenue
proposalstatus
rejectionreason
contactname
contacttelephone
proposaldescription
proposalnotes
deleteflag

Projects

Projects class defines the list of Projects and their attributes.

Attributes Summary

Name
projectid
addedid
projectname
projectmanager
addeddate
projectamount
totalrevenue

Name
projectduration
projectstatus
launchdate
contactname
contacttelephone
projectdescription
projectnotes
deleteflag

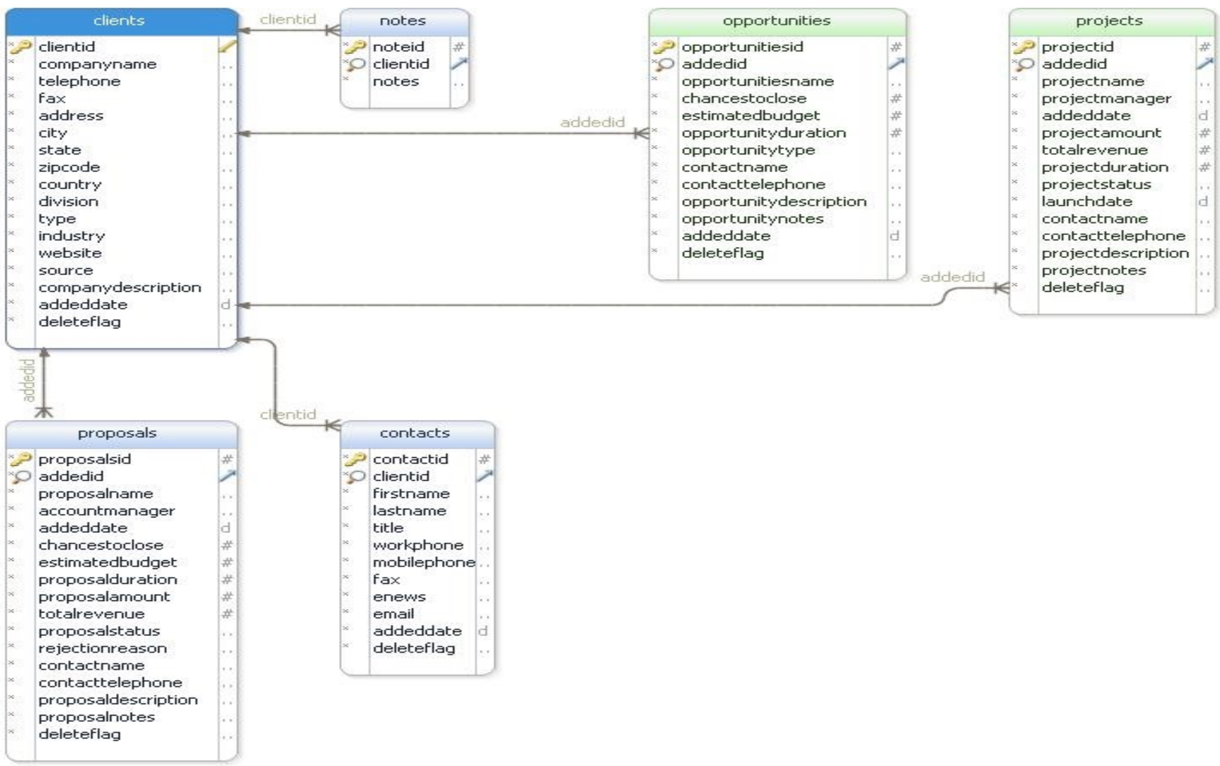
Messages

Messages class defines the list of Messages and their attributes.

Attributes Summary

Name
messageid
comments
message
addeddate
deleteflag

Database Design



.

Tables:

create table users(userid INT NOT NULL AUTO_INCREMENT,
  first name varchar (100) not null,
  last name varchar (100) not null,
  username varchar(50) not null unique,
  password varchar(15) not null,
  email varchar(75) not null,
  userrole varchar(100) not null,
  addeddate date not null,
  deleteflag varchar(1) not null,
  PRIMARY KEY (userid));

create table clients(clientid INT NOT NULL AUTO_INCREMENT,
  userid int not null,
  companyname varchar(100) not null,

```
  telephone varchar(10) not null,
  fax varchar(10) not null,
  address varchar(150) not null,
  city varchar(50) not null,
  state varchar(25) not null,
  zipcode varchar(10) not null,
  country varchar(10) not null,
  division varchar(25) not null,
  type varchar(50) not null,
  industry varchar(50) not null,
  website varchar(25) not null,
  source varchar(25) not null,
  companydescription varchar(500) not null,
  addeddate date not null,
  deleteflag varchar(1) not null,
  FOREIGN KEY (userid) REFERENCES users (userid),
  PRIMARY KEY (clientid));

create table contacts(contactid INT NOT NULL AUTO_INCREMENT,
  clientid int not null,
  firstname varchar(25) not null,
  lastname varchar(25) not null,
  title varchar(25) not null,
  workphone varchar(10) not null,
  mobilephone varchar(10),
  fax varchar(10) not null,
  enews varchar(50) not null,
  email varchar(50) not null,
  addeddate date not null,
  deleteflag varchar(1) not null,
  PRIMARY KEY (contactid),
  FOREIGN KEY (clientid) REFERENCES clients (clientid));

create table notes(noteid INT NOT NULL AUTO_INCREMENT,
  clientid int not null,
  notes varchar(250) not null,
  PRIMARY KEY (noteid),
  FOREIGN KEY (clientid) REFERENCES clients (clientid));

create table opportunities(opportunitiesid INT NOT NULL AUTO_INCREMENT,
  addedid int not null,
  opportunitiesname varchar(500) not null,
  chancestoclose int not null,
  estimatedbudget int not null,
  opportunityduration int not null,
  opportunitytype varchar(50) not null,
```

```
  contactname varchar(100) not null,
  contacttelephone varchar(10) not null,
  opportunitydescription varchar(250) not null,
  opportunitynotes varchar(150),
  addeddate date not null,
  deleteflag varchar(1) not null,
  PRIMARY KEY (opportunitiesid),
  FOREIGN KEY (addedid) REFERENCES clients (clientid));

create table proposals(proposalsid INT NOT NULL AUTO_INCREMENT,
  addedid int not null,
  proposalname varchar(500) not null,
  accountmanager varchar(50) not null,
  createdate date not null,
  chancestoclose int not null,
  estimatedbudget int not null,
  proposalduration int not null,
  proposalamount numeric(18,2) not null,
  totalrevenue numeric(18,2) not null,
  proposalstatus varchar(25) not null,
  rejectionreason varchar(50) not null,
  contactname varchar(100) not null,
  contacttelephone varchar(10) not null,
  proposaldescription varchar(250) not null,
  proposalnotes varchar(150),
  deleteflag varchar(1) not null,
  PRIMARY KEY (proposalsid),
  FOREIGN KEY (addedid) REFERENCES clients (clientid));


create table projects(projectid INT NOT NULL AUTO_INCREMENT,
  addedid int not null,
  projectname varchar(500) not null,
  projectmanager varchar(50) not null,
  addeddate date not null,
  projectamount numeric(18,2) not null,
  totalrevenue numeric(18,2) not null,
  projectduration int not null,
  projectstatus varchar(50) not null,
  launchdate date not null,
  contactname varchar(100) not null,
  contacttelephone varchar(10) not null,
  projectdescription varchar(250) not null,
  projectnotes varchar(150),
  deleteflag varchar(1) not null,
  PRIMARY KEY (projectid),
```

FOREIGN KEY (addedid) REFERENCES clients (clientid));

create table messages(messageid INT NOT NULL AUTO_INCREMENT,
comments varchar(500) not null,
message varchar(750) not null,
addeddate date not null,
deleteflag varchar(1) not null,
PRIMARY KEY (messageid));

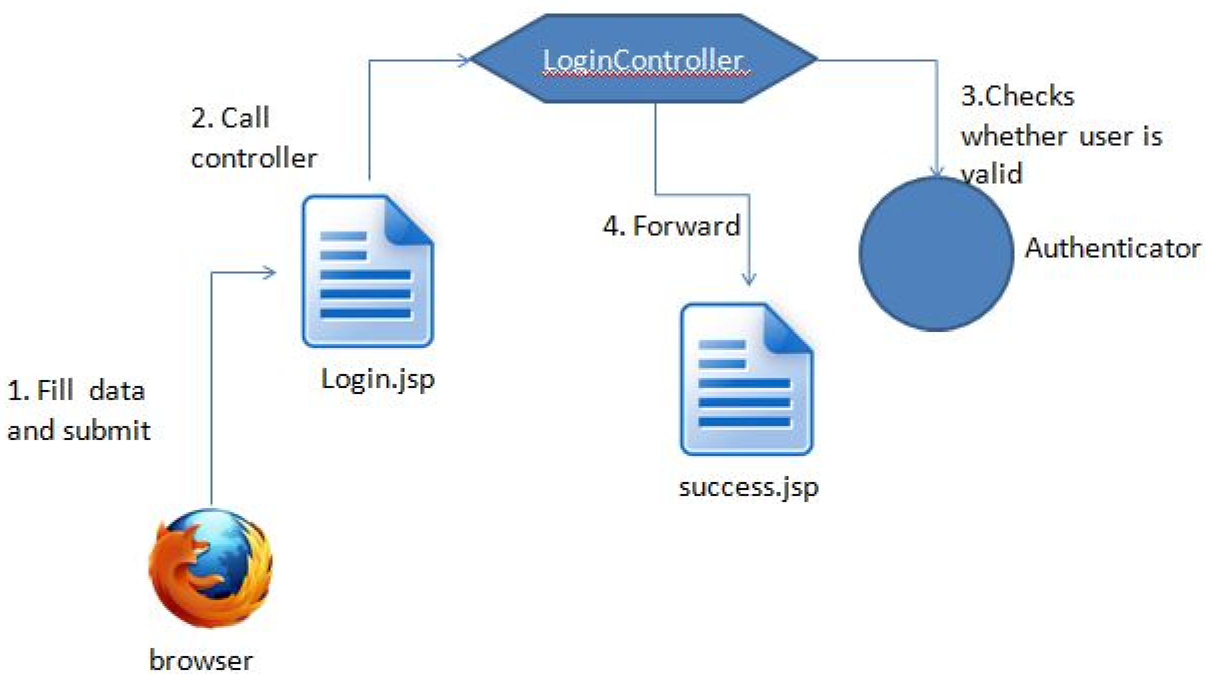
5 *Internal/external Interface Impacts and Specification*

Internal / External INTERFACE SPECIFICATIONS

This project allows the Sales/Manager user to select their tasks.

6 *Design Units Impacts*

Replace this section with a list of the impacted design units (functional areas). For new products this would be a list of all new functional areas and would therefore describe the new system architecture. However it is done, the design should clearly reflect how the design units fit together to define the project. Each functional area (or design unit) should have its own subsection below. If there are no known impacts to a given functional area, then that should be explicitly stated. For your project, it could be only one design unit that will covers all requirements, or you could have multiple design units (e.g., onefor web interface, one for your application, and one for maintenance processetc.).



6.1 Functional Area A/Design UnitA

6.1.1 Functional Overview

Replace this section with a brief overview of the impacts to the functional area.

Functional Requirements

1. **Sales Management Users**
    1. userid
    2. firstname
    3. lastname
    4. username
    5. password
    6. email
    7. userrole
    8. addeddate
    9. deleteflag

2. **Clients**
    1. clientid
    2. userid
    3. telephone
    4. fax
    5. address
    6. city
    7. state
    8. zipcode
    9. country
    10. division
    11. type
    12. industry
    13. website
    14. source
    15. companydescription
    16. addeddate
    17. deleteflag

3. **Contacts**
    1. contactid
    2. clientid
    3. firstname
    4. lastname
    5. title
    6. workphone
    7. mobilephone
    8. fax
    9. enews
    10. email

11. addeddate
12. deletefield

4. Notes

1. noteid
2. clientid
3. notes

5. Opportunities

1. opportunitiesid
2. addedid
3. opportunitiesname
4. chancestoclose
5. estimatedbudget
6. opportunityduration
7. opportunitytype
8. contactname
9. contacttelephone
10. opportunitydescription
11. opportunitynotes
12. addeddate
13. deleteflag

6. Proposals

1. proposalsid
2. addedid
3. proposalname
4. accountmanager
5. createdate
6. chancestoclose
7. estimatedbudget
8. proposalduration
9. proposalamount
10. totalrevenue
11. proposalstatus
12. rejectionreason
13. contactname
14. contacttelephone
15. proposaldescription
16. proposalnotes
17. deleteflag

7. Projects

1. projectid
2. addedid
3. projectname
4. projectmanager

5. addeddate
6. projectamount
7. totalrevenue
8. projectduration
9. projectstatus
10. launchdate
11. contactname
12. contacttelephone
13. projectdescription
14. projectnotes
15. deleteflag

8. Messages

1. messageid
2. comments
3. message
4. addeddate
5. deleteflag

9. **Control access to all management functions (maintenance**)
    1. Sales Management system can easily find out specific user either Sales users / Sales Managers in User table user role option defined.
    2. Ensure the Sales Users Sign in is who they say they are one password is sufficient

10. **Functional requirement languages Databases, jsps , htmls, css, bootstraps ,Javascript, Java , Servlets.**

Non-Functional Requirements

- Usability
    - The system must be easy to use so that the Sales users can manage their tasks.
- Reliability
    - The system must be highly reliable since, if the system is not available.

- Performance
    - All tasks should be performed in less than 1 second.
    - All functionalities should be performed in less than 1 second.

- Supportability
    - The system will be able to automatically install updates received from the software development team.

- Training
    - The system should provide on screen help.
    - The system should come with live demo documentation.

- Internet connections are required
- Pentium iii/iv
- 20 GB Hard disk , 64-128 MB RAM
- Network interface card.

Target Environment

The system must normally function on a standalone Windows 10 based PC with 4G of memory and 200 GB hard drive.

Software Requirements:

Technical Languages:	Java , Servlets, JDBC
Web application Language	Javascript , Ajax , Html, CSS , Bootstraps, Jsps
Operating Systems:	All Window, Linux, Max book
Databases Server:	MySql 5.0 +
Application Server	Apache Tomcat Server 6+
Tools/IDE :	Eclipse SDK

6.1.2 Impacts

Replace this section with the description of the project impacts on this functional area. If there are no known impacts, state that accordingly. Sufficient detail should be provided to allow for developers to change functional area documentation as well as the associated software or hardware design.

HARDWARE REQUIREMENTS:

Operating System Processor	: Intel or AMD or Pentium or any processor with a speed of 2.1 GHz
Operating System Hard Disk	: 40 GB at least or mote
Operating System Monitor	: Color Monitor
Operating System I/O devices	: Keyboard and Mouse
Operating System RAM	: 256MB +

6.1.3 Requirements

Functional Requirements

1. **Sales Management Users**
    1. userid
    2. firstname
    3. lastname
    4. username
    5. password
    6. email
    7. userrole
    8. addeddate
    9. deleteflag

2. **Clients**
    1. clientid
    2. userid
    3. telephone
    4. fax
    5. address
    6. city
    7. state
    8. zipcode
    9. country
    10. division
    11. type
    12. industry
    13. website
    14. source
    15. companydescription
    16. addeddate
    17. deleteflag

3. **Contacts**
    1. contactid
    2. clientid
    3. firstname
    4. lastname
    5. title
    6. workphone
    7. mobilephone
    8. fax
    9. enews
    10. email

11. addeddate
12. deleteflag

4. Notes

1. noteid
2. clientid
3. notes

5. Opportunities

1. opportunitiesid
2. addedid
3. opportunitiesname
4. chancestoclose
5. estimatedbudget
6. opportunityduration
7. opportunitytype
8. contactname
9. contacttelephone
10. opportunitydescription
11. opportunitynotes
12. addeddate
13. deleteflag

6. Proposals

1. proposalsid
2. addedid
3. proposalname
4. accountmanager
5. createdate
6. chancestoclose
7. estimatedbudget
8. proposalduration
9. proposalamount
10. totalrevenue
11. proposalstatus
12. rejectionreason
13. contactname
14. contacttelephone
15. proposaldescription
16. proposalnotes
17. deleteflag

7. Projects

1. projectid
2. addedid
3. projectname

4. projectmanager
5. addeddate
6. projectamount
7. totalrevenue
8. projectduration
9. projectstatus
10. launchdate
11. contactname
12. contacttelephone
13. projectdescription
14. projectnotes
15. deleteflag

8. Messages

1. messageid
2. comments
3. message
4. addeddate
5. deleteflag

9. **Control access to all management functions (maintenance**)
    1. Sales Management system can easily find out specific user either Sales users / Sales Managers in User table user role option defined.
    2. Ensure the Sales Users Sign in is who they say they are one password is sufficient

Functional requirement languages Databases, Javascript, Java , Servlets , Jsps, CSS , HTMl.

6.2 Functional Area B/Design Unit B

- SignUp :
  The Sales Management users has to Sign up to Signing the in to portal system. The user has to provide Username details to get registered. Once the details are submitted to the system checks whether user already exist or not and Signup the user with an account can able to access the system.

- Sign In :
  The user has to Signing to have access the system by providing his/her User Name and Password. Once the user has logged in, the user can view their tasks.

- Sales Management Portal :
  The system is a web application portal

- Manager :
  Manager can manages sales users and sending messages to sales users.

- Sales Users :
  Users can view their clients and client pipeline data.

6.2.1 Functional Overview

7 Open Issues

This section should be part of the document only when the document is in a draft form

- Not maintaining correct Sql written records.
- Not monitoring progress closely
- This Project running over time

8 Acknowledgements

This section must include a reference to prior authors, etc. and others who have assisted in the generation of this document.

First of all I would like to take this opportunity to thank the Governors State University for having projects as a part of the MS curriculum. Many people have influenced the shape and content of this project, and many supported me through it. I express my sincere gratitude to Professor for assigning me a project on Sales Management, which is an interesting and exhaustive subject

He has been an inspiration and role model for this topic. Her guidance and active support her made it possible to complete the assignment

9 References

Java Brains in youtube by author Kaushik

Javatpoint http://www.javatpoint.com/

Tutorialspoint https://www.tutorialspoint.com/

10 Appendices

List all appendixes here.