Group - 12

1.Identify all the stakeholders and users of the systems. Enlist all features of the LIC Market-Driven system by each user of the system, in the form of user stories. Can you prioritize them using the requirement prioritization techniques? (e.g., AHP, Numerical Assessment, MoSCoW method, etc.) How? Provide details.

Stakeholders:

- LIC company
- Customers
- Agents

Features:

We have used MoSCoW technique to prioritize the requirements.

1. LIC company:

- As an insurance company I must consolidate insurance packages to be displayed so that customers can view and understand our packages.
- As an insurance company I should be able to display current market packages so that customers can compare our packages to others and see the best(which is ours!).
- As an insurance company, I must want my customers to be able to suggest ideas for packages so that we get good ideas as well as customer satisfaction.

2. Customers :

- As a customer I hope that the system could be available all the time so that I can use it whenever I want.
- As a customer I must be able to create an account so that I can view my profile and my currently active package.
- As a customer I should be able to make my own packages so that I can have the satisfaction of having things my way.
- As a customer I would want to be able to have the best premium value so that my future is secured and money is invested properly.
- As a customer I should be able to view suggestions and competitive curated packages supplied by the website itself.
- As a customer, I want that the system could send the review of my policy as fast as possible so that I have quick feedback.

3. Agents:

- As an agent , I must have an account in the system so that I can be able to book packages for my clients.
- As an agent I should be able to view all packages' details so that I can keep my clients updated.

2. Prepare a list of market-facing technologies helpful for this project. According to you, would marketfacing technologies be helpful in the proper deployment of the product? Why?

Since the product is displaying insurance packages directly to the consumers the mode of selling can be called Business to Consumer (B2C) model. In a B2C model, a website plays an interesting role. This website eliminates the role of the salesperson and the website itself behaves like the salesperson. To establish trust between the customer and the business, it is very important to have a secure payment gateway when purchasing policies. A good machine learning based model for user curated packages and suggested packages would be helpful to the users to get the packages of their choice and will help increase the sales of the company.

A better UI with attractive offers displayed at the right places which do not seem overwhelming can be implemented. Principles of Human Computer Interaction (HCI) would help here.

It is very important to keep the consumer updated about his/her policies, so sending out newsletters, policy updates and various important messages on time using auto-generated emails would be a good technology to add.

3. Suggest an effective requirement engineering framework that can be used in market-facing projects because there are no existing systems that can be analyzed for the development so we need to consider all requirements from the core.

Ans:

We can use Agile-Model as a requirement engineering framework in this case as we don't have any existing system that can be analysed in order to figure out all the requirements from the core. We can add some features and release the version after each iteration. The stages of the entire requirement analysis process can be stated as:

- Figure out and develop a complete set of requirements.
- Interview the stakeholders and figure out what they exactly need.
- Review and refine our set of requirements with what we gathered from the interviews.
- Review these set of requirements before each iteration and validate them before proceeding to the design phase.

4. List out the possible features those are not feasible to consider. Can you provide justification for each of them in detail?

Ans:

It is possible to suggest various packages at competitive rates by fetching packages from different insurance companies' websites using web scraping technologies. After scrapping these packages available in the market, machine learning models can be used to suggest computerised curated packages having attributes taken from all the best-selling insurance packages in the market and predicting a competitive price for the package. However, the predicted price for the package might be very low to make it competitive and might end up incurring a loss to the company. A human presence is required to monitor such curated packages and to make sure that these packages don't damage the company instead of benefiting the company. This is one possible feature yet not feasible.

5. Let us assume that the customized package developed by the customer (using your second product) is similar to the package available in your pre-defined package. What is the possible reason behind this defect? How can it be ensured that this would not happen? In which requirements engineering activity, this defect can be handled? Please provide a scenario to justify.

As a customer requests a customized package, the system is not checking it against all existing packages. So this kind of defect arises. System must assure that the requested package by the customer is not already available. AGILE methodology can handle this defect, because one can add new functionalities and remove defects in each version and we can handle this in sprint review.

6. Identify three different use cases where the conflicts between the requirements occur? Do you think that the conflicts can be resolved? How?

a) If a customer chooses a package then the system will analyze and give feedback if needed, then the system will show the cost of that package but sometimes that cost will be high and if the customer wants a low price, then this will occur as a conflict which cannot be resolved.
b) If a particular customized package is deemed to be infeasible, then there would be conflicts in the company's and customer's requirement.
   Solution: We can have some degree of imitation from the user's side in terms of customizing the packages.
c) The automated pricing may have multiple edges which can make the price inaccurate and unfair in these particular cases. Solution could be we can all such scenarios should be covered.

7. Considering the set of features you have identified, what are the non-functional aspects associated with this system? Explain rationale behind the selection of each of them.

a) Reliability:- It should have a backup of the database which is continuously maintained and updated to reflect the most recent changes.

b.) Privacy:- Data of customers should not be leaked.

c) Authentication:- customers can request policies only after verification of his/her documents.

d.) availability: system should be available for 24/7.

e) Performance:- system should respond within few seconds of time.

f) Scalability:- system should support a large number of users at any time.

g) Security:- The password of customers must be stored using hash-keys, not directly.

8. Can there be 'Open Issues'- issues those are identified but not taken care of? If yes, what are they? Are there some alternative ways for their resolution, such that no requirements conflict will happen?

Degree of customizability is an open issue. We haven't decided what are the things in a package that customers can customize like insurance amount, type of insurance, maturity time, expiry date of insurance, number of people having the insurance.

Additional question : -How do the requirements of the similar systems (other similar applications) match with the system under study here.

For a music app(like spotify,ganna) we can create our own playlist or use inbuilt playlists. This feature is similar to our system as we can create our own packages and also it has inbuilt packages