- ❖ Consider about a "**Travel Guide**" website which help visitors from different countries to have some suggestions and preferences to make some choice on selecting visiting places all over the world. Generally, the website will be enriched with the information's regarding different sight-seeing and visiting places and the users will be able to get necessary messages to choose their desired vacation places. The required features so far are: -
  - There will be three types of users- ADMIN, SCOUT and General USER.
  - All types of users must be able to register into the website.
  - Only verified and registered users will get access to the detailed web site.
  - Allow a profile page for all users so that they can update their personal information's.
  - **ADMINS** will be able to add new or remove existing users (**SCOUT** & General **USER**) profile. In other words, **ADMIN** will be the main controlling point of the site.
  - **SCOUT**s will be assigned, for collecting information's from different countries about different visiting places including costs, travel medium etc. So, there will be a page for **SCOUT**s where they will be able to create a post request to the admin for publishing it to the website. In the same page they will be able to process the post by adding their collected information's.
  - Place information's must include a short history and country representation.
  - Only **ADMIN** will be able to make the information post available, delete and update it. The **SCOUT**s may request for changes.
  - The General **USER**'s will be able to see the published post in the site. They must be able to view the detailed information about the places.
  - The **USER**s must be able to search places within the site. Filtering on the basis of country, genre, cost must be available.
  - The **USER**s will be facilitated with a "**checklist**" option to put the choices on their Wishlist.
  - The **USER**s will be able to get a probable cost information.
  - The **USER**s can post comment on every information post and The **ADMIN** will be able to remove them.
  - In case of non-registered **USER**s only a simple home page will be shown to them.
  - USERs must be able to remove existing or add new choices to their checklist.

- ❖ Think about an "Online Computer Shop" where different peripherals/components of Personal Computers will be shown along with detailed manufacturing information's and price. The users will be able to browse through the site, view different components and add products to cart based on their own choices along with the selection of payment method. The required features are: -
  - There will be two types of user- **ADMIN** and **CUSTOMER**.
  - There must be a register page for both **ADMIN** and **CUSTOMER**.
  - The valid **USERS** will be able to log into the system.
  - The **ADMIN** will be the main controlling point of the system.
  - There will be a simple home page showing the available components category on a bar and using that **USERS** will be able to navigate to their desired product page.
  - Some featured components information will be shown on the home page.
  - There will be various types of component available within the site. So different pages must be available for them (Example: Ram, Casing, Storage, Monitor, Graphics Card etc).
  - Every component page will show the name, small manufacturer review and price of the concerning component.
  - Under every category there may be sub-category based on the title (Example: under the Storage category there may be Permanent storage like Hard Disk drive and SSD and Portable storage like Portable Hard Disk, Pen drive etc).
  - There will be many Brands and Vendors under every category or subcategory. Like monitor may be available from ASUS, LG, DELL etc companies.
  - Customers must be able to see their selected results based on either category or sub-category or brand depending on the option they have clicked. For example, if the customer had clicked on the only Ram category it will show all the products from all sub-category and brands.
  - Customers must be able to search any products within the site from a search box.
  - Customers must be facilitated with some search filtering option. They must be able to narrow down search result based on criteria like price etc.
  - There will be a review section open under every product where the customers can make review. The review section will require the name and comment field.
  - The customer will be able to choose components from different categories and add them to cart. This time the corresponding rice will be shown to them.
  - During the product addition in the cart, customers must be able to select the payment method like cash on delivery, online wallet etc.
  - Only the **logged in customers** can post a review and order components.
  - The admin will be able to remove any customer and their reviews.

- ❖ Consider a "Online Food Blog" where there will be identity of many restaurants along with their wide range of food items. The viewers will get to know many restaurants, get familiar with many dishes and would be able to post reviews about those items belong to some restaurants. The required features will be: -
  - The system will have three types of users- **ADMIN**, **MEMBER**, **VISITOR**
  - There must be a registration page for the users ADMIN and MEMBER.
  - Only valid ADMIN and MEMBER can log into the blog.
  - There must be a **profile** page for both ADMIN and MEMBER where they will be able to update their personal information.
  - ADMIN will be the main control point of the system means ADMIN can remove any MEMBER and their profiles.
  - Only the ADMIN panel will hold the authorization permit to update the blog information's.
  - ADMIN will add the restaurants information and the menus they provide.
  - There must be separate pages for every restaurant.
  - There will be many items available under one restaurant and clicking on each item will navigate towards a sperate details page.
  - The ADMIN can add new, delete or update existing restaurants information.
  - The restaurants information must include location and a short background along with goals.
  - The MEMBER will be able to browse through the blog. They can view the restaurants information's along with food item.
  - There will be a generalized home page from where the MEMBERs will start browse and search option must be provided.
  - The search option must have some filtering properties. The MEMBERs should be able to search restaurant on the basis of location, area etc properties.
  - The MEMBERs will be able to post review about restaurants and food items. Under every food item page there will be a section where the MEMBERs will be able to comment short reviews on that item. ADMIN will hold the capabilities to remove comments from here.
  - There will be a separate page named as "Food Experience". On this page, both the MEMBERs and ADMINs will be able to post a descriptive review about a restaurant or about a food item or both. Under there must be a comments section where other valid users can comment.
  - Once navigated to this "Food Experience" page, the valid users will be able to see all the published post.
  - The ADMIN will hold the option of removing posts and comments from "Food Experience" page.
  - The VISITOR type of users will only be able to see the simplified home page, the restaurants information's and food items and the food experience blog. But they cannot post review or any type of comment. In a word the VISITORs are most general viewer and will get the basic view permission.

- ❖ Let us think about a general "FTP Server" that will be used for an Internet Service Provider (ISP). Normally, the ISP's try to facilitate their users by ftp servers, where several media contents are present to fulfill customer's needs. The required features are: -
  - The system will have three types of users- **ADMIN**, **MODERATOR**, **MEMBER** (generally service users)
  - There must be a registration page for ADMIN and MODERATOR.
  - Only valid users will get detailed access to the ftp server.
  - Keep in mind; general users, means MEMEBRs need not to be registered. The internet service users will get access to browse and download contents from the ftp site.
  - The ADMIN will be the main control point of the system. The ADMIN can add or delete any MODERATOR. The ADMIN also can upload or delete contents.
  - The MODERATOR can only add or delete media contents and view all uploaded contents.
  - Provide functionalities for MODERATOR so that he can add new contents or delete existing one's after login. This can be controlled on a separate page for MODERATOR.
  - There should be a profile page for MODERATOR and ADMIN.
  - There must be a general **home page** from where navigation to other pages will occur. Some highlighted contents will be shown here.
  - In the site there will be several categories of media contents like Movies, Software's, TV series, Games etc. All these categories will be shown in a tab from where users will be able to navigate to their desired page.
  - Under some category there may be sub-category. For example, under movie section there may be different genre's movie. So, the division and subdivision should be properly maintained.
  - Contents will be shown to users as per the interaction. For example, if the user has clicked on TV Series category it will show him/her all contents of that category and if English sub-category is selected results will be shown as filtered by the selection.
  - There must be a search box in the home page from where MEMBERs will be able to search directly for contents.
  - There should be a **request box** where the MEMBERs will be able to make content request. It must be placed on the home page.
  - Both the MODERATOR and ADMIN can view the request box.

- ❖ Let us think about a "Online Car Rent" system which will actually help to rent car for different purposes. There will be a wide variety of cars available to fulfill customers requirements. The required features are: -
  - There will be two main types of users- **ADMIN** and **MEMBER**.
  - There must be a register page for both users.
  - Only valid users will get access to the system or log into the system.
  - There must be a profile page for both users where they will be able to update information's about themselves.
  - The ADMIN will be the main controller of the system. Only ADMIN will post different car availability on the site and other cost related information's.
  - ADMIN can delete any existing MEMBER.
  - There will be a generalized home page where some featured car and other related information will be shown. After login this will be first page the MEMBERs will see. Other navigation options should be available from the home page.
  - There must be option for adding new car information's and delete existing ones.
  - Along with car information a related cost must be allocated.
  - Cars should be categorized by their types like Private cars, Microbus, Pick-up etc.
  - Options should be available to browse through categories.
  - MEMBERs must be able to browse and view the car information's, costs and they also be able to browse by categories.
  - There must be an order page or functionality for the MEMBERs. Through this the users will be able to choose their desired car for rent.
  - After the selection of car, the users will be shown an invoice regarding the probable cost for that car rent. This invoice should contain both 'cancel' and 'finalize' properties.
  - If the MEMBER finalizes the car deal, he/she will be directed to the payment section directly where he can choose the payment method. ADD all currently available payment systems.
  - There will be rental history field in each MEMBERs profile where they will be able to see their previous transactions with this site.
  - Provide a separate page for ADMIN from where ADMIN will see all rent order history and related user.
  - Allow a 'Blog' page to be navigated from the home page where the MEMBERs can post their experience with the usage of this site. It is not necessary that the post will have comment section.
  - Show all posted blogs in a block manner.
  - Both ADMIN and MEMBER can view all the posts.
  - A MEMBER can delete a post made by himself.
  - An ADMIN can DELETE anyone's post.

- Consider about an "Online Book Store" where there will be various types of books available for the customers. The customers will get the option of browsing through the site, look for many books and add books in the cart as per their choice. The required features are: -
  - There will be two main types of users- **ADMIN** and **CUSTOMER**.
  - A register page should be available for both users.
  - Only valid and registered users will be able to log into the system.
  - Keep a profile page for both users. There they will be able to update their information's.
  - The ADMIN is the main controller of the system. He will observe and perform all sorts of possible maintenance of the site.
  - The ADMIN will be able to remove any existing CUSTOMER from the system.
  - The ADMIN will be able to see all registered users (CUSTOMER and other ADMIN)
  - Only the ADMIN will add book names and other information's regarding books on the site and the book order will be processed only by ADMIN.
  - There will be book of various categories like, Novel, Literature, Sci-Fi etc. Different categories of books must be provided in sperate selection panel so the user can choose from different categories.
  - All these categories will be shown on a simple home page. Some other navigation can be performed from home page.
  - Along with every book there must be some price and author's information should be available.
  - There must be a short description about every book available in their respective pages.
  - Customers will be able tom browse all categories and purchase them.
  - After entering into a separate page for a single book there must be an option for adding that book in the shopping cart(virtual).
  - The cart will store every book name along with the price. The user can add more than one books in the cart during there browsing means he/she can browse through different books page and can add every of them in the cart at a time.
  - This cart option should be available in all book pages and in the home page.
  - After adding books, Customer can finalize the book purchase by selecting available payment methods. Options for removing added books from carts must be available.
  - There must be a search option available for the CUSTOMERs. From the search box they can search for any book.
  - Some filtering properties must be available in the search box. CUSTOMERs can search for books by authors, by genre, by name etc. after selecting the filtering limits appropriate results should be shown to CUSTOMERs.
  - There should be a book purchase list in every CUSTOMERs profile so that they can review their previous purchase. This list should contain detailed purchase history.
  - The ADMIN will be able to see all purchase history of all users. Provide a separate page only for the ADMIN to satisfy these criteria.

- ❖ Let us think about a clothing brand whose authority want to provide shopping service to their customers by means of online. So, from the online website their customers will get the views of the products they are currently offering and among those big collection they can order their own favorite ones. The required features will be: -
  - There will be two main types of users- ADMIN (may be the owner) and CUSTOMER
  - A registration page should be available for the users to register in the site along with their valid information.
  - Only validated users will get details access or log into the system.
  - For both types of user there will be profile page where they will be able to update and modify their personal information's.
  - The ADMIN or the owner of the system will get the all primary controls of the site.
  - Only the ADMIN can add, delete or update existing product and details.
  - ADMIN can delete existing CUSTOMER.
  - There will be various types of clothing products available. Each type of product should be shown on different pages.
  - Products should be categorized mainly based on Gender.
  - For each gender, there will be different types of cloths like, for Men there will be Shirts, Pants etc and For Female there will be Salwar, Jeans etc.
  - Under every dress category there will me many products. All these categories
    must be navigated either from a simple home page or from some dedicated
    page.
  - The CUSTOMERs must be able to browse through all these categories.
  - There will be images, short description, size chart and other necessary information's available with each types of cloth.
  - The CUSTOMERs must be able to add their chosen cloths to the shopping cart and keep in mind after adding one item in the cart the CUSTOMER may browse some other page and add another item.
  - Options for removing any added item from cart must be available.
  - Whenever the CUSTOMER will finalize the available products in the cart, a invoice will be shown regarding the products and related costs and if customer agrees to continue show him/her the payment method.
  - All available payment methods must be available.
  - Provide a search box in the home page which will help the customer to find out his exact desired product. Some filtering options should be present here like he/she may have a suggestion of searching under a particular category.
  - Provide a purchase history in the profile of each CUSTOMER.
  - Only the ADMIN will be able to view the order list and confirm or reject it.
  - ADMIN will be able to view all purchase history of every CUSTOMER.
  - In case of unregistered users, they can browse through the website but can not make any purchase request.

- \* Consider about a "Online Medicine Shop" which will facilitate its users by providing a wide range of medicines at their dire necessity. The required features are: -
  - There will be mainly two types of user- **ADMIN** and **CUSTOMER**
  - Provide a registration page for both types of user.
  - Only valid users can log into the system.
  - Provide a profile page for the users where they can modify their personal information's. Also provide a navigation to the profile page from the home page.
  - The ADMIN will have the administrative capabilities. ADMIN will add, delete or modify different types of medicines information.
  - ADMIN can delete existing CUSTOMER.
  - Different types of medicines must be categorized. For example, there may be medicines for aspirin genre, paracetamol genre etc.
  - Under every primary category there will be various medicines. One thing to notice here, the medicines may be of liquid type or solid. So, provide logical segmentation between them.
  - For every medicine provide the vendor name, price, availability etc information's.
  - The CUSTOMERs can browse through the site and view different medicines. They also can order medicines.
  - Provide a search filed for the CUSTOMER so that they can search for exact medicine they are looking for.
  - Facilitate the search box by adding filtering methods like, search by vendor, search by genre etc.
  - There will be an option available to add medicines to the cart. The CUSTOMER can add as many as medicines in the cart as per his/her requirement. Don't forget to add a quantity field.
  - The CUSTOMER must be able to increase or decrease the quantity of the medicines and remove or add more medicines to the cart.
  - After finalization of the medicines in cart CUSTOMER must be able to confirm the purchase request. During this phase ask CUSTOMER for the address.
  - Invoice regarding lists of medicines selected, corresponding price will be shown to the CUSTOMER and if confirmed show him/her the payment method. Payment method must be selected to confirm the purchase request.
  - After confirmation of payment, successful order list will be shown to the CUSTOMER.
  - Only the ADMIN will have the capabilities of accepting or rejecting an order list.
  - The ADMIN will be able to see all available purchase request details.
  - There will be purchase list history of all CUSTOMERs which will only be visible to the ADMIN.