# User Requirements

* Donor:

The donor will be able to:

* Add their information to the system
* View his information
* View past donations, by date, amount, event, and campaign.
* To requested to delete his account in case they no longer want to participate.
* View events details
* Staff:

The employee can:

* Add new donors to the system
* Modify donors information
* Approve the donor account deletion requests
* View past donations, by date, amount, event, and campaign
* View events details
* Modify events details in case there is any changes

# System Requirements

* Software Requirements:
* **Operating System:** The operating system should be compatible with Windows, macOS, and Linux.
* **Database:** The system should be built using a relational database management system such as MySQL
* Hardware Requirements:
* **Server**: The system needs a web server to host the application.
* **Storage:** The system should have enough free disk space to store information about donors, logs of communications, event files, and records of donations made. This depends on the base size of donors.
* **Backup:** The system should have a reliable backup system for database and file backups to ensure data integrity and recovery.

# Mapping

## My attributed with their types

* Donor (Donor ID, ssn, Donor name, Registration date, Email, phone number, Adress, Birth date)
* Staff (Staff ID, ssn, name, salary, level, Phone, Address, email, birth date)
* Event (Event ID, Event name, Event date, Event location)
* Communication (communication ID, Type, Date)
* Donation (Donation ID, Amount, Date)

|  |  |  |
| --- | --- | --- |
| Attribute | Type | Description |
| Entity1: Donor | | |
| Donor ID | Simple, Single-valued | Unique identifier for the donor |
| SSN | Simple, Single-valued | Social Security Number of the donor |
| Donor name | Composite | Consists of first name, middle name, and last name |
| Registration date | Simple, Single-valued | Date the donor registered in the system |
| Email | Simple, Single-valued | Email address of the donor |
| Phone number | Multivalued | A donor may have multiple phone numbers |
| Address | Composite | Includes street, city, state, and zip code |
| Birth date | Simple, Single-valued | Date of birth of the donor |
| Entity2: Staff | | |
| Staff ID | Simple, Single-valued | Unique identifier for the staff member |
| Name | Composite | Consists of first name, middle name, and last name |
| Salary | Simple, Single-valued | Salary of the staff member |
| Level | Simple, Single-valued | Level or position of the staff member |
| Phone | Multivalued | A staff member may have multiple phone numbers |
| Address | Composite | Includes street, city, state, and zip code |
| Email | Simple, Single-valued | Email address of the staff member |
| Birth date | Simple, Single-valued | Date of birth of the staff member |
| Entity3: Event | | |
| Event ID | Simple, Single-valued | Unique identifier for the event |
| Event name | Simple, Single-valued | Name of the event |
| Event date | Simple, Single-valued | Date when the event will take place |
| Event location | Composite | Includes venue name, city, and zip code |
| Entity4: Communication | | |
| Communication ID | Simple, Single-valued | Unique identifier for the communication |
| Type | Simple, Single-valued | Type of communication (e.g., email, call) |
| Date | Simple, Single-valued | Date of the communication |
| Entity5: Donation | | |
| Donation ID | Simple, Single-valued | Unique identifier for the donation |
| Amount | Simple, Single-valued | Amount of the donation |
| Date | Simple, Single-valued | Date when the donation was made |

## Step1: Mapping of Regular (strong) Entity Types

* Donor (Donor ID, ssn, Donor First Name, Donor last name, Registration date, Email, phone number, Adress, Birth date)
* Staff (Staff ID, ssn, name, salary, level, Phone, Address, email, birth date)
* Event (Event ID, Event name, Event date, Event location)

## Step2: Mapping of Weak Entity Types