

# 3004 Final Project

Prateek Khurana

101095539

Hamzah Tariq

101066342

MD Fazlay Rabbi

101129040

18th April 2021

# 1 Use Case Model

## 1.1 Use Case 1: Programs (Basic Use)

**Primary Actor:** Denas-PCM Simulator User

**Scope:** DENAS-PCM System Simulator

**Level:** User Goal

**Precondition:** User needs a pre-programmed therapy.

**Main Success Story:**

1. User presses "Power" button to turn on the device.
2. Device gets turned on and home screen is displayed on the screen.
3. From the home screen user presses "Select" to go to the main menu.
4. User then selects "Programs" option from the main menu.
5. Display now shows multiple pre-programmed health options.
6. User selects the desired program.
7. User then presses the "skin on" button to start the therapy.
8. Timer starts and is displayed on the screen.
9. User then presses "Select" to end the therapy.

**Extension:**

1. User can click the "skin off" button anytime during the treatment to pause the therapy.

**Post-condition:** User receives the required therapy.

## 1.2 Use Case 2: Frequency

**Primary Actor:** Denas-PCM Simulator User

**Scope:** DENAS-PCM System Simulator

**Level:** User Goal

**Precondition:** User wants to build a customized treatment rather than one of the inbuilt therapies.

**Main Success Story:**

1. From the main menu screen, user selects the "Frequency" option.
2. User then selects the required frequency and presses "Select".
3. User adjusts power level according to their need and presses "Select".
4. User then presses the "skin on" button to start the therapy.
5. User has the option to pause the therapy by pressing the "skin off" button.
5. Timer starts and is displayed on the screen.

**Post-condition:** User receives a customized therapy.

### 1.3 Use Case 3: Recording

**Primary Actor:** Denas-PCM Simulator User

**Scope:** DENAS-PCM System Simulator

**Level:** User Goal

**Precondition:** User wants to record a therapy.

**Main Success Story:**

1. User selects “Record” option after choosing a treatment.
2. User then presses the “skin on” button to start the therapy.
3. User presses the select to store the therapy.
4. Therapy is recorded.
5. To view the saved recording user goes to main menu and selects the “Records” option.
6. List of all the recorded treatments is displayed on the screen.

**Post-condition:** User is able to record a therapy and save and view it in records.

### 1.4 USE CASE DIAGRAM:

