

Adept Health

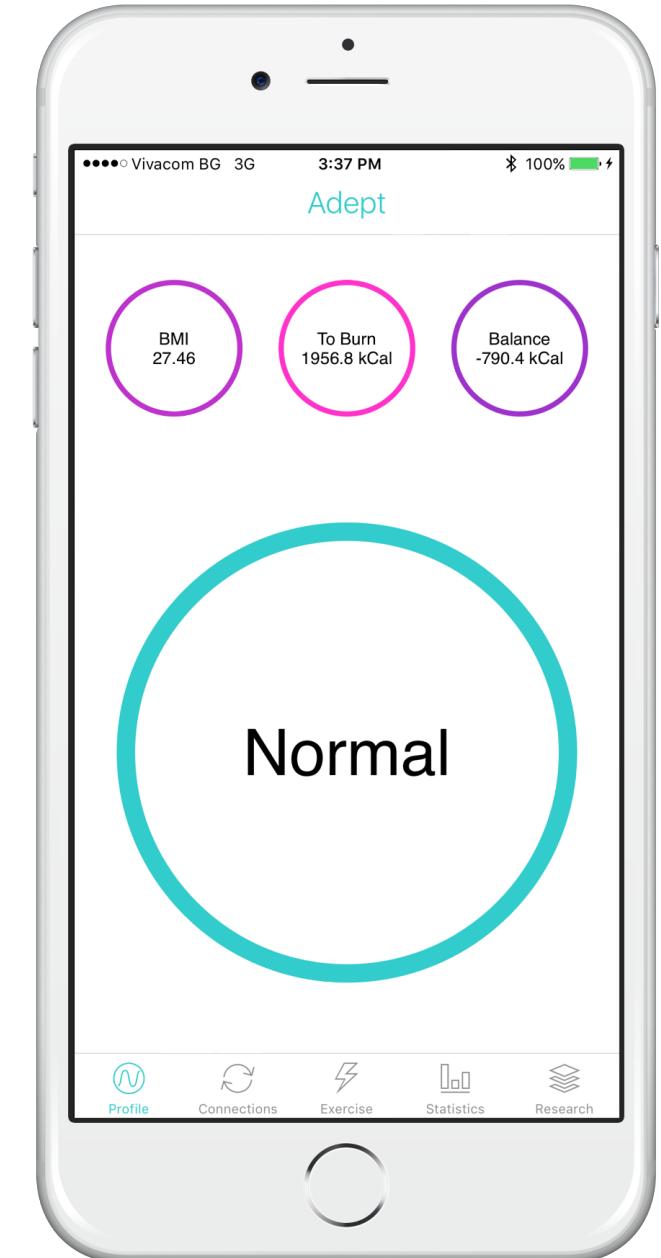
iOS Application Design

Features

- Exercise interface for the BLE Devices Adept Stick, TAO-Wellshell, Heart rate chest strap
- Bone structure, BMI, Weight, Height, Muscle Strength, Calories intake, Passive and Active Calories burned data information gathering and analyzation
- Scan food's barcode and add information about food to a food log
- Integrated tests for evaluating mental and health status based on questions
- Apple HealthKit and ResearchKit integration
- Open API for adding more BLE Smart devices to the training interfaces

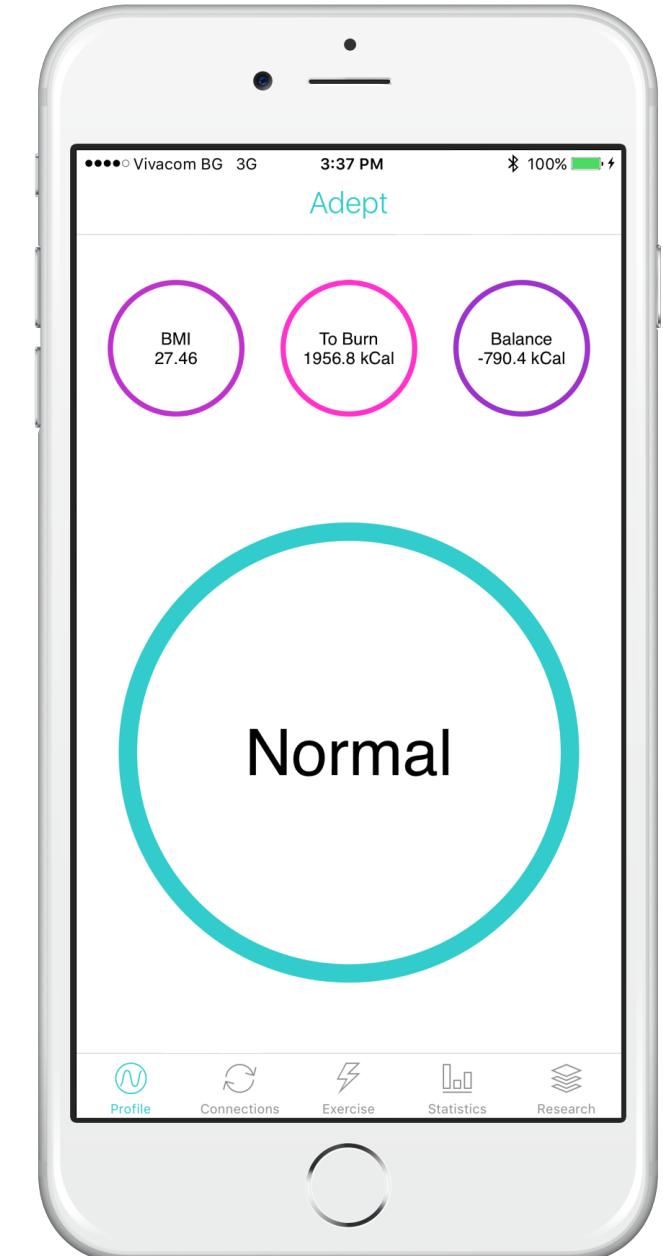
Application Design

- The Adept Health Application uses iOS Tab bar design pattern.
- The Application consists of 5 scenes
 - Profile Scene - Summary of all health data
 - Connections - Used to find, connect, disconnect devices
 - Exercise - Used to pick and execute an exercise
 - Statistics - Used to display log from exercise and food, and graphics with data from the last week
 - Research - Used to make different research tests in order to determine current physical, health and mental condition of the user



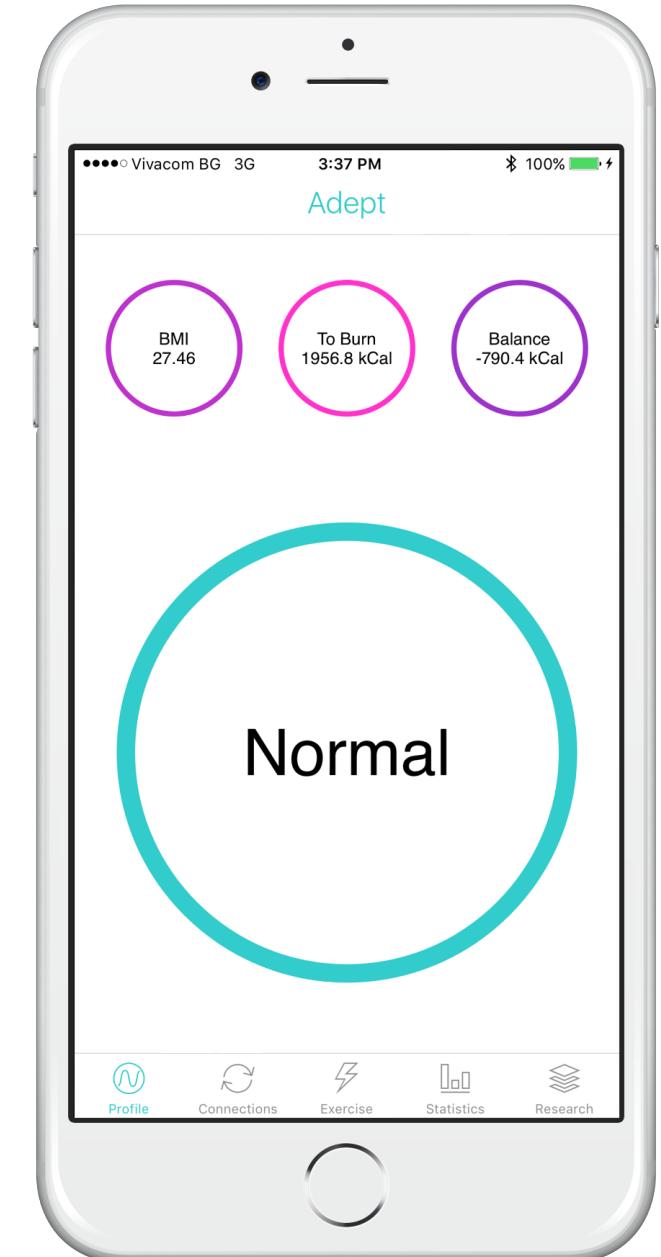
Application Color Rules

- In Adept Health application few different colors are used as indicators
 - Normal / Good / Perfect color - #33CCCC
 - Bad (check measurement) color - #7F33CC
 - Very Bad (consult with doctor) - #FF33CC
- The color between bad (#7F33CC) and Very Bad (#FF33CC) changes gradually based on the amount of the deviation between normal value and measured value



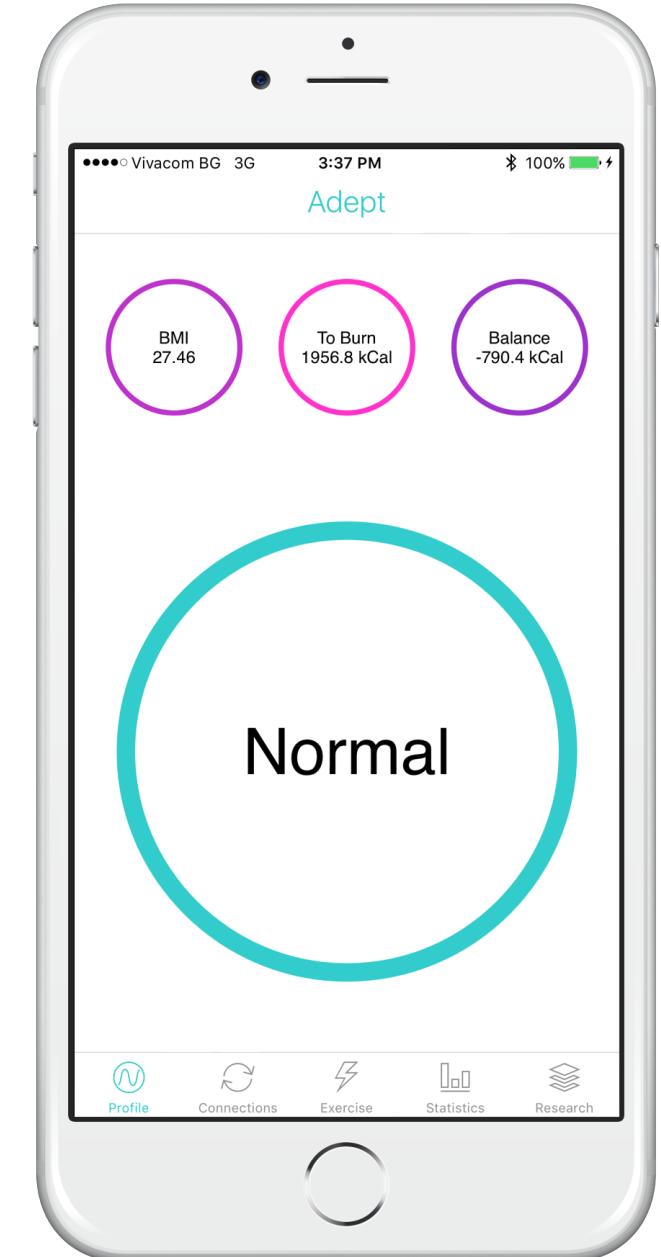
Application Main Scene

- Main screen displays information about
 - BMI – Body mass index – Used to determine humans body condition
 - To burn – Remaining recommended calories to be burned by exercising
 - Balance – Calories Balance – The amount of calories intake by food minus the sum of active burned calories (by exercise) and passive burned calories (by breathing, heart beat etc.)
 - Verdict indicator (Normal on image)



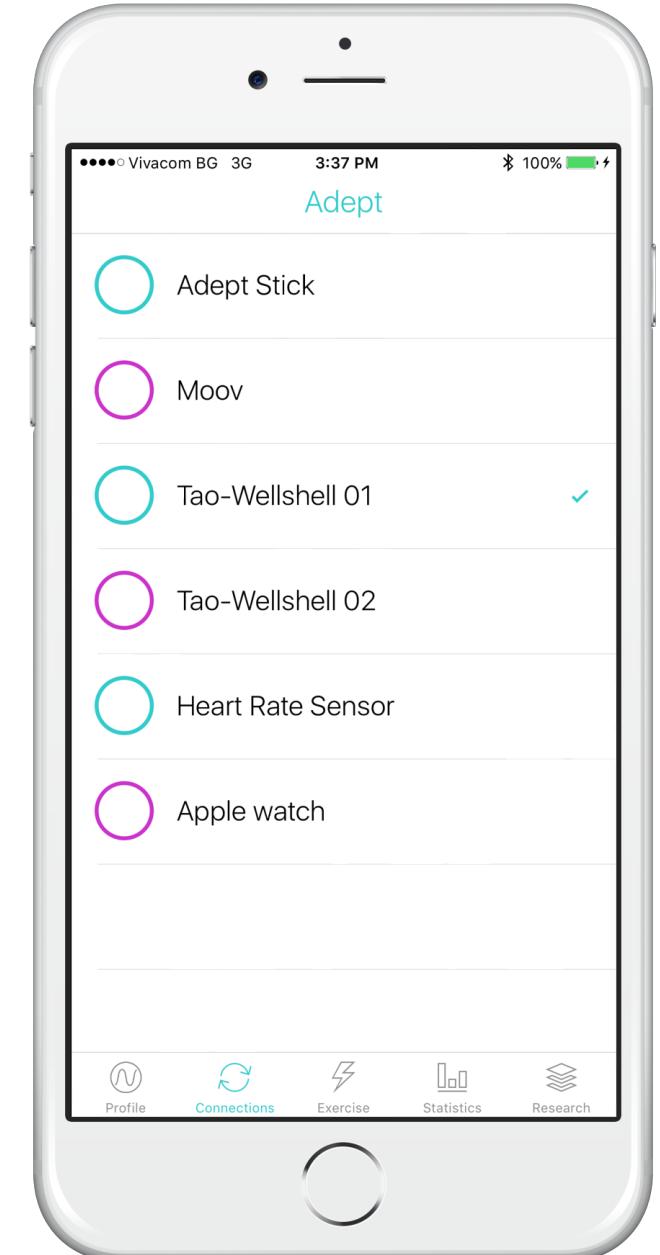
Verdict indicator

- The final verdict indicator is calculated on the change of the value of five factors (pointed below) and their average value in the last weeks.
 - BMI
 - To burn calories (at the end of the day)
 - Balance (at the end of the day)
 - Muscle strength - measured for 6 muscle groups
 - Bone structure (size of the wrist)



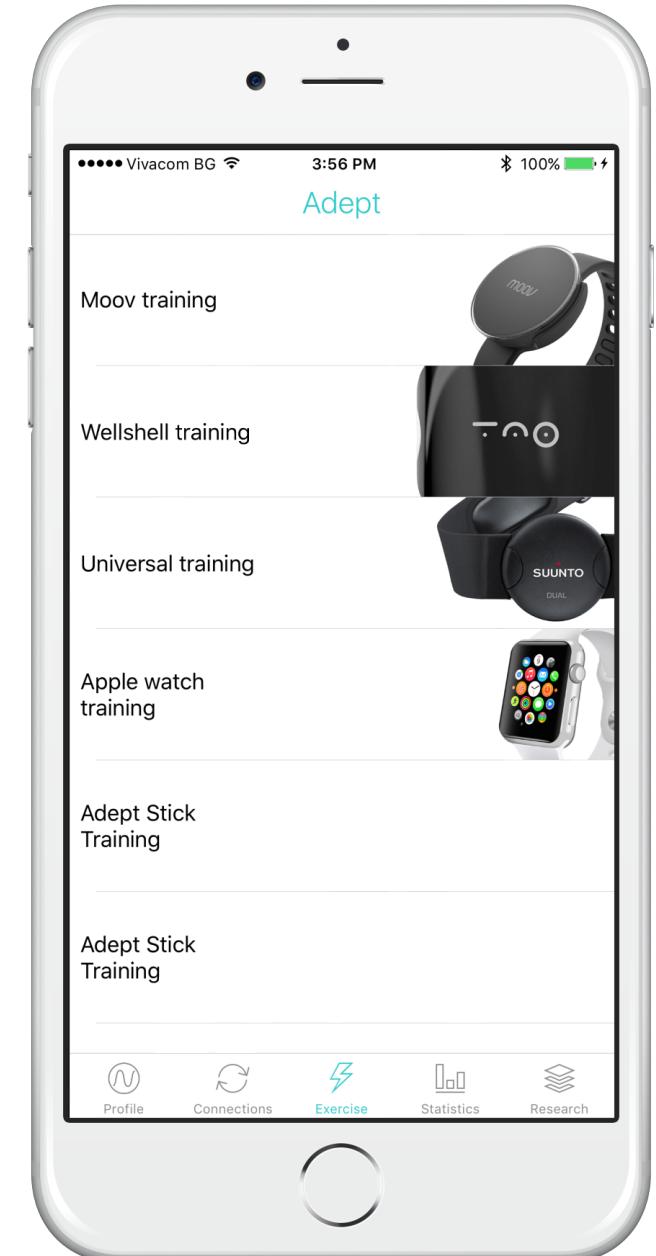
Connection scene

- This screen is presenting the supported devices by the Adept Health Application and if they are discovered and their connection state
 - The circle in front of the peripheral device is presented in Cyan color if the device is in range and discoverable or presented in Magenta if the device is not discovered
 - The tick at the right side is showing if Adept health App has established successfully connection with the device



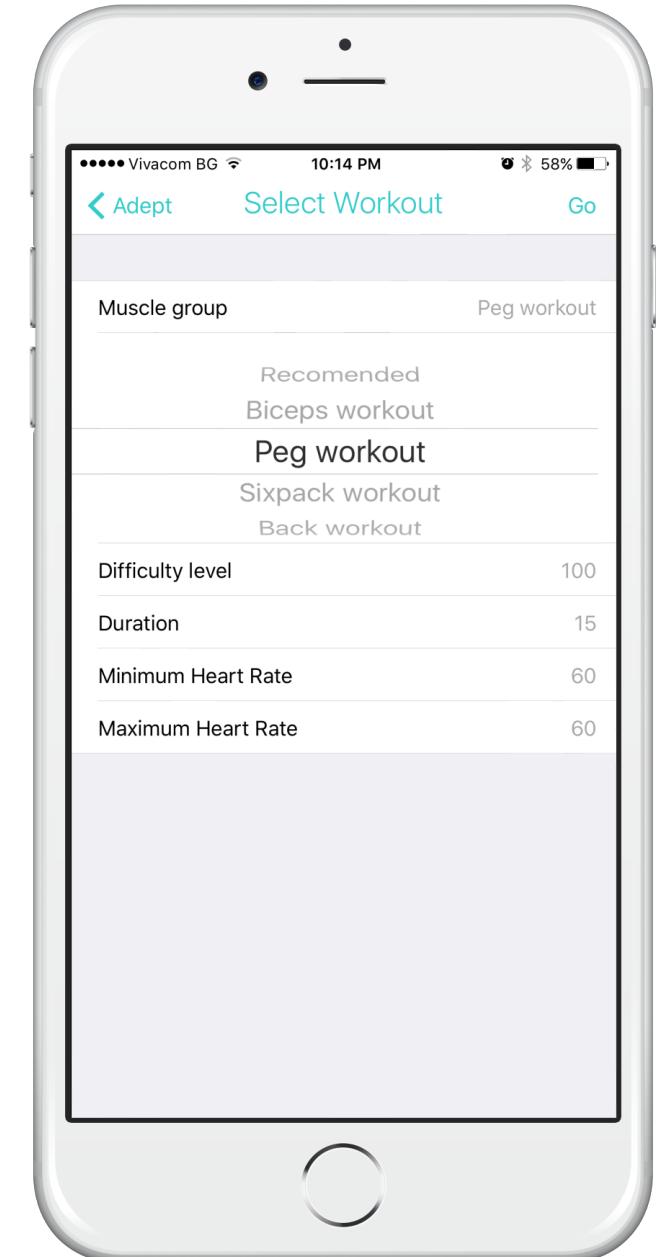
Training Select Scene

- The purpose of this screen is to select the device that the user will train with. The devices that are currently supported by Adept App are Tao Wellshell, SUUNTO heart rate strap and Adept Stick
- Note - Adept team is doing their best to improve the application and at the time of the review is possible more devices to be supported



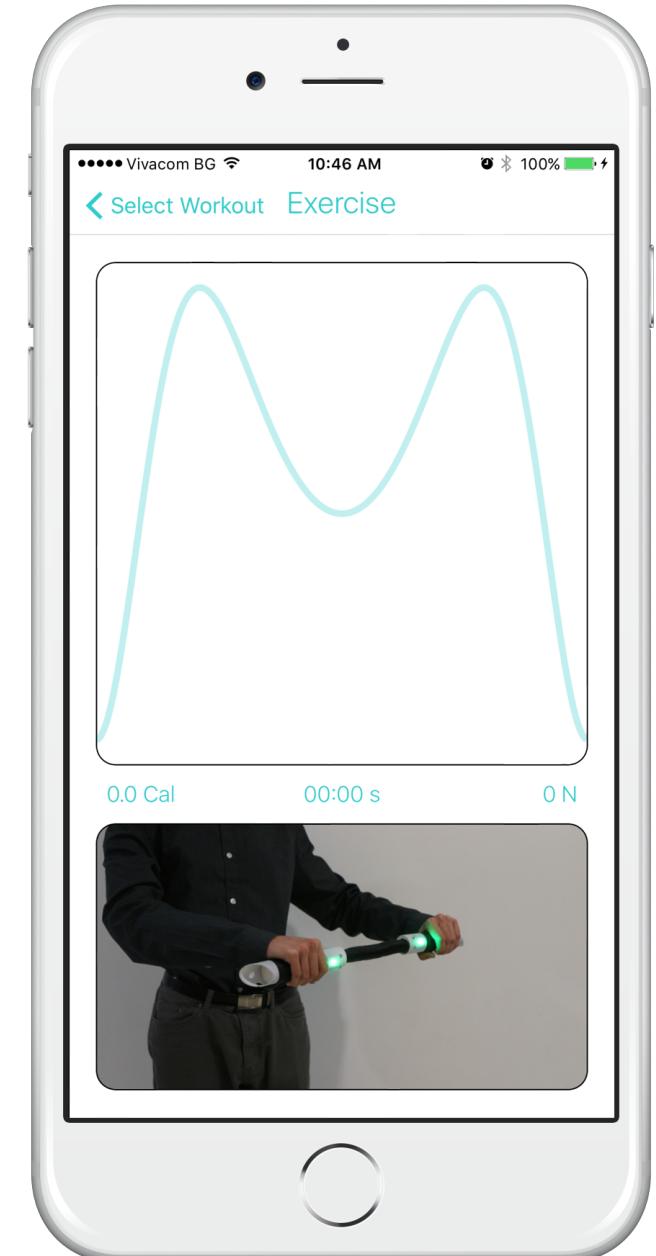
Training Settings Scene

- The purpose of training select screen is to setup the training. There are five different settings
 - Muscle group - the muscle group for training (If recommended selected the exercises shown are chosen by medics and scientist (from adept.rapiddevcrew.com portal) based on the users needs)
 - Difficulty level - how much you must press to reach the exercise maximum. Difficutly 100 is about 1000N of force to be applied to the device in order to reach the peak of the exercise.
 - Duration - duration of training
 - Minimum and Maximum Heart rate - Chose the Heart rate zone



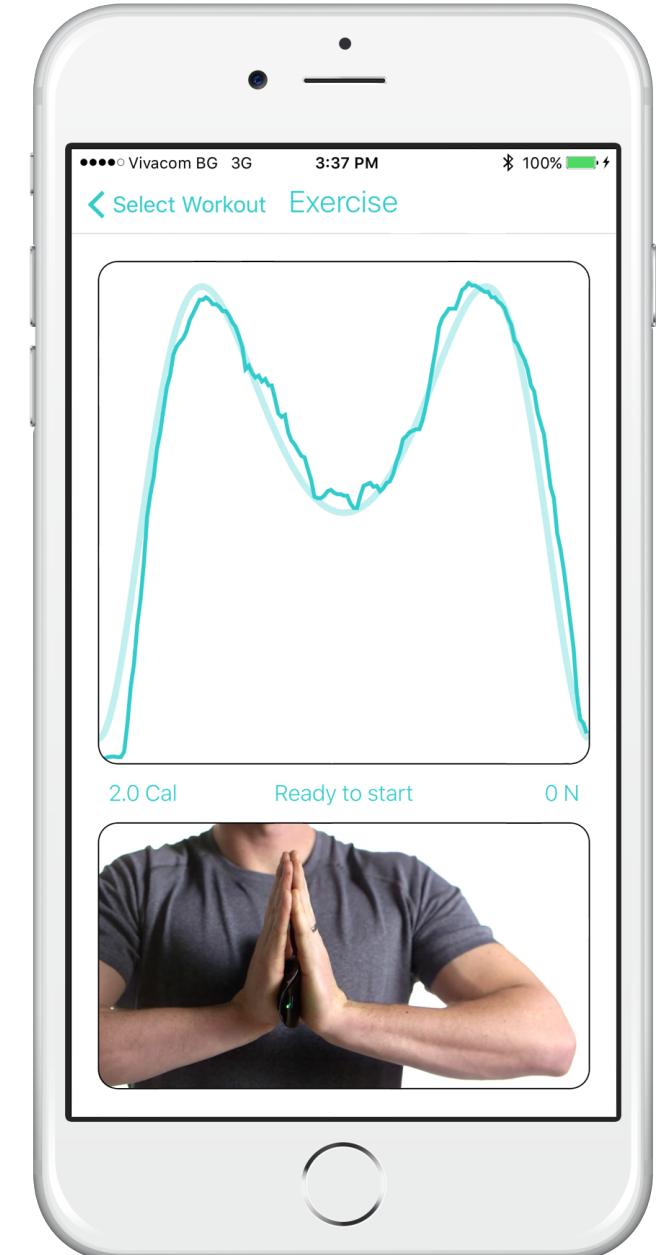
Adept training screen

- The light-blue graph is the force curve that should be followed at the time of exercise. As harder you apply force, higher your pointer will write. This curve is most suitable for isometric exercises
- The image below is the current exercise posture that you should do
- The information given for the exercise is the calories burned, time of exercise and current amount of force applied



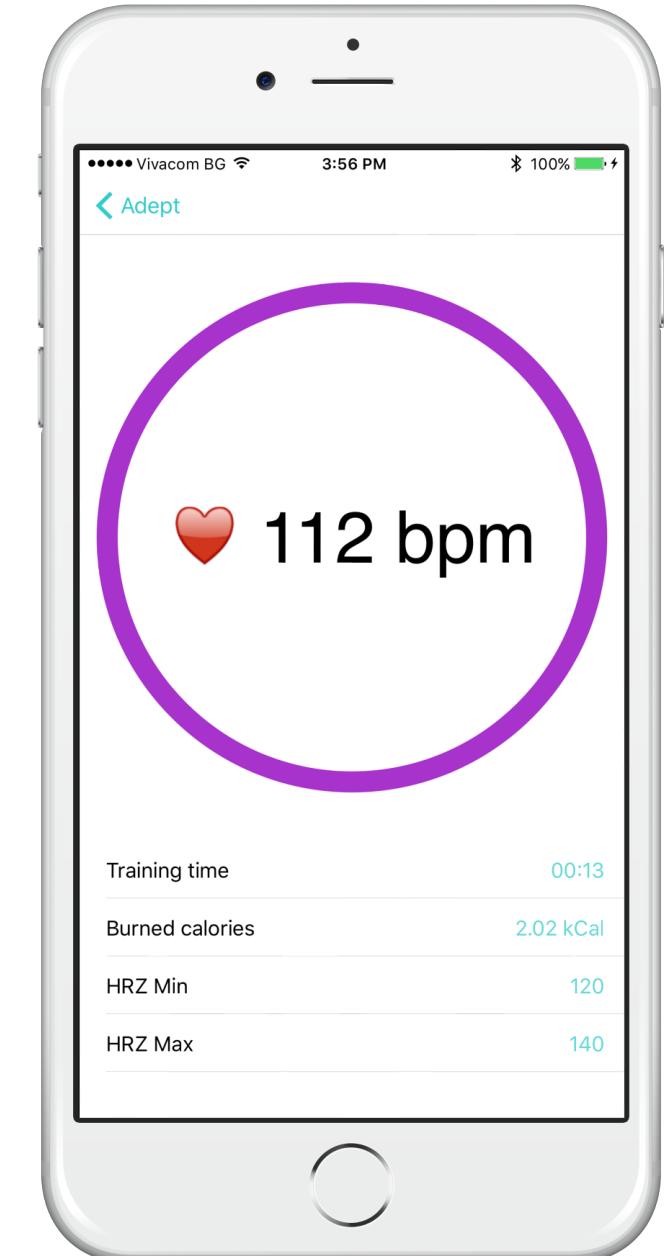
Adept training screen

- At the end of the training with the cyan color is the current curve of force applied and at the background is the suggested curve. As close you are to the suggested curve, better exercise you make.



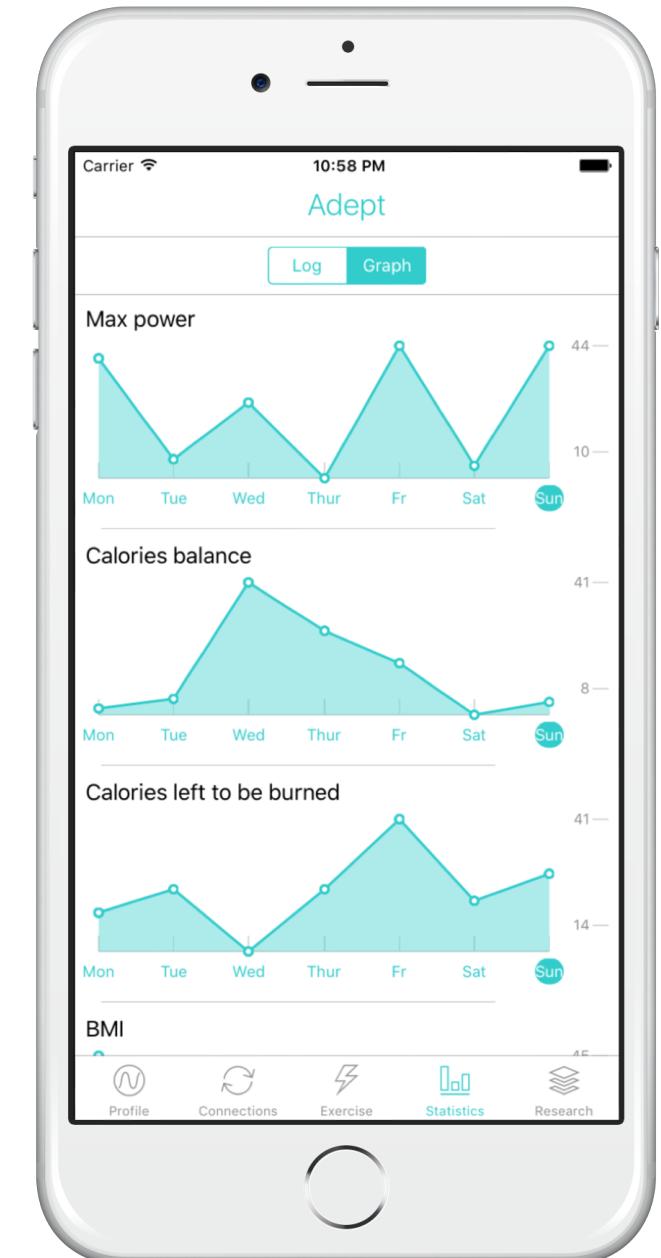
Adept Heart Rate Training

- The circle color of this screen is determined of the current value of the heart rate (heart rate is measured by BLE heart rate chest strap). When the current heart is within the range of HRZ Min (Heart rate zone minimum) and HRZ Max (Heart rate zone maximum) the color is changed to Normal Color (#33CCCC)



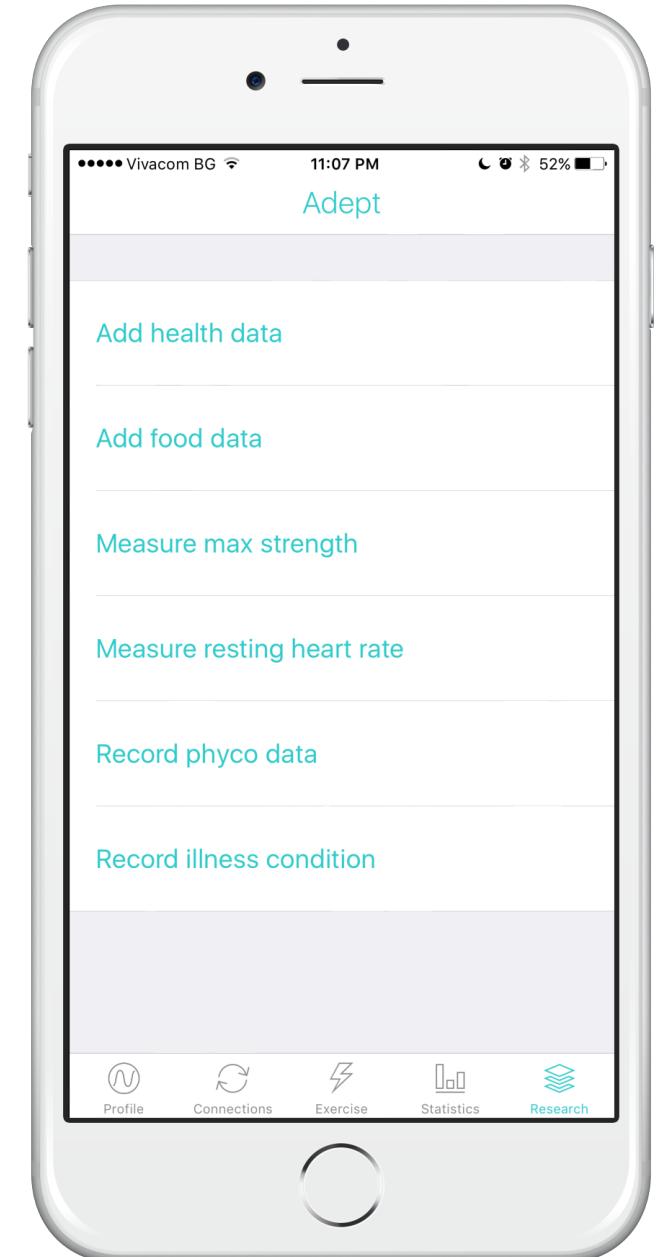
Statistics scene

- The statistics scene takes information from the data base and Apple HealthKit and displays detailed statistics for the last week. The data shown:
 - Muscle Strength (Max Power)
 - Calories Balance
 - Calories left to be burned
 - BMI
 - Wrist size



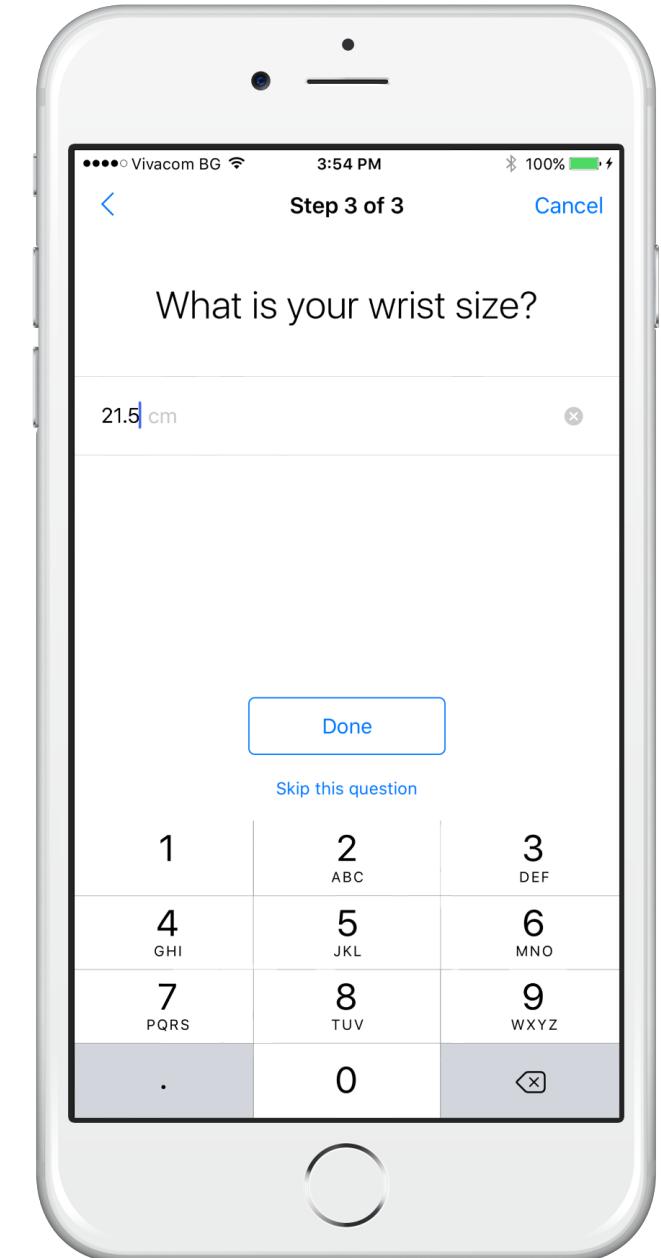
Research Scene

- The purpose of the research screen is to provide different options for acquiring useful information from the user. The current supported modules
 - Add health data
 - Add food data
 - Measure Max Strength
 - Measure resting heart rate
 - Record Psycho data
 - Record illness condition



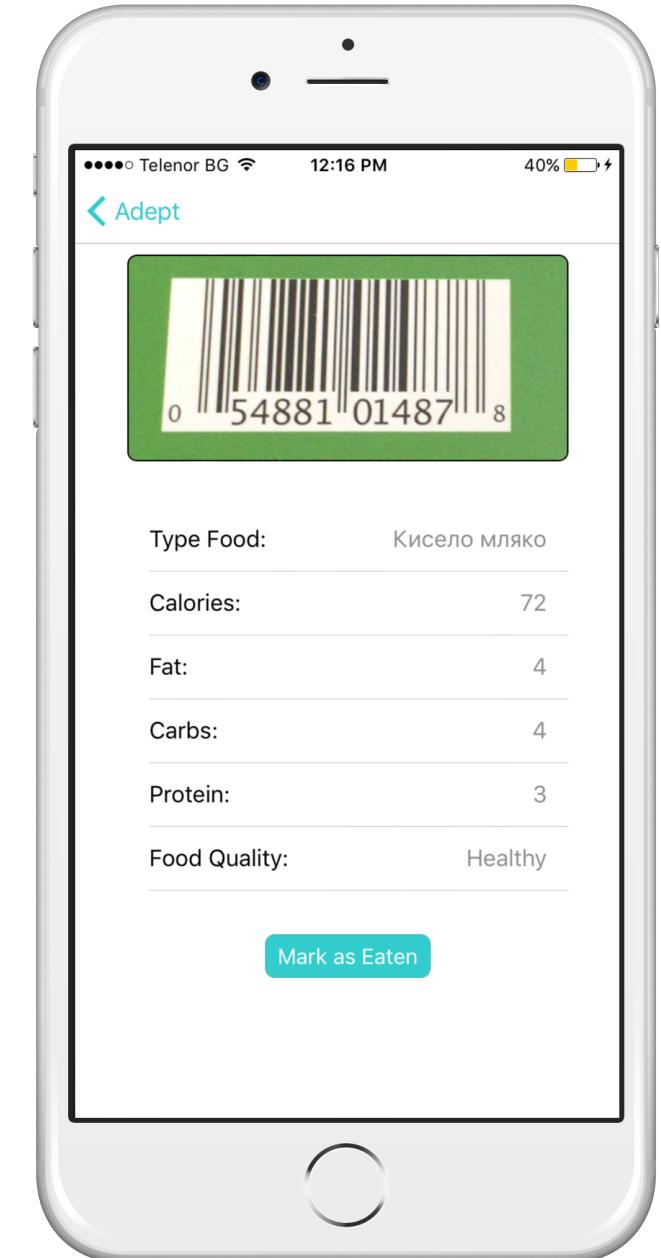
Add health data scene

- Add health data scene aims to ask the user to log data about
 - Height
 - Weight
 - Wrist size
- This data is used for calculating bone structure and BMI. This data is synched with Apple Healthkit (the data can be logged both in Adept health app and Apple HealthKit and it will be exchanged automatically between the apps)



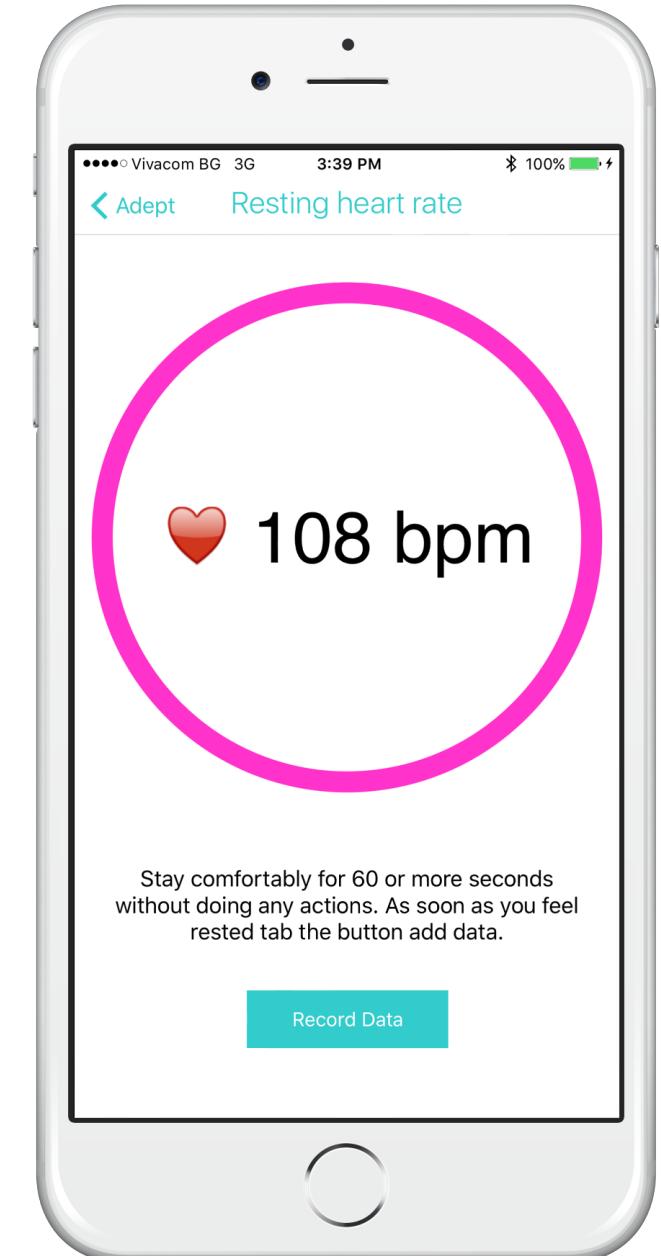
Add food data scene

- On food data screen the user is given the opportunity to scan the barcode of the food that he/she is going to eat and to observe the food data. Then she/he decides to Mark the food as eaten and add it to the food log or to rescan the barcode of a different food until the user chooses what to eat. The add food scene can be presented by pressing Add Food item on research screen or long press calories balance on main screen.
- Note: the word (Кисело мляко) means yogurt.



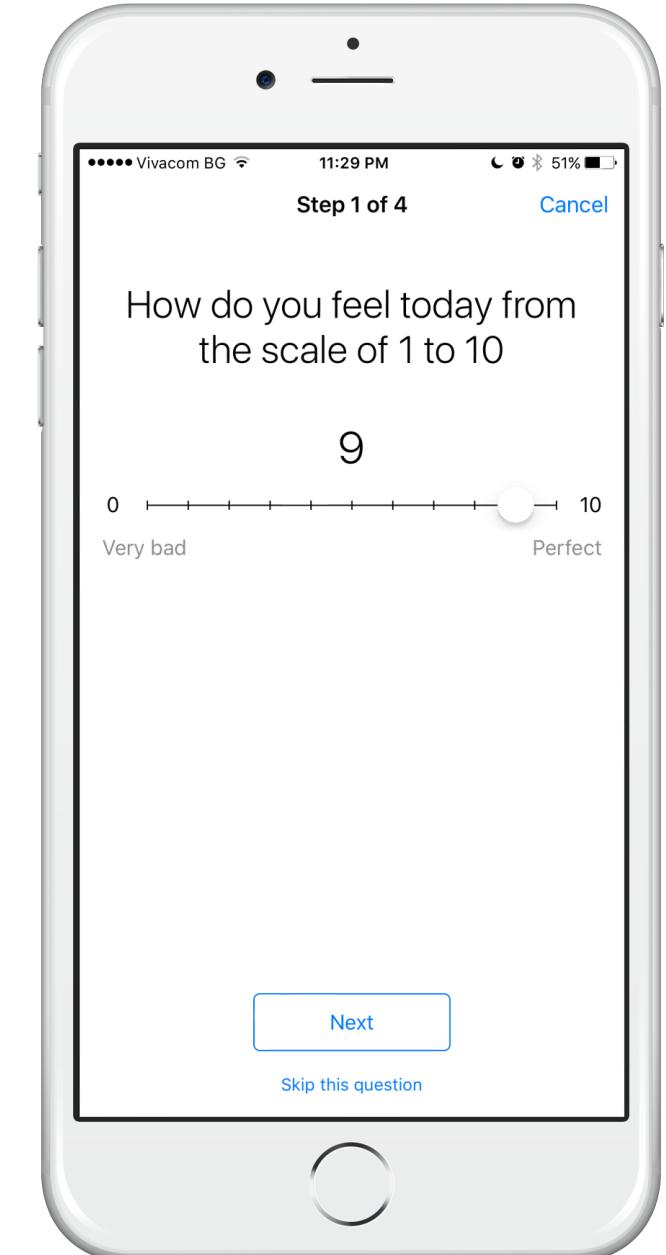
Resting Heart Rate Scene

- This scene aim to collect information about the resting heart rate of the user. The resting heart rate research is important for finding heart deceases in early stage and for information about the amount of stress in the user.



Record Mental Data Scene

- This scene aims to ask the user few questions and send the answers to a specialist for analyzation. The questions (currently added) are:
 - How do you feel today from the scale from 0 to 10
 - How many hours did you sleep last night
 - How well did you sleep last night
 - How aggressive do you feel on the scale from 0 to 10



Record illness condition

- The purpose of this scene is to be used as logger for any illness conditions felt by the user. The data is gathered by few questions and then send for analyzation to medics and researchers. The questions in this scene:
 - How do you feel on the scale from 0 to 10
 - How many hours have you slept last night
 - How well have you slept last night
 - Describe your symptoms

