# Recitation 2 Daniel Kim

#### Team members:

- Kevin Luth
- James Wissemann

### **Prompt:**

Create touch surface gestures for a messaging app on a mobile phone.

#### **Set of Actions:**

- 1. Scroll through a list
- 2. Select message chat
- 3. Delete message chat
- 4. Create a new message chat
- 5. Pin or mark as favorite
- 6. Go back to main menu
- 7. Exit the message app

#### **Brainstorm**

Touch surface gestures

- Limitation
  - o 2D touch
  - Mobile phone screen is the only area to create gestures
  - Can't create creative gestures compared to in-air gestures and device motion gestures.
- Advantage
  - Simple and easiest gestures compared to in-air gestures and device motion gestures
  - Devices can detect the easiest when a gesture is starting and ending.

I believe that placements or where the gestures start/end are the crucial essence to touch surface gestures since the physical touch screen is all they have. To exemplify, all the gestures should be similar such as straight line gestures, but these gestures can create different actions depending on where they start and end. If you think about iPhone touch screen gestures, they're all in straight lines but they have different commands because they depend on where they start the straight line gestures.

## Design a set of gestures:

- 1. Drag your finger up or down to scroll through message chats and message contents.
- 2. Tap to select message chat
- 3. Tap and hold to delete message chat
- 4. Swipe from right edge to left to create a new message chat
- 5. Swipe from left to right on message chat to pin or mark as favorite
- 6. Double tap to go back to main menu/message chat list
- 7. Swipe from bottom edge to up to exit the message app

**Sensing method** - Since this will be in a touch screen, the device sense gestures when the user touches the screen and when the user finished touching the screen.

**Metaphor** - Most of my gestures involve straight lines, except for taps and hold.

**Mapping** - I believe that there are some minor mapping such as natural gestures from behavior similarity.

**Consistency** - My set of gestures are fairly easy to do the gestures because they're mainly involved with straight lines.

**Appropriateness for context** - Again, because my set of gestures are fairly easy due to straight lines, I believe that my set of gestures are appropriate for contexts.

In the main menu, there is a list of message chats. To look through many message chats, the user can drag the screen up or down with one finger to scroll. If the user wants to see the contents of the message chat, the user taps the screen once to select the chat. Once the user is in the specific message chat, the user can double tap anywhere to go back to the main menu / message chats list. In the main menu, the user can also tap and hold the message chat to delete, and to create a new message chat, the user can swipe the screen from right edge to left. If the user has a favorite chat or constantly uses that one specific chat, the user can swipe from left to right on the message chat to pin as its favorite. Finally, if the user swipes from bottom edge to up, this gesture will exit the message app.