RR2 Session 2 Procedure

Equipments and materials

- All robot equipment (see separate list with Setup Instructions)
- Session 2 Folder with:
    - RR2 Session 2 Log
    - Robot Sorting Task instructions, materials, and answer sheet
    - Narrative Description instructions

So you're just started the interaction for Session 2!

1. Fill in one line of the RR2 Session 2 log for each participant. Make sure to record the date, and the start and end times. Follow the steps below:

1. Pretest

The assessments that are administered before Session 2:
- Robot Sorting Task
- Narrative Description

Instructions

1. During the assessments, write down any comments about the participant, e.g., "did not complete vocab assessment", "stopped halfway to use the bathroom then came back to finish", "mostly spoke Spanish", "did not understand questions", etc. These comments are very useful during data analysis.
2. Set up the camera pointing toward where the child will sit.
3. **Do the Narrative Description:**
    a. Instructions are printed in your Session 2 folder.
    b. **Start camera recording.** We need only need audio for transcribing children's explanations of their responses, but if starting the camera is easier, that's fine.
        i. If using a webcam: Run `$ ./record_from_camera.sh RR2-P000-s2-nd.mp4`
        ii. Make sure to select the camera and microphone!
        iii. If you use a separate standalone microphone, e.g. on your smartphone, you are responsible for tracking the order of participants and making sure that the video filenames are changed to include the participant IDs!
    c. Do the task.
    d. **Stop camera recording.** If using a webcam, press "Ctrl-c" in the terminal tab to end recording.

4. **Do the Robot Sorting Task:**
    a. Instructions are printed in your Session 2 folder.
    b. Do the task.

2. Re-Introduce robot

Robot Backstory reminder:

"Okay, next we are going to play with Red! Do you remember where Red's ears are? (inside fur) Right, so don't forget to speak loud and slow, okay?"

"Do you remember how to wake up Red? (ice cream) That's right! Use a loud and clear voice and say *ice cream!*"

3. Robot Interaction

The robot will wake up and re-introduce itself.

Like last time, within a few minutes you should excuse yourself over to your laptop. You can say something like "I'll be over here working on some stuff" if the child is curious. We want the child to do as much of the interaction as possible by themselves, and as much as possible in a "play" context, without such obvious adult supervision. If the child is nervous or wants you to stay, that is fine; you can do so.

If the child looks to you or has questions, you can answer them. Remember these things:
 ● Always refer to the robot as "Red". Do not gender the robot. Do not use he, she, or it.
 ● Don't say much about the robot. Sometimes kids ask "Is Red a boy or a girl?" or "Did you make Red?" or "Why did she do that?" These are questions you respond to generically or with questions, such as: "What do you think?", "Hmm…", "I'm not sure…" The robot has a particular backstory in this study, so it is best if you let the robot do all the explaining about itself.

Favorite Color

The robot will ask the child their favorite color. Listen!
 1. Record the child's favorite color in the Session 2 Log. If the child does not say a color, write "NA".

Picture Task

The robot will show the child two pictures and talk about each of them with the child. Then the robot will ask if the child is willing to talk about a third picture:

"Okay, that's all the pictures I had to do. Do you want to do one more to help me practice?"
 1. Pay attention! You need to enter the child's response in the User Input form.
 2. If the child agrees to do the third picture, select YES.
 3. If the child does not want to do the third picture, select NO.
 4. If the child does not say anything, select TIMEOUT. The robot will prompt the child again. Listen for the child's response. Select the appropriate answer.

If the child chooses to do the third picture, the robot will show a picture of holidays and talk about it. They will talk some more, and then do a story.

Negotiation Task

Right before the story, two pictures will appear on the tablet and the robot will ask: "Which picture should we tell stories about?" The child is asked to touch the picture they want to do on the tablet. The robot then says: "Aww, I want to do the other one!"

 1. Pay attention! You need to enter the child's response in the User Input form.

2. If the child acquiesces (allows the robot's choice), select ACQUIESCENCE - do robot's choice.
3. If the child refuses (wants to do the picture they picked), select REFUSAL - do child's choice.
4. If the child suggests a compromise, select the appropriate COMPROMISE button:
    a. If the child says "do mine first, then yours", select COMPROMISE - do child's first
    b. If the child says "do your first, then mine", select COMPROMISE - do robot's first
    c. If the child says "let's do both", select COMPROMISE - general / not specific
5. If the child says nothing, select TIMEOUT. The robot will prompt the child again. Listen for the child's response. Select the appropriate answer.

If the child does not care which scene to do, the robot will pick one. During the negotiation, if the child wants to pick the other scene (i.e. not the one the robot picked), then you should select REFUSAL - do the child's choice.

Story Task

The robot will tell a story. After the story, the robot asks the child if they liked the story.
1. Record in the Session 2 Log whether the child says they liked the story, sort of liked it, or didn't like it. (The robot will reference this in a later session).

Then, the child is invited to make up their own story.

If the child does not want to or has trouble coming up with a story, you may give a few brief prompts, in this order:
1. "<child name>, Red really likes listening to stories. You can just tell Red what you see in the picture, it doesn't have to be a story. Anything you say helps Red practice listening."
2. (point at a character on the tablet) Look, what do you think this one likes doing?
3. What could they be thinking? What will they do next?
4. (Red backchannels) See? Red is trying hard to listen!

When the child is done or if the child refuses to tell a story at all, ask the child to say "the end" or "that's the end of the story". *"Duh-end" is better recognized then "thee-end".*
1. Record in the Session 2 Log whether the child told a story, told a little bit of a story (e.g., said one or two things and only spoke a little), or did not tell a story at all.

Photo

Next, the robot will ask the child: "Hey, do you want to take a picture with me?"
    ○ If the child agrees, the robot will ask you to take a photo of them.
    ○ If the child declines, the robot will ask you to take a photo of just the robot.
● Use your smartphone or one of the extra robot phones to take a photo. You may want to take several to ensure you get a good one. We will be sharing these photos with the kids and their parents.
● When you are done, say loudly and clearly, "Okay all done!" (the robot is listening for this phrase).
● Go back to your spot to set the phone down while the robot continues.

The robot will say a couple more things then say goodbye.

As soon as the robot falls asleep, go over to the child: "Okay! It looks like Red has fallen back asleep. That's all for today! Let's go back to your class."