PLAYING SOUND

BY ARVIND SESHAN

LESSON OBJECTIVES

■ Learn how to use the speaker functions to play sounds

SPEAKER FUNCTIONS

■ Used to played beeps out of the Hub.

■ You can set the volume of beeps

```
hub.speaker.set_volume(volume)
                        0-100
```

■ You can read the current volume setting

```
hub.speaker.get_volume()
```

■ You can play a note of your choice for a particular duration

```
hub.speaker.beep(note=60, seconds=0.2)
```

MIDI note number   **Duration of beep**
(default value: 60)   **(default value: 0.2)**

■ You also have the option to start playing a beep, which will allow the program to continue to the next line, and then stop the beep later in the code

```
hub.speaker.start_beep(note=60)
```

```
hub.speaker.stop()
```

CHALLENGE AND SAMPLE SOLUTION

- Set the speaker volume to 75%

- Compose a short piece of music with 4 notes

- Play it 4 times

```
hub.speaker.set_volume(75)  Set speaker volume to 75%
for i in range(4):   Music is played 4 times using a for loop
    hub.speaker.beep(60, 0.25)
    hub.speaker.beep(62, 0.25)
    hub.speaker.beep(64, 0.25)          Four notes are played
    hub.speaker.beep(65, 0.25)
```

CREDITS

- This lesson was created by Arvind Seshan for SPIKE Prime Lessons

- More lessons are available at www.primelessons.org