



Note for Faculty

- This is an important lesson.
- 2. Adding sound to code requires creativity, & this creativity is the key learning of this lesson.
- 3. Encourage students to create a big library of sprites, backgrounds & sounds of their own. In the process, they will get a lot to learn.



Lesson Learning

mBlock 5 offers the following nine sound blocks.



We have learnt the use of the first three on the left.

We shall learn the remaining six in this lesson.

Before that, let us learn how to make our own Sound Library?





Like for sprite library & the background library, we have two options to make My Sounds Library.

These are:

- Upload.
- Record.



Upload a Sound

To upload a sound from the library:

- Download the desired sound from the internet in a folder on your PC.
- Open sound library & select My Sounds.
- Select upload. It will ask for the folder.
- Open the folder in which sound is stored. Select sound & click ok.
- Sound gets added to My Sounds library.

To practice create a library of a ten sounds of your choice.



Record

It is used to add recorded sounds, music, songs & voice recordings to code.

It could be done to create:

- A musical background to the entire code similar to an image background.
- To add a song to be sung by a sprite on the stage.
- To make a voice bubble audible.

All three require the sound to be first recorded, & then added to the My Sounds library

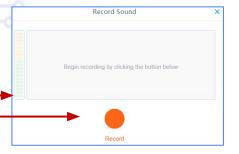




Recording a Sound

To record a sound:

- Open library, select my Sounds.
- Select record. Record window opens.
- Clock on red circle to record.



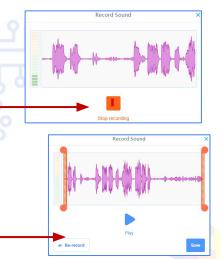




The recording window opens.

In this window:

- Start recording. The volume & pitch appear as a graph & a bar display.
- Use Stop Recording option to stop.
- The screen changes to:
- Use play to play.
- Use Re-record to record again.









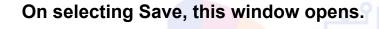
Once edited, Click on Save.











In this, give recording a name (say Demo).

The sound Demo appears here. —





It can now be selected & used in the current project.





Volume. By default Scratch plays at full (100%) volume.

To reduce by percentage use

set volume to 100 %

To reduce in steps, use

change volume by -10





Effect

Has two options - Pitch & Pan left/right.



Pitch

Here use of positive number in roundel will increase pitch. Use of negative number will decrease.



Pan

This applies to stereo headphones & speakers.

- In pan a positive number will pan (send) the sound to the right speaker, & a negative number to the left.
- Thus use -100 we will hear only through left speaker & using+100 we will hear only through right.

We can use this in animation to associate sound to a sprite moving across the screen.



Projects 23. "A corporate meeting is going on. Suddenly a rat appears. Show the commotion that follows, using different methods of adding messaging & sounds to a code".

To make this code, we have taken:

- One lady, two men & one rat as the sprite.
- Each of these has its own code.
- The sprites have been downloaded from internet.
- The background has been created using the Paint utility.





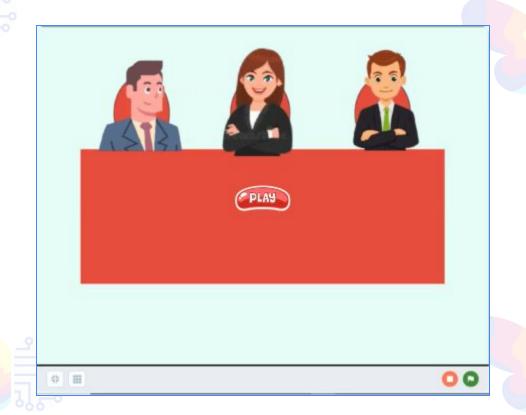
In addition, we have used the following:

- Recorded voice 'Eeeek' (sound of lady on seeing the rat).
- One sound bubble (to display the above sound).
- Voice clip of 'Mogambo Khush Hua' from web.
- One voice bubble for the man to say 'It's just a rat' along with its recording.
- One voice using Text to Speech translation blocks for recording the voice of Amrish Puri (will learn later), for the other man to say 'Mogambo khush hua'.



Video of the Running of the Code









- My sound library is similar to My sprite & My background library.
- Building My libraries over time is a good idea.
- Broadcast between sprites is a very important concept.
- While this was the first project involving broadcast, it will be the most used concept & you will learn a lot more later,



To Consolidate

To consolidate, ask all buddy teams to give you the story line for making a similar project, involving multiple sprites, Multiple backgrounds, along with some basic moves & messages, & sounds as per their imagination.

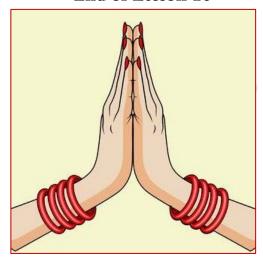
Edit the story & ask them to make the code as part of their home work.

Allow them to present their code to all.





End of Lesson 10



Code Karega India Badhega

