



Getting Started with Osmo Coding Jam

Updated 08.10.2020
Version 2.0.1



Table of Contents

Table of Contents	2
What's Included?	4
What's Included? (Solo Coding Jam Box)	5
Game Setup	6
Menu Navigation	6
Accessing your myOsmo Account	6
Language	6
Resetting All Game Progress	6
What Do My Coding Blocks Do?	7
Key Concept 1 : Command Blocks	7
Hand	7
Jump	7
Walk	7
Repeat	9
Rest	9
Magic	9
Subroutine	9
Musical Worlds and the Jam Crew	10
Quantifiers	11
Sequencing	11
Creating Loops with Repeats	12
Nested Repeats	13
Rests	14
Practice Mode	15
Studio - Making Jams	17
Studio Mode - Editing Jams	18
Subroutines	19
Advanced Editor & Chord Machine	20
Walk-through 4:	20

Custom Chords	21
JamTV	22
Alert Notifications	23
Sharing Jams	24
Best Practices for Effective Osmo Detection	25
Other Questions	25



What's Included?

Each Coding Starter Kit or Coding Family Bundle contains 31 tangible Coding Blocks. Snap these blocks together in coding sequences to create an endless variety of musical compositions!

	Walk Quantity: 6x		Rest Quantity: 2x
	Hand Quantity: 3x		Repeat Quantity: 2x
	Jump Quantity: 3x		#2 Quantifier Quantity: 3x
	Star Subroutine Quantity: 1x		#3 Quantifier Quantity: 3x
	Circle Subroutine Quantity: 1x		#4 Quantifier Quantity: 3x
	Square Subroutine Quantity: 1x		#5 Quantifier Quantity: 2x
	Magic Quantity: 1x		

What's Included? (Solo Coding Jam Box)

Each Coding Jam Box contains 23 tangible Coding Blocks. Be aware that new and legacy action Command Blocks do connect, but quantifiers are not compatible with newer blocks. Feel free to mix and match!

	Walk Quantity: 3x		Rest Quantity: 2x
	Hand Quantity: 3x		Repeat Quantity: 2x
	Jump Quantity: 3x		#2 Quantifier Quantity: 2x
	Star Subroutine Quantity: 1x		#3 Quantifier Quantity: 2x
	Circle Subroutine Quantity: 2x		#4 Quantifier Quantity: 1x
	Square Subroutine Quantity: 1x		#5 Quantifier Quantity: 1x


Game Setup

To get started, grab your Osmo Base and Reflector, compatible device ([check here](#)), and Osmo Coding Blocks!

1. Set your tablet into the Osmo Base and push the Red Reflector down over the camera.
2. Make sure you have the Osmo Coding Jam game app installed and ready to play.
3. Remove your Coding Blocks from the stackable container. Set them aside within easy reach.
4. Open the Coding Jam App and tap on the Play Button on the Main Menu.

Menu Navigation


Accessing your myOsmo Account

Tap  (or your avatar, if you're already logged in) in the upper right corner to view the myOsmo account screen. See this [guide to myOsmo accounts and profiles](#) for more information. You will need to be logged into a myOsmo account in order to share music outside the app.

Language

The default language automatically selects based on the default language setting of your device.

Resetting All Game Progress

1. Tap  and tap Reset Progress.

Be careful! All progress across all levels will be lost and reset.

What Do My Coding Blocks Do?

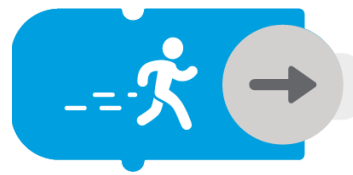
Key Concept 1 : Command Blocks

Osmo Coding has seven different **Command Blocks**, which are used to tell your band member which musical objects to play and how many times. Three of the action commands (Walk, Hand, and Jump) have turnable arrows. Combining commands together will result in longer musical compositions and more complex jams!



Hand

The orange **Hand Block** tells a character to use their hands and play a musical object located in the **Inner Ring**. Turn the arrow to select the specific object.



Walk

The blue **Walk Block** tells a character to step and play a musical object located in the **Middle Ring**. Turn the arrow to select the specific object.



Jump

The red **Jump Block** tells a character to jump and play a musical object located in the **Outer Ring**. Turn the arrow to select the specific object.



What Do My Coding Blocks Do?

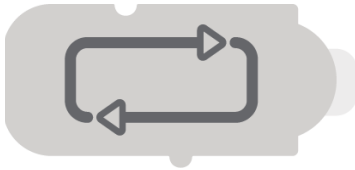
Key Concept 1 : Command Blocks (Continued)

Osmo Coding Musical objects are set up into **Three Rings** that surround your character. The diagram below shows how the coding blocks relate to the different sections of the rings. Choose the different Command blocks and rotate the arrows to pick what object you want to play.



What Do My Coding Blocks Do?

Key Concept 1 : Command Blocks (Continued)



Repeat

Use the **Repeat Block** to “loop” your musical code. A loop is when a sequence of commands is repeated. By putting a Repeat Block at the top of a sequence, all commands attached below it will repeat by the Quantifier number you attach to it.

Note: Attaching a Quantifier Block is required to make a sequence loop.



Rest

The dark purple “Zzz” **Rest Block** is used to stop the music for as many times your quantifier is. If you don’t include a quantifier, it will only rest once.



Magic

Use the **Magic Block** in your jam composition to play a unique character sound and dance in rainbow colors!



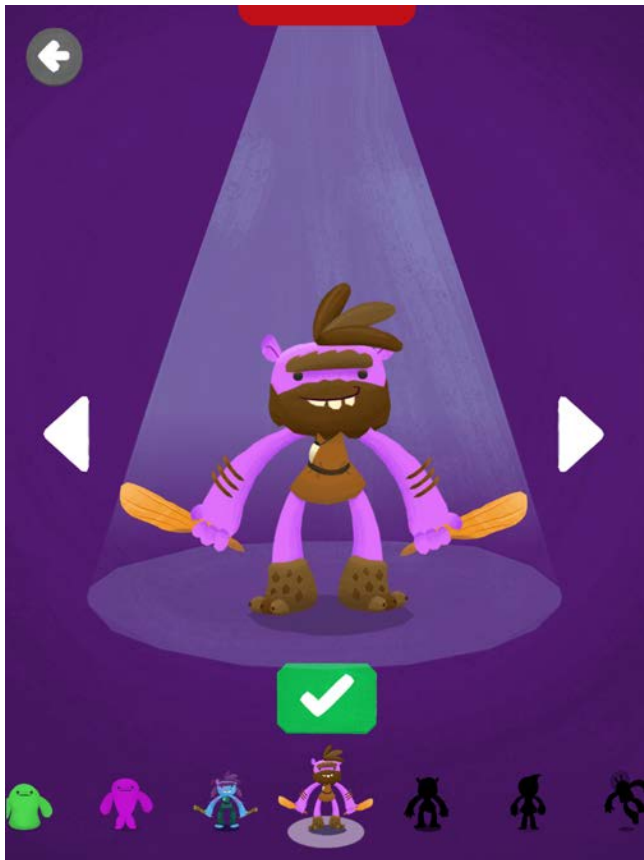
Subroutine

Subroutines are a way to store an entire sequence of code into one of these three special blocks. Use a subroutine block if you want to save or reuse longer and more complex codes.

Musical Worlds and the Jam Crew

Key Concept 1 : Command Blocks (Continued)

Coding Jam is filled with over 300 musical objects. New and unique characters will join your Jam Crew the more you practice or publish new jams. Each new member of your crew has a different theme and set of musical objects.



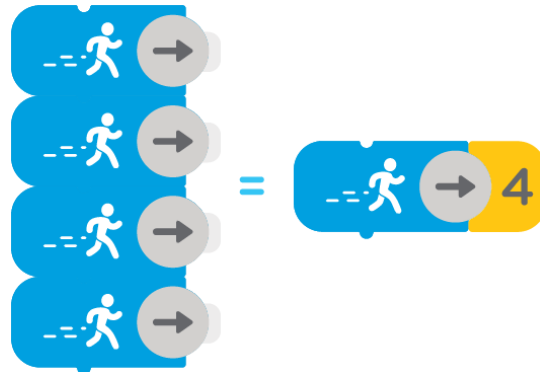
Make more music, grow your Jam Crew!



Quantifiers

Key Concept 2:

The yellow number blocks are **Quantifiers**. If you attach a quantifier to a Verb Command block (Walk, Jump, or Hand), the character will play that musical object as many times as the number on the quantifier. Quantifiers range from 2 to 5. Think of quantifiers as parameters to a function.

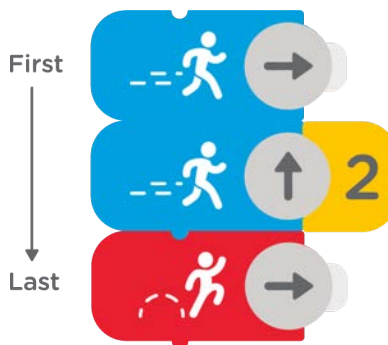


Sequencing

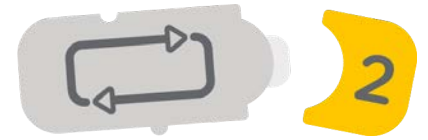
Key Concept 3:

Sequencing is when you connect two or more blocks together. When you start using multiple blocks in succession, you're taking an important step towards a key computational concept, sequencing.

The order of commands is read from the top down. In the below sequence, the character will play the musical object located at Walk Right 1 time, then play the object at Walk Up 2 times, then play the Jump Right object 1 time.



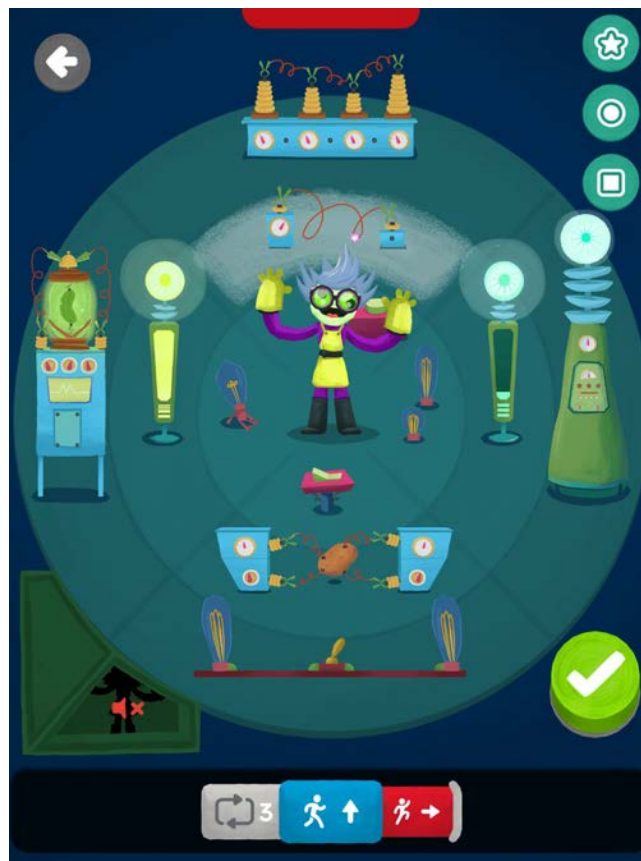
Creating Loops with Repeats



Key Concept 4:

Use the **Repeat Block** to “loop” your code. A loop is when a sequence of commands is repeated. By putting a Repeat Block at the top of a sequence, all commands attached below it will repeat by the Quantifier you attach to it.

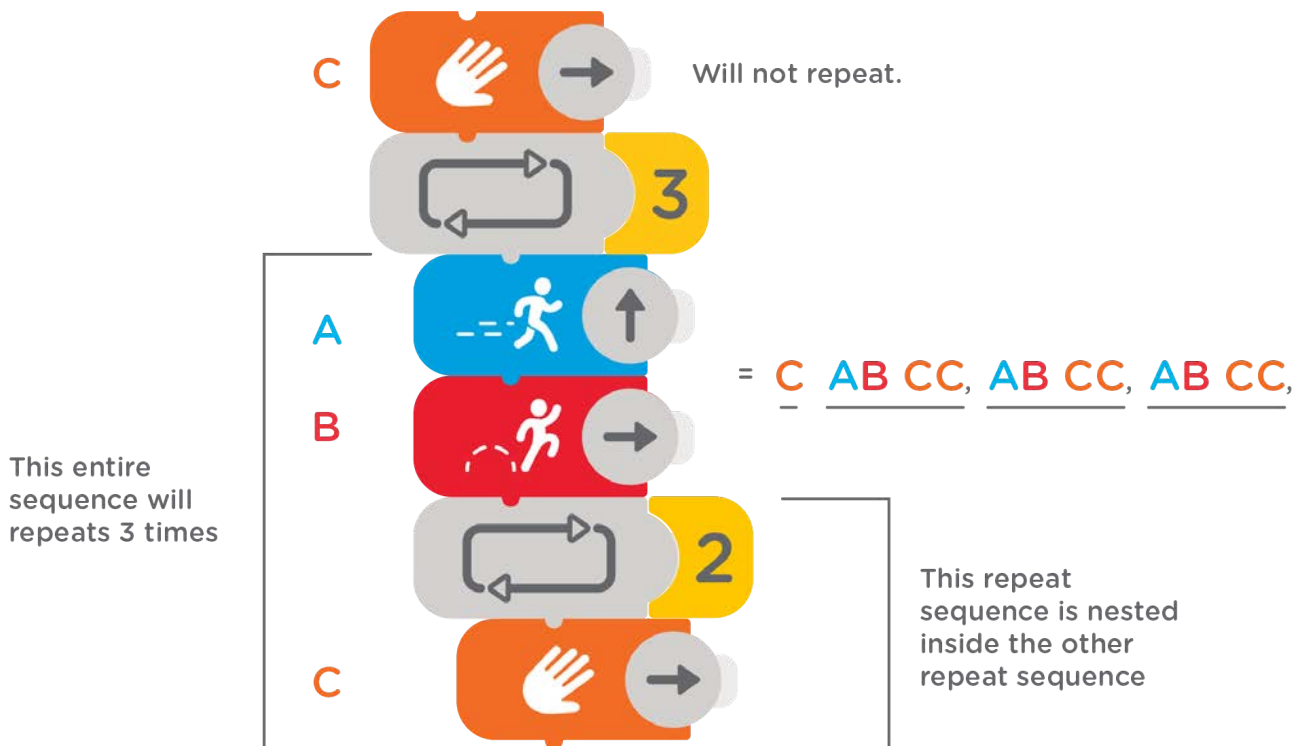
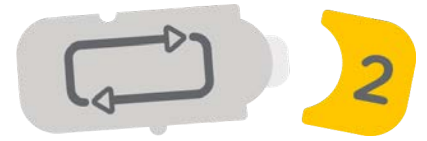
Note: Attaching a Quantifier Block to the Repeat Block is required to make a sequence loop.



Nested Repeats

Key Concept 4 (Continued):

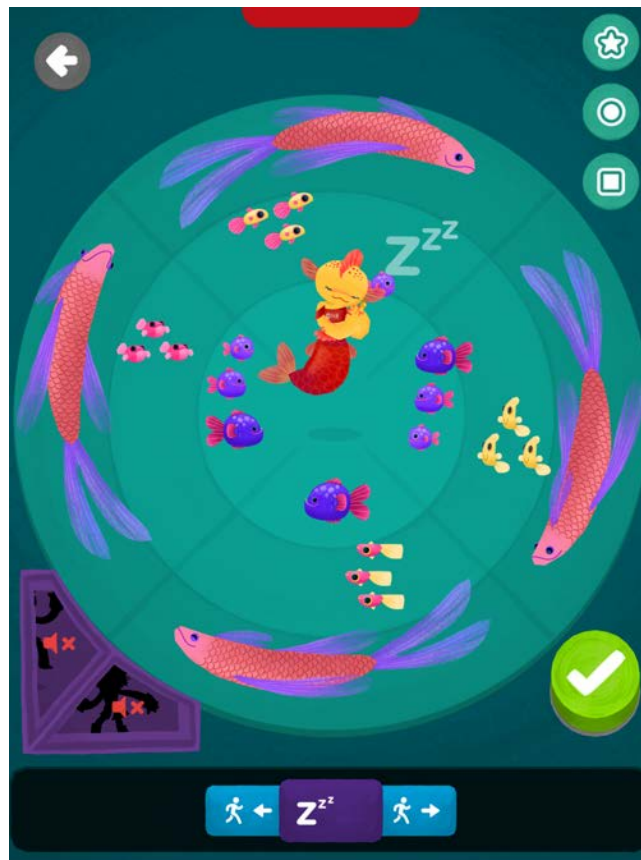
You can add multiple **Repeat Blocks** to create a **nested loop**. Each Repeat block adds one indentation. When code reaches the end of a nested loop, it will bounce back up to each Repeat block, going to the one with the deepest indentation first.



Rests

Key Concept 5:

Use the **Rest Block** whenever you'd like to add a pause to your jam. This block tells the character to pause the sequence for a single beat. Add quantifiers to the Rest block if you would like to have a longer section of silence. Use the Rest block at the start of a track to control when the music begins in your jam.



Practice Mode

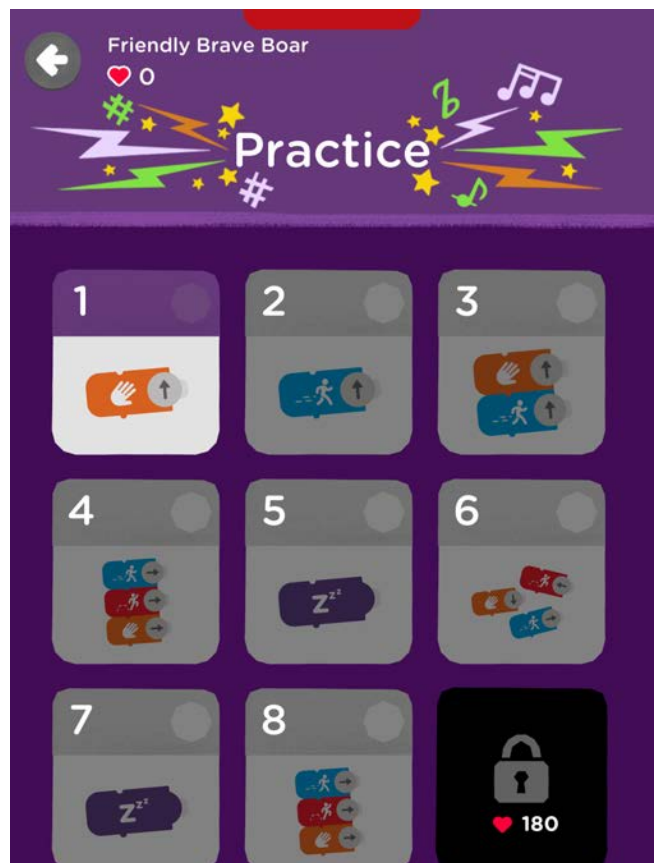
Walk-through 1:

Practice Mode contains a set of skill-building exercises that helps you learn the basic usage of each coding block and how to make jams. You can earn hearts by completing practice levels. If you need more hearts for the next practice level, you can go to Studio Mode to earn more hearts.

1. Tap **Practice** to see a list of all the practice levels. If this is your first time playing Coding Jam, you will need to complete a level before moving on.
2. When you get to a level that requires hearts to unlock, go to **Studio Mode** to earn more **Hearts**.
3. Each practice level focuses on a key concept. Tap on a level to practice that concept.
4. There are two types of challenges in Practice Mode. In the first type, you play the highlighted object on screen. In the second, you play the sequence shown in the bottom bar.



Let's Practice!

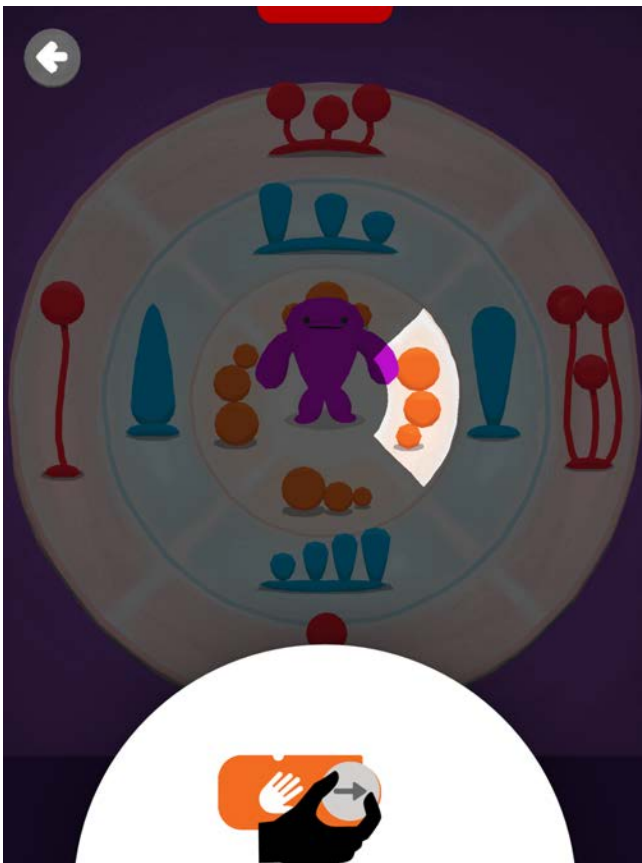


Practice, progress, and learn.

Practice Mode

Walk-through 1 (Continued):

1. Tap **Level 1** to begin your first practice jam. To complete this level, you'll play the objects that are highlighted.
2. Slide an orange Hand block in front of the screen. Rotate the arrow in the direction of the highlighted object. If you need help, follow the direction on the screen.
3. When you complete the level, a **Green Check** button will appear in the right. Tap it to unlock the next level.
4. You earn hearts by completing each level. **Use Hearts to unlock Studio Mode and attract more characters to join your Jam Crew.**



Studio - Making Jams

Walk-through 2:

Studio opens after you earn **100 Hearts** in Practice. Here, you can earn more hearts by creating jams in the open-ended studio. Each jam you create in Studio Mode is automatically submitted for a chance to be featured on JamTV.

1. To make a jam, first tap **Studio** and then tap on the **Studio Door**.
2. Tap on **1** to create your jam's first track.
3. Scroll through and choose one of your Jam Crew members. Experiment with coding sequences to create the sound for this track. Tap the **Green Check** to save the track.
4. Repeat steps 2 & 3 for the rest of this jam's tracks. Tap the **Green Check** to save your jam and publish it to JamTV.



Tap on the Studio Door



Choose 3 members of your crew

Studio Mode - Editing Jams


Walk-through 3:

In your studio, you can go back and play, you can edit any of your published jams.




1. In Studio, Tap  to view your published jams.



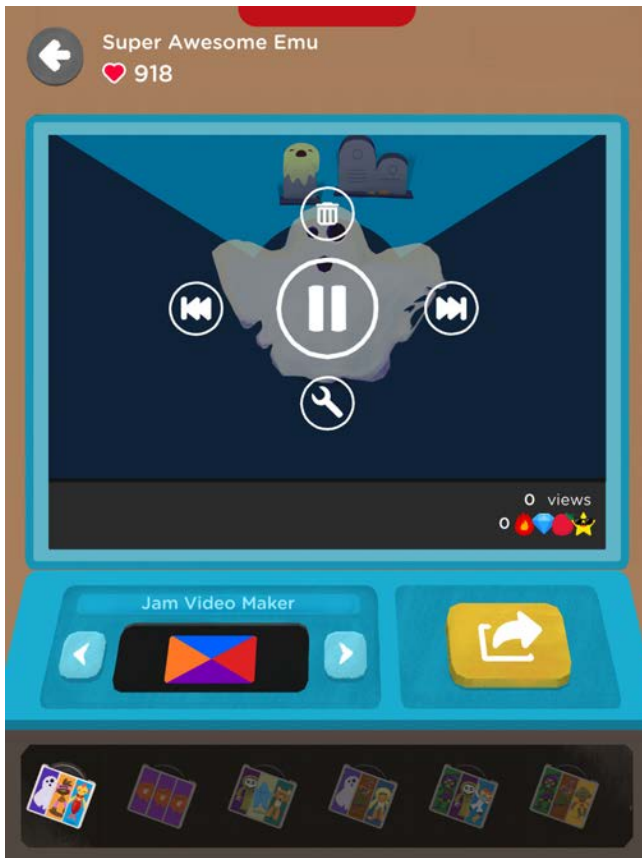
2. Scroll through your jams, choose the one you want to edit, and tap on .

You will then see all three tracks playing. Click on the character who's track you want to edit.



3. Tap  to unlock and edit the code sequence.

4. Tap the **Green Check** to save your changes and publish your revised jam.



Preview, Edit, and Share



Tap the **Lock** if you want to edit.

Subroutines

Advanced Concept:

For more advanced coders, you can save and reuse sequences inside of subroutines.



1. First put down a sequence of code.
2. Then choose one of the three subroutine blocks you'd like to save it to. Tap on the matching symbol of the block and when ready, hit the green save button.
3. Your code is now saved! Slide in the Subroutine Block you chose. Connect it or use it by itself.



Save a code to one of the Subroutines.



Use a Subroutine Block

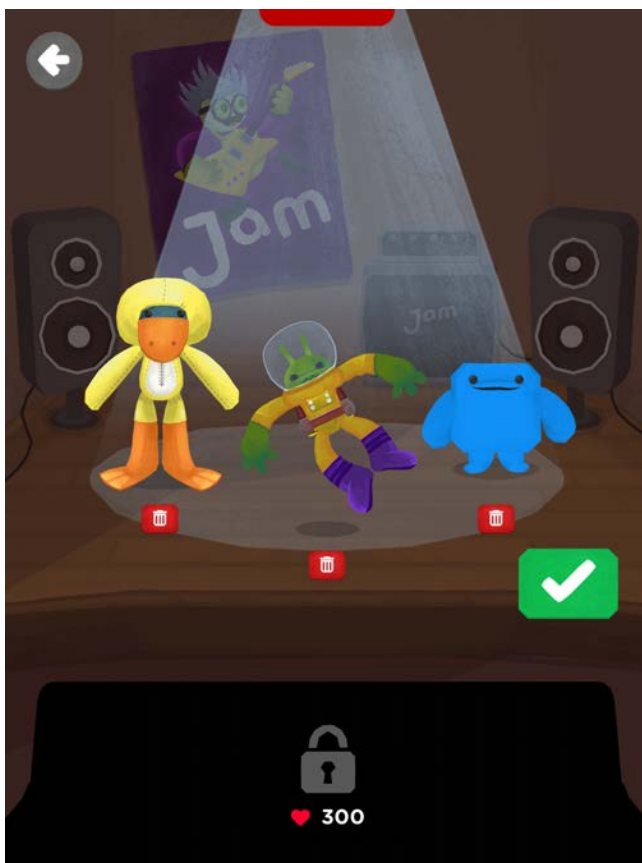
Advanced Editor & Chord Machine

Walk-through 4:

Once you earn **300 hearts**, you will unlock the **Advanced Editor** and **Chord Machine**. Use it to add chord progressions and to access editing features like delete, rewind, and pause.

1. To add a chord progression, create a jam in **Studio**.
2. Tap on the arrows to switch between different chord progressions.
3. Listen to how these different chords change the tune of your Jam. The keys are shown on the Chord Machine display.

Note: By default, all jams start in the key of C major.



Chord Machine is locked till 300 Hearts

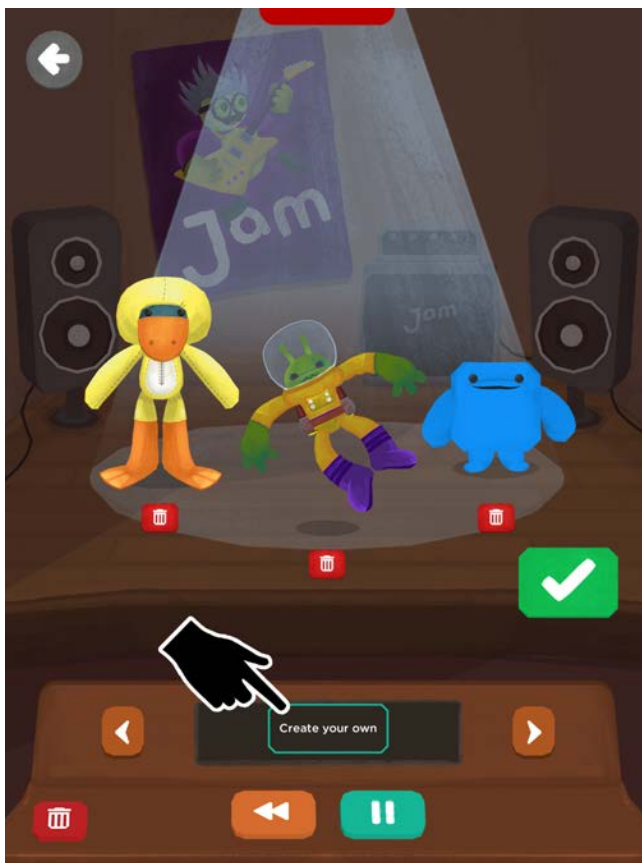


Custom Chords

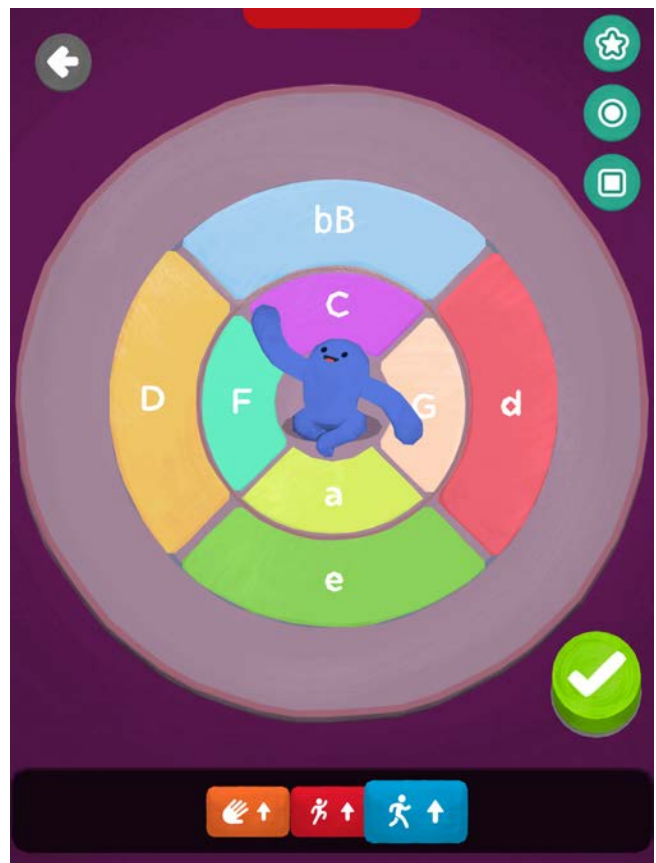
Walk-through 4 (Continued):

1. Create a jam in **Studio**. Switch and tap on **Create your own** in the Chord Machine.
2. Use only **Walk** and **Hand Blocks** to program your chords.
3. When you're done save it by tapping the **Green Check**.

Note: In order to hear chord progressions, you will need to have tracks created.



Switch to and tap **Create your own**




Code your own chord progression

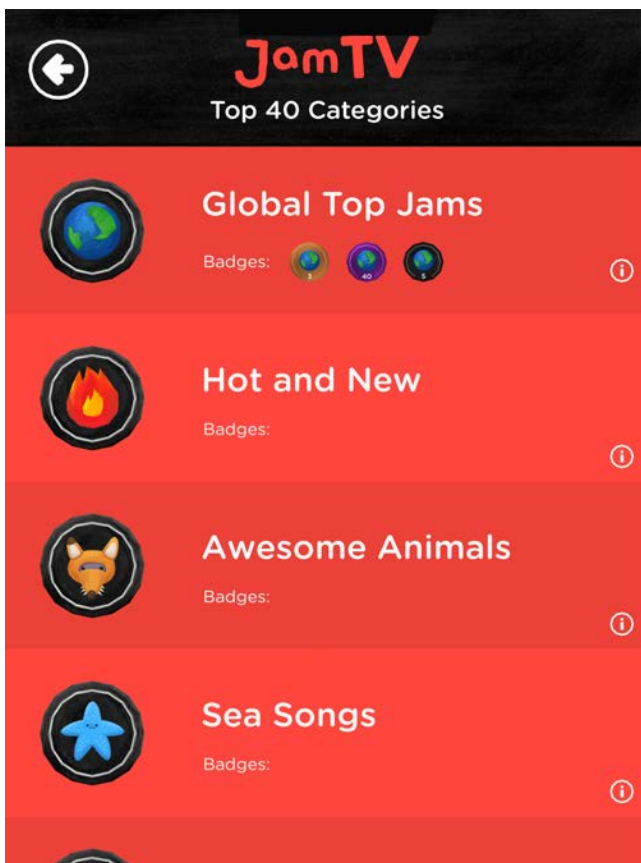
JamTV

Walk-through 5:

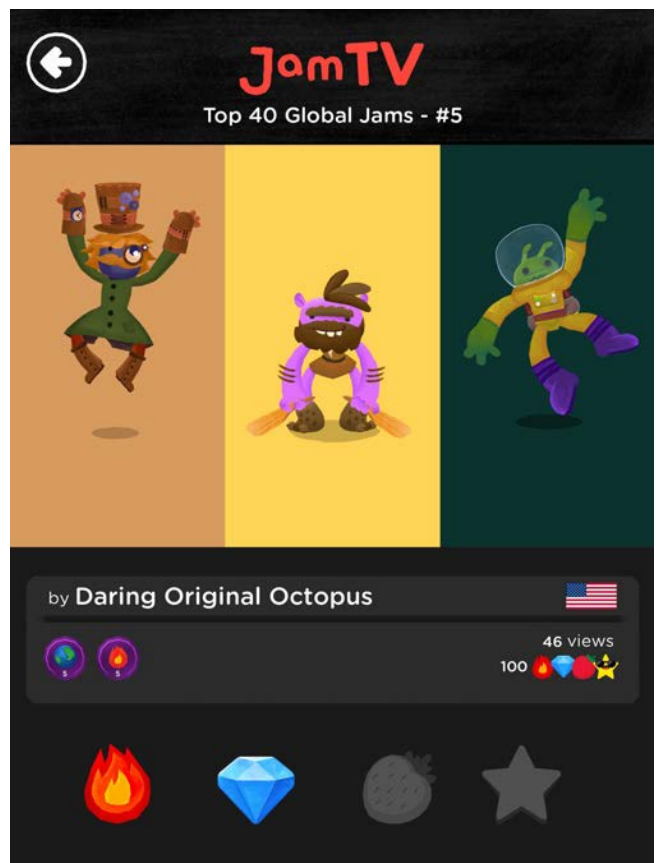
JamTV is an awesome place to listen to jams created by other players from around the world! You can listen for fun, rate jams with emojis, earn category badges, and learn how to code new jams!



1. Tap **Studio** and then .
2. Scroll up or down to browse different categories. To learn more about each category, tap on the info button. Each banner also showcases any of your achievements in that category.
3. Tap a **Banner** to check out the top ranking jams in that category.



Check out all the Top 40's




Listen and give emojis!

Alert Notifications

Walk-through 6:

You will receive an alert notification whenever your jam is featured on JamTV or when a player gives you an emoji.

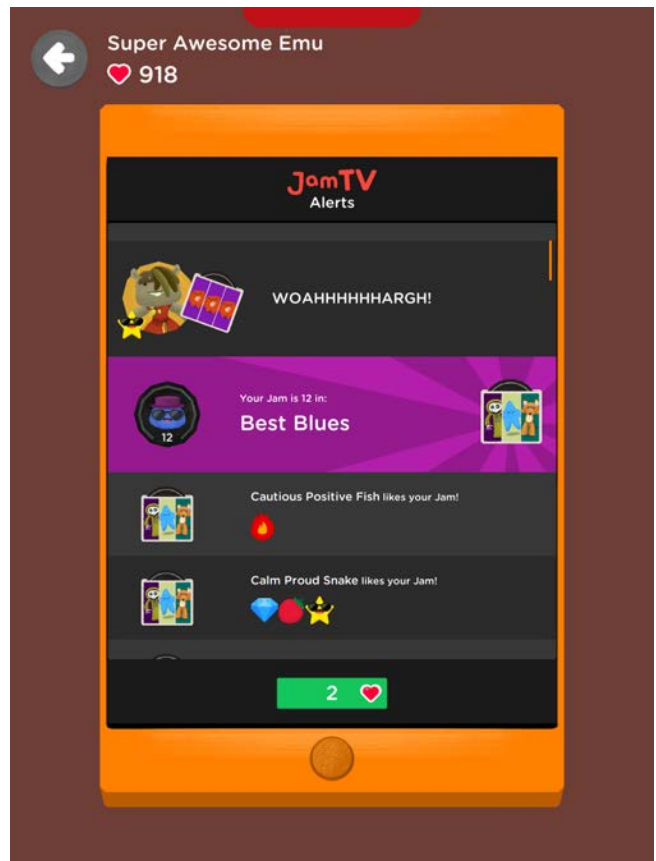


1. In **Studio** tap on .
2. Scroll up or down to browse your notifications.
3. Tap and collect your awarded hearts! Each emoji awarded is worth 1 heart.

Note: Tapping the green heart counter button at the bottom will collect all notification hearts at once.



Blinking yellow means you have an alert!





Check out those gifted emojis from fans!

Sharing Jams

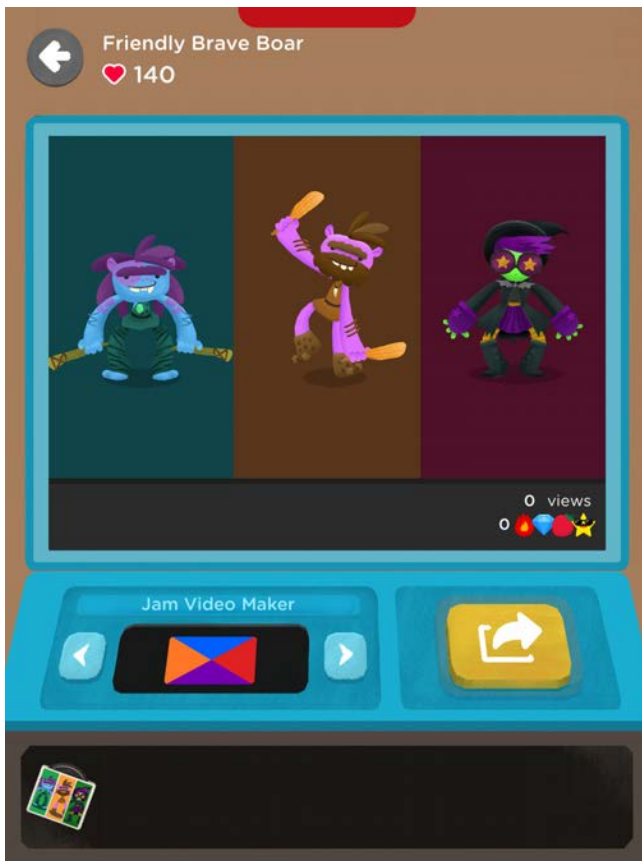
Walk-through 7:

Along with sharing your creations safely with others from around the world with JamTV, you can also share your jams using the **Share Button** in two different ways.

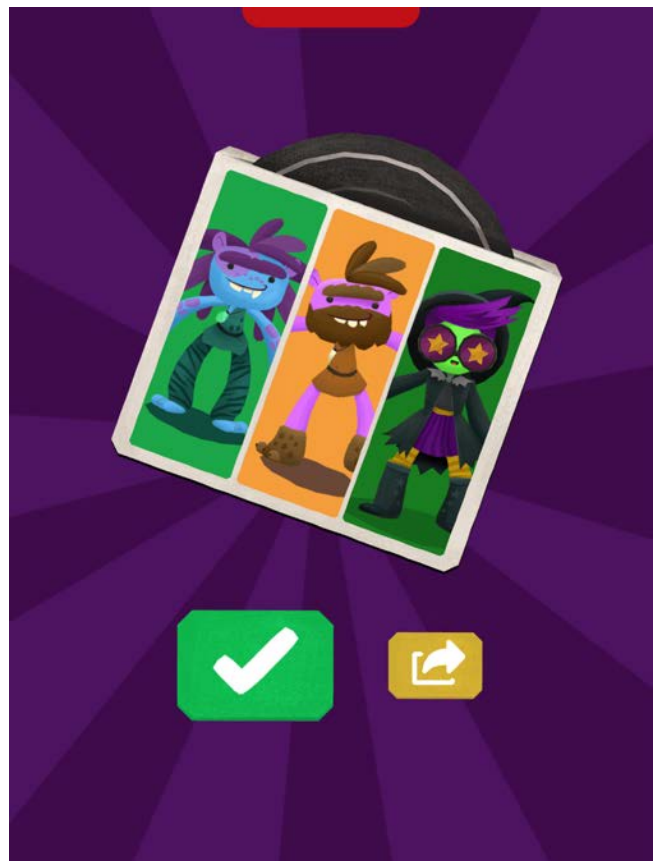


1. In Studio, Tap  and scroll through to the Jam you'd like to share.
2. Select a desired music video style under **Jam Video Maker**.
3. Tap  to share. Your myOsmo associated email account will receive a link to your jam!

Note: You must have a **myOsmo Account logged in** and **accessible internet** in order to share jams.



Share from the Jam Player.



Share right after publishing a Jam.

Best Practices for Effective Osmo Detection

1. Keep hands and fingers away from the blocks after placing them so that Osmo can see it.
2. Keep the reflector centered along the top edge of your device so the camera can see the play space.
3. Keep the blocks close to your device so the camera can see them.
4. Play Coding Jam in a well lit room. If your table top or surface is a dark color, it may be interfering with the software detection.
5. Try placing an 8.5 x 11 sheet of white paper on the tabletop, and then put the blocks on top of the paper.
6. Make sure you are using a device that is compatible with Osmo. Please check [this list of Osmo-compatible devices](#).
7. If you experience any issues despite this setup, please reach out to support@playosmo.com for assistance.



Other Questions

What do I do if I lose a Coding Block?

Please reach out to support@playosmo.com for assistance.

Can I clean the pieces?

You can gently wipe the blocks with a damp cloth if they get dirty.