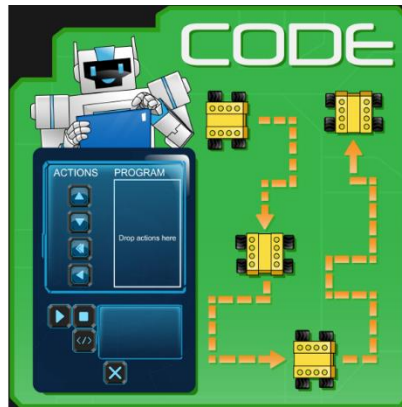
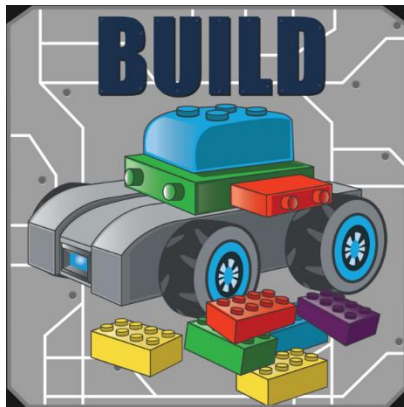


Meeper

HOW TO MEEPER!

GETTING STARTED



VERSION 1.0
SEPTEMBER 1, 2017

COPYRIGHT © 2017 MEEPER TECHNOLOGY, LLC (MEEPER). ALL RIGHTS RESERVED. NO PART OF THIS DOCUMENT MAY BE REPRODUCED OR TRANSMITTED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, FOR ANY PURPOSE, WITHOUT WRITTEN PERMISSION FROM MEEPER.

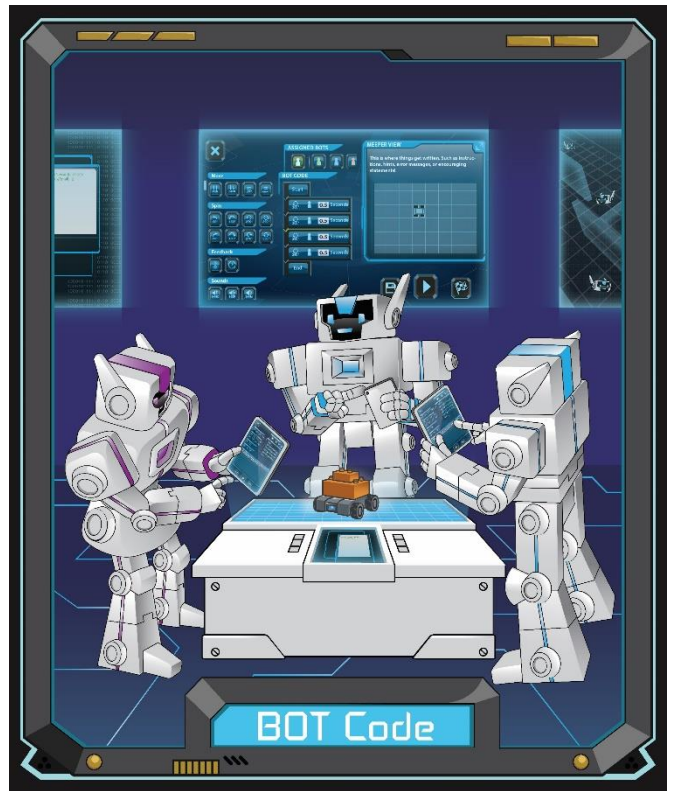
PROPRIETARY AND CONFIDENTIAL



Introduction

You just received your meeperBOT! We couldn't be more excited for you. So many things to Build, Drive, Code and Create! We want you to have the best experience ever and to master all the capabilities of your meeperBOT, so here are a few resources to get you started!

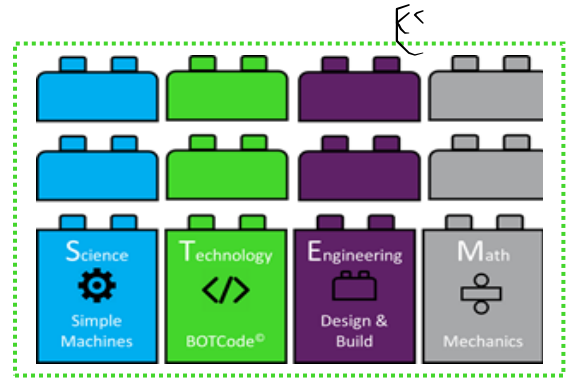
Let's Meeper!





How-To #1: What is a meeperBOT?

Remote-control, programmable BOT with free Controller App that brings your bricks to life!



Guidance:

The meeperBOT is a remote-control, programmable BOT with free Controller App that brings your bricks to life!

meeperBOT 2.0

- Brick-block compatible, programmable BOT
- Durable ABS plastic chassis
- Front hitch, back hitch and removable wheels to support all your brick kits and builds
- Dual, rear-wheel 300 RPM motors
- Bluetooth “BLE” sensor-driven.
- Choose from Eight Colors!! Meeper Blue, NEON Green, BOT Gray, Wild Berry, Blaze Orange, Brick Red, Supernova (Yellow), Deep Space (Black)

Controller App

- Smart Phone or Tablet become your Remote Control with Free App
- Tablet or Phone, Apple or Android
- Three Drive Modes: Command Drive, Touch Drive and Tank Drive
- Electric Leash follows or finds you!
- Single and 8-way multi-BOT Control
- Comics – meet mpr10 and BOT2.0 and help them build, create and innovate their way out of all kinds of worlds and situations.
- Video and Camera mode let’s you save your creations

BOTCode™

- Programming for K-8
- Program your BOT for an obstacle course, maze, drive path or to event to a new realm
- Drag-n-Drop Scratch-like Programming
- Create a program and run the code on your BOT.
- Watch your program execute on your BOT or virtual BOTS and see the generated BOTCode.
- Personalize your BOT with names, colors, and icons.
- Calibrate your BOT.



In the Classroom

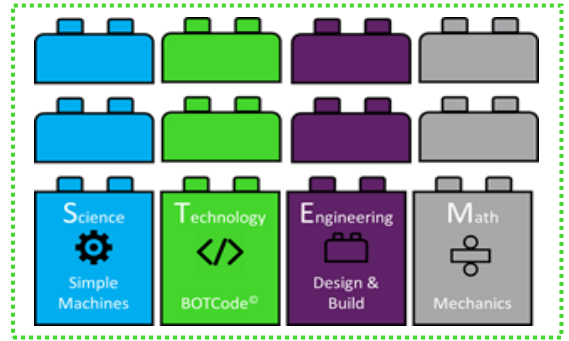
Introduce the meeperBOT to your students.

Provide them an overview of the meeperBOT, App and BOTCode™.



How-To #2: The Meeper Story

The Meeper world is a cool, creative place – here’s an introduction!



The Meeper Story:

In a galaxy of explorers and scientists, there are none greater than the robots of Meeper (meeperBOTS), a race of advanced inventors and explorers based in their home, a nomadic space ship simply known as the Meeper Base Station.

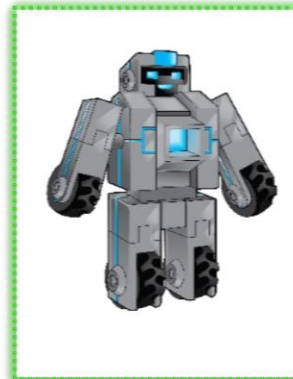
The meeperBOTS power themselves and their world with Blue Energy. They must continually explore the universe to find new sources of Blue Energy. In their explorations, they make new friends, build new creations and share their inventions and Meeper technology with other civilizations.

meeperBOTS must have many different skills and roles, including Architects, Builders, Materials Managers, Observers and other skills to continuously explore, invent and make new creations. The most important skill is problem-solving. The most elite and expert problem solvers get to venture in to the galaxy to search for new resources, materials and civilizations. These are the Masters. Master Builder, Master Architect, Master Explorer and others.

One Meeper, a young, very curious, robot named **mpr10**, aspires to be one a Master and go out and explore the universe. He is too young explore yet, but one day his curiosity gets the best of him and when he is investigating a Meeper spaceship, he launches himself in to space!

mpr10 crash lands on a planet. The damage to his ship is extensive. The only thing that still works is his onboard computer which has a plethora of Blueprints, which are designs and guidance for solving common problems. This will become a great resource for mpr10.

mpr10 also finds the pieces to his friend and sidekick, **BOTTO**, a robotic vehicle that mpr10 can Build, Code and Drive. If mpr10 can repair BOTTO, he will be indispensable in helping him explore and overcome challenges in this new world.



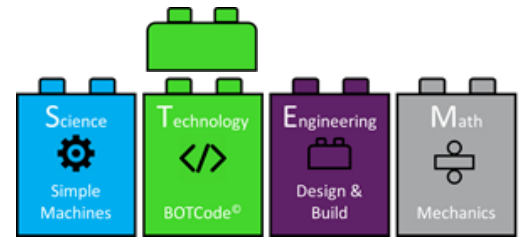
In the Classroom:

Share the Meeper Story with your students to get them thinking about new Meeper challenges, characters, activities, builds, comics, story lines and creations.



How-To #3: Download & Drive

Go to the App Store and download the meeperBOTS App. How hard can it be?



Finding the App:

You will need the meeperBOT App to control your meeperBOT.

To find and install the Meeper App, your first step is to go to the app store on your device. The most recent version of the Meeper App is available on iOS, Android, and Kindle Fire devices, both phones and tablets.

Search your device's App Store for 'meeperBOTS', and look for a page like the one shown to the right. The page should say 'meeperBOT 2.5' or 'meeperBOT 2.0'.

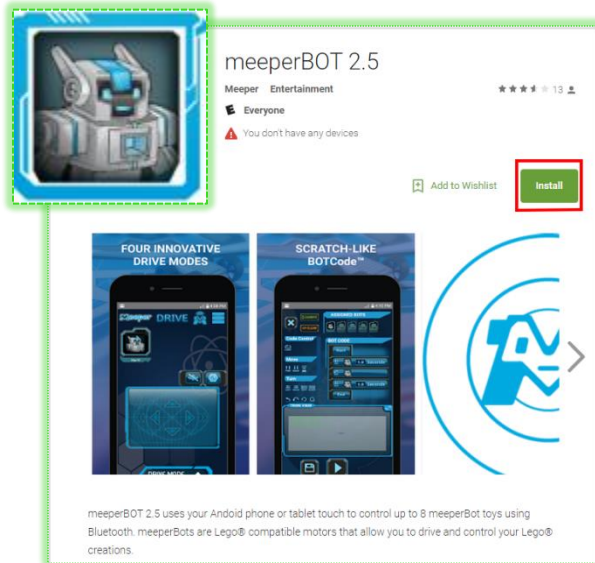
Your device will need around 30 MB of free space. Click click Get/Install/Download.

Your device should take care of the rest, and you should be able to open the app from here!

You're ready to Connect to bots, drive, and help mpr10 find his way home!

If you have any issues finding the app, or installing it, please send an email to info@meepertek.com.

Available on:



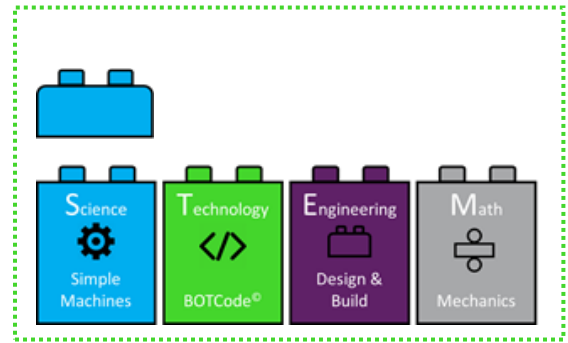
In the Classroom:

1. Discuss the Meeper App and how it controls the BOT via Bluetooth Low Energy or BLE 4.0 in the device (tablet or phone)
2. Discuss the meeperBOT and the electronics, including the BLE chip in the BOT that communicates with the App and provides commands to the dual motors to move forward/backward.



How-To #4: Do's and Don'ts

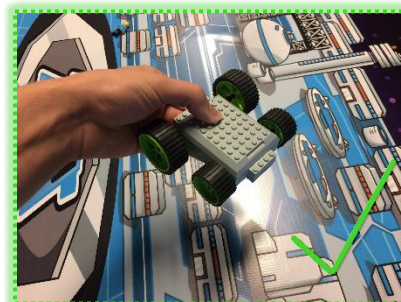
That is the question. What should you avoid doing with your meeperBOT? How can you play properly with a meeperBOT?



Do's and Don'ts:

Your meeperBOT is an amazing building platform and can support a whole truckload of bricks. With proper care, your BOT will be your buddy for many years. Here are a few tips for proper use and care.

1. Avoid pushing the axels forward or back! Your Bot can't move without his wheels, and pushing on them might bend them out of shape, which can lead to awkward turning and broken driving.
2. It's also not great to push the BOT manually. It is hard on the motors. Use the Controller App to make your BOT move.
3. It might sound cool to create a motorcycle rally race in the dirt, but without proper protection, your MeeperBOT could end up with a bunch of gunk in its gears, which can lead to your BOT breaking! It's best to keep your BOT inside and away from small rocks or dirt.
4. Sometimes the axels can pick up hair or other items. You should review this and clean them periodically.
5. The best places to drive your MeeperBOT are large, wide open spaces with walls – driving them on tables or near edges risks your BOT falling off the table.
6. When replacing a battery, or opening up your BOT, treat the electronics with care. Do not yank on wires or components. While all parts of the meeperBOT can be repaired, you don't want to have your meeperBOT out of commission in the Meeper Garage.
7. The meeperBOT can run all different surfaces – cement, carpet, blacktop, wood floors or other surfaces. As with your car, different tires/wheels can run better on different surfaces. In addition, you can Calibrate your BOT in the Controller App for different wheels and surfaces.
8. Make sure your BOT wheels are configured evenly on each side. This will make your BOT run better.



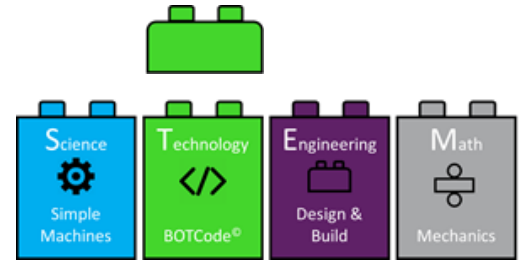
In the Classroom:

1. Discuss proper driving etiquette.
2. Discuss proper care and use of your device (tablet/phone) and the meeperBOT.



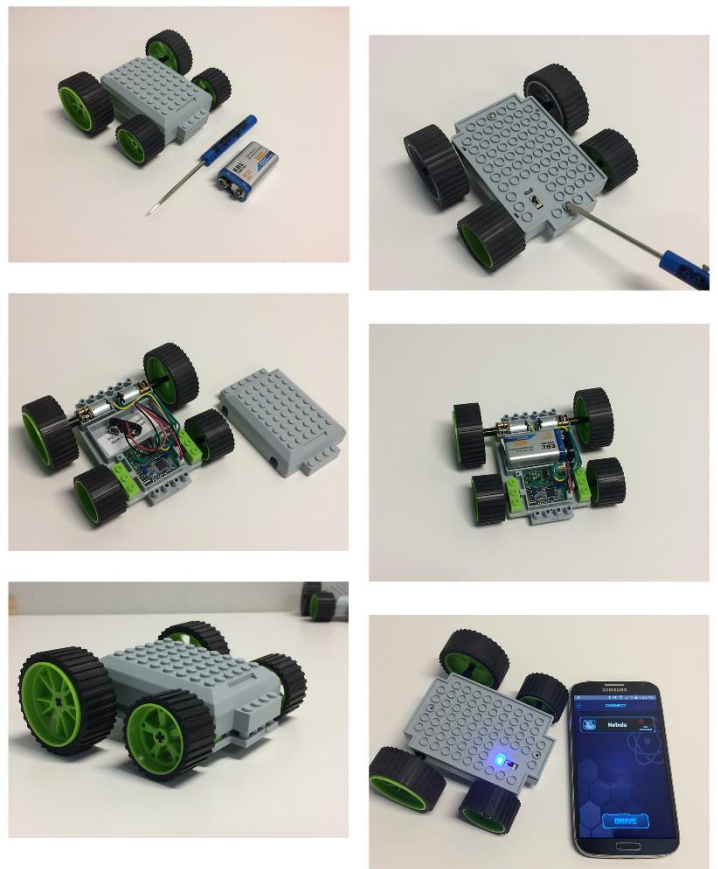
How-To #5: Battery Installation

All it takes is a small flathead screwdriver, a 9 Volt battery, and a meeperBOT to start your adventures!



The Steps to Setup:

1. Make sure you have a small flathead screwdriver and a 9V Battery ready to go – these are not included in the box.
2. Take your meeperBOT and flip it onto its back – locate the screws on the front and back of its underside, and gently loosen them.
3. Flip your meeperBOT back right-side up, and take off the top shell. Inside should be an empty battery compartment w/ a battery cap, two rear-wheel motors, and a housing near the front, with the BOT's Bluetooth chip.
4. Take your 9V Battery and attach it to the wired cap, then slide it into its compartment and close/screw the meeperBOT back up.
5. Flip the switch on the underside of the BOT – a blue light should start to blink! That's the Bluetooth chip waiting for a connection to a device.
6. Open up your Meeper App and Connect to your BOT.
7. You're ready to go!



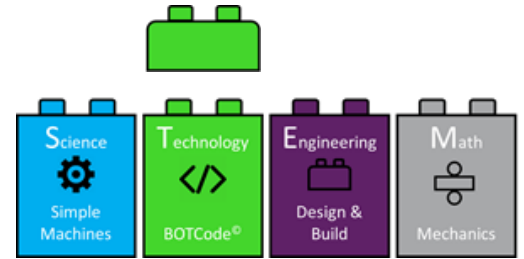
In the Classroom:

Discuss power concepts.



How-To #6: Connect, Disconnect, and Reconnect

Connect to your meeperBOT or multiple BOTS and Drive!



How to Connect:

1. Open your Meeper App and navigate to the Connect Screen, by tapping the icon in the upper-left hand corner, and touching 'Connect' on the menu. If you are opening the app for the first time, it should go to this screen by default.
2. Make sure your Bluetooth is on - if it's off, the app should prompt you to turn it back on, but it's always best to make sure.
3. Flip your MeeperBOT onto its underside and find the power switch. Turn on the switch, and a blue light should start blinking – this signals that the BOT's Bluetooth chip is waiting to be Connected to a device.
4. Look back onto your phone – within moments, your BOT should pop up on the screen.
5. If it is the first time you are connecting to your meeperBOT, by default your BOT name will be meeperBOT2. You will be able to change your meeperBOT name and other settings in the My BOTS screen.
6. Click the red button where it says NOT Connected to Connect to your meeperBOT. This button will turn green when you are Connected.
7. You may select multiple BOTS (up to 8) to Connect to on this screen.
8. Tap the image that pops up, and the phone should do the rest. You're now connected and ready to drive!



How to Disconnect

To disconnect, you can either turn the BOT off with the switch on the meeperBOT or return to the Connect screen and push the Connected button next to your BOT's name. This will disconnect you from the meeperBOT and someone else can now connect.

How to Reconnect

Turn on your meeperBOT. Return to the Connect screen and select the meeperBOT(s) you wish to reconnect.

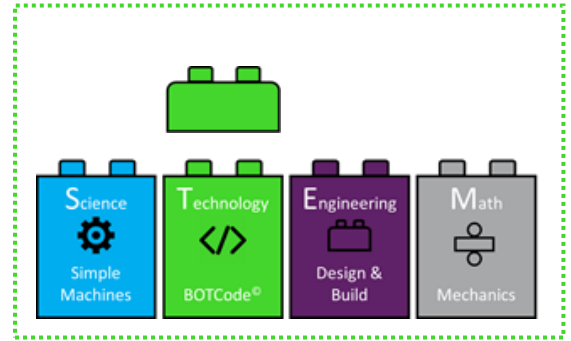
In the Classroom:

Discuss Bluetooth, connections, and multi-BOT connections.



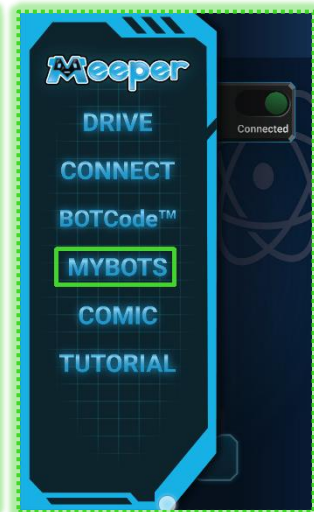
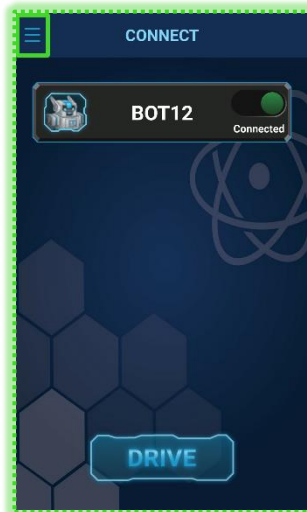
How-To #7: Personalize Your BOT

You can name your meeperBOT, as well as change the icons and colors to make your BOT your buddy. When playing with friends or multiple BOTS you will then know who's BOT is whose.



Customizing Your meeperBOT:

1. Open your meeperBOT app and Coconnect your BOT.
 - a. *NOTE: in order to customize any meeperBOT, you must be connected to it.*
2. Navigate to the MyBOTS screen via the icon in the upper left hand corner.
3. Your BOT should show up in a list, with an icon, name, battery indicator, and a Settings icon (crossed screwdriver and wrench icon)
4. Tap your BOT name in the list to pull up the Edit BOT screen.
5. Select yourr BOT's icon/color and rename your BOT.
6. To save your changes, hit the 'Confirm' button on the lower right.
7. Your new BOTS name will now be displayed in the Connect, Drive, and MyBOTS screens.
8. Other users will see your BOTS new name when they return to the Connect screen in their Controller App..



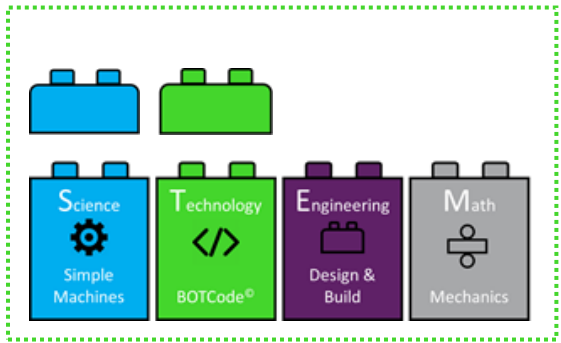
In the Classroom:

Discuss BOT customization.



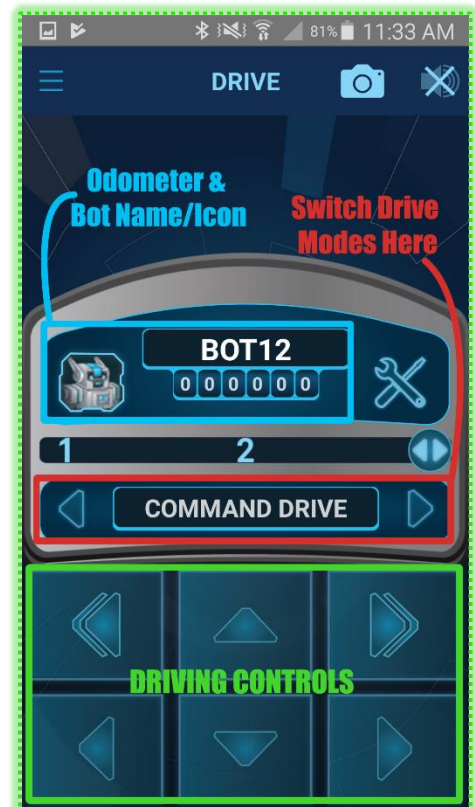
How-To #8: Drive!

Time to show off our most defining feature Driving!
Spin, Turn, Forward/Reverse and try the 3 different
Drive Modes.



Drive Your meeperBOTS

1. Open your meeperBOT Controller App.
2. Connect to your meeperBOT(s) and tap the Drive button.
 - a. Note: You can also use the navigation menu to go to the Drive screen from anywhere in the Controller App..
3. Welcome to the Drive Screen! There are three different Drive modes.
 - a. **Command Drive**, is the easiest mode. Great for younger ages (or older ☺) and great to get started learning to Drive you BOT.
 - b. **Tank Drive**, a two-handed drive control which gives you direct control over each of the back motors.
 - c. **Touch Drive**, a super-responsive, joystick-like controller which lets you touch and drag where you want the meeperBOT to go!
4. The Driving Controls provide the commands for Forward/Reverse, Left/Right Turn and Left/Right Spin.
5. Switch Drive modes using the left and right arrows above the Driving Controls.
6. Monitor the Odometer to know how far your BOT has traveled.
7. The Settings icon (wrench) will take you to the MyBOTS screen to personalize your BOT.



In the Classroom:

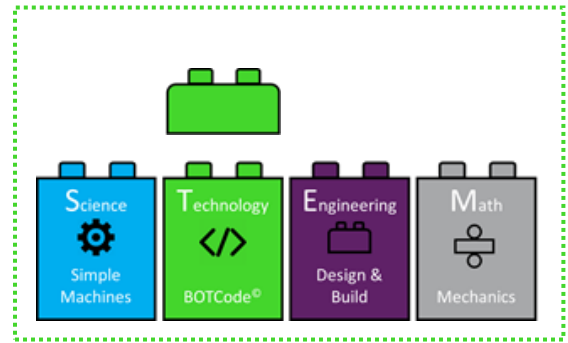
Discuss different Drive modes and which are best suited for different ages or activities.

Build the Odometer measurements in to lessons on distance.



How-To #9: Driving Features

But wait, there's more! Camera and Sounds!

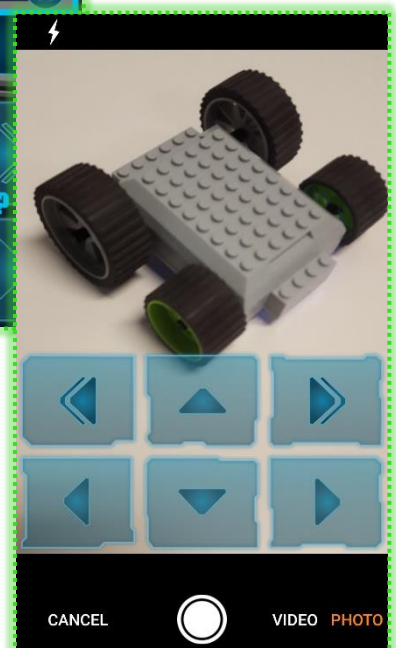
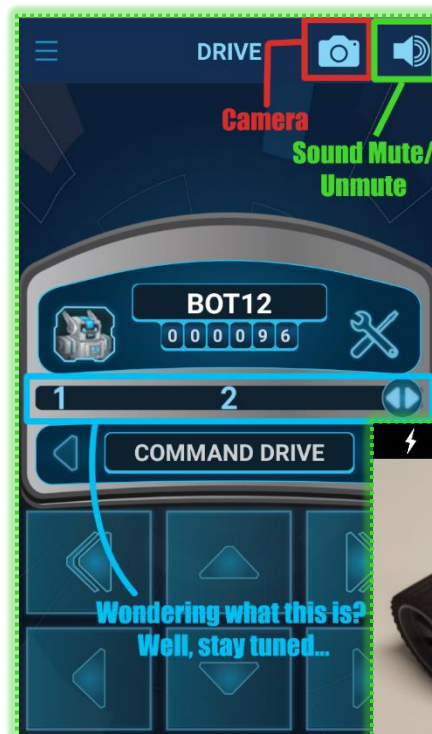


Video & Pictures

1. Open your meeperBOT Controller App.
2. Connect to your meeperBOT(s) and tap the Drive button.
 - a. Note: You can also use the navigation menu to go to the Drive screen from anywhere in the Controller App..
3. In the top right corner of the screen are the Camera and Sounds icons.
4. Click on the Camera icon.
5. The screen will change to Camera Mode.
6. You can now Drive your BOT AND at the same time take video and pictures of your best build, race or battle BOT.
 - a. Select Video, hit the record button and start recording that battle.
 - b. Select Photo and take a picture of your best build.
7. Send us your best picture or video #meeperBOTS.

Sounds

1. Tap the Speaker Icon to enable sounds and then Drive your BOT.
2. Turn up the volume on your device.
3. Listen to the great motor, racing and BOT sounds as you Drive and control your BOT.
4. You can mute the sounds by tapping the Sound icon again.



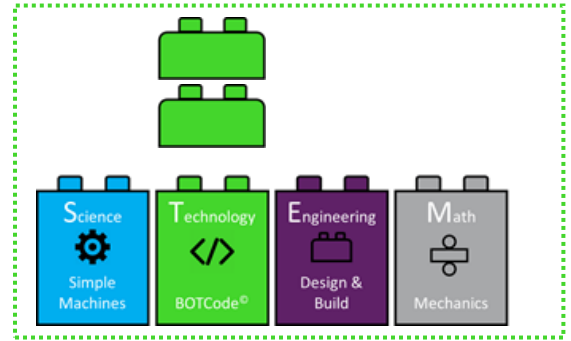
In the Classroom:

Discuss the use of Camera on the device and how that is different from having a camera on the meeperBOT.



How-To #10: Multi-BOT Controls

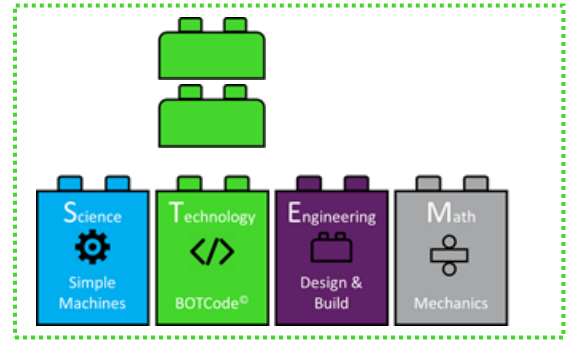
Connect and control up to 8 meeperBOTS at one time!





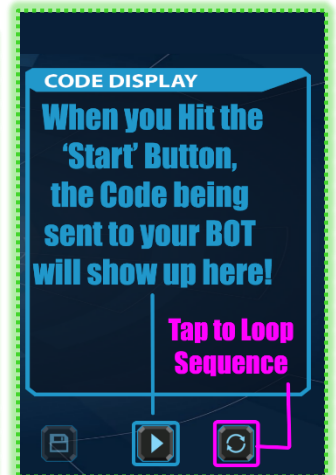
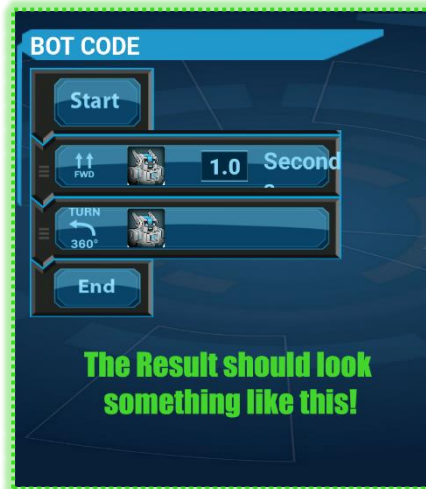
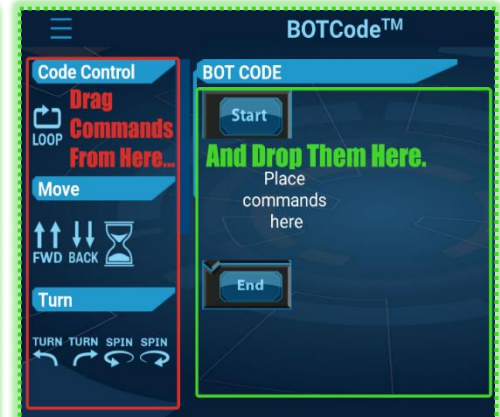
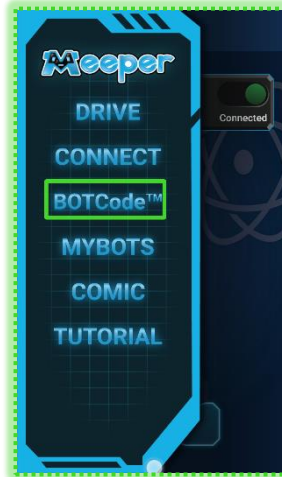
How-To #11: BOTCode™

Create programs to make your BOT complete a maze or drive around the house.



Create Cool Code:

1. Open your meeperBOT Controller App.
2. Connect to your meeperBOT(s) and tap the Drive button.
3. Click the navigation menu in the top-left corner of the screen.
4. Select 'BOTCode™' Button, and turn your phone sideways – BOTCode™ will always be locked in landscape mode.
5. Welcome to BOTCode™, where you can program sequences of actions for your BOT, and see them in action!
6. To start things off, try tapping and dragging one of the 'actions' from the "Code Control" section to the BOT CODE section.
7. If you want to rearrange actions in the sequence, just tap-n-drag those, too!
8. Now, just hit the 'Start' Button, the Button with the Play icon in the lower right hand corner. Watch your BOT go!
9. Watch your Code execute in the BOT Code section.
 - a. The command that is running will be highlighted in the BOT Code section.
 - b. The Java code that is generated for that command is displayed in the Code Display section. Learn real Java Code with your BOTCode programs.
10. To Repeat running of your Code, hit the Loop Sequence button next to the Start button. Your BOT will repeatedly run your code sequence until you hit the Loop Sequence button again to turn it off.
11. Utilize different types of commands:
 - a. **Code Control.** Loop and delay your code with Code Control commands.
 - b. **Move Controls.** Forward and Reverse commands.
 - c. **Turn Controls.** Turns, Spins for time durations or by rotations.



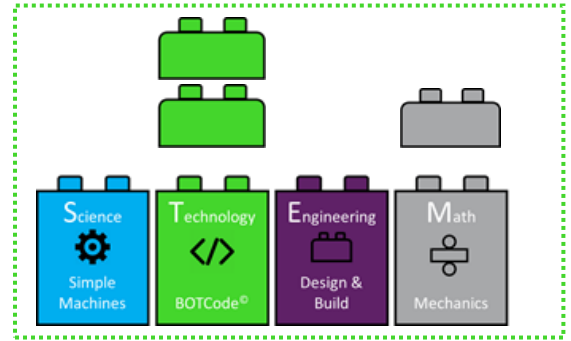
In the Classroom:

Discuss coding concepts.



How-To #12: Save & Edit BOTCode™

Change the duration or your program commands.
Save and Run your saved programs.



Edit Your BOTCode™ Commands:

1. Open your meeperBOT Controller App.
2. Connect to your meeperBOT(s) and tap the Drive button.
3. Click the navigation menu in the top-left corner of the screen.
4. Select 'BOTCode™' Button, and turn your phone sideways – BOTCode™ will always be locked in landscape mode.
5. Drag a command into the BOT CODE section.
6. Tap that command in the BOT Code section.
7. The Edit Command screen will appear.
 - o Change the duration of the command (in seconds)
 - o Select the BOT(s) that will run this command.
 - o Press 'Confirm' to save your changes.
8. Run your code.

Note: You must be connected to your BOT(s) in order to program the BOT with commands.

Save Your BOTCode™

1. Tap the 'Save' Button in the lower right corner. Enter in the Name for your routine, then tap 'Save'. Congrats! You have now saved your new routine to your device.
2. To find your newly saved masterpiece, go to the bottom of 'Code Control' menu (where you drag commands from). Your program will appear under the 'Saved Code' banner.

Use Your Saved BOTCode™

If you ever want to use a saved program, just drag the saved routine in to the BOT Code section, just like any other command.

To save any changes you make, be sure that you call it the exact same name when you tap 'Save' again.



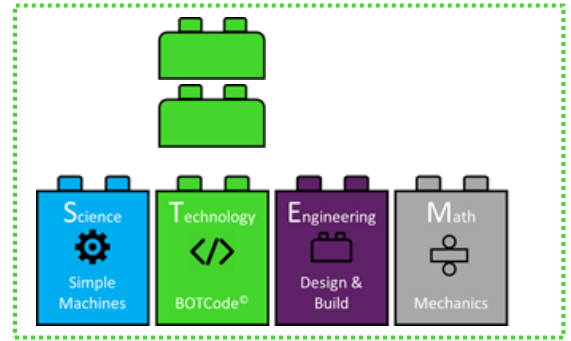
In the Classroom:

Discuss Programs and Code Routines.



How-To #13:
Multi-BOT BOTCODE™

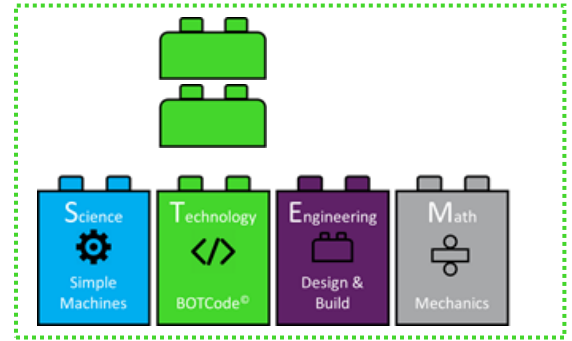
Code multiple BOTS to do the same or different commands. Synchronize your BOTS in a convoy or Code them to individually to stop and go.





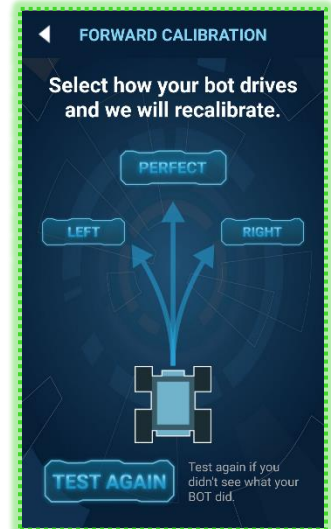
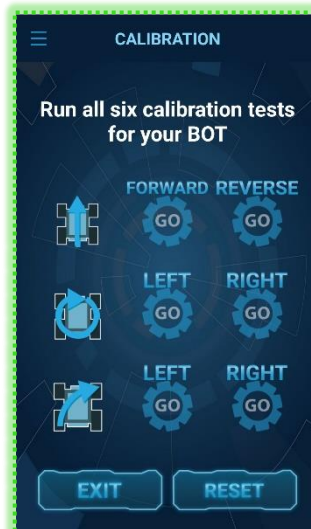
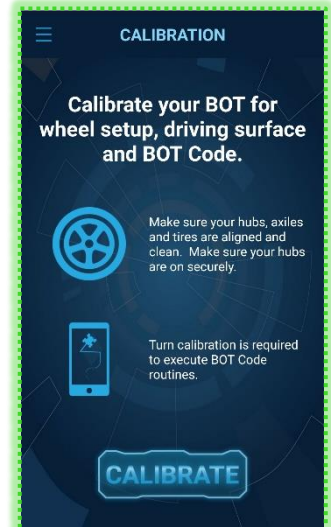
How-To #14: Calibrate Your BOT

Calibrate your BOT to adjust for wheel setup or different surfaces.



Calibration:

1. Open your meeperBOT Controller App.
2. Connect to your meeperBOT(s) and tap the Drive button.
3. Click the navigation menu in the top-left corner of the screen.
4. Select 'MyBOTS' Button,
5. Tap the Settings icon (crossed wrench and screwdriver) to be taken to Calibration.
6. After a few seconds, the app will tell you if your device is compatible for calibration – if it is, then go ahead and just tap 'Calibrate'.
7. Select each of the six different Calibrations:
 - a. Forward/Backward
 - b. Spins (Left & Right)
 - c. Turn (Left & Right).
8. The Calibrations are independent of the other. You may just wish to correct your BOT Forward motion or Turning Left motion. You may do just one or a few of the Calibrations. However, we do recommend that if you want true precision, you Calibrate all six settings for your BOT.
9. To Calibrate an action:
 - a. Set your BOT on the ground (in a wide area) with about 6ft+ of room.
 - b. Hit "Drive". Watch the BOT closely and determine how the BOT performed.
 - i. If you didn't catch how your BOT performed, simply hit Test Again.
 - c. Select how the BOT performed on the Calibration screen. E.g. It went Perfect (straight) or Left or Right.
 - d. Continue Calibration until it is Perfect.
 - e. If at any point you wish to discard your changes, you can tap the 'Reset' button on the bottom of the main screen.
10. Select Exit when you are done with your Calibration.



In the Classroom:

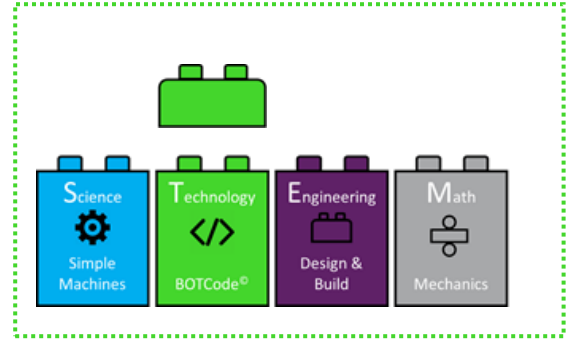
What wheels work best on what surfaces?

What other factors impact the performance of my BOT (e.g. Straight Wheels, Wheels even on each side, etc)



How-To #15: Energy Leash!

Want a game to play with your BOT? Why not Hide n' Seek?



(Un) Leashing Your Energy:

1. Open your meeperBOT Controller App.
2. Connect to your meeperBOT(s) and tap the Drive button.
3. Hit the Drive Mode arrows until you switch to the Energy Leash screen.
4. Set your BOT on the ground a fair distance away from you.
5. Press 'Seek'. Now watch your BOT try to look for you!
6. As your BOT tries to find you, you're going to need to help it along – take a look at the Hot, Cold, and Obstacle buttons.
 - a. When your BOT is moving farther away from you, tap the 'Cold' Button.
 - b. Tap the 'Hot' Button when it's getting closer.
 - c. If your BOT runs into an obstacle, use the two Obstacle buttons to tell it whether it should turn to the left or right and avoid it.
7. When your BOT has finally found you, or you'd like to stop it, just press the Stop button.



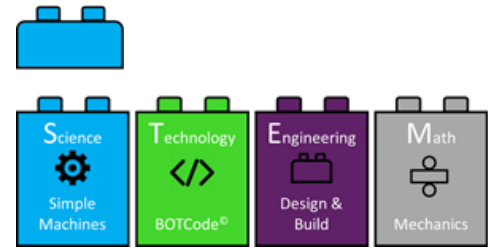
In the Classroom:

Discuss the Bluetooth signal and how it is being used to have the determine where the BOT is at and send signals to direct the BOT to you.



How-To #16: Swap Wheels & Axles

Snap an axle? Need a tire change? Just want to switch that Supernova yellow color for Meeper Blue? Grab a screwdriver, we've got you covered.



You Will Need

- 1/8" Flathead Screwdriver
- Your new Axles/Wheels

Swapping Axles:

Swapping the axles is a bit trickier than the wheels, but it shouldn't be too difficult. To take off your axles, start by popping each wheel off, turning the BOT over, and unscrewing the two screws holding the chassis together. Remove the top (you can use your screwdriver for leverage), and set it aside.

To Replace the Front Axles:

1. Locate the two 'bricks' at the front, holding the axles – use your screwdriver to pry each up and off of the chassis.
2. Slide out the axle, and replace it with your new one. Make sure your new axle fits snugly in the hub.
3. Replace the hubs on to the bottom of the chassis.
 - a. Make sure they fit down snugly on the pegs. This will help your BOT drive better.

To Replace the Rear Axles:

1. Take your screwdriver/a small spoon, and gently pry the axle from its motor shaft. Be careful to push straight off, not up or down.
2. Take your new axle, and take note of the keyed shape, a D-slot (a flat surface on the otherwise circular hole). Line this flat surface up with the motor shaft, and push each axle on snugly.
 - a. Push each axle on to the motor shaft the same distance on both the left and right motor.
 - b. Put each wheel on the axles the same distance on the left and right side.
 - c. This will help your BOT drive better.

Swapping Wheels:

Swapping your meeperBOT's wheels is quite easy. You pull off the wheels, and then slide on your new Meeper wheels.

The rear wheels are the motor axles, so these are tight and a little more difficult to change.

Front Wheels:

These simply pop off of the axle, and shouldn't be too much trouble. However, make sure they're both even, or they could cause your BOT to veer off in one direction or another.

Rear Wheels:

These are a bit trickier, and are fit very snugly onto the axles. You might want to use your screwdriver to push on the wheels, or place the wheel on a raised surface, give it a few firm taps.

The important thing is to make sure the force you're applying is going into the wheel, and not the more fragile axle.

When you replace the wheels, we recommend pushing both as far as they can go onto the axle, to guarantee that both are 100% flush and straight. Just like the front wheels, if the rear wheels aren't both aligned the same, it could cause the bot to swerve.



Battery Information

Battery Safety

You will need to insert a 9 Volt battery into your meeperBOT before using. To install a battery remove the two screws on the bottom of the meeperBOT and take off the top cover. Connect your 9V battery to the battery snap.

Please use only 9V alkaline based batteries from reputable manufactures (Duracell, Energizer, Rayovac, Eveready, Panasonic). Rechargeable 9V batteries may also be used. Do not use old or worn out batteries. Dispose of used batteries properly.

Do not use your meeperBOT in water or wet conditions or on wet surfaces.

Do not tamper with your meeperBOTs circuitry. Do not attempt to overpower your meeperBOT by using more than a 9V power supply or with a different combination of batteries as this may cause a fire hazard.

Please operate your meeperBOT with the cover on and screws secured.

If your BOT feels warm or you suspect an issue, turn it off immediately, remove the battery and contact our Meeper Garage.

Here is additional general good general battery safety information from Duracell:

<https://www.duracell.com/en-us/help/faq>

Battery Usage

The meeperBOT used power very efficiently. It will run for about 3 hours of straight drive time. If you leave the BOT on and are not driving it, there is very little power draw. While your battery will run down if you leave the BOT on, it will not run down very quickly if the BOT is not being driven.



Teacher & Parent Guidance

Care of the meeperBOT and devices.

The meeperBOT is controlled by a smart device – a phone or a tablet. Children are generally aware that devices are expensive and should be treated with care. Electronics, like the meeperBOT should be treated with the same care.

Electronic are treated with care. You would not drop your phone and let it hit the ground, nor should you drop or throw the meeperBOT. While the meeperBOT is made of durable ABS plastic, it is not indestructible.

Driving the meeperBOT.

When the meeperBOT is provided to the children. Confirm that they do not test drive it on their desk or a table. It will drive off the desk and crash to the floor.

In addition, do not let them test drive it while someone is holding it. The person holding it will jump and the meeperBOT may crash to the ground.

Establish a driving “space”. Only driving should take place here. Set correct expectations and rules. Students will get extremely excited and will walk in the drive space. It is very possible that someone will drive a meeperBOT in the pathway and may get stepped on.



Compatible Devices

The Meeper App is compatible with iOS and Apple device with BLE version 4.0 or greater. We recommend that you try installing the App before you place your order or have a class, just to be sure your device is compatible!

You can check our website for the latest list of compatible devices:

<https://meeperbot.com/pages/smart-device-compatibility>

Here is a list of compatible devices and information.

Kindle Fire. The Controller App will work with any Kindle Fire that has BLE 4.0 or greater. This is any Kindle from 2014 to current Kindle releases.

iOS. Again, any iOS device with BLE 4.0 is compatible. This is:

- iPhone 4s and more recent
- iPad 3 and more recent
- iPad Mini
- iPad Air

Android.

- Android phones dating back to 2011 generally have Bluetooth 4.0. However there are many variations of Android devices, so check the App Store and download the meeperBOT Controller App to make sure it is compatible.
- There are also MANY Android tablets. Some Android tablets say they have Bluetooth 4.0, but when we tested them, the Bluetooth did not work or support the Meeper Controller App. Again, go to the App Store and download the device to help ensure compatibility.