

STEAM030 CODING CRITTERS

KIT CONTENTS that must be returned

Book included: STEM Careers Software Engineer by R.J Bailey (35718)

Coding Critters Quick Start Guide

Coding Critters: Ranger & Zip Story Book
Coding Critters: Dart's Big Race Story Book







1 Ranger, 1 Zip & 1 Dart

12 Dart's Big Race Tiles

12 Pawprint Tiles

1 Doghouse

1 Ball Launcher

1 Ball

1 Slide

1 Bone

1 Tree & 1 Hydrant





Meet the Coding Critters!

These playful pets bring early STEM concepts to preschool learning through 100% screen-free coding.

Kids code along with their new pets' storybook adventure, and help the brave Ranger and mischievous Zip have a playtime they'll never forget!

The Coding Critters also double as cute interactive pets - press Ranger's nose to activate Play Mode, where you can feed, pet, and take care of your new puppy robot pal!

You can even make him dance and sing a silly song!

Scroll down for Instructions.



At-Home Activities Coding

One of the fundamental aspects of coding is **SEQUENCING**. When you are on a schedule at home or school, you might do things in a sequence too. (First you wake up, then you brush your teeth, then you get dressed, etc.)

Think about how performing tasks in a certain order helps you complete them easily.

Think Like A (oder!

- With two people, choose one person to be the CODER and one to be the ROBOT.
- Arrange a simple obstacle course in your house.
- Now, using just verbal commands of FORWARD, BACK, TURN LEFT, and TURN RIGHT, the CODER should think about how to direct the ROBOT to get through the course.
- Using 3 steps at a time, the CODER should say the commands to the ROBOT.
- The **ROBOT** performs the commands to see if the sequence is correct.
- Repeat 3-step sequences until the obstacle course is successfully completed.

Coding Pals

- · Place RANGER (or other CRITTER) on the ground.
- Enter in any 5-step sequence (forward, turn right, forward, turn left, forward) and press the GO button.
- Have your child observe how the critter moves and what steps it followed.
- Now, have your child pretend THEY are the coding critter and move the exact same steps. Did they follow the correct pattern?
- Try this with bigger and smaller coding sequences.

(ode Racers

(Requires a CODING CRITTER and 1-2 dice cubes)

- Place the Critter on the table or ground. Set a start and finish line about 5 feet apart.
- Place the Critter on the STARTING line and roll the dice cube. Program Critter number of of forward steps (match dice) and press GO.
- Repeat until the Critter reaches the FINISH line. Try to do this in the fewest number of dice rolls possible.
- Now, use 2 dice cubes and use the sum of the two numbers as the number of steps to program (for example, if the dice cubes land on 2 and 4, then code your critter 6 steps forward).



Scan the QR codes below for "How to Videos"



Getting Started with Coding Critter

Meet the Coding Critters





Coding Critters™ Go-Pets



ON/Off

Encendido/apagado Marche/Arrêt An/Aus

Battery case

Compartimento de las pilas Compartiment des piles Batteriefach

How to Use

Make sure batteries are installed before use. See Battery Information below.

Playing with Coding Critters Go Pets: To get started, first make sure that 4 x LR44 batteries are correctly installed. Slide the Power switch to the ON position. Your Go-Pet's wheels should be moving. Now, line up your Go-Pet directly on top of the black line on the included tiles and let it go. It should follow along the black line path.

Draw a Path: On a white piece of paper, try drawing a path using a thick black marker. The line should be between 3 mm and 8 mm thickness. Watch your Coding Critter Go-Pet follow along!

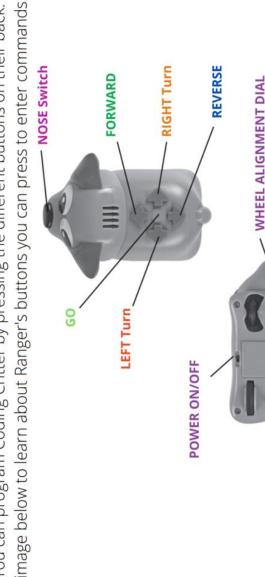
Installing or Replacing Batteries WARNING! To avoid battery leakage, please follow these instructions carefully.

Failure to follow these instructions can result in battery acid leakage that may cause burns, personal injury, and property damage.

Requires: 4 x LR44 batteries and a Phillips screwdriver

- · Batteries should be installed or replaced by an adult.
- 4 x LR44 batteries are required.
- The battery compartment is located on the back of the unit.
- → To install battery, first undo the screw with a Phillips screwdriver and remove the battery-compartment door. Install batteries as indicated inside the compartment.
- Replace compartment door and secure with screw.

- Coding Critters are a simple codable toy that is **screen-free** for children aged 4+ with adults help
- Children push buttons on the critters' back to input a series of commands, then press the grey "go" circle button to activate the code.
- Code the critter using their matching **storybook**.
- In addition to following along with the storybook's coding challenges, you can also use the critter playset to design your own code games and more!



fou can program Coding Critter by pressing the different buttons on their back. See the

Getting Started

Turning Coding Critter 'ON' & 'OFF'

Turn Critter **on** by **sliding the power button** on the bottom.



Using CODE MODE

Press the **DIRECTION** buttons on Coding Critter's back to begin inputting a coding sequence of **up to 30 steps.**

- GO Press GO to execute a programmed sequence.
 Coding Critter will now move according to the sequence of steps you've entered.
- CLEAR Coding Critter will automatically clear after you press GO and it executes the programmed sequence. If you want to clear a sequence you just inputted, press and hold GO until you hear the "clear" tone.

Build a PROGRAM SEQUENCE by pressing the arrow buttons. Press GO to run your program.

For example, a 3-step coding sequence of FORWARD, FORWARD, RIGHT TURN, GO would look like this:



FOR REFERENCE:

- o **FORWARD** Coding Critter moves 4" (10.2 cm) FORWARD.
- REVERSE Coding Critter moves 4" (10.2 cm) in REVERSE.
- o RIGHT Coding Critter turns forward to the RIGHT.
- o LEFT Coding Critter turns forward to the LEFT.
- o **NOSE SWITCH** Coding Critter makes a sound, backs up, and turns.
- WHEEL ALIGNMENT DIAL Adjust to the left or right if Critter is not moving straight.

Using PLAY MODE

Take care of your Coding Critter. **Press and hold** the **NOSE** switch until the **GO button lights up**. Now you can feed and play with the Coding Critter like a real pet!





FEED – Give your Coding Critter a tasty snack!



PATROL – Intruders, look out! Coding Critter is on duty.



DANCE – Watch your pet move and groove to the music!



NAP TIME – Your critter is looking sleepy. Time for bed!



PET – Give your critter a pat on the back.

INSERTING BATTERIES

Coding Critter requires (3) three AAA batteries. Please follow the directions for battery installation on page 3.

BASIC CONTROLS

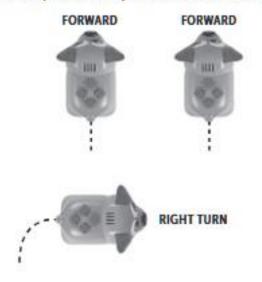
 POWER – Slide the ON/OFF switch to turn Coding Critter ON or OFF.

CODE MODE

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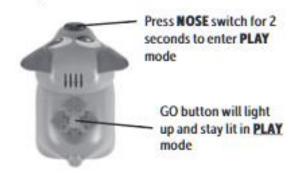
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Installing or Replacing Batteries

