



## iRobot Root Coding Robot Instructions

[Home](#) » [iRobot](#) » iRobot Root Coding Robot Instructions 

# **iRobot<sup>®</sup>** **Root**

Coding Robot  
Product Information Guide



## Contents

### 1 IMPORTANT SAFETY INFORMATION

### 2 INSTRUCTIONS FOR USE

### 3 REGULATORY INFORMATION

### 4 RECYCLING INFORMATION

### 5 SUPPORT

### 6 Documents / Resources

#### 6.1 References

### 7 Related Posts

## IMPORTANT SAFETY INFORMATION

### SAVE THESE INSTRUCTIONS



#### WARNING

When using an electrical appliance, basic precautions should always be followed, including the following:

**READ ALL INSTRUCTIONS BEFORE USE**

To reduce the risk of injury or damage, read and follow the safety precautions when setting up, using and maintaining your robot.

### SYMBOLS



This is the safety alert symbol. It is used to alert you to potential physical injury hazards. Obey all safety messages that follow this symbol to avoid possible injury or death.



Not suitable for children under three years.



Double Insulation/Class II Equipment. This product is only to be connected to Class II equipment bearing the double insulated symbol.

### SIGNAL WORDS



**WARNING:** Indicates a hazardous situation that, if not avoided, could result in death or serious injury.

**CAUTION:** Indicates a hazardous situation that, if not avoided, could result in minor or moderate injury.

**NOTICE:** Indicates a hazardous situation that, if not avoided, could result in property damage.



#### WARNING

#### CHOKING HAZARD

Small parts. Not for children under 3 years.

Root has small internal parts and Root's accessories may contain small parts, which may present a choking hazard to small children and pets. Keep Root and its accessories away from small children.



#### WARNING

#### HARMFUL OR FATAL IF SWALLOWED

This product contains strong neodymium magnets. Swallowed magnets can stick together across intestines causing serious infections and death. Seek immediate medical attention if magnet(s) are swallowed or inhaled.

Keep Root away from magnetically sensitive items such as mechanical watches, heart pacemakers, CRT monitors and televisions, credit cards, and other magnetically stored media.



#### WARNING

#### SEIZURE HAZARD

This toy produces flashes that may trigger epilepsy in sensitized individuals.

A very small percentage of individuals may experience epileptic seizures or blackouts if exposed to certain visual images, including flashing lights or patterns. If you have experienced seizures or have a family history of such occurrences, consult a physician before playing with Root. Discontinue use of Root and consult a physician if you experience headaches, seizures, convulsion, eye or muscle twitching, loss of awareness, involuntary movement, or disorientation.



## **WARNING**

### **LITHIUM-ION BATTERY**

Root contains a lithium-ion battery which is hazardous and liable to cause serious injuries to persons or property if mishandled. Do not open, crush, puncture, heat, or incinerate the battery. Do not short-circuit the battery by allowing metal objects to contact battery terminals or by immersing in liquid. Do not attempt to replace the battery. In the event of battery leakage, avoid contact with skin or eyes. In case of contact, wash the affected area with copious amounts of water and seek medical advice. Batteries must be disposed of in accordance with local regulations.



## **CAUTION**

### **STRANGULATION HAZARD**

Root's charging cable is considered a long cord and could present a possible entanglement or strangulation hazard. Keep the supplied USB cable away from small children.

## **NOTICE**

Use Root only as described in this manual. No user-serviceable parts are contained inside. To reduce the risk of damage or injury, do not attempt to disassemble Root's plastic housings.

The materials provided in this guide are for informational purposes only and may be modified. The latest version of this guide can be found at: [edu.irobot.com/support](http://edu.irobot.com/support)

## **INSTRUCTIONS FOR USE**

**TURNING ROOT ON/OFF** – Press the power button until the lights turn on/off.

**HARD RESET ROOT** – If Root is not responding as expected, hold the power button for 10 seconds to turn Root off.

**LOW BATTERY WARNING** – If Root flashes red, then the battery is low and needs to be charged.

**CLICKING NOISE** – Root's drive wheels have internal clutches to prevent damage to the motors if Root is pushed or gets stuck.

**PEN / MARKER COMPATIBILITY** – Root's marker holder will work with many standard sizes. The marker or pen should not touch the surface underneath until Root lowers the marker holder.

**WHITEBOARD COMPATIBILITY** (model RT1 only) – Root will operate on vertical whiteboards that are magnetic. Root will not operate on magnetic whiteboard paint.

**ERASER FUNCTION** (model RT1 only) – Root's eraser will only erase dry erase marker on magnetic whiteboards.

**ERASER PAD CLEANING / REPLACEMENT** (model RT1 only) – Root's eraser pad is held in place with a hook-and-loop fastener. To service, simply peel off the eraser pad and wash or replace as needed.

### **CHARGING**

Use the supplied USB cable to charge your robot under adult supervision. The power source should be regularly examined for damage to the cord, plug, enclosure or other parts. In the event of such damage, the charger must not be used until it is repaired.

- Do not charge near a flammable surface or material, or near a conducting surface.
- Do not leave robot unattended while charging.
- Disconnect charging cable when robot is finished charging.
- Never charge while the device is hot.
- Do not cover your robot while charging.
- Charge at temperatures between 0 and 32 degrees C (32-90 degrees F).

## **CARE and CLEANING**

- Do not expose robot to high temperature conditions such as direct sunlight or hot car interiors. For best results use indoors only. Never expose Root to water.
- Root has no serviceable parts though it is important to keep the sensors clean for optimal performance.
- To clean sensors, lightly wipe top and bottom with a lint-free cloth to remove smudges or debris.
- Do not attempt to clean your robot with solvent, denatured alcohol, or flammable liquid. Doing so may damage your robot, make your robot inoperable, or cause a fire.
- Electrostatic discharge may affect the performance of this product and cause malfunction. Please reset the device using the following steps:
  - (1) unplug any external connections,
  - (2) hold the power button for 10 seconds to turn off the device,
  - (3) press the power button to turn the device on again.

## REGULATORY INFORMATION



- This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions:
  - (1) this device may not cause harmful interference, and
  - (2) this device must accept any interference received, including interference that may cause undesired operation.
- Changes or modifications not expressly approved by iRobot Corporation could void the user's authority to operate the equipment.
- This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules as well as ICES-003 Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference to radio communication will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:
  - Reorient or relocate the receiving antenna.
  - Increase the separation between the equipment and receiver.
  - Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
  - Consult the dealer or an experienced radio/TV technician for help.
- FCC Radiation Exposure Statement: This product complies with FCC §2.1093(b) for portable RF exposure limits, set forth for an uncontrolled environment and is safe for the intended operation as described in this manual.
- This device complies with Industry Canada license-exempt RSS standard(s). Operation is subject to the following two conditions:
  - (1) This device may not cause interference, and
  - (2) this device must accept any interference, including interference that may cause undesired operation of the device.
- Under Industry Canada regulations, this radio transmitter may only operate using an antenna of a type and maximum (or lesser) gain approved for the transmitter by Industry Canada. To reduce potential radio

interference to other users, the antenna type and its gain should be so chosen that the equivalent isotropically radiated power (EIRP) is not more than necessary for successful communication.

- ISED Radiation Exposure Statement: This product complies with the Canadian Standard RSS-102 for portable RF exposure limits, set forth for an uncontrolled environment and is safe for the intended operation as described in this manual.



- Hereby, iRobot Corporation declares that the Root robot (model RT0 and RT1) is in compliance with the EU Radio Equipment Directive 2014/53/EU. The full text of the EU Declaration of Conformity is available at the following internet address: [www.irobot.com/compliance](http://www.irobot.com/compliance).

- Root has a Bluetooth radio which operates in the 2.4 GHz band.
- The 2.4GHz band is limited to operate between 2402MHz and 2480MHz with a maximum EIRP output power of -11.71dBm (0.067mW) at 2440MHz.



- This symbol on the battery indicates that the battery must not be disposed of with unsorted common municipal waste. As the end-user, it is your responsibility to dispose of the end-of-life battery in your appliance in an environmentally sensitive manner as follows:

- (1) return it to the distributor/dealer from whom you purchased the product; or
- (2) deposit it in a designated collection point.

- The separate collection and recycling of end-of-life batteries at the time of disposal will help to conserve natural resources and to ensure that it is recycled in a manner that protects human health and the environment. For more information, please contact your local recycling office or the dealer from whom you originally purchased the product. Failure to properly dispose of end-of-life batteries may result in negative potential effects on the environment and human health due to the substances in the batteries and accumulators.
- Information regarding the effects of problematic substances in the battery waste stream may be found at the following source: <http://ec.europa.eu/environment/waste/batteries/>



For battery recycling, visit: <https://www.call2recycle.org/>

- Conforms to the health requirements of ASTM D-4236.

## RECYCLING INFORMATION



Dispose of your robots in accordance with local and national disposal regulations (if any) including those governing the recovery and recycling of waste electronic equipment, such as WEEE in the EU (European Union). For information about recycling, please contact your local city waste disposal service.

### LIMITED WARRANTY TO ORIGINAL PURCHASER

If purchased in the United States, Canada, Australia, or New Zealand:

This product is warranted by iRobot Corporation ("iRobot"), subject to the exclusions and limitations set out below, against manufacturing defects in materials and workmanship for the qualifying Limited Warranty period of two (2) years. This Limited Warranty begins on the original date of purchase, and is only valid and enforceable in the country where you purchased the Product. Any claim under the Limited Warranty is subject to you notifying us of the alleged defect within a reasonable time of it coming

to your attention and, in any case, by no later than the expiry of the Warranty Period.

The original dated bill of sale must be presented, upon request, as proof of purchase.

iRobot will repair or replace this product, at our option and at no charge, with new or reconditioned parts, if found to be defective during the Limited Warranty period specified above. iRobot does not warrant uninterrupted or error-

free operation of the product. This Limited Warranty covers manufacturing defects in materials and workmanship encountered in normal, and, except to the extent otherwise expressly provided in this statement, non-commercial use of this product and shall not apply to the following, including but not limited to: normal wear and tear; damage which occurs in shipment; applications and uses for which this product was not intended; failures or problems which are caused by products or equipment not supplied by iRobot; accidents, misuse, abuse, neglect, misapplication, fire, water, lightning, or other acts of nature; if the Product contains a battery and the fact that the battery has been short-circuited, if the seals of the battery enclosure or the cells are broken or show evidence of tampering or if the battery has been used in equipment other than those for which it has been specified; incorrect electrical line voltage, fluctuations, or surges; extreme or external causes beyond our reasonable control, including, but not limited to, breakdowns, fluctuations or interruptions in electric power, ISP (Internet service provider) service, or wireless networks; damage caused by improper installation; product alteration or modification; improper or unauthorized repair; exterior finish or cosmetic damage; failure to follow operation instructions, maintenance, and environmental instructions that are covered and prescribed in the instruction book; use of unauthorized parts, supplies, accessories, or equipment which damage this product or result in service problems; failures or problems due to incompatibility with other equipment. As far as applicable laws permit, the Warranty Period will not be extended or renewed or otherwise affected due to subsequent exchange, resale, repair or replacement of the Product. However, part(s) repaired or replaced during the Warranty Period will be warranted for the remainder of the original Warranty Period or for ninety (90) days from the date of repair or replacement, whichever is longer. Replacement or repaired products, as applicable, will be returned to you as soon as commercially practicable. All parts of the Product or other equipment that we replace shall become our property. If the Product is found not to be covered by this Limited Warranty, we reserve the right to charge a handling fee. When repairing or replacing the Product, we may use products or parts that are new, equivalent to new or re-conditioned. To the extent permitted by applicable law, iRobot's liability shall be limited to the purchase value of the Product. The above limitations shall not apply in case of gross negligence or intentional misconduct of iRobot or in case of death or personal injury resulting from iRobot's proven negligence.

This Limited Warranty does not apply to accessories and other consumable items, such as dry erase markers, vinyl stickers, eraser cloths, or fold out whiteboards. This Limited Warranty will be invalid if (a) the Product's serial number has been removed, erased, defaced, altered or is illegible in any way (as determined in our sole discretion), or (b) you are in breach of the terms in the Limited Warranty or your contract with us.

**NOTE:** Limitation of iRobot's liability: This Limited Warranty is your sole and exclusive remedy against iRobot and iRobot's sole and exclusive liability with respect to defects in your Product. This Limited Warranty replaces all other iRobot warranties and liabilities, whether oral, written, (non-mandatory) statutory, contractual, in tort or otherwise,

including, without limitation, and where permitted by applicable law, any implied conditions, warranties or other terms as to satisfactory quality or fitness for purpose.

However, this Limited Warranty shall neither exclude nor limit i) any of your legal (statutory) rights under the applicable national laws or ii) any of your rights against the seller of the Product.

To the extent permitted by applicable law, iRobot does not assume any liability for loss of or damage to or corruption of data, for any loss of profit, loss of use of Products or functionality, loss of business, loss of contracts, loss of revenues or loss of anticipated savings, increased costs or expenses or for any indirect loss or damage, consequential loss or damage or special loss or damage.

If purchased in the United Kingdom, Switzerland, or the European Economic Area, except for Germany:

## 1. APPLICABILITY AND CONSUMER PROTECTION RIGHTS

(1) iRobot Corporation, 8 Crosby Drive, Bedford, MA 01730 USA ("iRobot", "We", "Our" and/or "Us") provides an optional Limited Warranty for this Product to the extent specified under Section 5, which is subject to the following conditions.

(2) This Limited Warranty grants rights independently and in addition to statutory rights under the laws relating to the sale of consumer products. In particular, the Limited Warranty does not exclude or limit such rights. You are free to choose whether to exercise rights under the Limited Warranty or statutory rights under your applicable jurisdiction's laws relating to the sale of consumer products. The conditions of this Limited Warranty shall not apply to the statutory rights under the laws relating to the sale of consumer products. Also, this Limited Warranty shall neither exclude nor limit any of your rights against the seller of the Product.

## 2. SCOPE OF THE WARRANTY

(1) iRobot warrants that (with the exception of the restrictions in Section 5) this Product shall be free of material and processing defects during the period of two (2) years from the date of purchase (the “Warranty Period”). In the event that the Product fails to meet the warranty standard, we will, within a commercially reasonable period of time and free of charge, either repair or replace the Product as described below.

(2) This Limited Warranty is only valid and enforceable in the country where you purchased the Product, provided that said country is on the list of Specified Countries

(<https://edu.irobot.com/partners/>).

## 3. MAKING A CLAIM UNDER THE LIMITED WARRANTY

(1) If you wish to make a warranty claim, please contact your authorised distributor or dealer, whose contact details can be found at <https://edu.irobot.com/partners/>. Upon

contacting your distributor, please have the serial number of your Product ready and the original proof of purchase from an authorised distributor or dealer, showing the date of purchase and full details of the Product. Our colleagues will advise you of the process involved in making a claim.

(2) We (or our authorised distributor or dealer) must be notified of any alleged defect within a reasonable time of it coming to your attention, and, in any case, you must

submit a claim no later than the expiry of the Warranty Period plus an additional period of four (4) weeks.

## 4. REMEDY

(1) If we receive your request for a warranty claim within the Warranty Period, as defined in Section 3, Paragraph 2, and the Product is found to have failed under the warranty, we shall, at our discretion:

– repair the Product, - exchange the Product with a product that is new or which has been manufactured from new or serviceable used parts and is at least functionally equivalent to the original product, or – exchange the Product with a product that is a new and upgraded model which has at least equivalent or upgraded functionality compared to the original product.

When repairing or replacing the Product, we may use products or parts that are new, equivalent to new or re-conditioned.

(2) Parts repaired or replaced during the Warranty Period will be warranted for the remainder of the original Warranty Period of the Product or for ninety (90) days from the date of repair or replacement, whichever is longer.

(3) Replacement or repaired products, as applicable, will be returned to you as soon as commercially practicable. All parts of the Product or other equipment that we replace shall become our property.

## 5. WHAT IS NOT COVERED?

(1) This Limited Warranty does not apply to batteries, accessories or other consumable items, such as dry erase markers, vinyl stickers, eraser cloths, or fold out whiteboards.

(2) Unless agreed in writing, the Limited Warranty will not apply if the defect(s) relate to: (a) normal wear and tear, (b) defects caused by rough or inappropriate handling

or use, or damage caused by accident, misuse, neglect, fire, water, lightning or other acts of nature, (c) non-compliance with the Product instructions, (d) wilful or deliberate damage, neglect or negligence; (e) use of spare parts, an unauthorised cleaning solution, if applicable, or other replacement items (including consumables) that are not provided or recommended by Us; (f) any alteration or modification to the Product that has been carried out by you or a third party not authorised by us, (g) any failure to adequately package the Product for transportation, (h) extreme or external causes beyond our reasonable control, including, but not limited to, breakdowns, fluctuations or interruptions in electric power, ISP (Internet service provider) service or



wireless networks, (i) weak and/or inconsistent wireless signal strength in your home.

(3) This Limited Warranty will be invalid if (a) the Product's serial number has been removed, erased, defaced, altered or is illegible in any way (as determined at our sole discretion), or (b) you are in breach of the terms of this Limited Warranty or your contract with us.

## **6. LIMITATION OF IROBOT'S LIABILITY**

(1) iRobot grants no warranties, explicitly or implicitly agreed upon, other than the limited warranties stated above.

(2) iRobot is only liable for intent and gross negligence in accordance with the applicable statutory provisions for damages or compensation of expenses. In any other case that iRobot can be held liable, unless otherwise stated above, iRobot's liability is limited to only foreseeable and direct damages. In all other cases, iRobot's liability is excluded, subject to the foregoing provisions.

Any limitation of liability does not apply to damages resulting from injury to life, body or health.

## **7. ADDITIONAL TERMS**

For products purchased in France, the following terms also apply:

If you are a consumer, in addition to this Limited Warranty, you will be entitled to the statutory warranty granted to consumers under Sections 128 to 135 of the Italian Consumer Code (Legislative Decree No. 206/2005). This Limited Warranty does not affect the statutory warranty in any way. The statutory warranty has a two-year duration, starting from the delivery of this Product, and it may be exercised within two months of the discovery of the relevant defect.

For products purchased in Belgium, the following terms also apply:

If you are a consumer, in addition to this Limited Warranty, you will be entitled to a two-year statutory warranty, pursuant to the provisions on the sale of consumption goods in the Belgian Civil Code. This statutory warranty commences on the date of the delivery of this Product. This Limited Warranty is in addition to, and does not affect, the statutory warranty.

For products purchased in the Netherlands, the following terms also apply:

If you are a consumer, this Limited Warranty is in addition to, and will not affect your rights pursuant to, the provisions on the sale of consumption goods in Book 7, Title 1 of the Dutch Civil Code.

## **SUPPORT**

To obtain warranty service, support, or other information, please visit our website at [edu.irobot.com](http://edu.irobot.com).

Keep these instructions for future reference as they contain important information. For warranty details and updates to regulatory information visit [edu.irobot.com/support](http://edu.irobot.com/support)

Designed in Massachusetts and Manufactured in China

Copyright © 2020-2021 iRobot Corporation. All Rights Reserved. U.S. Patent Nos. [www.irobot.com/patents](http://www.irobot.com/patents).


Other Patents Pending. iRobot and Root are registered trademarks of iRobot Corporation. The Bluetooth® word mark and logos are registered trademarks owned by Bluetooth SIG, Inc. and any use of such marks by iRobot is under license. All other trademarks mentioned are the property of their respective owners.

Manufacturer  
iRobot Corporation  
8 Crosby Drive  
Bedford, Massachusetts 01730  
EU Importer  
iRobot Corporation  
11 Avenue Albert Einstein  
69100 Villeurbanne, France  
[edu.irobot.com](http://edu.irobot.com)















## Documents / Resources

	<p><a href="#">iRobot Root Coding Robot</a> [pdf] Instructions Root Coding Robot, Coding Robot, Root Robot, Robot, Root</p>
---	---

## References

-  [Coding Robots, Learning Library & STEM Outreach | iRobot Education](#)
-  [Partners | iRobot Education](#)
-  [Support | iRobot Education](#)
-  [iRobot®: Robot Vacuums and Mops](#)
-  [iRobot®: Robot Vacuums and Mops](#)
-  [irobot.com/compliance](#)
-  [iRobot United States Patents | iRobot](#)
-  [Coding Robots, Learning Library & STEM Outreach | iRobot Education](#)
-  [Partners | iRobot Education](#)
-  [call2recycle.org/](#)