

# SeeSnake<sup>®</sup> *Max*<sup>™</sup>

## *rM*200 Series



This manual covers the following drums:



### **⚠ WARNING!**

Read this Operator's Manual carefully before using this tool. Failure to understand and follow the contents of this manual may result in electrical shock, fire, and/or serious personal injury.

For support and additional information about using your rM200 go to [support.seesnake.com/rm200](http://support.seesnake.com/rm200) or scan this QR code.



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\*Original Instructions – English

## Introduction

The warnings, cautions, and instructions discussed in this manual cannot cover all possible conditions and situations that may occur. It must be understood by the operator that common sense and caution are factors that cannot be built into this product, but must be supplied by the operator.

## Regulatory Statements

**CE** The EC Declaration of Conformity (890-011-320.10) will accompany this manual as a separate booklet when required.

**FCC** This device complies with Part 15 of 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.

## Safety Symbols

In this manual and on the product, safety symbols and signal words are used to communicate important safety information. This section is provided to improve understanding of these signal words and symbols.



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

### DANGER

DANGER indicates a hazardous situation which, if not avoided, will result in death or serious injury.

### WARNING

WARNING indicates a hazardous situation which, if not avoided, could result in death or serious injury.

### CAUTION

CAUTION indicates a hazardous situation which, if not avoided, could result in minor or moderate injury.

### NOTICE

NOTICE indicates information that relates to the protection of property.



This symbol means read the operator's manual carefully before using the equipment. The manual contains important information on the safe and proper operation of the equipment.



This symbol means always wear safety glasses with side shields or goggles when handling or using this equipment to reduce the risk of eye injury.



This symbol indicates the risk of electrical shock.

## General Safety Rules

### ⚠ WARNING



Read all safety warnings and instructions. Failure to follow the warnings and instructions may result in electrical shock, fire, and/or serious injury.

### SAVE THESE INSTRUCTIONS!

### Work Area Safety

- **Keep your work area clean and well lit.** Cluttered or dark areas invite accidents.
- **Do not operate equipment in explosive atmospheres, such as in the presence of flammable liquids, gases, or dust.** Equipment can create sparks which may ignite the dust or fumes.
- **Keep children and bystanders away while operating equipment.** Distractions can cause you to lose control.
- **Avoid traffic.** Pay attention to moving vehicles when using on or near roadways. Wear high-visibility clothing or reflector vests.

### Electrical Safety

- **Avoid body contact with earthed or grounded surfaces such as pipes, radiators, ranges, and refrigerators.** There is an increased risk of electrical shock if your body is earthed or grounded.
- **Do not expose equipment to rain or wet conditions.** Water entering equipment will increase the risk of electrical shock.

- **Keep all electrical connections dry and off the ground.** Touching equipment or plugs with wet hands can increase the risk of electrical shock.
- **Do not abuse the cord.** Never use the cord for carrying, pulling, or unplugging the power tool. Keep cord away from heat, oil, sharp edges, and moving parts. Damaged or entangled cords increase the risk of electrical shock.
- **If operating equipment in a damp location is unavoidable, use a ground fault circuit interrupter (GFCI) protected supply.** Use of a GFCI reduces the risk of electrical shock.

### Personal Safety

- **Stay alert, watch what you are doing, and use common sense when operating equipment.** Do not use equipment while you are tired or under the influence of drugs, alcohol, or medication. A moment of inattention while operating equipment may result in serious injury.
- **Dress properly.** Do not wear loose clothing or jewelry. Loose clothes, jewelry, and long hair can be caught in moving parts.
- **Practice good hygiene.** Use hot, soapy water to wash hands and other body parts exposed to drain contents after handling or using drain inspection equipment. To prevent contamination from toxic or infectious material, do not eat or smoke while operating or handling drain inspection equipment.
- **Always use appropriate personal protective equipment when handling and using equipment in drains.** Drains may contain chemicals, bacteria, and other substances that may be toxic, infectious, and cause burns or other issues. Appropriate personal protective equipment always includes safety glasses and may include a dust mask, hard hat, hearing protection, drain cleaning gloves or mitts, latex or rubber gloves, face shields, goggles, protective clothing, respirators, and steel toed, non-skid footwear.

- **If using drain cleaning equipment and drain inspection equipment at the same time, wear RIDGID drain cleaning gloves.** Never grasp the rotating drain cleaning cable with anything else, including other gloves or a rag which can become wrapped around the cable and cause hand injuries. Only wear latex or rubber gloves underneath RIDGID drain cleaner gloves. Do not use damaged drain cleaning gloves.
- **Use the equipment and accessories in accordance with these instructions, taking into account the working conditions and the work to be performed.** Use of the equipment for operations different from those intended can result in hazardous situations.
- **Use only accessories that are recommended by the manufacturer for your equipment.** Accessories that may be suitable for one piece of equipment may become hazardous when used with other equipment.

## **Equipment Use and Care**

- **Do not force equipment.** Use the correct equipment for your application. The correct equipment does the job better and more safely.
- **Do not use equipment if the power switch does not turn it on and off.** Any equipment that cannot be controlled with the power switch is dangerous and must be repaired.
- **Disconnect the plug from the power source and/or the battery pack from the equipment before making adjustments, changing accessories, or storing.** Preventive safety measures reduce the risk of injury.
- **Store idle equipment out of the reach of children and do not allow persons unfamiliar with the equipment or these instructions to operate the equipment.** Equipment can be dangerous in the hands of untrained users.
- **Maintain equipment.** Check for misalignment or binding of moving parts, missing parts, breakage of parts, and any other condition that may affect the equipment's operation. If damaged, have the equipment repaired before use. Many accidents are caused by poorly maintained equipment.
- **Do not overreach.** Keep proper footing and balance at all times. This enables better control of the equipment in unexpected situations.
- **Keep handles dry, clean, and free from oil and grease.** Clean handles give better control of the equipment.

## Pre-Operation Inspection

### ⚠ WARNING



**To reduce the risk of serious injury from electrical shock or other causes, and to prevent damage to your equipment, inspect all equipment and correct any problems before each use.**

To inspect all equipment, follow these steps:

1. Power off your equipment.
2. Disconnect and inspect all cords, cables, and connectors for damage or modification.
3. Clean any dirt, oil, or other contamination from your equipment to ease inspection and to prevent it from slipping from your grip during transport or use.
4. Inspect your equipment for any broken, worn, missing, misaligned, or binding parts, or any other condition which might prevent safe, normal operation.
5. Refer to the instructions for all other equipment to inspect and make sure it is in good, usable condition.

6. Check your work area for the following:

- Adequate lighting.
- The presence of flammable liquids, vapors, or dust that may ignite. If present, do not work in area until sources have been identified and corrected. The equipment is not explosion proof. Electrical connections can cause sparks.
- A clear, level, stable, and dry place for the operator. Do not use the equipment while standing in water.

7. Examine the job to be done and determine the correct equipment for the task.

8. Observe the work area and erect barriers as necessary to keep bystanders away.

**See additional product specific safety information and warnings starting on page 13.**

## SeeSnake rM200 Overview



### Description

The SeeSnake® Max™ rM200 series consists of the flagship reels, cameras, and push cables in the premier product family of SeeSnake Max Diagnostic Systems.

The rM200 comes with your choice of drums from the D2 drum series, giving you on-the-job flexibility when the job demands a different push cable and camera combination.

The rM200 can be used with any SeeSnake monitor and is designed to dock with the CS6x Versa® and CS65x for convenient transport, operation, and storage.

Heavily tested for durability, the rM200's case helps protect your push cable, prolonging the life of your equipment. Keeping the push cable enclosed when not in use also helps keep surfaces around and between your work areas clean.

Each rM200 model includes a built-in sonde which helps locate problems in the pipe. The rM200A and rM200B feature a Flexmitter® sonde inside the spring assembly. Flexmitter sondes have longer, more powerful antennae capable of putting out a stronger signal without inhibiting the camera's flexibility through turns. The sonde transmits a 512 Hz signal which can be detected by receivers such as the RIDGID SeekTech® SR-20, SR-24, SR-60, Scout™, or NaviTrack® II.

The rM200 is easy to transport with its handle assembly and wheels. One stow bin comes standard with each rM200. Store a paint can, gloves, business cards, wrenches, or any other tool you want to keep nearby in the stow bin. Additional stow bins can be ordered and up to two can be installed on the rM200.

The drum's integrated counter measures how far the camera has traveled inside the pipe. The water-resistant keypad lets you control the counter's functions, which include day, date, time, distance, and preset or custom text overlays.



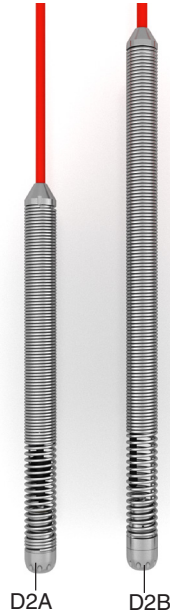
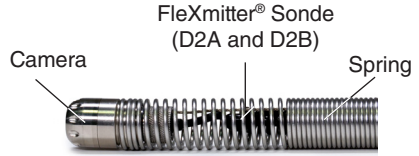
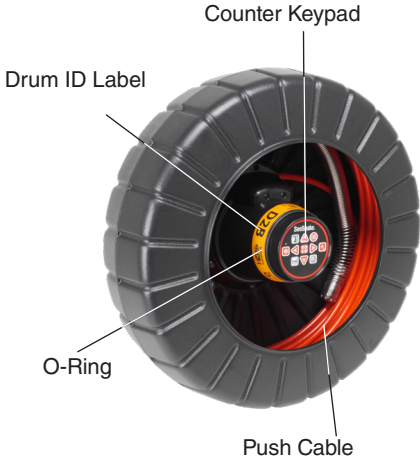
Universal Specifications	
<b>System Cable Length</b>	3 m [10 ft]
<b>Case Dimensions</b>	
Length	527 mm [20.8 in]
Depth	349 mm [13.8 in]
Height	610 mm [24 in]
<b>Wheels Dimensions</b>	
Width	28 mm [1.1 in]
Diameter	173 mm [6.8 in]
<b>Pull Handle Dimensions</b>	
Length	511 mm [20.1 in]
Height	517 mm [20.4 in]
<b>Stow Bin Dimensions</b>	
Width	239 mm [9.4 in]
Depth	156 mm [6.2 in]
Height	213 mm [8.4 in]
<b>Operating Environment</b>	
Temperature ‡	-40°C to 55°C [-40°F to 131°F]
Storage temperature	-40°C to 65°C [-40°F to 149°F]
Ingress protection (without monitor)	IP×5
Relative humidity	5 to 95 percent
Altitude	4,000 m [13,123 ft]
Camera depth rating	Waterproof to 100 m [328.1 ft]
‡ While the camera can function in extreme temperatures, some image quality changes may occur.	

### Standard Equipment

- rM200 case
- D2 drum
- One (1) stow bin
- Operator’s manual
- CS6x Versa hanger
- Shoulder strap
- Pipe guides

### System Components





## rM200A Description

The rM200A consists of the rM200 case with the D2A drum installed. A 61 m [200 ft] long, moderately stiff push cable makes the rM200A a versatile pipe inspection system.

The rM200A is best suited for lines 38 mm – 101 mm [1.5 in – 4 in] in diameter. When used with a 125 mm [5 in] pipe guide the rM200A's line capacity is 38 mm – 203 mm [1.5 in – 8 in]. Achievable push distance depends on pipe conditions.

A FleXmitter® sonde is built into the rM200A's spring. The sonde helps locate problems in the pipe.

D2A Specifications	
<b>Color ID</b>	Red
<b>System Weight</b>	16.4 kg [36.1 lb]
<b>Drum Weight</b>	7.4 kg [16.3 lb]
<b>Drum Diameter</b>	432 mm [17 in]
<b>Camera</b>	
View	Self-leveling
Length	26 mm [1 in]* 37 mm [1.5 in]**
Diameter	25 mm [1 in]
Light	6 LEDs
<b>Sonde</b>	
Type	FleXmitter®
Frequency	512 Hz
<b>Resolution</b>	
NTSC	656 × 492 pixels
PAL	768 × 576 pixels
<b>Spring assembly</b>	
Type	Single
Length	316 mm [12.4 in]
<b>Push cable</b>	
Length	61 m [200 ft]
Diameter	7.5 mm [0.3 in]
Fiberglass core diameter	3.5 mm [0.14 in]
Minimum bend radius	70 mm [2.8 in]
<b>Pipe capacity<sup>§</sup></b>	38 mm – 203 mm [1.5 in – 8 in]
* Measured from lens to spring.	
** Measured from lens to end of threads.	
§ Actual pipe capacity depends on pipe conditions.	

## rM200B Description

The rM200B consists of the rM200 case with the D2B drum installed. The rM200B has a 50 m [165 ft] long, stiff push cable and a longer spring with a second, shorter spring nested inside. The dual, nested spring gives the rM200B the ability to easily navigate multiple turns and transitions while maintaining the stiffness necessary to push through them and go farther down long lines.

The rM200B is best suited for lines 51 mm – 101 mm [2 in – 4 in] in diameter. When used with a 125 mm [5 in] pipe guide the rM200B's line capacity is 51 mm – 203 mm [2 in – 8 in]. Achievable push distance depends on pipe conditions.

A FleXmitter® sonde is built into the rM200B's spring. The sonde helps locate problems in the pipe.

D2B Specifications	
<b>Color ID</b>	Orange
<b>System Weight</b>	17 kg [37.5 lb]
<b>Drum Weight</b>	8.7 kg [19.2 lb]
<b>Drum Diameter</b>	432 mm [17 in]
<b>Camera</b>	
View	Self-leveling
Length	26 mm [1 in]* 37 mm [1.5 in]**
Diameter	25 mm [1 in]
Light	6 LEDs
<b>Sonde</b>	
Type	FleXmitter®
Frequency	512 Hz
<b>Resolution</b>	
NTSC	656 × 492 pixels
PAL	768 × 576 pixels
<b>Spring assembly</b>	
Type	Dual, nested
Length	435 mm [17.1 in]
<b>Push cable</b>	
Length	50 m [165 ft]
Diameter	9 mm [0.4 in]
Fiberglass core diameter	4.5 mm [0.2 in]
Minimum bend radius	90 mm [3.5 in]
<b>Pipe capacity<sup>§</sup></b>	51 mm – 203 mm [2 in – 8 in]
* Measured from lens to spring.	
** Measured from lens to end of threads.	
§ Actual pipe capacity depends on pipe conditions.	

## Specific Safety Information

### ⚠ WARNING



This section contains important safety information that is specific to the rM200. Read these precautions carefully before using the equipment to reduce the risk of electrical shock, fire, and/or serious injury.

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### SAVE ALL WARNINGS AND INSTRUCTIONS FOR FUTURE REFERENCE!

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### SeeSnake rM200 Safety

- **Always use appropriate personal protective equipment when handling and using equipment in drains.** Wear appropriate protective equipment such as latex or rubber gloves, goggles, face shields, and respirators when inspecting drains that might contain hazardous chemicals or bacteria. Always wear eye protection to protect against dirt and other foreign objects.
- **Read and understand this manual, the digital reporting monitor's manual, and the instructions for any other equipment you are using before operating the equipment.** Failure to follow all instructions may result in property damage and/or serious injury. Keep this manual with the equipment for future use.
- **Operating the equipment while in water increases the risk of electrical shock.** Do not operate the system if operator or equipment are standing in water.
- **The equipment is not designed to provide high voltage protection and isolation.** Do not use where a danger of high voltage contact is present.
- **To prevent damage to the equipment and to decrease the risk of injury, do not expose the equipment to mechanical shocks.** Exposure to mechanical shocks can damage equipment and increase the risk of serious injury.

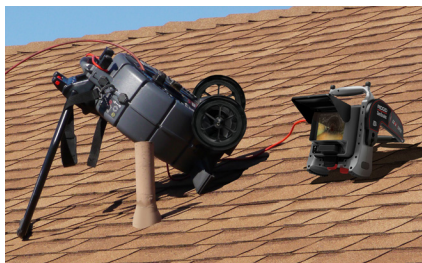
## Operating Instructions

### Placement

Place the rM200 and monitor near the pipe entrance so you can manipulate the push cable while viewing the display. Lay the rM200 case on its back or position the pull handle as a kick stand to make sure the rM200 case does not tip during use.



Use the pull handle as a kick stand when performing an inspection on a rooftop, hillside, or in a location that requires overhead entry.



Note: Refer to the Handles and Docks section for instructions on how to lock the handle into different positions.

### Opening the rM200 Case

#### **CAUTION**

**Make sure the camera is completely inside the drum before unlatching and opening the rM200 case. If the camera is not in the drum, the push cable can unwind and cause damage or serious injury.**

#### **NOTICE**

**Do not open the rM200 case while the camera is stored in the camera clip. Secure the camera inside the drum.**

Open the rM200 case to install the drum, replace the bearing, rewind the push cable, install the docking handle, and to maintain and clean the rM200 system.

To open the rM200 case, follow these steps:

1. Lock the pull handle against the rear case.

Note: Refer to the Handles and Docks section for instructions on how to position the handle.

2. Remove the stow bin.

Note: Refer to Appendix A for instructions on how to remove the stow bin.

3. Lay the rM200 case on its back.

4. Secure the camera in the drum by pushing it through the drum access opening.



5. Unwrap the SeeSnake system cable from the cord wrap.
6. Slide all six case latches toward the handle to unlock the rM200 case.
7. Lift handle to open.

### Installing the Drum

The rM200 case gives you the ability to swap out the drum when the job requires a different push cable and camera combination.

To install the drum, follow these steps:

1. Open the rM200 case.
2. Place the drum in the rM200 case.
3. Make sure the bearing faces down and the counter keypad faces up.
4. Spin the drum to make sure the drum spins freely on the bearing.
5. Lock all six (6) of the rM200 case latches.

**NOTICE** The O-ring can fall out easily. Make sure the O-ring is properly installed before use.

### Routing the Camera

If the camera is inside the drum, route the camera through the drum access opening and the push cable guide. Secure the camera in the camera clip when not in use.



### Inspection Overview

To perform a pipe inspection, connect any SeeSnake monitor to the reel, power on the system, push the push cable through the pipe, and observe the display.

For advanced inspection options, such as capturing media, locating the sonde, tracing the push cable, and delivering reports, refer to the manual that comes with your monitor.

### Connecting to the Monitor

Connect the system cable to the monitor by aligning the connector guide pin with the socket and pushing the connector straight in.

**NOTICE** Only twist the outer locking sleeve. Never bend or twist the connector.



### Retrieving the Camera

Pull the push cable back out of the pipe with slow, steady force and feed small lengths back into the drum. Wipe the push cable with a paper towel or rag as you retrieve it.

**NOTICE** Do not exert excessive force or pull at sharp angles. Feeding longer lengths or forcing the push cable may cause it to loop, kink, or break.



**Pipe Guides**

Pipe guides center the camera in the pipe, improve picture quality, and help keep the lens clear. Use pipe guides when possible to reduce wear and tear on the camera system.

Pipe guides can easily be installed, adjusted, and removed to provide better camera and push cable movement in the pipe. For small pipes, tubes, or voids, the camera head guide helps push the camera through stubborn fittings. For larger pipes, ball guides center the camera for better visibility and light illumination.

**Camera Head Guide Installation**

Camera head guides can be used in smaller pipes to push the camera through stubborn fittings.

1. Loosen the screws on both sides of the guide until it slides easily onto the camera head.
2. Tighten the screws until the guide stays in place, but do not over-tighten.



Without Pipe Guide



With Pipe Guide



## Ball Guide Installation

Ball guides are designed to slip onto the spring and lock into place. Depending on work conditions, you can place a ball guide on the spring behind the camera to tilt the camera head upward to view the top of the pipe.

1. Make sure the ball guide is unlocked.
2. Slide the ball guide over the camera and onto the spring.



3. Press down on the blue locks to secure the ball guide onto the spring.
4. Slide the red locks over the blue locks to secure the ball guide into place.



Locked




Unlocked

**NOTICE** If a ball guide gets snagged in a pipe, it can fall off the spring. To avoid losing ball guides and obstructing the pipe, do not use excessive force to push through the pipe when you feel resistance.




## Integrated Counter

The rM200 comes equipped with an integrated counter. The integrated counter measures the total length of the extended push cable.

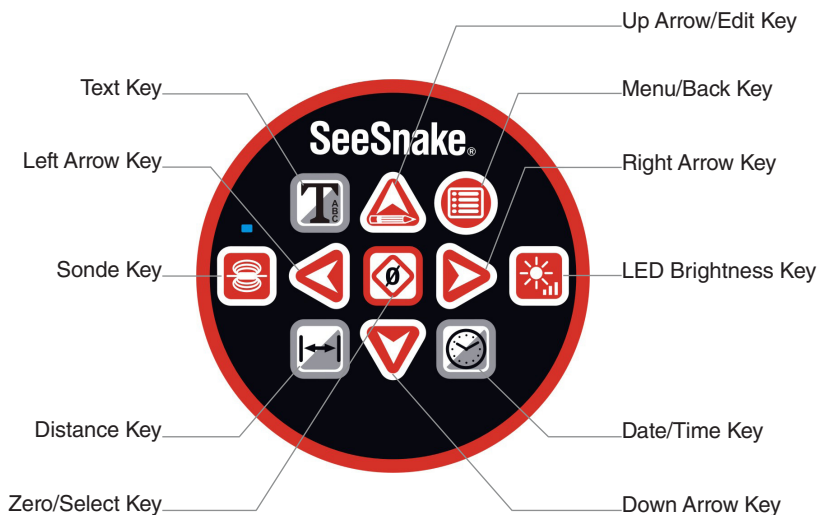
Use of the integrated counter is not required, but it is useful to keep track of how far the push cable has gone in the line. The integrated counter can also measure the push cable's distance from a temporary zero point, such as a pipe head or joint, while still keeping track of the total length of the push cable.








Use the Zero key  on the rM200, if you have the rM200 with the counter keypad. If you have the rM200 without the counter keypad, zero the integrated counter with the monitor's keypad.






To measure the push cable with the integrated counter, follow these steps:

1. At any time during the inspection long press (>3 seconds) the Zero key  to set the system zero point.
2. Short press (<3 seconds) the Zero key  to set a temporary zero point at any time during the inspection. The temporary zero point measurement appears in brackets on-screen.
3. Press the Zero key  again for one second to clear the temporary measurement and return to the system measurement.

## Drum Keypad



Drum Keypad		
Key		Meaning
	Menu/Back Key	Open the Main Menu and exit out of menus and screens.
	Zero/Select Key	Select a highlighted menu item or long press (>3 seconds) to set the system zero point. To measure a temporary zero point of the total length of push cable, press again for one second. Press a third time to return to the total length measurement.
	Sonde Key	Toggle the sonde on or off. When on, the LED above the key is lit.
	LED Brightness Key	Control the brightness of the LEDs in the camera. Press to increase or decrease brightness levels or press once and use the Arrow keys   to adjust the brightness.
	Up Arrow/Edit Key	Navigate menu choices and text characters. Press to edit highlighted text. Refer to the On-Screen Text section for instructions on editing on-screen text.

Drum Keypad		
Key		Meaning
	Left/Right Arrow Keys	Navigate menu choices and text characters.
	Down Arrow Key	Navigate menu choices and text characters.
	Text Key*	Toggle on or off to show or hide preset text or custom text.
	Date/Time Key*	Toggle on or off to show or hide the date and time of the inspection.
	Distance Key*	Toggle on or off to show or hide the integrated counter measurement.
*When toggled on, this feature is displayed on the monitor's recorded video and appears in the inspection report.		

## Individual Components

### Handles and Docks

#### Carry Handle

The carry handle comes installed on the rM200 case.



#### CS6x Versa Hanger

The CS6x Versa hanger lets you mount the SeeSnake CS6x Versa Wi-Fi enabled reporting monitor onto the rM200 for easy transport. See page 24 for instructions on docking the CS6x Versa hanger.



#### Pull Handle

The pull handle on the rM200 can be locked in four positions. Each position has a different purpose which increases usability and maneuverability.

- Midway for use as a kick stand.
- Upright to maneuver during transport.
- Against the rear case when in use.
- Against the front case for storage in small spaces and transport when going up or down ladders.

To position the pull handle, follow these steps:

1. Set the rM200 case on its feet.
2. Press the handle lock and position the handle.
3. Release the handle lock to lock the handle into place.



## Stow Bin

The stow bin provides storage for gloves, a paint can, business cards, pipe wrenches, or other tools you want to keep nearby. The rM200 comes with one stow bin. Up to two (2) can be installed on the rM200.

*Note: Refer to Appendix A for detailed instructions on how to install the stow bin.*



## Self-Leveling Camera

If using a drum that features a self-leveling camera, the bearings and weight of the self-leveling camera may create a swinging effect when you push the push cable through the pipe. The camera image settles quickly when the push cable is steady.

The self-leveling camera can be removed to troubleshoot problems, send for repair, or to replace. Refer to Appendices C and D for instructions on how to remove and install the camera head.

## System Cable Assembly

The system cable assembly includes the following components:

- The system connector for connecting to SeeSnake digital reporting monitors.
- 3 m [10 ft] of system cable.
- The slip-ring assembly, which is made up of the slip-ring dial and the slip-ring cavity on the frame.

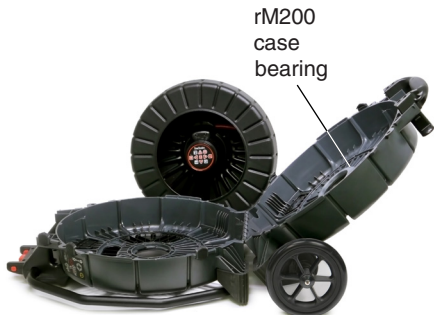
Before cleaning the rM200, ensure the slip-ring dial is locked **Ⓓ** in the slip-ring cavity. Avoid getting the slip-ring assembly wet when cleaning.

**NOTICE** To avoid damaging the slip-ring contact pins or getting the internal electrical components wet, keep the slip-ring assembly locked.

## Bearings

There are two bearings in the rM200 system. The bearings allow the drum to spin smoothly when pushing the cable and provide resistance when returning the push cable to the drum.

One bearing attaches to the rM200 case and is located inside the front case.



The second bearing attaches to the drum and is located on the drum's underside. Each rM200 model has a different bearing. The bearings can fall out. Do not substitute the bearings.

## Replacing the Bearing

The bearing is on the underside of the drum. A different bearing comes with each D2 series drum. The bearing can become dirty and worn. To clean, rinse in warm water and a mild detergent.


To replace the bearing, follow these steps:

1. Open the rM200 case.
2. Lift the drum out of the rM200 case and turn over, with the counter keypad faced down.
3. Replace bearing.
4. Return the drum to the rM200 case and make sure the bearing faces down and the counter keypad faces up.
5. Spin the drum to make sure the drum spins freely on the bearing.
6. Lock all six (6) of the rM200 case latches.

**NOTICE** Do not use the rM200 without the bearing installed. If the bearing is missing, the push cable can damage or break.

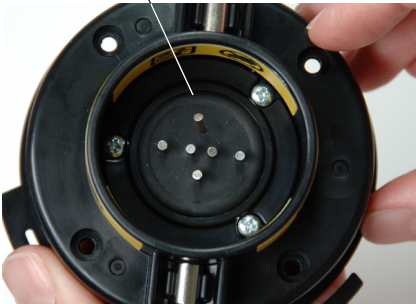


## System Cable Removal

1. Disconnect the system cable from the reporting monitor and remove the monitor from the docking system.
2. Unwrap the system cable from the cable wraps.
3. On the rear side of the rM200 case, turn the slip-ring dial counter-clockwise to the unlocked position .
4. Pull straight out.



**NOTICE** Do not touch the contact pins inside the slip-ring dial. Stressing the contact pins can cause them to break.

Broken Contact Pin



## System Cable Installation

To install the system cable, follow these steps:

1. Align the arrow on the slip-ring dial with the unlock symbol  on the frame and insert the slip-ring dial into the slip-ring cavity.
2. Turn the slip-ring dial to the locked position .



3. Hook the system cable into the frame hook and snap the cable anchor onto the frame.
4. Wrap the system cable around the cable wraps.

## Docking System

### **⚠ WARNING**

Carrying the system incorrectly can cause the digital reporting monitor to disengage from the docking system and may result in property damage and/or serious injury.

### Mounting the CS6x Versa onto the rM200

1. Push the red slide locks on the rM200 inwards.
2. Place the CS6x Versa hanger over the rM200.

Red slide locks



3. Push the slide locks out so they lock the CS6x Versa hanger into place.
4. Hang the CS6x Versa on the rM200.



To remove, push the slide locks inwards to unlock the hanger.

### Mounting the CS65x or CS12x onto the rM200

To mount the CS65x or CS12x monitor onto the rM200, follow these steps:

1. Push red slide locks inwards so that they do not obstruct the kick stand.
2. Unfold the kick stand from the bottom of the monitor, and hold the system so that it is parallel to the back of the rM200. Place the monitor onto the rM200.
3. Reset the red locks on the rM200 so they lock the monitor into place.



Front Cover Handle

Kickstand



To remove the monitor from the rM200, push the red locks on the rM200 and remove the monitor. You may return the kick stand to its folded position.



## Maintenance and Support

### Cleaning

Clean your system with rags and a soft nylon brush. If desired, a mild detergent or disinfectant can be used. Do not use solvents or high pressure water to clean any part of the system.

### Maintaining Components

#### Camera Head

Scratches on the camera have a minimal effect on its performance. Do not use scraping tools or sand the camera to remove scratches.

#### Push Cable

Run a rag over the push cable and visually inspect it for cuts and abrasions while pushing it back into the drum. Replace or repair the push cable if the outer jacket is cut or abraded.

### Storage

The rM200 must be stored in a dry, secure area between -40°C and 65°C [-40°F and 149°F]. Store your equipment in a locked area out of the reach of children and people unfamiliar with its purpose.

### Support

For support and additional information about using your system, visit **support.seesnake.com/rm200**.

### Service and Repair

**Improper service or repair can cause the camera reel to be unsafe to operate.**

Service and repair of the camera reel must be performed at a RIDGID Independent Authorized Service Center. To find your nearest service center or for any service or repair questions:

- Contact your local RIDGID distributor.
- Visit RIDGID.com.
- Contact Ridge Tool Company Technical Service Department at [rtctechservices@emerson.com](mailto:rtctechservices@emerson.com) or, in the USA and Canada, call 1-800-519-3456.

## Disposal

Parts of your system contain valuable materials that can be recycled. There are companies that specialize in recycling that may be found locally. Dispose of the components in compliance with all applicable regulations. Contact your local waste management authority for more information.



**EC Countries:** Do not dispose of electrical equipment with household waste!

According to the European Guideline 2012/19/EU for Waste Electrical and Electronic Equipment and its implementation into national legislation, electrical equipment that is no longer usable must be collected separately and disposed of in an environmentally correct manner.

## Battery Disposal

**EC Countries:** Defective or used batteries must be recycled according to the guideline 2006/66/EEC.

## Appendix

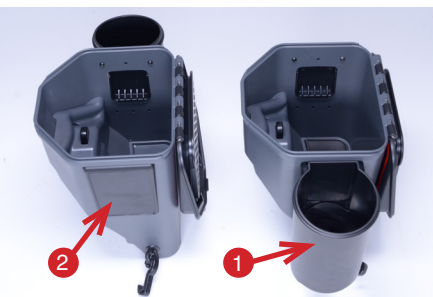
### Appendix A: Stow Bin Instructions

#### Can Holder Orientation

**NOTICE** The can holder on the stow bin must be on the front side of the rM200 case so that it does not interfere with the pull handle.

To orient the can holder, follow these steps:

1. Remove the can holder (Item 1) and the replacement plate (Item 2) with a Phillips screwdriver from inside of the stow bin.



2. Install the can holder on the other side of the stow bin and screw the replacement plate into place.

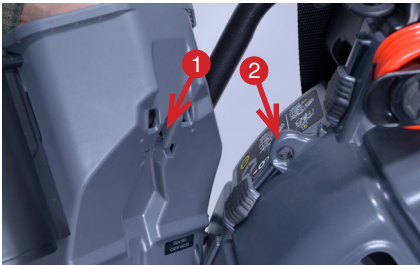
## Stow Bin Installation

To install the stow bin on the rM200 case, follow these steps:

1. Push the black button on the inside of the stow bin.



2. Align the groove on the underside of the stow bin (Item 1) with the eyelet on the rM200 case (Item 2). Push and fit into place.



3. To secure the stow bin, pull and snap the front and back hooks into the closest groove on the rM200 case.



*Note: The stow bin comes with two rubber plugs that can be inserted into the bottom of the main compartment and can holder. The can holders also contain a magnet at the bottom to securely hold can in place.*

To remove the stow bin, follow these steps:

1. Unlatch the stow bin hooks from the rM200's front and rear case.
2. Push the black button on the inside of the stow bin.
3. Pull the stow bin straight off the rM200 case.

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