



Spring Driven Hose Reel Instruction Manual



WARNING:

Read carefully and understand all **INSTRUCTIONS** before operating. Failure to follow the safety rules and other basic safety precautions may result in serious personal injury. Save these instructions in a safe place and on hand so that they can be read when required. Keep these instructions to assist in future servicing.



GENERAL SAFETY REGULATIONS

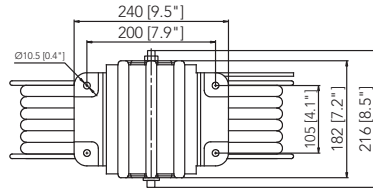
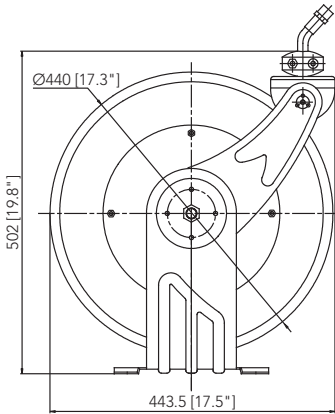


WARNING: The warnings, cautions, and instructions discussed in this instruction manual cannot cover all possible conditions or situations that could occur. It must be understood by the operator that common sense and caution are factors that cannot be built into this product, but must be supplied by the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

1. Keep the work area clean and dry. Damp or wet work areas can result in injury.
2. Keep children away from work area. Do not allow children to handle this product.
3. Use the right tool for the job. Do not attempt to force small equipment to do the work of larger industrial equipment. There are certain applications for which this equipment was designed. It will do the job better and more safely at the capacity for which it was intended. Do not modify this equipment, and do not use this equipment for a purpose for which it was not intended.
4. Check for damaged parts. Before using this product, carefully check that it will operate properly and perform its intended function. Check for damaged parts and any other conditions that may affect the operation of this product. Replace damaged or worn parts immediately.
5. Do not overreach. Keep proper footing and balance at all times to prevent tripping, falling, back injury, etc.
6. DO NOT use the equipment when tired or under the influence of drugs, alcohol, or medication. A moment of inattention while operating this equipment may result in serious personal injury.

TECHNICAL DETAILS

SKU#	Max Pressure	Hose Capacity		
		Material	I.D.	Length
M3D-AW-37550	300Psi (20Bar)	NBR Rubber	3/8"/10mm	15m/50ft
M3D-AW-5050	300Psi (20Bar)	NBR Rubber	1/2"/12.5mm	15m/50ft
M3D-O-5050	2320Psi (160Bar)	S.A.E.100R1 Wire Braid	1/2"/12.5mm	15m/50ft
M3D-G-7550	5800Psi (400Bar)	S.A.E.100R2 Wire Braid	1/4"/6.3mm	15m/50ft



SAFETY PRECAUTIONS

1. Use proper eye protection when assembling and using the hose reel.
2. Keep children away from the work area.
3. Personal injury and/or equipment damage may result if proper safety precautions are not observed.
4. Ensure that reel is properly installed before connecting input and output hoses.
5. Bleed fluid/gas pressure from system before servicing reel.
6. Before connecting reel to supply line ensure that pressure does not exceed maximum working pressure rating of reel.
7. Remember, even low pressure is very dangerous and can cause personal injury or death.
8. If a leak occurs in the hose or reel, remove system pressure immediately.
9. Ensure that reel, hose, and equipment being service are properly grounded.
10. If reel ceases to unwind or rewind, remove system pressure immediately.
11. Do not pull or jerk on hose.

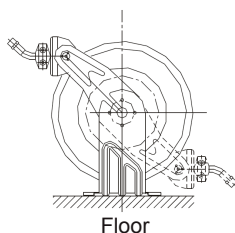


WARNING: Exposure of skin directly to pressurized air, or fluids could result in severe bodily injury.

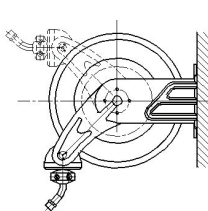
INSTALLATION

1. Prior to mounting the hose reel, ensure that the supply line pressure does not exceed the maximum working pressure of the hose reel.
2. Unpack and inspect reel for damage. Turn by hand to check for smooth operation.
3. Check for completeness.

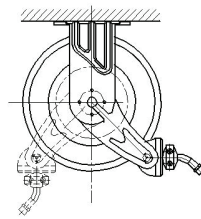
4. Position the reel on the floor, wall or ceiling. Secure into place using four mounting bolts.
5. Depending on where the reel is placed, it may be necessary to adjust the hose bumper and guide arm to use the hose properly. See the instructions on the next page to adjust the hose bumper and reposition the guide arm.



Floor



Wall



Ceiling

ADJUSTMENTS

- Spring tension



WARNING: Use extreme caution; reel under tension. Avoid releasing latch mechanism.

1. If necessary, adjust spring tension on reel by adding or removing wraps of hose from spool, one wraps at a time, until desired tension is obtained. Add wraps to increase tension. Remove wraps to decrease tension.
2. Pull out the hose until the latch pawl is engaged. Loosen the hose bumper, then add wraps and decrease the wraps.



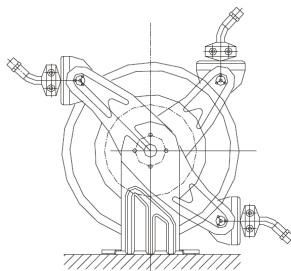
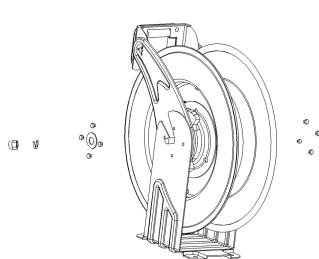
CAUTION: When adding wraps of hose, be careful not to exceed the winding mechanism's spring capacity. Add just enough wraps of hose to achieve the desired tension. Damage to the winding mechanism will result if spring is over-tensioned.

- Adjusting the hose bumper

1. Pull out the hose until the latch pawl is engaged. The hose bumper may be adjusted by loosening the slotted screws. Slide the bumper to the desired position and tighten the screws before pulling hose to disengage the latch pawl.

- Removing and positioning Guide Arm

1. Pull out hose until the latch pawl is engaged. Remove bumper by removing the slotted screws.
2. Disengage the latch pawl while maintaining a firm hold on spool. Turn the spool hand over hand approximately two or three revolutions in the direction of the direction of the drive spring until tension is removed.
3. Remove the nuts and washer holding the guide arm and shift to base.
4. Revolute the guide arm and adjust to any of the three positions hinted.



5. According to each mounting application, recommend Guide Arm positions.
6. Replace and tighten the nuts and washers.
7. Tighten the drive spring by turning the spool two or three revolutions and engage the latch pawl.
8. Pull the hose through the roller opening in the guide arm and replace the hose bumper.

SERVICE INSTRUCTIONS

CAUTION: Remove all tension before servicing. Hazards or unsafe practices **MAY** result in minor personal injury, product or property damage.

WARNING: Before performing any service, always disconnect and lock out compressed air or fluid, and remove all spring tension. Hazards or unsafe practices **COULD** result in severe personal injury or death.

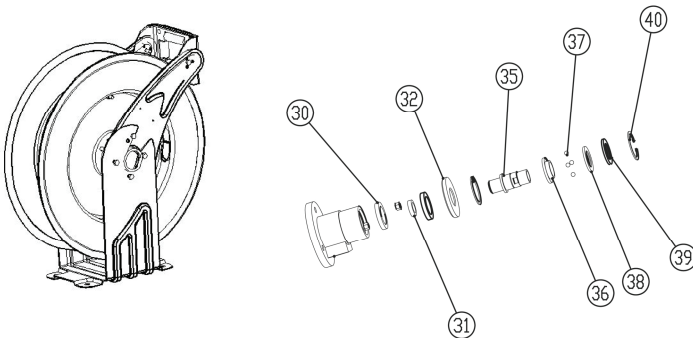
User servicing of the reel is limited to replacing input/output hoses only. Refer all other repairs to an authorized service person. Failure to do so can result in person injury and/or equipment damage and may void the warranty.

- Replacing the hose

1. To remove the hose.
2. Pull out the hose leaving 2 to 3 feet on the spool. Engage the latch pawl.
3. Unthread the hose at the connection to the swivel tube. Remove the hose.
4. To install the hose.
5. Route the hose through the guide arm rollers and opening of the spool. Apply thread tape or sealant to hose threads.
6. Screw hose fitting into threaded fitting on swivel. Tighten connection with a wrench on fitting. Install hose bumper on working end of hose if required.
7. Disengage latch pawl and allow hose to retract.

- Replacing the swivel

1. If the swivel leaks, replace the O-ring or seal (#31) and washer (#30) by removing the lock washer (#40) and the part of the swivel shift.
2. If the balls (#37) wear-out, replace by removing the lock washer (#40).
3. Replace the new seal by clipping the lock washer (#40). Replace the part of the swivel shift by clipping the lock washer (#40).



LIMITED WARRANTY

1. The manufacturer warrants this hose reel against defects in material and craftsmanship, for a period of 3 years from date of purchase, but not including hose and O-ring parts.
2. Manufacturer's liability is limited to replacement or repair of defective material within the warranty period, when returned freight prepaid to the distributor or their designated service depot.
3. The warranty does not cover damage caused by accident, misuse or faulty installation.
4. The reel must be installed and maintained in compliance with the instructions.

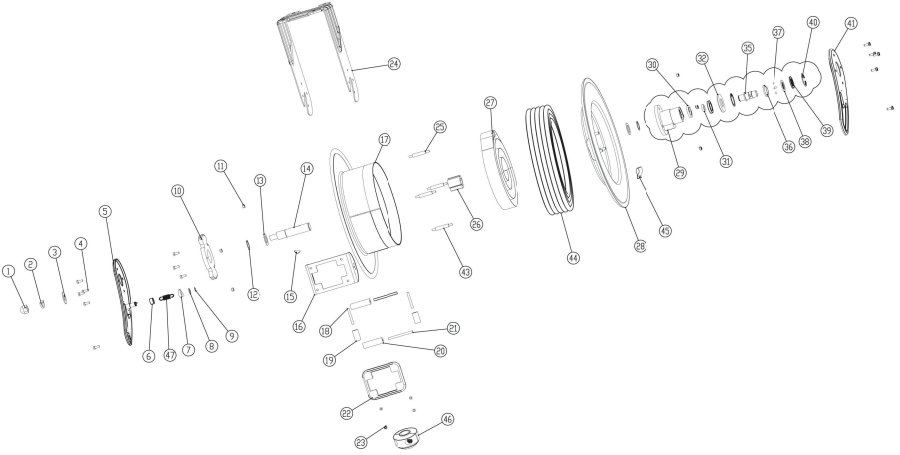


WARNING: Your risk from these exposures varies, depending on how often you do this type of work. To reduce your exposure to these chemicals: work in a well ventilated area, and work with approved safety equipment, such as those dust masks that are specially designed to filter out microscopic particles.

TROUBLE SHOOTING

Problem(s)	Possible Cause	Corrective Action
Fluid path (plumbing and/or Swivel) is leaking or damaged	a) Maximum pressure rating for reel has been exceeded b) Application is not compatible with plumbing and/or swivel seal materials.	a) Replace or repair damaged components. Consult factory. Check maximum pressure rating of reel. b) Contact factory to determine chemical compatibility or environmental issues (i.e. temperature rating).
Hose will not fully retract	a) Outlet nozzle, gun or tool is too heavy. b) Spring is fatigued. c) Field installed hose is too long.	a) Add spring tension. See "Spring Tension Adjustment". b) Add spring tension. See "Spring Tension Adjustment". Replace Spring Canister if required. c) Call local distributor for correct specified hose length.
Hose will not retract at all	Spring has lost all tension or has possibly broken	Reinstall Spring Tension
Reel will not latch	a) Incorrect operation b) Dog spring or locking cam is broken or worn	a) To latch the reel, pull out the hose and allow it to retract after hearing the first second or third "click". b) Replace dog spring or locking cam.
Fluid leaks from swivel	a) Swivel seals are damaged or worn b) Inlet hose is not flexible	Replace swivel seals. See "Swivel Seal Replacement". Caution: Be sure leak is not at Hose Fitting!
Swivel assembly in not moving freely or locking up	Inlet hose is not flexible causing side force on swivel	Properly tighten inlet hose. Hand tighten fitting, plus 1/2 turn with wrench.

EXPLODED AND PARTS LIST



Part No.	Description	Q'ty	Part No.	Description	Q'ty
1	Nut	1	25	Double bolt	3
2	Spring washer	1	26	Spring core	1
3	Washer	2	27	Spring	1
4	Bolt	9	28	Drum	1
5	Bracket arm	1	29	Swivel shaft	1
6	Washer	1	30	Washer	2
7	Ratchet	1	31	O-ring or seal	1
8	Washer	1	32	Washer	1
9	Lock washer	1	33	-	-
10	Click pulley	1	34	-	-
11	Nut	8	35	Swivel shaft	1
12	Lock washer	2	36	Bearing cover	1
13	Washer	4	37	Ball bearing	17
14	Shaft	1	38	Bearing washer	1
15	Key	1	39	Washer	1
16	Guide sub-plate	1	40	Lock washer	2
17	Drum	1	41	Bracket arm	1
18	Roller axle	2	42	-	-
19	Roller	2	43	Double bolt	1
20	Roller	2	44	Hose assembly	1
21	Roller axle	2	45	Clamp	1
22	Guide plate	1	46	Stopper assembly	1
23	Bolt	4	47	Ratchet spring	1
24	Base	1			

TECHNICAL
DETAILS

SAFETY
PRECAUTIONS

INSTALLATION

ADJUSTMENTS

SERVICE
INSTRUCTIONS

LIMITED
WARRANTY

TROUBLE
SHOOTING

EXPLODED AND
PARTS LIST



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* Read Manual Before Use!