

Remote Start / Stop Module 039



The tekmar Remote Start / Stop Module 039 provides the user with the ability to start and stop a snow melting system. As well, the 039 gives the user the ability to adjust the running time of their snow melting system. An indicator light on the face of the 039 provides a visual indication as to the current operation of the snow melting system. The 039 is designed to work with specific tekmar snow melting controls. Read the Data Brochure of the applicable control to determine if the 039 is compatible with the intended control. The 039 cannot be used on tekmar controls that do not support a tekmar Net™ (tN2) device.

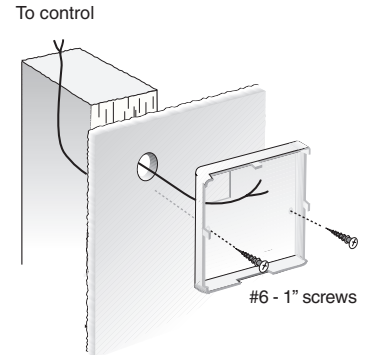
Installation

STEP ONE — REMOVING THE FRONT COVER

Place a screwdriver or similar object into the small slot located in the top of the 039. Push the screwdriver against the plastic tab and pull the top of the front cover so that it pivots around the bottom edge of the 039.

STEP TWO — MOUNTING THE 039

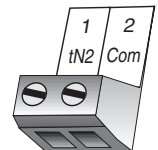
The base of the 039 should be securely installed in the desired location. Mount the 039 directly to the desired location using two #6 - 1" screws. The screws are inserted through the mounting holes and must be securely fastened to the desired location. If possible, at least one of the screws should enter a wall stud or similar surface. If the 039 is to be mounted to a 2" x 4" electrical box, order an Adaptor Plate 007. This plate will mount to the electrical box and the 039 will then mount to the plate.



STEP THREE — WIRING THE 039

Run 18 AWG twisted pair or similar wire between the 039 and the control. Insert the wires through the hole provided in the back of the 039 enclosure and connect them to the Com and tekmar Net™ (tN2) terminals. Do not run the wires parallel to telephone or power lines as this may interfere with the operation of the 039. If the 039 wires are located in an area with strong sources of electromagnetic noise, shielded cable should be used or the wires can be run in a grounded metal conduit.

NOTE: Do not apply power to the 039. The 039 is to be wired directly to the control. The connection between the control and the 039 is polarity sensitive. The Com terminal of the 039 must be connected to the appropriate terminal of the control. If the wires are reversed, the 039 will not function and the control will display a short circuit error for the tekmar Net™ (tN2) device.



STEP FOUR — INSTALLING THE FRONT COVER

Align the hinges on the bottom of the front cover with the bottom of the 039 mounting base. Pivot the front cover around the bottom hinges and push the top against the mounting base until it snaps firmly in place.

Settings

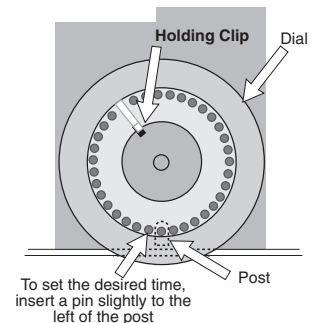
The 039 can be used to set the desired running time of the snow melting system. Turn the 039's dial until the desired running time is displayed in the window.

Note: If an infinite (*NO LIMIT*) run time is selected, the snow melting system runs continuously until *WWSD* or *CWCO* occurs, or someone presses the start / stop button on the 039.

Limiting the Time Range

The time range on the 039 can be limited in order to avoid extreme time settings or any tampering with the setting.

- Turn the dial until the desired time is at the bottom of the 039.
- Remove the front cover by following Step One of the Installation procedure.
- Lift and pull the scale off the dial. Be careful not to turn the dial while removing the scale. With the scale off, a series of small holes will be visible around the dial. Behind the dial there is a post which can be used to limit the rotation of the dial. Two aluminum limit pins are provided in the dial.



Setting a Minimum Time Limit

Remove one of the limit pins and re-insert it into the hole that is slightly to the left of the post at the bottom of the dial. With the pin in place the dial should only rotate clockwise from its current position as the counter-clockwise rotation is now restricted by the pin.

Setting a Maximum Time Limit

Insert one of the pins into the hole that is slightly to the right of the post.

Setting a Fixed Time

Insert one of the pins into the hole in the bottom of the dial such that the pin enters the post behind the dial. With the pin in place the dial should be fixed in position.

Replace the scale by sliding it onto the dial until the rectangular hole slips into the holding clip.

Replace the front cover by following Step Four of the Installation procedure.

Operation

STARTING THE SNOW MELTING SYSTEM

To start the snow melting system, press and release the button on the face of the 039.

INDICATOR LIGHT

An indicator light is located on the face of the 039 to provide a visual indication of the current operating status of the snow melting system.

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| <i>Flashing Green Indicator</i> | • indicates that the snow melting system is currently coming up to its desired snow melting temperature. |
| <i>Solid Green Indicator</i> | • indicates that the snow melting system is currently operating at its desired snow melting temperature. |
| <i>Solid Red Indicator</i> | • When the 039 button is pushed to stop snow melting operation, a solid red light is displayed on the face of the 039 for five seconds. If the snow melting system is stopped while there is still an external demand for snow melting, the 039 displays a solid red indicator light until the external demand is removed. Refer to the Data Brochure of the snow melting control for a description of an external demand. |
| <i>Flashing Red Indicator</i> | • If the indicator on the face of the 039 is a flashing red light, this indicates that the snow melting control is currently displaying an error message. Refer to the snow melting control and the control's Data Brochure to determine the error. Locate and repair the problem as described in the Data Brochure for the snow melting control. |

STOPPING THE SNOW MELTING SYSTEM

To stop the snow melting system when it is running, press and release the button on the face of the 039.

Technical Data

Remote Start / Stop Module 039

Literature	— D 039
Packaged weight	— 0.22 lb. (100g), Enclosure G, white PVC plastic
Dimensions	— 2-7/8" H x 2-7/8" W x 13/16" D (73 x 73 x 21 mm)
Approvals	— CSA NRTL/C, meets DOC & FCC regulations for EMI/RFI.
Ambient conditions	— Indoor use only, 32 to 122°F (0 to 50°C), < 90% RH non-condensing
Power supply	— tekmar control; tekmar Net™ 2 (tN2)



Limited Warranty and Product Return Procedure

Limited Warranty The liability of tekmar Control Systems Ltd. and tekmar Control Systems, Inc. ("tekmar") under this warranty is limited. The purchaser, by taking receipt of the tekmar product ("product"), acknowledges receipt of the terms of the warranty and acknowledges that it has read and understands same.

tekmar warrants each tekmar product against defects in workmanship and materials, if the product is installed and used in compliance with tekmar's instructions. The warranty period is for a period of twenty-four (24) months from the production date if the product is not installed during that period, or twelve (12) months from the documented date of installation if installed within twenty-four (24) months from the production date.

The liability of tekmar under this warranty shall be limited to, at tekmar's sole discretion: the cost of parts and labor provided by tekmar to repair defects in materials and/or workmanship of the defective product; or to the exchange of the defective product for a replacement product; or to the granting of credit limited to the original cost of the defective product, and such repair, exchange or credit shall be the sole remedy available from tekmar, and, without limiting the foregoing in any way, tekmar is not responsible, in contract, tort or strict product liability, for any other losses, costs, expenses, inconveniences, or damages, whether direct, indirect, special, secondary, incidental or consequential, arising from ownership or use of the product, or from defects in workmanship or materials, including any liability for fundamental breach of contract.

This warranty applies only to those products returned to tekmar during the warranty period. This warranty does not cover the cost of the parts or labor to remove or transport the defective product, or to reinstall the repaired or

replacement product. Returned products that are not defective are not covered by this warranty.

This warranty does not apply if the product has been damaged by negligence by persons other than tekmar, accident, fire, Act of God, abuse or misuse; or has been damaged by modifications, alterations or attachments made subsequent to purchase which have not been authorized by tekmar; or if the product was not installed in compliance with tekmar's instructions and the local codes and ordinances; or if due to defective installation of the product; or if the product was not used in compliance with tekmar's instructions.

This warranty is in lieu of all other warranties, express or implied, which the Governing Law (being the law of British Columbia) allows parties to contractually exclude, including, without limitation, warranties of merchantability, fitness for a particular purpose, durability or description of the product, its non-infringement of any relevant patents or trademarks, and its compliance with or non-violation of any applicable environmental, health or safety legislation; the term of any other warranty not hereby contractually excluded is limited such that it shall not extend beyond twenty-four (24) months from the production date, to the extent that such limitation is allowed by the Governing Law.

Product Return Procedure Products that are believed to have defects in workmanship or materials must be returned, together with a written description of the defect, to the tekmar representative for that territory. If the address of the representative is not known, please request it from tekmar at the telephone number listed below.



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