Pot Knob from Nikon 80i -(Save from microscope)

PN 11170 Pot-Cable

Assy (19 inch)

PN 11185

Custom Nut for Pot (7/16 Hex)

PN 10589 DMLB 100W Illuminator Assy

PN 10467 Set Screw

8-32 Brass Tip

PN 11118 Nikon 80i Adapter (attach using

the original screws from the microscope)

PN 10456 Hex Key 1.5mm (for pot knob)

PN 10457 Hex Key 2.5mm Short Arm L

PN 10490 Hex Key 5/64 (for 8-32 set screw)

Needed but not included:

12mm socket to remove original pot 7/16 socket to install new pot

IMPORTANT NOTE - If the hole for the potentiometer is less B than 9mm diameter you need to drill it out with a 9mm or 23/64 drill to fit the custom nut.

The illuminator may be powered by plugging the cable into the power supply provided, or into a suitable USB port on a computer or other device.



PN 11163 Power Supply 5V 2.1A and PN 10734 Power Cable 1.35mm ID/3.5mm OD x USB A 6 ft.

Power supplies are subject to substitution without notice due to availability issues and changes in regulations.



PN 10736 Rubber plug to block unused AC power receptacle.

MV VH

3M VHB tape to secure pot cable

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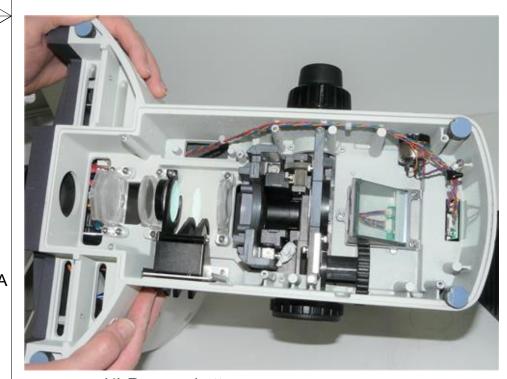
(1) Be sure the AC power is unpluged. Disconnect the original lamp power cable.



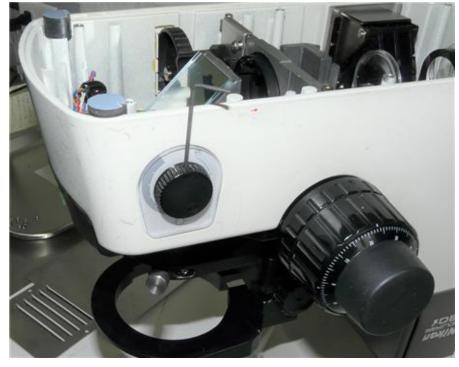
(2) Loosen the set screw holding the original lamp.



(3) Remove the original lamp.



(4) Remove bottom cover.



(5) Remove the knob using the 1.5mm hex key. Save the knob for the new pot.



(6) Remove the nut holding the old pot, using a 12mm socket.

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Nanodyne Replacement Illuminator for Nikon 80i Installation Instructions: Step 2. Remove Back Cover and Old Pot Wiring



(1) The control on the front of the microscope will be obsolete. Intensity control for the new illuminator will only use the knob on the left.



(3) Remove the back cover. It is held by 8 socket head screws. Use a hex key to remove them.



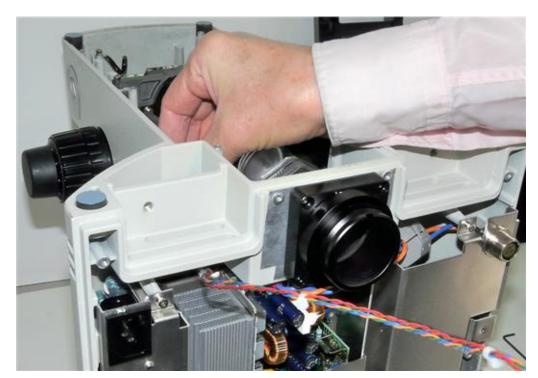
(5) Disconnect the orange, green and blue cable with the orange plug from the power supply.



(2) Disconnect the two cables from the sockets on the green pcb. The pcb will not be used, but left in place for appearance.



(4) Disconnect the red and brown cable with the white plug from the power supply.



(6) Pull the disconnected cables out of the microscope. You will have to help feed the wires through from the inside.

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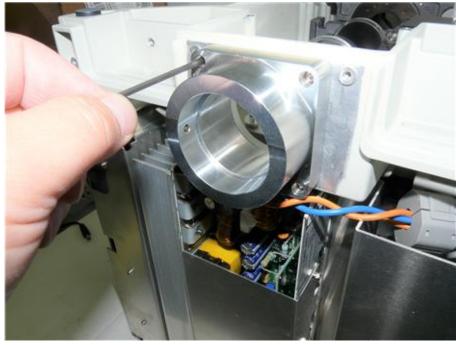
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4 2

Nanodyne Replacement Illuminator for Nikon 80i Installation Instructions: Step 3. Install Adapter and Pot for New Illuminator

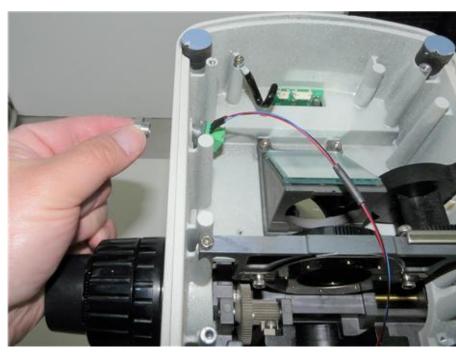


(1) Remove the original illuminator mount. Save the screws for the new adapter.

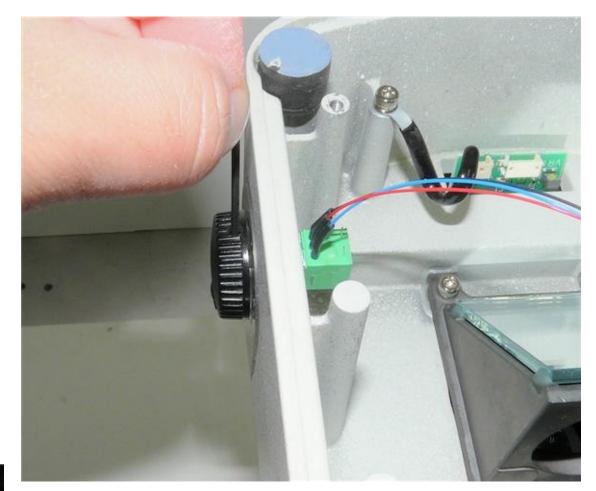


(2) Install the new adapter using the original screws.

Note the orientation of the set screw. The adapter can be oriented 4 ways. Be sure access to the set screw is convenient.



(3) Install the new pot using the PN 11119 custom nut to secure it to the microscope. Use a 7/16 inch socket to tighten it.



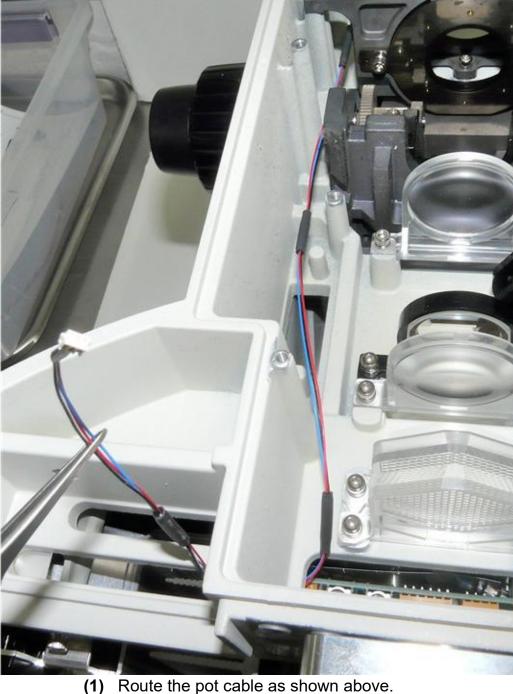
(4) Install the knob on the new pot using the 1.5mm hex key.

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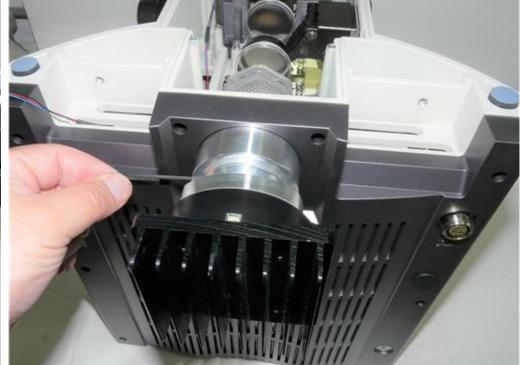
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(2) Replace the back cover.



(2) Replace the back cover.



(3) Insert the new illuminator and tighten the set screw with the 5/64 hex key.



(1) Route the pot cable as shown above.

(4) Connect the pot cable to the illuminator.

Detailed pot cable connection procedure is shown on the next page (sheet 6).

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Nanodyne Replacement Illuminator for Nikon 80i Installation Instructions: Step 4 (continued). Pot Cable Connection Details

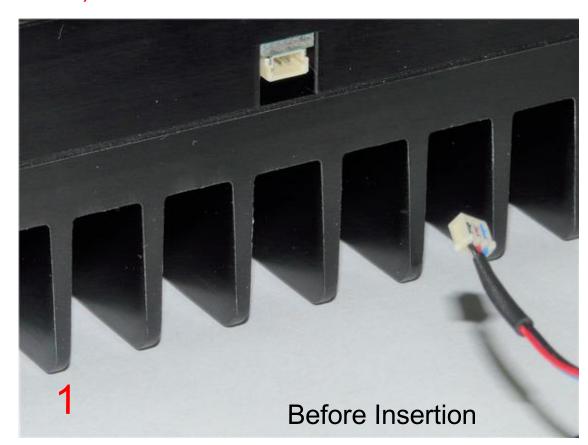
Step 11: Connect the plug at the end of the Pot Cable Assembly to the mating socket of the illuminator, as shown in the pictures on this page. NOTE THAT THE PLUG IS KEYED TO ONLY GO INTO THE SOCKET ONE WAY, AS SHOWN.

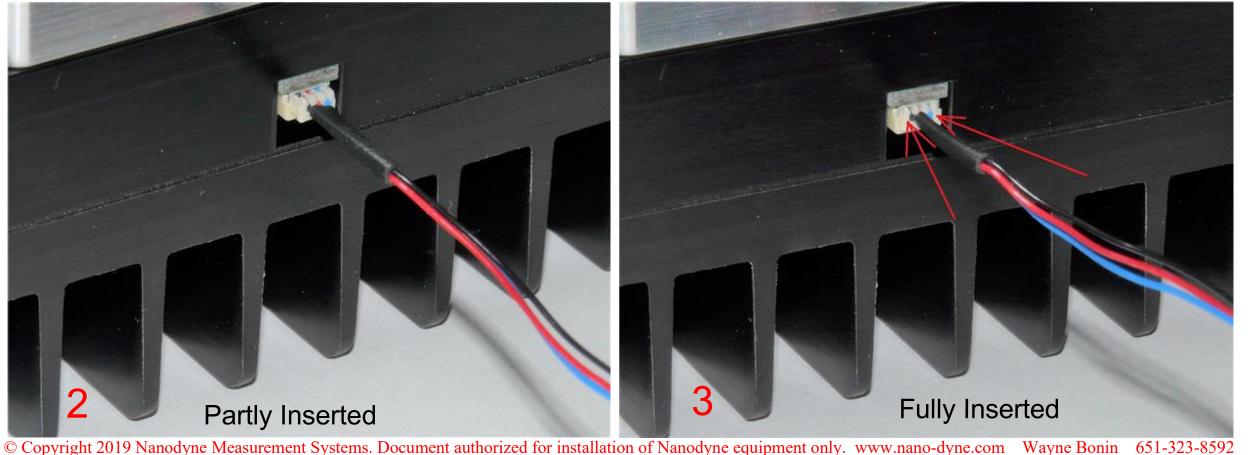
Partially insert the plug into the mating socket of the illuminator by holding the wire next to the plug with your finger (photo 2).

Use your fingernails, if you have them, or tools like a tiny screwdriver or tweezers pushing on the side of the plug to fully insert it (photo 3).

The socket cannot be fully engaged by pushing on the wires, as the wires would just collapse.

To disconnect it if needed, pull the wire straight out by firmly gripping the black heat shrink tubing.





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(1) Secure the pot cable with the 3M VHB tape (red, in above photo). Secure it inside the microscope also, where the cable goes by the focusing gear.



(2) Install PN 10736 rubber blocking plug in the now-obsolete AC receptacle as shown in the photos.



(3) Attach the power supply cable and plug it the power supply. It now ready to operate.

Note that your illuminator and power cable will look slightly different (as shown on the first page). The installation procedure is the same.

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