

Waist Pack Mod

Red light headlamp or flashlight.

Laminating and spiral wrap of Instruction book (we have this done by a local office supply store)

Constellation Booklet - ISBN-978-0-679-77998-8 (Barnes & Noble)

National Audubon Society Pocket Guide: Constellations of the Northern Skies

Celestron lens pen CE-93575 (or Orion)

Waist pack

Primary Mirror Mod;

Three 5mm dia x 30mm long .80 pitch stainless phillips flathead screws-washer-nylon locknut.

Loctite instant Epoxy

Eyepiece Mod;

Celestron 8-24 Zoom eyepiece CE-93230

Two 3mm dia x 8mm long .50 pitch stainless socket button head screws.

Loctite 425 threadlocker adhesive #42540

To prevent the silver 1 ¼ collar of eyepiece from unscrewing.

To prevent the eyecup ring from unscrewing.. Must be very careful here - just a drop.

Also used on focuser collar and screws

Poly Rope - TW Evans- #4, 1/8, polypro cameo cord

Battery Box Mod

One AA battery box (Jameco 216102)

Two AA batteries

One 1/16 x 3/4 diameter rubber disc - cut from 4 x 4 x 1/16 rubber sheet

Originally, I fashioned a cutter from a piece of 3/4 aluminum tubing

Now I use a Osborne #149 Arch punch to cut out the rubber disc

Two brass contacts - approx. 1/2 x 3/8 x .016 - cut from a 12" strip of .016 x 1/2 brass

Fine solder

Super Glue

Scotch Outdoor Mounting Tape

Moon Hole & Cover Mod

Velcro Ultra-Mate 1 x 3/4

Heyco 2" plastic hole plug (heyco.com #2783)

Poly Rope - TW Evans- #4, 1/8, polypro cameo cord (chose this as it does not snag on the velcro)

Decal Mod

3 mil permanent adhesive backed sheets (for use in a heat laminator)

Or;

Fellowes 9 x 12 self adhesive laminating sheets

Shopping List

Note that all vendor listings are only suggestions.

It is highly recommended to shop around as price and availability are constantly changing

Orion - <https://www.telescope.com/>

Orion 4.5 Starblast

OPT - <http://www.optcorp.com/>

Celestron lens pen CE-93575

Celestron 8-24 Zoom eyepiece CE-93230

Staples

Lamination of Instruction books

Barnes & Noble <http://www.barnesandnoble.com/>

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Walmart or Amazon

Outdoor Products, "Marilyn" or "Essential" waist packs

Bolt Depot - <http://www.boltdepot.com> - buy each in bulk of 100per or more

5mm dia x 30mm long .80 pitch stainless phillips flathead screws

5mm stainless washer

5mm .80 pitch stainless Nylon Insert nut

3mm dia x 8mm long .50 pitch stainless socket button head screws

Jameco Electronics - <http://www.jameco.com>

AA Battery box - #216102

Heyco - <http://www.heyco.com/>

2" hole plugs #2783 (search Item number to locate a dealer with stock)

Amazon or local hardware

TW Evans- #4, 1/8, polypro cameo cord #98450, 500' or #98443, 50 ft

As of Oct 2020, this item is hard to locate – ebay may be best deal

Lowe's/Home Depot

Red light Headlamp - Eveready - HD33A2ODE - or whatever is available –

Oct 2020 - NHAS changed to a red light flashlight and a custom NHAS lanyard

<https://www.amazon.com/AR-happy-online-Flashlight-Adjustable/dp/B01E5EOFSY>

<https://www.customlanyard.net/ly-order.php>, 5/8, 36inch polyester with metal swivel hook

Jackson-Hirsch <https://www.jhlaminating.com/>

Supplier of laminators and supplies

NHAS uses the 3 mil permanent adhesive backed sheets for all decals – used in a heat laminator

(Alternative is Fellowes 9 x 12 adhesive laminating sheets from Staples)

Local Purchases - Hardware / Office Supply

Cutting mat

Razor knives

Loctite 425 threadlocker adhesive #42540 (Compatible with Plastic)

Super Glue (found that the "Gel" super glue works best - less runny)

AA batteries - need two per scope

4" x 4" x 1/16 rubber sheet (automotive section)

12" strip of .016 x 1/2 brass

Roll of fine solder

Scotch Permanent Outdoor Mounting Tape

Velcro Ultra-Mate - 1 x 3/4 Comes in pkg of 10

Nylon wire ties - used to tie the bag strap closed so that it cannot be easily removed

Loctite instant Epoxy - used in the mirror mod.