

Obsession 25" Telescope

SET-UP AND TAKE-DOWN IN THE FIELD

SET- UP

Note: "UTA" means Upper Tube Assembly

- Attach the wheel barrow handles to the rocker sides. Always attach the handles so that the brass name plate is facing you when you lift. If you put them on the other way the mirror box will tilt out over the wheels as you lift possibly slipping out of the rocker and crashing to the ground. lift and roll the entire lower unit (mirror box, rocker, and attached ground board) out onto a flat level surface.
- Remove the handles.
- **STOP!!!** The primary mirror must be in place before you continue. If you have not inserted the primary do not assemble the telescope. **NEVER ASSEMBLE THE TELESCOPE WITHOUT THE PRIMARY IN THE MIRROR BOX.** It will be grossly out of balance and crash. And of course make sure the dust cover is on.

Its a good idea to have a friend help you with set up the first couple of times until you are confident you can do it alone.

- Insert the eight truss poles into the wood split blocks on the mirror box and gently tighten the knobs.
 - Always put the same ends of the poles into the blocks, (the ends marked with the black ring). This is because the ends of the poles that attach to the UTA can be deformed slightly from the wedge pressure so you'll always want to keep those ends out of the maple split blocks on the mirror box.

Note: insert the poles fully into the split blocks. The black ring is NOT a depth mark
The black ring is only there to show you which end of the pole goes in the blocks.

- Place your ladder next to the scope but far enough away so that it will just clear the rocker base when it is rotated.
- Prepare the UTA for placement by checking to make sure the cylindrical nuts in the four cam levers are even with the ends of the flat ended bolts. If not, rotate the levers until they are. **Stop. Is the dust cover on the mirror box? It better be.**
- With the four 'edge-clamp assemblies dangling by their cords, carry the UTA up and set it on top of the truss poles.

Be very careful! Don't bump the secondary on the pole tips. Always leave the wedge-damp assemblies dangling from the UTA by their cords when you carry it up. Now make

sure the UTA is sitting on top of all eight poles evenly. Also make sure it is positioned where you want the focuser. At night, it helps to hold a small flashlight in your mouth so you can use both hands freely and still see what you are doing.

- After the UTA is in place insert a clamping wedge in between the two truss poles. push the flat ended bolt (with the cam lever attached to the bottom end) up through the hole in the wood and insert the hitch pin through the hole in the flat ended bolt.
 - Throw the cam lever. You will usually have to adjust the cam lever on the bolt some to achieve a snug fit with the wedge. Simply disengage the lever and rotate it a turn up or down and flip it up again. Don't jam the wedges too tight or it will be difficult to move them when you are finished observing.
 - Now grasp the lower wood ring of the UTA and slowly rotate the telescope in azimuth until the next clamp wedge assembly is in front of you. Engage the clamp and rotate the scope 90 degrees again. Repeat until all four wedges are firmly damped in place.
- Again, have someone help you initially until you are confident you can do it alone. If it is windy, be extra careful. Also use a good quality ladder. A 8 foot ladder for a 25". The top half of the ladder is not used to stand on obviously but to lean on so you don't lose your balance. With a little practice set-up takes only a few minutes.

TAKE-DOWN

- Put the dust cover on the mirror box. You don't want to accidentally drop something onto the primary during take down!!!
- Remove the eyepiece and Telrad and anything else that may fall off.
- Remove the light shroud if necessary.
- Now rotate the telescope to a vertical position.
- Place your ladder next to the scope but far enough away so that it will just clear your ladder when it is rotated in azimuth.
- Release the cam lever nearest you and pull out the hitch pin.

Rotate the scope in azimuth 90 degrees and release the next cam lever and pin. Do this until all four cam levers and hitch pins are released. Grasp the lower wood ring of the UTA with one hand on each side and shake firmly with a twisting motion. All the clamp assemblies will drop out and dangle by their cords. confirm that all four dampers are fully released and dangling. If not shake again.

- Lift off the UTA and carry it down the ladder. Take care not to bump the secondary.
- Remove the eight truss poles.
- Attach the wheel barrow handles so the brass name plate is facing you when you lift and roll away. After a little practice take-down will take you about three or four minutes.

NEVER REMOVE THE UTA (CR on the 30") UNLESS THE TELESCOPE IS IN A COMPLETELY VERTICAL POSITION. Removing the UTA with the telescope at an angle will cause the lower unit and truss poles to rapidly rotate to vertical with possible injury to you or your optics.