



# Clifton Cameras Product Specification

## Celestron NexStar 8SE Computerized Telescope Full Spec

### Optical Tube Info:

Optical Design: Schmidt-Cassegrain

Aperture: 203.2mm (8")

Focal Length: 2032mm (80")

Focal Ratio: f/10

Focal Length of Eyepiece 1: 25mm (.98")

Magnification of Eyepiece 1: 81x

Finderscope: StarPointer™ red dot finderscope

Star Diagonal: 1.25" Star Diagonal

Highest Useful Magnification: 480x

Lowest Useful Magnification: 29x

Limiting Stellar Magnitude: 14

Resolution (Rayleigh): 0.69 arc seconds

Resolution (Dawes): 0.57 arc seconds

Light Gathering Power (Compared to human eye): 843x

Secondary Mirror Obstruction: 64mm (2.5")

Secondary Mirror Obstruction by Diameter: 31%

Secondary Mirror Obstruction by Area: 9.77%

Optical Coatings: Starbright XLT

Optical Tube Length: 432mm (17")

Optical Tube Diameter: 232mm (9.1")

Optical Tube Weight: 12 lbs (5.4 kg)



Dovetail: CG-5 Dovetail bar

Mount Info:

Mount Type: Computerized Altitude-Azimuth Single Fork Arm

Instrument load capacity: 12 lbs (5.44 kg)

Height adjustment range (includes mount and tripod): 965.2mm - 1422.4mm (38" - 56")

Tripod leg diameter: 38.1mm (1.5") Stainless Steel

Mount Head Weight: 11 lbs (5 kg)

Accessory Tray: Yes

Tripod Weight: 9 lbs (4.08 kg)

Slew Speeds: 9 slew speeds - max speed 5°/second

Tracking Rates: Sidereal, Solar and Lunar

Tracking Modes: Alt-Az, EQ North and EQ South

GPS: N/A

Dovetail Compatibility: CG-5 dovetail

Number of Auxiliary Ports: 1x AUX Port

Autoguide Port: Yes

USB Port: Yes, Hand Control input

Power Requirements: 8-AA batteries (not included) | 12 VDC-750 mA (Tip positive)

Motor Drive: DC servo motors

Alignment Procedures: SkyAlign, 1-Star Align, 2-Star Align, Auto 2-Star Align, Solar System Align, EQ North / EQ South Alignment (EQ align requires an equatorial wedge)

Periodic Error Correction: No

Computerized Hand Control: Double line, 18 character Liquid Crystal Display with 19 fiber optic backlit LED buttons

NexStar+ Database: 40,000 objects, 200 user defined programmable objects. Enhanced information on over 200 objects

Software: Celestron Starry Night Special Edition Software | SkyPortal App

Total Kit Weight: 24 lbs (10.88 kg)



Included Items: Optical tube | Single Fork Arm Mount and Tripod | Accessory Tray | Star Pointer Finderscope | NexStar+ Hand Control | 25mm eyepiece | Star Diagonal

#### Solar Warning

Never look directly at the Sun with the naked eye or with an optic (unless you have the proper solar filter). Permanent and irreversible eye damage may result.

Never use your optic to project an image of the Sun onto any surface. Internal heat build-up can damage the optic and any accessories attached to it.

Never leave your optic unsupervised. Make sure an adult who is familiar with the correct operating procedures is with your optic at all times, especially when children are present.