PRODUCT CATALOG 2011

MEADE
www.meade.de

Welcome...

... to the fascinating world of astronomy with telescopes from MEADE Instruments.

The cloud bands of Jupiter, the rings of Saturn, the spiral arms of a galaxy - everybody has seen amazing images like these, but most certainly only as illustrations in books or on television, and not „live“ with your own eyes gazing through a telescope. You thought this is only possible with very large professional telescopes, which are virtually unaffordable? This assumption is as widespread as it is wrong. Complete telescope systems for beginners will show the above mentioned famous rings of Saturn and much more and are available for a few hundred Euros only. For the serious amateur and for semi-professional applications large telescope systems with computer control are also affordable now.

MEADE Instruments is a leading global manufacturer of telescopes and accessories for amateur astronomy. MEADE develops and manufactures astronomical instruments since 1972. The experience and developed innovations of this period results in today‘s wide product range, which you will find in this catalog.

Enjoy an exciting journey through the technology of modern instruments for space exploration. From easy to use beginners’ telescopes at a valuable price to fully computer-controlled semi-professional telescopes, you will find everything you need on the following pages.

At the end of the catalogue you find our extensive range of accessories, various eyepieces, filters, eyepiece adapters, prisms and diagonal mirrors. There are mounting accessories, equatorial wedges, power supplies and so on, followed by photographical accessories and our famous Deep Sky Imagers. We are confident that there is the right telescope for your demand and interest. Let us guide you through our large product range and help you finding YOUR telescope.

We hope you enjoy your journey through the universe of MEADE Instruments.

Find Your Telescope

LightBridge Dobsonians
The LightBridge truss-tube Dobsonians are classical Newtonians mounted on a solid and affordable rocker box. The best way to have a easy to transport telescope with a big aperture.

ETX70 and ETX80 Achromatic Refractors
Very portable computerized achromatic refractors for beginners, rich field observations, and travelling.

DS2000 Series
A Variety of optics with affordable prices.
The DS2000 line includes refractors, Maksutovs and Newtonians. Ideal for beginners. For stunning star-gazing experiences right out of the box.

ETX90PE and ETX125 Maksutov-Cassegrain Telescopes
Very portable and fully computerized telescopes with high-quality optics. Ideal for lunar and planetary observations, and more.

LT-6 and LT-8 Schmidt-Cassegrain Telescopes
A fully featured, portable AutoStar #497-controlled line of classical SC telescopes. The new high-performance standard without spending a lot of money.

LXD75 German equatorial mount Telescope Series
Computerized GO TO Mount for visual observing and imaging. Sold individually or as a set with Schmidt-Newtonians, refractors or ACF optics.

LX90ACF Advanced Coma Free Telescopes
The affordable answer for the serious amateur astronomer not willing to compromise. Excellent ACF optics from 8" up to 12" on a solid mount with computer control and GPS.

LightSwitch LS-6 and LS-8 Advanced Coma Free Telescopes
Simply flip the switch and the LS automatically aligns itself and takes you on a guided multimedia tour of the best objects in your sky. Lightweight and portable, with high quality ACF optics.

LX200ACF Advanced Coma Free Telescopes
The perfect combination of high quality optics, precision mechanics, cutting edge electronics and computer control for the astronomer interested in serious observing, imaging and research.

MAX MOUNT
Brings the Advanced Coma Free Telescopes into the domain of serious research. Imagine half a meter of aperture with high class optics and MAX robotic german equatorial mount.

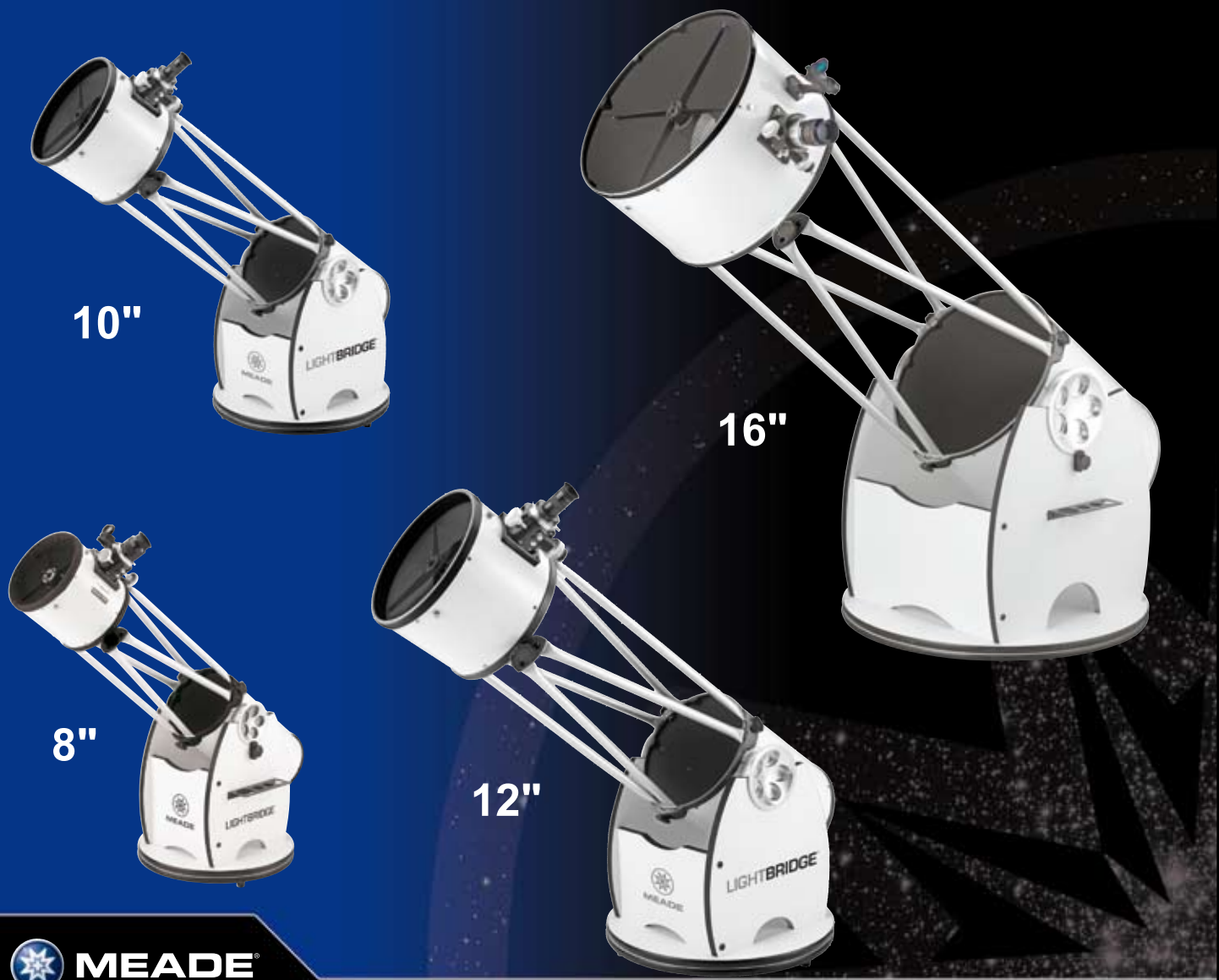
You already have a telescope?
Find various accessories at the end of this catalog.

LightBridge

It‘s not just a big telescope. It‘s a big telescope that goes anywhere. The LightBridge truss-dobs from Meade take down and set up quickly. So you can take one of these massive windows on the universe out to your favorite dark sky locations with ease. LightBridge dobs give you high quality Meade optics, premium components, and ultra portability - all for about the same price as an ordinary tube dob. So get a LightBridge truss-dob. And prepare to cross the universe.

The open truss design of the LightBridge Dobsonians means portability of the telescope is dramatically improved over a solid tube design. Taking only moments to set up and take apart for travel, the extremely rigid truss frame design ensures a no-compromises view through the telescope. Hand driven Dobsonian style telescopes by their nature need good mounts with smooth and stable movement to be enjoyable, and here again the LightBridge excels. The sturdy laminated finish wooden Dobsonian mount includes premium features such as roller bearings on the azimuth (side to side) axis and large diameter aluminum altitude (vertical axis) bearings with a hand adjustable variable tension brake for smooth and stable movement.

- **Diffraction Limited Optics** - Consumers know that „Meade Optics Inside“ means that what they see through our telescopes will be views that are detailed, crisp and full of contrast.
- **Meade Optical Coatings** - 94% High Reflectivity Aluminum Coatings with magnesium fluoride over coat provides bright images full of detail.
- **Built-In Primary Mirror Cooling Fan** - Bring the telescope into thermal equilibrium quickly and efficiently with the battery powered cooling fan. The fan is mounted to the rear of the „vented“ primary mirror cell for fast cool down.



LightBridge

- **Advanced Four-Reticle Red Dot Viewfinder** - Four reticles and varying brightness controls allow this deluxe finder to adjust to your observing needs.
- **26mm QX™ Wide Angle 2" Eyepiece** - This premium eyepiece has a 2" barrel, and offers a whopping 70° apparent field of view.
- **2" Crayford-Style Machined Aluminum Focuser with 1.25" Adapter** - Smooth precise focusing is achieved with this 10:1 focuser. A unique focus tension knob and focus lock design gives complete control over focus.
- **Steel RA Roller Bearings** - Roller bearings make movements smooth and effortless.
- **Centering clamps on secondary mirror cell** - Helps aligning the mirror cell with the trusses for easy set up.
- **Light Shroud included** - Blocks unwanted stray light that will otherwise reduce contrast when observing. Easy to use.
- **Blackened tube rings** - Enhances image contrast compared to the original LightBridge design.

	8"	10"	12"	16"
Art.-No.:	0116720	0116825	0116830	0116740
Aperture	203mm	254mm	305mm	406mm
Focal Ratio	f/6	f/5	f/5	f/4,5
Focal Length	1250mm	1270mm	1524mm	1829mm
Limiting Visual Stellar Magnitude	13,5mag	14mag	14,5mag	16mag
Recommended Maximum Visual Power	400x	500x	600x	800x
Mount	Dobsonian	Dobsonian	Dobsonian	Dobsonian
Optical Design	Newtonian	Newtonian	Newtonian	Newtonian

Metal Optical Tube with 2" Crayford-style focuser

Lightweight Aluminum Trusses

Metal Optical Tube with Primary Mirror Cell

Solid Base with Steel RA Roller Bearings

AutoStar #494

With the standard-equipment Meade AutoStar Computer Controller plugged into the control panel of your DS-2000 or ETX70/80 telescope, locating any astronomical object in the sky is as easy as pushing a button. It is easy to use, even for the beginner who has never before operated a telescope.
AutoStar's celestial object database includes more than 1500 astronomical objects, any of which may be entered on to the AutoStar display; alternately, the Right Ascension and Declination of any object in the sky may be input to the AutoStar display. In either case when the observer presses GO TO, the telescope automatically moves to the object at 4.5°/sec. on both telescope axes, and places the object in the telescopic field of view.

#494 AutoStar's database includes the following celestial objects:

Deep-space objects from the Index Catalog (IC) and New General Catalog (NGC):
- 66 named objects (e.g., the Orion Nebula)
- 74 galaxies
- 31 diffuse nebulae
- 19 planetary nebulae
- 135 star clusters

Other deep-space objects:
- 109 objects from the Caldwell Catalog, the best objects for small telescopes
- 110 Messier (M) objects; the complete Messier catalog
- 943 stars from the Smithsonian Astrophysical Observatory (SAO) catalog, including 395 double stars, 189 variable stars, and other stars of special note

In the Solar System:
- 50 Earth-orbiting satellites
- 26 asteroids, including all of the brightest asteroids
- 15 periodic comets
- 8 major planets, from Mercury to Neptune and minor planet Pluto

1586 objects total

Additional Capabilities: Beyond the location of database objects, AutoStar allows for a wide range of important — indeed revolutionary — telescope capabilities:
Automatic GO TO capability to any astronomical object of known coordinates (RA and Dec.).

Digital Readouts of telescope position, continuously in RA and Dec.
Precise sidereal-rate tracking. Once AutoStar locates an object, it directs the telescope to track the object automatically on both telescope axes, simultaneously, keeping the object centered in the field.

9-Speed Dual-Axis Operation. Use AutoStar's pushbuttons to move the telescope on either or both axes, simultaneously, at any of nine drive speeds, from very slow 2x sidereal to fast 4.5°/second.

Use Meade astronomy software, on your PC to GO TO any object on the PC display at a click of the mouse. (Requires optional #506 Connector Cable Set).

Plus: over 20 other menu options, including guided tours of the best objects observable on any specified date; major event menus; utility functions (e.g., timer, alarm, eyepiece power calculations); and much more.

For the beginning or intermediate observer AutoStar is a revelation that permits the observation of hundreds of objects the very first night out. And, with its wide-ranging capabilities, AutoStar is a valuable tool in the hands of the most experienced observer as well.

ETX70/80

Meade's ETX 70 and ETX 80mm are compact wide field refractors that go almost anywhere due to their compact design. These telescopes are perfect for beginners, or an ultracompact and lightweight travel companion and also great for terrestrial observations. Take them wherever you go, whether you're hiking, camping or on vacation. They may be small, but you don't have to miss an easy to use GO TO system.

Both ETX telescopes can be operated on a desk or with the tripod. Both will show numerous craters on the moon, the cloud belts on Jupiter, and Saturn's rings, and this is just the beginning of what can be seen with this telescopes. The AutoStar #494 solves the beginner's biggest challenge: aligning the telescope with the night sky and finding celestial objects in the vast starry firmament. Just align the telescope with a simple initialization procedure and find the sky's elusive jewels virtually as easy as pushing a few buttons. Observe land targets or over 1,500 sky objects and learn about the sky with AutoStar's extensive descriptions of astronomical objects displayed on its screen.

Included with the delivery:

ETX70
AutoStar #494; eyepieces 4mm, 12mm, 25mm 1,25"; 3x barlow lens; erecting prism; dew cap; backpack; tripod; astro software

ETX80
AutoStar #494; eyepieces 9,7mm, 26mm SPL 1,25"; bubble level compass; tripod with nylon carry bag; astro software

	ETX70	ETX80
Art.-No.:	0110075	0110080
Aperture	70mm	80mm
Focal Ratio	f/5	f/5
Focal Length	350mm	400mm
Recommended Maximum Visual Power	140x	160x
Resolving Power in arc seconds	1,6 arc sec.	1,4 arc sec.
Mount	Double Fork	Double Fork
Optical Design	Achromatic Refractor	Achromatic Refractor

DS2080/2130AT-LNT

DS2000 Series Telescopes:

Meade DS2000 models are easy to operate but sophisticated, fully computer-guided GO TO telescopes. All models share the Meade lightweight, portable and reliable DS2000 single arm robotic mount with model #494 AutoStar Computer Keypad. This incredible technology knows the night sky right out of the box. Turn it on, and after a brief alignment procedure, your telescope is ready to take you to any object in it's over 1,500 object library or take you on a guided tour of the heavens. See more objects in one night than Galileo saw in a lifetime.

This complete package includes the Meade DS-2000 single arm mount with #494 AutoStar computerized keypad with over 1500 object library database and automatic tracking and GO TO, AutoStar Suite Astronomer Edition Software and Instructional DVD, two high quality Meade Series 4000 1.25" Super Plössl Eyepieces (9.7mm, 26mm) and Red Dot Viewfinder.

The solidly built metal construction mount features advanced electronics to make alignment easy, including an internal clock. The adjustable height aluminum tripod allows comfortable viewing from either a seated or standing position. Optional image erecting prism may be used (not included) for terrestrial viewing where a non-inverted (upright and correct left to right image) is desired.

The DS-2000 single arm robotic mount is lightweight, portable and reliable. It also available without optics and the perfect mount for any small telescope or solar telescope, spotting scope or camera (up to 2 - 3 kg weight, depending on telescope) that will attach via ¼" camera thread. Use your existing optics with the GO TO functionality of the Meade DS-2000 with AutoStar #494 (Art. No. 0440210). The AutoStar #497 (optional) will also work with this mount to extend the functionality even further.

The **MEADE DS-2080AT-LNT** Altazimuth Refractor features a lens aperture of 80mm (3.1“) with a focal length of 800mm and focal ratio of f/10.

The **MEADE DS2130AT-LNT** Newtonian Reflector features an aperture of 130mm with a compact design and gathers much more light and shows fainter deep sky objects and more detail at higher resolution.

	DS2080AT-LNT	DS2130AT-LNT
Art.-No.:	0102082	0102132
Aperture	80	130
Focal Ratio	f/10	f/7,7
Focal Length	800mm	1000mm
Recommended Maximum Visual Power	160x	260x
Resolving Power in arc seconds	1,4 arc sec.	0,9 arc sec.
Mount	single arm fork	single arm fork
Optical Design	Achromatic Refractor	Newtonian

DS2130AT-LNT

DS2080AT-LNT

DS2090/2102MAK

Transportable Maksutov-Cassegrain telescopes on a single arm GO TO fork mount

Availabe with 90mm or 102mm aperture which will show many objects in our solar system and in deep space. Observe numerous craters on our earth's moon, the rings of Saturn, Jupiters cloud belts and famous Galilean moons, but also deep sky objects like planetary nebulae, star clusters and more.

The Maksutov Cassegrain optical design features a spherical mirror with a weakly negative corrector lens (meniscus). The secondary mirror is included with the meniscus lens. The design corrects off-axis errors such as coma and chromatic aberrations. The proven optical design is compact and lightweight and the perfect telescope for observing objects of our solar system and bright deep sky objects. The integrated flip mirror allows for easy switching between the eyepiece and optional accessories (e.g. camera) that will attach via the integrated ETX thread. This makes the DS-2000 Maksutov-Cassegrains also versatile spotting scopes or telephoto lenses for terrestrial observations.

	DS2090MAK	DS2102MAK
Art.-No.:	0102096	0102103
Aperture	90	102
Focal Ratio	f/13,8	f/13,3
Focal Length	1250	1356
Recommended Maximum Visual Power	160x	200x
Resolving Power in arc seconds	1,3 arc sec.	1,1 arc sec.
Mount	single arm fork	single arm fork
Optical Design	Maksutov Cassegrain	Maksutov Cassegrain

DS2090MAK

DS2102MAK

AutoStar #497

The Meade #497 AutoStar Computer Controller turns your telescope into an automatic celestial object locating system.

Just plug the AutoStar into the telescope's HBX port, do a quick telescope alignment, and you're ready to observe any object in the AutoStar's 30,000-object database. Best of all, the Meade AutoStar is easy to use. Even the most novice observer will find himself or herself locating dozens of fascinating celestial objects the very first night out - from commonly-observed objects such as the rings of Saturn, the satellites of Jupiter, and the Orion Nebula (M42).

Any of AutoStar's database objects can be called up and entered on the hand controller display in seconds. The observer then simply presses the GO TO pushbutton and watches as the telescope automatically slews (moves) to the object and places it in the field of view. The effect of AutoStar is to bring objects easily within reach which were previously unreachable for all but the most dedicated of amateur astronomers.

Object Database

Included within AutoStar's database are all of the following astronomical objects:

- 5,386 objects from the Index Catalog (IC): galaxies, nebulae, and star clusters - the complete Index Catalog
- 7,840 objects from the New General Catalog (NGC); galaxies, nebulae, and star clusters - the complete Catalog
- 109 objects from the Caldwell Catalog, the best objects for small telescopes
- 110 Messier (M) objects; the complete catalog
- 16,800 stars from the Smithsonian Astrophysical Observatory (SAO) catalog, including double stars, variable stars, and other stars of special note
- 50 Earth-orbiting satellites
- 26 asteroids, including all of the brightest asteroids
- 15 periodic comets
- 8 major planets from Mercury to Neptune and minor planet Pluto

Any of the objects in the preceding listing can be located simply by calling up the object from the AutoStar database and pressing GO TO. Within seconds AutoStar directs the telescope to move automatically to the object and place it within the telescopic field of view with uncanny precision.

Additional Capabilities: In addition to database object selection and observation, AutoStar permits a wide array of fascinating and educational capabilities:

Automatic GO TO capability to any astronomical object of known Right Ascension and Declination, plus digital readouts of telescope position, continuously in RA and Dec.

Precise sidereal-rate tracking in either altazimuth or equatorial modes. Once an object is located by AutoStar, the telescope automatically tracks it and keeps it centered in the telescope's field of view.

9-Speed Dual-Axis Operation: Use the AutoStar pushbuttons to move the telescope on either or both axes, simultaneously, at any of nine drive speeds, from 2x sidereal to 5°/second.

Guided Tours: Allows AutoStar to choose the best objects for observing on any given night.

GO TO capability through AutoStar's serial interface, using the Meade astronomical software: Use the optionally-available package of #505 Connector Cable Set (article no.: 0745910) to form a system consisting of the telescope + AutoStar + your PC.

With AutoStar plugged into your telescope, the astronomical universe is in the palm of your hand: never before has such powerful telescope technology been so easy to operate, even by the most casual observer.

The AutoStar #497 is available in all common languages (English, French, German, Italian, Spanish)

ETX90/125PE

The compact portable Maksutov system - ideal for travel, lunar- and planetary observation!

Until now, the stargazer‘s two biggest challenges to enjoying the night sky have been aligning their telescope and finding objects. Meade‘s new ETX Premier Edition eliminates these two challenges and makes astronomy as easy as pushing a button right out of the box. Want to see a hard-to-find deep space galaxy? Simply push a button. The same goes for planets, stars, nebulae and more. Just pick an object you want to observe, press a button, and then AutoStar #497 will automatically point your telescope and put it right in your eyepiece.

Don‘t know what you want to see this evening? Go to the „Tonight‘s Best“ tour in your AutoStar #497. It automatically selects the best objects in the sky for that particular time and location (from its database of over 30,000 celestial objects). All you need is a clear night, a dark sky and a little curiosity. Whether you already know the sky by heart, or are just beginning your journey of discovery, your Meade ETX-Premier Edition will take you where you want to go. Astronomy has never been so fun and rewarding.

Automatic Alignment + SmartFinder

Meade‘s new ETX-Premier Edition automatically levels your telescope, points it to North and sets the time. You just enter your location or zip code. After your ETX completes its patented Level North automatic alignment procedure it will point to the first alignment star. Use the new wide-field SmartFinder to center the red dot over the alignment stars for ultra-precise pointing accuracy. It s that easy!

	ETX90PE	ETX125PE
Art.-No.:	0110093	0110128
Clear aperture	90mm	127mm
Focal Ratio	f/13,8	f/15
Focal Length	1250mm	1900mm
Resolving power	1,3 arc seconds	0,9 arc seconds
Limiting Visual Stellar Magnitude	11.7 mag	12.5 mag
Optical design	Maksutov-Cassegrain	Maksutov-Cassegrain
Mount	Double fork	Double fork

LT

Based on the compact Lightswitch series single arm fork-mount, the robust telescope models of the LT series are particularly characterized by their ease of use. With the LT models mobility and fast readiness for action is always guaranteed. The easy and flexible use of the famous manufactured LT series telescope systems is supported by the patented AutoStar technology. The portable database AutoStar contains more than 30,000 stellar and interstellar objects. It shows you further information about the selected celestial objects and positions your telescope reliable and accurate to the target in the sky. Leonardo da Vinci, Galileo Galilei, and Isaac Newton would be astonished.

You will have unforgettable experiences by viewing Jupiter with its cloud bands, the Saturn and its majestic rings, and many deep sky objects through the proven Schmidt-Cassegrain optic. Open up yourself and your family a unique view to the wonders of the starry night sky.

Classic Schmidt-Cassegrain Optic:

- The Meade SC optic with UHTC coating is a successful classic. You will get a compact optical system with maximum transmission at minimal cost, that will give you much pleasure for a long time. By the standard SC connection thread on the optical tube is realized that you can directly use the SC accessories of the LX90/LX200 series.
- The Meade SC optics have an enlarged main mirror, which provides a much larger unvignetted illuminated field of view than it would be possible with a normal dimensioned primary mirror. This leads to about 10% better coverage outside the optical axis relative to normal Cassegrain systems. The anti-reflection profile, which is affixed to the inside of the baffle tube, prevent reliable reflections, this considerably improves the image contrast.
- Primary and secondary mirror of Pyrex® glass.

Solid Mechanics:

- The rigid die cast aluminum mount with double ball bearing allows precise positioning and tracking of the optical system for all astronomical objects. The improved and solid mechanical design emphasizes the LT models significantly from similar models. Despite the massive construction the LT telescope is easily to transport by the in the fork arm integrated handle.
- Precision worm gears made of aluminum with a diameter of 125 mm and brass screw shafts allow, together with the high resolution encoder systems and silent servo motors in both axes, rapid traverse speed of 6.5°/sec as well as smooth targeting and tracking of celestial objects in the night sky.
- The solid and in height adjustable steel tripod provides the necessary stability for the use of your telescope in the field.

Sophisticated Electronics:

- The AutoStar #497 includes more than 30,000 celestial objects in the database and has the following features: automatic tracking speed + star speed, moon speed or user-defined speed; correction speeds in both axes 1x, 2x, 8x, 16x, 64x 128x sidereal and 1.5°/sec, 3°/sec, 6.5°/sec; fine movements by the direction buttons on both axes; GO TO positioning accuracy around 5 arc minutes; positioning accuracy in the precision mode around 3 arc minutes
- By using the #505 USB to PC connection kit for AutoStar #497 (optionally, article no.: 0745910) the AutoStar can be updated with a PC via USB or RS-232 interface and can be controlled by software.
- The AutoStar #497 is available in all common languages (English, French, German, Italian, Spanish)

LT

Included in delivery:
LT telescope optic/tube on single arm forcmount; tripod; AutoStar #497; 26mm 1.25" (31.7 mm) SP series 4000 eyepiece; eyepiece holder 1.25" (31.7 mm); 1.25" (31.7 mm) star diagonal; LED red dot finder

Batteries not included (8x C-batteries “baby” for around 20 hours operating time)

	LT-6	LT-8
Art.No:	0110131	0110132
Aperture	152mm	203mm
Focal ratio	f/10	f/10
Focal length	1524mm	2032mm
Resolution capacity	0,76 arc sec	0,56 arc sec
Optic design	Schmidt-Cassegrain	Schmidt-Cassegrain
Mount	single arm fork	single arm fork
Control	AutoStar #497	AutoStar #497

ACF Optics

Meade Advanced Coma Free Optics

A breakthrough in the performance of serial telescopes
Why Meade ACF Optics?
- Improved sharpness in the field of view -
- Higher contrast in the field of view -
- Higher limiting magnitude in the field of view -

What is Advanced Coma Free?
The Meade ACF-optical system has a great advantage when compared to conventional optics: it doesn´t have coma. Coma is a optical aberration that affects stars outside the middle of the image. The starlight is spread to form a cometlike tail. Meade Advanced Coma Free optics don´t have this aberration. You can see the difference with each look through the telescope: small round stars up to the edge of the field of view. The higher concentration of starlight also rises the contrast of the image and fainter stars get visible. If it is visual observing, or astrophotography: the Advanced Coma Free optics from Meade Instruments deliver the superior images when compared with conventional serial telescopes. Meade ACF telescopes provide a image quality that was in the past only available by Ritchey-Chretien telescopes and other exotic systems. Those telescope have prices that are much higher than the Meade ACF optics.

Tech Talk:
Why is Meade ACF optics better than conventional systems?
A telescope concentrates the starlight into a Airy disc, see below. The more light an airy disc contains, the brighter it appears. The airy disc is surrounded by diffraction rings, that are very faint in an ideal telescope. You can see the first and brightest ring in the images.
If we compare two telescopes with the same aperture, the telescope that concentrates more starlight into the airy disc will show brighter stars.
However, in conventional telescopes for amateur astronomers this ideal light concentration only happens on one point in the field of view: the middle. Outside the middle the stars get deformed because optical aberrations occur. The most disturbing of those aberrations is coma. When a optical system has coma, the starlight gets spread into a cometlike tail, see the image in the center left. This not only happens at the very edge of the field: the image shows a star that is only 5mm from the middle of the field of view. If the distance to the middle gets larger, so does coma, see the picture below left. The starlight gets spread over a large area. For comparison see the images that a Meade Advanced Coma Free telescope provides: small round stars that are losing only very little contrast on the very edge of the field.

Note: Changes and errors may have occured during the making of this pages. The star patterns were calculated on the basis of ray trace data for 8" telescopes by using the free program Abberator. Real telescope images may differ from the shown one. The copyright of the astrophoto belongs to Bernd Koch. Due to the limited dynamic range of computer monitors the images had to be processed. This happened with the same settings for all respective images.

LXD75

The sturdy german equatorial mount is accurate and precise. The RA and Dec axes move effortlessly on four high precision stainless steel ball bearings. High-Precision Worm Gears are located on both axes for smooth tracking and slewing. For even more precise pointing use the HPP function. HPP puts objects in the center of the field-of view which allows you to confirm deep sky objects at the faintest limits of the telescope's capability. The PEC functionality corrects periodic errors on the RA axis over the course of one or more training periods, thereby minimizing guiding corrections during long-exposure photography. Slew speeds can be varied from a rapid slew rate of 4.5°/sec. to 1x sidereal—it's all controlled from the AutoStar controller. The tracking rate may be sidereal, lunar, or custom selected from 2000 incremental rates. 3-Star Alignment ensures precise alignment. It eliminates the need for a complicated optical/mechanical alignment process. The LXD75 is equipped with the variable-height (68-109cm) field tripod with spreader bar brace that provides the stability and vibration damping required for visual observation and astrophotography. For quick and precise polar alignment it comes with an illuminated polar finder scope. The mount is powered by 8 D-size batteries or optional 12V car cable or AC wall adaptor.

The LXD75 is sold in combination with a variety of optics: Choose between fast Schmidt-Newtonians (SN), the 127mm achromatic refractor or the 8" Advanced Coma Free (ACF) optics and get the right telescope for your application.

The Schmidt-Newtonians are great for wide field observations and astrophotography. The Schmidt plate fully corrects for spherical aberration and provides significantly sharper images with less coma compared to a classical fast Newtonian. The image is not compromised from diffraction spikes resulting from secondary mirror spider vanes.

The ACF delivers coma free images with pinpoint stars to the edge of the field with and is clearly superior when compared with the classical Schmidt-Cassegrain telescope design.

Water white glass is used in all Schmidt-Newtonian, Schmidt-Cassegrain and ACF corrector lenses in combination with the Meade UHTC coating to maximize light transmission. Schmidt-Newtonian and Schmidt-Cassegrain corrector lenses and mirrors are individually figured to create a superior optical system which is renowned for its exquisite smoothness and performance.

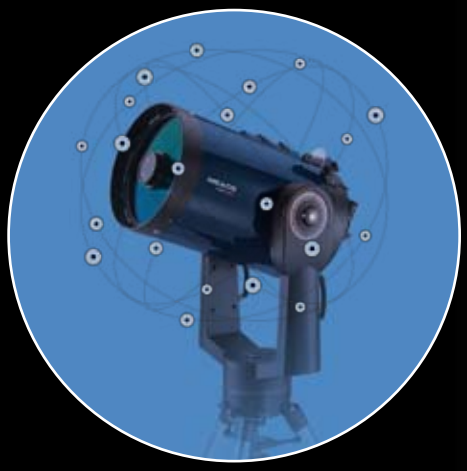
	6" N	6" SN	8" SN	5" AR	8" ACF
Art.-No.:	01-15165	01-15205	01-15215	01-15105	01-15006
Aperture	152 mm	152 mm	203 mm	127 mm	203 mm
Focal Ratio	f/5	f/5	f/4	f/9	f/10
Focal Length	762 mm	762 mm	812 mm	1143 mm	2000 mm
Limiting Visual Stellar Magnitude	13,5	13,5	14,0	12,8	14,0
Recommended Maximum Visual Power	300x	300x	400x	250x	400x
Resolving Power in arc seconds	0,74	0,74	0,56	0,9	0,56
Optical Design	Newtonian	Schmidt-Newtonian	Schmidt-Newtonian	Achromatic-Refractor	Advanced-Coma-Free

LX90ACF

	8"	10"	12"
Article No.	01-24094	01-25094	01-26094
Aperture Objective Lens	203 mm	254 mm	305 mm
Diameter Primary Mirror	209,6 mm	263,5 mm	314 mm
Focal Ratio	f/10	f/10	f/10
Focal Length	2.000 mm	2.500 mm	3.048 mm
Resolving Capacity	0,56 arc seconds	0,45 arc seconds	0,38 arc seconds
Limiting Visual Stellar Magnitude	14,0 mag	14,5 mag	15,0 mag
Secondary Mirror Ø / Obstruction %	76 mm / 37.4 %	94 mm / 37 %	102 mm / 32,4 %
Near Focus (approx.)	7,6 m	15,2 m	22 m
Optical Tube Dimensions (D x L)	231 mm x 425 mm	298 mm x 559 mm	345 mm x 635 mm
Weight Telescope + Mount	15,0 kg	22,7 kg	27,2 kg
Optical Design	Advanced-Coma-Free (ACF)		
Ultra-High Transmission Coating (UHTC)	Yes		
Primary + Secondary Mirror	Pyrex® glass		
Correcting Plate / Lens	clear water white glass		
Tube Body	aluminum		
Finder Scope	8 x 50		
Mount	fork-type, double tine		
Mount Castings	aluminum		
Slow Motion Controls	electric, RA and Dec		
#497 AutoStar	included		
Automatic Alignment with GPS	included		
GO TO Pointing Precision (approx.)	5 arc minutes		
Pointing Precision, High Precision Mode	3 arc minutes		
Celestial Objects in Database	30.223 objects		
Slew Speeds	1x; 2x; 8x; 16x; 64x; 128x; sidereal; and 1,5°/sec; 3°/sec; 6,5°/sec		
Tracking Rates	sidereal, lunar, or custom-selected from 2.000 incremental rates		
Batteries	8 x C-cells (not included)		
Battery Life (approx.)	60 hours		
Tripod Weight	8,6 kg		
Field Tripod Height	0,76 m to 1,12 m variable		

LX90ACF

For the truly discerning astronomer who will not tolerate anything but the very best, there is Meade‘s Advanced Coma-Free (ACF) optical system. ACF takes all of the features of our SC models. With it‘s technologically superior optical design, ACF gives a flatter, coma-free field of view with pinpoint images all the way to the edge of the field, rivaling Ritchey-Chrétien performance at a fraction of the cost. ACF is the perfect solution for the serious astroimager or visual astronomer looking for observatory-class optics.



Sony®GPS Receiver Sensor + AutoAlign:
Telescopes with Meade‘s new AutoAlign are smart scopes that know the night sky right out of the box. AutoAlign picks two alignment stars for you and places them right in your view-finder. Just center to fine tune your alignment and the wonders of the universe are at your fingertips. Sony®GPS Receiver Sensor automatically inputs precise time, date, and geographical location to help quickly and precisely align the telescope.

AutoStar Controller:
Meade‘s AutoStar can be updated after purchase. Click here to download software upgrades, guided tours and timely objects like comets, satellites and new discoveries - Free! Keep your AutoStar up-to-date, and your LX90 will grow with you for years to come.

Oversized Primary Mirror:
Diameters are greater than their listed aperture (e.g., the diameter of the 8" LX200-ACF is actually 8.25"). This additional 1/4" yields a wide, fully illuminated field-of-view.

AutoStar III

The Meade AutoStar III control system is very similar to the AutoStar II from the LX200.

Built-in Library with more than 100,000 objects. Enter into the AutoStar III handbox any of the celestial objects stored in the onboard database, press GO TO, and the telescope automatically slews (moves) to the object at 5°/sec., centering it precisely in the main telescope field. Additionally, the display reads out for each selected object its magnitude, size, object-type, visual quality rating, RA and Dec. Or, let the telescope take you on an automatic guided tour of TONIGHT'S BEST.

AutoStar III's database is immediately accessible on the AutoStar III display and includes an incredible array of phenomena - virtually a lifetime of deep-space study, even for the advanced observer. A partial listing includes:

Object List:

- 7.840 New General Catalog (NGC)
- 5.386 Index Catalog (IC)
- 12.940 Uppsala Galaxy Catalog
- 12.939 Morphological Catalog of Galaxies
- 28.484 General Catalog of Variable Stars
- 28.484 Other deep-space objects:
- 42.277 SAO and Hipparcos Star Catalogs
- 21.127 Draper Star Catalog (HD)
- 6.150 Yale Bright Star Catalog (BSC5)
- 1.055 Large Bright Quasars Survey (LBQS)
- 110 Messier Catalog (M)
- 109 Caldwell Catalog
- 227 Named Objects
- 400 Herschel Catalog
- 2.712 Abell Catalog of Galaxy Clusters
- 645 Arp Catalog of Irregular Galaxies
- 8 Major planets from Mercury to Neptune and minor planet Pluto
- 1.870 Lunar features
- 120 Asteroids and Comets
- 50 Earth orbiting satellites
- 88 Centroids of the constellations

Additional AutoStar III Functions: Astronomer Inside™ takes you on a guided multimedia tour of the best objects in your sky. Dozens of additional handbox functions, all easily and immediately accessible, make AutoStar III the most powerful electronic tool ever developed for the beginner and serious amateur as well. A partial listing of fewer than half of these functions includes: Fully automatic align with GPS, LNT technology and eclipse CCD-camera support, Alt/AZ-align 1 or 2 Star, EQ-align 1 or 2 Star, terrestrial; data-base with over 100,000 objects included ; GO TO capability to any input RA and Dec. coordinates; a user-defined library; event menus displaying the times and/or dates of Sunrise/Sunset, Moonrise/Moonset, Moon phases, meteor showers, minimum of Algol, equinoxes and solstices; custom-guided tours defined by the user; standard tours including Tonight's Best; 16-level display brightness adjust; 16-level display contrast adjust; red-LED utility light; battery alarm for low-battery warning.

Video feature and Sky-Map where the telescope is pointing to can be diplayed when using the optional 3.5" LCD.

LightSwitch

The most sophisticated, easiest to use telescope line anywhere.

Meade's revolutionary LS™ LightSwitch™ series of telescopes use advanced technologies like GPS, LNT™ and ECLIPS™ CCD imaging to do what no other consumer telescopes have done before: take all the hassle out of using a telescope. Simply flip the switch and the LS automatically aligns itself. Astronomer Inside™ then takes you on a guided multimedia tour of the best objects in your sky. The aluminum mount is lightweight and portable, yet has a rigid structure with precision worm-gear drives for the ultimate in tracking and pointing accuracy. All this combined with Meade's Advanced Coma-Free optical systems provide the stargazer with the most sophisticated, yet easiest to use telescope ever.

FEATURES:

LightSwitch Technology
The LS knows where it is in time and space even if you don't. Just flip the switch and be ready to explore the cosmos. Innovative technology is applied to make using the LS simple, easy and fun.

Astronomer Inside
Learn the secrets and details of the objects you observe while you are viewing them with both audio through the built-in speaker and video (if connected to a video monitor or TV). The Astronomer Inside will tell you about the planets, stars, constellations, clusters, nebulae, galaxies and more in a fun and interesting way.

Advanced Coma-Free Optics
Meade's exciting optical innovation delivers stunning performance only seen previously with systems costing thousands of dollars more. With the standard Ultra-High Transmission Coatings, the LS gives you a very sharp and bright optical system for its size.

	6"	8"
Art.-No.:	01-10129	01-10130
Aperture	152mm	203mm
Focal Ratio	f/10	f/10
Focal Length	1524mm	2032mm
GO TO Pointing Precision (approx.)	5-arc mins.	5-arc mins.
Pointing Precision, High Precision Mode	3-arc mins.	3-arc mins.
Mount	Aluminum, single arm alt-azimuth	Aluminum, single arm alt-azimuth
Optical Design	Advanced Coma-Free	Advanced Coma-Free
Telescope Weight	12.7 kg	13.6 kg
Tripod Weight	4.1 kg	4.1 kg

AutoStar II

The Meade AutoStar II control system includes the widest array of telescope capabilities ever offered in a commercial telescope:
Built-in 145.000 object library with the objects magnitude, size, object-type, visual quality rating, RA and Dec. coordinates.

Object List:

- 7.840 New General Catalog (NGC)
- 5.386 Index Catalog (IC)
- 12.940 Uppsala Galaxy Catalog
- 12.939 Morphological Catalog of Galaxies
- 28.484 General Catalog of Variable Stars
- 28.484 Other deep-space objects:
- 42.277 SAO and Hipparcos Star Catalogs
- 21.127 Draper Star Catalog (HD)
- 6.150 Yale Bright Star Catalog (BSC5)
- 1.055 Large Bright Quasars Survey (LBQS)
- 110 Messier Catalog (M)
- 109 Caldwell Catalog
- 227 Named Objects
- 400 Herschel Catalog
- 2.712 Abell Catalog of Galaxy Clusters
- 645 Arp Catalog of Irregular Galaxies
- 8 Major planets from Mercury to Neptune and minor planet Pluto
- 1.870 Lunar features
- 120 Asteroids and Comets
- 50 Earth orbiting satellites
- 88 Centroids of the constellations

Smart Drive.™ Permanent Periodic Error Correction.

Meade's SmartDrive technology allows Permanent Periodic Error Correction (PPEC) on both axes that offers an observatory standard of precision of 5 arc seconds or less. Meade's Smart Drive trains your telescope's software to automatically compensate for these tiny periodic errors in the worm/gear system. The programming is stored forever, independent of any power source.

High-Precision Pointing (HPP). Finding objects too faint to see.

The scope will first slew to a star right next to the faint object you want and ask you to center that star perfectly. After confirming the star's precise location, the scope will then slew to the faint deep sky object nearby and place it exactly in the center of your field of view. Most helpful to astrophotographers.

Smart Mount. Added accuracy for permanent installations.

Smart Mount ™ constantly refines pointing accuracy every time an object is centered and updated.

Additional AutoStar II Functions:

A partial listing of these functions includes: GO TO capability to any input RA and Dec. coordinates; a 200-object user-defined library; Sunrise/Sunset, Moonrise/Moonset, Moon phases, meteor showers, minimum of Algol, equinoxes and solstices; custom-guided tours defined by the user; standard tours including Tonight's Best; 24-hour timer with beeper; alarm function with beeper sounds at selected times; 16-level display brightness adjust; 16-level display contrast adjust; red-LED utility light; battery alarm; 7 alignment modes; sidereal, lunar, or any of 2000 custom tracking rates; factory-trained Smart Drive periodic error correction on both axes with field-training capability.

LX200ACF

The universal High End Telescope

Whoever is looking for a all-round-telescope must not miss the Meade LX200ACF. Now built in the fourth generation, the LX200 is proving once more, that it is setting the standards for the market. The unique combination of highly corrected Meade ACF-optics team up with massive fork mounts and the computer control that is very likely to be the most user friendly in the market. Compared with the legendary LX200ACF a lot of other telescope look very old. The sophisticated combination of genuine details creates a system that is unique. The optics, for example, is not only delivering a excellent field sharpness and contrast, it is also equipped with the most sophisticated coatings available to suppress unwanted reflections and light losses. To make full advantage of this, it also features a combination of versatile main mirror focusing together with a intelligent central mirror lock system and a computer controlled microfocusser.
So even the normal amateur astronomer can benefit from the full potential of this high performance optical system every night. To support this optics, the LX200ACF boosts a massive fork mount with large structures, drives and bearings to create a rigidity that other telescopes can only dream of. The bearings for example are massive, and not assembled from small, cheap parts to create a large assembly. The user interface is the tested and tried Meade AutoStar II. This computer controlled system does everything even an advanced user can dream of. What do you want to do? Visual observing? Moon, planetary or deep-sky photography? Robotic computer controlled observatory? The LX200ACF does it all. With all those astronomical possibilities everybody wonders why the prices are still down on earth. But they are, and with all the features this keeps the „legend“ LX200 more alive than ever.

LX200ACF

	8"	10"	12"	14"	16"
Art.-No.:	01-24250	01-25250	01-26250	01-27250	01-28250
Optical Design	Advanced Coma Free	Advanced Coma Free	Advanced Coma Free	Advanced Coma Free	Advanced Coma Free
Clear Aperture	203mm (8")	254mm (10")	305mm (12")	356mm(14")	406.4mm (16")
Focal Length	2000mm	2500mm	3048mm	3556mm	4064mm
Maximum Practical Visual Power	400x	500x	600x	700x	800x
Optical Coatings	UHTC	UHTC	UHTC	UHTC	UHTC
Telescope Mounting	heavy-duty fork type; double-tine: All models				
Primary Mirror Lock	included (progressive tension): All models				
Focuser	Zero Image-Shift Microfocuser included: All models				
Eyepiece	Series 5000 26mm 5-Element Plossl: All models				
Viewfinder	8 x 50mm: All models				
Diagonal	Series 5000 2" heavy duty, 99% reflectivity mirror: All models				
GPS / LNT	True-level and North sensors, 16-channel GPS receiver included: All models				
Pointing Precision	Pointing Precision, High Precision Mode - 1-arc min. All models				
GO TO	AutoStar® II Hand Controller included (147,541 object database)				
Slew Speed:	RA and Dec: 0.01x to 1.0x sidereal, variable in 0.01x increments; 2x, 8x, 16x, 64x, 128x sidereal; 1°/sec. to 8°/sec., variable in 0.1° increments				
Tracking Rates	sidereal, lunar, or custom-selected from 2000 incremental rates: All models				
Mount Castings Primary, Secondary Mirrors	Pyrex® glass	Pyrex® glass	Pyrex® glass	Pyrex® glass	Pyrex® glass
Correcting Plate / Lens	water white glass	water white glass	water white glass	water white glass	water white glass
Total Net Telescope Weight	33 kg	41 kg	57 kg	75 kg	144 kg
Telescope Shipping Weight	43 kg (approx.)	55 kg (approx.)	75 kg (approx.)	102 kg (approx.)	163 kg (approx.)
Field Tripod Height	762mm to 1117mm variable		1016mm to 1270mm variable		
Batteries	8 x C-cells (user-supplied) not 16"				none
Battery Life	20 hrs (approx.) not 16"				n/a

LX200ACF

Meade Advanced Coma Free Optical Tube Assemblies (OTA)

The optics of the LX200ACF series, now also available separately! Combine the famous Meade ACF optics with mounts of your choice! The Advantages of the Meade ACF Optical Tube assembly:

1) Highly corrected optics: Observe pinpoint stars from edge to edge! Get a brilliant and aesthetic star field while imaging or observing. Reach a higher limiting magnitude at the edge of the field and experience better results using big imaging sensors or ultra wide angle eyepieces.

2) Oversized primary: Less vignetting than in standard catadioptric Cassegrains! Get a wider, fully illuminated field of view than with standard-sized primary mirrors.

3) Fully UHTC coated optics: Enjoy high contrast and minimize reflections! The UHTC coating enhances overall transmission of the optical system and therefore fainter objects are within reach. Don't miss any of the precious photons that traveled millions of light years due to limitations of your optical system!

4) Optical system not focus point critical: Get stunning performance with your binoviewer as well as with short eyepiece/adaptor combinations! The LX200ACF optics is highly versatile and can be used with a wide variety of optical accessories.

5) Minimum glass/air surfaces: The Meade ACF has the smallest number of glass/air surfaces of any highly corrected catadioptric cassegrain systems, and therefore the smallest number of reflections! No additional corrector lens elements are used to achieve the high level of correction. There is no need to worry about correct distances of imaging sensors or accessories.

6) Freedom of choice: Add a field flattener (only necessary for astrophotography with small apertures and big imaging sensors) or simply attach your camera directly to the OTA via the big 3,3" thread for better field illumination (3,3" thread only on 10" to 14" models. 16" model with 4" thread)

	8"	10"	12"	14"	16"
Art.-No.:	01-12020	01-12025	01-12030	01-12035	01-12040
Optical Design	Advanced Coma Free	Advanced Coma Free	Advanced Coma Free	Advanced Coma Free	Advanced Coma Free
Clear Aperture	203mm (8")	254mm (10")	305mm (12")	356mm(14")	406.4mm (16")
Focal Length	2000mm	2500mm	3048mm	3556mm	4064mm
Maximum Practical Visual Power	400x	500x	600x	700x	800x
Optical Coatings	UHTC	UHTC	UHTC	UHTC	UHTC
Mount Castings Primary, Secondary Mirrors	Pyrex® glass	Pyrex® glass	Pyrex® glass	Pyrex® glass	Pyrex® glass
Correcting Plate / Lens	water white glass	water white glass	water white glass	water white glass	water white glass
Total Net Telescope Weight	8 kg	13 kg	17 kg	23 kg	35 kg
Telescope Shipping Weight	9 kg (approx.)	19 kg (approx.)	21 kg (approx.)	33 kg (approx.)	53 kg (approx.)
Primary Mirror Lock	included (progressive tension): All models				

MAX MOUNT

20" LX400 ACF MaxMount

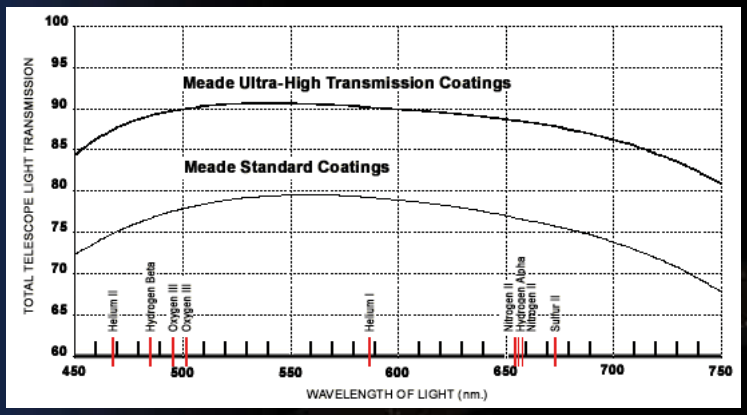
Integrated research-grade observatory system featuring highly corrected optical system

A telescope system for professional research has to be much more than just a collection of parts that happen to be bigger than an average amateur telescope. The high performance of the 20” LX400 on MaxMount is a result of high-precision components working together like a fine-tuned clockwork. The powerful 20”f/8 ACF Optical System delivers a crisp high-contrast image up to the very edge of the field of view. Before Meade introduced the ACF such a large field with such a high resolution was the realm of exotic optical systems that always came with a big price tag. The complex surfaces of those optical systems made them so expensive, that only very few amateurs or smaller educational facilities could afford them. High resolution over a large field was basically only in the reach of big universities and governmental research facilities.

This changed fundamentally a few years ago, when the engineers at Meade Instruments brought the Meade ACF (Advanced Coma Free) to the market: A high performance optical system that meets even the most advanced demands regarding image sharpness and contrast in the field of view, but without the traditional pricing of the premier optical systems. When observed through a telescope that is equipped with a Meade ACF optics, the stars in the field of view are tack-sharp with high contrast and free from visible aberrations, like the comatic tails that are evident in Schmidt-Cassegrain or fast Newtonian telescopes. Since the secondary mirror is attached to the corrector plate, there are also no disturbing diffraction patterns around the stars, like in telescopes that are using spider vanes to support the secondary. The unique front focusing mechanism works with a precision of 0,01mm and enables the observer to hit the focus point with high precision while maintaining high rigidity. The tube and the focusing mechanism mainly consist of high-tech carbon fibre. This made two important features possible: The high specific e-modulus of the material results in a lightweight structure and we could achieve a high level of thermal invariance for the focus. The large thread at the end of the optical tube assembly easily takes care of even heavy equipment. When reviewing Meade‘s LX400-ACF Advanced Coma Free, Sky and Telescope magazine said, „The difference between the off-axis images (compared to a Schmidt-Cassegrain) was dramatic to say the least.“

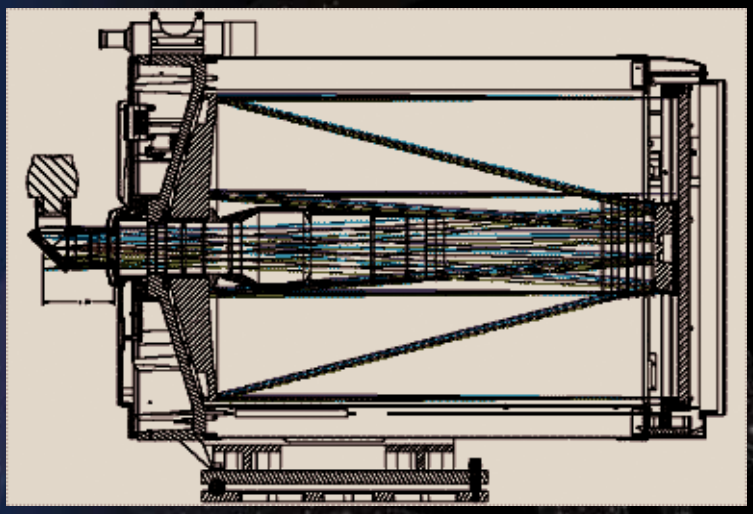
OPTICAL COATINGS

All Meade LX400T Advanced Coma-Free optical systems utilize Meade‘s proprietary Ultra-High Transmission Coatings (UHTCT). UHTCT increases total light transmission and image brightness by nearly 20% over Meade‘s standard coatings. Objects such as stars, galaxies and nebulae will appear significantly brighter.



APERTURE

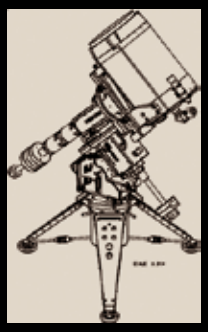
Meade has offered the 16“ for years as an SCT on a fork mount. It has been the scope of choice for serious amateurs, colleges and teaching universities. Now you can have an Advanced Coma-Free optical system not only at 16“ but at a full half-meter of aperture, delivering rougly 56% more light than a 16”. This brings the MAX into the domain of serious research. The performance of the 20” ACF on MaxMount makes it ideal workhorse for professional research. In robotic survey programs .the large number of objects make a simultaneous use of many telescope systems a necessity, thus making it impossible to use one of the few giant telescopes available.

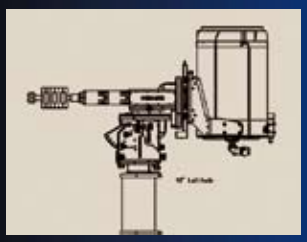


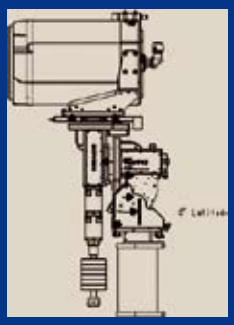
MaxMount: Capacitiy, Versatilty and Precision High Capacity

A extraordinary optics can only be put to advantage on a very high performance mount. The newly developed Meade MaxMount is the ideal partner for this optical system: a total mount capacity beyond 100kg (instrument weight only, excluding counterweights) offers a lot of reserve for additional heavy equipment like guiding telescopes, large field imagers, spectrographic devices and heavy cooling and imaging equipment.

MAX MOUNT







LATITUDE 0 – 90 DEGREES
This mount can be used anywhere on Earth, from Pole to Pole. To our knowledge no other maker of heavy duty mounts can make this claim.

INTERNAL CABLING
The MAX has all the controls you need for your OTA and modern cameras up on the saddle plate. This makes a cable free installation of most instrument packages.

LARGE DIAMETER PRECISION GEARS

The telescope drive systems play a vital role in the overall performance of a telescopes system. To live up to the professional approach Meade engineers decided that only the very best would do, and designed the MaxMount with carefully made precision worm gear/wheel combinations with large diameters in both axis. For a given machining process the diameter of a gear directly corresponds with the smoothness of the drive and the rigidity of the rotation system. Only large diameter drives keep the level of mechanical errors low while maintaining high resistance to asymmetrical forces, such as wind gusts. For the MaxMount the combination of all these qualities result in a telescopes drive that keeps the residual gear aberrations below the average seeing level for many purposes, thus avoiding the necessity of active guiding.

EXPANDED AUTOSTAR SUITE WITH NETWORK AND WEB CONTROL
MAX is delivered with Autostar Suite Version 4. It is a complete turn-key observatory control system, not an added cost extra. The package includes extensions that allow the scope to be remotely controlled from any web browser without software installation on the remote PC, MAC, PDA or even a cell phone. This kind of convenience makes it ideal for teaching environments where lab workstations can operate the scope from any classroom without extensive software setup.

Eyepieces

Meade Illuminated Reticle, Measuring, and Centering Eyepiece Systems

Wireless and corded models, each with advanced features, to suit any observing requirement. These special-purpose eyepieces include reticles with etched crossline patterns, internally red-illuminated so that the lines are clearly visible against a dark sky. The upper (lens) section of the eyepiece rotates on a fine thread for precise diopter adjustment to the users eye. Corded models with 1.8 m cable and connector for direct plug-in to the control panels of LX200/400 telescopes.

					
Art.-No.:	05-11210	05-11211	05-11220	05-11221	05-11300
Function	Centering / Reticle	Centering / Reticle	Centering / Reticle	Centering / Reticle	Centering / Reticle
Illumination	Wireless / Battery	Corded / LX200/400	Wireless / Battery	Corded / LX200/400	Wireless / Battery
Focal Length	9mm	9mm	25mm	25mm	25mm
Eyepieces System	SP	SP	MA	MA	MA
Reticle	Adjustable	Adjustable	Fix	Fix	-

Meade 8mm - 24mm Zoom Eyepiece of the Series 4000

This 7-element system provides an apparent field of 40° at the 24mm setting, increasing continuously to a 55° field at 8mm. The internal zoom optics move on smooth, precisely machined surfaces which maintain optical collimation at all zoom settings. A scale graduated in 1mm units indicates the zoom focal length in operation. All lenses are multicoated for maximum light transmission and image contrast, while minimizing internal reflections. Art.Nr.: 02-20390

QX Wide Angle Eyepieces 4000

Meades Series 4000 QX Wide Angle of 5 element eyepieces designed and engineered for high-performance observing. They yield a super wide 70 degree apparent field of view with extreme resolution. This are up-to-date eyepieces that can give you a wide field of view with a consistent pinpoint edge-of-field sharpness and long eye relief. All QX Wide Angle Eyepieces feature multi-layered optical coatings to maximize light transmission, and edge-blackened optics for superior image contrast. The Meade Series 4000 QX Wide Angle eyepieces are well-priced, providing excellent performance.

	QX15	QX20	QX26	QX30	QX36
Art.-No.:	02-18015	02-18020	02-18026	02-18030	02-18036
Focal Length	15mm	20mm	26mm	30mm	36mm
Barrel Size	31,7mm (1¼")	31,7mm (1¼")	50,8mm (2")	50,8mm (2")	50,8mm (2")
Optical Elements	5	5	5	5	5
apparent field	70°	70°	70°	70°	70°
Weight	90g	119g	338g	385g	535g

Eyepieces

High-End Plössl Eyepieces Series 5000

The Series 5000 Plössl eyepieces represent a milestone in design and engineering. The five and six element designs feature tack sharp optical performance which delivers a 40% improvement in corrections for chromatic aberration and edge-distortions over traditional Plössl. They yield the widest possible fields-of-view, consistent with pinpoint edge-of-field sharpness and contrast. Compare their unparalleled 60° apparent field-of-view to any Plössl on the market today. Take a look through the Meade Series 5000 Plössls and rediscover your favorite celestial objects.

	P5,5	P9	P14	P20	P26	P32	P40
Art.-No.:	02-18105	02-18109	02-18114	02-18120	02-18126	02-18132	02-18140
Focal Length	5,5mm	9mm	14mm	20mm	26mm	32mm	40mm
Barrel Size	31,7mm (1¼")	31,7mm (1¼")	31,7mm (1¼")	31,7mm (1¼")	31,7mm (1¼")	50,8mm (2")	50,8mm (2")
Optical Elements	6	5	5	5	5	5	5
apparent field	60°	60°	60°	60°	60°	60°	60°
Weight	74g	71g	92g	138g	232g	424g	720g

Super Wide Angle Eyepieces Series 5000

The Series 5000 Super Wide Angle eyepieces boast a 68° apparent field-of-view and image resolution that is razor sharp from edge-to-edge. Because of its innovative six element design the objects you observe will be rich in detail and contrast with virtually no chromatic aberration. These eyepieces are made of the finest materials available, and are a perfect optical match for Schmidt-Cassegrains, apochromatic refractors or ACF optics. First light with the Series 5000 Super Wide Angle eyepieces will be an event you always remember.

	SWA16	SWA20	SWA25	SWA28	SWA34	SWA40
Art.-No.:	02-18216	02-18220	02-18225	02-18228	02-18234	02-18240
Focal Length	16mm	20mm	25mm	28mm	34mm	40mm
Barrel Size	31,7mm (1¼")	31,7mm (1¼")	50,8mm (2")	50,8mm (2")	50,8mm (2")	50,8mm (2")
Optical Elements	6	6	6	6	6	6
apparent field	68°	68°	68°	68°	68°	68°
Weight	151g	256g	370g	515g	1050g	1236g

Ultra Wide Angle Eyepieces

The six and seven element Series 5000 Ultra Wide Angle eyepieces deliver extremely high resolution, contrast and full-field sharpness over an astounding 82° apparent field-of-view. Only the highest quality materials were selected to create these extraordinary eyepieces including several different types of exotic glass in order to achieve the highest level of optical performance. The ideal partner for Meade ACF optics.

	UWA4,7	UWA6,7	UWA8,8	UWA14	UWA18	UWA24	UWA30
Art.-No.:	02-18304	02-18306	02-18308	02-18314	02-18318	02-18324	02-18330
Focal Length	4,7mm	6,7mm	8,8mm	14mm	18mm	24mm	30mm
Barrel Size	31,7mm (1¼")	31,7mm (1¼")	31,7mm (1¼")	31,7mm (1¼")	31,7mm (1¼")	50,8mm (2")	50,8mm (2")
Optical Elements	7	7	7	7	6	6	6
apparent field	82°	82°	82°	82°	82°	82°	82°
Weight	220g	290g	280g	305g	405g	870g	1410g

Mounting Accessories

The series 5000 dove tail plate system combines dove tail plates and optical tube adaptors for all SC and ACF telescopes and optical tube assemblies from Meade. So Meade ACF optics can easily be attached to various mounts. If mounted atop a tube, the dove tail system enables the user to mount balancing weights and guidescopes as well as finder. To get a maximum of rigidity for a minimum of weight the dove tail plates are pocket milled.

Dove Tail Plates

The dove tail plates can be attached to the various optical tube sizes (8", 10"; 12"; 14"; 16") easily and fast with the supplied mounting tube adaptors. The mounting tube adaptors have the same curvature as the optical tube they are designed to match.

Ring Set

We offer ring sets in the following diameters: 90mm; 108mm; 125mm and 160mm, so that you can attach a wide spectrum of accessories (like guidescopes or telephoto-lenses) onto your Meade telescope. White plastic inlays in the tips of the fastening screws prevent surface damage to your optics.

Weight System

Optional weight systems enable you to balance your tube to avoid damage or instability during the use of additional mounted accessories. Just add a second dove tail plate to the bottom of your OTA and use the available counter weight system to balance the telescope. The basic counterweight system contains a dove tail plate adaptor and two 1,5kg counterweights.

LXD 75 AT Art.Nr.: 0440205

German equatorial mount with AutoStar Computer controller
The mount of the LXD75 series is also available separately! Equipped with a solid steel-tube field tripod and motor drives in both axes, it builds the solid base for visual and photographic purposes for many different optics. With the AutoStar #497 GO TO-system, over 30.000 celestial objects are in your hand after a simple two-star-alignment. The dovetail system accepts most common telescopes. The illuminated polar viewfinder (standard equipment) makes polar alignment easy - the mount is ready for long-term astrophotography.

Saddle plate for LXD75 mount Art.Nr.: 0427475

Allows the attachment of individual telescopes to the LXD75‘s dovetail port.

Counterweight 4.5 kg for LXD75 Art.Nr.: 0450675

Additional counterweight to balance heavy accessories.

DS-2000 Mount Art.Nr.: 0440210

Lightweight single arm fork mount for small astronomical telescopes and spotting scopes. Includes aluminum field tripod, universal mounting plate, servo motors in both axes and AutoStar #494 GO TO control.

Accessories

Adapter plate LX90 for Ultra wedge Art.Nr.: 0450208

With this adapter plate, the LX90 can be mounted on the more rigid Ultra wedge.

Equatorial wedge for 203mm (8") LX90 Art.Nr.: 0450194

With this polar wedge, the LX90 can be mounted in equatorial mode. This makes the telescope ready to perform long-term astrophotography. This wedge is especially designed for the 203mm (8") LX90 series. If you own a 254cm (10") or 305mm (12") LX90, we recommend the Ultra wedge together with the adapter plate Art.-No. 0450208.

DeLuxe Equatorial wedge Art.Nr.: 0450190

This polar wedge allows to operate the 203mm (8") LX200 models in equatorial mode. Equatorial mounted, it is possible to perform long-term astrophotography. For the current LX200ACF series, we recommend the more rigid Ultrawedge

Ultra wedge Art.Nr.: 0450210

Polar wedge for the LX200 and LX400 series from 203mm (8") to 355mm (14").With the equatorial wedge, the telescopes above can be mounted equatorial. This allows long-term astrophotography without field rotation.

Meade Azimuth pier Art.Nr.: 0450310

To mount the 406mm (16") LX200 / LX400 permanently in azimuthally mode. The height of the pier is 90cm.

Meade equatorial pier Art.Nr.: 0450320

To mount the 406mm (16") LX200 / LX400 permanently in equatorial mode. Please specify the exact latitude of the observatory with your order!

Field Tripod #884 Art.Nr.: 0440051

#884 Deluxe Field Tripod for ETX-90EC, ETX-105EC und ETX-125EC (Accessory for older ETX models; standard equipment for actual ETX AT and PE telescopes)

Power Supply for 230V / 12V, 3A Art.Nr.: 4930000

Versatile wall adapter for all Meade telescopes with 12V.

Power supply for 230V / 12V, 1.5A Art.Nr.: 0455121

With this adaptor, you can operate smaller Meade telescope using a 230V~ wall connector.

Car battery adapter cable 12V Art.Nr.: 4930100

Allows the operation of telescopes with 12V power via the car cigarette lighter socket

Cable extension with rectangular plug Art.Nr.: 0455105

Fits nearly all Meade telescopes. Lenght about 2m.

Accessories

Colour filter set for ETX-70 Art.Nr.: 0311460

This color filter set contains 4 different color filters. Color filters can be used to enhance contrast while observing details in astonomical objects, especially the Planets.

Colour filter set Art.Nr.: 0311451 0311452 0311453

This color filter set contains 4 different color filters. Color filters can be used to enhance contrast while observing details in astonomical objects, especially the Planets.

Moon/Greyfilter for 31.7mm (1,25") Eyepieces Art.Nr.: 0311430

This filter reduces the brightness of the image without disturbing natural color impressions. It is mostly used for lunar observing. Never use this filter for solar observing!

Variable Polarizing Filter #905 Art.Nr.: 0311480

Meade Series 4000™ Photo-Visual Color Filters For increased contrast and resolution of the Moon and planets in visual or photographic applications. The transmission is variable between 5% and 25%. Because of the reduced focuser travel, this accessory cannot be used at newtonian systems.

Meade f/6.3 Focal Reducer/Field Flattener Art.Nr.: 0510300

For CCD and photographic applications.
The Meade 4-element, multi-coated f/6.3 Focal Reducer threads on to the rear cell of any Meade LX-Series telescope (followed by the T-Adapter) and reduces the telescopes focal ratio by a factor of 0.63: e.g., f/10 telescopes are converted to f/6.3. Suitable from small to average CCD sizes.

Meade Eyepiece Holder Art.Nr.: 0410100

Makes the connection of 31.7mm (1.25") - accessories to 203mm (8") - 508 mm (20") SC/ACF possible.

Diagonal prism #918A Art.Nr.: 0330100

Diagonal prisms allow for a comfortable viewing position for refractor telescopes. An upright but reversed left to right image is produced. 31.7mm (1,25") on both ends.

Amici-Prism 31.7mm(1.25") Art.Nr.: 0330210

This Amici prism gives an upright image for terrestrial observations and a comfortable 45° angle. It accepts 31.7mm(1.25") eyepieces. Not suitable for newtonian telescopes!

Amici prism for ETX 90-125 Art.Nr.: 0330240

With this amici prism, your ETX gives upright images for terrestrial observation. It accepts 31.7mm (1.25") eyepieces and is threaded to the ETX rear cell adapter.

50.8mm (2") Diagonal S/5000 Art.Nr.: 0340160

professional 50.8mm (2") diagonal mirror with 99% reflectivity and 1,25" adaptor.

Adapter SC-thread to 50.8mm (2") Art.Nr.: 0340300

With this adapter, you can directly attach 50.8mm (2") photovisual accessories to the back cell thread of the SC/ACF telescopes.

Adapter 31.7mm (1.25") to SC-Thread Art.Nr.: 0510450

Makes the connection of telescopes with 31.7mm (1.25") interface to Meade Flip Mirror systems.

Accessories

ETX90-125 back cell adapter Art.Nr.: 0410460

Allows to attach SC accessories to the ETX Maksutov telescopes
The Back Cell Adapter allows accessories that require a SCT thread to be attached to the ETX series of telescopes. You can attach a focal reducer to the ETX and use it as a High quality Astro-photographic instrument. Attach flipmirrors or any other accessory that would require a SCT thread.

Dew Shield for ETX 125 Art.Nr.: 0455420

inhibits the formation of dew shield threads into the front lens cell and effectively inhibits the formation of dew on the lens surface.

Dew Shield for SC/ACF Art.Nr.: 0455310, 0455320, 0455330, 0455335, 0455340

Inhibits the formation of dew!

In moist climates water particles suspended in the atmosphere may condense on the front surface of the telescopes correcting plate. This dew formation may be inhibited to a significant extent by the addition of a Dew Shield, essentially an extension tube attaching to the front-cell of the telescope. Not suitable for LT and LS telescopes.

USB Adaptor Art.Nr.: 0745830

With this adapter, you may remotely control every AutoStar telescope using your USB port when you already have the serial RS 232 connector cable.

USB 2.0 cable 4.5 m Art.Nr.: 0745832

With this cable, you may operate your DSI at greater distances.

#505 USB-PC connector cable for AutoStar 497 Art.Nr.: 0745910

With this interface cable, you may operate an AutoStar 497-controlled telescope via your Notebook or desktop PC with all its functions. It enables mouseclick-GO TO-operation! Also it is possible to update your AutoStar hand computer. RS-232 connection and USB-adaptor included.

#506 USB-PC connector cable for AutoStar 494 Art.Nr.: 0746000

With this interface cable, you may operate an AutoStar 497-controlled telescope via your Notebook or desktop PC. RS-232 connection and USB-adaptor included.

#507 USB-PC connector cable for AutoStar II Art.Nr.: 4951200

With this interface cable, you may operate an LX200/400 telescope via your Notebook or desktop PC with all its functions. It enables mouseclick-GO TO-operation! Also it is possible to update your AutoStar hand computer. RS-232 connection and USB-adaptor included.

Laser-Collimator 31.7mm (1.25") Art.Nr.: 0610200

Use the Meade Laser Collimator to quickly and accurately align your telescope optics. Meade‘s Laser Collimator simplifies the collimation process. Collimation is a method to align your telescope‘s optics. Telescope optics are normally aligned at the factory, but shipping and handling can sometimes misalign collimation. Misaligned collimation can mean dimmer and blurrier images in your telescope eyepiece. Meade‘s Laser Collimator provides a quick, simple, and accurate method of collimation. For use with Meade Light-Bridge Truss Tube Dobsonian Telescopes, and any Newtonian reflecting telescope.

Accessories

#544 Viewfinder, 8 x 50mm, blue tube, with bracket Art.Nr.: 0620140

This high quality finder scope makes finding objects easy.

Alloy travel case for ETX125 Art.Nr.: 0690143

Suitable for ETX125
This rigid case is equipped with durable locks and fitting foam parts. Your ETX and its accessories (eyepieces, AutoStar handbox etc.) fit perfectly here. With this case, your astronomy equipment is always ready-to-go and ideal protected on journeys!

Backpack ETX-90/105/125 Art.Nr.: 4974000

Carrying an ETX has never been that easy! The quality backpack is the ideal partner to the telescope! Accepts all ETX sizes and a variety of accessories.0

Straylight cover for LightBridge telescopes

Art.Nr.: 0690420, 0690425, 0690430, 0690440

This cover protects your LightBridge against contrast-reducing straylight.

#1209 Zero Image-Shift Focuser Art.Nr.: 0625600

This high quality focusser plugs directly into any AutoStar II/III telescope. The focuser is attached to the telescope via the SC-thread. Ideal to avoid focus drifts for demanding planetary and photographic work. External operation box for other telescopes available at request.

Electronic Eyepiece Art.Nr.: 0735100

This little TV camera fits into a 31.7mm (1.25") eyepiece-holder. When connected to a TV-set the camera shows live-pictures of the object in the telescope. Suitable for bright objects. Yields high magnification.

Run set of weights for 8" – 16" LX90/200

Art.Nr.: 0450510, 0450520, 0450530, 0450540

The adjustable set of weights makes balancing of a Schmidt Cassegrain or ACF telescope possible when using heavy accessories like a camera.

Photo Accessories

Piggyback Bracket Art.Nr.: 0450410, 0450420, 0450430, 0450435, 0450440

Piggyback photography is one of the most popular, and easiest, ways to get started in astrophotography. Simply by attaching your 35mm camera, with its own 35mm-to-250mm lens, atop any Meade LX90, LX200 or the 203mm (8") SC/ACF LXD-75 in the equatorial mode, and guiding the camera through the main telescope, wide-field photos of the Milky Way of remarkable detail and resolution can be taken.

Variable-Projection Camera Adapter 31.7mm (1.25") for SLR/ DSLR Art.Nr.: 0410130

The Variable-Projection Camera Adapter 31.7mm (1.25") combines an adaptor for direct photography with the possibility of enhancing magnification by using a eyepiece in the optical train (Projection photography). Requires appropriate T-2 ring.

Basic Camera Adapters 31.7mm (1.25") Art.Nr.: 0410145

his adaptor works similar to the 0410130 variable projection camera adaptor, but without the possibility to vary the distance to the camera.

T-Adapter #62 Art.Nr.: 0410150

The T-Adapter is the basic means of prime-focus photography through all Meade LX-Series models. Thread the T-Adapter on to the rear cell of the telescope, followed by a T-Mount for your 35mm camera, and the camera body is thereby rigidly coupled to the telescope.

T-Adapter for ETX60/70/80 Art.Nr.: 0410155

The T-Adapter is the basic means of prime-focus photography for Meade ETX 60/70/80. Thread the T-Adapter on to the rear cell of the telescope, followed by a T-Mount for your 35mm camera, and the camera body is thereby rigidly coupled to the telescope.

Meade Flip-Mirror System Art.Nr.: 0510400

The Meade flip-mirror system permits a dramatic reduction in imager-setup time. The basic function of the Flip-Mirror System is to allow the CCD imager or astrophotographer to inspect, center, compose, and focus the telescopic image immediately prior to the (CCD or photographic) image being taken. Flip the adjustable mirror down to center the image while viewing with an eyepiece at 90°; flip the mirror up to pass light on to the CCD chip or DSLR camera.

Adapter 31.7mm (1.25") to SC-Thread Art.Nr.: 0510450

Makes the connection of telescopes with 31.7mm (1.25") interface to Meade Flip Mirror systems.

T-Adapter #64 for ETX Art.Nr.: 4914000

The T-Adapter is the basic means of prime-focus photography for Meade ETX 90/125. Thread the T-Adapter on to the rear cell of the telescope, followed by a T-Mount for your SLR camera, and the camera body is thereby rigidly coupled to the telescope.

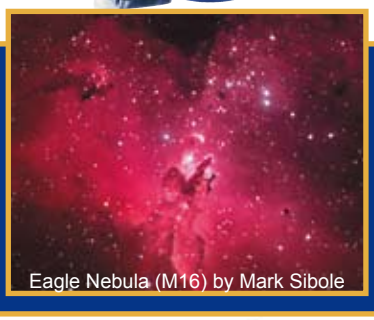
Digital camera adaptor Art.Nr.: 4914900

This adaptor attaches a compact digital camera to a 1,25" telescope eyepiece. So astrophotography (mostly moon and planetary) becomes possible with small digital cameras. The holder is adjustable in both directions by micrometric screws.

T-Mount Art.Nr.: 49xxxxx

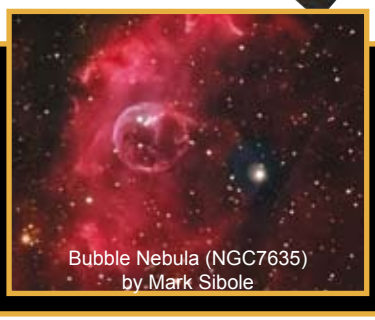
A T2-ring is an adapter between a SLR-camera and a photo adapter. T2-rings are available for several cameras. If you want to know which T2-ring you need, please read your camera manual.

Deep Sky Imager


Eagle Nebula (M16) by Mark Sibole

DSI II

The Meade DSI-CCD-cameras are setting the standard for user-friendly astrophotography. The DSI-II combines ease-of-use with great sensitivity, good resolution, and low thermal noise. Meade engineers have invented a remarkable way to reduce noise without a cooler. This means you can take exposures for hours at a time. And the new thermal monitoring sensors automatically match your dark frames to ambient temperature so it's nearly impossible to take an uncalibrated picture.. The DSI-II is available in a color and black/white (DSI-II Pro) version.


Bubble Nebula (NGC7635) by Mark Sibole

Meade DSI-III

The user-friendly astrophotography revolution continues with the introduction of the new DSI III. It combines ease-of-use with a 1.4 megapixel chip, higher resolution, wider field of view and lower thermal noise. Meade engineers have invented a remarkable new way to reduce noise without a cooling fan. This means you can stack exposures for hours at a time. The thermal monitoring sensors automatically match your dark frames to ambient temperature so it's nearly impossible to take an uncalibrated picture. The software includes a zoom feature for easier focusing and the square pixels of the new larger chip make processing simpler and images more beautiful than ever. With extremely low noise, the DSI III is one of the best un-cooled astro imagers. The DSI-III is available in a color and black/white (DSI-III Pro) version.


M42 by Mark Sibole


Andromeda Galaxy by Chuck Reese

	DSI II	DSI II Pro	DSI III	DSI III Pro
Art.-N°.:	0730040	0730050	0730060	0730070
Dynamique	16Bit / Couleur (RGGB)	16Bit / Luminosité	16Bit / Couleur (RGGB)	16Bit / Luminosité
Résolution	752 x 582	752 x 582	1360 x 1024	1360 x 1024
Dimension de la puce	5.59mm (l) x 4.68mm (h)	5.59mm (l) x 4.68mm (h)	10.2mm (l) x 8.3mm (h)	10.2mm (l) x 8.3mm (h)
Type de puce	SONY™ EXview HAD™ ICX429AKL	SONY™ EXview HAD™ ICX429ALL	SONY™ EXview HAD™ ICX285AQ	SONY™ EXview HAD™ ICX285AL

RGB color filter set Art.Nr.: 03-11470

designed for the DSI PRO cameras, these 31.7mm (1.25") filters are also suitable for nearly every monochrome CCD camera. Bring vibrant color to your Deep Sky Imager Pro images with the Meade CCD Color Filter Set. This high quality Dichroic CCD color filter set comes with Red, Green, and Blue interference filters plus an IR blocking filter. Their parfocal design means you will not need to re-focus when switching between filters. Standard accessory for the Meade DSI II/III Pro with Filterset 0730055 / 0730075.

Fan for DSI-II to reduce the CCD temperature Art.Nr.: 07-30090

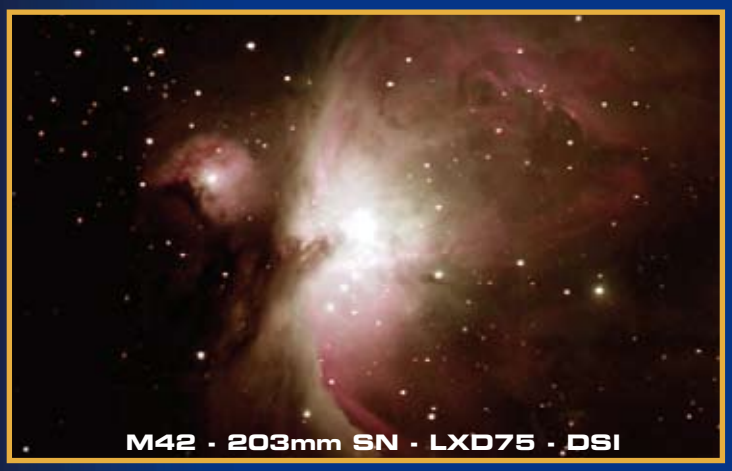
With this easy to apply fan, the DSI's chip temperature can be reduced about 5°C. This results in a further reduced thermal noise. Art.Nr.: 07-30090

Images

M1 - 254mm - LX200 - DSI

M13 - 203mm - LX90 - DSI

M27 - 152mm SN - LXD75 - DSI



M42 - 203mm SN - LXD75 - DSI

M51 - 254mm - LX200 - DSI

M63 - 254mm - LX200 - DSIII

Moon - 203mm - LX90 - DSI

NGC4565 - 254mm - LX200 - DSIII

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MEADE Instruments Europe GmbH & Co. KG
Gutenbergstraße 2 • 46414 Rhede • E-Mail: info.apd@meade.de
Tel.: (0 28 72) 80 74 - 300 • FAX: (0 28 72) 80 74 - 333

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www.meade.de