

TAMRON

SP SERIES **LD** LENSES

(Low Dispersion)

SP80~200mmF/2.8LD
SP180mmF/2.5LD(IF)
SP300mmF/2.8LD(IF)
SP400mmF/4LD(IF)



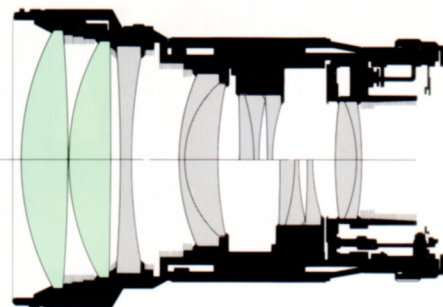
LD lenses are high-performance telephoto-lenses for which special low-dispersion glass is used.

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Tamron Lenses-High Performance-High Quality

Taking really great pictures has never been easier. The new breed of cameras offers fast, accurate almost effortless photography. But no camera, no matter how sophisticated can take superior pictures without a superior lens attached.

Tamron has developed a series of lenses that meet the most exacting standards of serious photographers. The lenses deliver such outstanding performance they are designated the SP (Super Performance) series.

The SP lenses are designed with special features and materials that produce sharp, crisp, true color images. These are the culmination of Tamron's expertise in the design and manufacture of high quality lenses.

LD (Low Dispersion) Glass Elements Make Lenses Special

The LD (Low Dispersion) telephoto lenses are unique in Tamron's series of professional grade SP lenses. The LD glass elements used in the lenses fully compensate for color aberrations which are apt to occur in a large-aperture telephoto lens. All four Tamron LD lenses incorporate Low Dispersion glass in the front element group to optimize optical performance. They can capture a sharp, clean image even at a greater distance. Each lens is engraved with a green line which is the symbol of the highest performance and quality.

Special Low-Dispersion Glass Elements Minimize Chromatic Aberration

Whether photographing sports, racing events, wildlife or nature, Tamron's LD telephoto lenses can produce dramatic images.

Low-Dispersion glass enables chromatic aberrations to be reduced to a bare minimum which results in clear crisp images with virtually true color reproduction. In conventional telephoto lenses, the longer the focal length and the faster the aperture, the more likely chromatic aberrations will occur, causing deterioration of image quality.

As light enters the lens, the focusing point is scattered, depending on the light's wavelength (color). Ordinary lenses compensate for this by using a combination of concave or convex elements with regular optical glass materials, however, residual chromatic aberrations will remain.

Low-Dispersion glass not only compensates for chromatic aberrations but also helps provide a clean view finder image to facilitate more accurate and faster focusing. A fast moving image in sports or nature can be quickly brought into sharp focus at even the maximum telephoto range.



SP400mm F/4LD (IF) f=400m F/4 AE



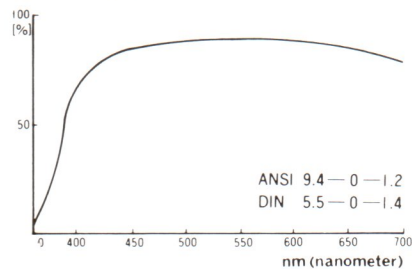
SP300mm F/2.8LD (IF) f=300mm F/4 AE

SP180mm F/2.5LD (IF) f=180mm F/2.5 AE

TAMRON'S LD LENSES DELIVER SUPERIOR PERFORMANCE

Achieving Superior Color Balance for Natural Color Reproduction

The key to obtaining natural color reproduction is to achieve superior color balance. One of the critical approaches is to cut off ultraviolet transmission. This chart below shows the color rendition of the SP 180mm F/2.5 (IF) indicating excellent natural color reproduction performance. You can see the flat characteristics in the range over 370nm representing even all around color balance.



SP300mm F/2.8LD (IF) f=300mm F/8 1/125 sec.



SP80-200mm F/2.8LD f=200mm F/8 AE

Fast Tele-Zoom Lens Produces Sharp, Crisp Images.



SP80-200mm F/2.8LD

Model 30A

This superior handling telephoto zoom lens offers excellent portability. It is ideal for photojournalism, sports, nature or stage photography. The lens design features LD glass in the front element and eight additional high quality glass elements which provide sharp images comparable to those produced by single focal length lenses. The fast F/2.8 aperture allows higher shutter speeds for great stop-action photography. This lens is made to deliver outstanding performance under the most demanding photographic conditions.

Fast-Aperture Telephoto Lens For Images of The Highest Quality.



SP180mm F/2.5LD (IF)

Model 63B

This LD lens features an Internal Focusing system which makes the lens smaller and easier to handle with outstanding balance. LD glass is used in the two front elements producing the highest optical performance. The minimum focusing distance is 4 feet, the shortest of all lenses in this class. The F/2.5 aperture is also 25% faster than other F/2.8 lenses.

This lens is ideal for portrait photography particularly when a blurred background effect is desired. It also delivers excellent performance in stage photography with low light conditions.

Higher-Performance Professional-Grade Lenses.

SP300mm F/2.8LD (IF)

Model 60B



These lenses are designed to meet the critical standards of the most demanding professional photographers. A revolutionary design and LD glass in the lenses's two front elements mean color and spherical aberrations, image distortions and other aberrations are thoroughly compensated for. These lenses produce sharp, clear images even at full aperture making them particularly useful for shooting fast moving subjects, freezing the action with ultra-high shutter speeds available on today's cameras.

Both lenses have a Vari-Pitch Focusing mechanism which optimizes the rotation angles of the focusing ring from the closest shooting distance to infinity. They also have a Pre-Set Focusing Stop which facilitates quicker shooting. Combined with Internal Focusing, these lenses offer incredible handling ease.

For ultra-telephoto photography, the focal length of the 400mm can be extended to 560mm F/5.6 when combined with an SP 1.4 × teleconverter. The 300mm can be extended to 420mm F/4 with a 1.4 × teleconverter.

Both the 300mm and 400mm are made to withstand heavy duty use and deliver consistently excellent results.

SP400mm F/4LD (IF)

Model 65B



ACCESSORIES



SP1.4X Tele-converter

(Model 140F)
High-performance tele-converter for telephoto lenses longer than 90mm. This compact (21.9mm long) converter easily extends the focal length of a master lens without greatly altering the total length of the lens.



SP2X Tele-converter of fixed-mount-type

This fixed-mount-type 2X tele-converter can be used not only with Tamron lenses, but also with lenses from other manufacturers.

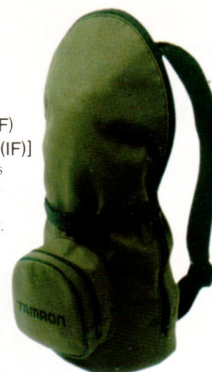


SP2X Tele-converter (Model 01F)

This converter doubles the focal length of a master lens to provide a dynamic image.

Shoulder case

[for common use with SP300mm F/2.8LD (IF) and SP400mm F/4LD (IF)]
The case can store the lens mounted on a camera. It is made of durable cloth and has a lens protective cover.



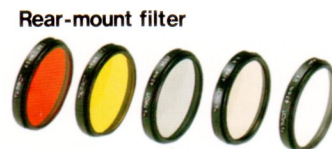
Rear-mount filter frame

[for common use with SP300mm F/2.8LD (IF) and SP400mm F/4LD (IF)]
An effective and indispensable tool for creative photographic expression. Filter exchange will be facilitated when frequently-used filters are pre-set in this frame.



Front Filter

[for common use with SP300mm F/2.8LD (IF) and SP400mm F/4LD (IF)]
Highly recommended to protect the expensive LD glass, used in the top front element of the lenses, from damage or smudging.



Rear-mount filter

Specifications of TAMRON LD Lenses

Model	Focal Length (mm)	Aperture Range	Angle of View	Lens Construction (Groups/Elements)	Min. Focus from Film Plane in. (m)	Filter Size (mm)	Diameter in. (mm)	Length at ∞ in. (mm) [w/ Nikon mount]	Weight oz. (gm)	Lens Hood	Remarks
30A	80-200	F/2.8 -32, AE	30°-12°	12/16	59 (1.5)	77	3.1 (80)	6.8 (173.5) [7 (178)]	43 (1,218)	Bayonet type	Accepts 01F, 140F converters.
63B	180	F/2.5 -32, AE	13°	7/10	47.2 (1.2)	77	3.2 (81.5)	4.7 (119.5) [4.9 (124)]	28.2 (800)	Bayonet type	Accepts 01F, 140F converters.
60B	300	F/2.8 -32, AE	8°	7/10	98.4 (2.5)	43 rear (112 front)	4.6 (117.5)	8.3 (210.5) [8.5 (215)]	73.9 (2,096)	Bayonet type	Accepts 01F, 140F converters.
65B	400	F/4 -32, AE	6.2°	7/10	118 (3)	43 rear (112 front)	4.6 (118)	11.5 (293) [11.8 (297.5)]	80.1 (2,270)	Bayonet type	Accepts 01F, 140F converters.
140F	1.4X the focal length of original lens	(Original lens Fx1.4)	—	3/5	Retains the min. focus of original lens	—	2.5 (64.5)	0.86 (21.9) [1.04 (26.4)]	6 (169)		
01F	2X the focal length of original lens	(Original lens Fx2)	—	5/6	Retains the min. focus of original lens	—	2.5 (64.5)	1.7 (42.5) [1.9 (47)]	8.8 (250)		
F system	2X the focal length of original lens	(Original lens Fx2)	—	5/7	Retains the min. focus of original lens	—	2.4 (62)	1.2 (31)	6.3 (180)		For Pentax KA, Nikon AI, Canon FD, Minolta MD, Olympus OM, Konica AR, Contax/Yashica, Fujica AX

Specifications and availability are subject to change without notice.

Tamron Adaptall-2 Interchangeable Mount System

The Tamron interchangeable mount system makes all Tamron lenses compatible with a wide range of SLR cameras so you can change your camera without having to change your lens.

Adaptall-2 Mounts Available for:

- Canon FD/FT Series
- Contax/Yashica Series
- Fujica ST Series
- Fujica AX Bayonet Series
- Konica AR Series
- Leica R4 Series
- Mamiya ZE Series
- Minolta MD/SR Series
- Nikon AI/E Series
- Olympus OM Series
- Pentax ES/Spotmatic Series
- Pentax K Series
- Pentax Super-A Series
- Praktica B200 Series
- Ricoh XR-P Series
- Rollei SL/Voigtlander VSL Series
- Universal (42mm Screw)
- "C" mount for CCTV/VTR cameras and 16mm movie cameras

Manufacturers of lenses for photographic, industrial, laboratory, video, and scientific applications.

TAMRON

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