

# 600/600SE Camera

**User Guide** 

## Introduction

The Polaroid Models 600 and 600 SE Professional Pack Film Cameras combine the features of a professional camera with the convenience of Polaroid pack film. The lenses are fully coated and color corrected (interchangeable on the Model 600 SE) and each is in a shutter that allows full exposure control with a wide range of shutter speed / aperture combinations. The Shutter is synchronized for electronic flash.

The removable pack film holder accommodates the Polaroid Type 100 / 600

film format which offers a variety of film types including black and white prints, color prints, and high quality black and white negatives.

This User Guide is illustrated with the Model 600 SE camera. The Model 600 is similar but does not have interchangeable lenses.

The numbers throughout the text refer to the pictures at the back of this User Guide. (See page 14.)

#### **Nomenclature**

#### **Camera (Picture 1)**

- A. Flash and viewfinder accessory shoe
- B. Neck strap eyelets
- C. Flash bracket mount
- D. Film holder lock
- E. Bayonet lens mount
- F. Lens release button\*
- G. Rangefinder coupling pin
- H. Red dot\*
- I. Cable release holder\*
- J. Hand grip flash shoe\*
- K. Shutter release
- L. Hand grip
- M. Hand strap (adjustable)
- N. Cable release
- O. Viewfinder indicator\*
- P. Viewfinder selector switch\*
- Q. Eyecup
- R. Eyepiece
- S. Tripod socket

#### \* Model 600 SE only

#### Lens (Picture 2)

- A. Red dot\*
- B. Depth of field scale
- C. Distance scale
- D. Focusing ring
- E. Shutter cocking lever
- F. Shutter speed ring
- G. Aperture control ring
- H. PC flash connector socket
- I. Aperture control lever
- J. Cable release socket
  - \* Model 600 SE only

#### Film holder (Picture 3)

- A. Dark slide
- B. Door latch
- C. Film tab slots
- D. Camera mounting brackets
- E. Developer rollers

Extra film holders (Model #73) are available from your local Polaroid dealer.

## **Accessories (not illustrated)**

- A. Body cap for camera\*
- B. Lens cap for 127mm lens
- C. Rear lens cap for 127mm lens

- D. Collapsible rubber lens hood for 127mm lens
- E. Neckstrap

\* Model 600 SE only

## Polaroid pack films

Film type	Speed (approx. ASA / DIN equiv	.) Description
Types 669/108 Polacolor ER	80 ASA / 20 DIN	These films yield a positive color print. They are balanced for use in average daylight and with electronic flash units approximating average daylight (5500°K). Ideal for both outdoor and studio photography.
Types 667 Black and White	3000 ASA / 36 DIN	Very high speed black and white films, which yield a positive print. Ideal for general purpose photography, recording high-speed events or low-light situations. Panchromatic. Prints need not be coated after development.
Type 665 Positive/Negative	75 ASA / 20 DIN	A black and white film which produces a high-resolution negative, in addition to a high quality positive print. Ideal for general purpose photography where a medium contrast instant print and a permanent negative are desired. Panchromatic. Prints must be coated.

Each pack produces 8 prints,  $8.3 \times 10.8 \text{cm}$  (3 1/4 x 4 1/4 in.). Type 665 film also produces a usable negative.

## **Assembly (Picture 4)**

## Attaching the lens (Model 600 SE only)

Insert the lens, aligning the red dot on the lens barrel with the red dot on the camera body (4). Turn the lens clockwise until the red dot is directly on top and the lens locks in place.

Screw the end of the cable release into the cable release socket on the lens (5).

Before removing a lens, unscrew the cable release from its socket on the lens and hang it on the cable release holder on the hand grip (6). (The cable release is permanently fixed to the handle and cannot be removed.) If there is film in the camera, be sure the dark slide is inserted before removing the lens.

To detach the lens, press the lens release button and turn the lens counterclockwise (7).

Always place the body cap on the camera when storing it without the lens, and keep both front and rear lens caps on the lens. To attach the body cap, fit it into the lens mount and turn it clockwise one-eighth of a turn (8).

## **Neckstrap**

Attach the neckstrap as shown for the Model 600 (9) and the Model 600 SE (10).

### Eyecup

Fit the rubber eyecup over the viewfinder eyepiece (11).

#### Lens hood

Screw the collapsible rubber lens hood onto the lens (12). For best picture-taking results, a lens hood should always be used. For storage, you may fold it back over the lens barrel and put on the lens cap.

#### Film holder

The removable film holder is attached to the camera by means of two sliding locks on either side of the camera body (13). When attaching the film holder, be sure it is properly seated and that the film tab slot is on the opposite side of the camera from the hand grip (14).

If there is film in the holder, be sure the dark slide is inserted before removing the holder.

## **Lenses** (Pictures 15 through 17)

The Models 600/600SE cameras have a 127mm f/4.7 lens (15). Two additional lenses are available for the Model 600 SE (16 and 17). Each lens comes complete with front and rear lens caps and a collapsible rubber lens hood.

All lenses are equipped with a Seiko between-the-lens shutter, with 10 speeds ranging from 1 sec. to 1/500 sec. and Bulb. The shutter is **X** synchronized for electronic flash at all speeds.

	127mm f/4.7 lens (15) (normal)	75mm f/5.6 lens* (16) (wide angle)	150mm f/5.6 lens (17) (portrait)		
Lens Construction	3 groups 4 elements	4 groups 7 elements	3 groups 4 elements		
Apertures	f/4.7 to f/64	f/5.6 to f/45	f/5.6 to f/45		
Closest Focusing Distance	1.1m (3.5 ft.)	1m (3.3 ft.)	2m (6.6 ft.)		
Angle of View	41°horizontal	65°horizontal	35°horizontal		
Screw-in-Filter Size	55 mm	72 mm	55 mm		

<sup>\*</sup> The 75mm lens comes with an accessory viewfinder.

## **Focusing**

The Models 600 and 600 SE are equipped with a coincidence-type rangefinder in which two images come together within a circle when in focus. To familiarize yourself with it, first set the lens at infinity and focus on a nearby subject, as described below.

#### How to focus

View your subject through the bright circle in the viewfinder (18). Position your eye so the entire circle is visible. Within the circle your subject will appear as two images (19). Turn the focusing ring so that these two images coincide (20). Now the camera is focused on your subject.

## **Using the viewfinder** (Picture 21)

### **127mm lens (Models 600 and 600 SE)**

Compose within the framing lines seen in your viewfinder (21). When focused beyond 3m (10ft.), use the dots outside of the lines.

## Model 600 SE only

The viewfinder frame is adjustable for 127mm and 150mm focal length lenses. Slide the selector switch to match the focal length of the lens in use (22, 23).

## 75mm lens (Model 600 SE only)

When using the 75mm lens, attach the wide angle viewfinder supplied with that lens to the accessory shoe on top of the camera (24).

When attaching or removing the viewfinder, be sure the locking device (**24A**) is unlocked. Once attached, turn the locking knob as far as it will go, in the direction of the arrow, to

secure the viewfinder. Focus your subject through the camera's viewfinder, read the subject distance from the lens barrel (25), and set the wide angle viewfinder knob to that distance (26). Now look through the wide angle viewfinder and compose your subject within the bright frame (27).

## Depth of field scale

When you focus on the most important part of your subject, some parts in the foreground and background of the scene will also be in acceptably sharp focus in the picture.

The distance between the nearest and farthest points in sharp focus is called the zone of sharp focus, or the depth of field. To determine this distance for a particular scene use the depth of field scale on the lens barrel (28). After choosing the aperture setting and focusing the subject, locate the aperture number on both sides of the red focus mark on the depth of field scale (28A). Follow the white line up to the distance scale and read the near and far limits of your zone of sharp focus (28B). For example, with the 127mm lens at f/32, at a subject distance of 1.7m (5 1/2ft.), the depth of field will be approximately 1.4-2.1m (4 1/2-7ft.) (29).

## **Exposure controls** (Picture 30)

## **Setting the shutter speeds (30)**

The shutter has 10 speeds, ranging from 1 sec. to 1/500 sec., plus a **B** setting for time exposures. These are set by turning the shutter speed ring. If set at **B**, the shutter stays open as long as the shutter release button is kept depressed. When setting shutter speeds, be sure that the red mark points directly at the speed number, not between two numbers.

### Setting the lens opening (30)

Apertures can be varied by turning the aperture control lever. There are click stops at every f-number, but the dial can be set between the numbers.

## **Neutral density filter**

In very bright daylight with 3000 speed black and white film, you may want to use a four—or five—stop neutral density filter (available from your photo dealer) which will enable you to choose a wider range of apertures and shutter speeds, if necessary.

## Loading the film

The holder may be loaded before or after it is attached to the camera. Pull up on the latch to open the film holder door; the door does not open flat. Always hold the film pack by the edges, not in the center. Slide the pack in at an angle, then push it down into place (31). Check that the white tabs are not caught between the pack and the holder (32). Close and latch the door, with the end of the black tab sticking out. Pull the black tab straight, all the way out of the holder (33). A small white tab will appear.

## Making the exposure

- Remove the dark slide (34).
- Set the shutter speed and lens aperture.
- Cock the shutter lever (35).
- Focus.
- Frame the subject in the viewfinder.
- Depress the shutter release (36).

## Processing the film

### **Tab-pulling tips**

In order for the film to develop properly, the tabs must be pulled out of the exit door **straight.** Be careful not to **bend** the film unit towards you or towards the lens as you pull, and do not pull it out at an **angle.** Here are some recommended techniques.

Handheld: Hold the camera in front of you and let the camera hang with the film tab slot down. Then pull the tabs straight down (37). Or, bracing your elbow against your body, hold the camera so the film tab slot is up, and pull the tabs straight up (38).

On a tripod: Brace the camera and pull the tabs straight, as shown (39).

#### Caution

The Polaroid film process uses a caustic jelly which is safely packed inside sealed containers within the film pack. If accidentally you should get some of this jelly on your skin, wipe it off immediately. To avoid an alkali burn, wash the area with plenty of water as soon as possible. It is particularly important to keep the jelly away from eyes and mouth. Keep discarded materials out of reach of children and animals, and out of contact with clothing and furniture, as discarded materials still contain some jelly.

#### How to pull the tabs

After making the exposure, pull the white tab straight, all the way out of the camera. A large yellow tab will appear (40). Grip the yellow tab firmly. Pull it straight out of the camera at moderate speed, without hesitation (41). The picture is now developing, so start timing. Develop the picture for the full time recommended in the film instructions inside the fim box. Separate the print from the negative in one continuous motion, starting at the end nearest the yellow tab (42). Information on handling of prints and negatives is in the film instructions.

## **Electronic flash** (Picture 43)

An electronic flash unit can be mounted on the accessory shoe on top of the camera (43A). The Model 600 SE has an additional accessory shoe on top of the handgrip (43B) that can be used for mounting the flash unit using the 75mm lens and viewfinder.

If you use a large handle-type flash, a special bracket may be available for your unit that attaches to the flash mount on the side of the camera (44). If you use the bracket that comes with your unit, be sure it does not obstruct the film holder and its operation. Consult your photo dealer for further information.

Plug the connector cord from the electronic flash unit into the PC connector socket on the lens (45). The shutter is **X** synchronized for electronic flash at all speeds. Consult the instructions provided with the flash unit for proper lens aperture settings.

There may be noticeable differences in the color quality of the light from various makes of electronic flash units. If your flash produces displeasing colors with Polaroid film, the

problem can usually be corrected by suitable filtration on the camera lens or the flash unit.

#### Automatic flash units and color film

It is recommended that you keep an automatic flash unit set for "manual" operation when using color film.

When set for "automatic" operation, exposure is controlled by the duration of the flash. When your subject is close, the flash duration may be considerably shorter than 1/1,000 sec. The resulting reciprocity effects tend to cause a color shift towards the warmer colors. If necessary, this can be corrected with weak cyan or blue and cyan CC filtration.

#### **Maintenance**

#### Lens care

The lens supplied with the Models 600 and 600 SE is a high quality, professional lens that should be kept clean and handled with extreme care. If it should become dirty, blow off any dust, then wipe gently with a clean, lint-free cloth. Fingerprints should be cleaned off immediately with a drop of lens cleaning fluid and lens tissue. Never use siliconecoated eyeglass tissue to clean the lens.

#### Keep the developer rollers clean

It is extremely important to keep the rollers clean at all times. Dirt or developer chemicals on the rollers will leave marks on the picture and may even cause the picture to jam in the rollers.

To clean the rollers: With both hands, lift the steel loops, and remove the roller assembly (46). Clean both rollers with a damp, lint-free cloth (47). Never scrape them with anything metallic, nor with your fingernail.

Rotate both rollers as you clean and inspect them. Also clean the film tab slot (48). Then replace the roller assembly.

#### **Storage**

To protect the lens and camera parts, be sure to put on lens caps and body cap when not in use. Do not store your lens with the shutter cocked.

#### **Filters**

The Models 600 and 600 SE lenses accommodate standard screw-in filters, available from your local photo dealer.

When photographing outdoors, particularly in shady or overcast situations, you may find it helpful to use a UV filter (available from your local photo dealer).

## More on exposure

## **Guide to exposure control**

Exposure is the amount of light that reaches the film through the lens. It is controlled by the length of time the shutter is open (shutter speed) and the size of the opening in the lens (lens aperture).

To increase exposure (make pictures lighter), use a longer exposure time (slower shutter speed), or a larger lens opening (aperture). To decrease exposure (make pictures darker), use a shorter exposure time (faster shutter speed), or smaller lens opening (aperture).

The shutter stays open for the length of time indicated on the ring. The numbers signify fractions of a second; thus, 60 = 1/60 sec., 4 = 1/4sec., 1 = 1 sec., etc.

The lens opening can be made larger or smaller. The size of the opening is measured in f-numbers, which are marked on the lens ring. The highest f-number indicates the smallest opening; the lowest f-number indicates the largest opening.

### More on film

The importance of the film instruction sheet: The most up-to-date and accurate information on a film will always be found in the instruction sheet packaged with that film.

**Time, temperature and development:** The ideal development temperature for all the films is about 70-75°F (21-24°C). When it's much warmer or colder, you may need to adjust the development time or the exposure.

Shutter speeds											
500	250	125	60	30	15	8	4	2	1		
	← Darken/Lighten →										
	Lens openings										
4,7	5,6	8	11	16	22	32		44	64		
← Lighten / Darken →											

Coat black and white prints: Prints from all black and white films except Type 667 must be coated as soon as possible to protect them from scratches, fingerprints and fading, and to prevent changes in tone. For details, see the film instructions. Do not coat color prints.

Type 665 negatives: These must be immersed in a sodium sulfite solution immediately after separation from the positive print. See the instructions on the inside of the fim box for full details.

Protect film from heat: Keep film away from heat. Extreme heat and humidity can damage it, especially after the pack is removed from its sealed foil wrapping.

## **Troubleshooting**

If no white tab appears: Open the door and, without moving the film pack, push the white tab out (49). Then close and latch the door.

If no yellow tab appears when you pull the white tab: Do not pull another white tab. Instead, carefully open the holder far enough to get a finger on top of the film pack to hold it down (50). Grasp the topmost yellow tab, and gently pull it all the way out and discard it (51). Inspect the rollers and clean them if necessary. Close and latch the holder, with the next white tab sticking out.

## Picture faults and probable causes

**Repeated, evenly-spaced spots:** Due to dirt on the steel rollers in the film holder.

Missing corners or orange-red marks along edges: Caused by pulling the yellow tab out of the camera at an angle. Also caused by dried developer chemicals at the ends of the steel rollers in the film holder.

Oblong in print: The white tab was not pulled all the way out. When the yellow tab was pulled, the white tab was pulled back into the camera.

Many small white specks: Caused by pulling the yellow tab out too fast. This can also cause pink lines, streaks or blotches on color prints.

Picture with dull, weak colors: The print was not developed long enough.
Underdeveloped color prints may be brownish pink.

Picture with reddish tint and muddy colors: The picture was developed at temperatures below 65°F (18°C).

Color prints much too red: May occur with some electronic flash units when set at "Auto".

Very light image or none at all: The film was fogged or extremely overexposed. Do not remove the safety cover from the film pack before inserting it into the camera, and do not remove a loaded film holder from the camera without inserting the dark slide. Be sure your exposure is based on the correct film speed.

#### **Nearly black image or solid black:**

Caused by insufficient or no exposure. Be sure you have cocked the shutter and removed the dark slide. Be sure your exposure is based on the correct film speed.

**Broad streak or curtain-shaped mark:**Due to hesitation or stopping while pulling the

yellow tab out.

# Three-year warranty (outside the U.S.)

Your Polaroid Professional Pack Film Camera has been thoroughly tested and inspected before shipment. All parts are guaranteed against defects in materials and workmanship for three full years from the date of original purchase. During this period any such defects will be remedied by Polaroid Corporation without charge. To take advantage of this warranty, the camera must be repaired by a Polaroid Service Center.

Cameras damaged by accident, misuse, or tampering will be promptly repaired at a reasonable charge. Please pack the camera carefully in a solid container, with plenty of padding, and ship it, prepaid and insured, to the nearest Polaroid Service Center.

THE ABOVE WARRANTY AND PROVISIONS DO NOT AFFECT YOUR STATUTORY RIGHTS.

# Information and technical assistance (outside the U.S.)

If you have any question about your camera or any other photographic problem, please contact the Polaroid Office nearest you.

# Full three-year warranty (U.S. only)

If your camera proves to be defective within the warranty period we will repair it, or at our option replace it with a similar camera, without charge. The warranty applies whether you do or do not return a registration card to us. The warranty period is three years from the original date of purchase. To verify the warranty period, you should keep the sales slip or other proof of the purchase date. Without this information, the warranty period is four years from the manufacturing date on the camera.

If, within the warranty period, your camera is mailed to us for service from inside the U.S., will be returned with a postal refund approximately equal to the cost of insured parcel post. We will also give you a free pack of film.

This warranty does not cover damage caused by accident, misuse, or tampering with the camera, and a charge will be made for such repairs.

FOR WARRANTY SERVICE the camera must be returned to and repaired by a Polaroid Service Center. You can return the camera through your Polaroid camera dealer. If that is not convenient, see below for information on how to return the camera, or call Americas Business Center toll-free at 1-800-343-5000 from anywhere in the U.S. We can be reached Monday through Friday, 8 a.m. to 5 p.m., Eastern Time.

In Canada call toll-free 1-800-268-6970.

This warranty gives you specific legal rights and you may also have other rights which vary from state to state.

This warranty excludes all consequential damages. Some states do not allow the exclusion or limitation of incidental or consequential damages, so the foregoing limitation or exclusion may not apply to you.

## Repairs

If you believe your equipment may need repair, *before your send it to us*, call Customer Service toll-free:

#### 1-800-343-500

from anywhere in the U.S. and explain the problem. You may be able to use your camera again right away, without repair.

Your camera dealer will return your camera for repair, should that ever be necessary.

Or, you may mail the camera to Polaroid for repairs. Pack it carefully. Address it to the nearest Polaroid Service Center and send it by *insured* parcel post. (Upon request, we will send a sturdy pre-addressed shipping

carton to you anywhere in the continental U.S.) Include a note describing the problem and, if you can, pictures that illustrate it.

# Information and technical assistance (U.S. only)

If you ever need additional help with your camera or with picture-taking in general, call us toll-free at 1-800-343-5000 from anywhere in the U.S. We can be reached Monday through Friday, 8 a.m. to 5 p.m., Eastern Time.

In Canada call toll-free 1-800-268-6970.

Or, write to Polaroid, Americas Business Center, 201 Burlington Rd., Bedford, Massachusetts 01730.

	Depth of field tables (in feet)											
_	f	∞	30	15	10	8	7	6	5	4.5	4	3.5
_	5.6	32' 10"	15' 10"	10' 6"	7' 9 1/2"		5' 10 1/2"		4' 5"		3' 7 1/4"	3' 2 3/4"
		$\infty$	312'	26' 10"	14'		8' 8"		5' 9"		4' 5 1/4"	3' 10"
	8	23' 4 "	13' 4 "	9' 3 1/2 "	7' 2"		5' 6"		4' 2 3/4"		3 '6"	3' 1 1/2"
		$\infty$	$\infty$	40' 0"	16' 10"		9' 7 1/2"		6' 2"		4' 8"	3' 11 3/4"
	11	16' 7 "	10' 10"	8' 0"	6' 5"		5' 1"		3' 11 3/4"		3' 4"	3' 0"
		$\infty$	$\infty$	133'	23' 7"		11 '6"		6' 9 1/2"		5' 0"	4' 2 3/4"
75	16	11' 9 "	8' 7 1/2"	6' 9 1/2"	5' 7"		4' 6 3/4 "		3' 5"		3' 1 1/2"	2' 10"
75mm f/5.6		$\infty$	$\infty$	$\infty$	55' 7"		15' 8"		8' 1/ 2"		5' 7 1/2"	4' 7 1/2"
	22	8' 5"	6 '8 1/2 "	5' 6 1/2"	4' 9"		4' 0"		3' 3 3/4"		2' 10 1/2"	2' 7 1/2"
		$\infty$	$\infty$	$\infty$	$\infty$		33' 5"		10' 10"		6' 9 1/2"	5' 4"
	32	6' 0"	5' I 1/2"	4' 5 1/4"	3' 11 1/4"		3' 5"		2' 11"		2' 7"	2' 4 3/4"
		$\infty$	∞	$\infty$	$\infty$		$\infty$		22' 4"		9' 8 1/2"	6' 11 1/2"
	45	4' 4"	3' 10 1/4"	3' 5 3/4"	3' 2 1/4"		2' 10 1/4"		2' 6 1/4"		2' 3 3/8"	2' 1 5/8"
_		∞	∞	∞	∞		∞		∞		26' 2:	12' 4"
	4.7	113'	24'	13 '4"	9' 3 1/2"	7' 6"	6' 8"	5' 9"	4' 10 "	4' 4 1/2"	3' 10 3/4"	' 3' 5 1/4 "
		∞	40'	17' 1 "	10' 10"	8 '6"	7' 4 1/2"	6' 3"	5' 2"	4' 7 1/2"	4' 11 1/4"	3' 6 3/4"
	8	66'	21'	12' 5"	8' 10"	7' 3"	6' 5 1/2"	5' 7"	4' 8 3/4"	4' 3 1/2"	3' 10"	3' 4 3/4"
		∞	53'	19' 0"	11' 6"	8' 11"	7' 8"	6' 5 1/2"	5' 3 1/2"		4' 2''	3' 7 1/2"
	11	47'	18'	11' 7"	8' 5"	7' 0"	6 '3"	5' 5 1/2"	4' 7 1/2"	4' 2 1/2"	3' 9 1/2"	3' 4"
		∞	79'	21' 4"	12' 4"	9' 4 1/2"	8' 0"	6' 8"	5 '5 1/2"	4'10"	4' 3"	3' 8 1/4"
	16	33'	16'	10' 8"	7' 11"	6' 8"	5' 11 1/2"	5' 3"	4' 6"	4' 13/4"	3' 8 1/4"	3' 3 1/4"
407 (44.7		∞	250'	25' 11"	13 '8"	10' 1"	8' 6"	7'0"	5' 8"	5' 0"	4' 4 1/2 "	3' 9"
127mm f/4.7	22	24'	13'	9' 6"	7' 3 1/2"	6' 3"	5' 71/2"	5' 0"	4' 3 3/4"	3' 11 1/2"	3' 7'	3' 2 1/2"
		∞	∞	37' 4"	16' 2"	11' 4"	9' 4"	7' 6 1/2"	5' 11 1/2"	5' 3"	4' 6 1/2"	3' 10 1/2"
	32	17'	11'	8' 3 1/2"	6'7"	5' 8 1/2"	5' 2 1/2"	4' 8 1/4"	4' 1"	3' 91/4"	3' 5 1/4"	3' 1"
		∞	∞	102'	32'	13' 9"	10' 10"	8' 6"	6 '6"	5' 7 1/2"	4' 9 3/4"	4' 3/4"
	45	12'	8' 10"	7' 0"	5' 9 1/2"	5' 1 1/2"	4' 9"	4' 3 1/4 "	3' 9 3/4"	3' 6 1/2"	3' 3"	2' 11 1/2"
		$\infty$	∞	$\infty$	44'	20'	14' 3 "	10' 4"	7' 5 1/2"	6' 3 1/2"	5' 3 1/2"	4' 4 1/4"
	64	8' 8"	6' 11 "	5' 9 1/2 "	4' 11 3/4"	4' 6"	4' 2 1/2 "	3' 10 1/2"	3' 5 3/4"	3' 3 3/4"	3' 1/2"	2' 9 1/4"
		∞	∞	∞	∞	56'	26'	15'	9' 6"	7' 7 1/2"	6' 1 1/2"	4' 10 1/2"
•	5.6	131'	24' 8 "	13' 7"	9' 4 1/2 "	7' 7 1/2"	6' 8 1/2"					
		∞	38'5 "	16'9"	10,8"	8151,	T31 2					
	8	92'	22' 11"	13' 1"	9' 2"	7' 5 1/2"	6' 7 1/2"					
		$\infty$	43' 6	17' 7"	11" 0"	8' 7 1/2"	7' 5 1/2"					
	11	65'	20' 11"	12' 5 "	8' 10"	7' 3 1/2"	6' 5 1/2"					
		$\infty$	53' 7"	18' 11"	11' 6"	8' 10 1/2"	' 7' 8"					
150mm f/5.6	16	46'	18' 7"	11' 8"	8' 5 1/2"	7' 0"	6' 3"					
.00 1/0.0		$\infty$	80'	21' 4"	12' 4"	9' 4"	7' 11 1/2"					
	22	33'	16' 1"	10' 8"	7' 11 1/2"	6' 8"	6' 0"					
		$\infty$	267'	25' 11"	13' 7"	10' 0"	8' 5 1/2"					
	32	23' 7"	13' 7"	9' 6 1/2"	7' 4"	6' 3"	5'8"					
		$\infty$	∞	37' 4"	16' 1"	11' 3"	9' 3"					
	45	16' 10"	11' 1" "	8' 3 1/2 "	6' 7 1/2"	5' 9"	5' 3"					
		∞	∞	103' 0"	21' 8"	13' 7"	10' 9"					

	Depth of field tables (meters)											
	m f	∞	10	5	3	2,5	2	1,7	1,5	1,3	1,2	1,1
	5,6	10,02	5,06	3,39	2,35		1,70		1,33 1,72		1,09	0,93
	8	∞ 7,11	∞ 4,21	9,69 2,99 15,94	4,17 2,16 4,99		2,44 1,60 2,68		1,72 1,27 1,84		1,33 1,06 1,39	1,01 0,90 1,13
	11	∞ 5,05 ∞	∞ 3,40 ∞	2,57 ∞	1,94 6.92		1,48 3,13		1,04 1,20 2,03		1,01 1,50	0,81 1,19
75mm f/5.6	16	∞ 3,59 ∞	2,69 ∞	∞ 2,14 ∞	1,69 15,47		1,34 4,13		1,11 2,38		0,94 1,67	0,82 1,29
	22	2,56 ∞	2,08 ∞	1,74 ∞	1,44 ∞		1,18 7,56		1,00 3,18		0,87 2,01	0,77 1,47
	32	1,83 ∞	1,58 ∞	1,39 ∞	1,19 ∞		1,01 ∞		0,88 6,14		0,78 2,88	0,70 1,86
	45	1,32 ∞	1,19 ∞	1,08 ∞	0,96 ∞		0,85 ∞		0,76 ∞		0,69 7,09	0,63 2,44
	4,7	34,60 ∞	7,80 14,00	4,41 5,78	2,79 3,25	2,36 2,67	1,91 2,10	1,64 1.77	1,45 1,55	1,27 1,33	1,17 1,23	1,08 1,12
	8	20,00 ∞	6,80 19.00	4,07 6,50	2,66 3,45	2,26 2,79	1,85 2,17	1,59 1.82	1,42 1,59	1,24 1,36	1,15 1,25	1,06 1,14
	11	14,40 ∞	6,00 31,00	3,78 7,43	2,54 3,68	2,18 2,94	1,80 2,25	1,56 1,87	1,39 1,63	1,22 1,39	1,13 1,27	1,06 1,16
	16	10,20 ∞	5,10 ∞	3,44 9,30	2,89 4.07	2,07 3,18	1,72 2,39	1,50 1,96	1,35 1,69	1,19 1,43	1,11 1,31	1,03 1,18
127mm f/4.7	22	<b>7,30</b> ∞	4,30 ∞	3,05 15,00	2,20 4,79	1,93 3,58	1,63 2,60	1,44 2,09	1,30 1,78	1,15 1,49	1,08 1,36	1,00 1,22
	32	5,20 ∞	3,5 ∞	2,64 ∞	1,99 6,42	1,77 4,39	1,52 2,98	1,35 2,32	1,23 1,94	1,10 1,60	1,03 1,44	0,96 1.29
	45	3,70 ∞	2,77 ∞	2.22 ∞	1,75 12,50	1,59 6,49	1,39 3,77	1,25 2,75	1,15 2,22	1,04 1,77	0,98 1,57	0.92 1,39
	64	2,65 ∞	2,16 ∞	1.82 ∞	1,50 ∞	2,10 1,39	1,24 6,13	1,13 3,76	1,05 2,80	0,98 2,10	0,91 1,81	0,86 1,56
	5,6	40,00	8,07	4.49	2,82	2,38	1,92					
	8	∞ 28,30	13,20 7,47	5.65 4,31	3,21 2,75	2,64 2,33	2,08 1,89					
	11	∞ 20,00	15,20 6,77	5,97 4,07	3, 30 2,66	2,70 2,27	2,12 1,86					
150mm f/5.6	16	∞ 14,20	19,40 5,98 31,00	6,50 3,79 7.43	3,44 2,54	2,79 2,18	2,17 1,80					
	22	∞ 10,00	5,14	3,44	3,67 2,39	2,93 2,08	2,25 1,73					
	32	∞ 7,18	∞ 4,29	9,33 3,06	4,05 2,21	3,16 1,94	2,37 1,64					
	45	∞ 5,12 ∞	∞ 3,50 ∞	14,70 2.65 ∞	4,76 2,00 6,35	3,56 1,78 4,34	2,58 1,53 2,44					
					0,00	¬,∪¬	۲,-۲۰۰					









