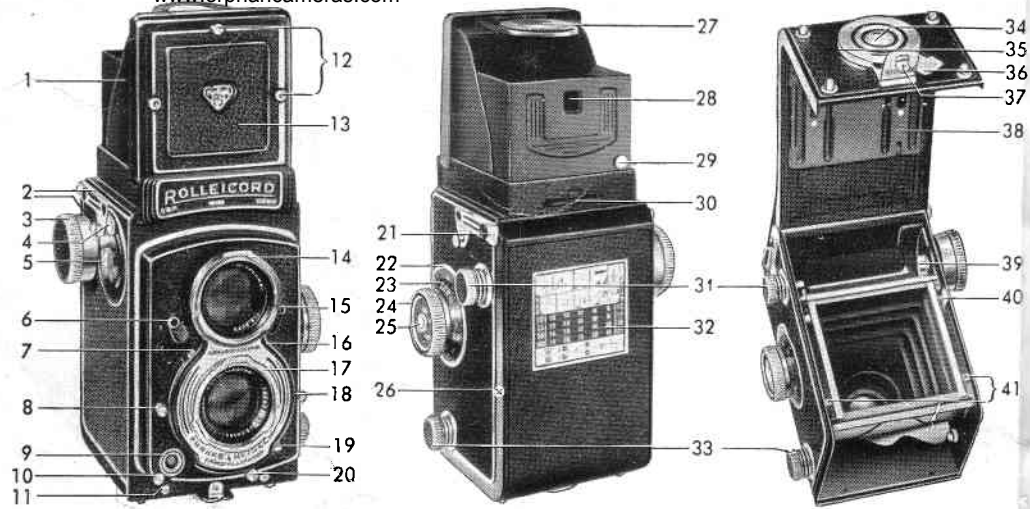
Rolleicord

Va

IN PRACTICAL USE



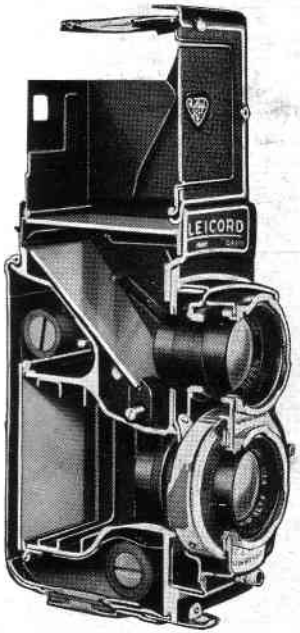
DESCRIPTION OF CAMERA (detailed explanation → page)

1 Focusing hood → 14
2 Hook for neck strap
3 Film winding knob → 11, 12
4 Interchangeable counter mechanism → 9, 11
5 Locking screw or thumb screw for counter mechanism
6 Synchro lever (tension lever for self-timer) → 15, 22
7 Peep window for shutter speed → 12
8 Shutter setting → 12
9 Flash cable socket → 15
10 Locking device for flash cord plug → 15
11 Tripod socket for holding Rolleifix, pistol grip or panorama head → 25

12 Pin-socket for direct view finder mask → 9
13 Direct view finder flap → 14
14 Double bayonet mount for Rolleiflash* or Rolleinar* → 24
15 Double exposure prevention and release lever → 15
16 Indicator window for shutter speed and diaphragm → 12
17 Double bayonet mount for optical accessories* and lens hood* → 24
18 Shutter speed control lever → 12
19 Socket for cable release or body release
20 Shutter tensioning and release lever → 14
21 Back hinge with safety lock → 10
22 Depth of field scale → 20
23 Focusing scale → 20
24 Focusing knob
25 Film speed reminder dial → 11
26 Focal or film plane (focusing distances measured from this line)

* Bayonet size I

27 Focusing magnifier → 14
28 Rear sight for direct view finder → 14
29 Release button for direct view finder flap → 14
30 Retaining device for ground glass mask → 9
31 Take-up spool knob → 10
32 Light value exposure table → 18
33 Film spool knob (and Rolleikin rewind knob) → 10
34 Tripod socket → 27
35 Fastening groove for Rolleifix or pistol grip → 25
36 Locking lever for back lock clip → 10
37 Back lock clip → 10
38 Adjustable film pressure plate → 10
39 Winding key of take-up spool → 10
40 Locking lever for film counter gears → 7
41 Indicator marks for starting No 120 roll film → 11



The Rolleicord is really simple and quite easy to use, but you will find it well to read the instructions first. If you're in a hurry to get started, take a quick look at the illustrations on pages 9 through 15. You will then be familiar with the most important operational details. Later, at your leisure, you can read the instructions more carefully.

FRANKE & HEIDECKE · BRAUNSCHWEIG

To Locate Important Paragraphs Quickly:

A Brief Rolleicord-Anatomy

In the Rolleicord two separate cameras are joined in a twin-camera with a common sturdy die-cast body: the bottom half is the

taking-camera, in which the film is exposed, and the upper half is the

viewing-camera, which is designed on the mirror-reflex principle. Its special task is to make the effects of focusing visible and to supply a control image essentially similar to that of the prospective picture.

The image forming rays are transmitted by the fully open viewing lens, projected on to the focusing screen via the mirror and the result is a right-side-up focusing image, in the full size of the original picture. This viewing image is visible at all times and every detail of composition and framing may be watched even during exposure. The focusing screen is ruled vertically and horizontally across the center making it possible to detect errors such as lines which converge that should be parallel or a slanting horizon, in time to notice and correct them. It is easy to straighten or level the camera by means of the lines on the focusing screen.

Above all, the focusing screen provides the means for **focusing** the camera. This is accomplished by rotating the focusing knob. Both lenses, which are inflexibly coupled to each other by means of a sturdy common front plate, are thereby adjusted simultaneously: a sharp viewing image, therefore, guarantees an equally sharp picture. Focusing the front lens panel throughout the range from ∞ (Infinity) — 35½ inches (distances measured from the focal or film plane to the subject) is accomplished by one full turn of the focusing knob. The special design of the focusing mechanism (a double cam-drive based on the principle of Archimedes' spiral) insures uniform movement of the lens panel in both directions without play or backslash. Tied in with the movement of the lenses is a simple sliding mechanism, located beneath the ground glass, providing completely automatic **parallax compensation.** Consequently, the final picture is always framed exactly as originally viewed on the focusing screen.

The focusing hood, which is designed for one-hand operation, is kept in both open and closed positions

by spring tension. It is equipped with a magnifier offering approximately 2.5 times magnification for critical focusing. Since the Rolleicord is equipped with a fast viewing lens and an optically prepared focusing screen, the viewing image is extremely bright and clear and focusing can be done very critically.

After focusing the camera, the front flap of the focusing hood may be folded back: the focusing hood is thereby converted to an open frame type **view finder,** through which it is possible to view the subject in natural size and to follow action easily.

Since the two **lenses** are of identical focal length (f = 75 mm, picture angle [across diagonal], 56°) it follows that the images in both sections of the camera will always be critically focused on the same portion of the subject simultaneously. The Schneider Xenar f:3.5 taking lens, is a four glass construction with two cemented elements (modified Taylor-type) and features outstanding correction for black and white and color pictures, while the three-element viewing-lens f:3.2 meets with the special requirements for best ground glass focusing. Both lenses are treated with abrasion resistant coating. The bayonet receptacles circling the mounts are intended for attaching the lens hood and supplementary optical accessories, which in this way will be held in optically correct position and form a solid unit with the camera.

The **Synchro-Compur shutter** is a between-the-lens shutter with evenly spaced speed settings from 1/500 sec. to 1 sec. It has a single tensioning and release lever and is fully synchronized for electronic flash and flash bulbs to 1/500 sec. The Synchro-lever, which is also used for tensioning the self-timer mechanism, adjusts the shutter to either X or M synchronization.

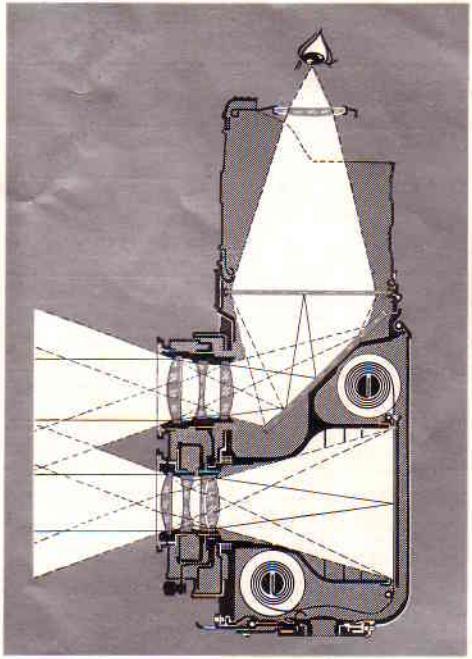
The **exposure value scale** and **shutter speed-diaphragm coupling** simplify the pre-selection of shutter speed and diaphragm opening by permitting a quick change to the desired combination. Normally, the intercoupled speed and diaphragm settings are changed by moving only the speed lever. They can, however, be adjusted individually, if desired.

The removable **back** is attached to the camera by means of two hinges with locking device and at the bottom it contains the tripod socket and the safety back lock. The adjustable film pressure plate can be set for No. 120 (B II 8) film (with paper backing), or for 35 mm film (without paper backing) when used in conjunction with the Rolleikin attachment. In both cases a film channel is created with a width that corresponds to the thickness of the film being used. Thus the film will be properly held in the focal plane and will slide through without undue friction when advanced.

The **film winding mechanism** (for roll film) is equipped with a **double exposure prevention device.** Turning the film winding knob until it stops (film lock) will advance the film one full frame and at the same time cause the next number to appear in the exposure counter window. Now the shutter can be tensioned. After release, the operation of the inter-lock is reversed so that the shutter is locked until the film has been properly advanced to the next frame. In this way double exposures or blanks are neatly avoided.

In special cases — when using the Rolleikin or Plate Back — the double exposure prevention lock must be released or else the shutter would be permanently locked. If engaged after the exposure, the lock will furthermore serve as an effective shutter release guard. Intentional double or multiple exposures (trick shots) on roll film are also possible through temporary release of the lock.

Proper starting of the film when loading the camera is easily accomplished. Immediately after inserting the film it is advanced as far as the double arrow or line mark on the paper backing. Closing the back at this point depresses the sliding lever and engages the film measuring mechanism. The knob can now be turned only the correct amount to the stop. The number in the film counter window will automatically advance from 0 to 1, when the film is ready for the first exposure.



Number and format of pictures according to your choice

Type of film	Accessory device	Number of exposures	Picture format
B II 8 — 120 roll film	—	12	2¼ x 2¼" (6 x 6)
	16 exp. kit	16	1⅝ x 1⅝" (4 x 4)
		16	1⅝ x 2⅛" (4 x 5.5)
	24 exp. kit	24	1 x 1½" (24 x 36 mm)
		24	1⅛ x 1⅝" (28 x 40 mm)
35 mm film	Rolleikin	20, 36	1 x 1½" (24 x 36 mm)
Plates and sheet film 6.5 x 9	Plate adapter	1	2¼ x 2¼" (6 x 6)

When loading the camera, the **film speed reminder** is set according to the speed of the film being used (8 to 800 ASA and 10 to 30° DIN) thus always showing which type of film is in the camera. This is especially valuable when frequent changes of film material are made.

After the last exposure, the film counter mechanism disengages automatically and the winding knob turns freely, permitting the full winding up of the completely exposed film. The last sign visible in the exposure counter window is a center-dotted circle to indicate that all the film has been exposed. Opening the back will cause the counter dial to return to 0.

With the interchangeable counter mechanism, the Rolleicord Va offers a practical, logical and versatile solution to the choice of picture formats. Standard equipment is the 12-exposure counter mechanism for the usual 12—2¼ x 2¼" picture operation on B II 8 — 120 film. The change to a five format camera is accomplished by the accessory kits 16-exposure counter mechanism 4 x 4, 4 x 5.5 cm and 24-exposure counter mechanism 24 x 36, 28 x 40 mm. Each kit contains a counter dial, which converts the film-wind mechanism to 16 or 24 picture operation, together with the necessary masks for film plane, ground glass and direct view finder. Even when the camera is loaded, you can freely choose between the formats 4 x 4 and 4 x 5.5 cm as well as between 24 x 36 and 28 x 40 mm. For all who like versatility, or do not object to economy, the Rolleicord Va offers all the advantages inherent in the film-saving choice of formats.

Ever-Ready Case

To Open: lift the top by grasping the snap catch buttons at the rear and fold forward and down ①.

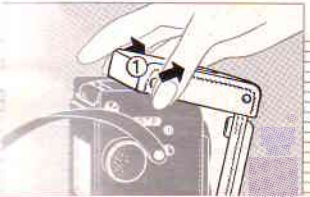
Removal of Camera from Case: pull up the clips on the side walls of the case ②, spread the case apart, lift the camera forward and out ③.

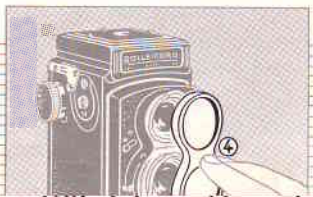
For Cameras with Rolleikin 3.5 Counter Knob: straighten out the five metal tabs, which hold the leather insert on the inside of the case, with a knife and then push out the now superfluous disc.

Lens Cap

To Remove Lens Cap: lift the lower part and then remove cap.

Attaching Lens Cap: by slight pressure.





Back

To Open: swing aside in direction of arrow the back locking lever at the bottom of the camera ①, lift the clip ②, open back, using the clip as a handle.

To Close: with the flat of the hand push the back closed, fold down the clip and return locking lever to full forward position.

To Detach (when exchanging for plate adapter back): open back wide and swing locking lever on the left hand back hinge upwards ③. Remove back from hinge on this side ④.

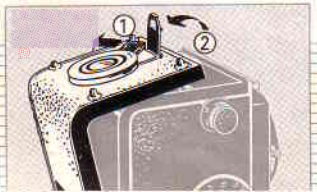
To Attach: fit back first to right hand hinge, then to left hand (slotted) hinge, and lock.

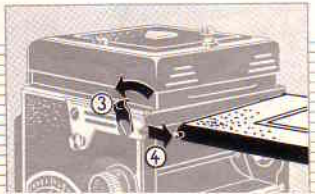
Loading of camera

To adjust film pressure plate (using the 120 [B II 8]-film the inscription 2¼ x 2¼" must be visible): press the plate against the back and push it up until it stops. When released, it must spring forward completely into the normal plane ⑤.

To insert film spools ⑥: fit spool on right side (winding knob side) first and pull out holding knob. Push spool down on the left so that knob may snap back into place fully. The slotted end of the empty spool is inserted on the right side to engage the winding knob.

Break and remove seal of full roll of film, pull up backing paper to the take-up spool, colored side





outwards, and insert the tapered end into the long slot of the take-up spool ⑦. Wind film tightly, using lefthand thumb as a brake, until the **triangular marks** (or double arrows) on backing paper are in line with the **red indicator dots** on either side of the film aperture. ⑧ — Stop! Close the back. Engage double exposure prevention lock.

Turn winding knob until it stops ⑨: Film counter advances to No. 1, the shutter can be tensioned.

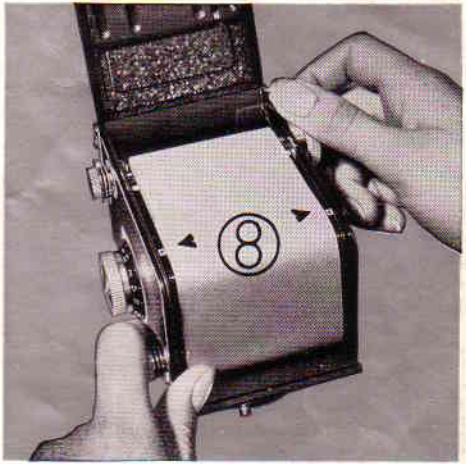
Setting the Film Reminder: Press knob in center of disc and turn to desired value. The dots between the figures correspond to intermediate film speeds.

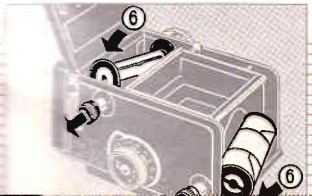
Attention:

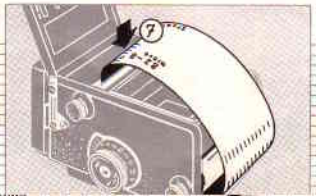
When using the plate adapter: remove empty spool, but keep it for use with the next roll of film.

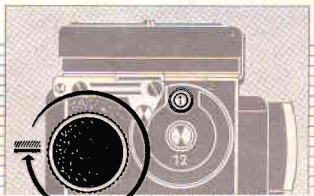
Exchanging the counter mechanism (page 9):

open **camera back** before attempting to remove and install counter mechanism!









Advancing Film

Turn winding knob until it stops. The shutter tensioning and release lever thereby remains in "rest" position.

Removal of the Film

After the last exposure: wind up the film completely. Open back in shady spot, pull out take-up spool knob and lift film out from left side ①. Fold under a good portion of the backing paper ② (for easy opening when developing) and seal with tape ③. Put the exposed film back into the light-proof protective cover of the original package!

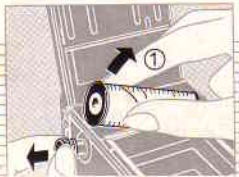
> Never change film in direct sunlight! Utilize, at least, the shadow of your own body. Protect open camera against dust and dirt and clean from time to time with a soft camel's hair brush.

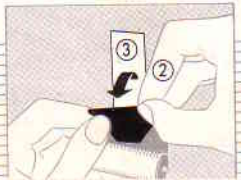
Exposure value - Shutter speed - Diaphragm Setting

Setting Exposure Value: Release diaphragm lever, by pressing it in direction of the lens centre, and move up or down ④, until the red dot indicates desired exposure value. (If the exposure value is still not reached: re-engage diaphragm lever and move back a short distance; repeat original procedure.)

Speed-diaphragm-selection: Adjust shutter speed lever ⑤, until the desired speed-stop combination appears in the indicator window. (Choosing speed and diaphragm: → pages 19 and 20.)

Special Case: Selecting speed and diaphragm separately: release diaphragm lever, adjust speed lever **first** ⑤ and **then** diaphragm lever ④.





Exposure Value

The exposure value provides the basic setting of the camera to the desired exposure (→ page 16), automatic coupling keeps exposure constant.

Midpoint light values can be used. Setting scale to next lower number doubles exposure.

Duration of Exposure

The Shutter Speed must be chosen to suit the subject movement (→ page 19). 1/60th sec. is the speed most commonly used, minimizing camera movement in snapshots.

Consider the figures as fractions of seconds (for example 30 = 1/30 sec.). Shutter speeds have click stops, intermediate settings between engraved values are not possible: Whatever the speed-diaphragm combination, the speed value must always appear in the center of the peep window.

The letter "B" permits time exposures of any duration (→ page 14).

Diaphragm

Stopping down increases depth-of-field (→ page 20).

Settings of full as well as intermediate stop values are possible (click stops between the figures). Intermediate values on the diphragm scale are obtained when working with intermediate exposure value settings. The dot to one side of f:3.5 indicates f:4.

Closing down the diaphragm to the next full value cuts the effective light passing through exactly in half. To maintain exposure constant would require doubling the time shutter is open — this automatically takes place because of the coupling, exposure value remains the same.

Time exposure by hand				Automatic, shutter timed exposures						
B	1	1/2	1/4	1/8	1/15	1/30	**1/60**	1/125	1/250	1/500 sec.
Tripod shots				Hand held shots						

Focusing Hood

To Open: lift the rear edge of the focusing hood; cover-spring tension keeps it open ①.

To Close: fold down focusing hood ②.

Focusing Magnifier

To Raise: push the direct view finder flap inwards ③ — the magnifier springs into position.

To Close: push magnifier down ④.

Use of Magnifier: use magnifier as close to the eye as possible.

Direct View Finder

To Open: push the direct view finder flap inwards until it locks into place ③.

To Close: release the flap by means of the button on the back of the focusing hood ⑤ — it will spring back into place.

Tensioning and Releasing

Tensioning: move lever to the right as far as it will go and then back to original position ⑥.

Releasing: gently move lever to left until shutter click is heard ⑦. The shutter automatically opens for the desired time.

Time exposure "B": Move shutter lever to left, holding there for required time ⑦. Releasing the lever closes the shutter.

The shutter and self-timer may be left cocked even when the camera is laid away for short periods of time without weakening the power of the springs.