## HOW TO USE YOUR



# Bell & Howell

Canonet QL1.9

35mm STILL CAMERA

## FEATURES OF CANONET QL 17 & CANONET QL 19

Canonet 17 and Canonet 19 are EE cameras that have captured the most camera jans in the world. They have brought the greatest satisfaction to the largest number of camera fans due to their superior mechanism. With the introduction of Canon's revolutionary and unique QL film loading device into the latest Canonet QL 17 and Canonet QL 19, the troublesome task has been completely eliminated. This new QL system, which was developed by Canon ahead of other camera makers, will be enthusiastically received as was the EE mechanism.

- 1. New film loading with QL device

  Just place the film in the prescribed place
  and the "magic claw" of the QL device
  accurately leads the film for correct loading. It is a revolutionary mechanism,
  developed by world-famous Canon, that
  uses ordinary 35mm film in cartridge
  sold in any camera shop.
- 2. The fast Canon Lens F1.7 is the brightest among the EE cameras. 6-element, 5-component construction including its three new type glasses, enables sharp pictures to be taken. The lens is also particularly well-suited for color photography.
- Highly sensitive CdS exposure meter
   The built in CdS exposure meter, with a wide photometric scope and high precision, always guarantees a proper amount of exposure.

## 4. Operating aperture manually for ordinary photography

In case of flash photography as well as photography for a specific purpose, the extent of the aperture may be regulated manually.

- 5. Finder with multi-layered film coating multi-layered coating have been applied to the half-transparent mirror inside the finder to increase the transparency factor, and to make clearer the rangefinder.
- 6. Other features

Both the lens and exposure meter are covered with one filter. There is no need for adjusting the exposure even when using a filter. Comes complete with various safety devices for preventing misuse.



## **CANONET QL 19**

The positions of the various parts for Canonet QL 19 and their terminology are the same as for the Canonet QL 17. Refer to the left hand page.



## MAIN SPECIFICATIONS FOR CANONET QL 17 & CANONET QL 19

Type: 35mm Lens Shutter Type EE camera.

Film size:  $24mm \times 36mm$ .

Lens: Canonet QL 17 Canon Lens SE 45mm F 1.7 6-element

5-component construction.

Canonet QL 19 Canon Lens SE 45mm F 1.9 5-element

Shutter: B 1 1/2 1/4 1/8 1/15 1/30 1/60 1/125 1/250 1/500

Built-in self-timer.

Exposure Meter: Highly sensitive CdS exposure meter. Mercury battery

used as power source.

EE Mechanism: Fully coupled with exposure meter, shutter and lens aperture. Shutter priority type EE. Manual aperture setting

possible.

Operating Range of Meter: EV2.5-19.
Film Speed Index: ASA 25-800.

Finder: Double image superimposing system, coupled rangefinder.

Marked finder with parallax error automatically corrected. Magnification ratio 0.7X. Visible aperture readings and

warning marks in the viewfinder.

Flash Synchronization: MX flash synchronization. Speedlight, M class and F class

of flash bulbs can be synchronized.

Revolutionary film loading with Canon's unique QL device.

using film in cartridge

Film Winding: Single operation 120° winding lever type.

Film Counter: Self-resetting type.

Film Rewind: Press rewind button and rewind with crank.

Size:  $140 \times 79 \times 31$ mm (lens protruded QL 17, 37mm; QL 19,

33mm).

Film Loading:

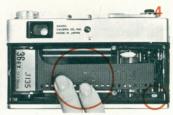
Weight: Canonet QL 17 830 grams Canonet OL 19 800 grams

anonet QL 19 800 grams

## PRECAUTIONS FOR HANDLING CANONET QL 17 AND CANONET QL 19







Please read the following instructions, carefully in order to avoid damaging any of the mechanism or causing incorrect exposures.

- Do not turn the shutter ring or the aperture ring while pressing down on the shutter button.
- The shutter ring is equipped with a safety stopper device.
   When the stopper catches, do not turn the shutter ring any more. (See page 11)

- When the back cover of the camera is opened, the inner cover —i.e. QL cover opens simultaneously. Do not touch the QL cover when opening and closing. It is preferable not to touch the entire QL mechanism unless necessary.
- 4. When loading film, be sure that the tip of the film comes to the red mark (-).
- Do not use the intermediate space between the shutter speed index.
- 6. Always charge the self-timer after setting the flash setting lever to X.

### MERCURY BATTERY LOADING





Load the mercury battery in a separate envelope into the battery compartment. Since the mercury battery powers the CdS meter, unless the battery is in position the meter will not function.

- Insert coin into groove of battery cover and turn to the left to remove.
- Face the central contact of the mercury battery inwards and insert, then screw the cover back in.

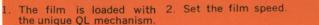
When inserting, do not confuse the  $\oplus$   $\ominus$ . In case of reverse insertion, the meter will not function properly.

\* For mercury battery, the National M-1P

- model or the Toshiba TH-MP is used—equivalent to the United States Mallory RM-1R. Life of the battery in continuous use is about two years.
- \* Do not soil with perspiration or fingerprints. Before insertion, clean mercury battery
  - thoroughly with dry cloth. Perspiration or finger marks may cause corrosion. Be careful not to insert unclean battery as it may damage the camera contact point.
- \* When not in use for a long period, remove the mercury battery and keep in a dry place.

## STEPS IN EE PHOTOGRAPHY









3. Set the aperture ring to AUTO mark.



7. Focus and compose the 8. Press the shutter release picture.



button gently.



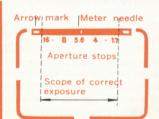
 Adjust the film speed setting lever to a simple exposure mark by turning the shutter speed ring.



5. Remove the lens cap.



6. Wind the film advance lever.

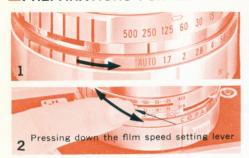


The diagram shown here is the finder for QL 17. In the case of Canonet QL 19, the aperture stop on the right end starts from 1.9.

- (1) Needle indicates lens aperture: Gives correct exposure.
- (2) Needle inside the arrow mark:

  Turn the shutter ring in the direction of the arrow and take the picture.
- (3) Although the ring is turned, the needle will not indicate the aperture: Indicating no picture can be taken. In other words, functioning of EE photography is not possible.

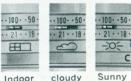
## PREPARATIONS FOR EE PHOTOGRAPHY



Before using the EE mechanism for taking pictures, prepare the camera so that the following three conditions are fulfilled:

- 1 Adjust the AUTO mark of the aperture ring to the indicator.
- Press and turn the film speed setting lever, adjusting it to the speed index of the loaded film.
- \* Film speed index is indicated on the film box.
- \* When setting the film speed lever, it is essential that the shutter speed should be set at a high speed of over 1/15 sec.





\* The click stop functions for the following 16 indicated film speeds:

(32)(40) (64)(80) (125)(160) (250)(320) (500)(640) ASA 25 · · 50 · · 100 · · 200 · · 400 · · 800 DIN 15 · · 18 · · 21 · · 24 · · 27 · · 30

(16)(17) (19)(20) (22)(23) (25)(26) (28)(29)

- \* In case of using a high speed film, if it is under 1/15 sec., the Under & Over Exposure Lock will catch, making setting impossible.
- Turn the entire shutter ring, and adjust the index position of the film speed setting lever to the simple exposure mark of either sunny, cloudy or indoors.

\* When adjusting the simple exposure mark, always make the adjustment by turning the entire shutter ring. The setting may be approximate. Set at a position where the shutter ring catches the click stop.

#### Safety device against incorrect exposure

\* To avoid setting the exposure conditions beyond the working range of the EE, the Under & Over Exposure Lock device has been incorporated into the shutter ring. When the shutter ring stops, do not unduly try to make the rotation.

The Under & Over Exposure Lock catches at the following positions:

Under ASA	80	1	sec
For ASA	100	1/2	sec
For ASA	200	1/4	sec
For ASA	400	1/8	sec
For ASA	800	1/15	sec

When wishing to click the shutter at a slower speed, beyond the limit of the Under & Over Exposure Lock device, the lock may be freed by turning the shutter ring while pressing the Under & Over Exposure Lock release lever. In this case, as the EE mechanism will not function, release AUTO and set the lens aperture manually.





## Do not use B exposure for EE photography

As it is meaningless to use the B exposure for EE photography, it should not be used. Accordingly, the Under & Over Exposure Lock works for the B index. (See page 20 for setting.)

\* Do not use the intermediate space of the shutter speed index.

#### HOLDING THE CAMERA



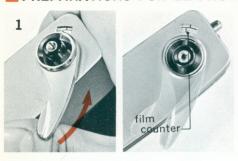
Holding the camera firmly is very important if you want to take a clearly focused picture. Hold the camera in either a vertical or horizontal position, as shown in the photographs. Look through the finder, and adjust the focus while determining the composition. Then, gently press the shutter button.

- 1. Hold the camera with both hands as firmly as possible.
- 2. Stabilize the camera by pressing it against the cheek or forehead.
- 3. When the camera is in a horizontal position, both elbows should be firmly against the body, and at least one elbow should be resting against the body when in a vertical position.





#### PREPARATIONS FOR EE PHOTOGRAPHY



1 Wind the film advance lever.

By winding the lever, a single frame of film is advanced, charging the shutter. At the same time, the film counter advances by one number.

## 2 Focus by looking through the viewfinder.

When the focusing lever is moved, correct focus is achieved when the two images seen in the center of the viewfinder 14 coincide completely.



## 3 Determine the composition to be recorded within the frame.

The field-of-view which will appear on the film can be seen within the rectangular frame. The frame is coupled to the rangefinder, and as the parallax error is automatically corrected, the range which is in view will appear on the film in its entirety.

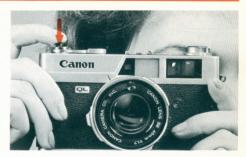
## 4 Press the shutter button while looking through the viewfinder.

When the needle is pointing to the aperture stop the shutter may be clicked. It is important to press the shutter button gently in order to avoid blurry pictures.



- \* Do not press the shutter button indiscriminately.
- \* When the shutter actuates, the film advance lever is again ready to advance.

In case the exposure is incorrect for EE photography, the safety device will prevent the pressed shutter button from being released. In this case, the needle inside the viewfinder will be within the arrow mark. Turn the shutter ring in the direction of the arrow so as to bring the needle within the range of the aperture stops.



#### Distance scale

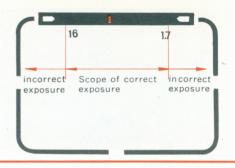
Although for ordinary picture-taking the distance scale is unnecessary, it indicates the distance between the subject in focus and



the film surface. It is possible to get the photographic distance by adjusting the distance scale to the indicator.

### EE PHOTOGRAPHY INDICATOR AND CHANGE IN SHUTTER SPEED

Look at the marks and figures within the viewfinder. The arrow marks to the left and right indicate the change in shutter speed, and the aperture readings the correct exposure section.



## The needle shows the aperture reading.

Shutter may be clicked at correct exposure.

The needle is not within the correct exposure section.

When the needle is within the arrow mark pointing to the left, turn the shutter ring to the left.

\* Picture can be taken if the shutter speed is changed.

When the needle is within the arrow mark pointing to the right, turn the shutter ring to the right.

\* Picture cannot be taken even though the shutter speed is altered.

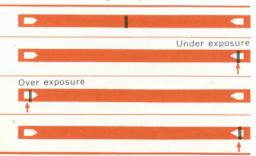
If the needle does not advance to the correct exposure section, the picture cannot be taken. (beyond the range of the exposure meter).

\* When turning the shutter ring (or aperture ring), remove the finger from the shutter button.



When the camera is directed towards the subject, the needle will swing according to the strength of light, indicating the conditions for photographing.

For obtaining the proper exposure, make adjustments according to the diagrams below before taking the picture.



- \* When the stopper catches, do not turn the shutter ring further. (see page 11)
- \* When the needle does not point to the correct

exposure, although the shutter ring is fully turned, it indicates that the subject is either too bright or too dark, beyond the limits of the exposure meter. Taking of pictures under such a condition is not recommended.

- \* As the shutter ring has two arrow marks, turn the shutter ring so that adjustment can be made in the direction of the arrow where the needle of the viewfinder stays.
- \* When the aperture is switched to the manual aperture setting, the needle will stay to the right corner.
- \* The intermediate points of the aperture stops , show F2.8, 11 from the right.
- \* If the film advance lever is not fully wound, the shutter will not click although the shutter button is pressed.
- \* When the background is excessively bright compared to the main subject, or in case taking pictures against the light, there is always the possibility that the main subject is underexposed. Picture may be taken by lowering the film speed index by one stop.

For instance, by setting the film speed at ASA 50 in case the ASA is 100. This procedure should be regarded as an exception, as soon as the picture is taken the film speed index should be returned to its original position. In case even this step is not applicable, switch the aperture setting to manual.

### SELF-TIMER



When the self-timer is used, the shutter will be actuated about ten seconds after the shutter button has been pressed. Follow the instructions below:

- 1 Turn the flash setting lever to X.
- Set the self-timer lever by turning it in 2 the direction of the arrow and then wind the film advance lever.
- **3** Press the shutter button sufficiently downwards.



- Do not move the self-timer lever without turning the flash setting lever to X.
- Press the shutter button from the back of the camera.
  - If you press the shutter button, standing in front of the camera, the exposure will be affected by the shade and you cannot get the properly exposed main subject.
- In case the self-timer is utilized, use the shutter with speed of slower than 1 30 sec. for M type bulb photography.
- \* The self-timer may be used for manually operated aperture.

## MANUALLY OPERATED APERTURE PHOTOGRAPHY



When the AUTO mark of the Canonet S has been removed, the automatic mechanism ceases to function. It is then possible to manually operate the aperture and shutter speed separately. Accordingly, when the effective use of the shutter speed or aperture is desired, or in case it is essential to expose the dark subject for a long time, as well as to regulate the aperture for flash photography, the manual mechanism should be employed. Everything else is operated as usual.

The aperture regulates the amount of light. As the numerical value increases, it gets darker. For each stop of the index, the light decreases by one-half. Thus, when the index is lowered by one stop the exposure time must increase two times, two stops by four times. The ratio between the aper-

ture stop and the amount of exposure, with F2 as the basis is as follows:

Aperture stop: 1.7 2 2.8 4 5.6 8 11 16Exposure ratio:  $1/_{1.38} 1 2 4 8 16 32 64$ 

## Effectiveness of the aperture

\* As the numerical value increases, quantity of light becomes lesser. For each indexed point, the light is reduced one-half.

\* The bigger the numerical value, the deeper the scope of the focusing.

\* The farther the distance of the subject, the deeper is the scope of focusing.

\* On the other hand, the greater the lens opening, the shallower the focus.

The shutter speed adjusts the exposure time. Similar to the lens aperture scale, each index of the shutter speed means double or one-half of the exposure time. So, if you turn the shutter speed ring one stop faster, open the lens aperture one stop.

#### Effectiveness of shutter speed

**High speed:** For preventing blurs, taking a fast moving object, and for effectiveness of use of aperture.

Low speed: For taking dark subjects, using blurs for effects, and for effectiveness of use of deep aperture.

## B (BULB) EXPOSURE



B stands for bulb exposure. Since the shutter remains open as long as the shutter button is being pressed, it is used for long exposures exceeding 1 sec.

- The aperture ring is released from AUTO and set a desired aperture stop.
- Keep the safety stopper release lever in pressed state.
- Turn the shutter speed ring and match B to the indicator.
- Wind the film advance lever and press the shutter button. The B exposure works while the shutter button which keeps the shutter open is being pressed.



- \* Unless the safety stopper release lever is pressed, B index cannot be set to the indicator.
- \* The safety stopper works for the safety device of the EE mechanism. When the shutter ring is turned from B, the safety stopper release lever will get ejected and return to its original position.

#### T exposure

When exposure is being made over an extended period, make the setting at B exposure as explained above. Open the shutter with a lock attached release and lock the release during exposure.

## FLASH SYNCHRONIZATION



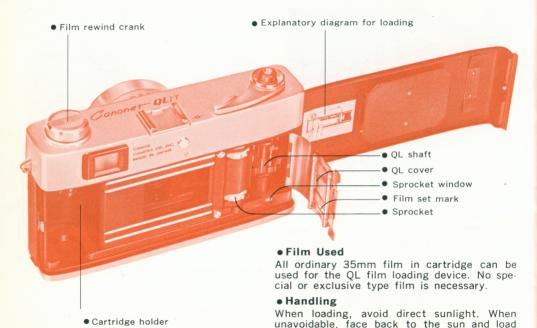
- 1 Attach the flash unit to the accessory shoe, and insert the cord into the flash synchronization socket of the camera.
- 2 For flash bulbs, the M or F classes of bulbs or speedlight may be used. According to the type used, the flash setting lever must be set at either M or X.
- In case of flash photography, the aperture is determined by the guide number. Accordingly, the aperture ring must be removed from AUTO. (EE photography cannot be taken.)



Flash Synchronization Table

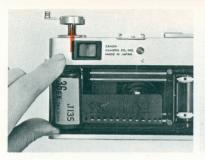
Type   Contact point		Scope of Synchronization		
M class	M	All shutter speeds		
F class	X	Slow speed under 1/60 sec.		
Speedlight	X	All shutter speeds		

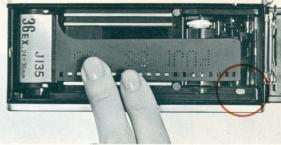
## FILM LOADING QL LOADING METHOD



quickly.

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### 1 Open the back cover.

Pull the back cover lock and the back will rise. Next, open the back cover to maximum. When the back cover is opened, the QL cover also opens simultaneously and is ready for loading the film.

\* The QL cover performs a very important function in film loading. This cover automatically opens and closes together with the opening and closing of the back cover. Do not touch the QL cover.

### 2 Insert cartridge.

Raise the rewinding knob sufficiently

' After the cartridge has been inserted, push the knob back to its former position, and then put the fork into the axis of the cartridge. In case the knob does not fully return, it can be easily put into proper position by turning it slightly to the left or right.

3 Pull film to red mark.

#### 4 Engage the film perforations with the gear.

When doing this, face the cartridge as shown in the picture and hold the film down with the left hand so that it does not 23 rise.

- 5 When the back cover is half-closed, the QL cover presses down on the film. Check through the sprocket window whether the film has been engaged correctly onto the gear.
  - Close the back cover.
    Merely press the cover and it will be firmly locked.
- \* If the film is sagging, the cartridge will rise and the back cover will not close.

## 7 Make two unexposed shots.

Remove the aperture ring from AUTO, and with lens cap still on, wind the film advance lever, releasing the shutter twice. The film counter will advance to 0. With the next advance, the camera is ready for the first shot.

- \* The condition of film feeding can be checked by watching the turning of the rewind knob when the film advance lever is wound. If the film sags, remove the sagging by turning the rewinding crank.
  - 8 Return the aperture ring to AUTO.

## FILM REWINDING







Since no further winding is possible when the end of the film is reached, rewind the film into the original cartridge, as explained below. As the exposed film is naked within the camera, the entire roll will be ruined if the cover is opened before rewinding.

1 Press in the rewind button.

2 Rewind with crank

\* If the exposed film, including the leader part, is rewound completely into the cartridge, there is fear of light leakage into the cartridge when it is taken out of the camera. When rewinding has been completed, the rewind button stops revolving and the resistance on the rewinding crank

becomes slightly lighter. This means that all the film has been rewound except for the leader part. Stop rewinding at this stage.

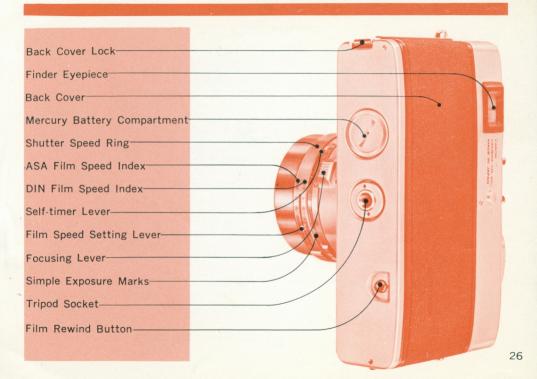
Open the back cover.

A Remove the cartridge.

Remove after raising the rewinding knob completely.

\* Once the rewind button has been pressed, the finger may be removed. When the lever is wound, this button will return automatically.

\* If winding continues even after the film is at an end, the film will tear and rewinding will become impossible. Please be very careful. If this happens, open the back cover in a dark room.



## ACCESSORIES FOR CANONET QL 17 AND CANONET QL 19



#### \* Clamp-on Type Lens Hood

Necessary to shut out the harmful light from outside the field of the picture. It may be inversely put so that the lens cap can be covered.

#### \* Flash Unit V-3

Equipped with interchangeable three-way type socket. Use of PH baseless adapter possible. Highest quality type flash unit with wide use for four kinds of flash bulbs. Head is revolvable.

#### \* Flash Unit J-2

27 All-round type. The AG, and PH baseless adapters may be used.

#### \* Flash Unit J-3

For exclusive use with baseless bulbs. PH, AG socket switching type.

#### \* Flash Quint

Small type flash equipment which illuminates five bulbs in succession. Exclusive AG type.

## \* 55mm Screw-in Type Filters

With plastic case. UV, Y<sub>1</sub>, Y<sub>3</sub>, O<sub>1</sub>, R<sub>1</sub>, G<sub>1</sub>, Skylight, Color Conversion A and B, ND4 and ND8.

#### \* Canon Release

## Bell & Howell GUARANTEE

This new Bell & Howell/Canon product is guaranteed to be free from imperfections in both material and workmanship for one year from date of original purchase. Should any part of this equipment be defective, it will be replaced or repaired free of charge, (except for transportation), provided the equipment has been operated according to the instructions accompanying it.

No liability is assumed for film which is damaged or is unsatisfactory for any reason and no liability is assumed for interruptions in operation of equipment. This guarantee is void:

- a) If equipment has not been registered with Bell & Howell (please use card supplied);
- b) If equipment has been damaged by accident or mishandling;
- c) If equipment has been serviced by other than Bell & Howell approved service station;

The foregoing is in lieu of all other warranties expressed or implied and Bell & Howell Company neither assumes nor authorizes any person to assume for it any other obligation or liability in connection with this product.

\*Location of nearest approved service station will be furnished on request.

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