

**Picture-making
with the
Nos. 2 and 2A
"Brownies"**

**KODAK Ltd.,
Kingsway, London, W.C.2**

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Picture Making with the Nos. 2 and 2A "Brownies."

Loading

"Kodak" N.C. Film for "Brownie" Cameras is supplied in light-tight spools, Fig. 1, and the camera can, therefore, be loaded in daylight. This operation should, however, be performed in a subdued light, not in the glare of bright sunlight.



Fig. 1.
The Film

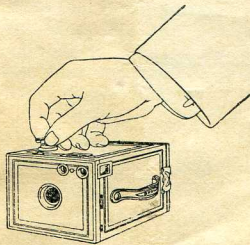


Fig. 2

1. Place the camera on its side before you and pull out the winding key as far as possible. (Fig. 2.).

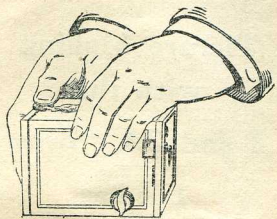


Fig. 3.—Unfastening the Back.

2. Raise the metal catch at the back of the camera. The back will then swing open as shown in Fig. 4. It is hinged securely at the bottom and will not come off.

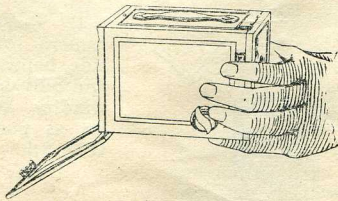


Fig. 4.—Back Open.

3. Hold the camera as shown in Fig. 5, when the Roll Holder will slide out freely; if not, a slight tap on the camera will release it.

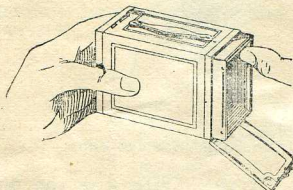


Fig. 5.—Taking out the Roll Holder.

4. Examine the roll holder carefully, and you will see that at the top and bottom near the forward end there are recesses which will just hold a spool of film.

In the lower recess you will see an empty reel, upon which the film will be wound as exposed. This reel is supported by a spring. The other recess is for the new spool, which is also carried in position by a spring. These make the film run true as it is wound forward for successive exposures.

5. Insert the spool of fresh film in the recess marked "Top" (Fig. 6).

On the red paper towards one end of the spool you will also see the word TOP. Insert the spool of film in the recess so that this end is towards the side of the roll holder marked

8. Push back the winding key into position, turning it to the left until fully entered, thus reversing the operation shown in Fig. 2.

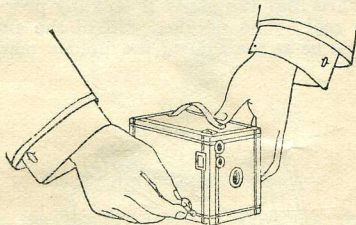


Fig. 9.—Using the Winding Key.

9. Turn the key as before, Fig. 9, until the figure 1 is visible (black on red) through the little red window in the back of the camera, Fig. 10.

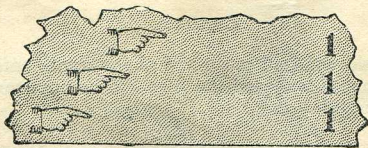


Fig. 10.—The Warning Hand before No. 1.

The film is now in position for the first picture

Making the Pictures

Instantaneous Exposures

(Snapshots)

The lever in front of the winding key works the shutter. When you move the lever from **one** end of its slot to the other you open and close the shutter. See also page 11. In this way you allow light to pass through the lens on to the film and make a picture.

It is important to remember that by moving the lever *one way only*, you both open and close the shutter. You must not move the lever up *and* down to make the exposure.

For instantaneous pictures the subject should be in the open sunlight. You will not get good results if you photograph towards the light or towards the sun. It is a good plan to stand so that the sun shines from **over** your shoulder upon the object.

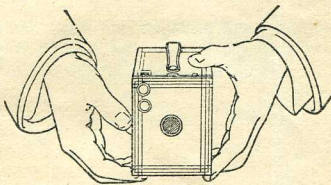


Fig. 11.—Ready for an Upright Picture

Use the Largest Stop

Snapshots can only be made (except as noted in the next paragraph) when the largest stop is before the lens. If a smaller stop is used the light will be so much reduced that it will not sufficiently impress the image on the film and failure will result. In making snapshots both slides A and B shown on page 14 (Fig. 15.) should be pushed down as far as they will go. Slide A controls time and instantaneous exposures, and for snapshots must be down.

Slide B controls the stops, of which there are three; when it is quite down, and flush with the camera, the largest stop is in place. This is the one to use for all snapshots, except where the sunlight is unusually strong, and there are no heavy shadows, such as in very distant views, views on the water or on the seashore, when the middle stop may be used.

The smallest stop must never be used for snapshots or failure will result.

Point the camera towards the object to be photographed and see that the image is in position in the finder. There are two "brilliant" finders, one on the top of the "Brownie" for vertical pictures, and the other, at the right hand side above the lever, for horizontal pictures. Always look into the finder from directly over it, not at an angle.

For a vertical picture the camera should be held as shown in Fig. 11. For a horizontal picture the camera should be held as shown in Fig 12.

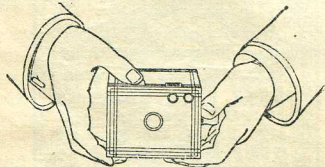


Fig. 12.—Ready for a horizontal Picture.

Any object that does not show in the finder will not show in the picture.

All being in readiness:

hold the Camera steady and level as shown in Figs. 11, or 12, and gently press the shutter lever over to one side with the thumb of the right hand.

This makes the exposure.

To wind a new section of film into position turn the key slowly to the left until the next number is visible through the window.

Repeat the foregoing operations for each picture.

When photographing a high building do not point the camera upwards or the result obtained will be similar to Fig. 13. Stand well away and *keep the camera level*.

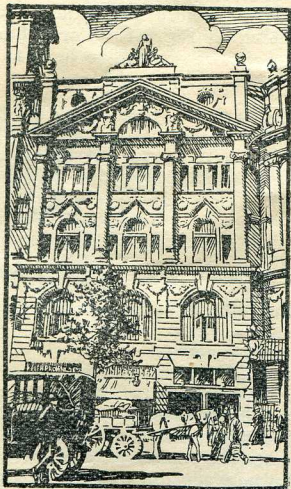


Fig. 13.—Effect produced by tilting the Camera.

Time Exposures Indoors

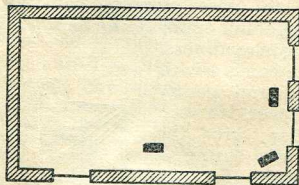


Fig. 14.—Plan of a room showing the windows or doors and three suitable positions for the Camera.

Use some firm support, such as a chair or table, and set the "Brownie" in such a position that it will embrace the view desired, taking care that it is placed close to the edge so that no part of the support is included in the picture. A very suitable and firm support will be found in a "Kodak" Tripod. The tripod screws on to the camera by means of either of the two tripod sockets. Care should be taken not to jog the camera during the exposures.

The diagram (Fig. 14), shows the proper positions of the camera for indoor pictures. It should not be pointed directly at a window as the glare of the light will blur the picture. If all the windows cannot be avoided, pull down the blinds of those within range of the camera.

Pull out the time slide A on the left hand side of the camera front as shown in Fig. 15

When this slide is pulled out the shutter can open but not close, stopping half-way across with the opening opposite the lens.

All being in readiness, steady the camera with one hand and gently press the lever C to open the shutter; give the proper time (using a watch if more than two seconds) and press the lever C in the opposite direction or push in time slide A, to close the shutter.

Turn a new section of film into position as described before. (See page 11.)

For interiors the following table is a good guide:

Time Needed for Pictures Indoors

This table is for the largest stop (about equal to f.16). See pages 10 and 18. When the second stop is used double the time; when the smallest stop is used give four times the exposure indicated in the table.

White walls and more than one window:

bright sun outside, 2 seconds;
hazy sun, 5 seconds;
cloudy bright, 10 seconds;
cloudy dull, 20 seconds.

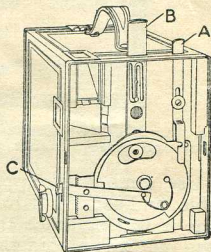


Fig. 15.—The position of slide B when the smallest stop is before the lens.

White walls and only one window:

bright sun outside, 3 seconds;
hazy sun, 8 seconds;
cloudy bright, 15 seconds;
cloudy dull, 30 seconds.

Medium-coloured walls and hangings, and more than one window:

bright sun outside, 4 seconds;
hazy sun, 10 seconds;
cloudy bright, 20 seconds;
cloudy dull, 40 seconds.

Medium-coloured walls and hangings, and only one window:

bright sun outside, 6 seconds;
hazy sun, 15 seconds;
cloudy bright, 30 seconds;
cloudy dull, 60 seconds.

Dark coloured walls and hangings, and more than one window:

bright sun outside, 10 seconds;
hazy sun, 20 seconds;
cloudy bright, 40 seconds;
cloudy dull, 1 minute 20 seconds.

Dark coloured walls and hangings, and only one window:

bright sun outside, 20 seconds;
hazy sun, 40 seconds;
cloudy bright, 1 minute 20 seconds;
cloudy dull, 2 minutes 40 seconds.

The foregoing is calculated for rooms where windows get the direct light from the sky, and for any time from 3 hours after sunrise until 3 hours before sunset.

If earlier or later, the exposure required will be longer.

To Make a Portrait

Place the sitter in a chair partly facing the light and turn the face slightly towards the camera (which should be at the height of an ordinary table). For a head and shoulders picture the camera should be 5 feet from the figure (or with the Portrait Attachment, see below, $3\frac{1}{2}$ feet); for a three-quarter figure 7 feet, and for a full figure 10 feet. The background should form a contrast with the sitter.

Do not use the largest stop when the distance from the camera to the object is less than $13\frac{1}{2}$ feet, unless you are working with a Portrait Attachment.

In making portraits (except with the Attachment) where the subject is less than 8 feet from the camera, use the smallest stop and time accordingly (see page 14). As a general rule, use the middle stop for portraits. Time exposures will have to be given, of course, and a tripod or some similar support used.



Fig. 16.—"Kodak" Portrait Attachment.

"Kodak" Portrait Attachment

By the use of a "Kodak" Portrait Attachment, Fig. 16, the No. 2 and No. 2A "Brownie" may be used to photograph objects as near as $3\frac{1}{2}$ feet, thus enabling you to obtain large head and shoulder portraits.

The largest stop should be used with the portrait attachment.

The attachment is simply an extra lens which slips over the regular lens, and in no way affects the working of the camera. When ordering, to secure the correct Portrait Attachment, please specify "for No. 2 or 2A 'Brownie,'" as the case may be.

"Time" Exposures in the Open Air

Time Exposures must not be made with the camera held in the hands. Always place it upon some firm support, such as a tripod.

When the smallest stop is before the lens (Fig. 15, page 14) the light admitted is so much reduced that time exposures out of doors may be made.

WITH SUNSHINE.—The shutter can hardly be opened and closed quickly enough to avoid over-exposure.

WITH LIGHT CLOUDS.—From $\frac{1}{2}$ to 1 second will be sufficient.

WITH HEAVY CLOUDS.—From 2 to 5 seconds will be required.

The above is calculated for hours from 3 hours after sunrise until 3 hours before sunset and for objects in the open air. For other hours, and for objects in the shadows, under porches or under trees, no accurate directions can be given; experience will indicate the proper exposure.

Stops

The diaphragm openings, apertures or stops should be used as follows:—

The Largest.—For instantaneous exposures.

The Middle.—For instantaneous exposures when the sunlight is unusually strong, and there are no heavy shadows, such as in views on the sea shore, in extremely high, dry climates, or on the water; also for interior time exposures, the time for which is given in the tables on pages 14 and 15.

The Smallest.—For time exposures out of doors in cloudy weather. Not for instantaneous exposures. The time required for time exposures on cloudy days with the smallest stop will range from $\frac{1}{2}$ second to 5 seconds, according to the light.

The smaller the stop the sharper the picture.

When setting the stops always see that the one to be used is brought directly in front of the centre of the lens, where it catches.

If you use the smallest stop for instantaneous exposures failure will result.

The f. values of the stops are approximately:—

The largest f.16. the middle f.20, the smallest f.34.

Backgrounds

When making single portraits or groups, care should be taken to have a suitable background against which the figures will show in relief; a light background is better than a dark one and often a single figure or two will show up well against a curtain. For larger groups a medium light wall will be suitable.

Under-Exposure

A negative is under-exposed when, after correct development, the parts that were well lighted show a fair amount of detail, but the parts that were in the shade lack detail. To avoid this, always calculate your exposure for the dark portions of your picture.

In an extreme case the developed negative does not show detail in either the worst lighted or the better lighted parts of the picture. This means you should have given at least three times as much exposure.

An under-exposure can be made worse by incorrect development. The "Kodak" Film Tank will ensure correct development.

The only remedy for a badly under-exposed photograph is to take the picture over again. Always give sufficient exposure. (See pages 14-17.)

Over-Exposure

This, if not extreme, is a good fault. With correct development there is slightly less contrast between the well-lighted parts of the picture and the shady parts, and, in addition, the negative may take a long time to print. Over-exposure can be corrected in the negative to a great extent by the use of a suitable reducer.

Removing the Film

A dark room is not required when changing the spool in the No. 2 or the 2A "Brownie." This can be done in the open, but to avoid all possibility of fogging the edges of the film it should be done in a subdued light.

1. When the last film, No. 6, has been exposed, give the key about a dozen extra turns. This covers the film with paper again.

2. Have ready an extra spool of film to fit the camera.

3. Open the back and remove the roll holder as shown on pages 3, 4 and 5.

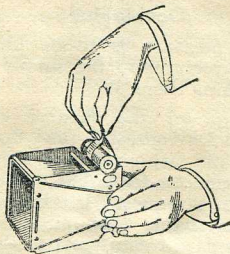


Fig. 18.—Taking out the used Spool.

4. Remove the exposed spool of film by lifting it out from the recess in which it is fastened, and immediately stick down the loose end of the paper with the gummed slip which will be found in the empty reel. Wrap the exposed spool in paper to prevent all possibility of injury by light.

Fig. 18 shows how to do this. The end of the red paper and the white gummed band are grasped, and the spool lifted out.

5. Take the empty reel from the top of the roll holder and transfer it to the winding end, bringing the slotted end, into which the key is to fit, opposite the proper pin.

Load as described on pages 3 to 8.

Developing

As much pleasure is to be obtained by finishing the pictures in the simple "Kodak" way as by taking them.

You will prefer the modern method of developing in Daylight with the "Kodak" Film Tank to the old-fashioned dark room method. Printed instructions for either method will be sent post free on request. It takes many years' experience to enable even an expert to get results in the dark room equal to those which the beginner obtains by the more convenient daylight method.

Printing

For printing in daylight, "Kodatone" Paper is the simplest medium. The pictures merely need treatment in a solution of Hypo and a good wash afterwards; when dry, they are finished.

But for printing with artificial light in an ordinary room, "Velox" is the paper to use. For average negatives of normal contrast use Medium "Velox." When the negatives are lacking in contrast, Vigorous "Velox" is the proper grade; when negatives are contrasty, Soft "Velox" will be preferable.

Enlarging

In nearly all cases pictures are considerably improved by enlargement, and sometimes

more than one delightful picture can be made from different parts of a negative; the full beauty of interesting details, barely noticed in a contact print, is brought out in an enlargement.

Any negative that gives a good contact print will give a good enlargement on "Kodak" Bromide Paper.

With the "Kodak" Auto-Focus Enlarger you can make pictures up to $11\frac{3}{8} \times 7\frac{1}{2}$ ins. from a No. 2 "Brownie" negative, and proportionately larger with No. 2A "Brownie" negatives. You can also enlarge any part of it you choose from $1\frac{1}{2}$ to $3\frac{1}{2}$ times its linear measurements, that is, from $2\frac{1}{4}$ to $12\frac{1}{4}$ times its area. Full particulars of the "Kodak" Auto Focus Enlarger can be obtained on application.

Mounting

Mounting with paste is the common method. "Kodak" Mounting Paste is specially manufactured so that it will have no deleterious effect on the image of any print or enlargement mounted with it.

Eastman Double Coated Mounting tape will be found even more convenient. This is an exceedingly thin paper coated on both sides with a specially prepared adhesive. One side is moistened and attached to the print; then the other side is also moistened in its turn, and the print fixed in position on the mount or in the album.

When large numbers of photographs are to be mounted, dry mounting with "Ademco" Dry Mounting Tissue is recommended. This can be used with an ordinary domestic iron, or, more conveniently, with an "Adhero" Dry Mounting Press.

The ordinary domestic iron can be used as follows: The iron should be just the right heat for ironing starched linen; the tissue is laid over the back of the print and touched with a corner of the iron to attach it to the print. Print and tissue are then trimmed to the required size, and placed in position on the mount; a sheet of clean paper is placed on top and the whole surface is pressed (not ironed) with the hot flat iron.

The most convenient way of heating the iron is to stand it in a pan of boiling water, which must be kept on the boil. On removal from the water the iron will dry in a few seconds. The iron will soon cool and it must be put back frequently into the boiling water. If the tissue does not stick to the mount, it means either that the iron has not absorbed sufficient heat, or that longer pressure is required.

"Kodak" Service

If you have any trouble in getting perfect results with your "Brownie," please ask for a free demonstration at any "Kodak" dealer or "Kodak" branch; if that is not convenient write about your difficulty to Kodak Limited, Kingsway, London, W.C.2.

Kodak Limited employs a staff of demonstrators and experts to see that all photographic problems which "Kodak" owners are unable to solve for themselves are explained.

Don't

Don't forget that the film must not be exposed to white light (daylight, lamplight, etc.) for an instant until after it has been developed and fixed.

Don't try to make instantaneous exposures indoors, in shady verandahs, or on dark days. You will only spoil your film.

Don't fail to read this manual from cover to cover carefully. You will avoid many mistakes.

Don't try to make instantaneous pictures with the small stop before the lens.

Don't leave the camera lying in the sun.

Flashlight Pictures

The opportunities afforded by a "Kodak" Flashlight Outfit for obtaining novel and interesting pictures of home life are too extensive and valuable to be neglected. By the introduction of these Outfits, picture-taking at night has been wonderfully simplified, and it is now possible for anyone to obtain pictures of evening parties, silhouettes and many other

things which, but for flashlight, would be beyond the range of the amateur.

The "Kodak" Flashlight Outfits used with "Kodak" Amateur Flash Powder give a highly actinic flash with a minimum of smoke.

There are two types; the "Kodak" Electric Flashlight Outfit and the "Kodak" Amateur Flashlight Outfit. While the results obtained with each Outfit are the same, the methods of igniting the powder vary. Full instructions are given with each Outfit.

Any "Kodak" dealer will be pleased to show you how simple it is to make flashlight pictures with the "Kodak" Flashlight Outfits.

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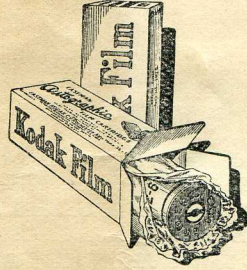
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