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# STEP UP

## FLASH PHOTOGRAPHY

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# USING THE BUILT-IN FLASH

This section explains how to set the built-in flash modes and notes concerning the built-in flash.

## SETTING THE FLASH MODE

The following flash modes can be set:

**Flash ON mode:** The flash fires when you press the shutter release button. (see p.30)

**Red-eye reduction mode:** To make the eye's iris smaller, a low-output flash fires right before the picture is taken. This is to reduce the chances of red eye from occurring in the subject's eyes.

**Automatic flash mode:** When the Programmed AE mode is also set, the built-in flash fires automatically under low-light or backlit conditions.



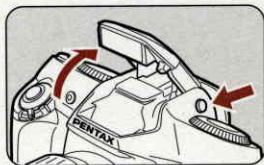
- When using the built-in flash, do not use a lens hood. Doing so will obstruct the flash coverage.
- An external flash can also be made to automatically fire.

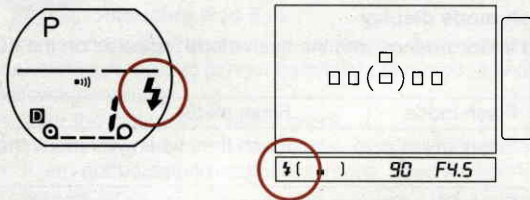
## 1 Activating the built-in flash

- ① Check that the camera is turned on, then press the flash pop-up button.

The built-in flash will pop up and start charging automatically.

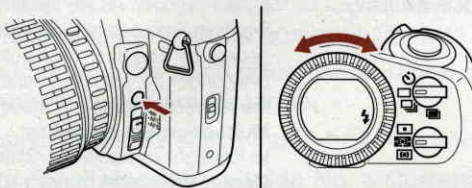
When the [⚡] appears on the LCD panel and in the viewfinder, it indicates that the flash is ready to fire.



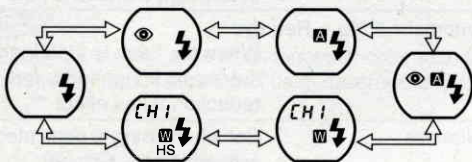


## 2 Setting the flash mode

- ① While pressing the flash-function button, turn the select dial.



The flash mode will be displayed on the LCD panel as shown below.



- Auto flashing [A] can only be selected in the Programmed AE mode.



## Flash mode display

The flash fires in accordance with the flash mode indicated on the LCD panel.

Icon displayed	Flash mode	Flash status
	Flash ON	Flash fires when you press the shutter release button.
+	Flash ON + Red-eye reduction	When the flash is fired in the flash ON mode, red-eye reduction takes effect.* <sup>1</sup>
+	Automatic firing	If the Programmed AE mode is set, the flash fires automatically when necessary. The flash fires automatically under the following conditions in the respective metering mode.* <sup>2</sup> <b>Multi-segment metering:</b> In low-light or backlit conditions <b>Center-weighted metering:</b> In low-light conditions only <b>Spot metering:</b> In low-light conditions only
+  +	Automatic firing + Red eye	When the flash is fired in the automatic firing mode, red-eye reduction takes effect.* <sup>1</sup> , * <sup>2</sup>
	Wireless	Set when using a dedicated wireless flash.  p.96
+ HS	Wireless + high-speed sync	Set when using high-speed sync with a dedicated wireless flash.  p.95

\*1: If red-eye reduction is used while the AF360FGZ, etc. is set as a slave unit, the preflash for red-eye reduction will trigger the slave unit to fire. When using a slave unit, do not use red-eye reduction.

\*2: The automatic flash mode will not work in any mode except Programmed AE. ( p.84).



### Reducing Red Eye

Red eye occurs in flash pictures when the flash reflects off the eye's retina. Although red eye cannot be totally prevented, it can be reduced by the following methods:

- Take the picture in a well-lit place.
- When using a zoom lens, use the wide-angle end and a close distance.
- If you are using an external flash unit, keep it apart from the camera lens as far as possible.

## ADVANCED TECHNIQUES WITH THE BUILT-IN FLASH

This section explains how to calculate the built-in flash's effective range and the compatibility with F and FA lenses.

### ◆ Calculating the flash effective distance according to the camera-to-subject distance.

Calculate the effective flash range as follows:

**For far distances** Guide No.  $\div$  Current aperture

**For near distances** Far distance result  $\div 5^{*1}$

\*1: This formula using "5" as the divider applies only to the built-in flash.



The flash cannot be used at distances shorter than 0.7 m. Doing so will result in irregular or obstructed flash coverage and flash overexposure.

The Guide No. will be as follows depending on the ISO film speed.

ISO Film Speed	Guide No.
ISO25	6
ISO50	8.5
ISO100	12
ISO200	17
ISO400	24

With ISO 100 film and an f/2.8 aperture, calculate the effective flash range as follows:

**For far distances**    Guide No.  $12 \div f/2.8 =$  approx. 4.3 m

**For near distances**     $4.3 \div 5 =$  approx. 0.9

The effective flash range is therefore approx. 0.9 m - 4.3 m.



#### **Calculating the flash aperture from the effective flash range**

Use the effective flash range to calculate the flash aperture as follows:

Guide No.  $\div$  flash range = Flash aperture

If the result is a number (such as 3) that is not a lens aperture value, set it to the next smaller aperture value (2.8).

### **◆ F and FA Lens Compatibility with the Built-in Flash**

The compatibility of F and FA lenses with the built-in flash is explained here.



If an F or FA lens incompatible with the built-in flash is used, pressing the shutter release button when the flash is ready will have the [ ] blink on the LCD panel and in the viewfinder as a warning. (p.32)

If you take a flash picture with an incompatible lens, the corners of the picture may look dark or there may be a dark, semi-circular area on the lower part of the picture

## F and FA Lens Compatibility with the Built-in Flash

○ = Compatible    △ = Vignetting will occur under the usage conditions  
 × = Incompatible because of vignetting

Lens name	Compatibility
F Zoom 17-28mm f/3.5-4.5	×
FA Zoom 20-35mm f/4AL	△ Vignetting will occur at focal length between 20-24mm.
FA Zoom 24-90mm f/3.5-4.5AL (IF)	△ Vignetting may occur if the focal length is 24-28mm.
FA* Zoom 28-70mm f/2.8AL	△ Vignetting may occur if the focal length is less than 35 mm or the camera-to-subject distance is closer than 1 m with the focal length of 40 mm.
FA Zoom 28-70mm f/4AL	○
FA Zoom 28-80mm f/3.5-5.6	○
FA Zoom 28-105mm f/3.2-4.5AL (IF)	○
FA Zoom 28-105mm f/4-5.6 (IF)	○
FA Zoom 28-200mm f/3.8-5.6AL (IF)	△ Vignetting may occur if the focal length is 28 mm or the camera-to-subject distance is closer than 1 m with the focal length of 35 mm.






Lens name	Compatibility
F or FA Zoom 35-80mm f/4-5.6	○
FA Zoom 70-200mm f/4-5.6	○
FA* Zoom 80-200mm f/2.8 ED (IF)	○
F or FA Zoom 80-200mm f/4.7-5.6	○
FA Zoom 80-320mm f/4.5-5.6	○
F or FA Zoom 100-300mm f/4.5-5.6	○
FA Zoom 100-300mm f/4.7-5.8	○
FA* Zoom 250-600mm f/5.6ED(IF)	×
FA 20mm f/2.8	×
FA 24mm f/2 AL(IF)	×
FA 28mm f/2.8	○
FA 31mm f/1.8 AL Limited	○
FA 35mm f/2AL	○
FA 43mm f/1.9 Limited	○
FA 50mm f/1.4, f/1.7	○
FA 77mm f/1.8 Limited	○
FA* 85mm f/1.4 (IF)	○
FA 135mm f/2.8 (IF)	○
FA* 200mm f/2.8 ED (IF)	○
FA* 300mm f/2.8 ED (IF)	×
FA* 300mm f/4.5 ED (IF)	○
FA* 400mm f/5.6 ED (IF)	○
FA* 600mm f/4 ED (IF)	×
FA Macro 50mm f/2.8	○
FA Macro 100mm f/2.8	○
FA Macro 100mm f/3.5	○
FA* Macro 200mm f/4.0 ED (IF)	○
FA Soft 28mm f/2.8	○
FA Soft 85mm f/2.8	○

# USING EXTERNAL FLASH

When the built-in flash cannot provide enough illumination, use a Pentax-dedicated, external flash unit (sold separately). With an external flash unit, you can use TTL auto flash, wireless flash (with the AF360FGZ), or high-speed sync.

## FLASH FEATURES

The features available with the built-in flash or a dedicated, external flash (sold separately) are described below. Check which type your external flash unit is and see which features it has.

Camera Features	TYPE A	TYPE B	TYPE C	TYPE D	TYPE E	TYPE F
Red-eye reduction	○	○	○	×	○ <sup>*1</sup>	×
Automatic firing of the flash	○	○	○	○	○	○
When the flash is ready, the camera switches to the flash sync speed automatically.	○	○	○	○	○	○
In the Programmed AE or Shutter-Priority AE mode, the aperture is set automatically.	○	○	○	○	○ <sup>*2</sup>	○ <sup>*2</sup>
Flash confirmation in the viewfinder	×	○	○	○	×	×
TTL auto flash  p.92	○	○	○	○	○ <sup>*3</sup>	×
P-TTL auto flash  p.92	×	○	×	×	×	×
Slow-speed sync  p.101	○	○	○	○	○	○
AF illuminator	○	○	○	○	×	×
Trailing shutter curtain sync flash <sup>*4</sup>	○ <sup>*5</sup>	○	○	○	×	×
Contrast-control-sync flash mode <sup>*6</sup>	×	○	○	×	×	×
Multiple-burst flash, slave flash	×	○	○	×	×	×
High-speed sync	×	○	×	×	×	×
Wireless flash	×	○	×	×	×	×

TYPE A: Built-in flash

TYPE B: AF360FGZ

TYPE C: AF500FTZ, AF330FTZ

TYPE D: AF400FTZ, AF240FT

TYPE E: AF400T, AF280T, AF220T, AF200T, AF080C, AF140C, AF201SA

TYPE F: AF200S, AF160, AF140

\*1: Available with the AF280T and AF400T, only when the flash confirmation indicator in the viewfinder is off and TTL auto is set.

\*2: With Type E flash units (except AF201SA), use the MS (Manual Sync) or M (Manual) mode. With Type F flash units, use Aperture-Priority AE, manual, or bulb. Programmed AE and Shutter-Priority AE cannot be used because the aperture changes.

\*3: With the AF201SA, TTL auto cannot be used.

\*4: The shutter speed will be 1/90 sec. or slower.

\*5: With Type B or C, and D flash units, trailing shutter curtain sync flash is possible.

\*6: The shutter speed will be 1/60 sec. or slower.

## USING TTL AUTO FLASH

P-TTL auto flash, which pre-fires the flash using the six-segment metering, allows more precise control.

P-TTL is available with external wireless flash.



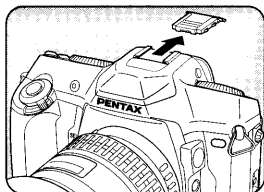
P-TTL auto flash is only available in combination with the AF360FGZ.

### 1 Attaching the Flash

- ① Remove the hot shoe cover FL from the camera.



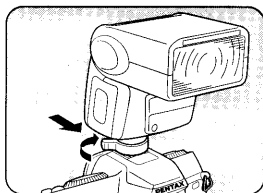
Put the hot shoe cover in the strap's pocket. p.12



- ② Attach the flash unit.

## 2 Set it to the TTL auto mode

- ① Turn on the flash unit's power switch.  
② Set the flash unit's firing mode to TTL auto.



- With the AF360FGZ, the flash mode is always set to P-TTL auto; with any other flash unit, it is set to TTL auto.
- For instructions on how to operate the flash unit, refer to the flash unit's operating manual.

## 3 Taking a Flash Picture

- ① Check that the flash is ready.  
② Focus the subject and take the picture.



- When the flash is ready (fully charged), the [4] will light in the viewfinder when you press the shutter release button halfway down.
- An external flash can also be made to automatically fire. Note that the flash will not fire against an lighter subject especially during day-time sync shooting.

## USING HIGH-SPEED SYNC

With the AF360FGZ, you can use a flash sync speed faster than 1/180 sec. You can use high-speed sync while the flash unit is attached to the camera or in a wireless configuration.

**With high-speed sync.**



## ◆ Using On-Camera Flash

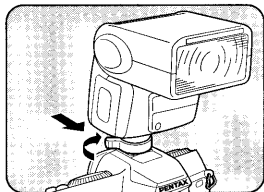
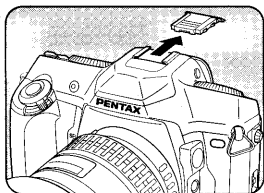
### 1 Attaching the Flash Unit

- ① Remove Hot Shoe Cover FL from the camera.



Store the Hot Shoe Cover in the strap's pocket. p.12

- ② Attach the flash unit.



### 2 Set the flash unit to the HS mode.

- ① Set the flash unit's firing mode to HS (high-speed sync).



For instructions on how to operate the flash unit, refer to the flash unit's operating manual.

### 3 Using High-speed sync.

- ① Check that the flash is ready.
- ② Focus the subject and take the picture.



- When the flash is ready (fully charged), the [ ] will light in the viewfinder when you press the shutter release button halfway down.
- The high-speed sync is only available when the shutter speed is faster than 1/180 sec.

## ◆ Using Wireless Flash

### 1 Positioning the Flash

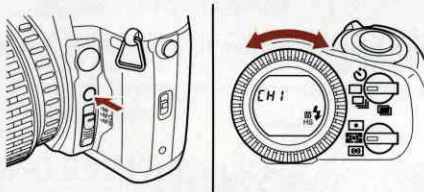
- ① Place the flash unit where you want the flash to fire.
- ② Set the flash unit's power switch to [WIRELESS].
- ③ Set the flash unit's sync mode to HS (high-speed sync).
- ④ Set the wireless mode to S (Slave).



For instructions on how to operate the flash unit, refer to the flash unit's operating manual.

### 2 Set the camera to the HS mode.

- ① Press the flash pop-up button to enable the built-in flash to be used.
- ② While pressing the flash function button, turn the select dial until [W HS] is displayed.




- ③ Check that both the built-in flash and external flash unit are ready.
- ④ Focus the subject and take the picture.



- When the built-in flash is ready (fully charged), the [⚡] will light in the viewfinder when you press the shutter release button halfway down.
- The high-speed sync is only available when the shutter speed is faster than 1/180 sec.

## WIRELESS FLASH

With the AF360FGZ, you can fire a flash without having a cord connection between the camera and flash unit. The high-speed sync mode can also be used with wireless flash.  p.93

### 1 Positioning the Flash

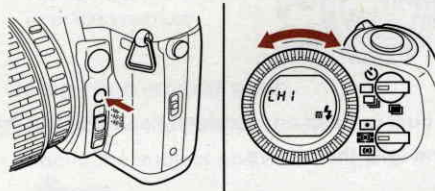
- ① Place the flash unit where you want the flash to fire.
- ② Set the flash unit's power switch to [WIRELESS].
- ③ Set the wireless mode to S (Slave).



For instructions on how to operate the flash unit, refer to the flash unit's operating manual.

### 2 Set the camera to the wireless mode.

- ① Press the flash pop-up button to enable the built-in flash to be used.
- ② While pressing the flash function button, turn the select dial until [W] is displayed.



- ③ Check that both the built-in flash and external flash unit are ready.
- ④ Focus the subject and take the picture.



When the built-in flash is ready (fully charged), the [⚡] will light in the viewfinder when you press the shutter release button halfway down.



### Wireless Flash Control (P-TTL flash mode)

When the AF360FGZ is used for wireless flash, the following process is executed between the built-in flash and AF360FGZ before the flash is fired.

- ① You press the shutter release button completely.
- ② The built-in flash fires a preflash (the camera's firing mode is transmitted).
- ③ The external flash unit fires a preflash (the subject's lighting condition is checked).
- ④ The built-in flash fires a preflash (the required flash output is transmitted to the external flash).
  - \* If HS (high-speed sync) has also been set, the built-in flash will fire another preflash to transmit the flash duration.
- ⑤ The external flash unit fires the flash.



Using the Pentax Function No.10, you can select how the built-in flash is to be used: either as a means of information controller to the external flash or as a flash to affect the exposure.



### Channel Control

For wireless control, channel (e.g. CH1) for the AF360FGZ must be set on the camera. You can do that by attaching the AF360FGZ to the camera, turning on the camera and pressing the shutter release button halfway down.

## USING BOTH THE BUILT-IN FLASH AND EXTERNAL FLASH

To use both the built-in flash and external flash simultaneously, follow the procedure below.

To use both the built-in flash and a dedicated external flash simultaneously, the following accessories (sold separately) are required.

Hot Shoe Adapter FG, Off-Camera Shoe Adapter F,  
Extension Cord F5P

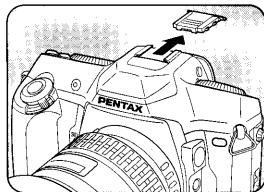


# 1 Attaching a Flash Unit

- ① Remove Hot Shoe Cover FL from the camera.



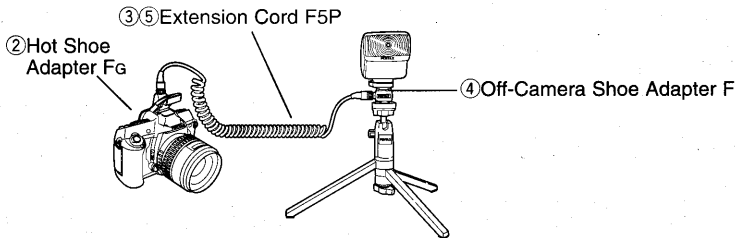
Put the hot shoe cover in the strap's pocket. p.12



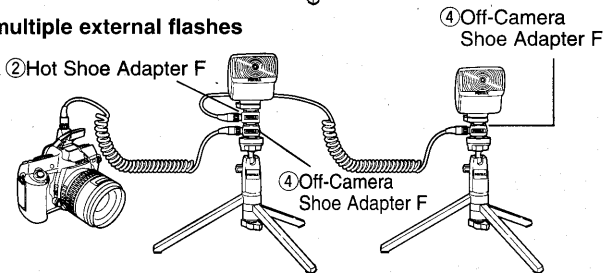
- ② Attach Hot Shoe Adapter Fg to the camera.
- ③ Connect Extension Cord F5P to the Hot Shoe Adapter.
- ④ Attach Off-Camera Shoe Adapter F to a tripod.
- ⑤ Connect Extension Cord F5P to the Off-Camera Shoe Adapter.
- ⑥ Attaching a Flash Unit to the Off-Camera Shoe Adapter.
- ⑦ Press the flash pop-up button.



The AF500FTZ can be connected directly to Extension Cord F5P without requiring Off-Camera Shoe Adapter F



## • Using multiple external flashes



## USING CONTRAST-CONTROL-SYNC FLASH MODE

Using the dedicated external flash in combination with the built-in flash allows twin flash photography (contrast-control-synch flash photography). This is based on the difference between the amount of light discharged from two units.



Contrast-control-synch flash is possible with the following flash units: AF360FGZ or AF330FTZ, AF500FTZ, and the built-in flash.

### ◆ Using the built-in flash and a dedicated external flash.

#### 1 Attaching a Flash Unit

- ① Place the flash unit apart from the camera.



Do not use accessories (such as a hot shoe grip) having a different number of contacts. Doing so may cause misoperation.

- ② Set the flash unit's sync mode to **Contrast-Control-Synch Flash Mode**.



For instructions on how to set the sync mode, refer to the flash unit's operating manual.

#### 2 Take the picture.

- ① Press the flash pop-up button to enable the built-in flash to be used.
- ② Check that the flash is ready.
- ③ Focus the subject and take the picture.



- Between the built-in flash and external flash, the flash ratio will be 1:2 respectively (summed up when the external flashes are more than one).
- When the contrast-control-sync flash mode is used, the maximum flash sync speed will be 1/60 sec.

## ◆ Using Multiple External Flash Units (with no built-in flash)

### 1

#### Ready the Flash Units

- ① Set up the external flash units separated from the camera.



A hot shoe grip, if used, would cause the TTL metering to function improperly. For instructions for connection, see p.98.

- ② Set the required flash units' sync mode to **Contrast-Control-Sync Flash mode**.



Output ratio of the flash is 2 for contrast-control-sync mode to 1 for the other flash mode.

For instructions on how to set the contrast-control-sync mode, see the flashunit's operating manual.

### 2

#### Take the picture.

- ① Check that charging is finished with all the flash units.
- ② Focus the subject and take the picture.



#### External multiple sync flashes

Note the following when you use two or more flashes in sync.

- Use the flashes in the following combinations referring to the "Flash Features" ( p.91).
  - Combine the same type (Type B to F) of flashes.
  - If you use different type combination of flashes, combine Type C and Type D or Type E and Type F.
- You can use any type of combinations of the built-in flashes.

## USING SLOW-SPEED SYNC

When you photograph someone in front of a sunset or dark background, using slow-speed sync flash will result in the proper exposure of both the subject and background. Slow-speed sync can be set with the built-in flash or with any dedicated external flash unit.



With slow-speed sync, a slow shutter speed is used. To prevent camera shake, use a tripod.

### ◆ Using Metered Manual Mode


#### 1 Ready the Flash

- ① If you will use the built-in flash, press the flash pop-up button.



If you will use an external flash, turn on the power.

#### 2 Setting the Metered Manual Mode

- ① Hold down the lens aperture-A lock button and turn the aperture ring to set the aperture.
- ② Turn the select dial to set the shutter speed.  p.62.  
The LCD panel will show "M" (Manual) for the shutter speed.



Check that the flash is ready and that the flash exposure setting is correct.

- ③ Focus the subject and take the picture.

## ◆ Using Shutter-Priority AE

### 1 Setting the Shutter-Priority AE Mode

- ① Hold down the lens aperture-A lock button and turn the aperture ring to [A].
- ② Turn the select dial to set the shutter speed.

### 2 Ready the Flash



Do not ready the flash before setting the shutter speed. First set the shutter speed, then ready the flash. Otherwise, the background will not be exposed properly.

- ① If you will use the built-in flash, press the flash pop-up button.



If you will use an external flash, turn on the power.

### 3 Focus the subject and take the picture.

## WHEN USING FLASH

Cautions for using flash are explained below.

### ◆ Using the built-in flash and a dedicated external flash

- If you use the built-in flash and a Pentax-dedicated external flash simultaneously and set the external flash to trailing shutter curtain sync, the built-in flash will also be set to trailing shutter curtain sync.
- Before taking the picture, make sure both the built-in flash and external flash are ready (fully charged).

### ◆ Using a non-Pentax flash unit

- Using a non-Pentax flash unit may cause a malfunction. Pentax-dedicated flash units are recommended.
- When using studio type flash with the camera, note the polarity of the flash contacts. Some studio type flash units may have reversed polarity which will not work with the camera. For details, consult the manufacturer of the flash.
- When using studio type flash, set a flash sync speed one stop slower than the camera's normal sync speed. This is to prevent a partial flash exposure (part of the picture looks dark).



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# PENTAX FUNCTIONS

The camera provides 19 Pentax Functions so you can set the camera according to your shooting preferences.


## ● Audible PCV Signal Function


- |      |   |   |
|------|---|---|
| [F1] | Enabling/disabling the audible PCV signal |  p.110 |
|------|---|---|


## ● Exposure Functions


- |      |  |   |
|------|--|---|
| [F2] | Setting the exposure program line either Normal, Shutter Speed-Priority, Depth of Field-Priority or MTF-Priority Program Line. |  p.111 |
|------|--|---|

- |      |   |   |
|------|---|---|
| [F3] | Setting the number of auto bracketing exposures |  p.113 |
|------|---|---|


- |      |                                      |   |
|------|--------------------------------------|---|
| [F4] | Setting the auto bracketing sequence |  p.114 |
|------|--------------------------------------|---|

- |      |  |   |
|------|--|---|
| [F5] | During multi-segment metering, the autoexposure reading can be taken or not taken at the point where autofocus is achieved |  p.114 |
|------|--|---|


- |      |   |   |
|------|---|---|
| [F6] | Setting the AF button to only focus or to both focus and obtain an exposure reading |  p.115 |
|------|---|---|


- |      |  |   |
|------|--|---|
| [F7] | Setting the ISO film speed automatically or manually |  p.115 |
|------|--|---|


## ● Autofocus Functions

- |      |   |   |
|------|---|---|
| [F8] | If you cannot focus on the desired focus point, you can select whether you use a neighboring focus point. |  p.116 |
|------|---|---|



## ● Flash Functions

- |      |   |   |
|------|---|---|
| [F9] | Enabling/disabling shutter release before the built-in flash is ready |  p.116 |
|------|---|---|


- |       |   |   |
|-------|---|---|
| [F10] | Setting the built-in flash as a flash or wireless controller in the wireless mode |  p.117 |
|-------|---|---|

- |       |   |   |
|-------|---|---|
| [F11] | Setting the firing method when using the illumination button with the AF360FGZ in the wireless mode |  p.117 |
|-------|---|---|

**● Film Rewind Functions**

- [F12] Setting the film rewind to rewind completely or to leave out the film leader or to leave out the film leader and enable MRC frame advance  p.118
- [F13] Setting the film rewind method (automatic or manual) at the end of the roll  p.119



**● Self-timer Functions**

- [F14] Setting the self-timer delay to 12 sec. or 2 sec. (with mirror lock-up)  p.119

**● Data Imprinting Functions**

- [F15] Setting the film speed for imprinting data  p.120


**● Button and Dial Settings**

- [F16] Focusing with or without the shutter button pressed halfway down.  p.120
- [F17] Setting the select dial's rotating orientation for advancing the numeric value  p.121

**● Lens Mount Index Lamp Function**

- [F18] Enabling or disabling the lens mount index lamp  p.121

**● Remote Control Functions**

- [F19] With the optional battery grip BG-10 attached, setting the remote control button to release the shutter in 3 sec. or immediately (Remote controller for shutter release is optional.)  p.122

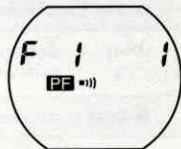
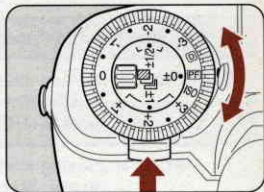
## SETTING PENTAX FUNCTIONS

Follow the procedure below to set a Pentax Function.

### 1 Display Pentax Function No.1.

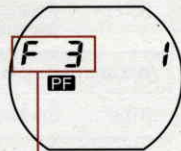
- ① Hold down the lock release button and turn the exposure compensation dial to PF.

"PF" will be displayed on the LCD panel.



- ② Turn the select dial to display the Pentax Function No. you want to set.  
The Pentax Function No. will be displayed on the LCD panel.

**Example:**  
Setting the number of auto bracketing exposures.



Pentax Function No.

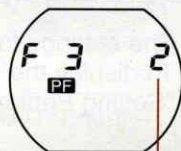
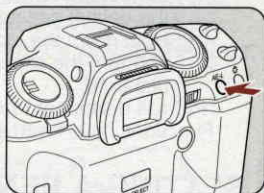
## 2 Display the setting No.

- ① **Press the AE lock button and display the setting No.**

The setting No. will be displayed on the LCD panel.



The LCD panel shows that Pentax Function No. F3 (number of auto bracketing exposures) has been selected and setting No. 2 (two auto bracketing exposures) has been set.

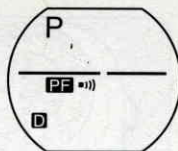


Setting No.

- ② **Hold down the lock release button and turn the exposure compensation dial to "0".**



If your configuration in the Pentax Function is different from the default values, "PF" will be displayed on the LCD panel.



### Resetting the Pentax Functions to the Default Settings

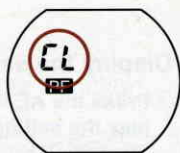
To reset all the Pentax Functions to the default settings, follow the procedure below.

- ① **Hold down the lock release button and turn the exposure compensation dial to PF.**

- ② Hold down the exposure mode button for 2 sec. or longer. "CL" will be displayed on the LCD panel, and all the Pentax Functions will be reset to the default settings.

- ③ Hold down the lock release button and turn the exposure compensation dial to "0".

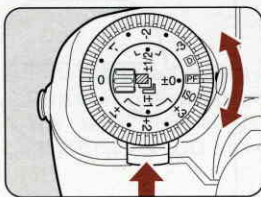
"PF" will disappear from the LCD panel to indicate that no Pentax Functions have been set.



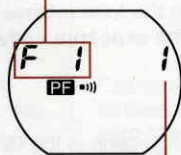
## SETTING A PENTAX FUNCTION

The settings for each Pentax Function are explained below. To display the Pentax Function No. and setting No., see "Setting Pentax Functions."

- ① Turn the exposure compensation dial to PF



- ② Pentax Function No. : Select with the select dial.



- ③ Setting No. : Select with the AE lock button.

### ◆ [F1] Enabling/disabling the audible PCV signal

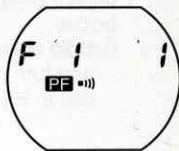
The audible PCV signal's beeping can be enabled or silenced when focus is achieved or an error occurs or film count reaches 30 as film depletion warning.

● Pentax Function No. F1

● Setting No.

[1]...Enables the audible PCV signal.

[2]...Disables the audible PCV signal.



## ◆ [F2] Setting the exposure program line

You can alter the exposure program line so that a faster shutter speed or a smaller aperture is set than when the normal program line is used. This enables you to set the optimum exposure suiting the performance of your FA lens.

● Pentax Function No. F2

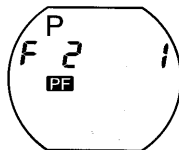
● Setting No.

[1]...Sets the normal program exposure.

[2]...Sets a faster shutter speed  
(Shutter Speed-Priority  
Program Line).

[3]...Sets a smaller aperture  
(Depth of Field-Priority  
Program Line).

[4]...Matches the FA lens performance (MTF-Priority  
Program Line).

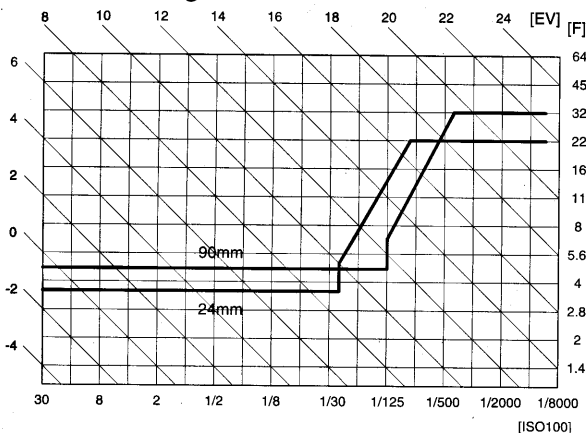


\*The program line differs depending on the lens, and this information is recorded in the FA lens.

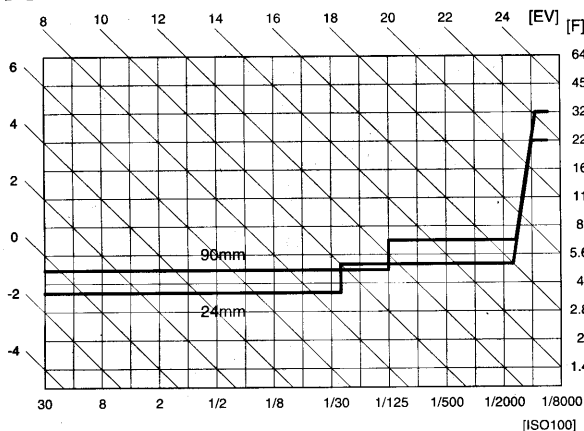


Various program lines for FA24-90 mm lens are shown below.

### [1] Normal Program Line

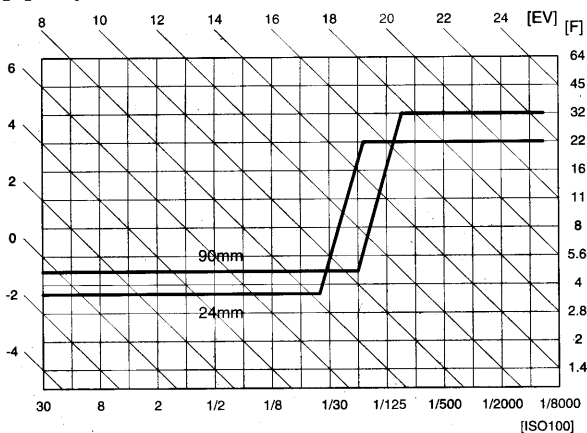


## [2] Shutter Speed-Priority Program Line



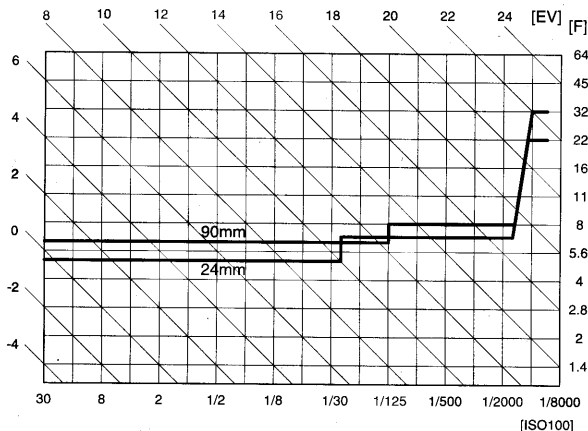
FA24-90mm F3.5-4.5

## [3] Depth of Field-Priority Program Line



FA24-90mm F3.5-4.5

#### [4] MTF-Priority Program Line



FA24-90mm F3.5-4.5

#### ◆ [F3] Setting the number of auto bracketing exposures

You can set the number of auto bracketing exposures.

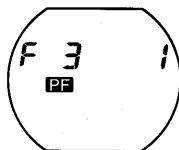
● Pentax Function No. [F3]

● Setting No.

[1]...3 exposures (correct exposure, under exposure, and over exposure).

[2]...2 exposures (correct exposure and under exposure).

[3]...5 exposures (correct exposure, one and two stops under exposure, and one and two stops over exposure).



- The auto bracketing sequence will depend on the Pentax Function No. [F4] setting.



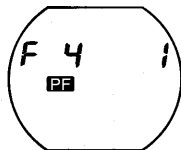
## ◆ [F4] Setting the auto bracketing sequence

You can set the sequence of the auto bracketing exposures.

●Pentax Function No. [F4]

●Setting No.

Setting No	3 bracketed exposures	2 bracketed exposures	5 bracketed exposures
[1]	$[\pm 0] \rightarrow [-] \rightarrow [+]$	$[\pm 0] \rightarrow [-]$	$[\pm 0] \rightarrow [-] \rightarrow [+] \rightarrow [- -] \rightarrow [+ +]$
[2]	$[-] \rightarrow [\pm 0] \rightarrow [+]$	$[-] \rightarrow [\pm 0]$	$[- -] \rightarrow [-] \rightarrow [\pm 0] \rightarrow [+] \rightarrow [+ +]$
[3]	$[+] \rightarrow [\pm 0] \rightarrow [-]$	$[+] \rightarrow [\pm 0]$	$[+ +] \rightarrow [+] \rightarrow [\pm 0] \rightarrow [-] \rightarrow [- -]$



- The number of bracketed exposures will depend on the Pentax Function No. [F3] setting.
- In the above table,  $[\pm 0]$  indicates no bracketing,  $[-]$  indicates under exposure by 1 stop,  $[- -]$  indicates under exposure by 2 stops,  $[+]$  indicates over exposure by 1 stop, and  $[+ +]$  indicates over exposure by 2 stops.

## ◆ [F5] Linking AF and AE at the focus point

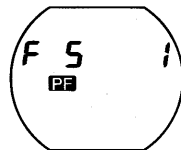
During multi-segment metering, the autoexposure (AE) reading can be taken or not taken at the point where autofocus is achieved.

●Pentax Function No. [F5]

●Setting No.

[1]...Executes autofocus only (no autoexposure reading).

[2]...Executes both autofocus and autoexposure.



## ◆ [F6] Setting both autofocus and autoexposure metering with the AF button

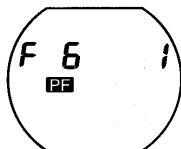
When you press the AF button, you can autofocus only or autofocus and lock the autoexposure reading at the same time.

● Pentax Function No. [F6]

● Setting No.

[1]...Autofocus only (no AE lock).

[2]...Autofocus and AE lock at the same time.



## ◆ [F7] Film speed setting method

The film speed of the DX-coded film can be set automatically or manually.

● Pentax Function No. [F7]

● Setting No.

[1]...Sets the film speed automatically.

[2]...You set the film speed manually.  p.36



## ◆ [F8] Determining the focusing state in the focusing position

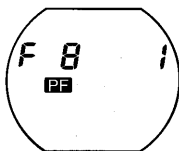
If you cannot focus on the desired focus point, you can select whether you use a neighboring focus point.

● Pentax Function No. [F8]

● Setting No.

[1]...Use a focus point contiguous to the default focus point.

[2]...Do not use a focus point contiguous to the default focus point.



## ◆ [F9] Enabling shutter release before the built-in flash is ready

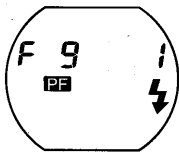
The shutter release button can be enabled or disabled to take a picture before the built-in flash is ready to fire.

● Pentax Function No. [F9]

● Setting No.

[1]...Disables the shutter release button from taking a picture before the flash is ready.

[2]...Enables the shutter release button to take a picture before the flash is ready.



## ◆ [F 10] Setting the built-in flash's function during wireless operation

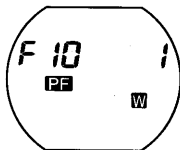
During wireless operation, you can set the built-in flash to function as a flash or wireless controller.

● Pentax Function No. [F10]

● Setting No.

[1]...Sets the built-in flash to operate as a flash.

[2]...Sets the built-in flash as a wireless flash controller.



If the built-in flash is used as a wireless flash controller, the pre-flash emitted by the built-in flash unit does not affect the exposure, only to transmit the exposure information to the wireless flash.

## ◆ [F 11] Setting the illumination button's function during wireless operation

With the AF360FGZ attached to the camera or during wireless flash operation, the illumination button can be set to fire a test flash or modeling flash, the illumination button can be set to fire a test flash or modeling flash.

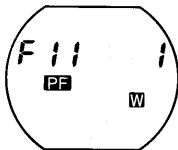
● Pentax Function No. [F11]

● Setting No.

[1]...Disable the flash to fire.

[2]...Sets the illumination button to fire a test flash.

[3]...Sets the illumination button to fire a modeling flash.



## ◆ [F12] Setting the film rewind mode

When the film is rewound, the film leader can be rewound into the cartridge or left out. Or, the film leader can be left out with the MRC frame advance function enabled.

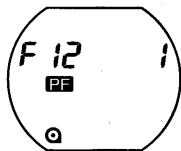
● Pentax Function No. [F12]

● Setting No.

[1]...Rewinds the film completely.

[2]...Leaves out the film leader.

[3]...Leaves out the film leader  
and enables MRC frame  
advance.



### About MRC frame advance

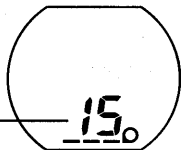
With MRC frame advance (setting No. 3), a partially exposed roll of film can be rewound and loaded again. The camera will then automatically advance the film to the specified frame.

① For Pentax Function No. [F12], use setting No. 3.

② Rewind the partially exposed roll of film and remove it from the camera. (▶ p.35)

\* Before rewinding the film, be sure to  
remember the current frame No. on  
the LCD panel.

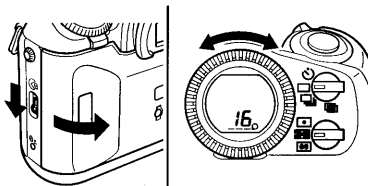
Number of exposures



③ Take pictures with another roll of film.

④ If you want to use the partially exposed film again, open the back cover and turn the select dial while pressing the exposure mode button to display the number of exposures.

\* To prevent double exposure, forward the film by a couple of extra frames by showing the additional number on the LCD panel.



- ⑤ Load the partially exposed film into the camera.

The film will then advance to the frame No. specified with the select dial.

## ◆ [F13] Setting the film rewind method

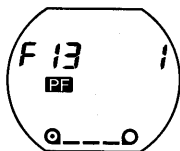
At the end of the roll, the film can be rewound automatically or manually.

- Pentax Function No. [F13]

- Setting No.

[1]...Automatic film rewind at the end of the roll.

[2]...Disables automatic film rewind. (p.35)



\* Press the mid-roll rewind button to rewind the film.

## ◆ [F14] Setting the self-timer delay time

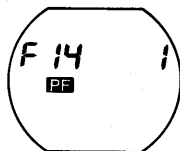
The self-timer delay time can be set to 12 sec. or 2 sec. (with mirror lock-up).

- Pentax Function No. [F14]

- Setting No.

[1]...Self-timer delay of 12 sec.

[2]...Self-timer delay of 2 sec. with mirror lock-up.



### **Memo About mirror lock-up**

During normal picture-taking, the shutter's reflex mirror goes up and creates a slight vibration. With mirror lock-up, the reflex mirror stays up before the exposure starts. This reduces camera shake caused by the mirror's movement. To set mirror lock-up, follow the procedure below:

- ① Set Pentax Function No. [F14] and setting No. 2.
- ② Set the drive switch to [Ⓢ].
- ③ Focus the subject and press the shutter release button.

After the reflex mirror locks up, the picture will be taken 2 sec. later.

AE lock is enabled with the exposure value immediately before mirror lock-up.

## ◆ [F15] Setting the film speed for imprinting data

You can set the film speed for the data to be imprinted on the film.

- Pentax Function No. [F15]

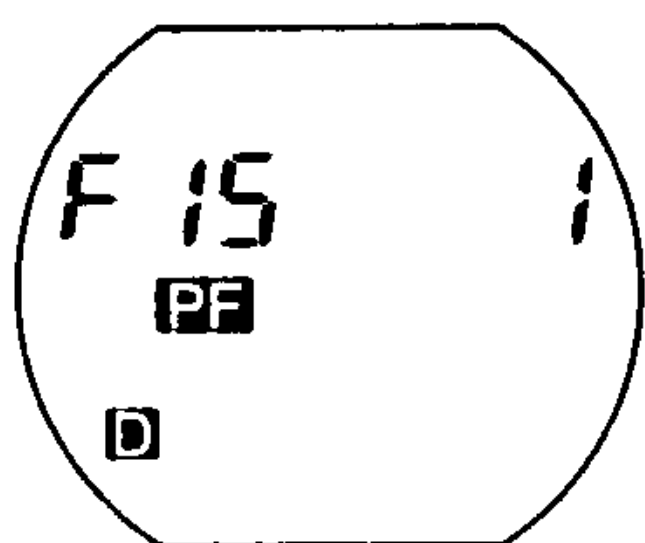
- Setting No.

[1]...Sets the film speed automatically according to the film's DX code.

[2]...Low imprint density (for high-speed film)

[3]...Medium imprint density

[4]...High imprint density (for low-speed film)



Level 4 provides the highest density imprinting.

## ◆ [F16] Enabling or disabling the focusing with the shutter release button pressed halfway down

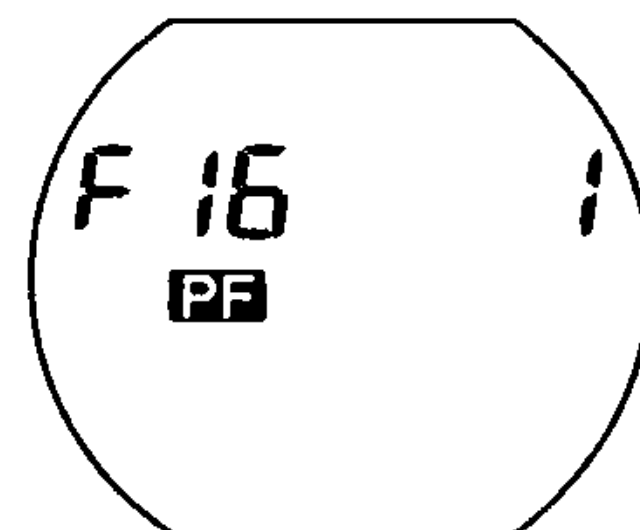
You can set the shutter release button to lock the exposure only or to obtain both the exposure and focus when pressed halfway down.

- Pentax Function No. [F16]

- Setting No.

[1]...Focusing with the shutter button pressed halfway down.

[2]...Focusing without the shutter button pressed halfway down.



When this function is set to [2], focus the subject using the AF button; pressing the shutter release button halfway down will not perform focusing. Leaving the AF button off, your finger will trigger the shutter even if the subject is out of focus. Blurred pictures may result.

## ◆ [F17] Setting the select dial's rotating orientation

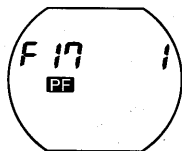
You can set the select dial to advance the numeric value by clockwise or counterclockwise rotation.

● Pentax Function No. [F17]

● Setting No.

[1]...The numeric value advances with counterclockwise rotation.

[2]...The numeric value advances with clockwise rotation.



## ◆ [F18] Enabling/disabling the lens mount index lamp

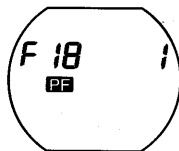
You can set the lens mount index lamp to light up when the lens unlock button is pressed.

● Pentax Function No. [F18]

● Setting No.

[1]...Sets the lens mount index lamp to light.

[2]...The lens mount index lamp does not light.



If you use the mount adapter K, set this function to [2] because the lens mount index lamp remains turned on.



## ◆ [F19] Setting the remote control button's shutter release time

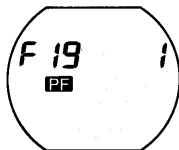
Pressing the remote control button takes the picture 3 sec. later or immediately.

● Pentax Function No. [F19]

● Setting No.

[1]...Shutter release after 3 sec.

[2]...Immediate shutter release.



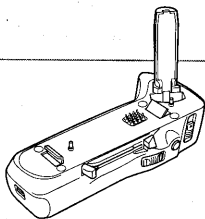
If you use remote control, optionally available Battery Grip BG-10 and the Remote Control Unit are required.

# ACCESSORIES (OPTIONAL)

A number of dedicated accessories are available for this camera.

## ■ BATTERY GRIP BG-10

Battery grip powered by size-AA batteries and dedicated to the MZ-S. A vertical-grip shutter release button is also provided for easier operation.



## ■ CABLE SWITCHES

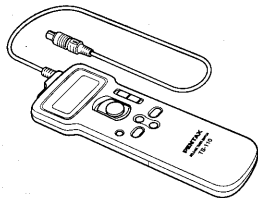
### Cable Switch CS-105/CS-130

Shutter release cable dedicated to the MZ-S. It comes in two lengths: 0.5 m (CS-105) and 3 m (CS-130).



### Release Timer Switch TS-110

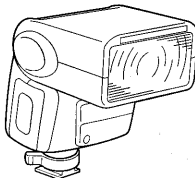
MZ-S-dedicated shutter release cable for interval and timer shooting.



## ■ FLASH ACCESSORIES

### AF360FGZ

TTL auto flash unit with Guide No. 36. Features include slave-sync flash, multiple-flash burst, contrast-control-sync flash, and leading/trailing curtain-sync flash. Together with the MZ-S, high-speed sync and wireless flash can be used.



## ■ VIEWFINDER, LENS AND CLOSE-UP ACCESSORIES

### Magnifier FB

Magnifies the image at the center of the viewfinder.

### Refconverter A

Right angle finder which attaches to the grooves on both sides of the viewfinder. The viewfinder magnification is able to switch from 1X to 2X.



While attached, it may obstruct the opening/closing of the camera back. First detach the Refconverter A before opening/closing the camera back.

### AF Adapter 1.7X

An adapter for autofocus photography using a non-autofocus lens with a maximum aperture of f/2.8 or larger.

### Filters

Skylight, Cloudy, UV, Y2, O2, R2 and Circular Polarizing Filter are available in sizes of 49mm, 52mm, 67mm and 77mm.



- Since the camera's autofocus mechanism uses a semi-transparent mirror, using a non-circular polarizing filter may throw off the autofocus-ing and exposure metering precision. When using autofocus, a circular polarizing filter is recommended instead. This will also maintain exposure metering precision.
- When you attach/detach Adapter K (for the 645 lens) to the camera, the adapter's screw should not contact the camera body. If necessary, change the screw's position.

### Auto Extension Tube K

A set of three tubes. A close-up accessory placed between camera and lens. Supports automatic aperture and metering with maximum aperture.

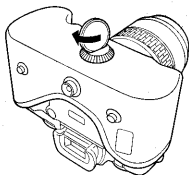


Note that Auto bellows A cannot be used with this camera because it cannot be fitted to it.

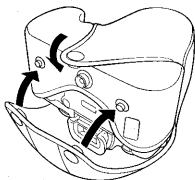
## ■ CAMERA CASE CF-10

The soft case for MZ-S is available as an option and consists of a front and a back cover.

- ① **Fasten the back cover to the camera body by tightening the fitting screw in the tripod socket.**



- ② **Attach the front case.**



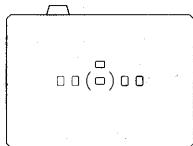
Front case comes in three sizes of S, M and L. Choose one according to your lens being used.

## ■ INTERCHANGEABLE FOCUSING SCREEN

The focusing screens are available as an option for this camera

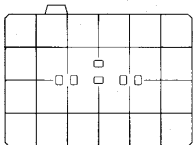
### **GF-60 (Matte field with autofocus frame)**

Useful for general photography.



### **GG-60 (Matte field with cross hairs)**


Designed for determining the composition. With penciled grid lines (6mm<sup>2</sup> squares) for alignment.



## ■ CAMERA FUNCTIONS AVAILABLE WITH VARIOUS LENSES

FUNCTION	Lens [Mount type]	FA lens [K <sub>AF</sub> /K <sub>AF2</sub> ]	F lens [K <sub>AF2</sub> ]	A lens [K <sub>A</sub> ]	M lens [K]	S lens [Screw]
Autofocus (Lens only)		○	○	×	×	×
(Lens with AF Adapter 1.7X)		—	—	○*1	○*1	×
Manual focus (with F1)*2		○*3	○*3	○*3	○*3	×
(with Matte field)		○	○	○	○	○
Six focus points		○	○	×	×	×
Power zoom		○*4	×	×	×	×
Programmed AE		○*5	○*5	○	×	×
Aperture-Priority AE		○	○	○	○	○
Shutter-Priority AE		○*5	○*5	○	×	×
Metered Manual		○	○	○	○	○
TTL Auto Flash		○	○	○	○	○
Multi(6)-segment metering		○	○	○*6	×	×
Approx. f-stop indication		○	○	×	×	×



- NOTE**
- \*1. Lenses with a maximum aperture of f/2.8 or larger. (See AF Adapter operating manual.)
  - \*2. Manual focusing using the focus indicator (FI) (  ) in the viewfinder.
  - \*3. Lenses with a maximum aperture of f/5.6 or larger.
  - \*4. Pentax-FA zoom lenses with the power zoom contacts only (K<sub>AF2</sub> mount).
  - \*5. Exception of Pentax-FA Soft 85mm f/2.8 and FA-soft 28mm f/2.8.
  - \*6. With A50mmf/1.2, the center-weighted metering or Spot metering is used instead of the multi-(6) segment metering mode.
  - \*7. Multi(6)-segment metering, if selected, will be switched to center-weighted metering.

# TROUBLE SHOOTING

Before requesting service, please check the following points.


## ◆ Nothing is displayed on the LCD panel.

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**Check 1: Power is OFF.**

**Countermeasure** Turn the power switch to ON (  22).

**Check 2: Batteries are not inserted or inserted backwards.**

**Countermeasure** Check the insertion direction of the batteries and insert the batteries correctly (  13).

**Check 3: The batteries are exhausted.**

**Countermeasure** Replace the batteries with new ones (  13).


## ◆ Shutter does not trip.

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**Check 1: Power is OFF.**

**Countermeasure** Turn the main switch to ON (  22).


**Check 2: Batteries are not inserted or are inserted backwards.**

**Countermeasure** Check the insertion direction of the batteries and insert the batteries correctly (  13).

**Check 3: The "Battery Warning" is blinking.**

**Countermeasure** Replace the batteries with new ones (  13).

**Check 4: The exposure compensation dial is set to the [D] position, [PF] position or [ISO] position.**

**Countermeasure** Set the exposure compensation dial to a position other than the [D] position, [PF] position or [ISO] position. (  65)


**Check 5: The built-in flash is charging.**

**Countermeasure** Wait until charging is finished (  32).

## ◆ Subject is out of focus.

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**Check 1: The subject to be focused on is not inside the AF frame.**

**Countermeasure** Cover the subject you wish to photograph within the AF frame before shooting (  27).

**Check 2: The picture-taking distance is too close.**

**Countermeasure**

Move away from the subject to be photographed ( 73).

**Check 3:**

**The subject is not suited for autofocus ( 75).**

**Countermeasure**

Use focus-lock to focus on a subject which is about the same distance as the subject to be photographed (page 81), or set the focus mode switch to the [MF] position and then use the mat screen to focus manually ( 76)

**Check 4:**

**The focus mode switch is at the [MF] position.**

**Countermeasure**

Use the focusing indicator and mat screen to adjust the focus manually (see page 77). Or set the focus mode switch to the [AF.S] position before taking pictures ( 74).

**Check 5:**

**The focus mode switch is at the [AF.C] position.**

**Countermeasure**

In the [AF.C] (continuous mode) position, the camera continues to focus on the subject to be photographed so that the shutter might be tripped even in a unfocused state ( 74).

**Check 6:**

**The focus point is not set for the subject to be focused on.**

**Countermeasure**

You can select the focus point position where you wish to focus ( 72).

**Check 7:**

**The subject to be focused on is outside the range of focus point.**

**Countermeasure**

First focus within the range of focus points on the subject you wish to photograph and then set the focus (focus lock) ( 80).

## ◆ Auto-Focus does not function even when the shutter button is pressed halfway down .

**Check 1:**

**Pentax function No.16 has been set to [2].**

**Countermeasure**

If the setting number [2] is set with Pentax function No. 16, focusing is not possible by pressing the shutter button halfway down. Press the AF button to adjust the focus. When focusing by pressing the shutter button halfway down, set to setting number [1] with Pentax Function No. 16.

## ◆ Exposure counter is not displayed or does not advance.

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**Check 1:** [E] is blinking on the LCD panel.

**Countermeasure** Film has not been loaded properly. Load the film again (📖 20).

**Check 2:** Camera is set to multiple exposure photography

**Countermeasure** If the drive switch is set to multiple exposure, pictures are taken repeatedly on the same frame. Set to another picture-taking mode (📖 49).

## ◆ Film does not rewind automatically when finished.

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**Check 1:** Pentax function No.13 has been set to number [2].

**Countermeasure** If setting number [2] is set with Pentax function No. 13 the film does not rewind automatically (📖 119). Press the rewind button to rewind the film.  
For automatic rewind when the film is finished, set setting number [1] with Pentax function No. 13.

## ◆ The shutter speed and aperture value are blinking in the viewfinder.

---

**Check 1:** When set to the Programmed AE Mode.

**Countermeasure** The subject to be photographed is either too bright or too dark. If too bright, point the camera to a slightly darker area. If the subject is too dark, point the camera to a slightly brighter area (📖 58).

**Check 2:** When set to Shutter-Priority AE Mode (shutter speed blinks)

**Countermeasure** The subject to be photographed is either too bright or too dark. If too bright, If too bright, increase the shutter speed. If too dark, decrease the shutter speed (📖 60).



**Check 3:** If set to the Aperture-Priority AE Mode (shutter speed blinks).

**Countermeasure**

The subject to be photographed is either too bright or too dark. If too bright, set the aperture value to the small aperture side (with higher numbers). If too dark, set the aperture value to the open side (with lower numbers) (📖 62).

## ◆ The exposure and shutter speed cannot be changed.

**Check 1:** The HOLD switch is on the right.

**Countermeasure**

If the HOLD switch is on the right, the exposure mode and shutter speed cannot be changed, even by adjusting the select dial or pressing the exposure mode reset button. Put the HOLD switch on the left side (📖 57).

## ◆ The built-in flash does not fire.

**Check 1:** The built-in flash is charging.

**Countermeasure**

Wait until charging is finished (📖 32).

**Check 2:** The "Battery Warning" symbol is blinking.

**Countermeasure**

Replace the batteries with new ones (📖 13).

**Check 3:** The flash mode is set to [A] (auto flashing mode).

**Countermeasure**

If the subject to be photographed in the auto flash mode is bright, the flash will not light. Set to the flash ON mode to cause lighting even for bright subjects (📖 84).

## ◆ Imprinting exposure data on negative is faint.

**Check 1:** Imprinting data information on a picture is faint.

**Countermeasure**

Replace the data back's battery (CR2025) (📖 42).

**Check 2:** Imprinting exposure data on the negative is faint.


**Countermeasure**

Adjust the printing density level with Pentax function No.15 (📖 120).

# SPECIFICATIONS TABLE

● Type	TTL autofocus, auto-exposure multi-mode 35mm SLR with built-in TTL auto flash (RTF)
● Format	24 x 36mm
● Usable Film	35mm perforated cartridge film. DX-coded film with ISO 25-5000; non-DX coded films with ISO 6-6400
● Exposure Modes	Programmed AE Mode, Shutter-Priority AE Mode, Aperture-Priority AE Mode, Metered Manual Mode, Bulb Mode, TTL Flash Mode
● Shutter	Electronically controlled vertical-run focal-plane shutter, Electromagnetic release, Speed range: (1)Auto 1/6000-30 sec.(stepless),(2)Manual 1/6000-30 sec.(3)Bulb,
● Lens Mount	Pentax KAF2 bayonet mount (K-mount with AF coupler, lens information contacts and power contacts), Lens mount index lamp equipped.
● Compatible Lens	Pentax KAF2-, KAF-, KA-, and K-mount lenses are usable. Autofocus is possible using AF Adapter with KA-and K-mount lenses.
● Autofocus System	TTL phase-matching multi-(6 points) autofocus system switchable to Spot focusing, AF operational brightness range: EV -1 to 18(at ISO 100 with f/1.4 lens), Focus lock available using shutter release button/AF button, Focus Mode: AF.S(single), AF.C(predictive AF), Manual[MF]. Possible to select the focus point.
● Power Zoom	3-Speed Power Zoom lens with built-in motor with FA zoom lens with KAF2 mount.
● Viewfinder	Fixed pentaprism, Interchangeable Natural-Bright-Matte focusing screen, Field of view:92%, Magnification:0.75X(with 50mm f/1.4 lens at infinity ), Diopter: -2.5 to +1.5m <sup>-1</sup>
● Viewfinder Indication	Focus Information: In-focus (Green lamp [●] is lit), front or back focus signals and unable-to-focus indicator (Green lamp blinks), Shutter speed indication, Aperture indication, Flash ready indication [⚡] is lit, Bar graph=exposure compensation, Over or Under exposure indication in Manual Exposure Mode, [✱] AE lockindicator

● External LCD panel Indication	[P]=Programmed-AE Mode, [Tv]=Shutter-Priority AE Mode, [Av]=Aperture-Priority AE Mode, [M]=Manual Exposure Mode, [bu]=Bulb Mode, Film speed=6 - 6400, ISO indication, Shutter Speed, Aperture value [D]=Setting Exposure imprint mode, [O---O]=Film status information, [BATT]=Battery exhaustion warning, [BATT]=Built-in flash ready indication, [BATT]=blinking slowly flash recommended warning, [BATT]=blinks rapidly Inappropriate lens warning, [RE]=Red-eye reduction flash mode, [A]=Automatic flash function, [W]=Wireless flash mode, [HS]=High-speed flash sync mode, Film counter=0-99, [PF]=Pentax function, [PCV]=PCV signal indication, Illumination for LCD panel
● Preview Button	Electronically controlled type and possible to use in all exposure modes
● Self-timer	Electronically-controlled type with delay time of 12 sec. or 2 sec delay when mirror-lock up in use. Start by depressing of shutter release button, Operation confirmation: Possible to set PCV beep tone by Pentax function. Cancelable after operation.
● Auto bracketing	Three frame consecutive shots with exposure bracketing in 1 EV or 0.5 EV step. increment, Possible to change the sequence and number of auto bracketing exposure by Pentax function. Possible to use with exposure compensation
● Mirror	Quick-return mirror with AF secondary mirror. Mirror lock-up is possible with 2 sec. delay self-timer.
● Film Loading	Film advances automatically to 1st frame after back cover is closed, Film information window is provided.
● Film Wind & Rewind	Auto wind/rewind by built-in motor, Consecutive or Single advance mode, Approx.2.5 frames/sec.(consecutive mode), Auto rewinding starts at end of roll, Film rewind/completion of rewinding is displayed on the LCD panel, mid-roll rewind button will rewind film in mid-roll.
● Exposure Meter	TTL multi(6)-segment metering, Metering range from EV0 to EV21 at ISO100 with 50mm f/1.4 lens, Center-weighted and Spot metering mode can be set.
● Exposure Compensation	±3EV in 0.5EV step increments
● AE lock:	Set by AE lock button, current exposure value remains for 20 sec. With the shutter release button pressed halfway down pressed, the exposure value remains continuously.

● Imprinting exposure data	Possible to imprint the exposure data on the outside of the picture frame. Possible to imprint the total number of rolls taken, ISO film speed, exposure density, exposure mode, metering system, shutter speed, aperture, exposure compensation value, auto bracketing exposure.
● Flash	Series-control, Retractable TTL Auto Flash (RTF), Guide number: 12 (ISO100/m), Illumination angle covers 24mm lens angle of view, Flash-sync-speed in the range from 1/180 to a slower speed, Slow-speed-sync flash, Contrast-control-flash sync (ISO range=25-800), Automatic flash discharge, Red-eye reduction flash function
● Flash sync	Hot shoe with X-contact with couples with Pentax dedicated auto flashes, ISO range=25-800, Flash-sync-speed in the range from 1/180 to a slower speed. Possible to use high-speed sync, wireless flash mode with AF360FGZ.
● Pentax function	19 user-defined functions
● Power source	Two 3V lithium batteries (CR-2 or the equivalent)
● Battery Exhaustion Warning	Battery exhaustion symbol [  ] is lit (blinking when the shutter is locked; no indication on the right-hand edge of the viewfinder.)
● Dimension and Weight	136.5mm(W) × 95mm(H) × 64mm(D) (5.4" × 3.7" × 2.5") 520g (18.3 soz) body only without batteries
● Supplied Accessories	Hot Shoe Cover FL, Release Socket Cap, Camera Strap FG, Eye Cup FL, Finder Cap
<b>About Back Cover</b>	Crystal quartz controlled; LCD with digital clock, auto calendar up to 2049.
● Data printout	7-segment, 6-digit LCD
● Printout confirmation	"—" indication blinks for a few seconds on LCD panel.
● Printing mode	① Year/month/day, ② day/hour/minute, ③ "---", ④ month/day/year, day/month/year
● ISO range	ISO 25-1600 (automatic setting)
● Power source	CR2025 (lithium battery)
● Number of prints	Approx. 5,000

SPECIFICATIONS ARE SUBJECT TO CHANGE AT ANY TIME WITHOUT NOTIFICATION OR ANY OBLIGATION ON THE PART OF THE MANUFACTURER.