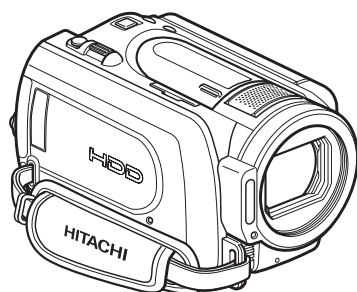


# Quick Operation (English)

**HITACHI**  
Inspire the Next

## DZ-HD90

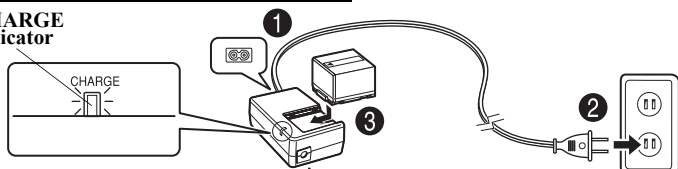


**S HDMI™**

## ■ Setting up the battery pack

Charging status	CHARGE indicator
During charge	Lit
Charge complete	Unlit

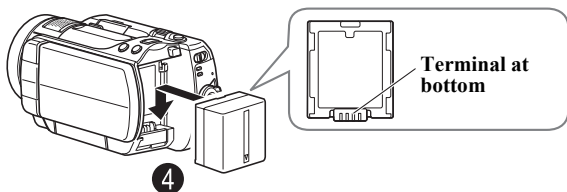
CHARGE indicator



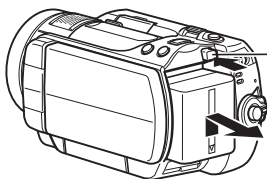
If the CHARGE indicator does not light, check that the connections (1, 2, and 3) are firmly made.

**Note**  
Charging will not occur if the DC power cord is connected.

- 4 After charging is complete, attach the battery pack to the camcorder.

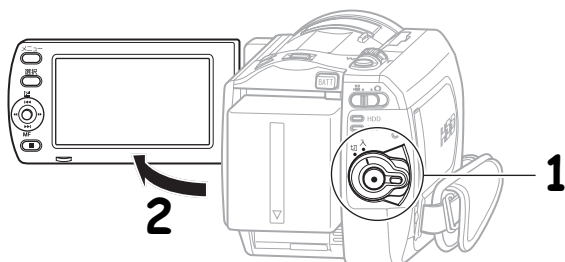


## ■ Removing the battery pack



- 1 Always turn the power off before disconnecting the power supply.
- 2 While pressing and holding the BATT switch, slide the battery pack upward, then remove it.
  - Be careful not to drop the battery pack while detaching it.

# Turning on the Power

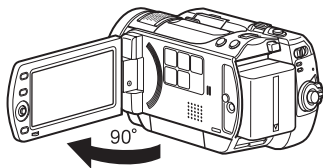


**1** Turn on the power.



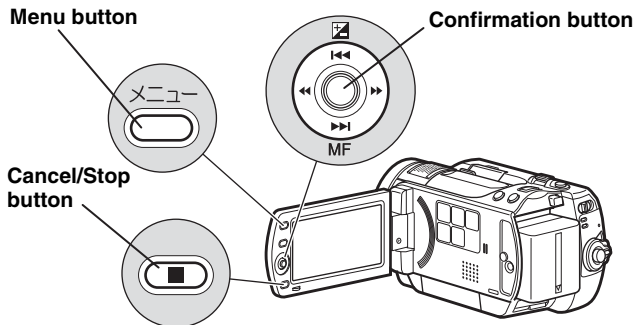
Press and hold the lock button, and turn the power switch to "入".

**2** Open the LCD monitor.

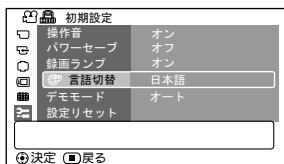


# Changing the display language (LANGUAGE)

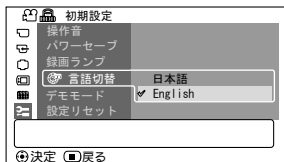
You can change the language used on screens and menus.  
The following shows how to change from Japanese to English.



- 1 Press the menu button, then select "初期設定" by pressing **◀▶▶▶**. Then, press **▶▶▶** (or the confirmation button).



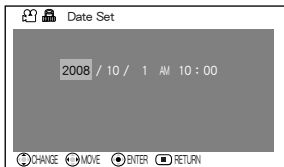
- 2 Select "言語切替" by pressing **◀▶▶▶**, then press **▶▶▶** (or the confirmation button).



- 3 Select "English" by pressing **▶▶▶**, then press the confirmation button.

# Setting the Date and Time

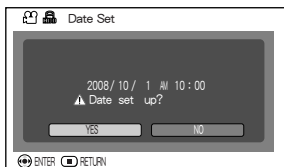
- 1 Press the menu button, then select "Date Setup" by pressing **◀▶▶▶**. Then, press **▶▶** to select "Date Set" and press the confirmation button again.



- 2 Select each item by pressing **◀▶▶▶** and set the correct value by pressing **◀▶▶▶**.

- Repeat this step until year, month, date, hour, minute, and AM/PM are correctly set.

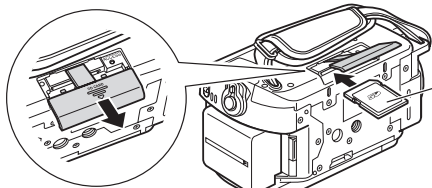
- 3 Press the confirmation button. The confirmation screen appears.



- 4 Press **◀◀** to select "YES", then press the confirmation button to confirm.

- If you select "No" and press the confirmation button, the screen returns to step 2.

## Inserting and Removing Card (When recording still pictures)



Label side

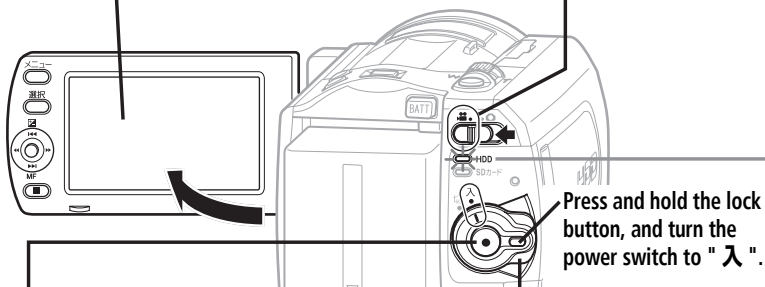
Insert the card with the label side face up.

- 1 Always turn off the power before inserting a card.
- 2 Open the cover.
- 3 Push the card in until it clicks into place.  
(To remove the card, push it in slightly and release.  
The card will pop up, and you can remove it.)
- 4 Always close the cover.

# Recording Movies

**1** Slide the Movie/Stills switch to "🎬".

**2** Open the LCD monitor.



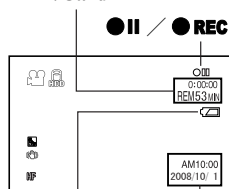
**3** Turn the power switch to "入".  
The HDD indicator lights and the camcorder enters recording pause mode. Movies will be recorded to HDD.

**4** Press the record button.

- "●II" (recording pause) in the LCD monitor will change to "●REC" and recording will begin. The recording indicator beneath the lens will also light up red.
- To pause recording, press the record button again. The elapsed recording time will reset to "0:00:00".
- To resume recording, press the record button again.

Elapsed recording time (hrs : mins : secs)

Remaining space on HDD/Card



Remaining battery level

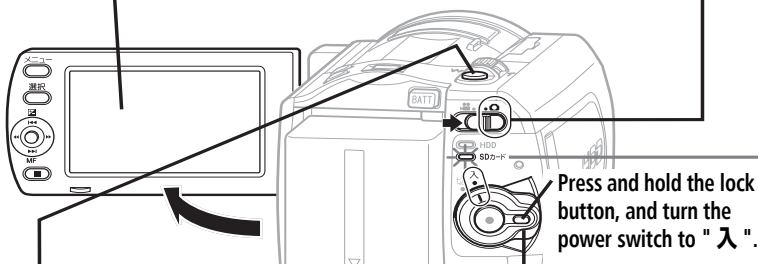
Current time

## Recording Still Pictures

Still pictures are recorded on an SD memory Card.

**1** Slide the Movie/Stills switch to "📷".

**2** Open the LCD monitor.



**3** Turn the power switch to "入".

- The SD card indicator lights.
- Switch to "切", to turn off.

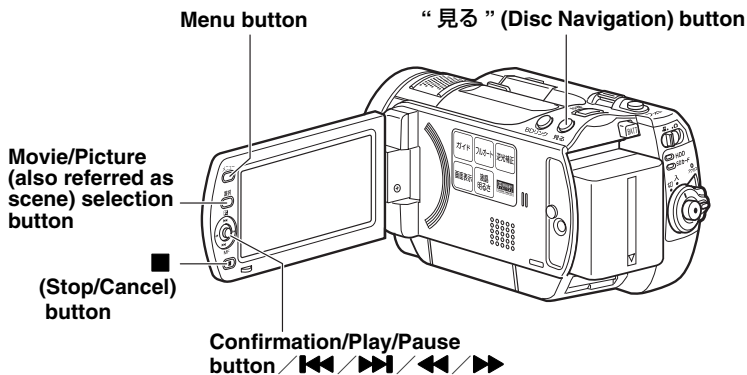
**4** Press the "フォト" (photo) button halfway down.

A subject in the center of the screen will be focused. When focus is locked, the green "●II" in the LCD monitor will turn purple.

**5** Fully press the "フォト" (photo) button.

The image will be recorded. After a few seconds, the image shot will be displayed for about three seconds. You can shoot the next photo when "●II" changes back to green.

# Playback



HDD CARD

## ■ Choosing and playing back a scene

- 1 Press the “見る” button while the media you want to play back is in recording pause mode.

The scenes thumbnails appear on the disc navigation screen.

- 2 Choose a scene by pressing ⏪/⏩ (up/down, previous page/following page) and ⏴/⏵ (left/right).

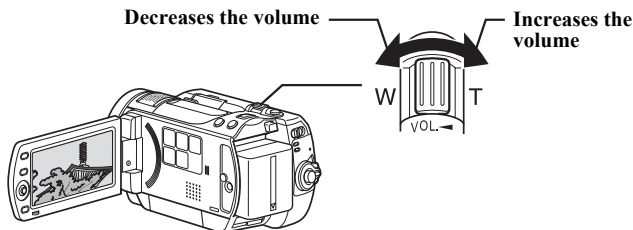
- 3 Press the confirmation button.

The chosen scene is played back.

- To promptly return to the disc navigation screen, press ■ or the “見る” button. To return to recording pause mode, press ■ or the “見る” button again.

HDD

## ■ Adjusting speaker volume during movie playback





# Useful Recording Techniques

HDD CARD

## Magnified Recording (Optical Zoom and Digital Zoom)

The zoom lever allows you to choose a range of magnifications from wide-angle to telephoto zooming.

Optical zooming up to ten times is the maximum telephoto magnification.

When using a card (recording stills), only optical zoom works.

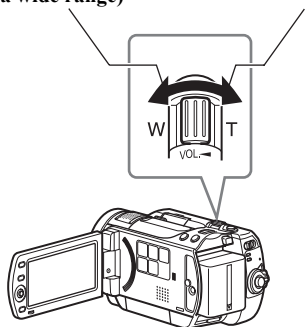
Maximum zoom values will depend on the "Digital Zoom" settings.

off → 40 × → 240 ×



**W: Wide-angle**  
(Shooting over a wide range)

**T: Telephoto**  
(Magnifies shooting)



HDD CARD

## Selecting a Shooting Mode to Match the Conditions (Program AE)

The camcorder automatically gauges the subject and surrounding conditions and determines the optimal settings for recording (Auto). You can also select a shooting mode that may better suit the situation.

### Shooting mode

#### Auto (No icon appears.)



#### Portrait

Makes the subject, such as a person or pet, stand out from a blurred background.



#### Spotlight

Prevents overexposure of the subject in strong light, such as at a wedding or on stage.



#### Sand&Snow

Prevents underexposure of the subject in very bright conditions, such as at the beach, or on a ski slope.



#### Low Light

Allows you to record in dark places with limited light.

## Selecting a shooting mode

**1** During record pause, press the menu button.

**2** Select "Camera Functions Setup" ▶ "Program AE" ▶ a shooting mode.

Press the confirmation button to confirm, then the menu button to end.

**3** The selected shooting mode (other than Auto) appears in the LCD monitor.

- The shooting mode is retained in memory even when the power is turned off.

### Note

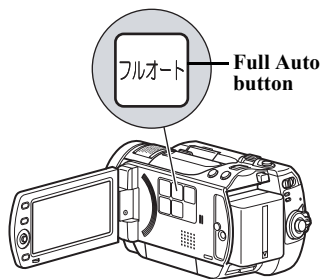
When shooting in dark places, after-images may appear if the subject is moving or if camera shake occurs. Use a tripod for best results.

HDD CARD

## Restoring all the Shooting Settings to Default (Full Auto)

You can reset the following manually adjusted shooting settings to their defaults with the press of a single button.

Function	Default
Focus	Auto
Exposure	Auto
BLC (Backlight)	Off
Program AE (shooting mode)	Auto
White Balance	Auto
EIS (Electronic Image Stabilizer)	On
Microphone Filter	Off



**During recording pause or recording, press the Full Auto button.**

**1** "FULL AUTO" appears in the LCD monitor for a moment and the settings return to their defaults.