

## FM Stereo/AM PLL Synthesized Radio

### Operating Instructions

### SRF-M32

Sony Corporation © 1995

## Before You Begin

Thank you for choosing the Sony radio! It will give you many hours of reliable service and listening pleasure.

Before operating the radio, please read these instructions thoroughly and retain them for future reference.

## Features

- FM stereo/AM PLL (Phase Locked Loop) synthesized radio.
- Up to 10 stations (5 for each band FM or AM) can be stored for button-touch tuning - memory preset tuning.

### Notes on AM Channel Step

The AM channel step differs depending on the area. The Channel step of this unit is factory-set to 10 kHz.

Area	Channel step
North and South American countries	10 kHz
Other countries	9 kHz

## Precautions

- Operate the unit only on 3 V DC with two size AAA (R03) batteries.
- The name plate indicating operating voltage, etc. is located at the rear.
- Avoid exposure to temperature extremes, direct sunlight, moisture, sand, dust, or mechanical shock. Never leave in a car parked in the sun.
- Should anything fall into the unit, remove the batteries, and have the unit checked by qualified personnel before operating it any further.
- To clean the casing, use a soft cloth dampened with a mild detergent solution.
- In vehicles or buildings, radio reception may be difficult or noisy. Try listening near a window.

## Specifications

**Time display:** 12-hour system

**Frequency range:**

Frequency	Channel step
FM : 87.5 - 108 MHz	0.1 MHz
AM: 530 - 1710 kHz	10 kHz
FM : 87.5 - 108 MHz	0.05 MHz*
AM: 531 - 1710 kHz	9 kHz

\* The frequency display is raised or lowered by steps of 0.1 MHz.

(Example: Frequency 88.05 MHz is displayed as "88.0 MHz".)

**Output:**

⊕ jack (stereo minijack)

**Power output:**

18 mW + 18 mW (at 10 % harmonic distortion)

**Power requirements:**

3 V DC, two size AAA (R03) batteries

**Battery life:**

Using Sony batteries UM4(NU)

FM : Approx. 15 hours

AM: Approx. 22 hours

**Dimensions:**

Approx. 81 x 72 x 27.5 mm (w/h/d)  
(3 1/4 x 2 7/8 x 1 1/8 inches) excl.  
projecting parts and controls

**Mass:**

Approx. 82 g (2.9 oz) not incl. batteries

**Accessories supplied:**

Stereo headphones (1)

Belt holder (1)

Design and specifications are subject to change without notice.

### **Notes on Headphones**

#### **Road safety**

Do not use headphones while driving, cycling, or operating any motorized vehicle. It may create a traffic hazard and is illegal in many areas. It can also be potentially dangerous to play your headphones at high volume while walking, especially at pedestrian crossings. You should exercise extreme caution or discontinue use in potentially hazardous situations.

#### **Preventing hearing damage**

Avoid using headphones at high volume. Hearing experts advise against continuous, loud and extended play. If you experience a ringing in your ears, reduce volume or discontinue use.

#### **Caring for others**

Keep the volume at a moderate level. This will allow you to hear outside sounds and to be considerate to people around you.

### **Warning**

If there is lightning when you are using the unit, take off the headphones immediately.

If you have any questions or problems concerning your unit, please consult your nearest Sony dealer.

PERSONAL/PORTABLE AUDIO PRODUCTS

**SONY®**

## **LIMITED WARRANTY**

SONY ELECTRONICS INC ("SONY") warrants this product against defects in material or workmanship, as follows:

For a period of 1 year from the date of retail purchase, SONY shall at its sole and absolute option either repair the defective product at no charge or replace the defective product with the same model or its equivalent model at no charge through a SONY SERVICE CENTER.

To obtain warranty service, you must take the product, or deliver the product prepaid, to one of the SONY SERVICE CENTERS located in the United States.

Proof of purchase in the form of a bill of sale or receipted invoice, which indicates that the product is within the warranty period, must be presented to obtain warranty service. SONY suggests that the purchaser retain the dealer's dated bill of sale as evidence of the date of retail purchase.

This warranty does not cover cosmetic damage, and damage to any part of the product, including the antenna, which results from acts of God, accident, misuse, abuse, improper maintenance, or connection to an improper voltage supply.

This warranty is valid only if the serial number appears on the product. This warranty is valid only in the United States of America.

REPAIR OR REPLACEMENT AS PROVIDED UNDER THIS WARRANTY IS THE EXCLUSIVE REMEDY OF THE CONSUMER. SONY SHALL NOT BE LIABLE FOR ANY INCIDENTAL OR CONSEQUENTIAL DAMAGES FOR BREACH OF ANY EXPRESS OR IMPLIED WARRANTY ON THIS PRODUCT. EXCEPT TO THE EXTENT PROHIBITED BY APPLICABLE LAW, ANY IMPLIED WARRANTY OF MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE ON THIS PRODUCT IS LIMITED IN DURATION TO THE DURATION OF THIS WARRANTY.

Some states do not allow the exclusion or limitation of incidental or consequential damages, or allow limitations on how long an implied warranty lasts, so the above limitations or exclusions may not apply to you. In addition, if you enter into a service contract with the Sony Partnership <sup>SM</sup> within 90 days of the date of sale, the limitation on how long an implied warranty lasts does not apply to you. This warranty gives you specific legal rights, and you may also have other rights which vary from state to state.

Please refer to the list of SONY SERVICE CENTERS on the reverse side for the SONY SERVICE CENTER nearest you.

For your convenience, Sony Electronics Inc has established the Customer Information Center to supply you with product or service information.

**SONY CUSTOMER INFORMATION CENTER**  
201-930-SONY (7669)  
714-821-SONY (7669)  
708-250-SONY (7669)

or write to:

**SONY CUSTOMER INFORMATION CENTER**  
Sony Drive, Mail Drop #T1-11  
Park Ridge, New Jersey 07656

**SONY ELECTRONICS INC**  
Sony Drive, Park Ridge, New Jersey 07656

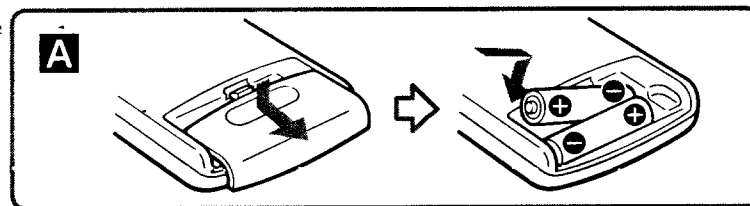
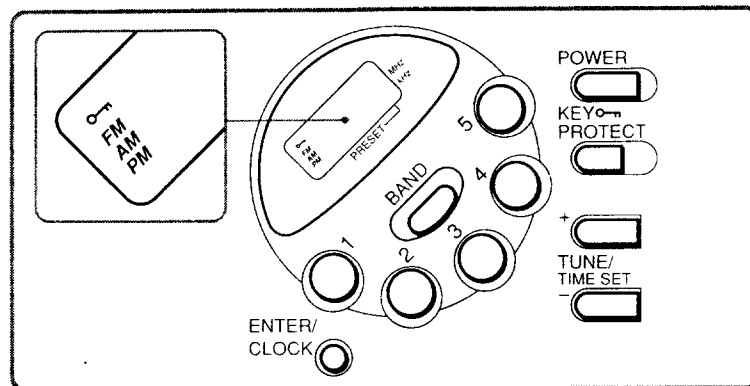
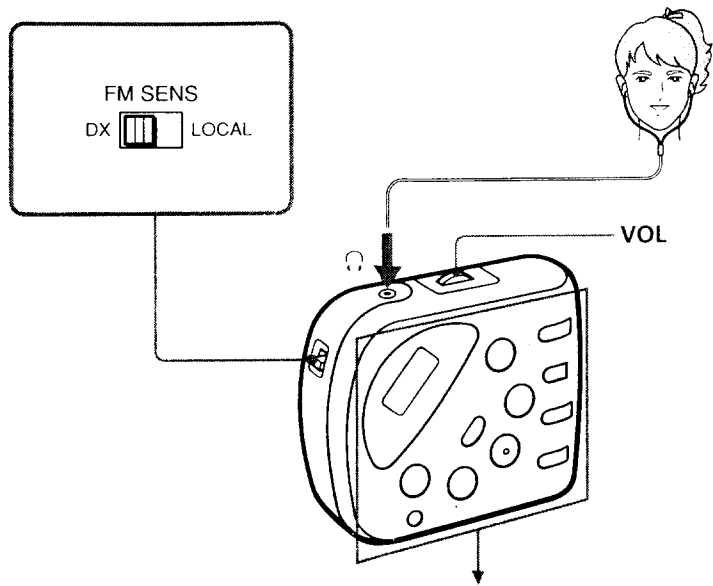
To obtain warranty service, please take the product, or deliver the product prepaid, to one of the following Sony Service Centers located around the United States.

All of the following items must be included when the product is shipped prepaid to the SONY SERVICE CENTER.

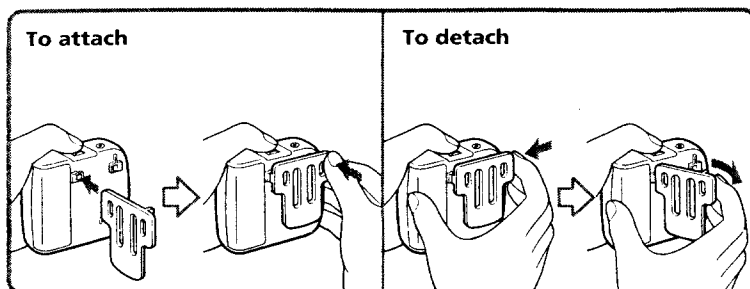
- Name, address and a phone number where you may be reached during the day.
- A copy of proof of purchase, as evidence that the product is within the warranty period.
- Brief description of the product defect.
- All supplied accessories with the product.

### Sony Service Centers

Arizona	Hawaii	Missouri
<b>Phoenix</b> 2240 North Scottsdale Road Tempe, AZ 85281 (602) 949-7669	<b>Honolulu</b> 950 Mapunapuna Street Honolulu, HI 96819 (808) 834-6622	<b>St. Louis</b> 12462-D Natural Bridge Road Bridgeton, MO 63044 (314) 291-2201
<b>California</b>	<b>Illinois</b>	<b>New Jersey</b>
<b>Burbank (Los Angeles area)</b> 4100 Riverside Drive, Suite A Burbank, CA 91505 (818) 842-7669	<b>Chicago</b> 1730 West Fullerton, Suite 4 Riverpoint Shopping Center Chicago, IL 60614 (312) 929-8985	<b>Mahwah (N.Y. Metropolitan Area)</b> 386 Route 17 South Mahwah, NJ 07430 (201) 529-1655
<b>Costa Mesa (Orange County area)</b> 2729 Bristol Street South Costa Mesa, CA 92626 (714) 549-4833	<b>Niles (Chicago N.W.)</b> 7540 North Caldwell Avenue Niles, IL 60648 (708) 647-2400	<b>Union</b> Bradlee's Shopping Center US Highway 22 At Morris Avenue Union, NJ 07083 (201) 687-5555
<b>San Bruno (San Francisco area)</b> 751 Camino Plaza San Bruno, CA 94066 (415) 871-2810	<b>Westmont (Chicago S.W.)</b> 6036-38 South Cass Avenue Westmont, IL 60559 (708) 969-0049	<b>Ohio</b>
<b>San Diego</b> 8975 Complex Drive San Diego, CA 92123 (619) 279-2724	<b>Kansas</b>	<b>Cleveland</b> 6370 York Road Parma Heights, OH 44130 (216) 845-7669
<b>San Jose</b> 1359 Old Oakland Road San Jose, CA 95112 (408) 280-7669	<b>Kansas City</b> 11712 West 95th Street Overland Park KS 66214 (913) 888-2622	<b>Pennsylvania</b>
<b>Colorado</b>	<b>Maryland (Washington D.C.)</b>	<b>Philadelphia</b> 651 Park Avenue King of Prussia, PA 19406 (215) 768-8850
<b>Denver</b> Havana Place Center 10730 East Iliff Avenue Aurora, CO 80014 (303) 755-7669	<b>Washington D.C.</b> 5300 Sunnyside Avenue Beltsville, MD 20705 (301) 595-1818	<b>Pittsburgh</b> Wexford Plaza 10610 Perry Highway (Rt. 19N) Wexford, PA 15090 (412) 935-8466
<b>Florida</b>	<b>Massachusetts</b>	<b>Texas</b>
<b>Fort Lauderdale</b> 2850 North 28th Terrace Hollywood, FL 33020 (305) 920-5600	<b>Boston</b> 390 University Avenue 128 Westwood Industrial Center Westwood, MA 02090 (617) 329-5130	<b>Dallas</b> 401 Preston Valley Shopping Center Dallas, TX 75230 (214) 661-3537
<b>Georgia</b>	<b>Michigan</b>	<b>Houston</b> 7639 Westheimer Houston, TX 77063 (713) 783-8761
<b>Atlanta</b> 120 Interstate North Parkway East Suite 410 Atlanta, GA 30339 (404) 953-5871	<b>Detroit</b> 43304 Eleven Mile Road Novi, MI 48050 (313) 344-4044	<b>Washington</b>
	<b>Minnesota</b>	<b>Seattle</b> 835 Fidalgo Seattle, WA 98108 (206) 762-8500
	<b>Minneapolis</b> 4300 W. 36 1/2 Street St. Louis Park, MN 55416 (612) 920-8000	



### Using the Belt Holder



## Installing Batteries

- 1 Install two size AAA (R03) batteries (not supplied) with correct polarity. (See illustration **A**.)
- When you install batteries for the first time, the display will flash "AM 12:00". To stop flashing, press **ENTER/CLOCK**.
  - For battery life, see "Specifications".

### Knowing When to Replace the Battery

- When the batteries become weak, the sound becomes weak or distorted. When the batteries are completely exhausted, the power is turned off and "000" in the display window flashes. When the power is turned on with the indication flashing, the power will be turned off right away. When "000" starts flashing, replace both batteries with new ones.
- Replace the batteries within about 40 seconds after removing the batteries. If you do not replace them within 40 seconds, the preset stations may be erased, the clock setting may be cleared and "AM 12:00" flashes in the display.
- When the batteries are removed for a long time, preset stations will be erased and "AM 12:00" is displayed. Store stations and set the clock again.

### Note

When the unit is not to be used for a long period of time, remove the batteries to avoid damage caused by battery leakage and corrosion.

## Setting the Clock

Set the clock when the radio is turned off.

- 1 When you insert batteries for the first time, digits flash in the display window. To stop flashing, press **ENTER/CLOCK**.
  - 2 While holding down the **ENTER/CLOCK** button, press either **TUNE/TIME SET +** or **-** button till the correct time appears in the display window. When you release **ENTER/CLOCK**, the clock begins to operate and ":" flashes.
- Each press of the **TUNE/TIME SET +** or **-** button advances or returns the displayed time by one minute.
  - To set the current time rapidly, keep pressing the **TUNE/TIME SET +** or **-** button while holding down **ENTER/CLOCK**.

### Changing AM Channel Step

The AM channel step differs depending on areas. The channel step of this unit is factory-set to 10 kHz to match the frequency allocation system of the country as listed.


You can change the channel step.

Area	Channel step
North and South American countries	10 kHz
Other countries	9 kHz

- 1 Change the AM channel step when the radio is turned off.
  - 2 While holding down **ENTER/CLOCK**, keep pressing **POWER** for more than 5 seconds. The AM channel step will be changed. If you proceed step 2 again, the channel step changes again.
- When the AM channel step is changed, the preset stations will be erased, the clock setting will be cleared and "AM 12:00" flashes in the display window.

## Playing the Radio

### Manual Tuning

- 1 Connect the supplied headphones to the  (headphones) jack.
  - 2 Press **POWER** to turn the radio on.
  - 3 Press **BAND** to select the band. Each press changes the band FM/AM alternately.
  - 4 Tune in a station by pressing either **TUNE/TIME SET +** or **-** button.
  - 5 Adjust **VOL** (volume).
- To turn off the radio, press **POWER**.

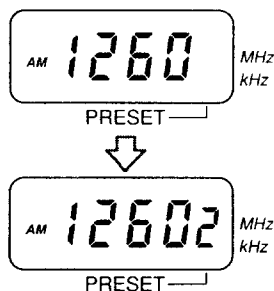
### Preset Tuning

Once you preset the desired stations, you can tune them in by a simple operation. You can preset up to 5 stations for each of the FM and AM bands.

### Presetting the Station

**Example:** To set AM 1260 kHz in preset button 2.

- 1 Preset **POWER** to turn the radio on.
- 2 Tune in the station to preset. (See "Manual Tuning".)
- 3 While holding down **ENTER/CLOCK**, press the appropriate preset button 2. The station will be stored and the preset number will appear in the display window.



- To change the preset station, set a new station's frequency in the number whose station you want to change. The previous frequency is canceled.

### Tuning in a Preset Station

- 1 Press **POWER** to turn the radio on.
- 2 Select the desired band by pressing **BAND**.
- 3 Press the desired preset number button. The preset number will appear in the display window.
- 4 Adjust **VOL** (volume).

### To improve radio reception

**FM:** Extend the headphones cord so that the FM sensitivity will be increased, as it serves as the FM antenna.



**AM:** Rotate the unit horizontally for optimum reception. A ferrite bar antenna is built into the unit.

### On FM SENS DX/LOCAL selector (for FM reception)

**DX:** Normally set it to this position.

**LOCAL:** If a very strong station signal causes noise, set it to this position. The reception will be more stable and noise will be reduced.

### To prevent accidental change of the receiving station

Press **KEY**  **PROTECT**. "0-1" is displayed, indicating that all the functions of the buttons are locked. To release the key protection, press **KEY**  **PROTECT** again.