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# G8D-671S-B

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Receiver, RF Keyless Entry System

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# 1. Constitution of the Radio Frequency Keyless Entry System with Door Lock Controller for vehicle

The radio frequency keyless entry is a system that it controls locking and unlocking the door by wireless remote controller. This system consists of two components. The TRANSMITTER is a device that transmits the signal when the button is pressed. The transmission signal consists of several synchronous codes, unique identification code, security code and function code. The RECEIVER is fixed inside the vehicle. It works intermittently to prevent the battery exhaustion. When the receiver detects the synchronous code, it runs continuously to receive the signals completely. After receiveing the signal, the receiver decides which operation will be performed. The user can select the following operations by pressing the button of the remote transmitter.

OPERATION	ACTION
<b>LOCK</b>	Lock the door
<b>UNLOCK</b>	unlock the door (the driver side first, then all doors)
<b>PANIC</b>	Beep the horn and flush the small light. (it continues 30 seconds)

This receiver also controls wired operation. It is available to control the door lock status by using the silcon switch or the remote door control switch (both driver's and passenger's side).

Transmitter  
 $f = 315.1\text{MHz}$

## 2. User's manual (provisionally)

### REMOTE TRANSMITTER



You can lock and unlock your vehicle with the remote transmitter.

### LOCK

When you push the LOCK button, all the doors will lock.

You cannot lock any of the doors with the remote transmitter if the key is in the ignition switch.

### UNLOCK

When you push the UNLOCK button once, all the doors will unlock. If you unlock the doors with the remote transmitter, but do not open any of the doors within 30 seconds, the doors will automatically relock.

You cannot unlock any of the doors with the remote transmitter if the key is in the ignition switch.

### PANIC MODE

Panic mode allows you to remotely sound your vehicle's horn to attract attention. To activate this mode, press and hold the PANIC button for about one second. Your vehicle's horn will beep for about 30 seconds.

To cancel panic mode before 30 seconds, press any button on the remote transmitter. You can also turn the ignition switch to ON.

Panic mode will not activate if the ignition switch is in ON.

## 4. Specification

### 4.1 CPU

Type	37540(8bit) Manufacturer: MITSUBISHI
ROM	16K bytes
RAM	512 bytes
EEPROM ( Outside )	2K bytes
Clock frequency	7.37MHz
Clock frequency generation	Ceramic resonator
Package	32pin QFP

### 4.2 RF block

Local clock frequency	325.8MHz
Frequency generation	Crystal resonator
Modulation	FSK
Bandwidth	± 200KHz
Carrier Detect Sensitivity	41 dBuV

### 4.3 Others

Dimension	80 mm × 70 mm × 25 mm
Weight	87 g
Battery	Car Battery (DC 12V)
Operation Voltage	DC 12V, 10mA
Operation temperature	-30 ~ +80

## 5. Features

### 5.1 Integrated controller

The controller works both wireless and wired operation.

You can use it remotely as the receiver of the keyless entry system. You can operate the door lock remotely using the remote transmitter. It is also available to release the boot.

When you turn the door lock switch, the controller works as the door lock controller. The controller monitors the switch related to the door lock. In case of the status of the switch changed, the controller will detect and output the signal to the door lock actuator.

### 5.2 Battery saving

The receiver works intermittently to reduce the battery consumption. The microcomputer mounted on the receiver controls the power supply for the RF circuit. In case of the microcomputer detects the wake-up signal during the power supplied, the microcomputer continues supplying the power until the data frame will be received.

## ! CAUTION

The remote control switch is a precision electronic device. Therefore, pay attention to the following.

- Do not impose shock on the remote control switch.
- Keep the remote control switch dry.
- Do not disassemble the remote control switch.

Your keyless entry system operates on a radio frequency subject to Federal Communications Commission (FCC) rules and Industry Canada rules.

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions.

- (1) This device may not cause harmful interference, and
- (2) This device must accept any interference received, including interference that may cause undesired operation of the device.

"Complies with RSS-210 of Industry Canada."

## NOTICE

This equipment has been tested and found to comply with the limits for a Class B device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation.

This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instruction, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

## FCC WARNING

Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.