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# MA2C858 (MA858)

## Silicon epitaxial planar type

For band switching

### ■ Features

- Extra-small DHD envelope, allowing to insert into a 5 mm pitch hole
- Less voltage dependence of the diode capacitance  $C_D$
- Low forward dynamic resistance  $r_f$
- Optimum for a band switching of tuner

### ■ Absolute Maximum Ratings $T_a = 25^\circ\text{C}$

| Parameter                       | Symbol    | Rating      | Unit             |
|---------------------------------|-----------|-------------|------------------|
| Reverse voltage                 | $V_R$     | 35          | V                |
| Forward current                 | $I_F$     | 100         | mA               |
| Operating ambient temperature * | $T_{opr}$ | -25 to +85  | $^\circ\text{C}$ |
| Storage temperature             | $T_{stg}$ | -55 to +100 | $^\circ\text{C}$ |

Note) \*: Maximum ambient temperature during operation.

### ■ Electrical Characteristics $T_a = 25^\circ\text{C} \pm 3^\circ\text{C}$

| Parameter                  | Symbol | Conditions                                | Min | Typ | Max  | Unit     |
|----------------------------|--------|---|-----|-----|------|----------|
| Forward voltage            | $V_F$  | $I_F = 100 \text{ mA}$                    |     |     | 1.0  | V        |
| Reverse current *          | $I_R$  | $V_R = 33 \text{ V}$                      |     |     | 100  | nA       |
| Diode capacitance          | $C_D$  | $V_R = 6 \text{ V}, f = 1 \text{ MHz}$    |     |     | 1.2  | pF       |
| Forward dynamic resistance | $r_f$  | $I_F = 2 \text{ mA}, f = 100 \text{ MHz}$ |     |     | 0.98 | $\Omega$ |

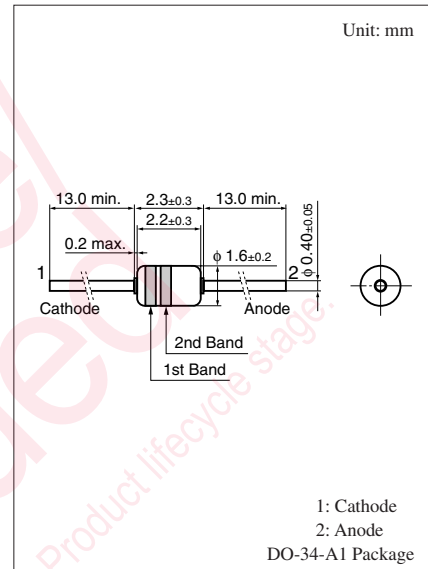
Note) 1. Measuring methods are based on JAPANESE INDUSTRIAL STANDARD JIS C 7031 measuring methods for diodes.

2. Absolute frequency of input and output is 100 MHz

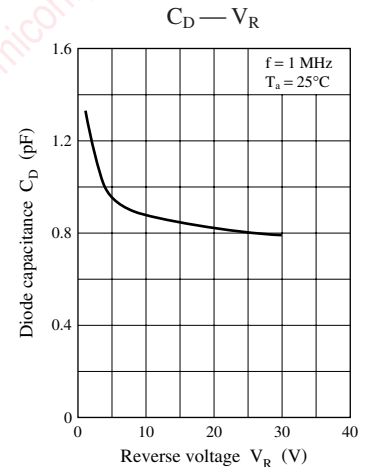
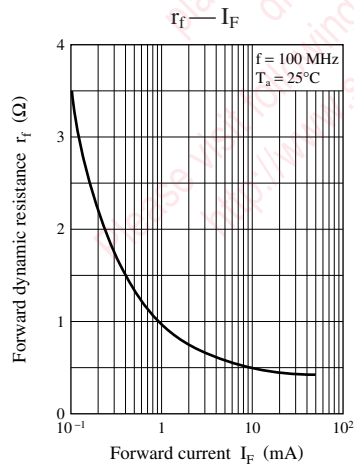
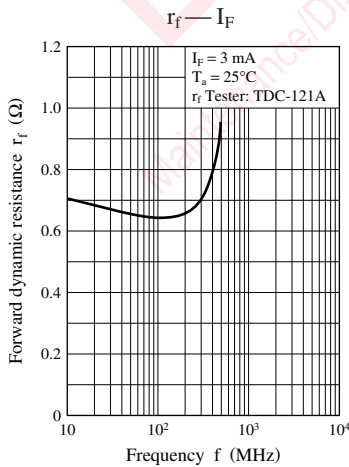
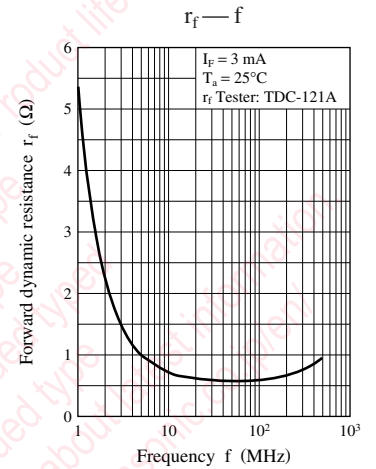
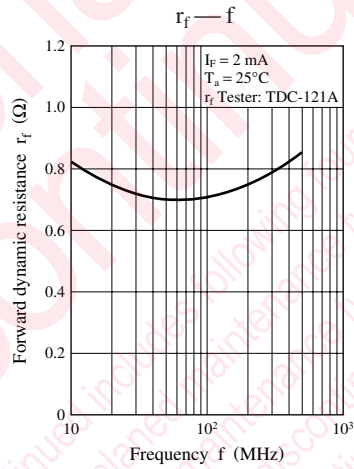
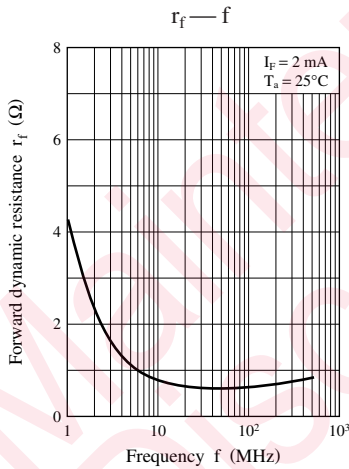
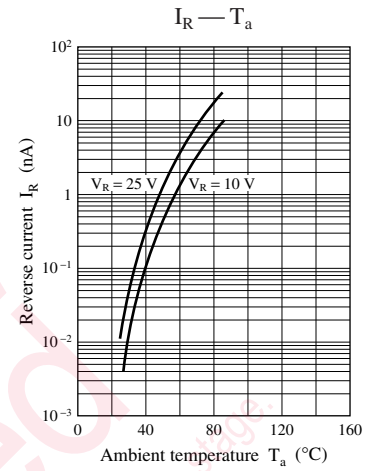
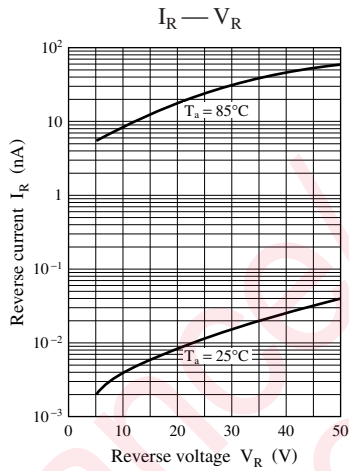
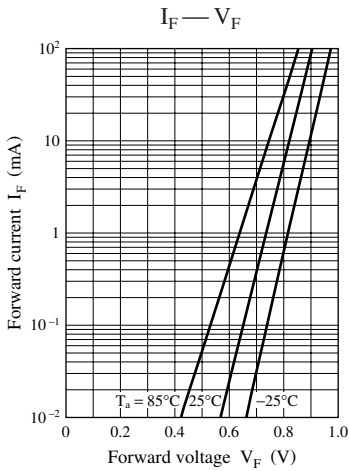
3. \*:  $I_R$  should be measured under the condition of prevention the light.

### ■ Cathode Mark

| Type No. | MA2C858  |        |
|----------|----------|--------|
| Color    | 1st Band | Yellow |
|          | 2nd Band | Yellow |



Note) The part number in the parenthesis shows conventional part number.



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