

## Discontinued Products & Maintenance

This is information on Discontinued Products & Maintenance for marine market, discontinuation date and alternative products are shown in the following lists. Alternative products may be differences on the dimension, specification etc., since please ask our sales or service department.

### Maintenance Support

According to the Guideline for Navigation and Radio Communication Equipment Maintenance issued by the Navigation Equipment Grope of the Japan Marine Equipment Association, maintenance support shall, in principal, be assured for a period of ten years after discontinuation of products. We will make an effort to extend the maintenance period after the end of support date. However, there may be unavoidable circumstances where maintenance support cannot be provided because of the unavailability of the required parts or other factor.

#### Note:

- A: Available
- B: Still available except some parts
- C: Unavailable
- TBA: To Be Announced

| Products                 | Type   | Discontinued Date of Production | Discontinued Date of Maintenance | Parts Availability | Alternative Product  |
|--------------------------|--|---------------------------------|----------------------------------|--------------------|--|
| Gyro Compass             | GM-10  | Jan-1990                        | Unavailable                      | B                  | GM-20  |
| Gyro Compass             | ES-11A   | Jul-1992                        | Unavailable                      | B                  | ES-110   |
| Gyro Compass             | TG-3000  | Sep-2002                        | Unavailable                      | B                  | TG-8000Series  |
| Gyro Compass             | TG-5000  | Jan-1995                        | Unavailable                      | B                  | TG-8000Series  |
| Gyro Compass             | TG-6000  | Jul-2003                        | TBA                              | B                  | TG-8000Series  |
| Rate of Turn Meter       | ROTI-100   | Sep-2002                        | Unavailable                      | C                  | —  |
| Rate of Turn Meter       | ROTI-200   | May-2008                        | 2018                             | A                  | ROTI-310   |
| Rate of Turn Meter       | ROTI-300   | Mar-2008                        | 2018                             | A                  | ROTI-310   |
| Magnet Compass           | SH-165A  | Aug-2001                        | Unavailable                      | B                  | SH-165A1/SH165A2   |
| Magnet Compass           | KF Series  | Feb-2001                        | Unavailable                      | C                  | —  |
| Magnet Compass           | SM-611A  | Mar-1999                        | Unavailable                      | C                  | —  |
| Magnet Compass           | SM-711A  | Feb-2001                        | Unavailable                      | C                  | —  |
| Electric Magnet Compass  | EMC Series   | Oct-1998                        | Unavailable                      | C                  | —  |
| Auto Pilot               | PR-100Series   | 1985                            | Unavailable                      | C                  | —  |
| Auto Pilot               | PR-200Series   | 1982                            | Unavailable                      | C                  | - PR-2000Series<br>- PR-9000Series   |
| Auto Pilot               | PR-1000Series  | Sep-2000                        | Unavailable                      | B                  | —  |
| Auto Pilot               | PR-1500Series  | Sep-2003                        | Unavailable                      | B                  | —  |
| Auto Pilot               | PR-1600Series  | Apr-2002                        | Unavailable                      | B                  | —  |
| Auto Pilot               | PR-4000Series  | Nov-1991                        | Unavailable                      | B                  | PR-9000Series  |
| Auto Pilot               | PR-5000Series  | Jan-1986                        | Unavailable                      | B                  | PR-9000Series  |
| Auto Pilot               | PR-6000Series/Early Model<br>(Non Feedback sensor alarm)   | Mar-2007                        | TBA                              | A                  | PR-9000Series  |
| Auto Pilot               | PR-7000Series  | Nov-1991                        | Unavailable                      | B                  | PR-9000Series  |
| Auto Pilot               | PR-8000Series  | May-1998                        | Unavailable                      | B                  | PR-9000Series  |
| Heading Control System   | PR-6000-ZZ   | May-2016                        | TBA                              | B                  | PR-9000-ZZ   |
| Tracking Interface       | TIF-6  | 2017                            | TBA                              | B                  | TIF-3  |
| Tracking Pilot           | TP-10  | Mar-2003                        | Unavailable                      | B                  | —  |
| Tracking Pilot           | TP-20  | Aug-2005                        | Unavailable                      | B                  | —  |
| Tracking Pilot           | TP-30Series  | Sep-2006                        | Unavailable                      | B                  | —  |
| Engine Remote Controller | SE-1D  | Feb-2005                        | Unavailable                      | B                  | —  |
| Joystick Controller      | TOMAC-100  | Apr-1999                        | Unavailable                      | C                  | —  |
| Hydraulic Steering Gear  | for PR-2000Series<br>S/T-015 to 250  | Apr-1985                        | Unavailable                      | B                  | —  |
| Hydraulic Steering Gear  | for PR-1000Series<br>UN/TN/UP-003 to 014   | Apr-1990                        | Unavailable                      | B                  | —  |
| Hydraulic Steering Gear  | for PR-1500Series<br>MP/MU/MT-002 to 014TC   | Apr-2003                        | Unavailable                      | B                  | —  |
| Hydraulic Steering Gear  | for PR-1600Series<br>HMT-008TC<br>HMT-014TC<br>HMU-008TC<br>HMU-014TC                              | Apr-2003                        | Unavailable                      | B                  | —  |
| Hydraulic Steering Gear  | for PR-2000Series<br>SS/TS-015 to 085<br>SS-100<br>SL/TL-015 to 085<br>SL-100<br>SP-W**-015 to 250 | Apr-1993                        | Unavailable                      | B                  | for PR-2000Series<br>SS/TS-020S/R to 085S/R<br>SS-100S/R<br>SL/TL-020S/R to 085S/R<br>SL-100S/R<br>SP-W**-015S to 250S |

| Products                            | Type                                      | Discontinued Date of Production | Discontinued Date of Maintenance | Parts Availability | Alternative Product |
|-------------------------------------|---|---------------------------------|----------------------------------|--------------------|---------------------|
| RADAR (for coastal vessel)          | BR-100Series                              | Jan-2000                        | Unavailable                      | C                  | —                   |
| RADAR (for coastal vessel)          | BR-200Series                              | Jan-1992                        | Unavailable                      | C                  | —                   |
| RADAR (for coastal vessel)          | BR-300Series                              | Jan-1993                        | Unavailable                      | C                  | —                   |
| RADAR (for coastal vessel)          | BR-900Series                              | Feb-1999                        | Unavailable                      | B                  | —                   |
| RADAR (for coastal vessel)          | BR-910Series                              | Mar-2002                        | Unavailable                      | B                  | —                   |
| RADAR (for coastal vessel)          | BR-1000Series                             | Feb-2000                        | Unavailable                      | B                  | —                   |
| RADAR (for coastal vessel)          | BR-1210Series                             | Mar-2002                        | Unavailable                      | B                  | —                   |
| RADAR (for coastal vessel)          | BR-1500Series                             | Mar-2002                        | Unavailable                      | C                  | —                   |
| RADAR (for coastal vessel)          | BR-1800Series                             | Jan-2001                        | Unavailable                      | C                  | —                   |
| RADAR (for coastal vessel)          | BR-2220CSeries                            | Sep-2003                        | Unavailable                      | B                  | BR-2550Series       |
| RADAR (for coastal vessel)          | BR-2500Series                             | Jan-1995                        | Unavailable                      | B                  | BR-2550Series       |
| RADAR (for coastal vessel)          | BR-2510CSeries                            | Dec-1998                        | Unavailable                      | B                  | BR-2550Series       |
| RADAR (for coastal vessel)          | BR-2520CSeries                            | Oct-2006                        | 2017                             | B                  | BR-2550Series       |
| RADAR (for coastal vessel)          | BR-2530CSeries                            | May-2004                        | Unavailable                      | C                  | BR-2550Series       |
| RADAR (for coastal vessel)          | BR-2540Series                             | Oct-2008                        | 2018                             | A                  | BR-2550Series       |
| RADAR (for coastal vessel)          | SRV-270                                   | Mar-1998                        | Unavailable                      | C                  | —                   |
| RADAR (for coastal vessel)          | RASCAR2510Series                          | Jul-1993                        | Unavailable                      | C                  | BR-2550Series       |
| RADAR (for medium or large vessels) | BR-1600Series                             | Jan-1993                        | Unavailable                      | C                  | —                   |
| RADAR (for medium or large vessels) | RASCAR2500Series                          | Oct-1995                        | Unavailable                      | C                  | BR-3210Series       |
| RADAR (for medium or large vessels) | RASCAR3400Series                          | Oct-1995                        | Unavailable                      | C                  | BR-3210Series       |
| RADAR (for medium or large vessels) | BR-3440Series (Prior to the '99-revision) | Dec-1998                        | Unavailable                      | B                  | BR-3210Series       |
| RADAR (for medium or large vessels) | RA50 Series (Anritsu)                     | 2004                            | Unavailable                      | C                  | BR-3210Series       |
| RADAR (for medium or large vessels) | RA70 Series (Anritsu)                     | 2002                            | Unavailable                      | C                  | BR-3210Series       |
| RADAR (for medium or large vessels) | BR-3460Series                             | Aug-2007                        | 2017                             | B                  | BR-3210Series       |
| RADAR (for medium or large vessels) | BR-3440Series (After the '99-revision)    | Nov-2008                        | 2018                             | A                  | BR-3210Series       |
| RADAR (for medium or large vessels) | BR-3440Series (50KW 60KW type)            | 2004                            | Unavailable                      | C                  | BR-3210Series       |
| RADAR (for medium or large vessels) | BR-3200Series                             | 2017                            | 2026                             | A                  | BR-3210Series       |

|   |                     |          |             |   |                    |
|---|---------------------|----------|-------------|---|--------------------|
| Electronic Chart System/ECS                           | ECS-3000            | May-2004 | Unavailable | C | ECS-4100           |
| Electronic Chart System/ECS                           | EC-5000             | Jul-2003 | Unavailable | C | EC-8100/8600       |
| Electronic Chart System/ECS                           | EC-6000             | May-2001 | Unavailable | C | EC-8100/8600       |
| Electronic Chart System/ECS                           | EC-6000S            | Mar-2003 | Unavailable | C | EC-8100/8600       |
| Electronic Chart Display and Information System/ECDIS | EC-7000/7500        | Feb-2009 | 2018        | B | EC-8100/8600       |
| Electronic Chart Display and Information System/ECDIS | EC-7000-A/7500-A    | Aug-2016 | 2025        | B | EC-8100/8600       |
| Electronic Chart Display and Information System/ECDIS | EC-8000/8500 Series | Jun-2015 | TBA         | A | EC-8100/8600       |
| Electronic Chart Display and Information System       | NID-2500 Series     | Jan-1995 | Unavailable | C | —                  |
| Bridge Monitor  | BM-2000             | May-2002 | Unavailable | B | BM-8100/8600series |
| Bridge Monitor  | BM-3000             | Dec-2011 | Dec-2016    | B | BM-8100/8600series |
| Bridge Monitor  | BM-8000/8500 series | Feb-2015 | 2024        | A | BM-8100/8600series |
| Engine Monitor  | EM-80               | 1993     | Unavailable | C | —                  |
| Engine Monitor  | EM-1000             | 1994     | Unavailable | C | —                  |
| Engine Monitor  | EM-1600             | 2003     | Unavailable | C | —                  |
| Engine Monitor  | EM-3200             | Apr-2003 | Unavailable | C | —                  |
| Engine Monitor  | EM-5000             | Apr-1988 | Unavailable | C | —                  |

|                                     |                 |          |             |   |                 |
|-------------------------------------|-----------------|----------|-------------|---|-----------------|
| Radio Communication System MF/HF    | RSS112A Simplex | Nov-2003 | Unavailable | B | TRM-1510        |
| Radio Communication System MF/HF    | RSS112A Duplex  | Nov-2003 | Unavailable | B | TRM-1510        |
| Radio Communication System MF/HF    | RSS113A Simplex | Jul-2007 | Unavailable | B | TRM-1510        |
| Radio Communication System MF/HF    | RSS113A Duplex  | Nov-2005 | Unavailable | B | TRM-1510        |
| Radio Communication System MF/HF    | RSS107SA-82     | Nov-1998 | Unavailable | B | TRM-1510        |
| Radio Communication System MF/HF    | RSS107SB-82     | Nov-1998 | Unavailable | B | TRM-1510        |
| Radio Communication System MF/HF    | TRM-1500        | Oct-2016 | 2025        | A | TRM-1510        |
| Radio Communication System VHF      | RSS201A         | Jun-2005 | Unavailable | B | TRV-2000        |
| Radio Communication System VHF      | RU224A          | Jun-2004 | Unavailable | B | TRV-2000        |
| Radio Communication System VHF      | TRV-1000        | Jun-2014 | 2023        | B | TRV-2000        |
| Transceiver VHF                     | RU215C          | Sep-2013 | Unavailable | C | —               |
| Two Way Radio                       | RU207A          | Mar-2001 | Unavailable | B | RU-230A-B       |
| Two Way Radio (EX Type)             | SF400PBT        | Mar-1999 | Unavailable | B | XiRP8600i       |
| Central FM                          | SF401A          | Apr-2006 | Unavailable | B | TRU-4510        |
| Central FM                          | TRU-4500        | Sep-2013 | Unavailable | C | TRU-4510        |
| Navtex Receiver (Japanese)          | RR108A          | Sep-2005 | Unavailable | B | —               |
| Navtex Receiver                     | RR103A          | Oct-2005 | Unavailable | B | NT-2000         |
| Weather Fax                         | RF116A (10inch) | May-2001 | Unavailable | B | TRW-1000        |
| Weather Fax                         | RF117A (15inch) | Jul-2005 | Unavailable | B | TRW-1000        |
| Weather Fax                         | RRJ-01 (10inch) | Jan-2008 | Unavailable | C | TRW-1000        |
| EPIRB                               | RJ302A          | Mar-2003 | Unavailable | C | TEB-700         |
| EPIRB                               | REB-23-1        | Sep-2005 | Unavailable | C | TEB-700         |
| EPIRB                               | REB-24          | Jul-2001 | Unavailable | C | TEB-700         |
| Search and Rescue Radar Transponder | TBR-500         | Mar-1997 | Unavailable | C | TBR-610         |
| Search and Rescue Radar Transponder | TBR-600         | Sep-2013 | 2022        | A | TBR-610         |
| INMARSAT Fleet F77                  | TRF-7700        | Aug-2012 | Jun-2018    | B | TRF-500,TRF-250 |
| INMARSAT B                          | RSS402B         | Jan-2004 | Unavailable | B | TRF-500,TRF-250 |
| INMARSAT C                          | RSS405A         | Feb-1999 | Unavailable | B | JUE-87          |
| INMARSAT C                          | RSS406A         | May-2004 | Unavailable | B | JUE-87          |
| INMARSAT C                          | RSS403A         | Jan-1996 | Unavailable | C | —               |
| AIS                                 | TRA-1000        | Feb-2005 | Unavailable | C | TRA-3000        |
| AIS                                 | TRA-2000        | Dec-2013 | Dec-2017    | A | TRA-3000        |

| Products           | Type     | Discontinued Date of Production | Discontinued Date of Maintenance | Parts Availability | Alternative Product |
|--------------------|----------|---------------------------------|----------------------------------|--------------------|---------------------|
| GPS Receiver       | GR-80    | 1997                            | Unavailable                      | C                  | —                   |
| GPS Receiver       | GR-1000  | Jan-1995                        | Unavailable                      | C                  | —                   |
| GPS Receiver       | GR-2000  | Dec-2000                        | Unavailable                      | B                  | —                   |
| GPS Receiver       | GR-3000  | Feb-2001                        | Unavailable                      | B                  | —                   |
| GPS Plotter(color) | GRP-500  | Jan-2001                        | Unavailable                      | B                  | —                   |
| GPS Plotter(color) | GRP-1000 | May-2001                        | Unavailable                      | B                  | —                   |
| GPS Plotter(color) | GRP-2000 | Dec-2002                        | Unavailable                      | B                  | —                   |

|                         |        |          |             |   |        |
|-------------------------|--------|----------|-------------|---|--------|
| Printer (for VHF Radio) | RF-18A | Mar-2006 | Unavailable | C | RRZ-06 |
|-------------------------|--------|----------|-------------|---|--------|

|           |               |          |             |   |        |
|-----------|---------------|----------|-------------|---|--------|
| Speed Log | TD-200 Series | Feb-2002 | Unavailable | C | TD-310 |
| Speed Log | TD-501        | May-2002 | Unavailable | C | TD-310 |

|  |          |          |             |   |         |
|--|----------|----------|-------------|---|---------|
| Impressed Current Cathodic Protection System /MACAPS | CPL-150A | 1985     | Unavailable | C | —       |
| Impressed Current Cathodic Protection System /MACAPS | CP-50    | Feb-2007 | Mar-2019    | B | CP-50A  |
| Impressed Current Cathodic Protection System /MACAPS | CP-100   | Mar-2007 | Mar-2019    | B | CP-100A |
| Impressed Current Cathodic Protection System /MACAPS | CP-20    | Mar-2007 | Unavailable | C | —       |

|                   |                |          |      |   |   |
|-------------------|----------------|----------|------|---|---|
| Fire alarm system | FD-1000 Series | Jun-2012 | 2022 | B | — |
| Fire alarm system | FD-3000 Series | Jun-2012 | 2022 | B | — |

#### Purchasing Products

| Products                         | Type                        | Discontinued Date of Purchasing | Discontinued Date of Maintenance | Parts Availability | Alternative Product |
|----------------------------------|-----------------------------|---------------------------------|----------------------------------|--------------------|---------------------|
| Radio Communication System MF/HF | SKANTI<br>GMDSS 9000 Series | Feb-2000                        | Unavailable                      | C                  | TBA                 |
| Radio Communication System VHF   | SKANTI<br>VHF 3000 Series   | Feb-2000                        | Unavailable                      | C                  | TBA                 |
| SSAS                             | T&T<br>TT-3000SSA           | Jul-2007                        | Unavailable                      | C                  | —                   |
| Two Way Radio                    | GP-328Series                | 2017                            | Dec-2020                         | A                  | XiRP8600i           |
| INMARSAT C                       | SKANTI<br>TM1250A           | Jan-1995                        | Unavailable                      | C                  | JUE-87              |
| INMARSAT C                       | JRC<br>JUE-75C              | May-2007                        | 2017                             | B                  | JUE-87              |
| INMARSAT C                       | JRC<br>JUE-85               | Mar-2013                        | TBA                              | A                  | JUE-87              |
| VDR                              | SAMSUNG<br>SVDR(BASIC)      | May-2005                        | 2017                             | C                  | JCY-1900            |
| VDR                              | SAMSUNG<br>SVDR-N           | May-2011                        | TBA                              | B                  | JCY-1900            |
| VDR                              | SAMSUNG<br>SVDR-Pro         | Dec-2009                        | TBA                              | A                  | JCY-1950            |
| VDR                              | SAMSUNG<br>SVDR-3000        | Jun-2014                        | TBA                              | A                  | JCY-1900            |