

RSP 1066

1 Byte waveform format

| Baud Rate | Parity | Valid data bits | Stop bit value | Handshaking | Data type |
|-----------|--------|-----------------|----------------|-------------|-----------|
| 19200 | n | 8 | 1 | none | string |

1. RSP1066 -> PC

Display data

| Start | Count | ID | Type | Data | | | | | | Chk |
|-------|-------|------|------|-------|-----|--------|-------|-----|-------|-----|
| 0xfe | 0x17 | 0xc2 | 0x20 | char1 | ... | char13 | flag1 | ... | flag8 | xx |

char1~13
ASCII Characters

flag1:

| | |
|------|-----------|
| bit7 | |
| bit6 | char7_dot |
| bit5 | char6_dot |
| bit4 | char5_dot |
| bit3 | char4_dot |
| bit2 | char3_dot |
| bit1 | char2_dot |
| bit0 | char1_dot |

flag2:

| | |
|------|-------------|
| bit7 | |
| bit6 | char8_colon |
| bit5 | char13_dot |
| bit4 | char12_dot |
| bit3 | char11_dot |
| bit2 | char10_dot |
| bit1 | char9_dot |
| bit0 | char8_dot |

flag3:

| | |
|------|---------|
| bit7 | Optical |
| bit6 | Coaxial |
| bit5 | 1 |
| bit4 | 2 |
| bit3 | 3 |
| bit2 | 4 |
| bit1 | Multi |
| bit0 | Tapem |

flag4:

| | |
|------|------------|
| bit7 | RBDS |
| bit6 | RDS |
| bit5 | RT |
| bit4 | TP |
| bit3 | TA |
| bit2 | PTY |
| bit1 | St (Tuner) |
| bit0 | Tuned |

flag5:

| | |
|------|--------------------|
| bit7 | Dolby Digital |
| bit6 | Dolby Pro Logic |
| bit5 | Dolby Pro Logic II |
| bit4 | Dolby 3 Stereo |
| bit3 | HDCD |
| bit2 | DSP |
| bit1 | Dynamic Range |
| bit0 | Zone |

flag6:

| | |
|------|------------|
| bit7 | Preset |
| bit6 | Memory |
| bit5 | Auto |
| bit4 | OSD |
| bit3 | Stby_LED |
| bit2 | |
| bit1 | Disp Mode0 |
| bit0 | Disp Mode1 |

flag7:

| | |
|------|--------|
| bit7 | MPEG |
| bit6 | dts |
| bit5 | dts es |
| bit4 | THX |
| bit3 | Sur |
| bit2 | EX |
| bit1 | SBL |
| bit0 | SBR |

flag8:

| | |
|------|-----|
| bit7 | FL |
| bit6 | C |
| bit5 | FR |
| bit4 | SL |
| bit3 | SR |
| bit2 | LFE |
| bit1 | S |
| bit0 | CB |

| | Normal | FL off |
|---------------|--------|--------|
| display mode1 | 0 | 1 |
| display mode0 | 0 | 0 |

2. PC -> RSP1066

| Start | Count | ID | Type | Key | Chk |
|-------|-------|------|------|-----|-----|
| 0xfe | 0x03 | 0xc2 | 0x10 | xx | xx |

| key: | | key: | | key: | | key: | |
|------|----------|------|--------------------|------|---------------|------|---------------------|
| 0x00 | RMC Vol+ | 0x10 | Bass- | 0x22 | Surround+ | 0x52 | FL on/off |
| 0x01 | RMC Vol- | 0x11 | Stereo | 0x23 | Zone 2 / Main | 0x53 | ProLogic / 3 Stereo |
| 0x02 | CD | 0x12 | 3 Stereo | | | 0x54 | dts Neo:6 |
| 0x03 | Tuner | 0x13 | Pro Logic | 0x4a | Power Off | 0x55 | |
| 0x04 | Tape | 0x14 | DSP | 0x4b | Power On | 0x56 | |
| 0x05 | Video1 | 0x15 | 5.1CH[Multi Input] | 0x4c | C | 0x57 | Music1 |
| 0x06 | Video2 | 0x16 | Dynamic | 0x4d | S | 0x58 | Music2 |
| 0x07 | Video3 | 0x17 | Rec | 0x4e | R | 0x59 | Music3 |
| 0x08 | Video4 | 0x18 | OSD Menu | 0x4f | Filter (EQ) | 0x5a | Music4 |
| 0x09 | Video5 | 0x19 | OSD Enter | | | 0x5b | 5Ch Stereo |
| 0x0a | Power | 0x1a | OSD Right(+) | | | 0x5c | 7Ch Stereo |
| 0x0b | Vol+ | 0x1b | OSD Left(-) | | | 0x5d | PLII Cinema |
| 0x0c | Vol- | 0x1c | OSD Up/Trim Sel | | | 0x5e | PLII Music |
| 0x0d | Treble+ | 0x1d | OSD Down/Dynamic | | | 0x5f | PLII Emulation |
| 0x0e | Treble- | 0x1e | Mute | | | | |
| 0x0f | Bass+ | 0x1f | Digital In Select | | | | |

| key: | |
|------|------------------------------|
| 0x60 | Neo6Music |
| 0x61 | Neo6Cinema |
| 0x62 | PLII Panorama on/off |
| 0x63 | PLII Dimension Up [0-6] |
| 0x64 | PL II Dimension Down [0-6] |
| 0x65 | PLII Center Width Up [0-7] |
| 0x66 | PLII Center Width Down [0-7] |
| 0x67 | Shift (Treble, Bass) |
| 0x68 | DD EX On/Off |
| 0x69 | Tuning Select |
| 0x6a | Preset Select |
| 0x7f | NULL key |
| 0xff | Refresh |

RSP 1066 RS232 Controller Command List

Table: RSP 1066 Waveform format expected:

| Baud Rate | Parity | Valid Data Bits | Stop Bit Value | Handshaking | Data Type |
|-----------|--------|-----------------|----------------|-------------|-----------|
| 19200 | N | 8 | 1 | None | String |

Table: RSP 1066 expected format of a request by RS232 controller:

| Start | Count | Device ID | Type | Key | Checksum |
|-------|-------|-----------|------|------|----------|
| 0xFE | 0x03 | 0xC2 | 0x10 | 0xFF | 0xFF |

Table 1: Type 10 Primary Command List

NOTE: The values in the table below show the exact byte sequence of all requests. The device will expect the bytes only - no spaces, no delimiter, etc. The controlling device may implement its own method to download each command sequence. The numerical values in the first column are Hexadecimal.

| RSP 1066 HEX | Command | Command Description |
|-------------------|---------------|---------------------|
| FE 03 C2 10 00 D5 | RMC Vol+ | Remote Volume Up |
| FE 03 C2 10 01 D6 | RMC Vol- | Remote Volume Down |
| FE 03 C2 10 02 D7 | CD | Source CD |
| FE 03 C2 10 03 D8 | Tuner | Source Tuner |
| FE 03 C2 10 04 D9 | Tape | Source Tape |
| FE 03 C2 10 05 DA | Video 1 | Source Video 1 |
| FE 03 C2 10 06 DB | Video 2 | Source Video 2 |
| FE 03 C2 10 07 DC | Video 3 | Source Video 3 |
| FE 03 C2 10 08 DD | Video 4 | Source Video 4 |
| FE 03 C2 10 09 DE | Video 5 | Source Video 5 |
| FE 03 C2 10 0A DF | Power | Power Toggle |
| FE 03 C2 10 0B E0 | Vol+ | Volume Up |
| FE 03 C2 10 0C E1 | Vol- | Volume Down |
| FE 03 C2 10 0D E2 | Treble+ | Treble Up |
| FE 03 C2 10 0E E3 | Treble- | Treble Down |
| FE 03 C2 10 0F E4 | Bass+ | Bass Up |
| FE 03 C2 10 10 E5 | Bass- | Bass Down |
| FE 03 C2 10 11 E6 | Stereo | DSP Stereo |
| FE 03 C2 10 12 E7 | 3 Stereo | DSP Dolby 3 Stereo |
| FE 03 C2 10 13 E8 | Pro Logic | DSP Pro Logic |
| FE 03 C2 10 14 E9 | DSP | DSP Music |
| FE 03 C2 10 15 EA | Multi | Multi Input |
| FE 03 C2 10 16 EB | Dynamic | Dynamic Range |
| FE 03 C2 10 17 EC | Rec | Record |
| FE 03 C2 10 18 ED | OSD Menu | OSD Menu |
| FE 03 C2 10 19 EE | OSD Enter | OSD Enter |
| FE 03 C2 10 1A EF | OSD Right (+) | OSD Right |
| FE 03 C2 10 1B F0 | OSD Left (-) | OSD Left |
| FE 03 C2 10 1C F1 | OSD Up | OSD Up |

| RSP 1066 HEX | Command | Command Description |
|---------------------|------------------------|----------------------------|
| FE 03 C2 10 1D F2 | OSD Down / Dynamic | OSD Down / Dynamic |
| FE 03 C2 10 1E F3 | Mute | Mute |
| FE 03 C2 10 1F F4 | Digital In Select | Digital Input Select |
| FE 03 C2 10 22 F7 | Surround+ | Next Surround Mode |
| FE 03 C2 10 23 F8 | Zone 2 / Main | Zone |
| FE 03 C2 10 4A 1F | Power Off | Power Off |
| FE 03 C2 10 4B 20 | Power On | Power On |
| FE 03 C2 10 4C 21 | C | Center |
| FE 03 C2 10 4D 22 | S | Subwoofer |
| FE 03 C2 10 4E 23 | R | Surround |
| FE 03 C2 10 4F 24 | Filter (EQ) | Cinema EQ |
| FE 03 C2 10 52 27 | FL On / Off | FL Display Toggle |
| FE 03 C2 10 53 28 | Pro Logic / 3 Stereo | Dolby 3 Stereo |
| FE 03 C2 10 54 29 | dts Neo:6 | dts Neo:6 |
| FE 03 C2 10 57 2A | Music 1 | Music 1 |
| FE 03 C2 10 58 2D | Music 2 | Music 2 |
| FE 03 C2 10 59 2E | Music 3 | Music 3 |
| FE 03 C2 10 5A 2F | Music 4 | Music 4 |
| FE 03 C2 10 5B 30 | 5Ch Stereo | 5Ch Stereo |
| FE 03 C2 10 5C 31 | 7Ch Stereo | 7Ch Stereo |
| FE 03 C2 10 5D 32 | PLII Cinema | Dolby PLII Cinema |
| FE 03 C2 10 5E 33 | PLII Music | Dolby PLII Music |
| FE 03 C2 10 5F 34 | Pro Logic | Dolby Pro Logic |
| FE 03 C2 10 60 35 | dts Neo:6 Music | dts Neo:6 Music |
| FE 03 C2 10 61 36 | dts Neo:6 Cinema | dts Neo:6 Cinema |
| FE 03 C2 10 62 37 | PLII Panorama | PLII Panorama |
| FE 03 C2 10 63 38 | PLII Dimension Up | PLII Dimension Up |
| FE 03 C2 10 64 39 | PLII Dimension Down | PLII Dimension Down |
| FE 03 C2 10 65 3A | PLII Center Width Up | PLII Center Width Up |
| FE 03 C2 10 66 3B | PLII Center Width Down | PLII Center Width Down |
| FE 03 C2 10 67 3C | Shift (Treble Bass) | Tone Controls |
| FE 03 C2 10 68 3D | DD EX On/Off | DD EX On/Off |
| FE 03 C2 10 7F 54 | Null Key | Null Key |
| FE 03 C2 10 FF D4 | Display Refresh | Display Refresh |