

**Таблица соответствия портов ввода-вывода процессорных модулей:
SK-iMX6S(D)-SODIMM, SK-ATSAMA5D3-SODIMM**

Ножевой разъем (возможные варианты ответных разъемов: “Тусо” – 1473005-4,
“Foxcon” AS0A426-N2SN ...)

| N | Наименование вывода | Номер вывода процессора, дополнительные функции вывода, SK-iMX6S(D)-SODIMM | Номер вывода процессора, дополнительные функции вывода, SK-ATSAMA5D3-SODIMM |
|----|---------------------|--|--|
| 1 | 5V | Питание 5В | Питание 5В |
| 3 | 5V | Питание 5В | Питание 5В |
| 5 | 5V | Питание 5В | Питание 5В |
| 7 | GND | 0В | 0В |
| 9 | SPI2_CLK | N1: CSIO D4, GPIO_5_22, ECSP11_SCLK, AUD3_TXC | C1: PC24 |
| 11 | SPI2_CS | N3: CSIO D7, GPIO_5_25, ECSP11_SS0, AUD3_RXD | H10:PC25 |
| 13 | SPI2_MOSI | P2: CSIO D5, GPIO_5_23, ECSP11 MOSI, AUD3_TXD | G9: PC23 |
| 15 | SPI2_MISO | N4: CSIO D6, GPIO_5_24, ECSP11 MISO, AUD3_TXFS ... | C2: PC22 |
| 17 | RESET | CPU Reset | CPU Reset |
| 19 | VBAT | Питание часов реального времени (RTC), 3.0V | Питание часов реального времени (RTC), 3.0V |
| 21 | SD1_D0 | A21: SD1_DAT0, GPIO_1_16, GPT_CAPTURE1 ... | N8: PB20 |
| 23 | SD1_D1 | C20: SD1_DAT1, GPIO_1_17, PWM3_OUT, GPT_CAPTURE2 | U4: PB21 |
| 25 | SD1_D2 | E19: SD1_DAT2, GPIO_1_19, PWM2_OUT, GPT_COMPARE2 ... | M7: PB22 |
| 27 | SD1_D3 | F18: SD1_DAT3, GPIO_1_21, PWM1_OUT, WDOG2_B ... | U5: PB23 |
| 29 | SD1_CMD | B21: SD1_CMD, GPIO_1_8, PWM4_OUT ... | T6: PB19 |
| 31 | SD1_CLK | D20: SD1_CLK, GPIO_1_20 ... | M8: PB24 |
| 33 | 3.3V_OUT | Выход питания 3.3В, максимальный ток нагрузки по всем контактам 3.3V_OUT должен быть не более 0,5А | Выход питания 3.3В, максимальный ток нагрузки по всем контактам 3.3V_OUT должен быть не более 0,5А |
| 35 | SD2_CLK | C21: SD2_CLK, KEY_COL5, AUD4_RXFS, GPIO1_IO10 | |
| 37 | SD2_CMD | F19: SD2_CMD, KEY_ROW5, AUD4_RXC, GPIO1_IO11 | |
| 39 | SD2_D0 | A22: SD2_DAT0, AUD4_RXD, KEY_ROW7, GPIO1_IO15 | |
| 41 | SD2_D1 | E20: SD2_DAT1, EIM_CS2, AUD4_TXFS, KEY_COL7, GPIO1_IO14 | |
| 43 | SD2_D2 | A23: SD2_DAT2, EIM_CS3, AUD4_TXD, KEY_ROW6, GPIO1_IO13 | |
| 45 | SD2_D3 | B22: SD2_DAT3, KEY_COL6, AUD4_TXC, GPIO1_IO12 | |
| 47 | GND | 0В | 0В |
| 49 | RESERVED | R1: SPDIF_OUT, ESAI_TX0, GPIO7_IO12 ... | |
| 51 | RESERVED | U5: SPDIF_IN, KEY_COL3, ECSP11_SS3, HDMI_TX_DDC_SCL, I2C2_SCL, GPIO4_IO12 | |
| 53 | RESERVED | K1: HDMI_HPD | |
| 55 | RESERVED | D12: ONOFF | T10: WKUP |
| 57 | RESERVED | D11: PMIC_ON_REQ | T12: SHDN |
| 59 | RESERVED | | T1: PD19 |
| 61 | RESERVED | | N2: PD20 |
| 63 | RESERVED | | M3: PD21 |
| 65 | RESERVED | | M2: PD22 |

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| 67 | RESERVED | CPU LVDS1 | L3: PD23 |
| 69 | RESERVED | CPU LVDS1 | M1: PD24 |
| 71 | RESERVED | CPU LVDS1 | N1: PD25 |
| 73 | RESERVED | CPU LVDS1 | L1: PD26 |
| 75 | RESERVED | CPU LVDS1 | L2: PD27 |
| 77 | RESERVED | CPU LVDS1 | K1: PD28 |
| 79 | RESERVED | CPU LVDS1 | K2: PD29 |
| 81 | RESERVED | CPU LVDS1 | |
| 83 | RESERVED | CPU LVDS1 | |
| 85 | RESERVED | CPU LVDS1 | |
| 87 | GND | 0B | 0B |
| 89 | SATA_TXP | CPU SATA, доступен только у SK-iMX6D-SODIMM | |
| 91 | SATA_TXN | CPU SATA, доступен только у SK-iMX6D-SODIMM | |
| 93 | SATA_RXN | CPU SATA, доступен только у SK-iMX6D-SODIMM | |
| 95 | SATA_RXP | CPU SATA, доступен только у SK-iMX6D-SODIMM | |
| 97 | GND | 0B | 0B |
| 99 | HDMI_CKN | CPU HDMI | |
| 101 | HDMI_CKP | CPU HDMI | |
| 103 | HDMI_N0 | CPU HDMI | |
| 105 | HDMI_P0 | CPU HDMI | |
| 107 | HDMI_N1 | CPU HDMI | |
| 109 | HDMI_P1 | CPU HDMI | |
| 111 | HDMI_N2 | CPU HDMI | |
| 113 | HDMI_P2 | CPU HDMI | |
| 115 | GND | 0B | 0B |
| 117 | LVDS1_0_TXN | CPU LVDS0 | |
| 119 | LVDS1_0_TXP | CPU LVDS0 | |
| 121 | LVDS1_1_TXN | CPU LVDS0 | |
| 123 | LVDS1_1_TXP | CPU LVDS0 | |
| 125 | LVDS1_2_TXN | CPU LVDS0 | |
| 127 | LVDS1_2_TXP | CPU LVDS0 | |
| 129 | LVDS1_CLKN | CPU LVDS0 | |
| 131 | LVDS1_CLKP | CPU LVDS0 | |
| 133 | LVDS1_3_TXN | CPU LVDS0 | |
| 135 | LVDS1_3_TXP | CPU LVDS0 | |
| 137 | GND | 0B | 0B |
| 139 | | | |
| 141 | | | |
| 143 | | | CPU USB Host |
| 145 | | | CPU USB Host |
| 147 | USB2_N | CPU USB Host | CPU USB Host |
| 149 | USB2_P | CPU USB Host | CPU USB Host |
| 151 | USB1_OTG_N | CPU USB OTG | CPU USB OTG |
| 153 | USB1_OTG_P | CPU USB OTG | CPU USB OTG |

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| 155 | USB1_OTG_VBUS | CPU USB OTG | P7: PB16 |
| 157 | USB1_OTG_ID | CPU USB OTG | |
| 159 | 3.3V_OUT | Выход питания 3.3В, максимальный ток нагрузки по всем контактам 3.3V_OUT должен быть не более 0,5А | Выход питания 3.3В, максимальный ток нагрузки по всем контактам 3.3V_OUT должен быть не более 0,5А |
| 161 | ETH_LED1 | Индикация состояния Ethernet | Индикация состояния Ethernet |
| 163 | ETH_LED2 | Индикация состояния Ethernet | Индикация состояния Ethernet |
| 165 | ETH_CT | «Средняя точка» для трансформатора Ethernet | «Средняя точка» для трансформатора Ethernet |
| 167 | ETH_TRD1P/TXP | Ethernet TXP | Ethernet TXP |
| 169 | ETH_TRD1N/TXN | Ethernet TXN | Ethernet TXN |
| 171 | ETH_TRD2P/RXP | Ethernet RXP | Ethernet RXP |
| 173 | ETH_TRD2N/RXN | Ethernet RXN | Ethernet RXN |
| 175 | ETH_TRD3P | | |
| 177 | ETH_TRD3N | | |
| 179 | ETH_TRD4P | | |
| 181 | ETH_TRD4N | | |
| 183 | GND | 0В | 0В |
| 185 | PCIE_TXP | CPU PCIe | V6: DIBP – soft modem |
| 187 | PCIE_TXN | CPU PCIe | U6: DIBN – soft modem |
| 189 | PCIE_RXP | CPU PCIe | |
| 191 | PCIE_RXN | CPU PCIe | |
| 193 | PCIE_REFP | CPU PCIe | |
| 195 | PCIE_REFN | CPU PCIe | |
| 197 | GND | 0В | 0В |
| 199 | 3.3V_OUT | Выход питания 3.3В, максимальный ток нагрузки по всем контактам 3.3V_OUT должен быть не более 0,5А | Выход питания 3.3В, максимальный ток нагрузки по всем контактам 3.3V_OUT должен быть не более 0,5А |
| 2 | 5V | Питание 5В | Питание 5В |
| 4 | 5V | Питание 5В | Питание 5В |
| 6 | 5V | Питание 5В | Питание 5В |
| 8 | GND | 0В | 0В |
| 10 | SPI1_CLK | H20: ECSPi4_SCLK, GPIO_3_21, I2C1_SCL, SPDIF_IN ... | K10: PD12 |
| 12 | SPI1_CS | G20: EIM_DATA20, ECSPi4_SS0, GPIO_3_20... | N4: PD13 |
| 14 | SPI1_MOSI | G23: ECSPi4_MOSI, GPIO_3_28 ... | M5: PD11 |
| 16 | SPI1_MISO | E23: ECSPi4_MISO, GPIO_3_22, SPDIF_OUT, USB_OTG_PWR ... | K9: PD10 |
| 18 | UART1_TX_CON | M1: GPIO_5_28, UART1_TX, ECSPi2_MISO ... | R9: PB31 |
| 20 | UART1_RX_CON | M3: GPIO_5_29, UART1_RX, ECSPi2_SS0 ... | M10: PB30 |
| 22 | UART2_TX | R3: GPIO_1_7, UART2_TXD, FLEXCAN1_TX, I2C4_SCL ... | M6: PD18 |
| 24 | UART2_RX | R5: GPIO_1_8, UART2_RXD, FLEXCAN1_RX, I2C4_SDA ... | N5: PD17 |
| 26 | UART3_TX | F22: EMI D24, GPIO_3_24, UART3_TXD, ECSPi1_SS2, ECSPi2_SS2, AUD5_RXFS, UART1_DTR ... | P8: PB29 |
| 28 | UART3_RX | G22: EMI D25, GPIO_3_25, UART3_RXD, ECSPi1_SS3, ECSPi1_SS3, AUD5_RXC, UART1_DSR ... | M9: PB28 |
| 30 | UART4_TX | F24: EIM_ADDR22, GPIO2_IO16 ... | M14: PE26 |
| 32 | UART4_RX | E25: EIM_D27, UART2_RX, GPIO3_IO27 ... | N12: PE25 |
| 34 | CAN1_TX | W6: ECSPi1_SS1, FLEXCAN1_TX, GPIO4_IO10 ... | N3: PD15 |
| 36 | CAN1_RX | W4: ECSPi1_SS2, FLEXCAN1_RX, GPIO4_IO11 ... | L9: PD14 |

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| 38 | CAN2_TX | T6: FLEXCAN2_TX , USB_OTG_OC, UART5_RTS_B, GPIO4_IO14 ... | U3: PB15 |
| 40 | CAN2_RX | V5: FLEXCAN2_RX , USB_OTG_PWR, UART5_CTS, GPIO4_IO15 ... | R7: PB14 |
| 42 | I2C1_SDA | C25: GPIO_3_16, I2C2_SDA , ECSPI1_SCLK ... | H9: PC26 |
| 44 | I2C1_SCL | E22: EMI EB2, GPIO_2_30, ECSPI1_SS0, I2C2_SCL ... | D4: PC27 |
| 46 | I2C2_SDA | D24: I2C3_SDA , GPIO_3_18, ECSPI1_MOSI ... | M18: PE18 |
| 48 | I2C2_SCL | F21: I2C3_SCL , GPIO_3_17, ECSPI1_MISO ... | N15: PE19 |
| 50 | PWM2 | T2: WDOG1_B, PWM1_OUT, GPIO1_IO09 ... | N7: PB1 |
| 52 | PWM1 | F17: PWM4_OUT, GPIO2_IO10, SD4_DATA2 | T2: PB0 |
| 54 | GND | 0B | 0B |
| 56 | CSI_PCK | P1: CSIO_PIXCLK , GPIO_5_18 ... | D3: PC30 |
| 58 | CSI_HS | P4: CSIO_HSYNC , GPIO_5_19 ... | K3: PA31 |
| 60 | CSI_VS | N2: CSIO_VSYNC , GPIO_5_21 ... | H1: PA30 |
| 62 | CSI_D7 | L6: CSIO_D19 , GPIO_6_5, UART4_CTS ... | J5: PA23 |
| 64 | CSI_D6 | M6: CSIO_D18 , GPIO_6_4, UART5_RTS ... | G2: PA22 |
| 66 | CSI_D5 | L3: CSIO_D17 , GPIO_6_3, UART4_CTS ... | J6: PA21 |
| 68 | CSI_D4 | L4: CSIO_D16 , GPIO_6_2, UART4_RTS ... | H2: PA20 |
| 70 | CSI_D3 | M5: CSIO_D15 , GPIO_6_1, UART5_RXD_MUX ... | H7: PA19 |
| 72 | CSI_D2 | M4: CSIO_D14 , GPIO_6_0, UART5_TXD_MUX ... | H4: PA18 |
| 74 | CSI_D1 | L1: CSIO_D13 , GPIO_5_31, UART4_RXD_MUX ... | H6: PA17 |
| 76 | CSI_D0 | M2: CSIO_D12 , GPIO_5_30, UART4_TXD_MUX ... | H3: PA16 |
| 78 | I2S_TXFS | U7: KPP_COL1, GPIO_4_8, AUD5_TXFS , UART5_TXD_MUX, ECSPI1_MISO ... | C4: PC20 |
| 80 | I2S_RXD | U6: KPP_ROW1, GPIO_4_9, AUD5_RXD , UART5_RXD_MUX, ECSPI1_SS0 ... | D5: PC21 |
| 82 | I2S_TXD | V6: KPP_ROW0, GPIO_4_7, AUD5_TXD , UART4_RXD_MUX, ECSPI1_MOSI ... | C3: PC18 |
| 84 | I2S_TXC | W5: KPP_COLO, GPIO_4_6, AUD5_TXC , UART4_TXD_MUX, ECSPI1_SCLK ... | D6: PC19 |
| 86 | I2S_MCLK | A17: CCM_CLKO2 , GPIO_6_15 ... | J1: PD30 |
| 88 | GND | 0B | 0B |
| 90 | BUS_BCLK | N22: EIM_BCLK | T3: PB2 |
| 92 | BUS_CS1 | J23: EIM_CS1 , GPIO_2_24, ECSPI2_MOSI ... | N6: PB3 |
| 94 | BUS_CS0 | H24: EIM_CS0 , GPIO_2_23, ECSPI2_SDCLK ... | P5: PB4 |
| 96 | BUS_OE | J24: EIM_OE , GPIO_2_25, ECSPI2_MISO, DI1_PIN7 | T4: PB5 |
| 98 | BUS_WAIT | M25: EIM_WAIT , GPIO_5_0, EIM_DTACK_B ... | R4: PB6 |
| 100 | BUS_RW | K20: EIM_RW , GPIO_2_26, ECSPI2_SS0, DI1_PIN8 ... | U1: PB7 |
| 102 | BUS_LBA | K22: EIM_LBA , GPIO_2_27, ECSPI2_SS1 ... | R5: PB8 |
| 104 | BUS_EB1 | K23: EIM_EB1 , GPIO_2_29 ... | P3: PB9 |
| 106 | BUS_EB0 | K21: EIM_EB0 , GPIO_2_28 ... | R6: PB10 |
| 108 | BUS_DA15 | N24: EIM_DA15 , GPIO_3_15 ... | V3: PB11 |
| 110 | BUS_DA14 | N23: EIM_DA14 , GPIO_3_14 ... | P6: PB12 |
| 112 | BUS_DA13 | M23: EIM_DA13 , GPIO_3_13 ... | V1: PB13 |
| 114 | BUS_DA12 | M24: EIM_DA12 , GPIO_3_12 ... | V2: PB17 |
| 116 | BUS_DA11 | M20: EIM_DA11 , GPIO_3_11 ... | V5: PB18 |
| 118 | BUS_DA10 | M22: EIM_DA10 , GPIO_3_10 ... | |
| 120 | BUS_DA9 | M21: EIM_DA9 , GPIO_3_9 ... | |

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| 122 | BUS_DA8 | L24: EIM_DA8, GPIO_3_8 ... | |
| 124 | BUS_DA7 | L25: EIM_DA7, GPIO_3_7 ... | |
| 126 | BUS_DA6 | K25: EIM_DA6, GPIO_3_6 ... | |
| 128 | BUS_DA5 | L23: EIM_DA5, GPIO_3_5 ... | |
| 130 | BUS_DA4 | L22: EIM_DA4, GPIO_3_4 ... | |
| 132 | BUS_DA3 | K24: EIM_DA3, GPIO_3_3 ... | |
| 134 | BUS_DA2 | L21: EIM_DA2, GPIO_3_2 ... | |
| 136 | BUS_DA1 | J25: EIM_DA1, GPIO_3_1 ... | |
| 138 | BUS_DA0 | L20: EIM_DA0, GPIO_3_0 ... | |
| 140 | GND | 0B | 0B |
| 142 | LCD_DE | N21: DIO_PIN15, GPIO_4_17, AUD6_TXC ... | K4: PA29 |
| 144 | LCD_VS | N20: DIO_PIN3, GPIO_4_19, AUD6_TXFS ... | G3: PA26 |
| 146 | LCD_HS | N25: DIO_PIN2, GPIO_4_18, AUD6_TXD ... | J3: PA27 |
| 148 | LCD_B7 | R24: DISPO_DAT7, GPIO_4_28, ECSPI3 RDY ... | J9: PA7 |
| 150 | LCD_B6 | R23: DISPO_DAT6, GPIO_4_27, ECSPI3 SS3 ... | G4: PA6 |
| 152 | LCD_B5 | R25: DISPO_DAT5, GPIO_4_26, ECSPI3 SS2 ... | J10: PA5 |
| 154 | LCD_B4 | P20: DISPO_DAT4, GPIO_4_25, ECSPI3 SS1 ... | D1: PA4 |
| 156 | LCD_B3 | P21: DISPO_DAT3, GPIO_4_24, ECSPI3 SS0 ... | F4: PA3 |
| 158 | LCD_B2 | P23: DISPO_DAT2, GPIO_4_23, ECSPI3 MISO ... | D2: PA2 |
| 160 | LCD_B1 | P22: DISPO_DAT1, GPIO_4_22, ECSPI3 MOSI ... | F5: PA1 |
| 162 | LCD_B0 | P24: DISPO_DAT0, GPIO_4_21, ECSPI3 SCLK ... | E3: PA0 |
| 164 | LCD_G7 | T22: DISPO_DAT15, GPIO_5_9, ECSP11 SS1, ECSP12 SS1 | H5: PA15 |
| 166 | LCD_G6 | U25: DISPO_DAT14, GPIO_5_8, AUD5_RXC ... | E1: PA14 |
| 168 | LCD_G5 | R20: DISPO_DAT13, GPIO_5_7, AUD5_RXFS ... | G6: PA13 |
| 170 | LCD_G4 | T24: DISPO_DAT12, GPIO_5_6 ... | F2: PA12 |
| 172 | LCD_G3 | T23: DISPO_DAT11, GPIO_5_5 ... | K8: PA11 |
| 174 | LCD_G2 | R21: DISPO_DAT10, GPIO_4_31 ... | E2: PA10 |
| 176 | LCD_G1 | T25: DISPO_DAT9, GPIO_4_30, PWM2 PWMO, WDOG2_B ... | J8: PA9 |
| 178 | LCD_G0 | R22: DISPO_DAT8, GPIO_4_29, PWM1 PWMO, WDOG1_B ... | F3: PA8 |
| 180 | LCD_R7 | W24: DISPO_DAT23, GPIO_5_17, ECSP11 SS0, AUD4_RXD ... | L13: PE28 |
| 182 | LCD_R6 | V24: DISPO_DAT22, GPIO_5_16, ECSP11 MISO, AUD4_TXFS ... | M12: PE27 |
| 184 | LCD_R5 | T20: DISPO_DAT21, GPIO_5_15, ECSP11 MOSI, AUD4_TXD ... | F6: PC15 |
| 186 | LCD_R4 | U22: DISPO_DAT20, GPIO_5_14, ECSP11 SCLK, AUD4_TXC ... | A1: PC10 |
| 188 | LCD_R3 | U23: DISPO_DAT19, GPIO_5_13, ECSP12 SCLK, AUD5_RXD, AUD5_RXC, WEIM_CS3 ... | D7: PC11 |
| 190 | LCD_R2 | V25: DISPO_DAT18, GPIO_5_12, ECSP12 SS0, AUD5_TXFS, AUD5_RXFS ... | C6: PC12 |
| 192 | LCD_R1 | U24: DISPO_DAT17, GPIO_5_11, ECSP12 MISO, AUD5_TXD ... | E7: PC13 |
| 194 | LCD_R0 | T21: DISPO_DAT16, GPIO_5_10, ECSP12 MOSI, AUD5_TXC ... | B2: PC14 |
| 196 | LCD_DCLK | N19: DIO_DISP_CLK, GPIO_4_16 ... | G1: PA28 |
| 198 | GND | 0B | 0B |
| 200 | GND | 0B | 0B |