

0.50mm Pitch FFC/FPC - F31G/F31K/F32P/F32Y

VERTICAL NON-ZIF FLEX CONNECTOR

F31G/F31K/F32P/F32Y series are 0.50mm pitch vertical Non-ZIF flex connectors with surface mount termination and no locking mechanism. F31G and F31K connectors are offered in 4 to 50 contacts and F32P and F32Y comes in 4 to 60 contacts. These series feature a cable thickness of 0.30mm and provide enhanced durability of 30 mating cycles. The connectors come with a robust design and prevent solder and flux wicking. These are ideal for automotive, data, industrial, communication, consumer and medical applications.

- Strong FFC/FPC retention makes it vibration-proof
- Single action low-force FFC/FPC insertion and removal
- Ensures high solderability and high durability



FEATURES

- Non-ZIF (Zero Insertion Force) mechanism requires some force for insertion
- No locking mechanism
- Design against solder and flux wicking
- 4 to 60 positions available
- High-temperature thermoplastic housing
- Lead and halogen-free

BENEFITS

- Strong FPC retention makes it vibration-proof
- Single action low-force FFC/FPC insertion and removal
- Ensures high solderability
- Comprehensive range to satisfy different customer requirements
- Wide operating temperature range of −40°C to +105°C
- Meets environmental, health and safety requirements

TECHNICAL INFORMATION

MATERIAL

- Housing: LCP, natural color (UL94V-0)
- Contact: Phosphor bronze, T=0.20mm
- F31G and F31K Series: Anchor-plate: brass, T=0.40mm
- F32P and F32Y Series: Anchor-plate: Brass, T=0.20mm

MECHANICAL PERFORMANCE

- FFC/FPC Retention Force: 20gf/pin
- Terminal Retention Force: 300gf/terminal min.
- Anchor-plate Retention Force: 400gf/plate min.
- Durability: 30 mating cycles

ELECTRICAL PERFORMANCE

- Voltage Rating: 50V AC/DC
- Current Rating: 0.5A
- Contact Resistance: 30MΩ max.
- Insulation Resistance: 500M Ω min.
- Dielectric Withstanding Voltage: No short or breakdown after 500V AC, 2mA, 1min.

PACKAGING

• Tape & Reel

APPROVALS AND CERTIFICATIONS

- UL file number E106764
- RoHS compliant

SPECIFICATION

Aorora Product Specification: IS.EQC.035

ENVIRONMENTAL

■ Operating Temperature Range: -40°C to +105°C

TARGET MARKETS/APPLICATIONS



Car Multimedia Car Navigation Dashboard PND



Base Station Power Switches



Notebook Tablets Wearables Gaming DSC LCD & PDP TV



Router Server ODD HDD

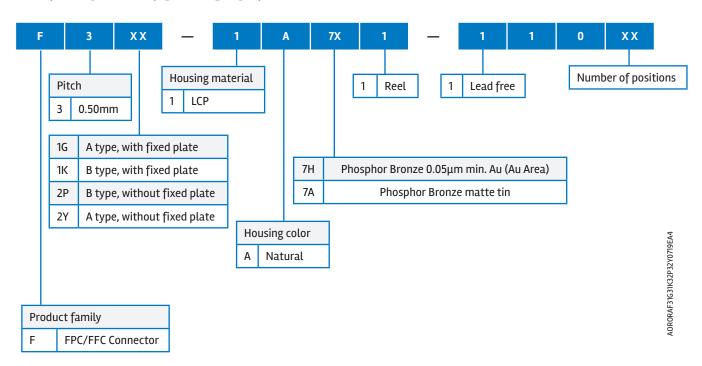


Sensing element Monitoring camera Human Machine Interface Industrial PC Robotics



Ultrasonic Patient Monitor MRI CT Infusion Pump

PART NUMBER SELECTOR



Mouser Electronics

Authorized Distributor

Click to View Pricing, Inventory, Delivery & Lifecycle Information:

Amphenol:

F31G-1A7H1-11006 F31G-1A7H1-11024 F31G-1A7H1-11045 F31K-1A7H1-11006 F31K-1A7H1-11010 F31K-1A7H1-11012 F31K-1A7H1-11024 F31K-1A7H1-11045 F31G-1A7H1-11010 F31G-1A7H1-11012 F32P-1A7A1-11008 F32P-1A7A1-11012 F32P-1A7A1-11020 F32P-1A7A1-11022 F32P-1A7A1-11024 F32P-1A7A1-11025 F32P-1A7A1-11028 F32P-1A7A1-11028 F32P-1A7A1-11028 F32P-1A7A1-11028 F32P-1A7A1-11028 F32P-1A7H1-11012 F32P-1A7H1-11012 F32P-1A7H1-11020 F32P-1A7H1-11022

FCI / Amphenol:

F31G1A7A111008 F31G1A7A111022 F31G1A7A111024 F31G1A7A111045 F32Y1A7H111010B200

F32P1A7A111006 F32P1A7A111010 F32P1A7H111006 F32P1A7H111024 F32P1A7H111032 F32P1A7H111045

F32P1A7H111010 F32Y1A7H111020 F31K1A7A111008 F31K1A7A111022 F31K1A7A111024 F31K1A7A111045