# molex

Part Number: 459704305

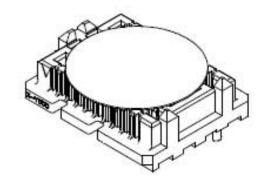
Product Description: 1.27mm Pitch, SEARAY Plug, 400 Circuits, 3.50mm Unmated Height, 10 Rows, with Pegs, Solder Charge Lead-Free,

with Voids, per VITA-57 Series Number: 45970

Status: Active

**Product Category:** Board-to-Board

Connectors



#### **Documents & Resources**

#### **Drawings**

Drawing 459704305\_sd.pdf

#### 3D Models and Design Files

3D Model 459704305\_stp.zip

Electrical Model Document EE-46556-0085-001.pdf Electrical Model Document EE-45970-007-007.pdf Electrical Model Document EE-45970-015-015.pdf Electrical Model Document EE-45970-010-010.pdf S-Parameter Model SP-45970-010-010.zip

S-Parameter Model SP-45970-007-001.zip S-Parameter Model SP-45970-015-015.zip

#### **Specifications**

Application Specification AS-45970-002-001.pdf
Application Specification AS-45970-990-001.pdf
Application Specification AS-45970-001-001.pdf
Product Specification PS-45970-002-001.pdf
Product Specification TS-45970-001-001.pdf
Product Specification PS-45970-001-001.pdf
Test Summary TS-45970-0007-001.pdf
Test Summary TS-45970-002-001.pdf

## **Product Environment Compliance**

## Compliance

GADSL/IMDS	Not Relevant
China RoHS	<b>©</b>
EU ELV	Not Relevant

Low-Halogen Status	Low-Halogen per IEC 61249-2-21
REACH SVHC	Not Contained per D(2023)3788-DC (14 Jun 2023)
EU RoHS	Compliant per EU 2015/863

#### Multiple Part Product Compliance Statements

- Eu RoHS
- REACH SVHC
- Low-Halogen

## **Multiple Part Industry Compliance Documents**

- IPC 1752A Class C
- IPC 1752A Class D
- Molex Product Compliance Declaration
- IEC-62474
- chemSHERPA (xml)

## EU RoHS Certificate of Compliance

#### **Part Details**

#### General

Status	Active
Category	Board-to-Board Connectors
Series	45970
Description	1.27mm Pitch, SEARAY Plug, 400 Circuits, 3.50mm Unmated Height, 10 Rows, with Pegs, Solder Charge Lead-Free, with Voids, per VITA-57
Application	Board-to-Board, Signal
Component Type	PCB Header
Product Family	SEARAY and SEARAY Slim Mezzanine Family
Product Name	SEARAY
UPC	884982013131

## Agency

CSA	LR19980
UL	E29179

#### **Electrical**

Current - Maximum per Contact	2.7A
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	0.40\.4.4
Voltage - Maximum	240V AC

# Physical

Breakaway	No
Circuits (Loaded)	400
Circuits (maximum)	400
Color - Resin	Black
Durability (mating cycles max)	100
First Mate / Last Break	No
Flammability	94V-0
Glow-Wire Capable	No
Guide to Mating Part	No
Keying to Mating Part	Yes
Lock to Mating Part	None
Material - Metal	Copper Alloy
Material - Plating Mating	Gold
Material - Plating Termination	Tin
Material - Resin	High Temperature Thermoplastic
Net Weight	3.702/g
Number of Rows	10
Orientation	Vertical
Packaging Type	Embossed Tape on Reel
PCB Locator	Yes
PCB Retention	Yes
PCB Thickness - Recommended	1.60mm
Pitch - Mating Interface	1.27mm
Pitch - Termination Interface	1.27mm
Plating min - Mating	0.762µm
Plating min - Termination	2.540µm
Polarized to Mating Part	Yes
Polarized to PCB	Yes
Robotic Placement	Pick and Place Cap
Shrouded	No
Stackable	No
Temperature Range - Operating	-55° to +125°C

Termination Interface Style	Surface Mount
Unmated Height	3.50mm

#### **Solder Process Data**

Max-Duration	3
Lead-Free Process Capability	REFLOW
Max-Cycle	1
Max-Temp	260

## Mates With / Use With

## Mates with Part(s)

Description	Part Number
1.27mm Pitch, SEARAY Receptacles	<u>45971</u>

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