



Chipsmall Limited consists of a professional team with an average of over 10 year of expertise in the distribution of electronic components. Based in Hongkong, we have already established firm and mutual-benefit business relationships with customers from,Europe,America and south Asia,supplying obsolete and hard-to-find components to meet their specific needs.

With the principle of “Quality Parts,Customers Priority,Honest Operation,and Considerate Service”,our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip,ALPS,ROHM,Xilinx,Pulse,ON,Everlight and Freescale. Main products comprise IC,Modules,Potentiometer,IC Socket,Relay,Connector.Our parts cover such applications as commercial,industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!



## Contact us

Tel: +86-755-8981 8866 Fax: +86-755-8427 6832

Email & Skype: info@chipsmall.com Web: www.chipsmall.com

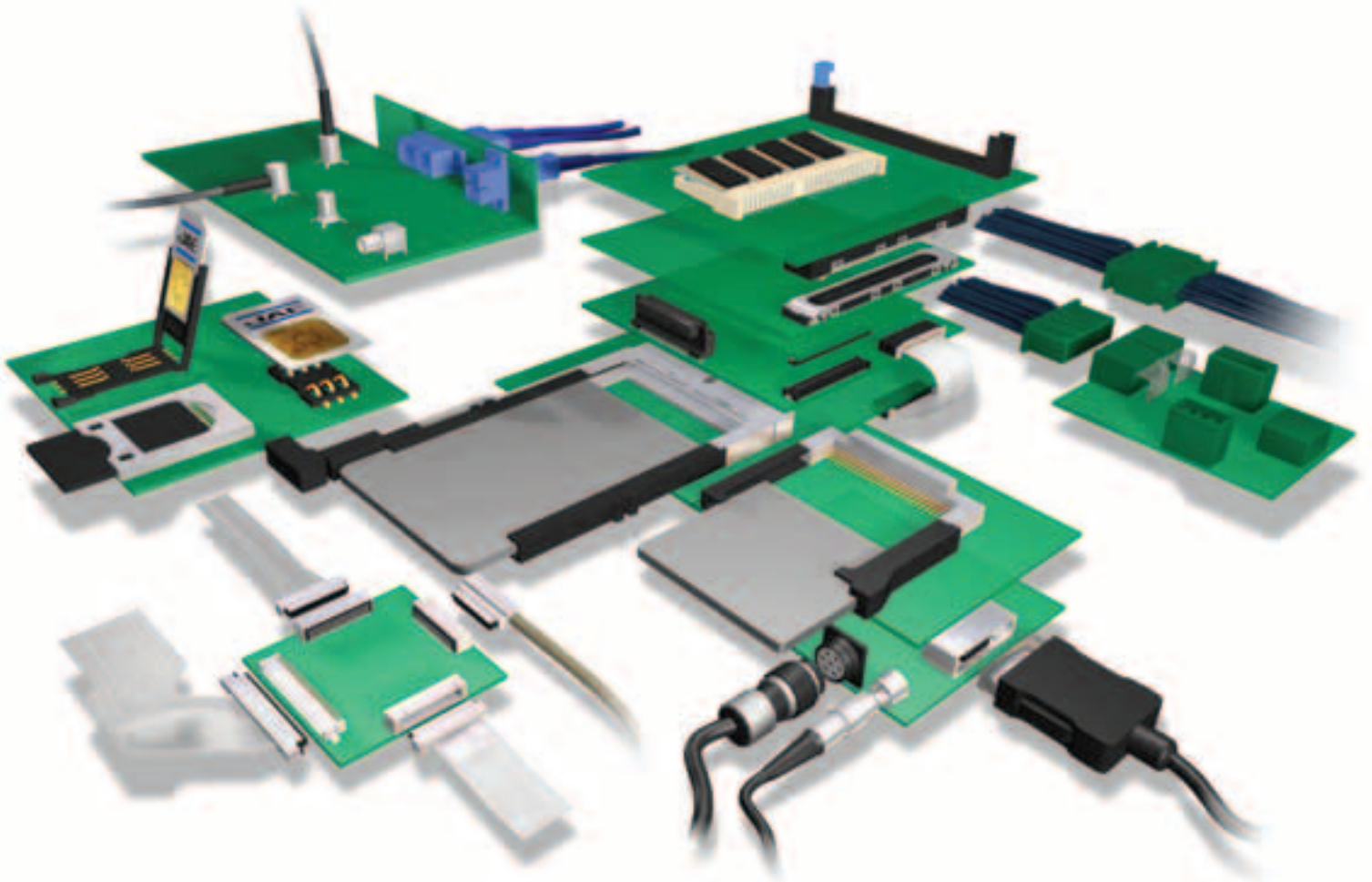
Address: A1208, Overseas Decoration Building, #122 Zhenhua RD., Futian, Shenzhen, China



Technology to Inspire Innovation

# ***Preferred Connector Products***

# **JAE**



***JAE Electronics, Inc.***

***For Additional Information Visit [www.jae-connector.com](http://www.jae-connector.com)***

**J**apan Aviation Electronics Industry, Ltd. (JAE) is an international manufacturer and supplier of electronic components and systems. For over four decades, JAE has provided the electronics industry with solutions to complex design requirements. Since its founding, the Company has strived to contribute to society through market-driven, technology-based global business operations under the philosophy: "Technology to Inspire Innovation."

With worldwide and world-class manufacturing certified to ISO 9001 and QS 9000, JAE has made the commitment to meet the global requirements of our customer. In addition to a network of state of the art manufacturing facilities, JAE has technical service offices located around the world, staffed with experts in connector design and application.

This catalog contains a select overview of JAE Connector Products. For in-depth information on our complete product line, and information on new developments, visit JAE's online catalog at [www.jae-connector.com](http://www.jae-connector.com).

Innovative design, quality oriented manufacturing, commitment to our customers and sensitivity to the environment assures JAE's leadership position in the 21<sup>st</sup> century.

## Table of Contents

Product Series	Contact Spacing	Pages
<b>SOCKETS/MEMORY PRODUCTS</b>		
PCMCIA		
JC22.....	1.27mm (.050").....	5
COMPACT FLASH		
JC26C2.....	1.27mm (.050").....	6 - 7
JC26E.....	1.27mm (.050").....	8
JC26F.....	1.27mm (.050").....	9
PCI EXPRESS MINI CARD		
MM60.....	0.8mm (.031").....	10
EXPRESSCARD		
PX10/11.....	1.0mm (.039").....	11 - 12
PX20/22.....	1.0mm (.039") / 0.635mm (.025").....	13 - 14
SMART/SIM CARD		
SF2.....	2.54mm (.100").....	15
SF3.....	2.54mm (.100").....	16
SF6.....	2.54mm (.100").....	17
SF7.....	2.54mm (.100").....	18
SF7 (Slim).....	2.54mm (.100").....	19
SF9.....	2.54mm (.100").....	20
SECURE DIGITAL CARD		
SG5.....	2.50mm (.098").....	21
MINI SECURE DIGITAL CARD (SD)		
ST4.....	1.1mm (.043").....	22
SC1.....	2.50mm (.098").....	23
MICRO SD/TRANSFLASH™		
ST1.....	1.1mm (.043").....	24
ST2.....	1.1mm (.043").....	25

## **BOARD-TO-BOARD CONNECTOR PRODUCTS**

BOARD-TO-BOARD		
AA03.....	0.40mm (.020").....	26
WA6.....	0.40mm (.020").....	27
WH1.....	0.40mm (.020").....	28
AA01A.....	0.50mm (.020").....	29
IL-312.....	0.50mm (.020").....	30
WR.....	0.50mm (.020").....	31 - 32
WB3.....	0.50mm (.020").....	33
IL-WX.....	0.80mm (.031").....	34
KX14/15.....	0.80mm (.031").....	35 - 36
PM1.....	0.80mm (.031").....	37
WM1.....	1.00mm (.039").....	38
WM2.....	1.00mm (.039").....	39
TX24/TX25.....	1.27mm (.050").....	40

## Table of Contents

Product Series	Contact Spacing	Pages
<b>BOARD-TO-BOARD CONNECTOR PRODUCTS</b>		
WIRE-TO-BOARD		
PCB-TO-FPC/FFC		
FB3.....	0.30mm (.012").....	41
FB5.....	0.30mm (.012").....	42
FB6.....	0.30mm (.012").....	43
FF02.....	0.30mm (.012").....	44
FF02S.....	0.30mm (.012").....	45
FB8.....	0.30mm (.012").....	46
FA5.....	0.50mm (.020").....	47
FF03.....	0.50mm (.020").....	48
IL-FPR.....	0.50mm (.020").....	49
PCB-TO-CABLE/FPC		
FI-J.....	0.40mm (.016").....	50 - 51
FI-R.....	0.50mm (.020").....	52 - 53
FI-X.....	1.00mm (.039").....	54 - 55
FI.....	1.25mm (.049").....	56 - 58
PCB-TO-CABLE		
DX2/3.....	0.80mm (.031").....	59
FI-E.....	1.00mm (.039").....	60 - 61
CN10.....		62 - 63
CV10.....		64
IL-Z.....	1.25mm (.049").....	65 - 66
IL-S.....	2.00mm (.079").....	67 - 68
LY.....	2.00mm (.079").....	69
KD10/20.....	2.00mm (.079").....	70
IL-G.....	2.50mm (.098").....	71
<b>INPUT/OUTPUT CONNECTOR PRODUCTS</b>		
PCB-TO-CABLE		
DD1.....	0.50mm (.020").....	72 - 73
DD2.....	0.50mm (.020").....	74 - 75
DG1.....	0.50mm (.020").....	76
RA1.....	0.50mm (.020").....	77
RC1.....	0.50mm (.020").....	78
DA1.....	0.60mm (.024").....	79
DE1.....	1.27mm (.050").....	80
TX20A.....	1.27mm (.050").....	81
DV2.....	1.905mm (.075").....	82 - 84
CIRCULAR		
JN1.....		85 - 86
JN2.....		87 - 88
JB5.....		89

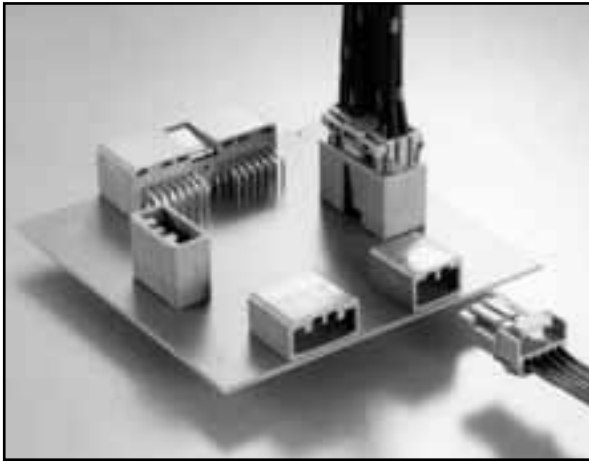
## Table of Contents

<i>Product Series</i>	<i>Contact Spacing</i>	<i>Pages</i>
 <b>INPUT/OUTPUT CONNECTOR PRODUCTS</b>		
<b>CIRCULAR</b>		
JL04V .....		90 - 91
JL05 .....		92 - 93
JB1 .....		94 - 95
SRCN .....		96 - 97
N/MS .....		98 - 99
 <b>FIBER OPTIC PRODUCTS</b>		
FO-FC .....		100
FO-EX .....		101
 <b>AUTOMOTIVE CONNECTOR PRODUCTS</b>		
<b>PCB-TO-CABLE</b>		
MX34 .....	1.1mm (.043") .....	102
MX7 .....	2.30mm (.091") .....	103
IL-AG7 .....	2.50mm (.098") .....	104
MX17 .....	2.50mm (.098") .....	105 - 106
MX23A .....	2.50mm (.098") .....	107 - 108
MX10 .....	2.50mm (.098") .....	109
MX5 .....	3.00mm (.118") .....	110
 <b>PCB-TO-CABLE/CABLE-TO-CABLE</b>		
IL-AG5 .....	2.50mm (.098") .....	111
IL-AG6 .....	2.50mm (.098") .....	112
MX9 .....	3.50mm (.138") .....	113
MX25 .....	6.7mm (2.64") .....	114
MX36 .....	2.50mm (.098") .....	115
 <b>CABLE-TO-CABLE</b>		
IL-AG9 .....	2.50mm (.098") .....	116 - 118
MX19 .....	2.50mm (.098") .....	119

- All JAE connector products shown in this catalog are lead free.
- We reserve the right to modify designs in order to improve quality, keep pace with technological advancements or meet particular requirements in production.
- Products shown in this catalog are made for the applications specified. However, if the above-mentioned products are to be used in aerospace devices, marine cable-connection devices, atomic power control systems, medical equipment for life-support systems, or any other specific application requiring extremely high reliability, please contact JAE for further information. Recommended Applications: Computers, Office Machines, Measuring Devices, Telecommunications Devices (Terminals, Mobile Devices) AV Devices, Household Applications, FA Devices, etc.
- Refer to end of catalog for alphabetical index of products.

# IL-AG5 SERIES AUTOMOTIVE CONNECTORS

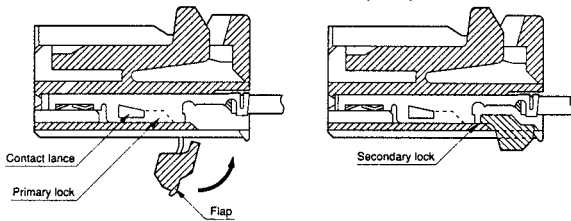
— 2.50mm (.098") Contact Spacing, 025 Crimp Contacts, PCB-to-Cable/Cable-to-Cable Applications —



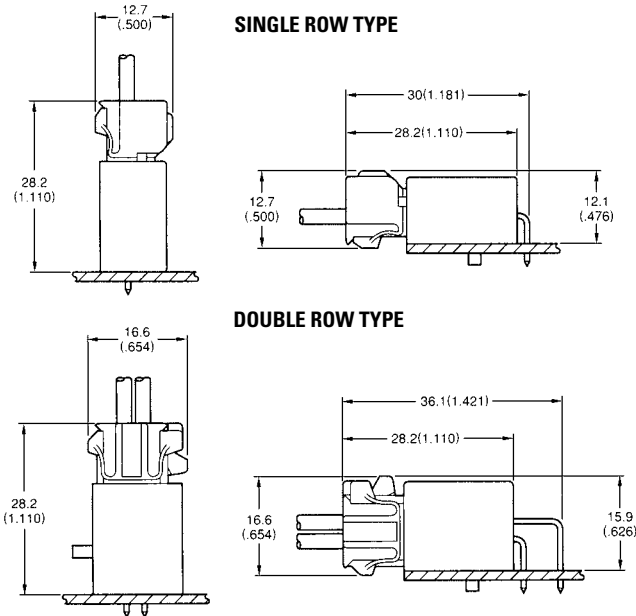
## FEATURES

- Designed for automotive instrument panel applications
- Mechanical lock assures positive mating
- Unique housing configuration helps prevent mismatching
- Double locking mechanism prevents dislodging of contacts

Connector Profile (Ref.)



- Polarized version is available (Single row, 5 and 6 contacts only)
- Highly reliable socket contacts
- Simplified crimp-type termination



Dimensions in mm (inches).

## GENERAL SPECIFICATIONS

Number of Contacts	4, 5, 6, 7, 10 (single row) 14, 16, 18, 22, 30 (double row)
Contact Spacing	2.5mm (.098")
Current Rating	3 Amp per contact
Dielectric Withstanding Voltage	1000 VAC r.m.s. (for one minute)
Insulation Resistance	100 megohms min.
Contact Resistance	10 milliohms max.
Operating Temperature	-40°C to +85°C
Applicable PCB Thickness	1.6 to 2.4mm (.063" to .094")

## Applicable Wire (Stranded)

Wire Type JIS	AV, AVS, AVSS	AVS, AVSS
AWG	#22-#20	#18
Conductor Cross Section Area	0.3 to 0.5mm <sup>2</sup>	0.85mm <sup>2</sup>
Insulation Outer Diameter	1.4 to 2.4mm (.055 to .094")	

## MATERIALS AND FINISHES

Description	Materials/Finishes
Insulator	PBT, Yellow (Green or Light Blue for polarized version)
Pin Contact	Brass/Tin Plating Cable plug pin contact: Highly conductive Copper alloy
Socket Contact	Phosphor Bronze /Tin Plating

Note: The standard finish of contacts is Tin Plating.  
Gold Plating is available as an option. Consult JAE for details.

## ORDERING INFORMATION

**IL-AG5 - \*\* \* \* - \* 3 \* \* - \* - \*\***

Series \_\_\_\_\_

No. of Contacts \_\_\_\_\_  
Single Row – 5, 6, 7, 10  
Double Row – 14, 16, 18, 22, 30

Contact Type \_\_\_\_\_  
P – Pin                      S – Socket

Modification Code \_\_\_\_\_  
K – Polarized version, 5 and 6 contacts only  
Blank – Standard type

Contact Layout \_\_\_\_\_  
S – Single Row    D – Double Row

Contact Pitch \_\_\_\_\_  
3 – 2.5mm (.098")

Termination \_\_\_\_\_  
T – Straight Through Hole    L – Right Angle Through Hole  
C – Crimp

Applicable PCB Thickness (pin header) \_\_\_\_\_  
2 – 1.6mm (.063")

Applicable Wire Size (Housing) \_\_\_\_\_  
1 – AWG #18 to #22, Stranded

Modification Code A \_\_\_\_\_

Insulator Color \_\_\_\_\_  
LB – Light Blue    Blank – Green



Technology to Inspire Innovation

# JAE

***“Building Technologies  
to Connect Your World”***



**Japan Aviation Electronics Industry, Limited**

1-19, Aobadai 3-chome, Meguro-ku  
Tokyo 153-8539, Japan  
Telephone: 03-3780-2736  
Fax: 03-3780-2883

**JAE Electronics, Inc.**

142 Technology Drive, Suite 100  
Irvine, California 92618-2430, U.S.A.  
Telephone: 949-753-2600  
Fax: 949-753-2699  
800-523-7278 Toll free in the U.S.A.

**JAE Europe**

Coliseum Business Centre  
Riverside Way, Camberley  
Surrey, GU15 3YL, England  
Telephone: 44-1276-404000  
Fax: 44-1276-404010

**JAE Taiwan, Ltd.**

4F-1, No. 88, Chung Hsiao E. Rd.  
Sec. 2, Taipei, Taiwan, R.O.C.  
Telephone: 886-2-2396-7676  
Fax: 886-2-2392-5929

**JAE Hong Kong, Ltd.**

Suites 1407-11, 14/F, Tower 2, The Gateway,  
25 Canton Road, Tsimshatsui, Kowloon, Hong Kong  
Telephone: 852-2723-7782  
Fax: 852-2723-9028

**JAE Korea, Inc.**

1602, Korea City Air Tower  
159-9 Samsung-Dong, Kangnam-ku  
Seoul, 135-973, Korea  
Telephone: 82-2-551-8959  
Fax: 82-2-551-8958

**JAE Philippines, Inc.**

PEZA Zone, Gateway Business Park, Javalera  
General Trias, 4107 Cavite, Philippines  
Telephone: 63-46-433-0285  
Fax: 63-46-433-0287

**JAE Singapore Pte., Ltd.**

33 Tannery Lane, #02-01 Hoesteel  
Industrial Building  
Singapore 347789  
Telephone: 65-6748-1332  
Fax: 65-6748-2920

**JAE Shanghai Co., Ltd.**

RM 1407, Shanghai Mart 2299 Yanan Rd.  
West Shanghai 200336 P.R.C.  
Telephone: 86-21-6236-0322  
Fax: 86-21-6236-1292