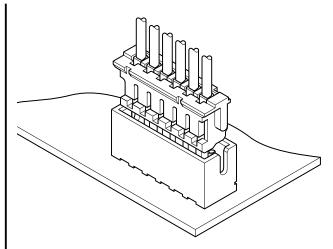


# **ZH** CONNECTOR



### 1.5 mm pitch/Disconnectable Crimp style connectors



The ZH connector is very small with a mounting height of 5.6 mm and a thickness of only 3.5 mm. Contact retention lances on the housing make insertion easier, while the dimple at the center of the contact ensures reliable contact with the post.

- Compact, low profile design
- Housing lances
- Reliable contact construction
- Distortion resistant construction
- Compatible with the ZR insulation displacement connectors

## Specifications -

- Current rating: 1.0 A AC/DC (AWG #26)
- Voltage rating: 50 V AC/DC
- Temperature range: -25℃ to +85℃

(including temperature rise in applying

electrical current)

• Contact resistance: Initial value/ 20 m $\Omega$  max.

After environmental tests/ 30 m $\Omega$  max.

- Insulation resistance: 500  $M\Omega$   $\,$  min.
- Withstanding voltage: 500 VAC/minute
- Applicable wire: AWG #32 to #26
- Applicable PC board thickness: 0.6 to 1.2 mm, 1.6 mm
- \* In using the products, refer to "Handling Precautions for Terminals and Connectors" described on our website (Technical documents of Product information page).
- \* RoHS2 compliance
- \* Dimensional unit: mm
- \* Contact JST for details.

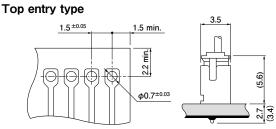
### Standards -

Recognized E60389

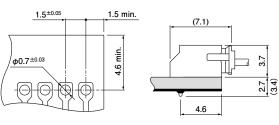
© Certified LR20812

### PC board layout and Assembly layout

⟨Through-hole type (viewed from soldering side) ⟩



Side entry type



Note: 1. Tolerances are non-cumulative:  $\pm$  0.05 mm for all centers.

2. Hole dimension differ according to the type of PC board and piercing method. If PC boards made of hard material are used, the hole dimensions should be larger. The dimensions above should serve as a guideline. Contact JST for details.

SM4 type

### ⟨SMT type (viewed from connector mounting side) ⟩

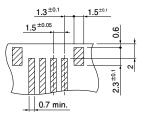
1.5×(N-1)+0.9 1.5<sup>±0.05</sup> 0.7 min.

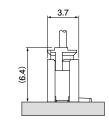
SM2 type

Side entry type

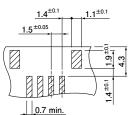
Top entry type

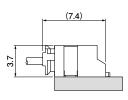
(7.4)





Side entry type

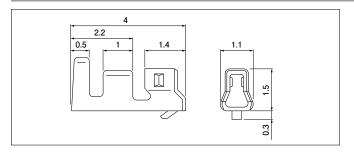




- Note: 1. N...Number of circuits
  - 2. Tolerances are non-cumulative:  $\pm$  0.05 mm for all centers.
  - 3. The dimensions above should serve as a guideline. Contact JST for details.

# **ZH CONNECTOR**

### Contact



| Model No.     |                 | Q'ty/ |                      |        |
|---------------|-----------------|-------|----------------------|--------|
| woder No.     | mm <sup>2</sup> | AWG#  | Insulation O.D. (mm) | reel   |
| SZH-002T-P0.5 | 0.08~0.13       | 28~26 | 0.8~1.1              | 13,000 |
| SZH-003T-P0.5 | 0.032~0.08      | 32~28 | 0.5~0.9              | 16,000 |

### Material and Finish

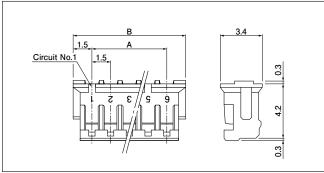
Phosphor bronze, tin-plated (reflow treatment)

### RoHS2 compliance

|               | Crimping | ping Applicator  |               |                            |  |  |
|---------------|----------|------------------|---------------|----------------------------|--|--|
| Contact       | machine  | Crimp applicator | Dies          | Crimp applicator with dies |  |  |
| SZH-002T-P0.5 | AP-K2N   | I MKS-L ∣        | MK/SZH-002-05 | APLMK SZH002-05            |  |  |
| SZH-003T-P0.5 |          |                  | MK/SZH-003-05 | APLMK SZH003-05            |  |  |

Note: Contact JST for fully automatic crimping applicator.

### Housing



<For reference> As the color identification, the following alphabet shall be put in the underlined part. For availability, delivery and minimum order quantity, contact JST.

ZHR-2-00

(blank)...natural (white)

K...black R...red E...blue M...green L...lemon yellow LE...light blue DO...dark orange H...gray

| No. of   | Model No.  | Dimension | Q'ty/ |       |
|----------|------------|-----------|-------|-------|
| circuits |            | Α         | В     | bag   |
| 2        | ZHR-2      | 1.5       | 4.5   | 1,000 |
| 3        | ZHR-3      | 3.0       | 6.0   | 1,000 |
| 4        | ZHR-4      | 4.5       | 7.5   | 1,000 |
| 5        | ZHR-5      | 6.0       | 9.0   | 1,000 |
| 6        | ZHR-6      | 7.5       | 10.5  | 1,000 |
| 6        | ZHR-6(3.0) | 15.0      | 18.0  | 1,000 |
| 7        | ZHR-7      | 9.0       | 12.0  | 1,000 |
| 8        | ZHR-8      | 10.5      | 13.5  | 1,000 |
| 9        | ZHR-9      | 12.0      | 15.0  | 1,000 |
| 10       | ZHR-10     | 13.5      | 16.5  | 1,000 |
| 11       | ZHR-11     | 15.0      | 18.0  | 1,000 |
| 12       | ZHR-12     | 16.5      | 19.5  | 1,000 |
| 13       | ZHR-13     | 18.0      | 21.0  | 1,000 |

### Material and Finish

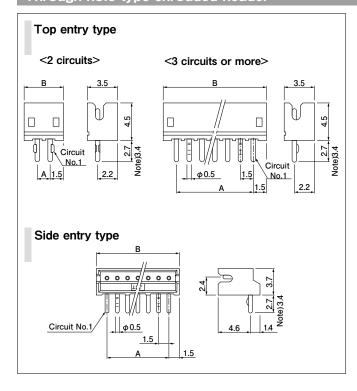
PA 66, UL94V-0, natural (white)

### RoHS2 compliance

Note: 1. ZHR-6(3.0) is 6 circuits 3.0mm pitch plugged up. As for this housing, only circuit No.1 is marked.

2. ZHR-6(3.0) is not UL/CSA approved.

### Through-hole type shrouded header



|                 | Model No.      |                 |                      |                          | Dimensions (mm) |      | Q'ty/box          |                    |                        |
|-----------------|----------------|-----------------|----------------------|--------------------------|-----------------|------|-------------------|--------------------|------------------------|
| No. of circuits | Top entry type | Side entry type | Note) Top entry type | Note)<br>Side entry type | Α               | В    | Top entry<br>type | Side entry<br>type | Side entry<br>type-3.4 |
| 2               | B2B-ZR         | S2B-ZR          | B2B-ZR-3.4           | S2B-ZR-3.4               | 1.5             | 4.5  | 2,000             | 2,000              | 2,000                  |
| 3               | B3B-ZR         | S3B-ZR          | B3B-ZR-3.4           | S3B-ZR-3.4               | 3.0             | 6.0  | 2,000             | 2,000              | 1,000                  |
| 4               | B4B-ZR         | S4B-ZR          | B4B-ZR-3.4           | S4B-ZR-3.4               | 4.5             | 7.5  | 2,000             | 2,000              | 2,000                  |
| 5               | B5B-ZR         | S5B-ZR          | B5B-ZR-3.4           | S5B-ZR-3.4               | 6.0             | 9.0  | 2,000             | 1,000              | 1,000                  |
| 6               | B6B-ZR         | S6B-ZR          | B6B-ZR-3.4           | S6B-ZR-3.4               | 7.5             | 10.5 | 2,000             | 1,000              | 1,000                  |
| 7               | B7B-ZR         | S7B-ZR          | B7B-ZR-3.4           | S7B-ZR-3.4               | 9.0             | 12.0 | 1,000             | 1,000              | 1,000                  |
| 8               | B8B-ZR         | S8B-ZR          | B8B-ZR-3.4           | S8B-ZR-3.4               | 10.5            | 13.5 | 1,000             | 1,000              | 1,000                  |
| 9               | B9B-ZR         | S9B-ZR          | B9B-ZR-3.4           | S9B-ZR-3.4               | 12.0            | 15.0 | 1,000             | 1,000              | 1,000                  |
| 10              | B10B-ZR        | S10B-ZR         | B10B-ZR-3.4          | S10B-ZR-3.4              | 13.5            | 16.5 | 1,000             | 1,000              | 1,000                  |
| 11              | B11B-ZR        | S11B-ZR         | B11B-ZR-3.4          | S11B-ZR-3.4              | 15.0            | 18.0 | 1,000             | 500                | 500                    |
| 12              | B12B-ZR        | S12B-ZR         | B12B-ZR-3.4          | S12B-ZR-3.4              | 16.5            | 19.5 | 1,000             | 500                | 500                    |
| 13              | B13B-ZR        | S13B-ZR         | B13B-ZR-3.4          | S13B-ZR-3.4              | 18.0            | 21.0 | 500               | 500                | 500                    |
|                 |                |                 |                      |                          |                 |      |                   |                    |                        |

### Material and Finish

Pin: Brass, copper-undercoated, tin-plated (reflow treatment) Wafer: Glass-filled PA 66, UL94V-0, natural (ivory)

RoHS2 compliance This product displays (LF)(SN) on a label.

Note: Headers with 3.4mm long solder tails, suited for the 1.6mm thick PC board.

<For reference> As the color identification,

the following alphabet shall be put in the underlined part. For availability, delivery and minimum order quantity, contact JST.

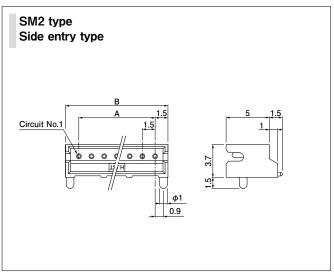
B2B-ZR-3.4-oo

(blank)...natural (ivory)

K...black R...red E...blue M...green Y...Yellow

# **ZH CONNECTOR**

### SMT type shrouded header



# SM4 type (with solder tabs) Top entry type B A 2.25 Circuit No.1 Side entry type Circuit No.1 Side entry type

### SM2 type

| No. of   | Model No.             | Dimensio | Q'ty/ |       |
|----------|-----------------------|----------|-------|-------|
| circuits | cuits Side entry type |          | В     | reel  |
| 2        | S2B-ZR-SM2-TF         | 1.5      | 4.5   | 1,000 |
| 3        | S3B-ZR-SM2-TF         | 3.0      | 6.0   | 1,000 |
| 4        | S4B-ZR-SM2-TF         | 4.5      | 7.5   | 1,000 |
| 5        | S5B-ZR-SM2-TF         | 6.0      | 9.0   | 1,000 |
| 6        | S6B-ZR-SM2-TF         | 7.5      | 10.5  | 1,000 |
| 7        | S7B-ZR-SM2-TF         | 9.0      | 12.0  | 1,000 |
| 8        | S8B-ZR-SM2-TF         | 10.5     | 13.5  | 1,000 |
| 9        | S9B-ZR-SM2-TF         | 12.0     | 15.0  | 1,000 |
| 10       | S10B-ZR-SM2-TF        | 13.5     | 16.5  | 1,000 |
| 11       | S11B-ZR-SM2-TF        | 15.0     | 18.0  | 1,000 |
| 12       | S12B-ZR-SM2-TF        | 16.5     | 19.5  | 1,000 |
| 13       | S13B-ZR-SM2-TF        | 18.0     | 21.0  | 1,000 |

### Material and Finish

Pin: Brass, copper-undercoated, tin-plated (reflow treatment) Wafer: Glass-filled PA 46, UL94V-0, natural (ivory)

RoHS2 compliance This product displays (LF)(SN) on a label.

### SM4 type

| No. of circuits | Model No.      |                 |      | Dimensions (mm) |                   | Q'ty/reel          |  |
|-----------------|----------------|-----------------|------|-----------------|-------------------|--------------------|--|
|                 | Top entry type | Side entry type | Α    | В               | Top entry<br>type | Side entry<br>type |  |
| 2               | B2B-ZR-SM4-TF  | S2B-ZR-SM4A-TF  | 1.5  | 6.0             | 1,000             | 1,000              |  |
| 3               | B3B-ZR-SM4-TF  | S3B-ZR-SM4A-TF  | 3.0  | 7.5             | 1,000             | 1,000              |  |
| 4               | B4B-ZR-SM4-TF  | S4B-ZR-SM4A-TF  | 4.5  | 9.0             | 1,000             | 1,000              |  |
| 5               | B5B-ZR-SM4-TF  | S5B-ZR-SM4A-TF  | 6.0  | 10.5            | 1,000             | 1,000              |  |
| 6               | B6B-ZR-SM4-TF  | S6B-ZR-SM4A-TF  | 7.5  | 12.0            | 1,000             | 1,000              |  |
| 7               | B7B-ZR-SM4-TF  | S7B-ZR-SM4A-TF  | 9.0  | 13.5            | 1,000             | 1,000              |  |
| 8               | B8B-ZR-SM4-TF  | S8B-ZR-SM4A-TF  | 10.5 | 15.0            | 1,000             | 1,000              |  |
| 9               | B9B-ZR-SM4-TF  | S9B-ZR-SM4A-TF  | 12.0 | 16.5            | 1,000             | 1,000              |  |
| 10              | B10B-ZR-SM4-TF | S10B-ZR-SM4A-TF | 13.5 | 18.0            | 1,000             | 1,000              |  |
| 11              | B11B-ZR-SM4-TF | S11B-ZR-SM4A-TF | 15.0 | 19.5            | 1,000             | 1,000              |  |
| 12              | B12B-ZR-SM4-TF | S12B-ZR-SM4A-TF | 16.5 | 21.0            | 1,000             | 1,000              |  |
| 13              | B13B-ZR-SM4-TF | S13B-ZR-SM4A-TF | 18.0 | 22.5            | 1,000             | 1,000              |  |

### Material and Finish

Pin: Brass, copper-undercoated, tin-plated (reflow treatment) Wafer: PA 6T, UL94V-0, natural (ivory) Solder tab: Brass, copper-undercoated, tin-plated (reflow treatment)

RoHS2 compliance This product displays (LF)(SN) on a label.

Note: 1. PA 9T is used for some colored products.

- 2. The products listed above are supplied on embossed-tape.
- 3. Contact JST for the top entry type headers with suction cap.

<For reference> As the color identification, the following alphabet shall be put in the underlined part.

For availability, delivery and minimum order quantity, contact JST.

### ex. S2B-ZR-SM4A-<u>oo</u>-TF

(blank)...natural (ivory)

K...black R...red E...blue M...green L...lemon yellow LE...light blue DO...dark orange DH...dark gray

# **X-ON Electronics**

Largest Supplier of Electrical and Electronic Components

Click to view similar products for Headers & Wire Housings category:

Click to view products by JST manufacturer:

Other Similar products are found below:

95000-104TRLF 10135584-644402LF DF62W-EP2022PCA 95000-106TRLF DF62W-2022SCA DF62W-EP2022PC 2203348 DF62W-2022SC 1084018 1029039 1084017 802-10-012-10-002000 1112640 1112639 891-007-9SS-BST1T 000-34000 0008550134 0009482033 0009507031 57102-F02-18ULF 57102-S06-03LF 57202-S52-04LF PCN6-15S-2.5E 0039019024 58102-G61-06LF 582553-1 0009485154 0009508121 0022285053 0050291907 018731A LY20-4P-DT1-P1E-BR 02.125.8002.8 60101931 60598-1 (Cut Strip) M1625-3R/100 61062-3 61082-181009 CSU011177004 636-1427 638009-1 641938-9 641991-4 644168-1 644827-2 647662-1 65039-019ELF 65692-001LF 65781-018 65781-047