**0.8mm Pitch**

**Connectors**

# HDRA series

## 0.8 mm Pitch Connectors

## Outline

HDRA series connectors have been developed based on the HDR series products for high speed signal interfaces such as SCSI-III, VHDCI and PCI.

## Features

- Conforms to the United States ANSI/SFF8441 standards
- Provided with high performance EMI/ESD-shielded structure
- Mounted with locks or screws
- Low profile
- Sequence structure

## Principal Applications

Server, Router, Notebook type personal computers and their peripheral equipment, and mobile equipment

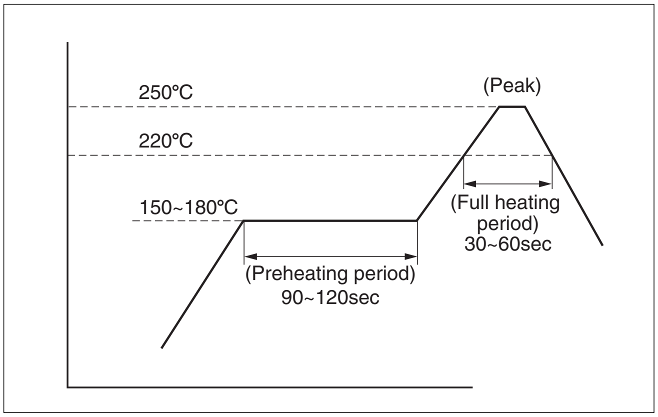
## Electrical Characteristics

| | |
|---|---|
| Rated voltage | 30V AC (r.m.s.) |
| Rated current | 0.3 A |
| Insulation resistance | Over 500 megohms at 100V DC |
| Dielectric withstanding voltage | 250V AC (r.m.s.) |
| Contact resistance | 70 milliohms or less<br>(for combination of MA or MA1 and LFDT)<br>100 milliohms or less<br>(for combination with MA1 and W1LFDT) |

**Document Disclaimer**

- ■ When placing orders with us, minimum order quantities are set for every product.
- ■ Be sure to contact us before starting preliminary design of PCBs using our connectors.
- ■ The specifications and information shown in the catalog are subject to change without notice.

## Reflow temperature profile (for reference purposes)



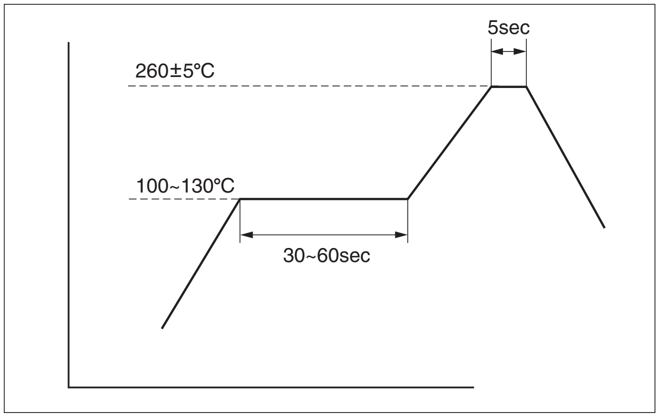
The reflow temperature profile shown in this drawing is for reference purposes. This profile depends on requirements such as reflow equipment, soldering paste, and PCB size. Thus, this profile may not meet with your specific situation. Please evaluate your PCB-mounting soldering and set your own reflow temperature profile.

### ●Applicable products

**HDRA series SMT type for PCB**

The profile shown in this drawing is applicable only for those products shown above.

## Flow temperature profile (for reference purposes)



The flow temperature profile as shown above is for reference purposes. This profile depends on requirements such as the PCB size. Thus, this profile may not meet with your specific situation. Please evaluate your PCB-mounting soldering and set your own flow temperature profile.

### ●Applicable products

**HDRA series through hole type for PCB**

The profile shown in this drawing is applicable only for those products shown above.

# Product List

**IDC type male connector for cable**
**HDRA-E36MA+**

**A-22**
HDRA series...6

**IDC type male connector for cable**
**HDRA-E68MA+**

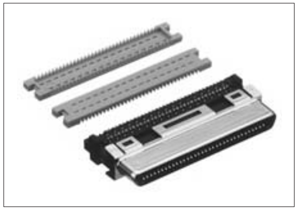
**A-23**
HDRA series...7

**IDC type male connector for cable**
**HDRA-E68M( )1+**

**A-24**
HDRA series...8

**IDC type male connector for cable**
**HDRA-E100M( )1+**

**A-25**
HDRA series...9

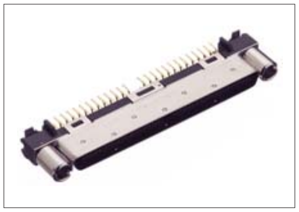


**IDC type female connector for cable**
**HDRA-E68FAG1+**

**A-26**
HDRA series...10

**Straddle SMT type male connector for PCB**
**HDRA-E68MT+**

**A-27**
HDRA series...11



**Straight through hole type male connector for PCB**
**HDRA-EC100MDT-( )+**

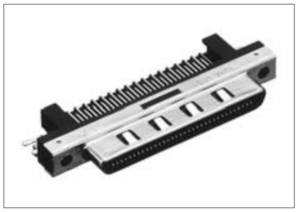
**A-28**
HDRA series...12

**Straight through hole type female connector for PCB**
**HDRA-EC68FDT+**

**A-29**
HDRA series...13

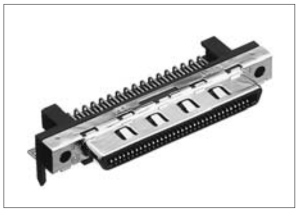
**Straight through hole type female connector for PCB**
**HDRA-EC100FDT+**

**A-30**
HDRA series...14



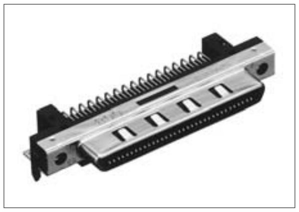
**Right-angle through hole type female connector for PCB**
**HDRA-E68LFDT-OM18+**

**A-31**
HDRA series...15



**Right-angle through hole type female connector for PCB**
**HDRA-E68LFD1T-( )+**

**A-32**
HDRA series...16



**Right-angle through hole type female connector for PCB**
**HDRA-EC68LFDT( )-( )+**

**A-33**
HDRA series...17

**Right-angle through hole type female connector for PCB**
**HDRA-EC100LFDT( )-( )+**

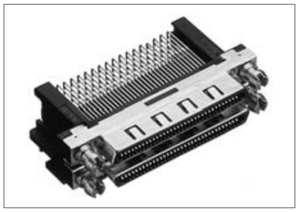
**A-34**
HDRA series...18

**Right-angle through hole type female connector for PCB**
**HDRA-EA36LFDT-( )+**

**A-35**
HDRA series...19

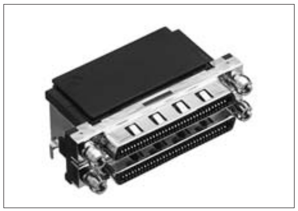
**Right-angle through hole type female connector for PCB**
**HDRA-E100LFDT( )-( )+**

**A-36**
HDRA series...20



**Right-angle through hole type female connector for PCB**
**HDRA-E68W1LFDT-( )+**

**A-37**
HDRA series...21

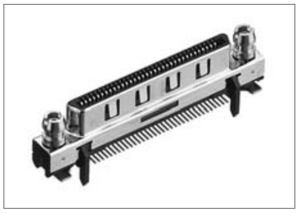


**Right-angle through hole type female connector for PCB**
**HDRA-E68W( )LFDT1EC-( )+**

**A-38**
HDRA series...22

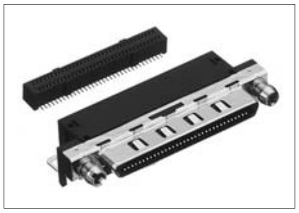
**Right-angle through hole type female connector for PCB**
**HDRA-E100W( )LFDT1EC-( )+**

**A-39**
HDRA series...23



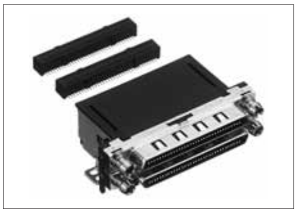
**Straight SMT type female connector for PCB**
**HDRA-E68FYT-( )+**

**A-40**
HDRA series...24



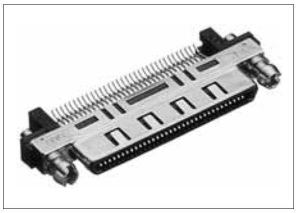
**Right-angle SMT type female connector for PCB**
**HDRA-ED68LFZGT( )-( )+**

**A-41**
HDRA series...25



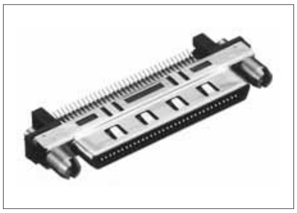
**Right-angle SMT type female connector for PCB**
**HDRA-ED136LFZGT( )-( )+**

**A-48**
HDRA series...26



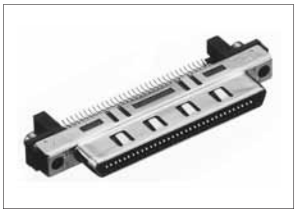
**Straddle SMT type female connector for PCB**
**HDRA-E68FT+**

**A-49**
HDRA series...27



**Straddle SMT type female connector for PCB**
**HDRA-E68FT2-( )+**

**A-50**
HDRA series...28



**Straddle SMT type female connector for PCB**
**HDRA-E68FT2-OM06+**

**A-51**
HDRA series...29

**Straddle SMT type female connector for PCB**
**HDRA-EA36FT-NS+**

**A-52**
HDRA series...30

**EMI-shielded vertical plastic housing for standard cable**
**HDRA-E68LGKP( )**

**A-53**
HDRA series...31

**EMI-filtered vertical metallic housing**
**HDRA-E100LPA**

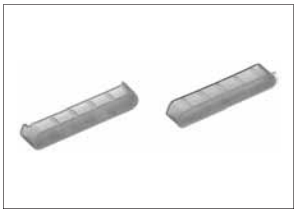
**A-54**
HDRA series...32

**EMI-filtered vertical metallic housing**
**HDRA-E100LPW( )**

**A-55**
HDRA series...33

**EMI-shielded vertical plastic housing**
**HDRA-E36LPTH**

**A-56**
HDRA series...34

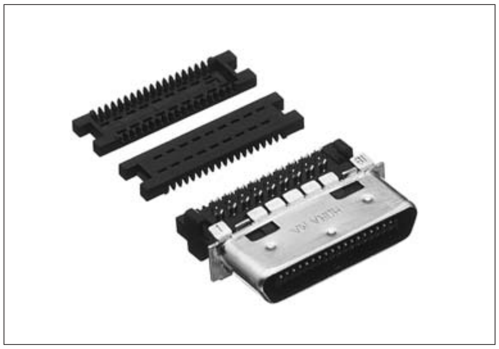


**Dust-proof cap**
**HDRA-E68( )-CP**

**A-57**
HDRA series...35

# IDC type male connector for cable
# HDRA-E36MA+

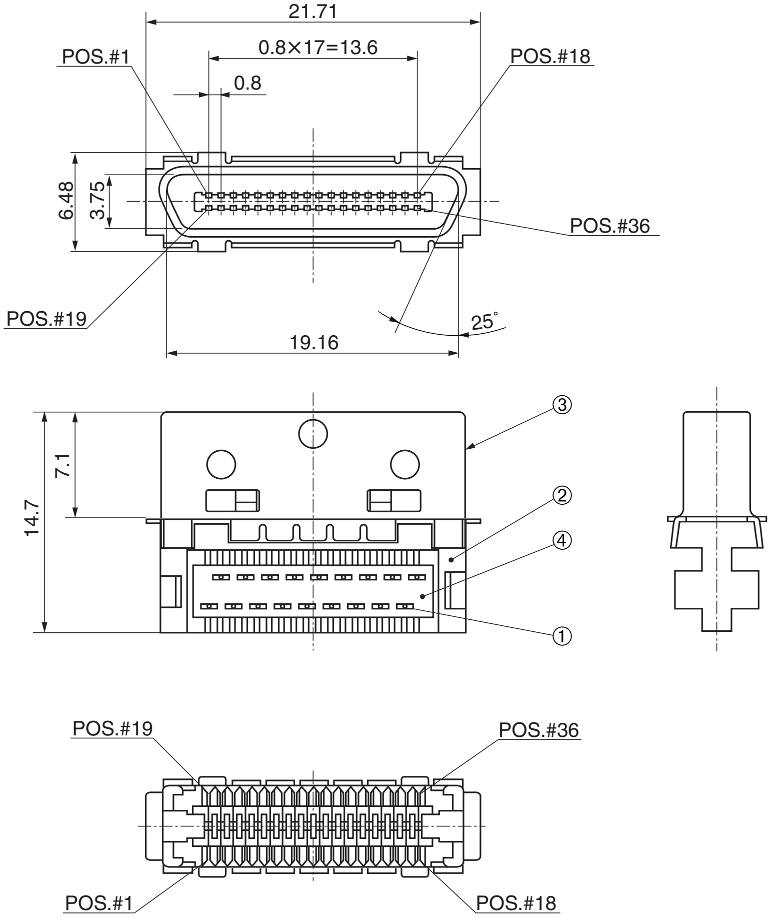
RoHS

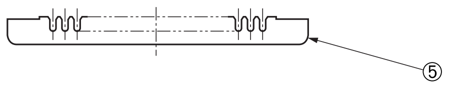


● **Configuration of product Part No.**

**HDRA- E 36 M A+**
① ② ③ ④

① Series name
② No. of contacts: 36
③ Type of contact
M: IDC type, male
④ Compatible cable
A: AWG#30(7/0.1), dia. 0.58 mm


21.71
0.8×17=13.6
0.8
POS.#1
POS.#18
POS.#36
POS.#19
6.48
3.75
25°
19.16
14.7
7.1
③
②
④
①
POS.#19
POS.#36
POS.#1
POS.#18



● **Components**

| | |
|---|---|
| ① | Contacts |
| ② | Insulator |
| ③ | Shell |
| ④ | Spacer |
| ⑤ | Cable housing |

**Mating connector**: HDRA series right-angle through hole type or straddle SMT type female connector

**For use with housings**: HDRA series upright housing, HDRA-E36LPTH

[redacted]

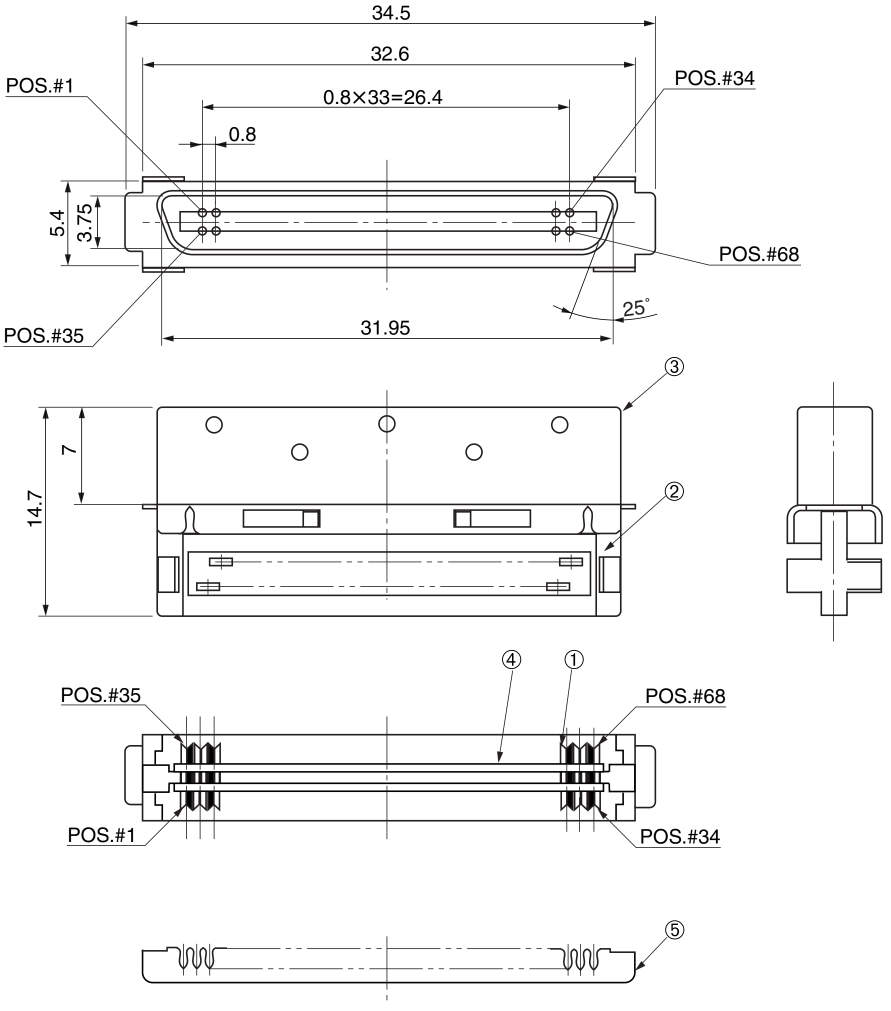
# IDC type male connector for cable
# HDRA-E68MA+

RoHS

● **Configuration of product Part No.**

**HDRA- E 68 M A+**
① ② ③ ④

① Series name
② No. of contacts: 68
③ Type of contact
M: IDC type, male
④ Compatible cable
A: AWG#30 (7/0.1), dia. 0.58 mm


34.5
32.6
0.8×33=26.4
0.8
POS.#1
POS.#34
POS.#35
POS.#68
5.4
3.75
25°
31.95
③
②
7
14.7
④
①
POS.#35
POS.#68
POS.#1
POS.#34
⑤

● **Components**

| | |
|---|---|
| ① | Contacts |
| ② | Insulator |
| ③ | Shell |
| ④ | Spacer |
| ⑤ | Cable housing |

**Mating connector**: HDRA series right-angle through hole type or straddle SMT type female connector

**For use with housings**: HDRA series upright housing, HDRA-E68LGKPA

# IDC type male connector for cable
# HDRA-E68M( )1+

RoHS

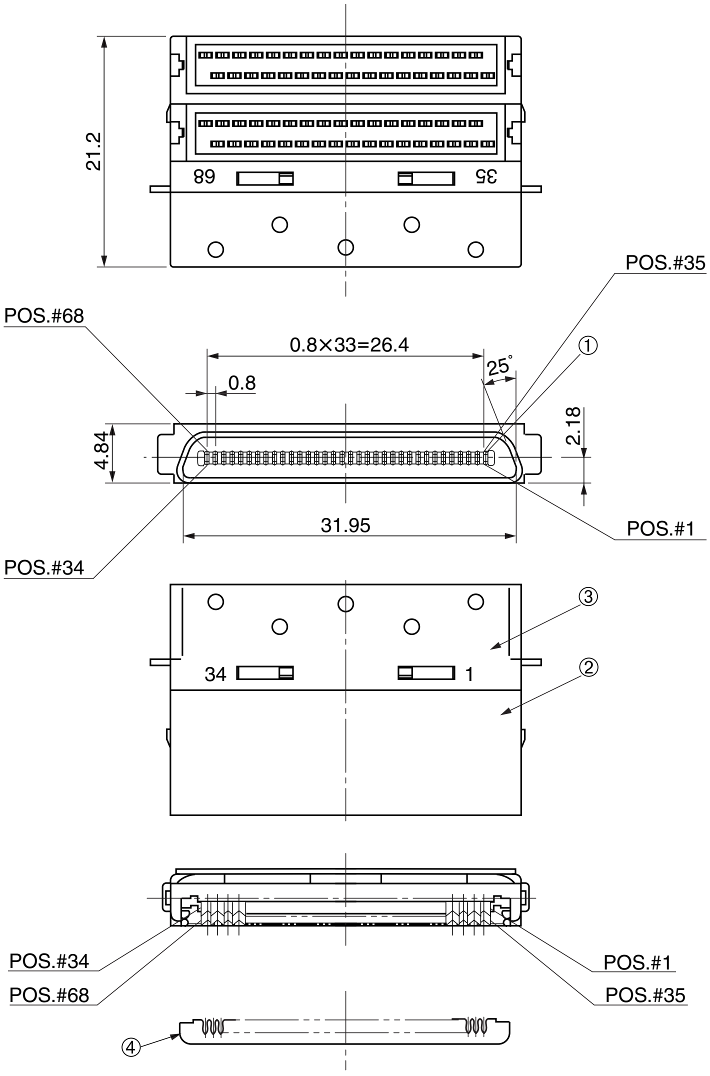
● **Configuration of product Part No.**

**HDRA- E 68 M ( ) 1+**

① ② ③ ④ ⑤

① Series name
② No. of contacts: 68
③ Type of contact
M: IDC type, male
④ Compatible cable
Blank: AWG#30 (1/0.254), dia. 0.58 mm
A : AWG#30 (7/0.1), dia. 0.58 mm
C : AWG#34 (7/0.064), dia. 0.44 mm

⑤ IDC method
1: One side IDC


21.2
68
35
POS.#35
POS.#68
0.8×33=26.4
①
25°
0.8
2.18
4.84
31.95
POS.#1
POS.#34
③
②
34
1
POS.#34
POS.#68
POS.#1
POS.#35
④

● **Components**

| | |
|---|---|
| ① | Contacts |
| ② | Insulator |
| ③ | Shell |
| ④ | Cable housing |

**Mating connector**: HDRA series right-angle through hole type or straddle SMT type female connector

**For use with housings**: HDRA series vertical housing, HDRA-E68LGKP ( )

**Required tool**: Termination tool: FHAT-0027, IDC tool: FLPT-0021A, Hand presser: RPS-K4 (Refer to page Tool-10)

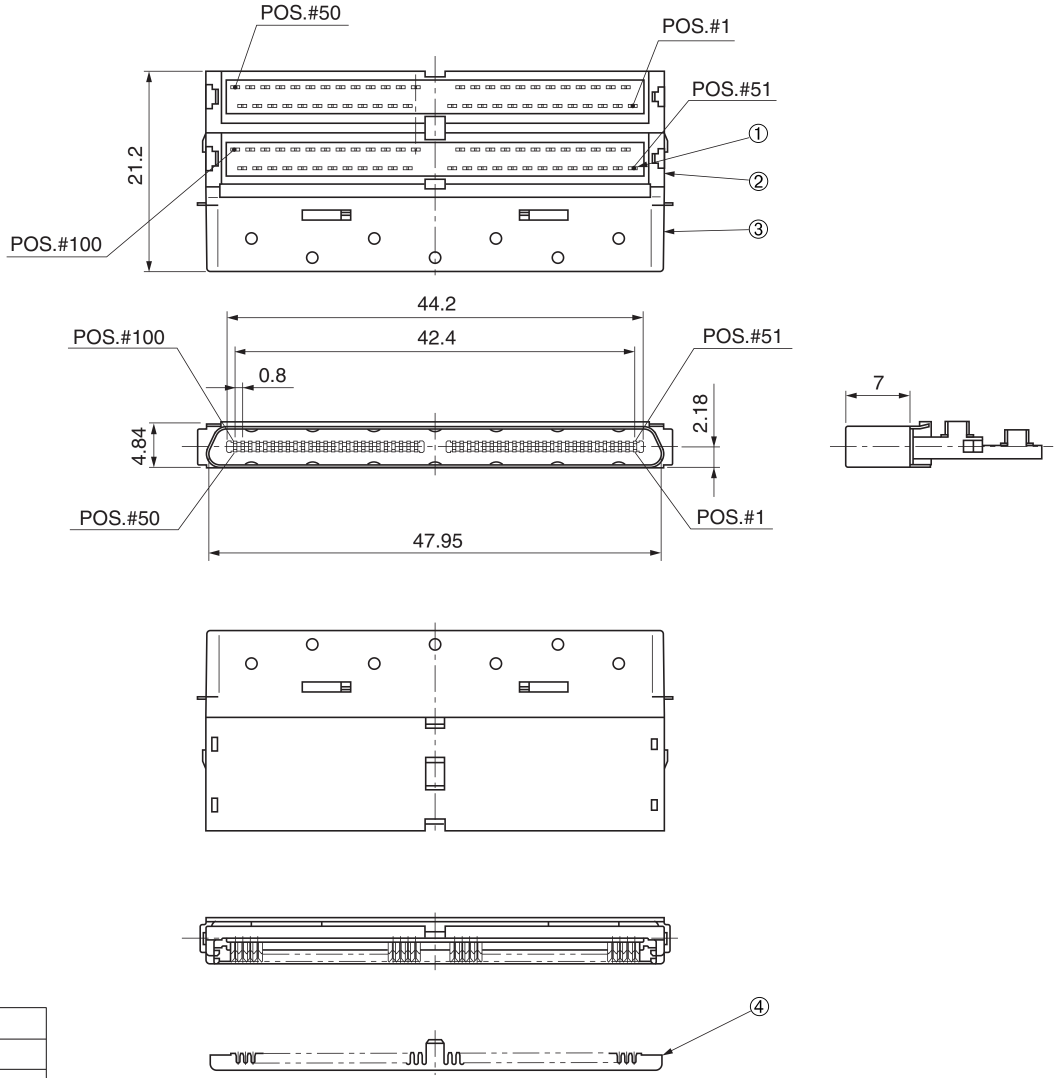
# IDC type male connector for cable
# HDRA-E100M( )1+

RoHS

● **Configuration of product Part No.**

**HDRA- E 100 M ( ) 1+**
① ② ③ ④

① Series name
② No. of contacts: 100
③ Type of contact
M: IDC type, male
④ Compatible cable
Blank: AWG#30 (1/0.254), dia. 0.58 mm
A : AWG#30 (7/0.1), dia. 0.58 mm


POS.#50
POS.#1
POS.#51
①
②
③
21.2
POS.#100
44.2
POS.#100
42.4
POS.#51
0.8
2.18
4.84
POS.#50
POS.#1
47.95
7
④

● **Components**

| | |
|---|---|
| ① | Contacts |
| ② | Insulator |
| ③ | Shell |
| ④ | Cable housing |

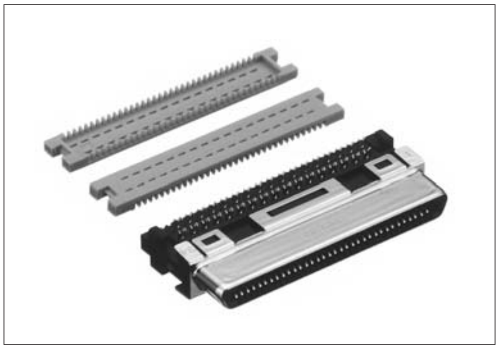
**Mating connector**: HDRA series right-angle through hole type female connector

**For use with housings**: HDRA series vertical housing, HDRA-E100LPA, HDRA-E100LPW( )

**Required tool**: Termination tool: FHAT-0038A, IDC tool: FLPT-0021A, Hand presser: RPS-K4 (Refer to page Tool-10)

# IDC type female connector for cable
# HDRA-E68FAG1+

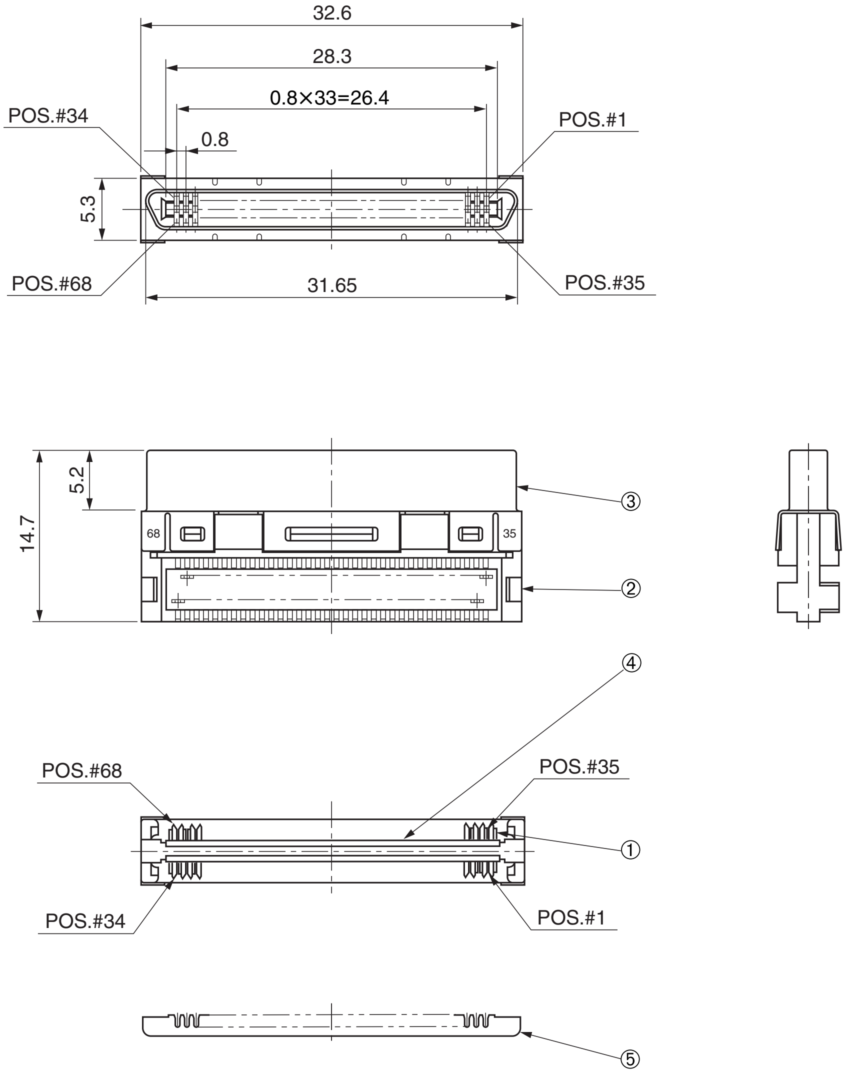
RoHS



● **Configuration of product Part No.**

**HDRA- E 68 F A G1+**
① ② ③ ④ ⑤

① Series name
② No. of contacts: 68
③ Type of contact
F: IDC type, female
④ Compatible cable
A: AWG#30 (7/0.1), dia. 0.58 mm
⑤ Contact plating
G1: 0.76 µm or more Gold plate


32.6
28.3
0.8×33=26.4
0.8
POS.#34
POS.#1
5.3
POS.#68
31.65
POS.#35
5.2
14.7
68
35
③
②
④
POS.#68
POS.#35
①
POS.#34
POS.#1
⑤

● **Components**

| | |
|---|---|
| ① | Contacts |
| ② | Insulator |
| ③ | Shell |
| ④ | Spacers |
| ⑤ | Cable housing |

**Mating connector**: HDRA series right-angle through hole type or straddle SMT type male connector

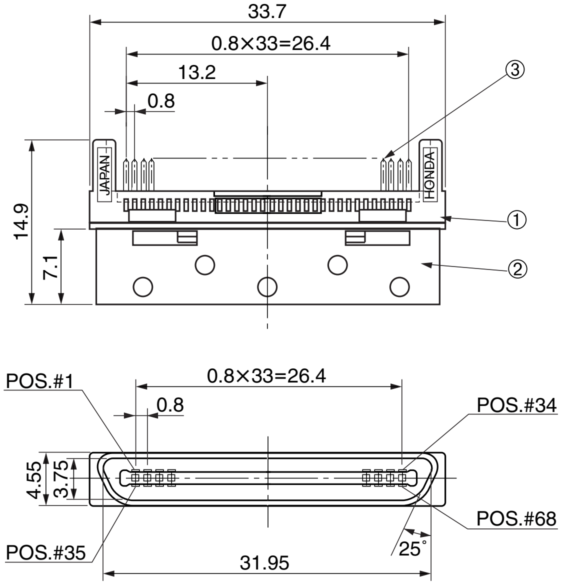
# Straddle SMT type male connector for PCB
# HDRA-E68MT+

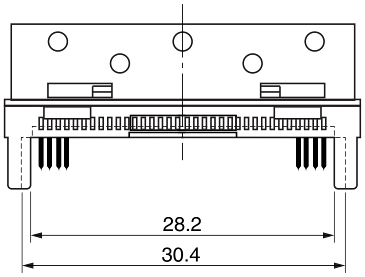
RoHS

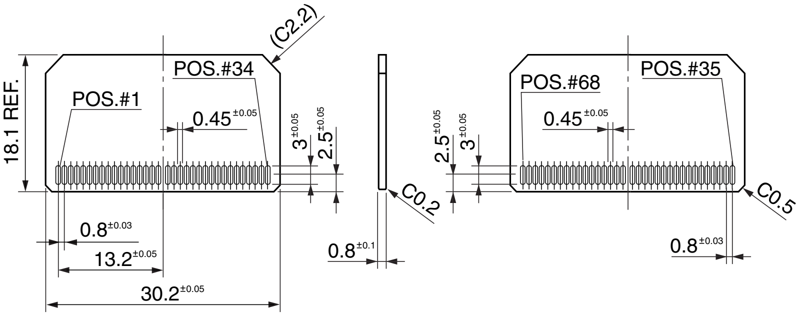
● **Configuration of product Part No.**

$\underset{①}{\underline{\text{HDRA}}}\text{- E}\underset{②}{\underline{68}}\ \underset{③}{\underline{\text{MT}}}\text{+}$

① Series name
② No. of contacts: 68
③ Type of contact
MT: Straddle SMT type, male


33.7
0.8×33=26.4
13.2
0.8
③
JAPAN
HONDA
①
②
14.9
7.1
POS.#1
0.8×33=26.4
0.8
POS.#34
4.55
3.75
POS.#68
POS.#35
25°
31.95




(C2.2)
18.1 REF.
POS.#34
POS.#1
$0.45^{\pm0.05}$
$3^{\pm0.05}$
$2.5^{\pm0.05}$
$0.8^{\pm0.03}$
$13.2^{\pm0.05}$
$30.2^{\pm0.05}$
C0.2
$0.8^{\pm0.1}$
$2.5^{\pm0.05}$
$3^{\pm0.05}$
POS.#68
POS.#35
$0.45^{\pm0.05}$
C0.5
$0.8^{\pm0.03}$

**Recommended PCB layout**
**t=0.8mm**

● **Components**

| | |
|---|---|
| ① | Insulator |
| ② | Shell |
| ③ | Contacts |

**Mating connector**: HDRA series through hole type or straddle SMT type female connector

**0.8mm pitch connector**

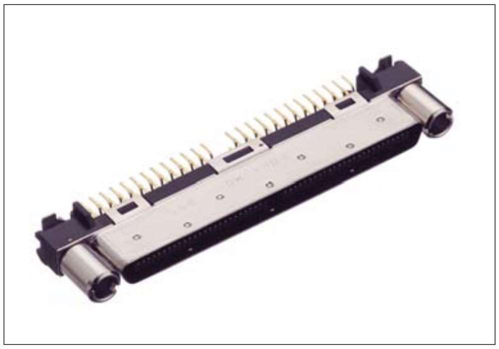
**For PCB**

**Straight Through hole**

**EMI shielded**

# Straight through hole type male connector for PCB
# HDRA-EC100MDT-( )+

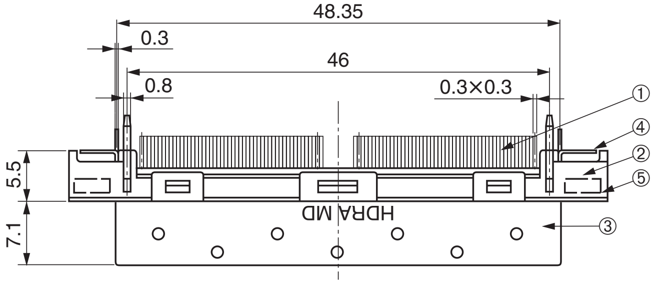
RoHS

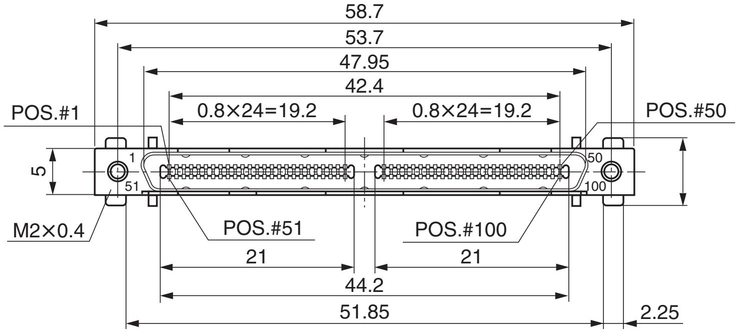


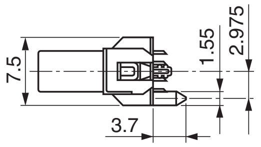
● **Configuration of product Part No.**

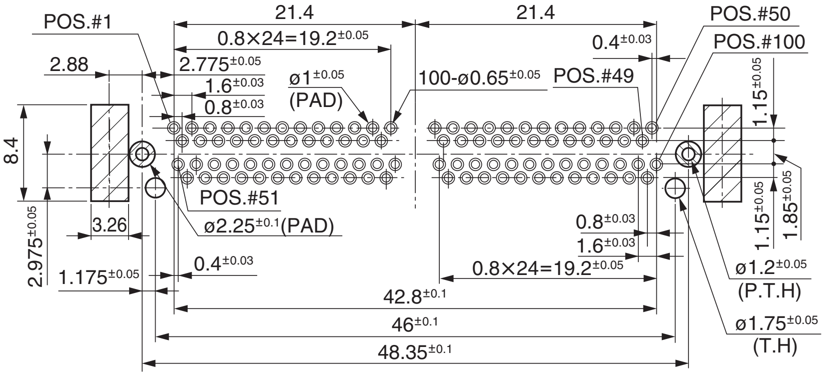
**HDRA- EC 100 MD T- ( )+**
① ② ③ ④ ⑤

① Series name
② No. of contacts: 100
③ Type of contact
MD: Straight through hole type, male
④ With ground contact
Blank: None
GP : Provided with guide hardware.
(The guide pin is required for the mating connector.)
⑤ Presence of guide metal fittings


48.35
0.3
46
0.8
0.3×0.3
①
④
②
⑤
③
5.5
7.1
HDRA MD


58.7
53.7
47.95
42.4
0.8×24=19.2
0.8×24=19.2
POS.#1
POS.#50
5
1
51
50
100
M2×0.4
POS.#51
POS.#100
21
21
44.2
51.85
2.25


7.5
1.55
2.975
3.7


POS.#1
21.4
21.4
POS.#50
0.8×24=19.2±0.05
0.4±0.03
POS.#100
2.88
2.775±0.05
1.6±0.03
0.8±0.03
ø1±0.05
(PAD)
100-ø0.65±0.05
POS.#49
1.15±0.05
8.4
POS.#51
3.26
ø2.25±0.1(PAD)
0.8±0.03
1.6±0.03
1.15±0.05
1.85±0.05
2.975±0.05
1.175±0.05
0.4±0.03
0.8×24=19.2±0.05
ø1.2±0.05
(P.T.H)
42.8±0.1
46±0.1
ø1.75±0.05
(T.H)
48.35±0.1

**Recommended PCB layout**
**t=1.6mm**

▨ : PAD

● **Components**

| | |
|---|---|
| ① | Contacts |
| ② | Insulator |
| ③ | Shell |
| ④ | Hold down |
| ⑤ | Square nuts |

**Mating connector**: HDR series female connector

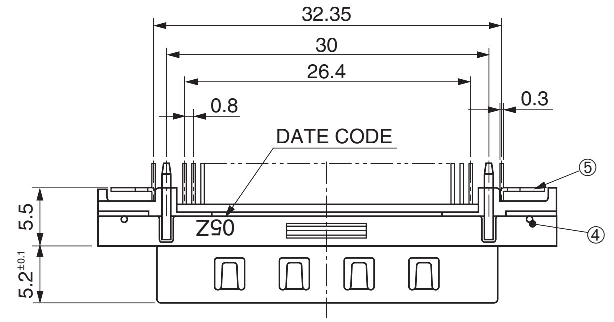
# Straight through hole type female connector for PCB
# HDRA-EC68FDT+

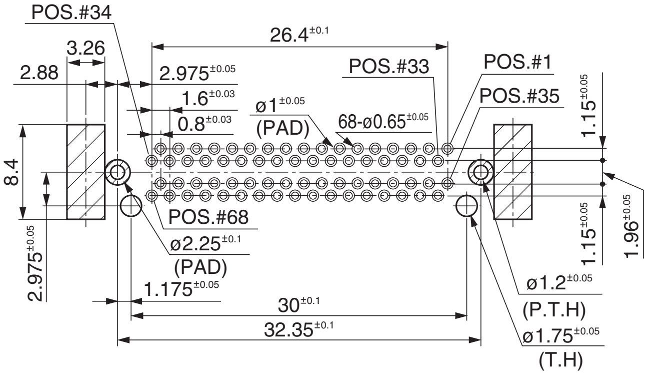
RoHS

- **Configuration of product Part No.**

**HDRA- EC 68 FD T+**
① ② ③ ④

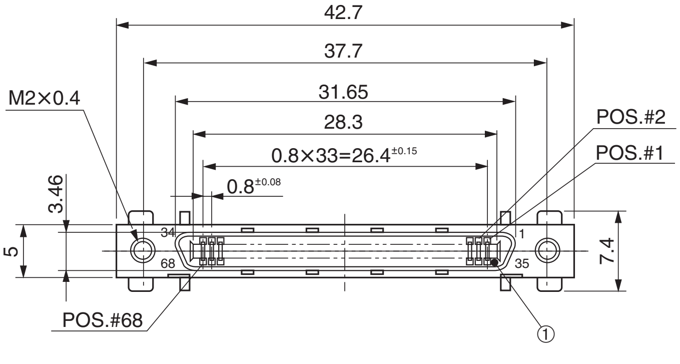
① Series name
② No. of contacts: 68
③ Type of contact
FD: Straight through hole type, female
④ With hold downs

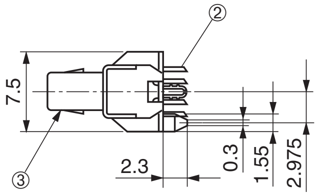

32.35
30
26.4
0.8
0.3
DATE CODE
⑤
④
5.5
$5.2^{\pm0.1}$
05Z

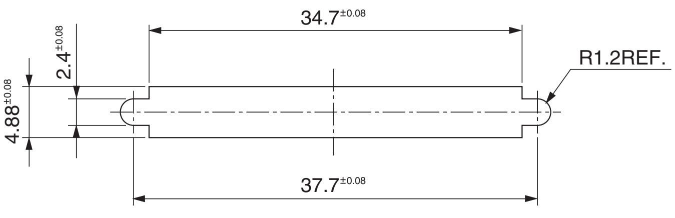

POS.#34
3.26
2.88
$26.4^{\pm0.1}$
$2.975^{\pm0.05}$
$1.6^{\pm0.03}$
$0.8^{\pm0.03}$
$ø1^{\pm0.05}$
(PAD)
$68\text{-}ø0.65^{\pm0.05}$
POS.#33
POS.#1
POS.#35
$1.15^{\pm0.05}$
8.4
POS.#68
$ø2.25^{\pm0.1}$
(PAD)
$2.975^{\pm0.05}$
$1.175^{\pm0.05}$
$30^{\pm0.1}$
$32.35^{\pm0.1}$
$1.15^{\pm0.05}$
$1.96^{\pm0.05}$
$ø1.2^{\pm0.05}$
(P.T.H)
$ø1.75^{\pm0.05}$
(T.H)

**Recommended PCB layout**
**t=1.6mm**

▨ : PAD


42.7
37.7
31.65
28.3
$0.8×33=26.4^{\pm0.15}$
$0.8^{\pm0.08}$
M2×0.4
POS.#2
POS.#1
3.46
5
7.4
34
68
1
35
POS.#68
①


②
7.5
③
2.3
0.3
1.55
2.975


$34.7^{\pm0.08}$
R1.2REF.
$2.4^{\pm0.08}$
$4.88^{\pm0.08}$
$37.7^{\pm0.08}$

**Recommended panel cut-out dimensions**

Select the connector according to panel thickness.
For the application without panel, use washers or special lock screw (P/N: HDRA-E68LFD-7C).

**Mating connector**: HDRA series male connector

**0.8mm pitch connector**

**For PCB**

**Straight Through hole**

**EMI shielded**

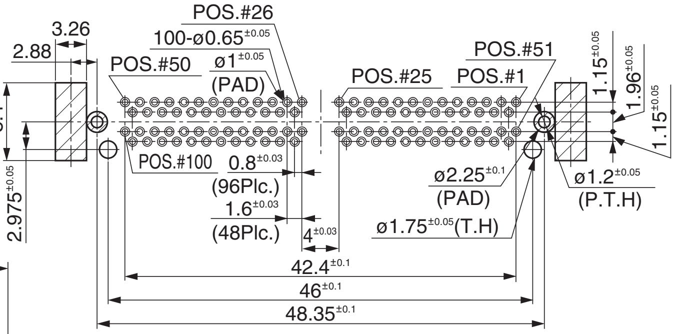
# Straight through hole type female connector for PCB HDRA-EC100FDT+

RoHS

● **Configuration of product Part No.**

**HDRA- EC 100 FD T+**
① ② ③ ④

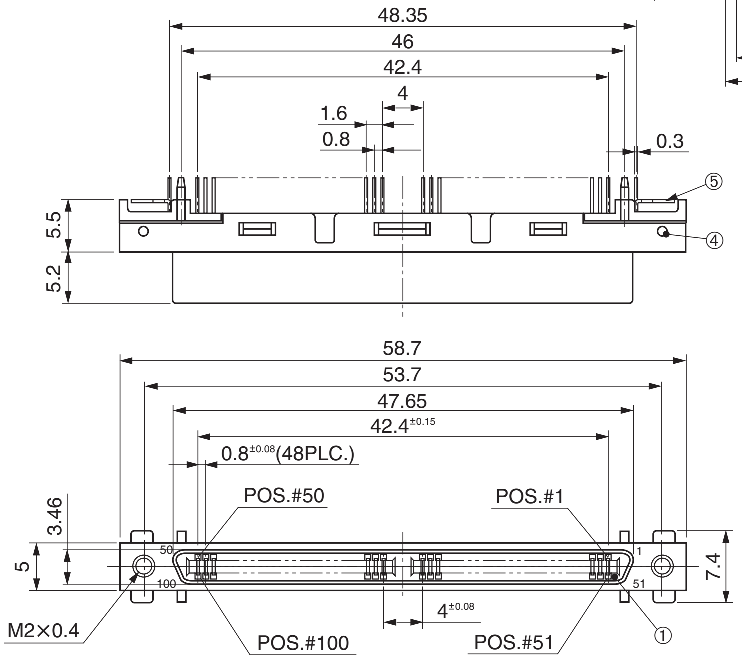
① Series name
② No. of contacts: 100
③ Type of contact
FD: Straight through hole type, female
④ With hold downs



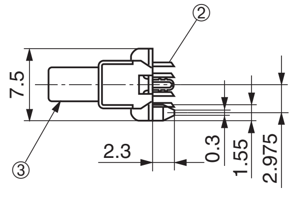
POS.#26
3.26
2.88
100-ø0.65±0.05
ø1±0.05
(PAD)
POS.#50
POS.#25
POS.#51
POS.#1
8.4
1.15±0.05
1.96±0.05
1.15±0.05
POS.#100
0.8±0.03
(96Plc.)
1.6±0.03
(48Plc.)
4±0.03
ø2.25±0.1
(PAD)
ø1.75±0.05(T.H)
ø1.2±0.05
(P.T.H)
2.975±0.05
42.4±0.1
46±0.1
48.35±0.1

**Recommended PCB layout**
**t=1.6mm**

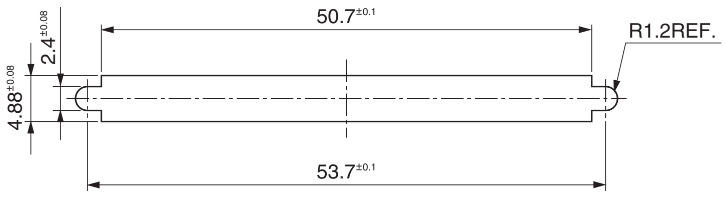
▨ : PAD



48.35
46
42.4
4
1.6
0.8
0.3
⑤
④
5.5
5.2
58.7
53.7
47.65
42.4±0.15
0.8±0.08(48PLC.)
3.46
5
POS.#50
POS.#1
50
1
100
51
7.4
M2×0.4
4±0.08
POS.#100
POS.#51
①



②
7.5
③
2.3
0.3
1.55
2.975



2.4±0.08
4.88±0.08
50.7±0.1
R1.2REF.
53.7±0.1

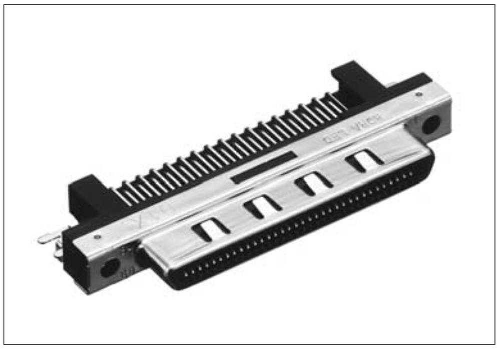
**Recommended panel cut-out dimensions**

Select the connector according to panel thickness.
For the application without panel, use washers or special lock screw (P/N: HDRA-E68LFD-7C).

**Mating connector**: HDRA series male connector

# Right-angle through hole type female connector for PCB
# HDRA-E68LFDT-OM18+

RoHS

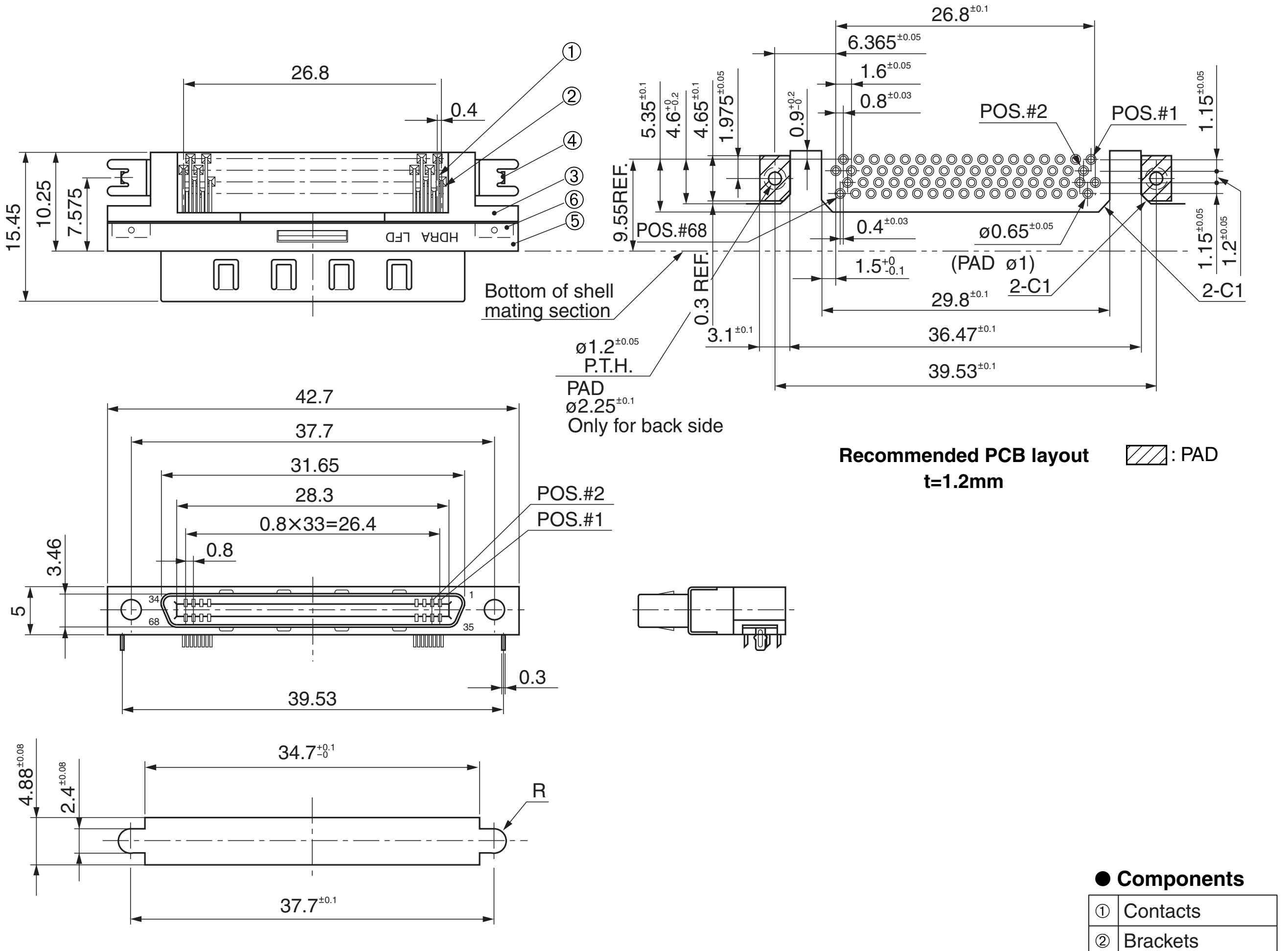


**● Configuration of product Part No.**

**HDRA- E 68 LFD T- OM18+**

① ② ③ ④ ⑤

① Series name
② No. of contacts: 68
③ Type of contact
LFD: Right-angle through hole type, female
④ With hold downs
⑤ Distance between center of mating section and mounting surface (mm)


26.8
0.4
①
②
④
③
⑥
⑤
15.45
10.25
7.575
HDRA LFD
Bottom of shell mating section
26.8±0.1
6.365±0.05
1.6±0.05
0.8±0.03
5.35±0.1
4.6+0/-0.2
4.65±0.1
1.975±0.05
0.9+0.2/-0
9.55REF.
POS.#68
POS.#2
POS.#1
1.15±0.05
0.4±0.03
ø0.65±0.05
1.5+0/-0.1
(PAD ø1)
2-C1
2-C1
1.15±0.05
1.2±0.05
29.8±0.1
0.3 REF.
3.1±0.1
36.47±0.1
39.53±0.1
ø1.2±0.05
P.T.H.
PAD
ø2.25±0.1
Only for back side
42.7
37.7
31.65
28.3
0.8×33=26.4
0.8
3.46
5
POS.#2
POS.#1
34
1
68
35
39.53
0.3
34.7+0.1/-0
4.88±0.08
2.4±0.08
R
37.7±0.1

**Recommended PCB layout**
**t=1.2mm**

▨: PAD

**Recommended panel cut-out dimensions**

Select lock screws according to panel thickness.
If a panel or washer is not used, use lock screw
Part No. HDRA-E68LFD-7C.

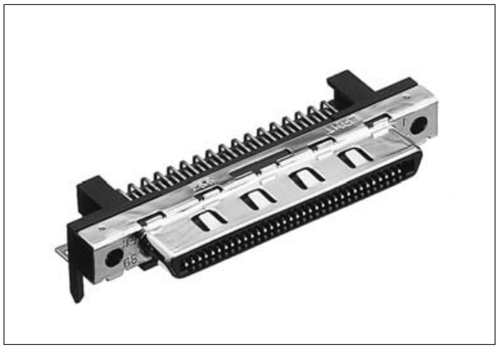
**● Components**

| | |
|---|---|
| ① | Contacts |
| ② | Brackets |
| ③ | Insulator |
| ④ | Hold downs |
| ⑤ | Shell |
| ⑥ | Square nuts |

**Mating connector**: HDRA series IDC type male cable connector, or straddle SMT type male connector

# Right-angle through hole type female connector for PCB HDRA-E68LFD1T-( )+

RoHS

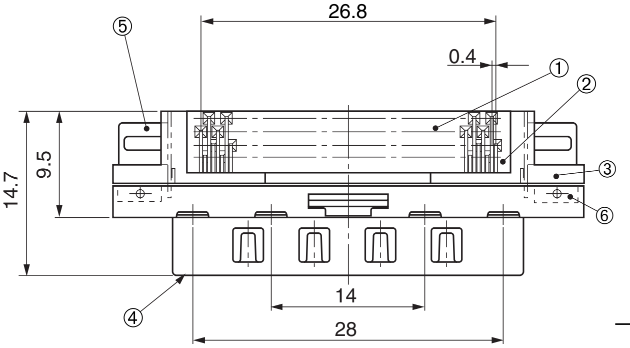


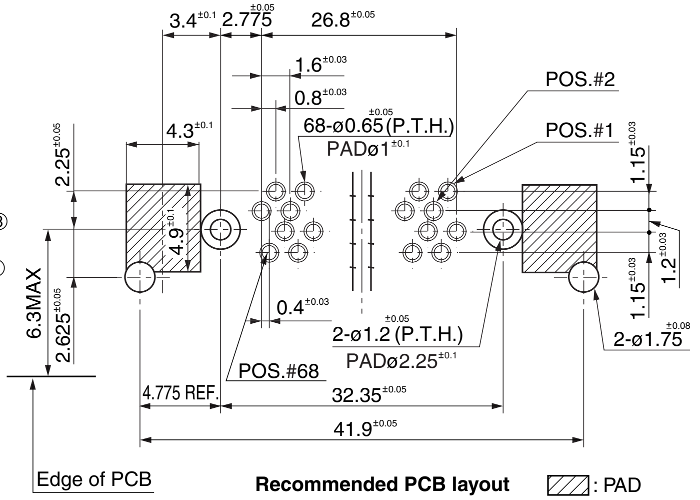
● **Configuration of product Part No.**

**HDRA- E 68 LFD 1 T -( )+**
① ② ③ ④ ⑤ ⑥

① Series name
② No. of contacts: 68
③ Type of contact:
LFD: Right-angle through hole type, female
④ Provided with shell and panel contact blade
⑤ Provided with board lock pin

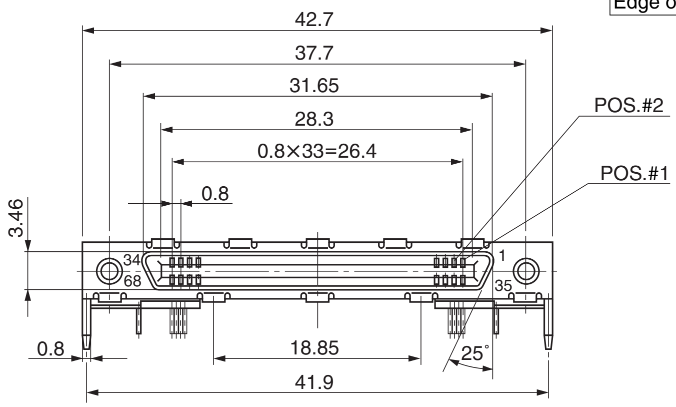
⑥ Lock screw
Blank: None
SL : Provided
(Thickness of panel: 1.12mm)

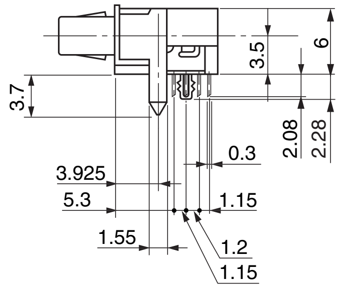

⑤
26.8
0.4
①
②
③
⑥
14.7
9.5
④
14
28


3.4±0.1
2.775±0.05
26.8±0.05
1.6±0.03
0.8±0.03
4.3±0.1
68-ø0.65±0.05 (P.T.H.)
PADø1±0.1
POS.#2
POS.#1
2.25±0.05
4.9±0.1
1.15±0.03
1.2±0.03
1.15±0.03
6.3MAX
2.625±0.05
0.4±0.03
2-ø1.2±0.05 (P.T.H.)
PADø2.25±0.1
2-ø1.75±0.08
POS.#68
4.775 REF.
32.35±0.05
41.9±0.05
Edge of PCB

**Recommended PCB layout**
**t=1.6mm**

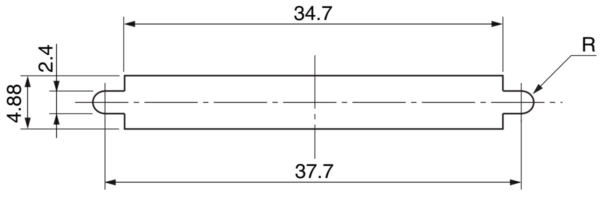
▨: PAD


42.7
37.7
31.65
28.3
0.8×33=26.4
0.8
3.46
POS.#2
POS.#1
34
68
1
35
0.8
18.85
25°
41.9


3.5
6
3.7
2.08
2.28
0.3
3.925
5.3
1.15
1.55
1.2
1.15

● **Components**

| | |
|---|---|
| ① | Bracket |
| ② | Contacts |
| ③ | Insulator |
| ④ | Shell |
| ⑤ | Hold down |
| ⑥ | Square nuts |


34.7
R
2.4
4.88
37.7

**Recommended panel cut-out dimensions**

Select the connector according to panel thickness.
For the application without panel, use washers or special lock screw (P/N: HDRA-E68LFD-7C).

**Mating connector**: HDRA series IDC type male cable connector, or straddle SMT type male connector

# Right-angle through hole type female connector for PCB HDRA-EC68LFDT( )-( )+

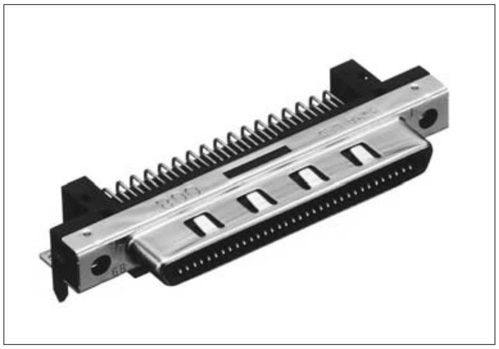
RoHS

**0.8 mm pitch connector**

**For PCB**

**Right-angle Through hole**

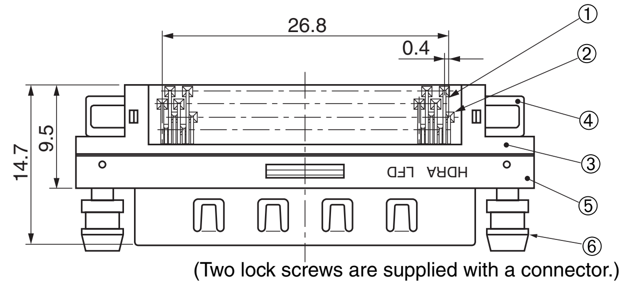
**ANSI/SFF8441**



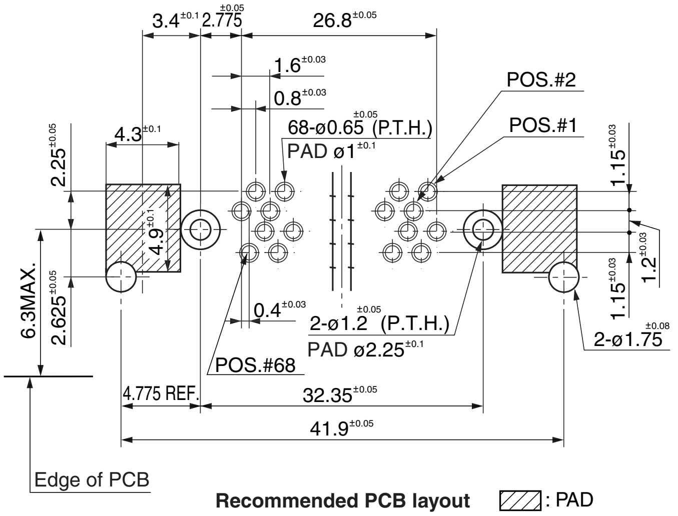
● **Configuration of product Part No.**

**HDRA- EC 68 LFD T ( )- ( )+**
① ② ③ ④ ⑤ ⑥

① Series name
② No. of contacts: 68
③ Type of contact
LFD: Right-angle through hole type, female
④ With board lock pin
⑤ Length of contact, board lock pins or location peg
Blank: A-2.08 mm contacts
: B-2.28 mm board lock pins
: C-3.7 mm location peg
S : A-2.08 mm contacts
B-2.28 mm board lock pins
C-2.3 mm location peg
2 : A-2.08 mm contacts
B-2.28 mm board lock pins
C-1.4 mm location peg
⑥ Lock screws
Blank : None
SL : provided (Thickness of panel: 1.12 mm)

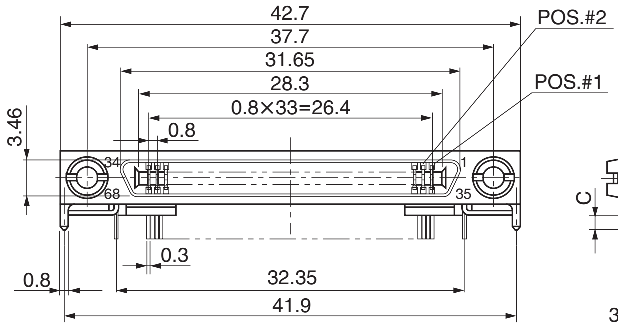

26.8
0.4
14.7
9.5
HDRA LFD
①
②
③
④
⑤
⑥

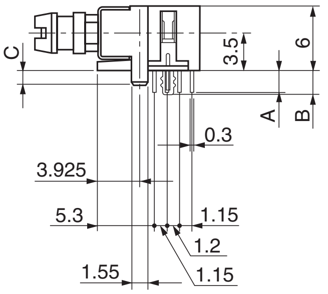
(Two lock screws are supplied with a connector.)

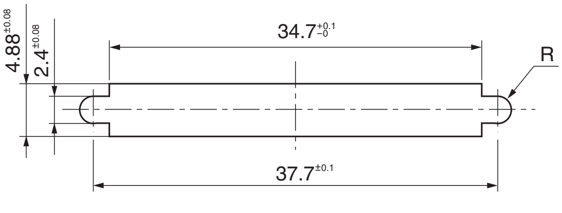

3.4±0.1
2.775±0.05
26.8±0.05
1.6±0.03
0.8±0.03
68-ø0.65±0.05 (P.T.H.)
PAD ø1±0.1
4.3±0.1
2.25±0.05
4.9±0.1
POS.#2
POS.#1
1.15±0.03
1.2±0.03
1.15±0.03
6.3MAX.
2.625±0.05
0.4±0.03
2-ø1.2±0.05 (P.T.H.)
PAD ø2.25±0.1
2-ø1.75±0.08
POS.#68
4.775 REF.
32.35±0.05
41.9±0.05
Edge of PCB

**Recommended PCB layout**
**t=1.6mm**

▨ : PAD


42.7
37.7
31.65
28.3
0.8×33=26.4
0.8
3.46
POS.#2
POS.#1
34
68
1
35
0.3
0.8
32.35
41.9


C
3.5
6
A
B
0.3
3.925
5.3
1.15
1.2
1.55
1.15


4.88±0.08
2.4±0.08
34.7+0.1−0
R
37.7±0.1

**Recommended panel cut-out dimensions**

● **Components**

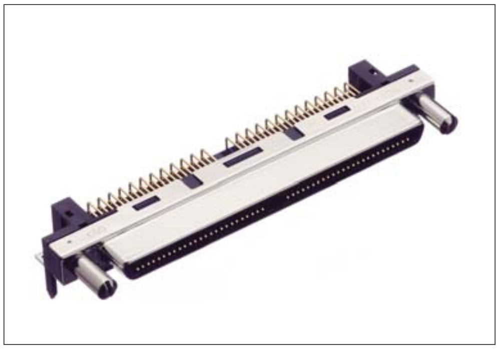
| | |
|---|---|
| ① | Contacts |
| ② | Brackets |
| ③ | Insulator |
| ④ | Hold downs |
| ⑤ | Shell |
| ⑥ | Lock screws |

Select the connector according to panel thickness.
For the application without panel, use washers or special lock screw (P/N: HDRA-E68LFD-7C).

**Mating connector**: HDRA series IDC type male cable connector, or straddle SMT type male connector

# Right-angle through hole type female connector for PCB HDRA-EC100LFDT( )-( )+

RoHS

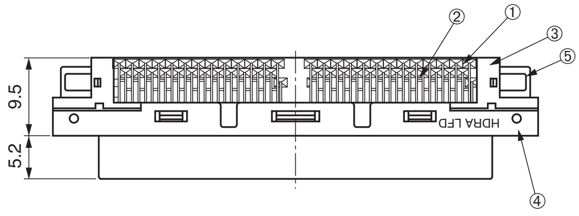


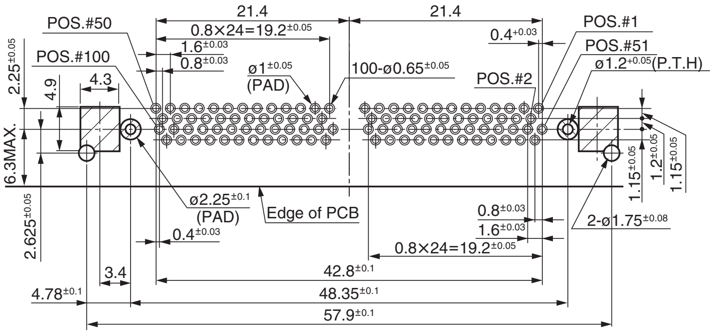
● **Configuration of product Part No.**

**HDRA- EC 100 LFD T ( )- ( )+**
① ② ③ ④ ⑤ ⑥

① Series name
② No. of contacts: 100
③ Type of contact
LFD: Right-angle through hole type, female
④ With ground contact
⑤ Through hole length
Blank : 2.08 mm
1 : 3.4 mm (under planning)

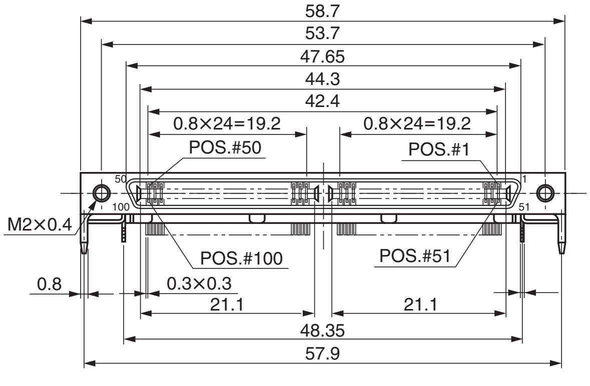
⑥ Lock screw
Blank: None
SL : Provided
(Panel thickness: 1.12 mm)
GP : Guide pin

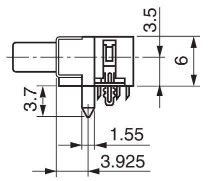

②
①
③
⑤
9.5
5.2
HDRA LFD
④


21.4
21.4
POS.#50
0.8×24=19.2±0.05
1.6±0.03
0.8±0.03
POS.#100
2.25±0.05
4.9
4.3
ø1±0.05
(PAD)
100-ø0.65±0.05
POS.#1
0.4+0.03
POS.#51
ø1.2+0.05(P.T.H)
POS.#2
6.3MAX.
ø2.25±0.1
(PAD)
Edge of PCB
0.4±0.03
2.625±0.05
0.8±0.03
1.6±0.03
0.8×24=19.2±0.05
2-ø1.75±0.08
1.15±0.05
1.2±0.05
1.15±0.05
3.4
42.8±0.1
4.78±0.1
48.35±0.1
57.9±0.1

**Recommended PCB layout**
**t=1.6mm**

▨ : PAD


58.7
53.7
47.65
44.3
42.4
0.8×24=19.2
0.8×24=19.2
POS.#50
POS.#1
50
1
100
51
M2×0.4
POS.#100
POS.#51
0.8
0.3×0.3
21.1
21.1
48.35
57.9


3.5
6
3.7
1.55
3.925

● **Components**

| | |
|---|---|
| ① | Bracket |
| ② | Contacts |
| ③ | Insulator |
| ④ | Shell |
| ⑤ | Hold downs |

Select the connector according to panel thickness.
For the application without panel, use washers or special lock screw (P/N: HDRA-E68LFD-7C).

**Mating connector**: HDRA series male connector

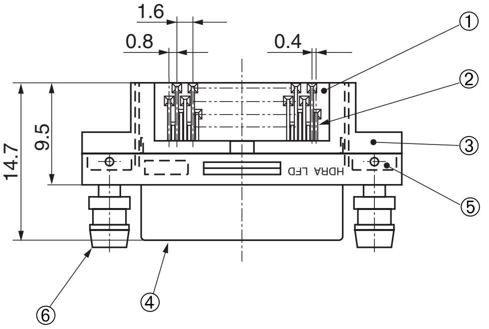
# Right-angle through hole type female connector for PCB
# HDRA-EA36LFDT-( )+

RoHS

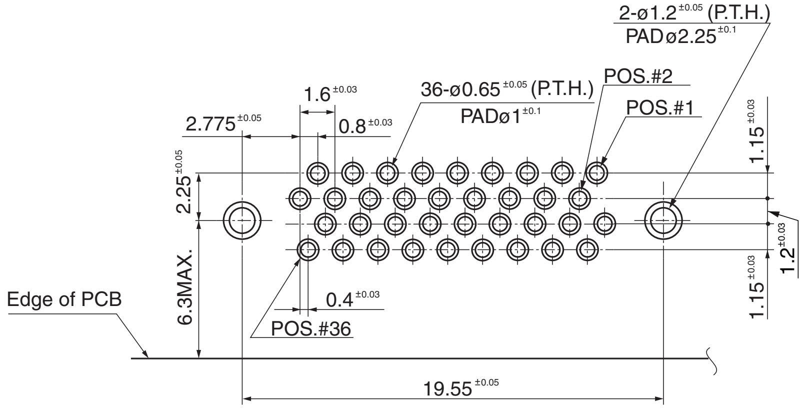
**● Configuration of product Part No.**

**HDRA- EA 36 LFD T- ( )+**
① ② ③ ④ ⑤

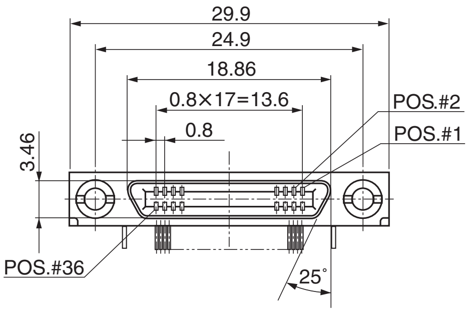
① Series name
② No. of contacts: 36
③ Type of contact
LFD: Right-angle through hole type, female
④ Provided with board lock mechanism
⑤ Lock screw
Blank: None
SL : Provided (Thickness of panel: 1.12 mm)

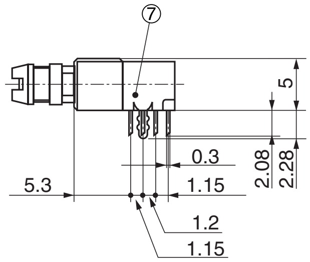

1.6
0.8
0.4
①
②
③
⑤
14.7
9.5
HDRA LFD
⑥
④

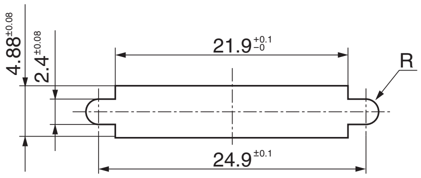
(Two lock screws are supplied with a connector.)


2-ø1.2±0.05 (P.T.H.)
PADø2.25±0.1
36-ø0.65±0.05 (P.T.H.)
PADø1±0.1
POS.#2
POS.#1
1.6±0.03
0.8±0.03
2.775±0.05
2.25±0.05
1.15±0.03
1.2±0.03
1.15±0.03
6.3MAX.
0.4±0.03
POS.#36
Edge of PCB
19.55±0.05

**Recommended PCB layout**
**t=1.6mm**


29.9
24.9
18.86
0.8×17=13.6
0.8
POS.#2
POS.#1
3.46
POS.#36
25°


⑦
5
0.3
1.15
2.08
2.28
5.3
1.2
1.15


4.88±0.08
2.4±0.08
21.9+0.1 -0
R
24.9±0.1

**Recommended panel cut-out dimensions**

Select the connector according to panel thickness.
For the application without panel, use washers or special lock screw (P/N: HDRA-E68LFD-7C).

**● Components**

| | |
|---|---|
| ① | Bracket |
| ② | Contacts |
| ③ | Insulator |
| ④ | Shell |
| ⑤ | Square nuts |
| ⑥ | Lock screw |
| ⑦ | Board lock pin |

**Mating connector**: HDRA series IDC type male cable connector

**Note●** Jack screw is not available at present.

# Right-angle through hole type female connector for PCB
# HDRA-E100LFDT( )-( )+

RoHS

**0.8 mm pitch connector**

**For PCB**

**Right-angle Through hole**

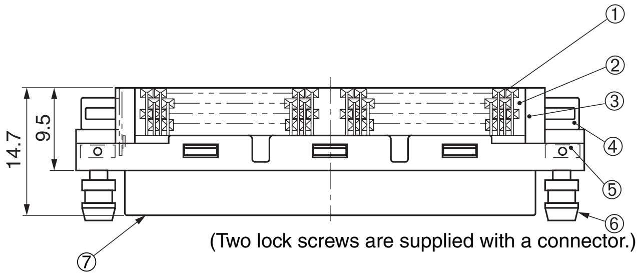
**ANSI/SFF8441**

● **Configuration of product Part No.**

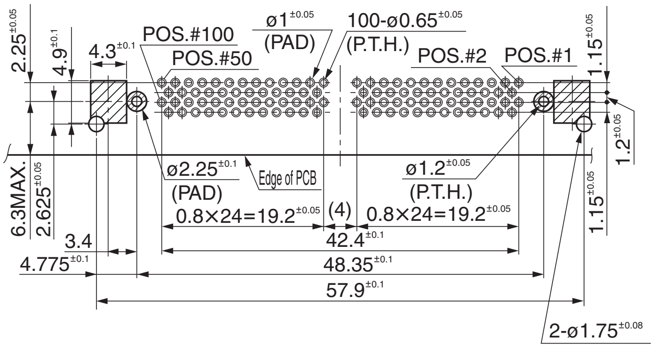
**HDRA- E 100 LFD T ( )- ( )+**

① ② ③ ④ ⑤ ⑥

① Series name
② No. of contacts: 100
③ Type of contact
LFD: Right-angle through hole type, female
④ With board lock pin
⑤ Length of contacts and board lock pins
Blank: A-2.08 mm contacts
B-2.28 mm board lock pins
1 : A-3.4 mm contacts
B-2.6 mm board lock pins
⑥ Lock screws
Blank: None
SL : provided (Thickness of panel: 1.12 mm)

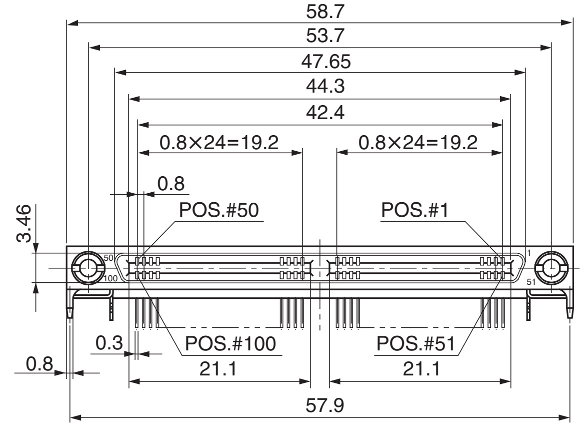

①
②
③
④
⑤
⑥
⑦
14.7
9.5

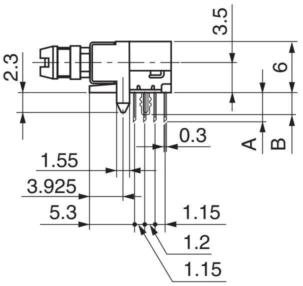
(Two lock screws are supplied with a connector.)

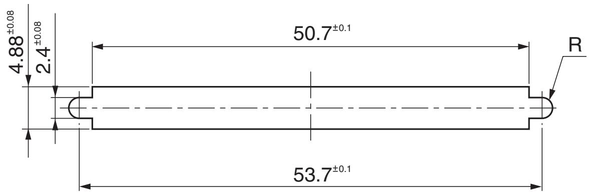

2.25±0.05
4.9±0.1
4.3±0.1
POS.#100
POS.#50
ø1±0.05 (PAD)
100-ø0.65±0.05 (P.T.H.)
POS.#2
POS.#1
1.15±0.05
1.2±0.05
ø2.25±0.1 (PAD)
Edge of PCB
ø1.2±0.05 (P.T.H.)
0.8×24=19.2±0.05
(4)
0.8×24=19.2±0.05
1.15±0.05
6.3MAX.
2.625±0.05
3.4
42.4±0.1
4.775±0.1
48.35±0.1
57.9±0.1
2-ø1.75±0.08

**Recommended PCB layout**
**t=1.6mm**

▨ : PAD


58.7
53.7
47.65
44.3
42.4
0.8×24=19.2
0.8×24=19.2
0.8
POS.#50
POS.#1
3.46
50
100
1
51
0.3
POS.#100
POS.#51
0.8
21.1
21.1
57.9


3.5
2.3
6
0.3
A
B
1.55
3.925
5.3
1.15
1.2
1.15


4.88±0.08
2.4±0.08
50.7±0.1
R
53.7±0.1

**Recommended panel cut-out dimensions**

Select the connector according to panel thickness.
For the application without panel, use washers or special lock screw (P/N: HDRA-E68LFD-7C).

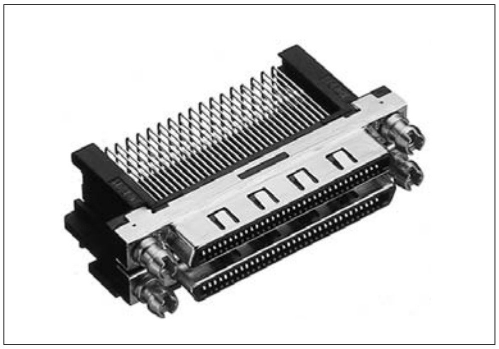
● **Components**

| | |
|---|---|
| ① | Contacts |
| ② | Brackets |
| ③ | Insulator |
| ④ | Hold downs |
| ⑤ | Square nuts |
| ⑥ | Lock screws |
| ⑦ | Shell |

**Mating connector**: HDRA series IDC type male connector

# Right-angle through hole type female connector for PCB
# HDRA-E68W1LFDT-( )+

RoHS

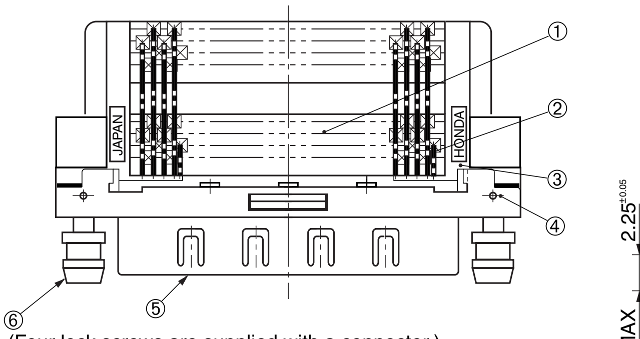


● **Configuration of product Part No.**

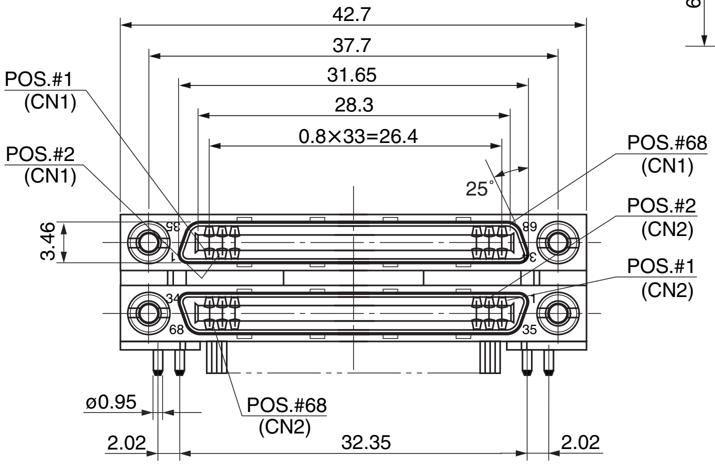
**HDRA- E 68 W 1 LFD T- ( )+**

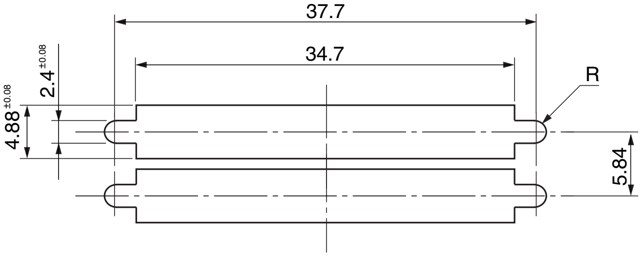
① ② ③ ④ ⑤ ⑥

① Series name
② No. of contacts: 136 (68×2)
③ No. of stacks: 2
④ Type of contact
LFD: Right-angle through hole type, female
⑤ With location peg
⑥ Lock screw
Blank: None
SL : Provided (Thickness of panel: 1.12 mm)

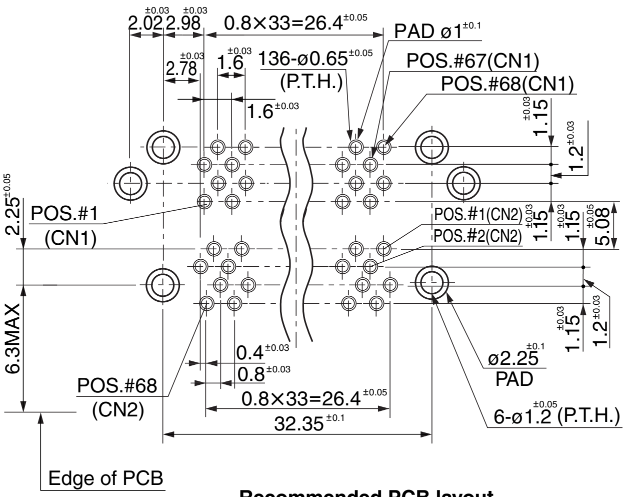

①
②
③
④
⑤
⑥
JAPAN
HONDA

(Four lock screws are supplied with a connector.)

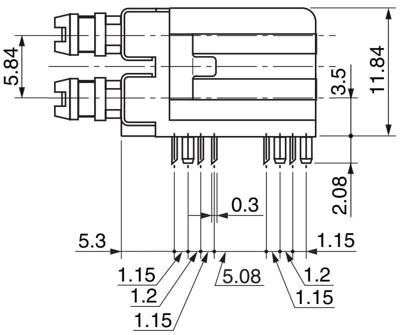

42.7
37.7
31.65
28.3
0.8×33=26.4
25°
POS.#1 (CN1)
POS.#2 (CN1)
POS.#68 (CN1)
POS.#2 (CN2)
POS.#1 (CN2)
POS.#68 (CN2)
3.46
ø0.95
2.02
32.35
2.02


37.7
34.7
R
2.4±0.08
4.88±0.08
5.84

**Recommended panel cut-out dimensions**


2.02±0.03
2.98±0.03
0.8×33=26.4±0.05
PAD ø1±0.1
2.78±0.03
1.6±0.03
136-ø0.65±0.05 (P.T.H.)
POS.#67(CN1)
POS.#68(CN1)
1.6±0.03
1.15±0.03
1.2±0.03
2.25±0.05
POS.#1 (CN1)
POS.#1(CN2)
POS.#2(CN2)
1.15±0.03
1.15±0.03
5.08±0.05
6.3MAX
1.15±0.03
1.2±0.03
0.4±0.03
0.8±0.03
ø2.25±0.1 PAD
POS.#68 (CN2)
0.8×33=26.4±0.05
32.35±0.1
6-ø1.2±0.05 (P.T.H.)
Edge of PCB

**Recommended PCB layout**
**t=1.6mm**


5.84
3.5
11.84
2.08
0.3
5.3
1.15
1.15
1.2
1.15
5.08
1.2
1.15

● **Components**

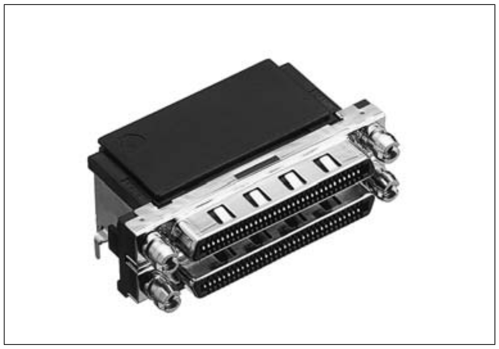
| | |
|---|---|
| ① | Bracket |
| ② | Contacts |
| ③ | Insulator |
| ④ | Square nuts |
| ⑤ | Shell |
| ⑥ | Lock screw |

Select the connector according to panel thickness. For the application without panel, use washers or special lock screw (P/N: HDRA-E68LFD-7C).

**Mating connector**: HDRA series IDC type male cable connector, or straddle SMT type male connector

# Right-angle through hole type female connector for PCB HDRA-E68W( )LFDT1EC-( )+

RoHS

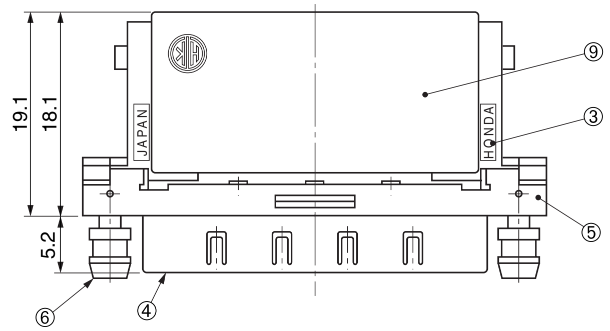


● **Configuration of product Part No.**

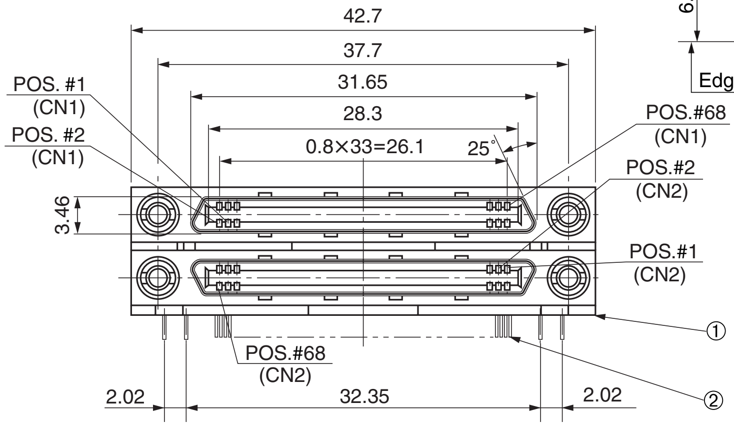
**HDRA- E 68 W ( ) LFD T1 E C -( )+**

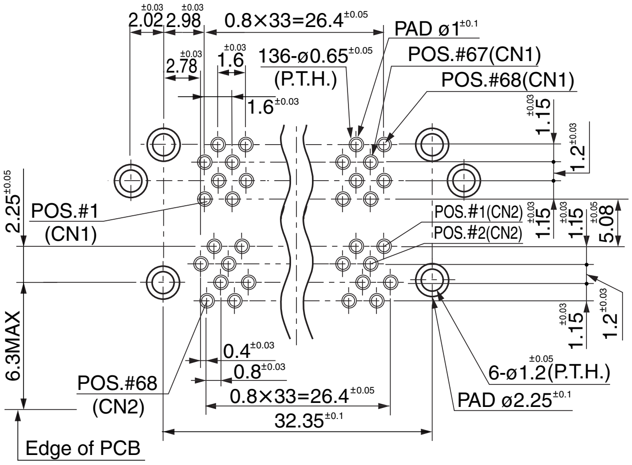
① ② ③ ④ ⑤ ⑥ ⑦ ⑧ ⑨

① Series name
② No. of contacts: 136 (68×2)
③ No. of stacks: 2
④ Length of contact, through hole
  1: 2.08 (PCB: 1.6 mm thick)
  2: 3.4 (PCB: 2.4 mm thick)
⑤ Type of contact
  LFD: Right-angle through hole type, female
⑥ Earth lock pin (provided with board lock mechanism)
⑦ Provided with shell connection reinforcement
⑧ Provided with protection cover for contacts and bends
⑨ Lock screw
  Blank: None
  SL : Provided (Thickness of panel: 1.12 mm)

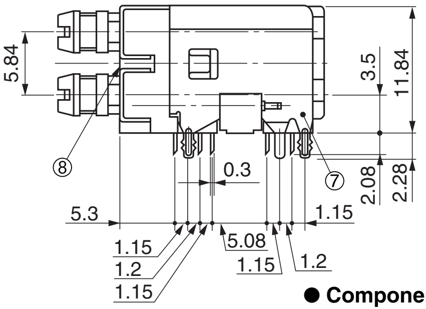

19.1
18.1
5.2
JAPAN
HONDA
⑨
③
⑤
⑥
④

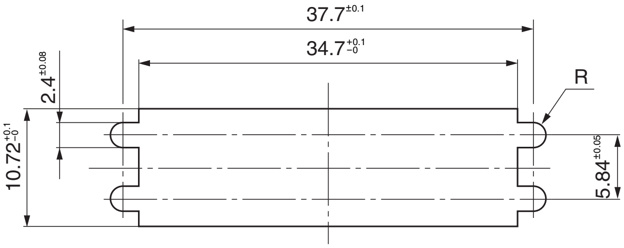
(Four lock screws are supplied with a connector.)


42.7
37.7
31.65
28.3
0.8×33=26.1
25°
POS. #1 (CN1)
POS. #2 (CN1)
POS.#68 (CN1)
POS.#2 (CN2)
POS.#1 (CN2)
POS.#68 (CN2)
3.46
①
②
2.02
32.35
2.02


2.02±0.03
2.98±0.03
0.8×33=26.4±0.05
PAD ø1±0.1
2.78±0.03
1.6±0.03
136-ø0.65±0.05 (P.T.H.)
POS.#67(CN1)
POS.#68(CN1)
1.6±0.03
1.15±0.03
1.2±0.03
2.25±0.05
POS.#1 (CN1)
POS.#1(CN2)
POS.#2(CN2)
1.15±0.03
1.15±0.03
5.08±0.05
6.3MAX
1.15±0.03
1.2±0.03
0.4±0.03
0.8±0.03
6-ø1.2(P.T.H.)
POS.#68 (CN2)
0.8×33=26.4±0.05
PAD ø2.25±0.1
32.35±0.1
Edge of PCB

**Recommended PCB layout**
**t=1.6mm or 2.4mm**


5.84
3.5
11.84
⑧
0.3
⑦
2.08
2.28
5.3
1.15
1.15
5.08
1.2
1.15
1.15
1.2
1.15


37.7±0.1
34.7+0.1-0
R
2.4±0.08
10.72+0.1-0
5.84±0.05

**Recommended panel cut-out dimensions**

Select the connector according to panel thickness. For the application without panel, use washers or special lock screw (P/N: HDRA-E68LFD-7C).

● **Components**

| | |
|---|---|
| ① | Bracket |
| ② | Contacts |
| ③ | Insulator |
| ④ | Shell |
| ⑤ | Square nuts |
| ⑥ | Lock screw |
| ⑦ | Board lock pin |
| ⑧ | Shell connector |
| ⑨ | Protection covers |

**Mating connector**: HDRA series IDC type male cable connector, or straddle SMT type male connector

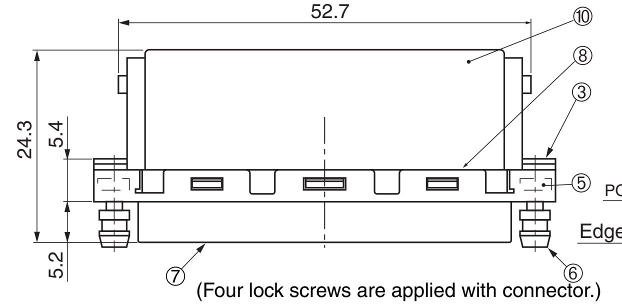
# Right-angle through hole type female connector for PCB
# HDRA-E100W( )LFDT1EC-( )+

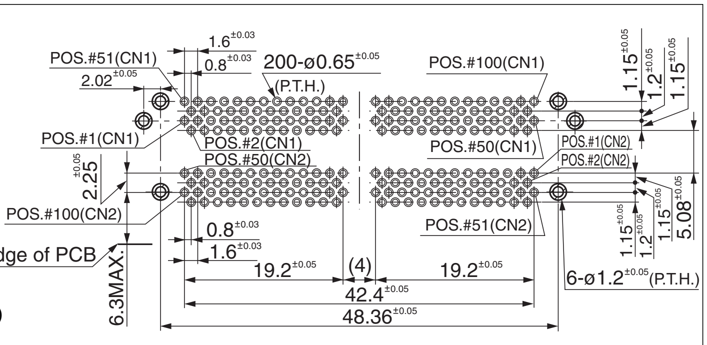
RoHS

**● Configuration of product Part No.**

**HDRA- E 100 W ( ) LFD T1 E C- ( )+**
① ② ③ ④ ⑤ ⑥ ⑦ ⑧ ⑨

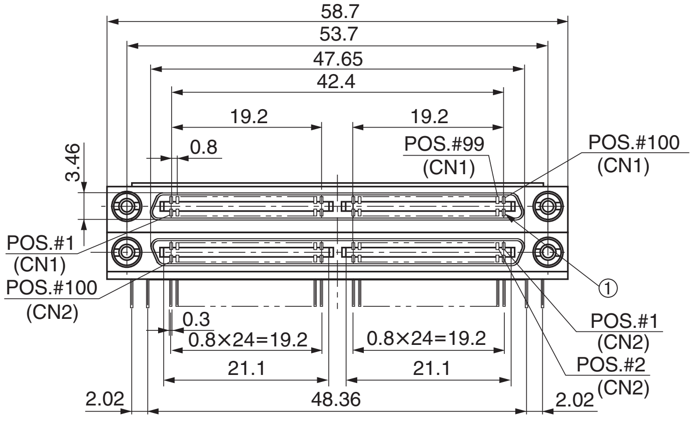
① Series name
② No. of contacts: 100
③ W: Double stacked connector
④ Length of contacts or board lock pins
  1: A-2.08 mm contacts
    B-2.28 board lock pins
  2: A-3.4 mm contacts
    B-3.6 mm board lock pins
⑤ Type of contact
  LFD: Right-angle through hole type, female
⑥ Earth lock pin (provided with board lock mechanism)
⑦ Provided with shell connection reinforcement
⑧ Provided with protection cover for contacts and bends
⑨ Lock screws
  Blank: None
  SL : provided (Thickness of panel: 1.12 mm)

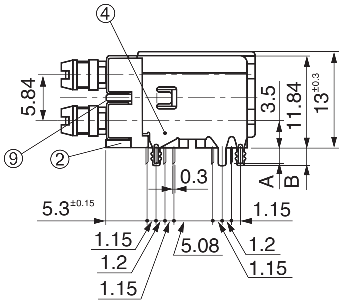

52.7
⑩
⑧
③
⑤
⑥
⑦
24.3
5.4
5.2
(Four lock screws are applied with connector.)

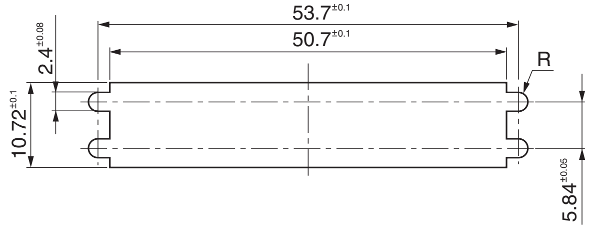

1.6±0.03
0.8±0.03
200-ø0.65±0.05
(P.T.H.)
POS.#51(CN1)
2.02±0.05
POS.#100(CN1)
POS.#1(CN1)
POS.#2(CN1)
POS.#50(CN2)
POS.#50(CN1)
POS.#1(CN2)
POS.#2(CN2)
2.25±0.05
POS.#100(CN2)
POS.#51(CN2)
0.8±0.03
1.6±0.03
Edge of PCB
6.3MAX.
19.2±0.05
(4)
19.2±0.05
42.4±0.05
48.36±0.05
6-ø1.2±0.05(P.T.H.)
1.15±0.05
1.2±0.05
1.15±0.05
1.15±0.05
1.2±0.05
1.15±0.05
5.08±0.05

**Recommended PCB layout**
**t=1.6mm or 2.4mm**

▨: PAD


58.7
53.7
47.65
42.4
19.2
19.2
3.46
0.8
POS.#99
(CN1)
POS.#100
(CN1)
POS.#1
(CN1)
POS.#100
(CN2)
①
0.3
0.8×24=19.2
0.8×24=19.2
POS.#1
(CN2)
POS.#2
(CN2)
21.1
21.1
2.02
48.36
2.02


④
5.84
3.5
11.84
13±0.3
⑨
②
0.3
A
B
5.3±0.15
1.15
1.15
5.08
1.2
1.2
1.15
1.15


53.7±0.1
50.7±0.1
R
2.4±0.08
10.72±0.1
5.84±0.05

**Recommended panel cut-out dimensions**

Select the connector according to panel thickness. For the application without panel, use washers or special lock screw (P/N: HDRA-E68LFD-7C).

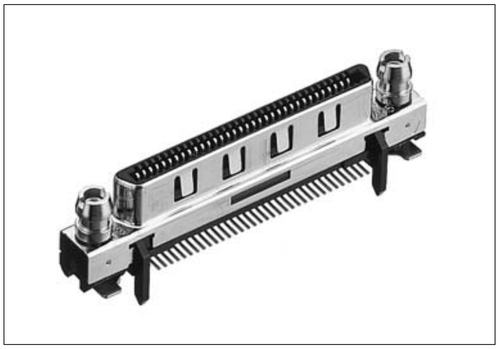
**● Components**

| | |
|---|---|
| ① | Contacts |
| ② | Brackets |
| ③ | Insulator A |
| ④ | Board lock pin |
| ⑤ | Square nuts |
| ⑥ | Lock screws |
| ⑦ | Shell |
| ⑧ | Insulator B |
| ⑨ | Shell connection |
| ⑩ | Protection covers |

**Mating connector**: HDRA series IDC type male connector

# Straight SMT type female connector for PCB
# HDRA-E68FYT-( )+

RoHS

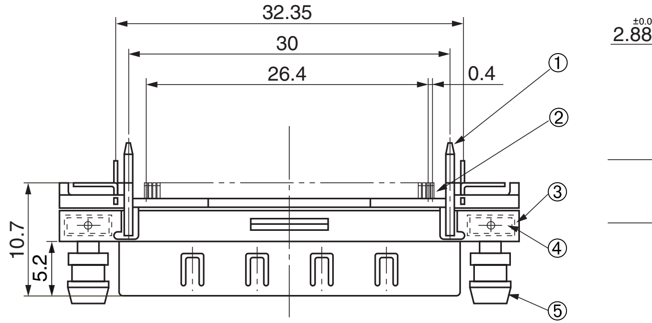


● **Configuration of product Part No.**

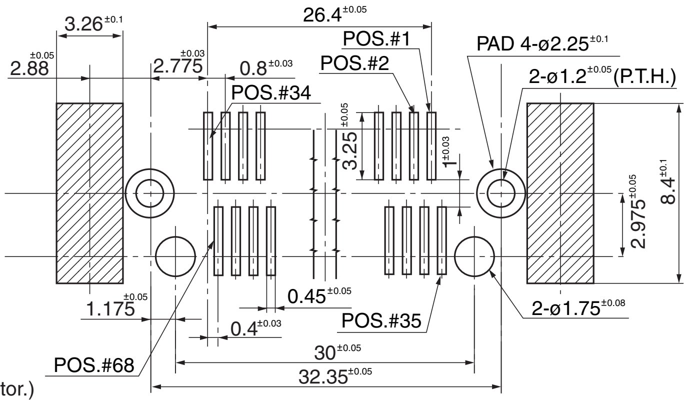
**HDRA- E 68 FY T- ( )+**
① ② ③ ④ ⑤

① Series name
② No. of contacts: 68
③ Type of contact
FY: Straight SMT type, female
④ Provided with board lock mechanism

⑤ Lock screw
Blank: None
SL : Provided
(Thickness of panel: 1.12 mm)

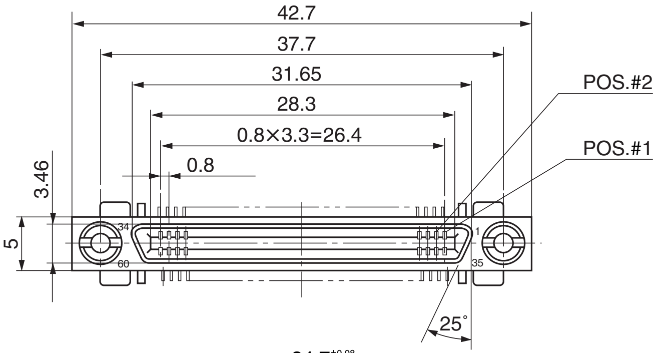

32.35
30
26.4
0.4
①
②
③
④
⑤
10.7
5.2

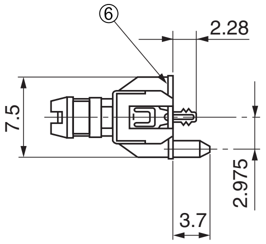
(Two lock screws are supplied with a connector.)

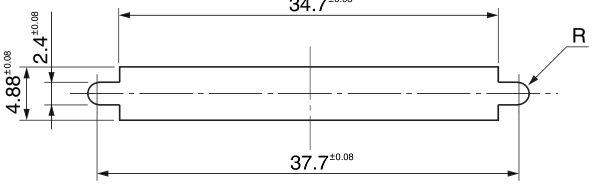

3.26±0.1
2.88±0.05
2.775±0.03
26.4±0.05
POS.#1
POS.#2
0.8±0.03
POS.#34
PAD 4-ø2.25±0.1
2-ø1.2±0.05(P.T.H.)
3.25±0.05
1±0.03
2.975±0.05
8.4±0.1
1.175±0.05
0.45±0.05
0.4±0.03
POS.#35
2-ø1.75±0.08
POS.#68
30±0.05
32.35±0.05

**Recommended PCB layout**
**t=1.6mm**

▨: PAD


42.7
37.7
31.65
28.3
0.8×3.3=26.4
0.8
POS.#2
POS.#1
3.46
5
34
60
1
35
25°


⑥
2.28
7.5
2.975
3.7


34.7±0.08
R
2.4±0.08
4.88±0.08
37.7±0.08

**Recommended panel cut-out dimensions**

Select the connector according to panel thickness.
For the application without panel, use washers or special lock screw (P/N: HDRA-E68LFD-7C).

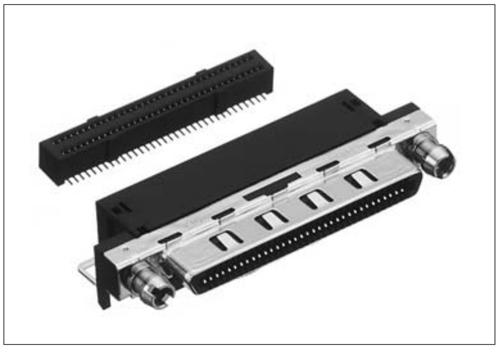
● **Components**

| | |
|---|---|
| ① | Insulator |
| ② | Contacts |
| ③ | Shell |
| ④ | Square nuts |
| ⑤ | Lock screw |
| ⑥ | Hold down |

**Mating connector**: HDRA series IDC type male cable connector, or straddle SMT type male connector

# Right-angle SMT type female connector for PCB
# HDRA-ED68LFZGT( )-( )+

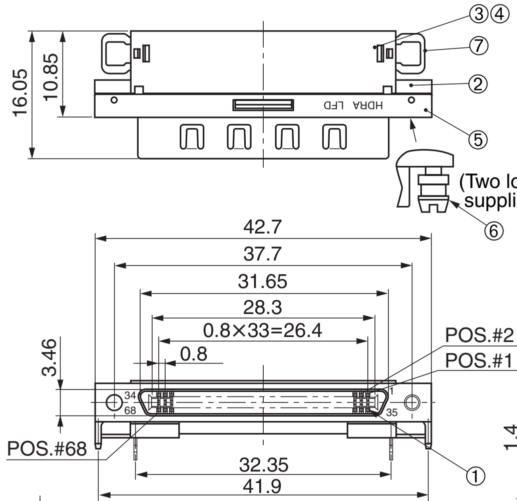
RoHS

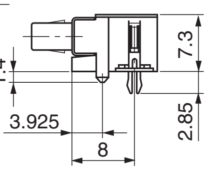


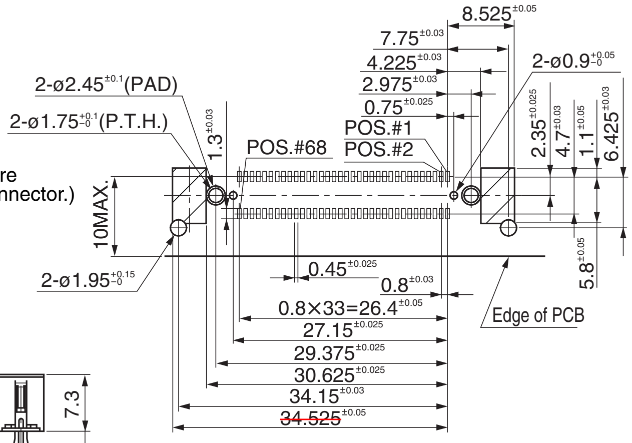
**● Configuration of product Part No.**

**HDRA- ED 68 LFZ G T ( )- ( )+**
① ② ③ ④ ⑤ ⑥ ⑦

① Series name
② No. of contacts: 68
③ Type of contact
LFZ: Right-angle, female
④ Contact plating
G: 0.76 µm Gold plate
⑤ Ground lock pins with hold downs
⑥ Form of shell
Blank : Standard shell
A : Shell with flange for EMI
⑦ Lock screws
L: Provided

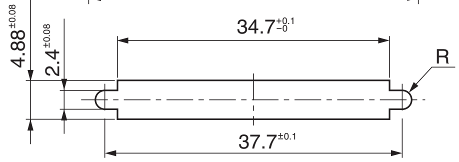

③④
⑦
②
⑤
⑥
①
16.05
10.85
HDRA LFD
(Two lock screws are supplied with a connector.)
42.7
37.7
31.65
28.3
0.8×33=26.4
0.8
3.46
POS.#2
POS.#1
POS.#68
34
68
1
35
32.35
41.9


7.3
1.4
3.925
8
2.85

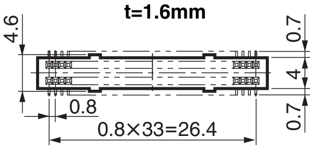

8.525±0.05
7.75±0.03
4.225±0.03
2.975±0.03
0.75±0.025
2-ø0.9+0.05/-0
2-ø2.45±0.1(PAD)
2-ø1.75+0.1/-0(P.T.H.)
1.3±0.03
POS.#68
POS.#1
POS.#2
2.35±0.025
4.7±0.03
1.1±0.05
6.425±0.03
10MAX.
5.8±0.05
2-ø1.95+0.15/-0
0.45±0.025
0.8±0.03
0.8×33=26.4±0.05
27.15±0.025
29.375±0.025
30.625±0.025
34.15±0.03
~~34.525~~±0.05
Edge of PCB

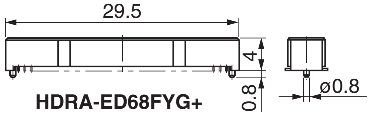
**Recommended PCB layout**
t=1.6mm

▨: PAD


4.88±0.08
2.4±0.08
34.7+0.1/-0
R
37.7±0.1

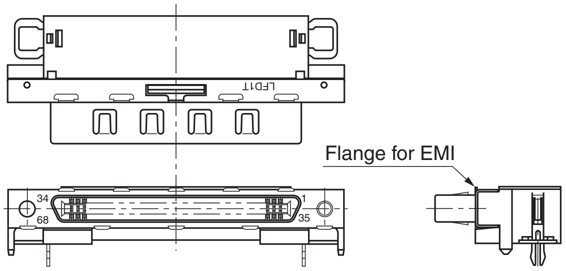
**Recommended panel cut-out dimensions**


4.6
0.7
4
0.7
0.8
0.8×33=26.4



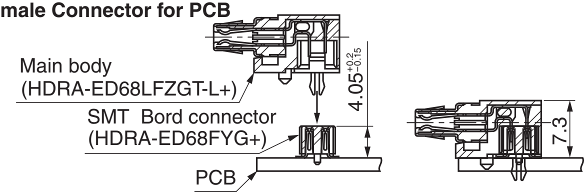
**HDRA-ED68FYG+**

Taping packages are available for automatically mounting board connectors on a PCB. The product part number of the taping package is HDRA-ED68FYG-TP1+.
One reel provides 1000 board connectors.
The reel diameter is 380 mm. The tape width is 56 mm.


LFD1T
Flange for EMI
34
68
1
35

**HDRA-ED68LFZGTA+**

**Mounting Method of Right-angle SMT type Female Connector for PCB**


Main body
(HDRA-ED68LFZGT-L+)
4.05+0.2/-0.15
SMT Bord connector
(HDRA-ED68FYG+)
PCB
7.3

After board connectors are mounted on a PCB, mate them with the main body, and solder hold downs and ground lock pins.

**● Components**

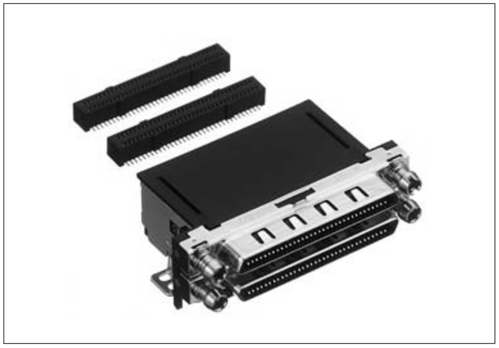
| | | | |
|---|---|---|---|
| ① | Contacts | ⑤ | Shell |
| ② | Insulator A | ⑥ | Lock screws |
| ③ | Insulator B | ⑦ | Hold downs |
| ④ | Insulator C | | |

Select the connector according to panel thickness. For the application without panel, use washers or special lock screw (P/N: HDRA-E68LFD-7C).

**Mating connector**: HDRA series IDC type male cable connector, or straddle SMT type male connector

# Right-angle SMT type female connector for PCB
# HDRA-ED136LFZGT( )-( )+

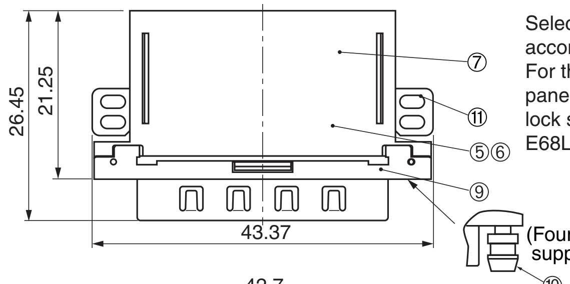
RoHS



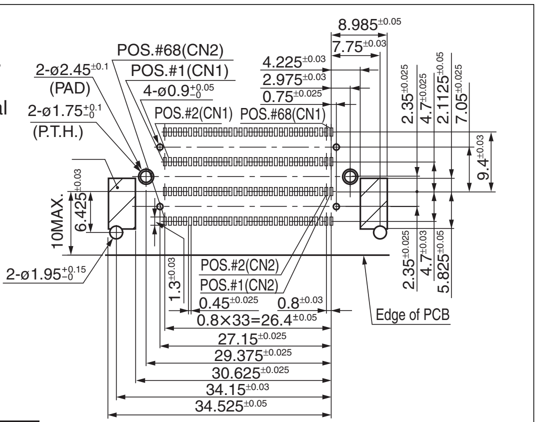
## ● Configuration of product Part No.

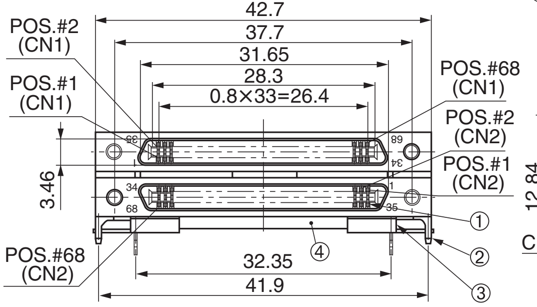
**HDRA- ED 136 LFZ G T ( )- ( )+**
① ② ③ ④ ⑤ ⑥ ⑦

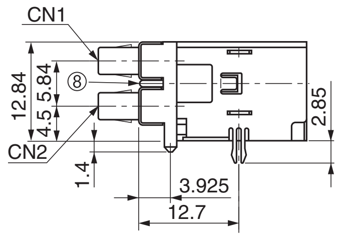
① Series name
② No. of contacts: 136
③ Type of contact
LFZ: Right-angle SMT type, female
④ Contact plating
G: 0.76 µm Gold plate
⑤ Ground lock pins with hold downs
⑥ Form of shell
Blank: Standard shell
A: Shell with flange for EMI
⑦ Lock screws
L: Provided
(Panel thickness: t = 1.12 mm or less)


26.45
21.25
⑦
⑪
⑤⑥
⑨
43.37
(Four lock screws are supplied with a connector.)
⑩

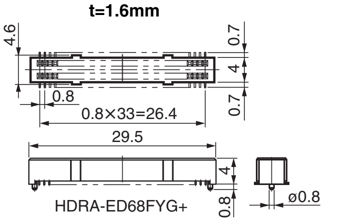
Select the connector according to panel thickness. For the application without panel, use washers or special lock screw (P/N: HDRA-E68LFD-7C).


8.985±0.05
7.75±0.03
POS.#68(CN2)
2-ø2.45±0.1 (PAD)
POS.#1(CN1)
4-ø0.9+0.05 −0
4.225±0.03
2.975±0.03
0.75±0.025
2-ø1.75+0.1 −0 (P.T.H.)
POS.#2(CN1)
POS.#68(CN1)
2.35±0.025
4.7±0.025
2.1125±0.05
7.05±0.025
9.4±0.03
10MAX.
6.425±0.03
2-ø1.95+0.15 −0
1.3±0.03
POS.#2(CN2)
POS.#1(CN2)
0.45±0.025
0.8±0.03
0.8×33=26.4±0.05
27.15±0.025
29.375±0.025
30.625±0.025
34.15±0.03
34.525±0.05
2.35±0.025
4.7±0.03
5.825±0.05
Edge of PCB

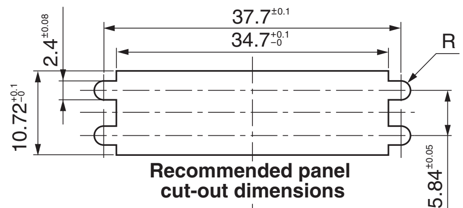

42.7
37.7
31.65
28.3
0.8×33=26.4
POS.#2 (CN1)
POS.#1 (CN1)
POS.#68 (CN1)
POS.#2 (CN2)
POS.#1 (CN2)
POS.#68 (CN2)
35
68
34
1
3.46
①
②
③
④
32.35
41.9


CN1
CN2
⑧
12.84
5.84
4.5
2.85
1.4
3.925
12.7

**Recommended PCB layout t=1.6mm** ▨: PAD

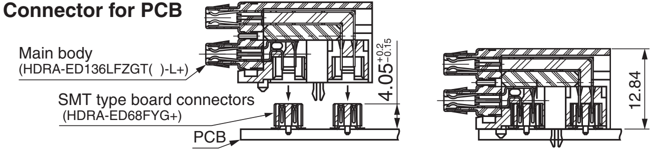

4.6
0.7
4
0.7
0.8
0.8×33=26.4
29.5
4
0.8
ø0.8
HDRA-ED68FYG+

Taping packages are available for automatically mounting board connectors on a PCB. The product part number of the taping package is HDRA-ED68FYG-TP2.
One reel provides 1000 board connectors. (500 sets.
Two board connectors can be mounted at a time using a cap.)
The reel diameter is 380 mm. The tape width is 56 mm.

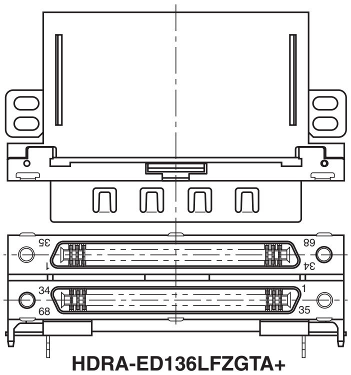

37.7±0.1
34.7+0.1 −0
R
2.4±0.08
10.72+0.1 −0
5.84±0.05

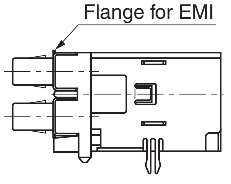
Recommended panel cut-out dimensions

### Mounting Method of Right-angle SMT type Female Connector for PCB


Main body
(HDRA-ED136LFZGT( )-L+)
SMT type board connectors
(HDRA-ED68FYG+)
PCB
4.05+0.2 −0.15
12.84

After board connectors are mounted on a PCB, mate them with the main body, and solder hold downs and ground lock pins.




Flange for EMI

HDRA-ED136LFZGTA+

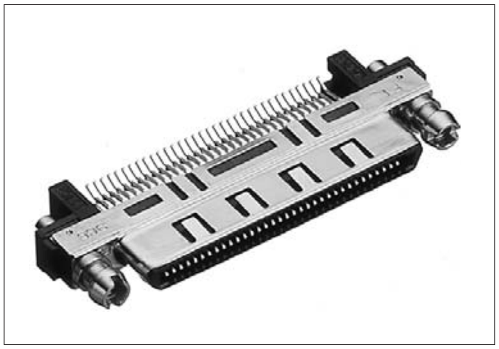
## ● Components

| | | | | | |
|---|---|---|---|---|---|
| ① | Contacts | ⑤ | Insulator D | ⑨ | Shell |
| ② | Insulator A | ⑥ | Insulator E | ⑩ | Lock screws |
| ③ | Insulator B | ⑦ | Insulator F | ⑪ | Hold downs |
| ④ | Insulator C | ⑧ | Shell connection hardware | | |

**Mating connector**: HDRA series IDC type male cable connector, or straddle SMT type male connector

# Straddle SMT type female connector for PCB
# HDRA-E68FT+

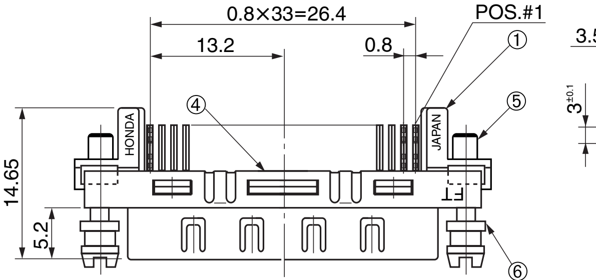
RoHS



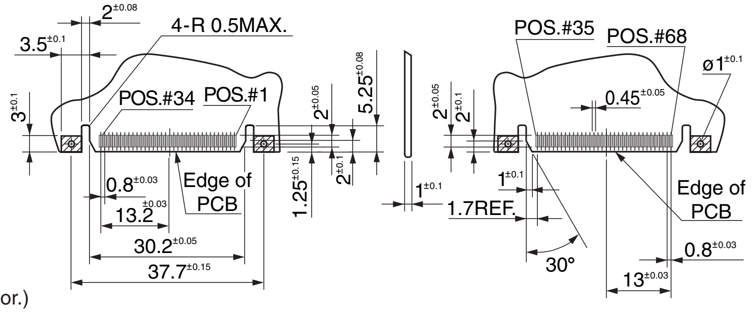
- **Configuration of product Part No.**

**HDRA- E 68 FT+**
① ② ③

① Series name
② No. of contacts: 68
③ Type of contact
FT: Straddle SMT type, female

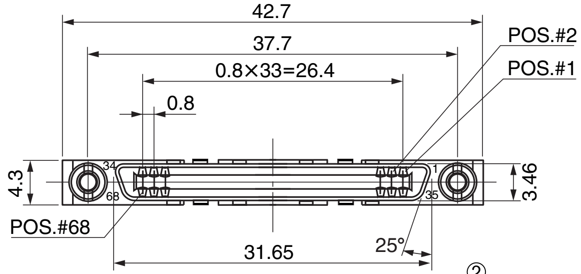

0.8×33=26.4
POS.#1
13.2
0.8
①
④
⑤
HONDA
JAPAN
FT
14.65
5.2
⑥

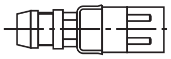
(Two lock screws are supplied with a connector.)

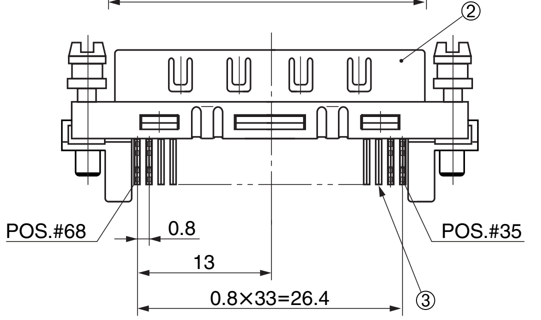

2±0.08
3.5±0.1
4-R 0.5MAX.
3±0.1
POS.#34
POS.#1
2±0.05
5.25±0.08
0.8±0.03
Edge of PCB
13.2±0.03
1.25±0.15
2±0.1
30.2±0.05
37.7±0.15
1±0.1
1.7REF.
2±0.05
2±0.1
1±0.1
POS.#35
POS.#68
ø1±0.1
0.45±0.05
Edge of PCB
0.8±0.03
30°
13±0.03

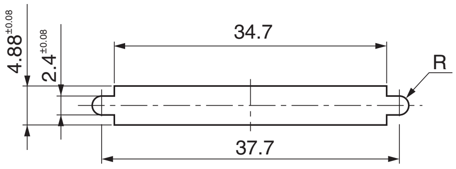
**Recommended PCB layout**
**t=1mm**

▨: PAD


42.7
37.7
POS.#2
0.8×33=26.4
POS.#1
0.8
4.3
34
68
1
35
3.46
POS.#68
31.65
25°




②
POS.#68
0.8
POS.#35
13
0.8×33=26.4
③


4.88±0.08
2.4±0.08
34.7
R
37.7

**Recommended panel cut-out dimensions**

- **Components**

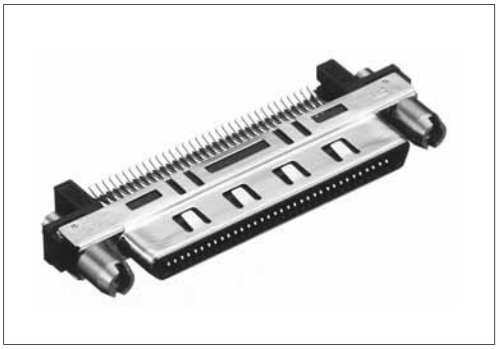
| | |
|---|---|
| ① | Insulator A |
| ② | Shell |
| ③ | Contacts |
| ④ | Insulator B |
| ⑤ | Square nuts |
| ⑥ | Lock screw |

Select the connector according to panel thickness. For the application without panel, use washers or special lock screw (P/N: HDRA-E68LFD-7C).

**Mating connector**: HDRA series IDC type male cable connector, or straddle SMT type male connector

# Straddle SMT type female connector for PCB
# HDRA-E68FT2-( )+

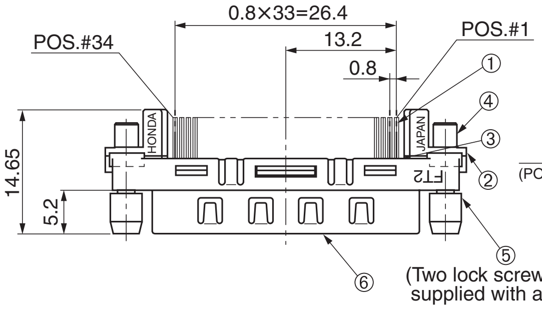
RoHS



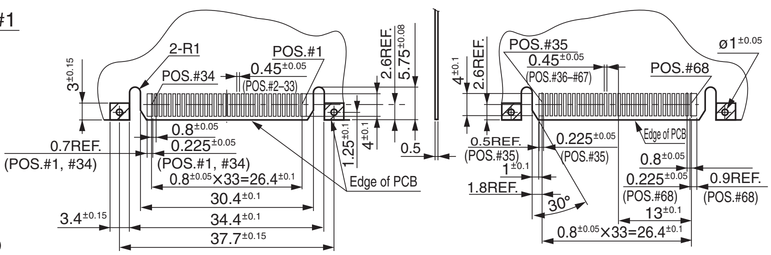
**● Configuration of product Part No.**

**HDRA- E 68 FT 2- ( )+**
① ② ③ ④ ⑤

① Series name
② No. of contacts: 68
③ Type of contact
FT: Straddle SMT type, female
④ PCB thickness: 0.5 mm
⑤ Lock screws
Blank: None
SL : provided

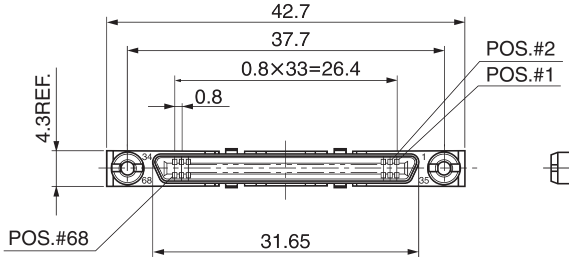

0.8×33=26.4
13.2
0.8
POS.#34
POS.#1
①
④
③
②
14.65
5.2
HONDA
JAPAN
FT2
⑤
⑥

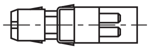
(Two lock screws are supplied with a connector.)

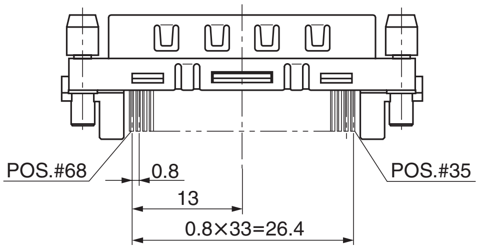

2-R1
POS.#1
POS.#34
0.45±0.05
(POS.#2–33)
3±0.15
0.8±0.05
0.225±0.05
0.7REF.
(POS.#1, #34)
(POS.#1, #34)
0.8±0.05×33=26.4±0.1
30.4±0.1
3.4±0.15
34.4±0.1
37.7±0.15
2.6REF.
5.75±0.08
1.25±0.1
4±0.1
0.5
Edge of PCB
4±0.1
2.6REF.
POS.#35
0.45±0.05
(POS.#36–#67)
POS.#68
ø1±0.05
0.5REF.
(POS.#35)
0.225±0.05
(POS.#35)
Edge of PCB
1±0.1
1.8REF.
30°
0.8±0.05
0.225±0.05
(POS.#68)
0.9REF.
(POS.#68)
13±0.1
0.8±0.05×33=26.4±0.1

**Recommended PCB layout**
**t=0.5mm**

▨: PAD


42.7
37.7
0.8×33=26.4
0.8
POS.#2
POS.#1
4.3REF.
34
1
68
35
POS.#68
31.65




POS.#68
0.8
13
0.8×33=26.4
POS.#35

**● Components**

| | |
|---|---|
| ① | Contacts |
| ② | Insulator A |
| ③ | Insulator B |
| ④ | Square nuts |
| ⑤ | Lock screws |
| ⑥ | Shell |

**Mating connector**: HDRA series IDC type male cable connector, or straddle SMT type male connector

**0.8 mm pitch connector**

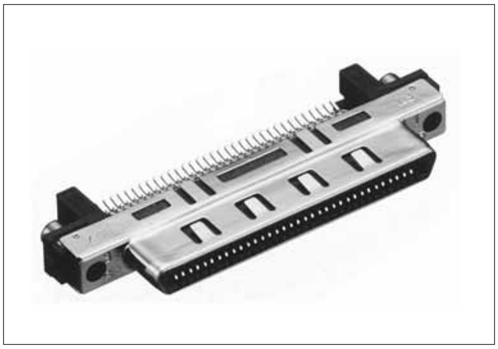
**For PCB**

**Straddle SMT**

**ANSI/SFF8441**

# Straddle SMT type female connector for PCB
# HDRA-E68FT2-OM06+

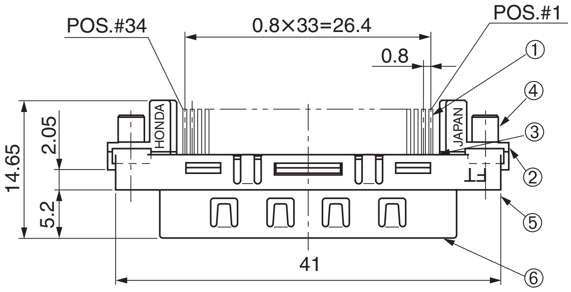
RoHS

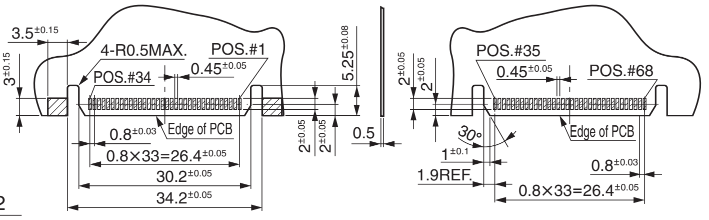


● **Configuration of product Part No.**

**HDRA- E 68 FT 2- OM06+**
① ② ③ ④ ⑤

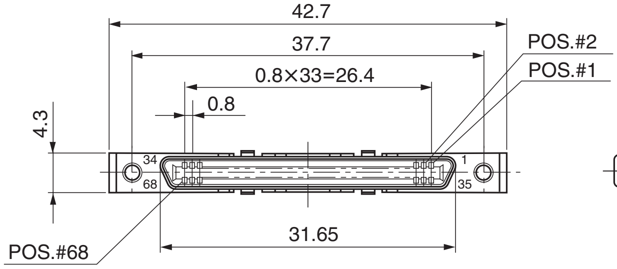
① Series name
② No. of contacts: 68
③ Type of contact
FT: Straddle SMT type, female
④ PCB thickness: 0.5 mm
⑤ Distance between center of mating section and mounting surface (mm)

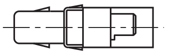

POS.#34
0.8×33=26.4
POS.#1
0.8
①
④
③
②
⑤
⑥
HONDA
JAPAN
FT
14.65
2.05
5.2
41

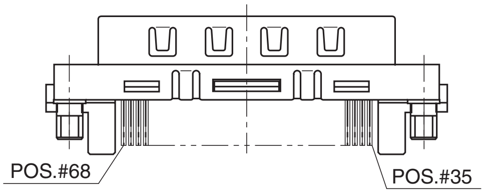

3.5±0.15
3±0.15
4-R0.5MAX.
POS.#1
POS.#34
0.45±0.05
5.25±0.08
Edge of PCB
0.8±0.03
0.8×33=26.4±0.05
30.2±0.05
34.2±0.05
2±0.05
2±0.05
0.5
2±0.05
2±0.05
POS.#35
0.45±0.05
POS.#68
30°
1±0.1
1.9REF.
Edge of PCB
0.8±0.03
0.8×33=26.4±0.05

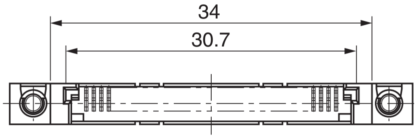
**Recommended PCB layout**
**t=0.5mm**

▨ : PAD


42.7
37.7
0.8×33=26.4
0.8
POS.#2
POS.#1
4.3
34
1
68
35
31.65
POS.#68




POS.#68
POS.#35



● **Components**

| | |
|---|---|
| ① | Contacts |
| ② | Insulator A |
| ③ | Insulator B |
| ④ | Square nuts |
| ⑤ | Lock screws |
| ⑥ | Shell |

**Mating connector**: HDRA series IDC type male cable connector, or straddle SMT type male connector

# EMI-shielded vertical plastic housing for standard cable HDRA-E68LGKP( )

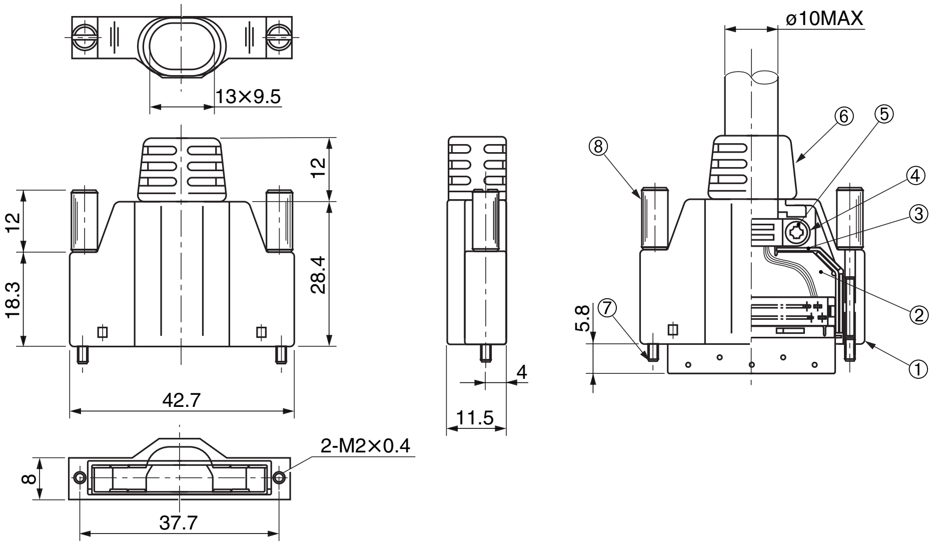
RoHS

● **Configuration of product Part No.**

**HDRA- E 68 LGKP ( )**
① ② ③

① Series name
② No. of contacts: 68
③ A: Vertical cable holding type
C: Vertical ultrasonic welding type
E: Vertical ultrasonic welding type
F: Vertical ultrasonic welding type
Outside diameter of cable is shown in the dimension table.

**HDRA-E68LGKPA**

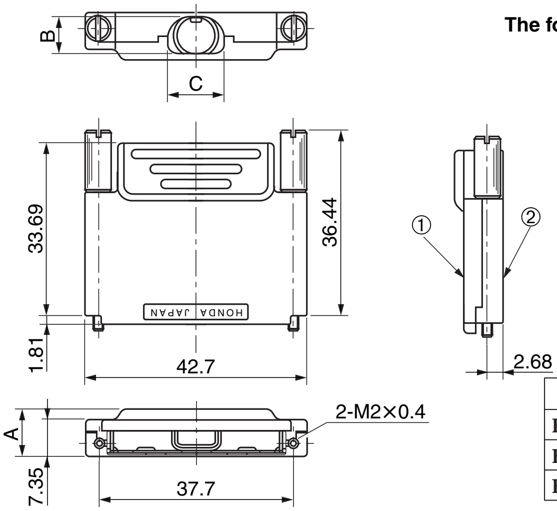


Thumb screw with plastic cap should be tightened by hand. For screw driver assembly use the product (P/N: HDRA-E68LGKPE3) with metal thumb screws attached.

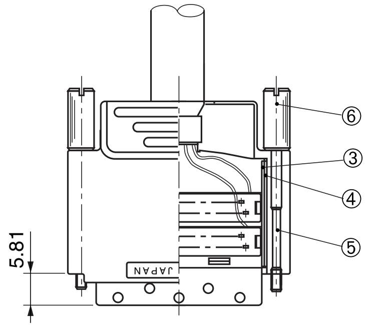
● **Components**

| | |
|---|---|
| ① | Cover |
| ② | Inner shell A |
| ③ | Inner shell B |
| ④ | Cable clamp |
| ⑤ | Screw |
| ⑥ | Bushing |
| ⑦ | Thumb screw |
| ⑧ | Cap (plastic) |

**HDRA-E68LGKPC,LGKPE,LGKPF**



**The following figure shows HDRA-E68LGKPF.**



| Part No. | A | B | C |
|---|---|---|---|
| HDRA-E68LGKPC | 11.5 | 9.5 | 10.5×9.5 |
| HDRA-E68LGKPE | 9.5 | 7.5 | 10.5 |
| HDRA-E68LGKPF | 9 | 7.2 | |

● **Components**

| | |
|---|---|
| ① | Cover A |
| ② | Cover B |
| ③ | Shell A |
| ④ | Shell B |
| ⑤ | Thumb screw |
| ⑥ | Cap (plastic) |

**For use with connectors**: HDR series IDC type cable connector : -LGKPA for MA, -LGKPC/-LGKPE for MA1, and -LGKPF for MC1

**Required tools (for LGKPC, LGKPE and LGKPF)**: Clamp caulking tools: FLPT-0017B (Refer to page Tool-10)
Ultrasonic welder, Housing holding jig, Sonic welder

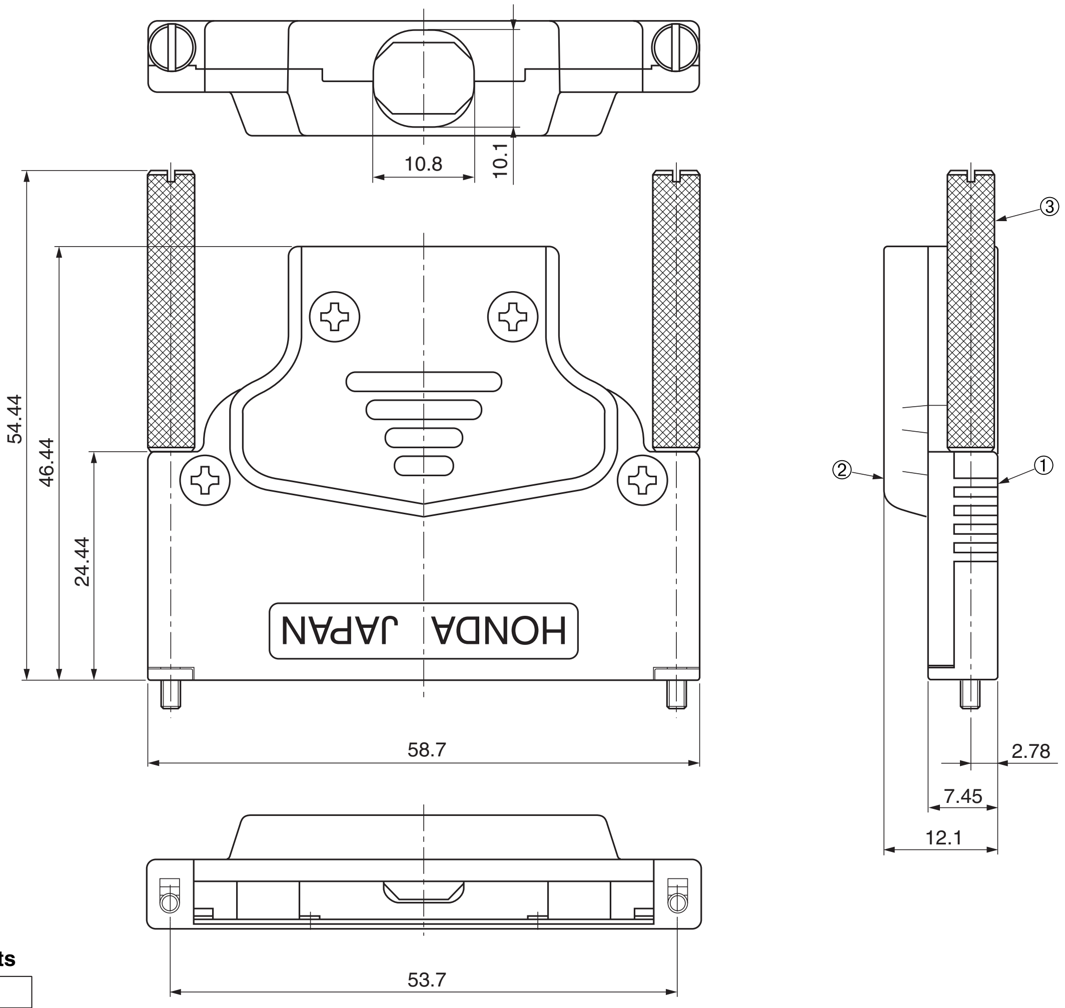
# EMI-filtered vertical metallic housing
# HDRA-E100LPA

RoHS

● **Configuration of product Part No.**

**HDRA- E 100 LP A**
① ② ③ ④

① Series name
② No. of contacts: 100
③ Type of housing: Vertical type
④ Compatible cable
A: Outside diameter of cable is 9.8 mm


10.8
10.1
54.44
46.44
24.44
HONDA JAPAN
58.7
53.7
③
②
①
2.78
7.45
12.1

● **Components**

| | |
|---|---|
| ① | Housing A |
| ② | Housing B |
| ③ | Lock screws |

**For use with connectors:** HDRA-E100M( )1+

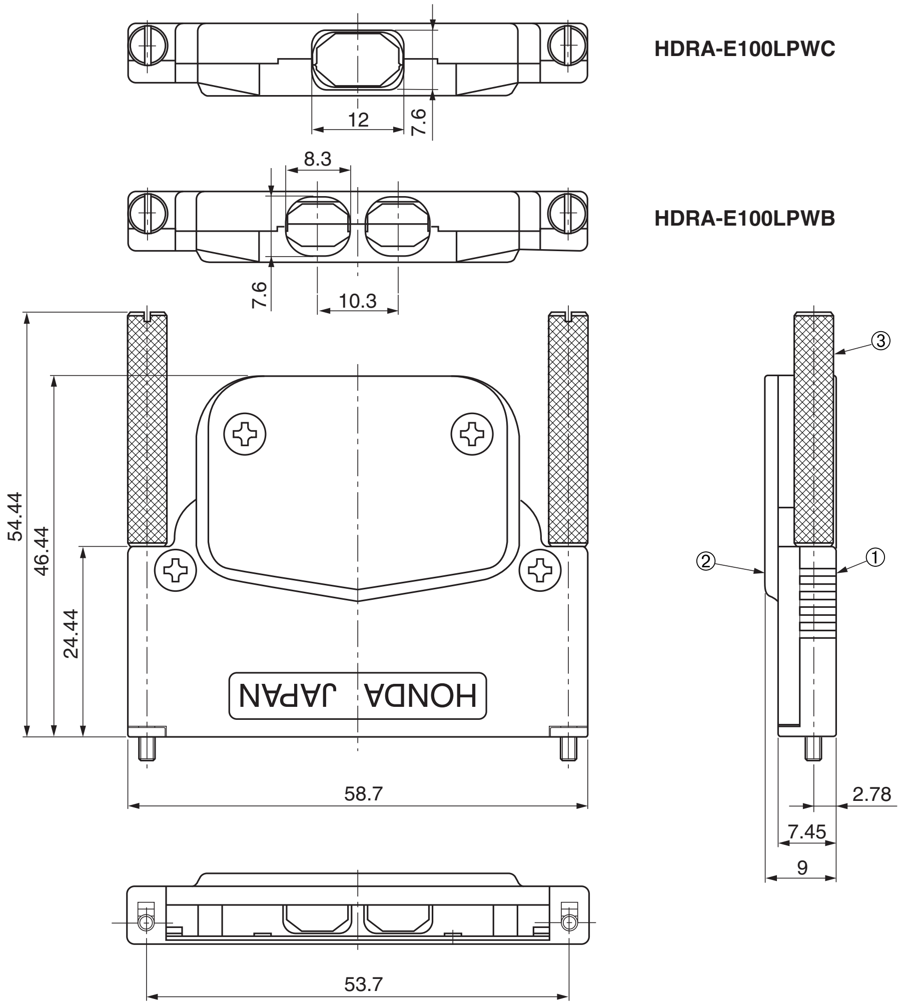
# EMI-filtered vertical metallic housing HDRA-E100LPW( )

RoHS

● **Configuration of product Part No.**

**HDRA- E 100 LP W ( )**
① ② ③ ④

① Series name
② No. of contacts: 100
③ Type of housing: Vertical type
④ Compatible cable and form of through hole
B : Two holes are available for two cables. Outside diameters of cable are 6.9 mm
C : One hole is available for one cable. Outside diameter of cable is 9.6 mm


HDRA-E100LPWC
12
7.6
8.3
HDRA-E100LPWB
7.6
10.3
54.44
46.44
24.44
HONDA JAPAN
58.7
③
②
①
2.78
7.45
9
53.7

● **Components**

| | |
|---|---|
| ① | Housing A |
| ② | Housing B |
| ③ | Lock screws |

**For use with connectors:** HDRA-E100M( )1+

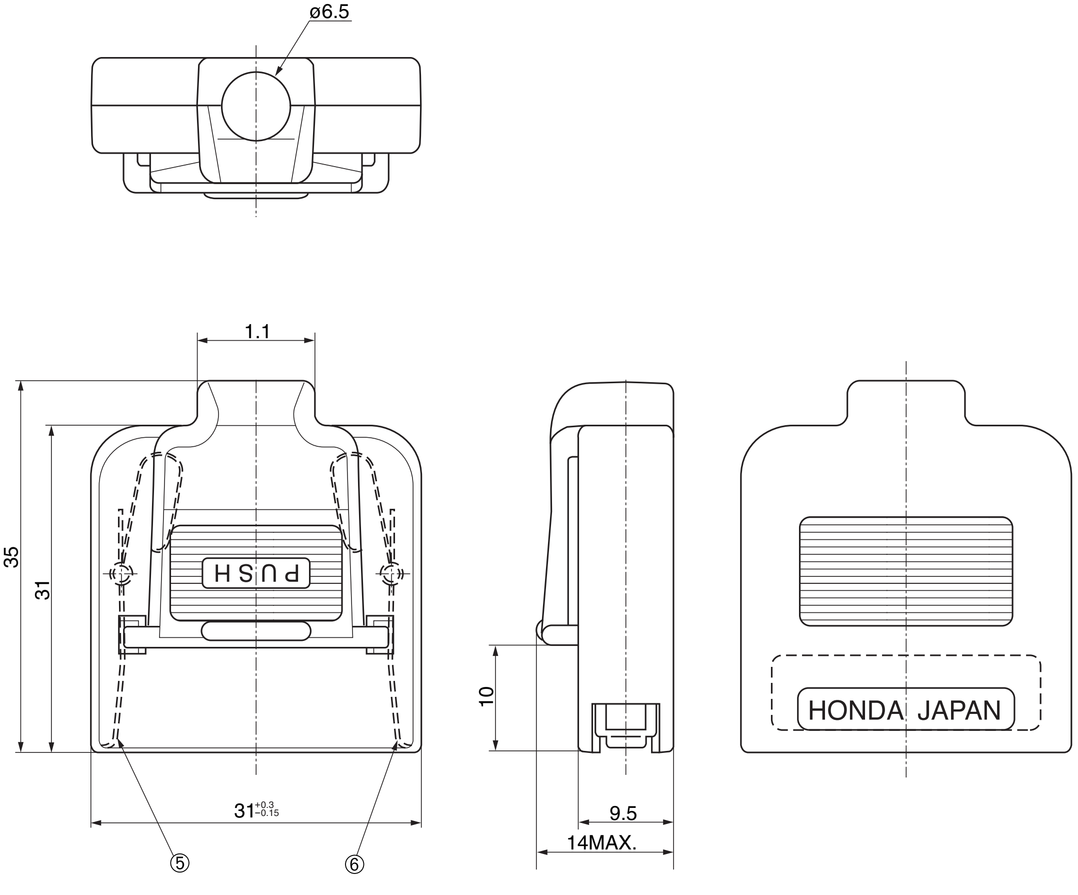
# EMI-shielded vertical plastic housing
# HDRA-E36LPTH

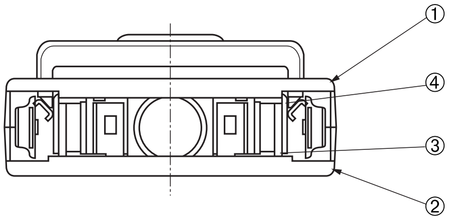
RoHS

● **Configuration of product Part No.**

**HDRA- E 36 LPTH**
①　　　②　③

① Series name
② No. of contacts: 36
③ Type of housing: Vertical type





● **Components**

| | |
|---|---|
| ① | Case A |
| ② | Case B |
| ③ | Inner shell A |
| ④ | Inner shell B |
| ⑤ | Lock spring A |
| ⑥ | Lock spring B |

**For use with connectors**: HDRA-E36M( )+

**Mating connectors**: HDRA -EA36LFDT+ + Lock screw (HDR-E14LMY-SL-02C) panel:0.5-0.8mm thick
-EA36FT-NS+ + Lock screw (HDR-E14LMY-SL-02C) panel:0.5-0.8mm thick

**Required tools**: Clamp caulking tools: FLPT-0024A (Refer to page Tool-10) Ultrasonic welder, Housing holding jig, Sonic welder

# Dust-proof cap
# HDRA-E68( )-CP

RoHS

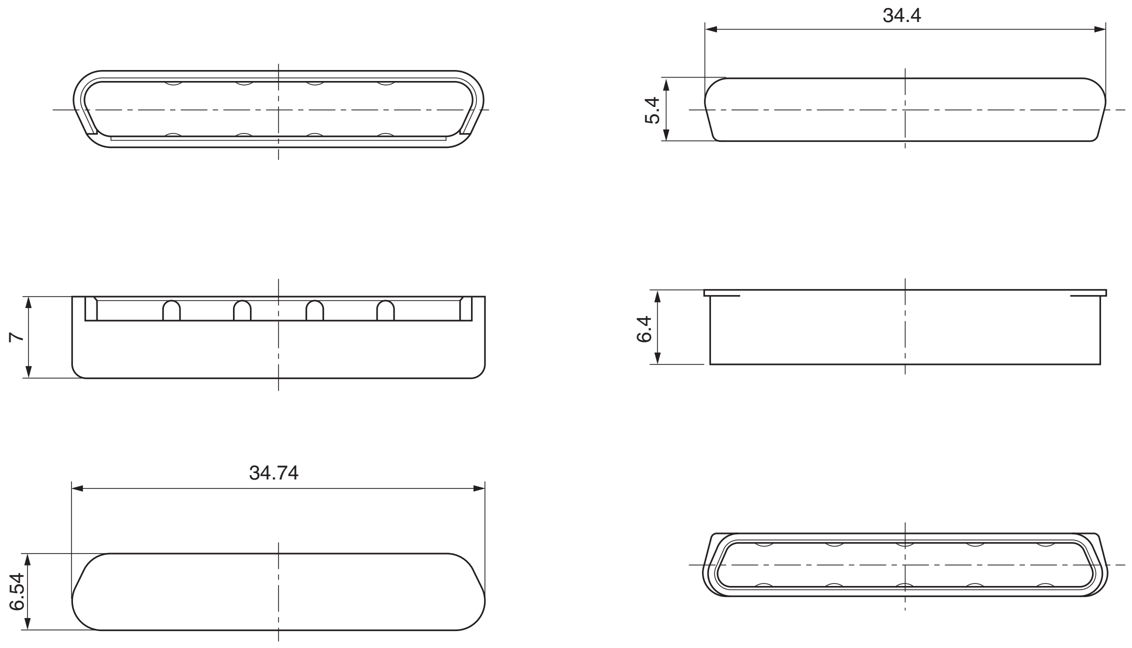
**● Configuration of product Part No.**

**HDRA- E 68 ( )- CP**
① ② ③ ④

① Series name
② No. of contacts: 68
③ M: For male connector
F : For female connector
④ Cap

**HDRA-E68M-CP**

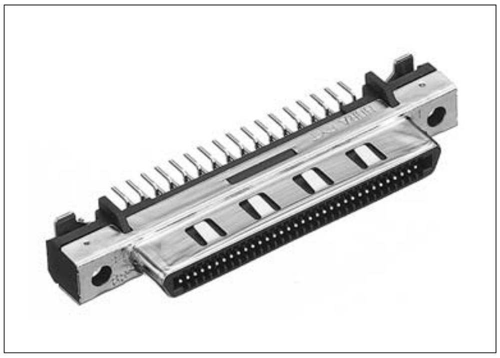
**HDRA-E68F-CP**


HDRA-E68M-CP
HDRA-E68F-CP
34.4
5.4
7
6.4
34.74
6.54

**For use with housings**: HDRA-E68LGKPC~F

# Straight DIP type female connector for PCBs HDRA-EC68FDT-( )+

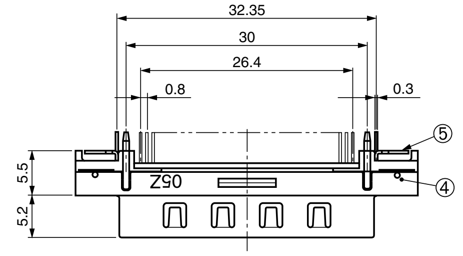
RoHS

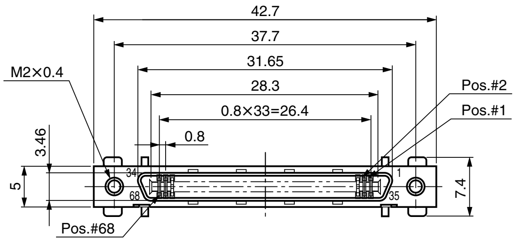


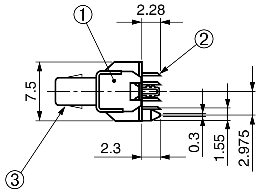
● **Configuration of product Part No.**

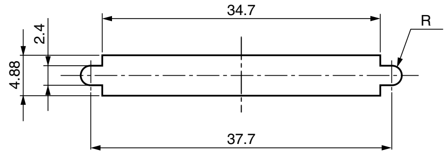
**HDRA- EC 68 FD T- ( )+**
① ② ③ ④ ⑤

① Series name
② No. of contacts: 68
③ Form of contact
FD: Straight, DIP type, female
④ With ground lock pin
⑤ Lock screw
SLD: Provided
Blank: None

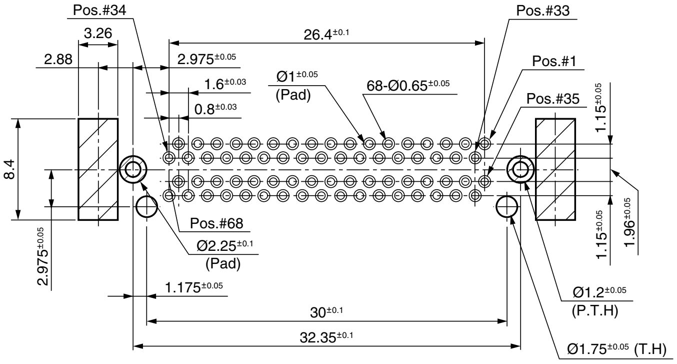

32.35
30
26.4
0.8
0.3
⑤
④
5.5
5.2
05Z


42.7
37.7
31.65
28.3
0.8×33=26.4
0.8
M2×0.4
Pos.#2
Pos.#1
3.46
5
7.4
34
68
1
35
Pos.#68


①
2.28
②
7.5
2.3
0.3
1.55
2.975
③


34.7
R
2.4
4.88
37.7

**Recommended panel cut-out dimensions**


Pos.#34
3.26
2.88
26.4±0.1
Pos.#33
2.975±0.05
Ø1±0.05 (Pad)
Pos.#1
1.6±0.03
68-Ø0.65±0.05
Pos.#35
0.8±0.03
1.15±0.05
8.4
Pos.#68
Ø2.25±0.1 (Pad)
1.15±0.05
1.96±0.05
2.975±0.05
1.175±0.05
Ø1.2±0.05 (P.T.H)
30±0.1
32.35±0.1
Ø1.75±0.05 (T.H)

**Recommended PCB layout**

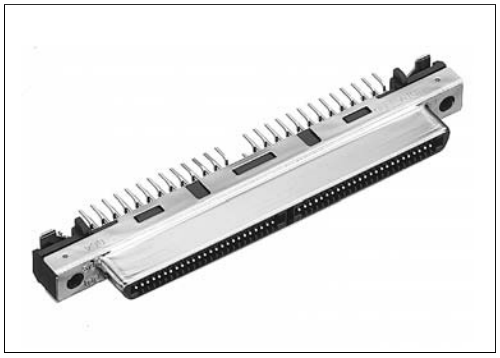
● **Components**

| | |
|---|---|
| ① | Insulator |
| ② | Contact |
| ③ | Shell |
| ④ | Sqr.nut |
| ⑤ | Hold down |

**Mating connector:** HDRA series male connectors

# Straight DIP type female connector for PCBs
# HDRA-EC100FDT-( )+

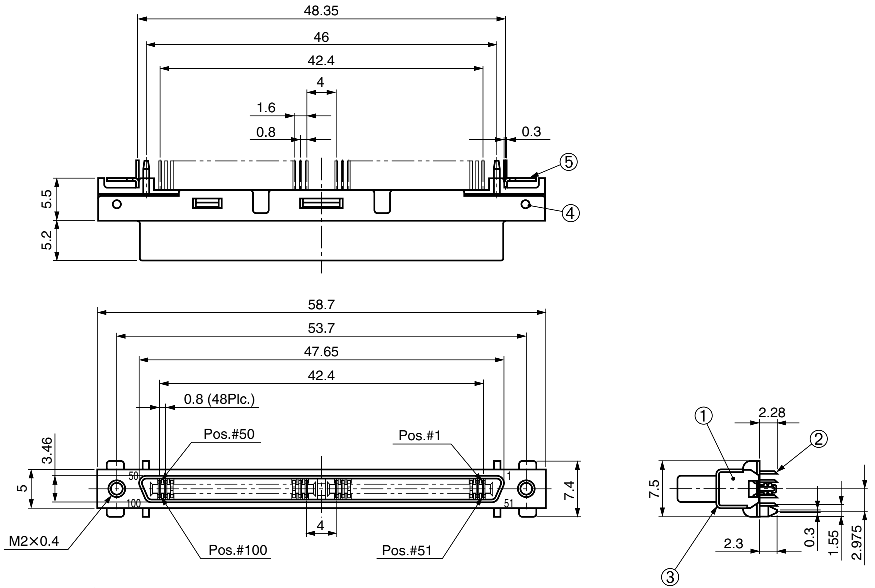
RoHS

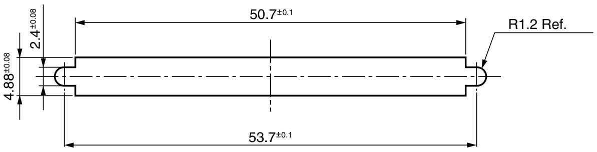


- **Configuration of product Part No.**

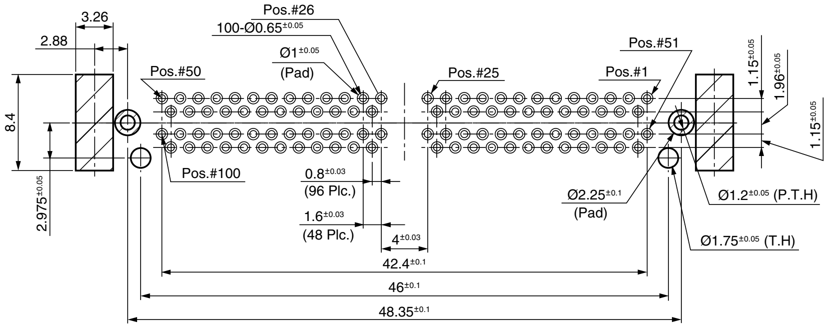
**HDRA- EC 100 FD T- ( )+**
① ② ③ ④ ⑤

① Series name
② No. of contacts: 100
③ Form of contact
FD: Straight, DIP type, female
④ With ground lock pin
⑤ Lock screw
SLD: Provided
Blank: None


48.35
46
42.4
4
1.6
0.8
0.3
⑤
④
5.5
5.2
58.7
53.7
47.65
42.4
0.8 (48Plc.)
Pos.#50
Pos.#1
3.46
5
50
100
1
51
7.4
4
M2×0.4
Pos.#100
Pos.#51
①
2.28
②
7.5
2.3
0.3
1.55
2.975
③


2.4±0.08
4.88±0.08
50.7±0.1
R1.2 Ref.
53.7±0.1

**Recommended panel cut-out dimensions**


3.26
2.88
Pos.#26
100-Ø0.65±0.05
Ø1±0.05
(Pad)
Pos.#50
Pos.#25
Pos.#51
Pos.#1
1.15±0.05
1.96±0.05
1.15±0.05
8.4
2.975±0.05
Pos.#100
0.8±0.03
(96 Plc.)
1.6±0.03
(48 Plc.)
4±0.03
Ø2.25±0.1
(Pad)
Ø1.2±0.05 (P.T.H)
Ø1.75±0.05 (T.H)
42.4±0.1
46±0.1
48.35±0.1

**Recommended PCB layout**

- **Components**

| | |
|---|---|
| ① | Insulator |
| ② | Contact |
| ③ | Shell |
| ④ | Sqr.nut |
| ⑤ | Hold down |

**Mating connector:** HDRA series, male connector