



HTS Heavy Duty Connectors Overview

Introduction

Housings

- **Material:**
Aluminum die-cast alloy;
Zinc die-cast alloy
- **Protection Class:**
IP 44 – IP 65
- **Locking Systems:**
Locking clip;
Side clip
- **Surface:**
Powder coated

Contact Inserts

- **Material:**
Thermoplastic, glass-fiber
reinforced acc. UL 94 V-0
- **Rated Current:**
to 16 A
- **Rated Voltage:**
to 500 V
- **Types of Wire Connections:**
Screw terminal;
Spring clamp terminal;
Crimp terminal
- **Contact Material:**
Copper alloy
- **Contact Surfaces:**
Hard silver-plated;
Hard gold-plated
- **UL, CSA, VDE approved**



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HTS a part of Tyco Electronics has knowledge in developing and manufacturing heavy duty connectors for more than 50 years.

The German specialist for industrial connectors is based in Neunkirchen near Cologne and serves customers world wide in the markets industrial machinery, railway and electrical power utilities.

Customers appreciate the great offer, high quality of the products, logistic capabilities as well as the individual support from specialists.

The technical expertise and the global presence of Tyco Electronics ensures an excellent customer service.

To guarantee the highest quality all products are tested in laboratories. The product portfolio includes standard products, latest innovations as well as customer specific solutions to support customers in all needs.

Product Information Center (PIC)

You can rely on the support of our PIC Team.

Apart from the PIC Team which has been specially trained to answer any technical questions you might have, our experienced staff is an additional source of information:

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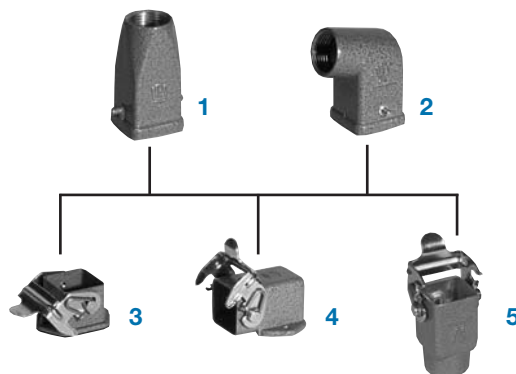
For further product information please order our catalog

Tyco Electronics
Industrie-Steckverbinder
Heavy Duty Connectors
Lit. No. 889745-2

Housings and Contact Inserts – Size 1

Series: HA.3

- Standard Design
- Locking System:
Side locking device
- Zinc die-cast alloy
- Powder coated
- IP 44



Top Housings

- 1 Straight cable entry
- 2 Angled cable entry

Bottom Housings

- 3 Surface mounted housing (bulkhead)
- 4 Surface mount (side entry)
- 5 Cable-to-cable housing

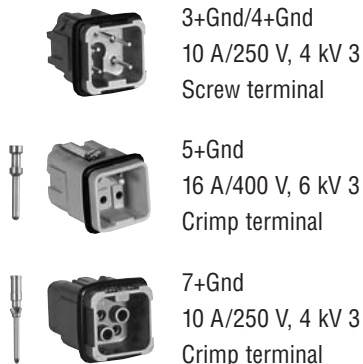
Style	Product Description	Thread	Width (mm)	Length (mm)	Height (mm)	Part Number	Package Quantity
1	HA.3.STO.1.M16.Z	M16	26.5	26.5	52.0	1106405-1	10
2	HA.3.STW.1.M16.Z	M16	26.5	40.0	49.0	1106406-1	10
3	HA.3.AG-LB	–	28.0	40.0	23.0	1-1102105-2	10
	HA.3.AGD*-LB	–	28.0	40.0	23.0	1-1102106-2	10
4	HA.3.SG-LB.1.M16.G	M16	40.0	40.0	25.0	1106404-1	10
5	HA.3.KDO-LB.1.M16.Z	M16	24.0	24.0	46.0	1106403-1	10

*) AGD = Surface mounted housing with lid

Series: HA.3 HA.4 HE-Q.5 HN.D.7

- Material:
Polycarbonate
- Flammability Rating:
acc. UL 94 V-0

Male Insert



Female Insert



No.	Product Description	Termination Style	Part Number	Package Quantity
A	HA.3.Sti.S	Screw	1-1103400-1	10
	HA.3.Bu.S	Screw	1-1103401-1	10
	HA.4.Sti.S	Screw	1-1103402-1	10
	HE.4.Bu.S	Screw	1-1103403-1	10
B	HE-Q.5.Sti.C	HE/HA Crimp Contact*	1102195-1	10
	HE-Q.5.Bu.C	HE/HA Crimp Contact*	1102194-1	10
C	HN.D.7.Sti.C	HN.D Crimp Contact*	2-1103100-3	10
	HN.D.7.Bu.C	HN.D Crimp Contact*	2-1103101-3	10

*) Mating Contacts please see Page 14
Crimp Tooling please see Page 15

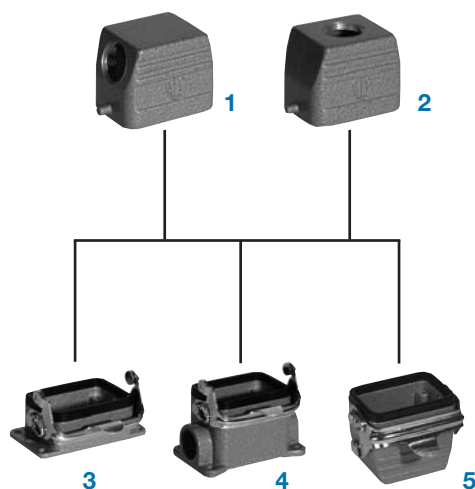
Housings – Size 3

Series: HB.6

- Standard Design
- Locking System:
Side locking device
1 lever system
- Aluminum die-cast alloy
- Powder coated
- IP 65

Series: HD.16

- Enlarged wiring space for
high wiring density
- Locking System:
1 lever system
- Aluminum die-cast alloy
- Powder coated
- IP 65



Top Housings

- 1 Cable entry from the side
- 2 Straight cable entry

Bottom Housings

- 3 Surface mounted housing (bulkhead)
- 4 Surface mount (side entry)
- 5 Cable-to-cable housing

Style	Product Description	Thread	Width (mm)	Length (mm)	Height (mm)	Part Number	Package Quantity
1	HB.6.STS.1.M25.G	M25	43.0	60.0	48.0	1106419-2	5
2	HB.6.STO.1.M25.G	M25	43.0	60.0	48.0	1106419-1	5
3	HB.6.AG-LB	–	43.5	80.0	28.5	1-1102244-2	5
	HB.6.AGD*-LB	–	43.5	80.0	28.5	1-1102246-2	5
4	HB.6.SG-LB.1.M25.Z	M25	52.0	83.0	49.5	1103062-1	5
	HB.6.SGD*-LB.1.M25.Z	M25	52.0	82.0	49.5	1103062-2	5
5	HB.6.KDO-LB.1.M25.G	M25	43.0	60.0	50.0	1106417-1	5
1	HD.16.STS.1.M32.G	M32	43.0	60.0	70.0	1106423-2	5
2	HD.16.STO.1.M32.G	M32	43.0	60.0	70.0	1106423-1	5
3	HD.16.SG-LB.2.M32.Z	2 x M32	57.0	83.0	50.0	1106422-2	5
4	HD.16.KDO-LB.1.M32.Z	2 x M32	57.0	83.0	73.5	1106422-1	5
5	HD.16.KDO-LB.1.M32.G	M32	43.0	60.0	72.0	1106421-1	5

*) AGD = Surface mounted housing with lid / SGD = Socket housing with lid

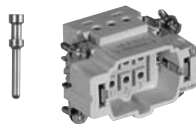
High construction with enlarged wiring space

Contact Inserts – Size 3

Series: HE.6
HN.2D.24

- **Material:**
Polycarbonate
- **Flammability Rating:**
acc. UL 94 V-0

Male Insert



6+Gnd
16 A/400 V, 6 kV 3
Screw terminal
Crimp terminal
Spring clamp terminal

Female Insert



A



24+Gnd
10 A/250 V, 4 kV 3
Crimp terminal



C

No.	Product Description	Termination Style	Part Number	Package Quantity
A	HE.6.Sti.S	Screw	1-1103634-1	10
	HE.6.Bu.S	Screw	1-1103635-1	10
	HE.6.Sti.C	HE/HA Crimp Contact*	2-1103634-3	10
	HE.6.Bu.C	HE/HA Crimp Contact*	2-1103635-3	10
	HE.6.Sti.SC	Spring Clamp	7-1103634-1	10
	HE.6.Bu.SC	Spring Clamp	7-1103635-1	10
C	HN.2D.24.Sti.C	HN.D Crimp Contact*	2-1103200-3	10
	HN.2D.24.Bu.C	HN.D Crimp Contact*	2-1103202-3	10

*) Mating Contacts please see Page 14
Crimp Tooling please see Page 15

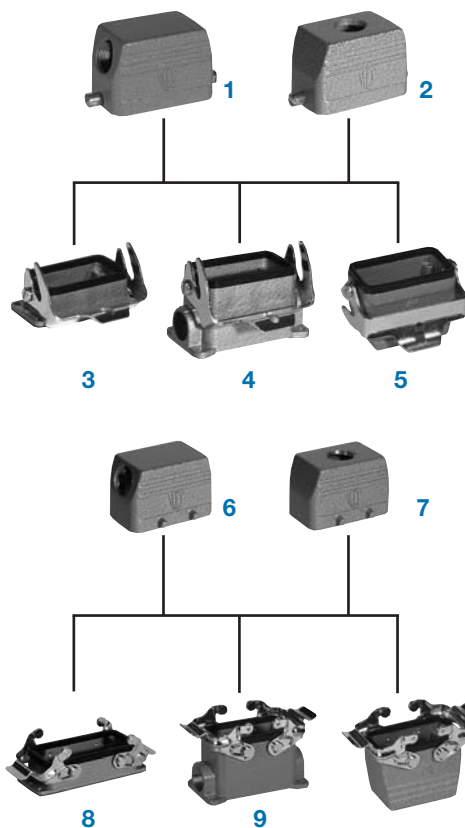
Housings – Size 4

Series: HB.10

- Standard Design
- Locking Systems:
1 Lever System
2 Levers System
- Aluminum die-cast alloy
- Powder coated
- IP 65

Series: HD.24

- Enlarged wiring space
- Locking Systems:
1 Lever System
2 Levers System
- Aluminum die-cast alloy
- Powder coated
- IP 65



Top Housings

- 1 Cable entry from the side
- 2 Straight cable entry

Bottom Housings

- 3 Surface mounted housing (bulkhead)
- 4 Surface mount (side entry)
- 5 Cable-to-cable housing

Top Housings

- 6 Cable entry from the side
- 7 Straight cable entry

Bottom Housings

- 8 Surface mounted housing (bulkhead)
- 9 Surface mount (side entry)
- 10 Cable-to-cable housing

Style	Product Description	Thread	Width (mm)	Length (mm)	Height (mm)	Part Number	Package Quantity
1	HB.10.STS-GR.1.M25.G	M25	43.0	73.0	50.0	1106430-5	5
2	HB.10.STO-GR.1.M25.G	M25	43.0	73.0	50.0	1106430-2	5
3	HB.10.AG-LB	–	43.5	93.0	28.5	1-1102271-2	5
	HB.10.AGD*-LB	–	43.5	93.0	28.5	1-1102283-2	5
4	HB.10.SG-LB.2.M25.Z	2 x M25	52.0	94.0	53.5	1106429-3	5
	HB.10.SGD*-LB.2.M25.Z	2 x M25	52.0	94.0	53.5	1106429-2	5
5	HB.10.KDO-LB.1.M25.G	M25	43.0	73.0	55.5	1106428-1	5
1	HD.24.STS-GR.1.M32.G	M32	43.0	73.0	57.0	1106434-5	5
2	HD.24.STO-GR.1.M32.G	M32	43.0	73.0	70.0	1106434-2	5
3	HD.24.SG-LB.2.M32.Z	2 x M32	57.0	94.0	73.5	1106433-3	5
6	HB.10.STS.1.M25.G	M25	43.0	73.0	50.0	1106430-4	5
7	HB.10.STO.1.16G	–	43.0	73.0	50.0	1-1102267-6	5
8	HB.10.AG-VS	–	57.0	93.0	28.5	1-1102271-1	5
9	HB.10.SG-VS.1.M25.Z	M25	57.0	94.0	55.5	1103059-1	5
10	HB.10.KDO-VS.1.M25.G	M25	57.0	73.0	55.5	1106428-2	5
6	HD.24.STS.1.M32.G	M32	43.0	73.0	70.0	1106434-4	5
7	HD.24.STO.1.M32.G	M32	43.0	73.0	70.0	1106434-1	5
9	HD.24.SG-VS.2.M32.Z	2 x M32	56.0	94.0	74.0	1106433-4	5
10	HD.24.KDO-VS.1.M32.G	M32	57.0	73.0	55.5	1106432-2	5

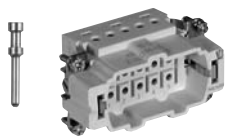
*) AGD = Surface mounted housing with lid / SGD = Socket housing with lid
High construction with enlarged wiring space

Contact Inserts – Size 4

Series: HE.10
HN.2D.42

- **Material:**
Polycarbonate
- **Flammability Rating:**
acc. UL 94 V-0

Male Insert



10+Gnd
16 A/400 V, 6 kV 3
Screw terminal
Crimp terminal
Spring clamp terminal



42+Gnd
10 A/250 V, 4 kV 3
Crimp terminal

Female Insert



A



C

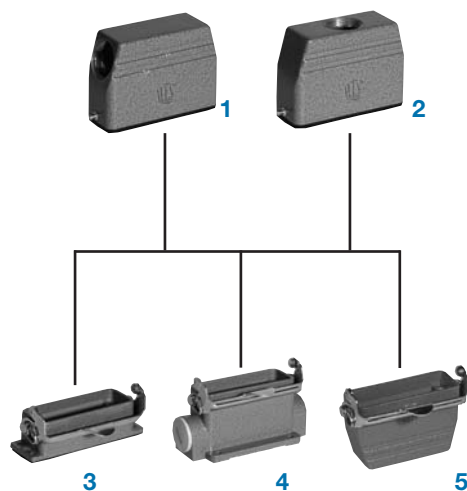
No.	Product Description	Termination Style	Part Number	Package Quantity
A	HE.10.Sti.S	Screw	1-1103636-1	10
	HE.10.Bu.S	Screw	1-1103637-1	10
	HE.10.Sti.C	HE/HA Crimp Contact*	2-1103636-3	10
	HE.10.Bu.C	HE/HA Crimp Contact*	2-1103637-3	10
	HE.10.Sti.SC	Spring Clamp	7-1103636-1	10
	HE.10.Bu.SC	Spring Clamp	7-1103637-1	10
C	HN.2D.42.Sti.C	HN.D Crimp Contact*	2-1103204-3	10
	HN.2D.42.Bu.C	HN.D Crimp Contact*	2-1103206-3	10

*) Mating Contacts please see Page 14
Crimp Tooling please see Page 15

Housings – Size 5

Series: HA.16

- Standard Design
- Locking System:
1 Lever System
- Aluminum die-cast alloy
- Powder coated
- IP 65



Top Housings

- 1 Cable entry from the side
- 2 Straight cable entry

Bottom Housings

- 3 Surface mounted housing (bulkhead)
- 4 Surface mount (side entry)
- 5 Cable-to-cable housing

Style	Product Description	Thread	Width (mm)	Length (mm)	Height (mm)	Part Number	Package Quantity
1	HA.16.STS.1.M20.G	M20	29.0	79.5	57.0	1106439-2	5
2	HA.16.STO.1.M20.G	M20	29.0	79.5	57.0	1106439-1	5
3	HA.16.AG-LB	–	29.0	96.0	28.0	1-1102140-2	5
	HA.16.AGD*-LB	–	29.0	96.0	28.0	1-1102141-2	5
4	HA.16.SG-LB.1.M20.Z	M20	50.0	102.0	50.0	1103058-1	5
	HA.16.SGD*-LB.2.M20.Z	M20	50.0	102.0	50.0	1103058-2	5
5	HA.16.KDO-LB.1.M20.G	M20	29.0	92.0	52.0	1106437-1	5

*) AGD = Surface mounted housing with lid
SGD = Socket housing with lid

Contact Inserts – Size 5

Series: HA.16
HN.D.25

- **Material:**
Polycarbonate
- **Flammability Rating:**
acc. UL 94 V-0

Male Insert



16+Gnd
16 A/250 V, 4 kV 3
Screw terminal
Crimp terminal
Spring clamp terminal

Female Insert



A



25+Gnd
10 A/250 V, 4 kV 3
Crimp terminal



B

No.	Product Description	Termination Style	Part Number	Package Quantity
A	HA.16.Sti.S	Screw	1-1103416-1	5
	HA.16.Bu.S	Screw	1-1103417-1	5
	HA.16.Sti.C	HE/HA Crimp Contact*	2-1103416-3	5
	HA.16.Bu.C	HE/HA Crimp Contact*	2-1103417-3	5
	HA.16.Sti.SC	Spring Clamp	7-1103416-1	5
	HA.16.Bu.SC	Spring Clamp	7-1103417-1	5
B	HN.D.25.Sti.C	HN.D Crimp Contact*	2-1103108-3	5
	HN.D.25.Bu.C	HN.D Crimp Contact*	2-1103109-3	5

*) Mating Contacts please see Page 14
Crimp Tooling please see Page 15

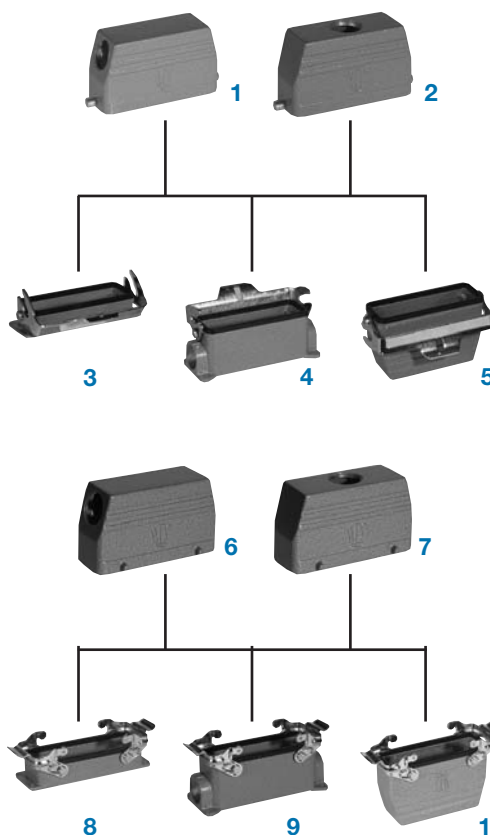
Housings – Size 6

Series: HB.16

- Standard Design
- Locking Systems:
 - 1 Lever System
 - 2 Levers System
- Aluminum die-cast alloy
- Powder coated
- IP 65

Series: HD.40

- Enlarged wiring space for high wiring density
- Locking Systems:
 - 1 Lever System
 - 2 Levers System
- Aluminum die-cast alloy
- Powder coated
- IP 65



Top Housings

- 1 Cable entry from the side
- 2 Straight cable entry

Bottom Housings

- 3 Surface mounted housing (bulkhead)
- 4 Surface mount (side entry)
- 5 Cable-to-cable housing

Top Housings

- 6 Cable entry from the side
- 7 Straight cable entry

Bottom Housings

- 8 Surface mounted housing (bulkhead)
- 9 Surface mount (side entry)
- 10 Cable-to-cable housing

Style	Product Description	Thread	Width (mm)	Length (mm)	Height (mm)	Part Number	Package Quantity
1	HB.16.STS-GR.1.M25.G	M25	43.0	93.5	60.0	3-1106449-4	5
2	HB.16.STO-GR.1.M32.G	M32	43.0	33.5	60.0	1106449-2	5
3	HB.16.AG-LB	–	43.5	113.0	28.5	1-1102296-2	5
	HB.16.AGD*-LB	–	43.5	113.0	28.5	1-1102305-2	5
4	HB.16.SG-LB.2.M25.Z	2 x M25	52.0	117.0	55.5	1106448-3	5
	HB.16.SGD*-LB.1.M25.Z	M25	52.0	117.0	55.5	1103060-3	5
1	HD.40.STS-GR.1.M32.G	M32	43.0	93.5	76.0	1106452-5	5
2	HD.40.STO-GR.1.M32.G	M32	43.0	93.5	76.0	1106452-2	5
4	HD.40.SG-LB.2.M32.Z	2 x M32	57.0	117.0	76.5	1106451-3	5
	HD.40.SGD*-LB.2.M32.Z	2 x M32	57.0	117.0	76.5	1106451-2	5
5	HD.40.KDO-LB.1.M32.G	M32	43.0	93.5	79.5	1106450-1	5
6	HB.16.STS.1.M25.G	M25	43.0	93.5	60.0	2-1106449-5	5
7	HB.16.STO.1.M32.G	M32	43.0	93.5	60.0	1106449-1	5
8	HB.16.AG-VS	–	57.0	113.0	28.5	1-1102296-1	5
9	HB.16.SG-VS.1.M25.Z	M25	57.0	117.0	55.5	1103060-1	5
6	HD.40.STS.1.M32.G	M32	43.0	93.5	76.0	1106452-4	5
7	HD.40.STO.1.M32.G	M32	43.0	93.5	76.0	1106452-1	5
9	HD.40.SG-VS.1.M32.Z	M32	57.0	117.0	76.5	1103082-1	5
10	HD.40.KDO-VS.1.M32.G	M32	57.0	93.5	79.5	1106450-2	5

*) AGD = Surface mounted housing with lid / SGD = Socket housing with lid
 High construction with enlarged wiring space

Contact Inserts – Size 6

Series: HE.16
HN.D.40
HN.2D.72
HSB.6/35

■ **Material:**
Polycarbonate

■ **Flammability Rating:**
acc. UL 94 V-0

Male Insert



16+Gnd
16 A/400 V, 6 kV 3
Screw terminal
Crimp terminal
Spring clamp terminal

Female Insert



A



40+Gnd
10 A/250 V, 4 kV 3
Crimp terminal



B



72+Gnd
10 A/250 V, 4 kV 3
Crimp terminal



C



6+Gnd
35 A/400 V, 6 kV 3
Screw terminal



D

No.	Product Description	Termination Style	Part Number	Package Quantity
A	HE.16.Sti.S	Screw	1-1103638-1	5
	HE.16.Bu.S	Screw	1-1103639-1	5
	HE.16.Sti.C	HE/HA Crimp Contact*	2-1103638-3	5
	HE.16.Bu.C	HE/HA Crimp Contact*	2-1103639-3	5
	HE.16.Sti.SC	Spring Clamp	7-1103638-1	5
	HE.16.Bu.SC	Spring Clamp	7-1103639-1	5
B	HN.D.40.Sti.C	HN.D Crimp Contact*	2-1103110-3	5
	HN.D.40.Bu.C	HN.D Crimp Contact*	2-1103111-3	5
C	HN.2D.72.Sti.C	HN.D Crimp Contact*	2-1103208-3	5
	HN.2D.72.Bu.C	HN.D Crimp Contact*	2-1103212-3	5
D	HSB.6/35.Sti.S	Screw	1-1104204-1	5
	HSB.6/35.Bu.S	Screw	1-1104205-1	5

*) Mating Contacts please see Page 14
Crimp Tooling please see Page 15

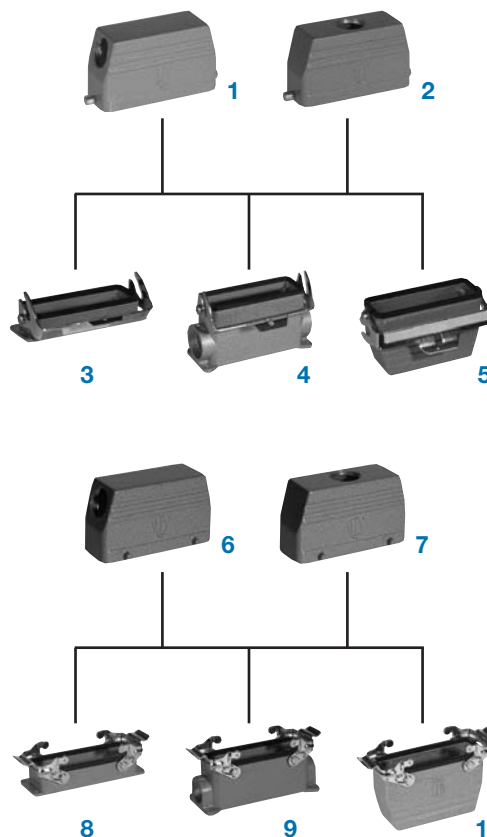
Housings – Size 8

Series: HB.24

- Standard Design
- Locking Systems:
 - 1 Lever System
 - 2 Levers System
- Aluminum die-cast alloy
- Powder coated
- IP 65

Series: HD.64

- Enlarged wiring space
- Locking Systems:
 - 1 Lever System
 - 2 Levers System
- Aluminum die-cast alloy
- Powder coated
- IP 65



Top Housings

- 1 Cable entry from the side
- 2 Straight cable entry

Bottom Housings

- 3 Surface mounted housing (bulkhead)
- 4 Surface mount housing (side entry)
- 5 Cable-to-cable housing

Top Housings

- 6 Cable entry from the side
- 7 Straight cable entry

Bottom Housings

- 8 Surface mounted housing (bulkhead)
- 9 Surface mount housing (side entry)
- 10 Cable-to-cable housing

Style	Product Description	Thread	Width (mm)	Length (mm)	Height (mm)	Part Number	Package Quantity
1	HB.24.STS-GR.1.M32.G	M32	43.0	120.0	70.0	1106465-5	5
2	HB.24.STO-GR.1.M32.G	M32	43.0	120.0	70.0	1106465-2	5
3	HB.24.AG-LB	–	43.5	140.0	28.5	1-1102291-2	5
	HB.24.AGD*-LB	–	43.5	140.0	28.5	1-1102340-2	5
4	HB.24.SG-LB.2.M25.Z	2 x M25	57.0	144.0	55.5	1106464-3	5
	HB.24.SGD*-LB.1.M25.Z	M25	57.0	144.0	55.5	1103061-3	5
1	HD.64.STS-GR.1.M32.G	M32	43.0	120.0	78.0	1106470-5	5
2	HD.64.STO-GR.1.M32.G	M32	43.0	120.0	78.0	1106470-2	5
4	HD.64.SG-LB.2.M32.Z	2 x M32	57.0	144.0	78.5	1106469-3	5
	HD.64.SGD*-LB.2.M32.Z	2 x M32	57.0	144.0	78.5	1106469-2	5
5	HD.64.KDO-LB.1.M32.G	M32	42.75	120.0	81.5	1106468-1	5
6	HB.24.STS.1.M32.G	M32	43.0	120.0	70.0	1106465-4	5
7	HB.24.STO.1.M32.G	M32	43.0	120.0	70.0	1106465-1	5
8	HB.24.AG-VS	–	57.0	140.0	28.5	1-1102291-1	5
9	HB.24.SG-VS.1.M25.Z	M25	57.0	144.0	55.5	1103061-1	5
6	HD.64.STS.1.M40.G	M40	43.0	120.0	78.0	1-1106470-9	5
7	HD.64.STO.1.M40.G	M40	43.0	120.0	78.0	3-1106470-0	5
9	HD.64.SG-VS.1.M32.Z	M32	57.0	144.0	78.5	1103083-1	5
10	HD.64.KDO-VS.1.M32.G	M32	57.0	120.0	81.5	1106468-2	5

*) AGD = Surface mounted housing with lid / SGD = Socket housing with lid

High construction with enlarged wiring space

Contact Inserts – Size 8

Series: HE.24
HN.D.64
HN.2D.108

■ **Material:**
Polycarbonate

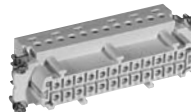
■ **Flammability Rating:**
acc. UL 94 V-0

Male Insert

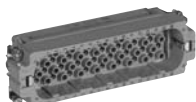


24+Gnd
16 A/400 V, 6 kV 3
Screw terminal
Crimp terminal
Spring clamp terminal

Female Insert



A



64+Gnd
10 A/250 V, 4 kV 3
Crimp terminal



B



108+Gnd
10 A/250 V, 4 kV 3
Crimp terminal



C

No.	Product Description	Termination Style	Part Number	Package Quantity
A	HE.24.Sti.S	Screw	1-1103640-1	5
	HE.24.Bu.S	Screw	1-1103641-1	5
	HE.24.Sti.C	HE/HA Crimp Contact*	2-1103640-3	5
	HE.24.Bu.C	HE/HA Crimp Contact*	2-1103641-3	5
	HE.24.Sti.SC	Spring Clamp	7-1103640-1	5
	HE.24.Bu.SC	Spring Clamp	7-1103641-1	5
B	HN.D.64.Sti.C	HN.D Crimp Contact*	2-1103112-3	5
	HN.D.64.Bu.C	HN.D Crimp Contact*	2-1103113-3	5
C	HN.2D.108.Sti.C	HN.D Crimp Contact*	2-1103216-3	5
	HN.2D.108.Bu.C	HN.D Crimp Contact*	2-1103220-3	5

*) Mating Contacts please see Page 14
Crimp Tooling please see Page 15

Module System HVS

Contact Inserts

Series HVS

- High Variable System
- Zinc Frames Size 3 to 8 (acc. to Housing)
- For up to 6 Single Modules

Material

- PBT
- Flammability Rating:
acc. UL 94 V-0



To offer a maximum of flexibility and reliability with a minimum of installation or maintenance effort Tyco Electronics developed the HVS product range (high variable system).

This system enables customers to build their own application specific connection and due the combination variety of the different modules customers benefit in terms of reduced costs (cost efficiency) and less mounting space.

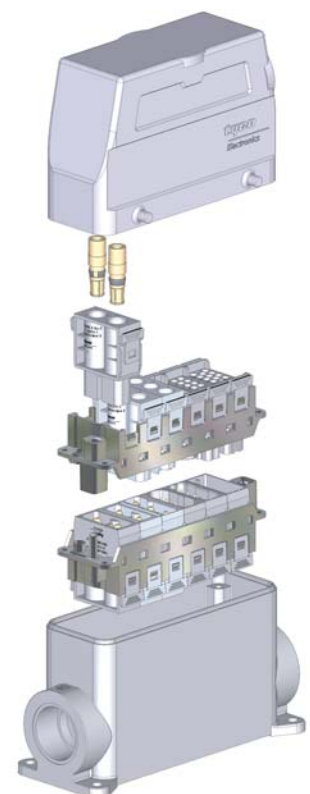
The HVS range comprises more than 25 different modules and the particular zinc frames which can then be mounted into all standard hoods and housings from Tyco Electronics. There is no tooling needed to put the modules in and out of the frame due to lever snap-in technology.

Up to 6 single modules can be used in a size 8 frame whereby the customer can individually define the combination of modules.

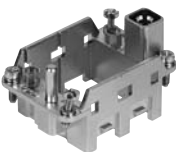
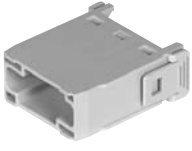
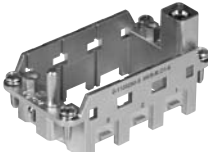
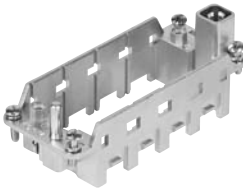
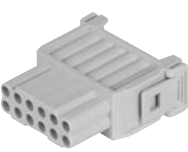
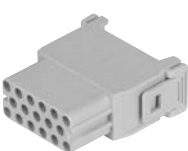
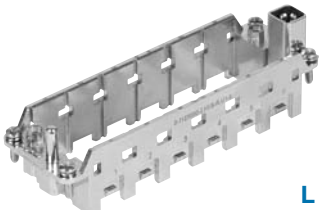
Signal, high current and high voltage, high density, Fire Wire, RJ45, USB, Coax, twisted pair, high speed and also pressure air are only some of the different connector modules. According to the insert contacts can be used individually.

In combination with the Tyco Electronics hoods and housings IP ratings of IP 65 or even IP 68 can be realised. Customers also benefit from EMI- and corrosion-protection dependent on housing.

A large variety of customer specific applications complete the product range.



Module System HVS

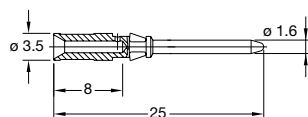
A		5 Positions 16 A/400 V Spring Termination		Zinc Frame with 2 Ground Termination. For Size 3 Housings and 2 Modules.		H
B		6 Positions 16 A/500 V Crimp Termination				
C		8 Positions 16 A/400 V Crimp Termination		Zinc Frame with 2 Ground Termination. For Size 4 Housings and 3 Modules.		I
D		20 Positions 16 A/500 V Crimp Termination		Zinc Frame with 2 Ground Termination. For Size 6 Housings and 4 Modules.		K
E		12 Positions 10 A/250 V Crimp Termination				
F		17 Positions 10 A/250 V Crimp Termination		Zinc Frame with 2 Ground Termination. For Size 8 Housings and 6 Modules.		L
G		Blind Module				

Pos.	Male		Female		Termination / Usages	Package Quantity
	Description	Part Number	Description	Part Number		
A	HVS-HE.5.Sti.SC	1103133-1	HVS-HE.5.Bu.SC	1103134-1	Spring Termination	10
B	HVS-HE.6.Sti.C	1103244-1	HVS-HE.6.Bu.C	1103245-1	Crimp Termination (HE Contacts Page 14)	10
C	HVS-HE.8.Sti.C	1103140-1	HVS-HE.8.Bu.C	1103141-1	Crimp Termination (HE Contacts Page 14)	10
D	HVS-HE.20.Sti.C	1103144-1	HVS-HE.20.Bu.C	1103145-1	Crimp Termination (HE Contacts Page 14)	10
E	HVS-HN.D.12.Sti.C	1103277-1	HVS-HN.D.12.Bu.C	1103276-1	Crimp Termination (HN.D Contacts Page 14)	10
F	HVS-HN.D.17.Sti.C	1103278-1	HVS-HN.D.17.Bu.C	1103279-1	Crimp Termination (HN.D Contacts Page 14)	10
G	HVS-Blindmodul	1103266-1	HVS-Blindmodul	1103266-1	Without Contacts (Spacer)	10
H	HVS-R.O 1-2	1103250-7	HVS-R.U 1-2	1103250-8	Housings Size 3 (Page 2)	10
I	HVS-R.O 1-3	1103250-5	HVS-R.U 1-3	1103250-6	Housings Size 4 (Page 4)	10
K	HVS-R.O 1-4	1103250-3	HVS-R.U 1-4	1103250-4	Housings Size 6 (Page 8)	10
L	HVS-R.O 1-6	1103250-1	HVS-R.U 1-6	1103250-2	Housings Size 8 (Page 10)	10

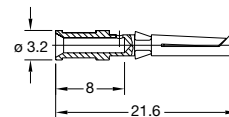
Contacts

**Crimp Contacts
Series HN.D
Silver Plated**


Pin Contact



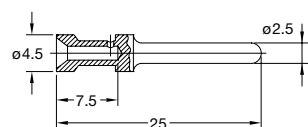
Socket Contact



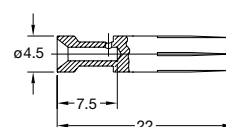
Wire Cross Section (mm ²)	Part Numbers			
	Pin Contact	Package Quantity	Socket Contact	Package Quantity
0.14–0.37	1-1105050-1	50	1-1105051-1	50
0.50	2-1105050-1	50	2-1105051-1	50
0.75–1.00	3-1105050-1	50	3-1105051-1	50
1.50	4-1105050-1	50	4-1105051-1	50
2.50	5-1105050-1	50	5-1105051-1	50

**Crimp Contacts
Series HA/HE
Silver Plated**


Pin Contact



Socket Contact



Wire Cross Section (mm ²)	Part Numbers			
	Pin Contact	Package Quantity	Socket Contact	Package Quantity
0.50	1-1105100-1	50	1-1105101-1	50
0.75–1.00	2-1105100-1	50	2-1105101-1	50
1.50	3-1105100-1	50	3-1105101-1	50
2.50	4-1105100-1	50	4-1105101-1	50
4.00	5-1105100-1	50	5-1105101-1	50

Crimping Accessories

Hand Tools

for HE, HD, HN.D Contacts



Crimping Tool
(with Locator and Die)

Description	Part Number	Package Quantity
RSZ.HE-HN.D-HVT	1-1105851-8	1



Extraction Tool
(for HN.D and HE)

Description	Part Number	Package Quantity
AWZG-HN.D-RSZ	1102855-2	1
AWZG-HE-Q5-RSZ	1102855-7	1

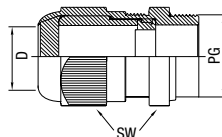


Insertion Tool

Description	Part Number	Package Quantity
EWZG-RSZ	1102855-6	1

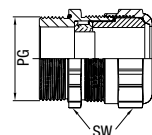
Cable Glands

Cable Glands Plastic – IP 68 Metric Thread



Description	Size PG	D (min.)	D (max.)	Hex	Part Number	Package Quantity
HUT.M16.P	M16	4	8	20	1-1102771-6	10
HUT.M20.P	M20	6	12	24	2-1102771-0	10
HUT.M25.P	M25	10	14	29	2-1102771-5	10
HUT.M32.P	M32	13	18	36	3-1102771-2	10
HUT.M40.P	M40	18	25	46	4-1102771-0	10

Cable Glands Metal – IP 68 Metric Thread



Description	Size PG	D (min.)	D (max.)	Hex	Part Number	Package Quantity
HUT.M16.MS	M16	5	10	17	1-1102770-6	10
HUT.M20.MS	M20	6	12	22	2-1102770-0	10
HUT.M25.MS	M25	13	18	27	2-1102770-5	10
HUT.M32.MS	M32	18	25	34	3-1102770-2	10
HUT.M40.MS	M40	22	32	43	4-1102770-0	10

Numerical Index

Part Number	Page	Part Number	Page	Part Number	Page	Part Number	Page
1-1102105-2	1	2-1103111-3	9	1-1103636-1	5	1106421-1	2
1-1102106-2	1	2-1103112-3	11	2-1103636-3	5	1106422-1	2
1-1102140-2	6	2-1103113-3	11	7-1103636-1	5	1106422-2	2
1-1102141-2	6	1103133-1	13	1-1103637-1	5	1106423-1	2
1102194-1	1	1103134-1	13	2-1103637-3	5	1106423-2	2
1102195-1	1	1103140-1	13	7-1103637-1	5	1106428-1	4
1-1102244-2	2	1103141-1	13	1-1103638-1	9	1106428-2	4
1-1102246-2	2	1103144-1	13	2-1103638-3	9	1106429-2	4
1-1102267-6	4	1103145-1	13	7-1103638-1	9	1106430-2	4
1-1102271-1	4	2-1103200-3	3	1-1103639-1	9	1106430-4	4
1-1102271-2	4	2-1103202-3	3	2-1103639-3	9	1106430-5	4
1-1102283-2	4	2-1103204-3	5	7-1103639-1	9	1106432-2	4
1-1102291-1	10	2-1103206-3	5	1-1103640-1	11	1106433-3	4
1-1102291-2	10	2-1103208-3	9	2-1103640-3	11	1106433-4	4
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2-1102770-0	15	1103250-1	13	1-1104205-1	9	1106439-1	6
2-1102770-5	15	1103250-2	13	1-1105050-1	14	1106439-2	6
3-1102770-2	15	1103250-3	13	2-1105050-1	14	1106448-3	8
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1103062-1	2	1-1103417-1	7	5-1105101-1	14	1106468-1	10
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Thailand – Bangkok
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Fax: +66-2-955-0505

Vietnam – Ho Chi Minh City
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Bulgaria – Sofia
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Fax: +359-2-971-2153

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Fax: +420-541-162-223
Product Information Center:
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Fax: +420-541-162-132

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Fax: +45-43-44-14-14

Egypt – Cairo
Phone: +202-419-2334
Fax: +202-417-7647

Estonia – Tartu
Phone: +372-5138-274
Fax: +372-7400-779

Finland – Helsinki
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Fax: +358-95-12-34-250

France – Cergy-Pontoise Cedex
Phone: +33-1-3420-8888
Fax: +33-1-3420-8600
Product Information Center:
Phone: +33-1-3420-8686
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France Export Divisions –
Cergy-Pontoise Cedex
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Germany – Bensheim
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Fax: +49-6251-133-1600
Product Information Center:
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Fax: +49-6251-133-1988

Greece – Athens
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Fax: +30-210-9370-655

Hungary – Budapest
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Fax: +36-1-289-1010
Product Information Center:
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Fax: +36-1-289-1017

Ireland – Dublin
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Fax: +353-1-866-5714

Israel – Petach-Tikva
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Fax: +972-3-919-1088

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Fax: +39-011-4031-116
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Fax: +39-011-40-287-428

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Fax: +370-5-213-1403
Product Information Center:
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Fax: +370-5-213-1403

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Fax: +31-73-6212-365
Product Information Center:
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Fax: +31-73-6246-998

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Fax: +47-66-77-88-55

Poland – Warsaw
Phone: +48-22-4576-700
Fax: +48-22-4576-720
Product Information Center:
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Fax: +48-22-4576-720

Romania – Bucharest
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Fax: +40-21-312-0574

Russia – Moscow
Phone: +7-495-790-7902
Fax: +7-495-721-1893
Product Information Center:
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Fax: +7-495-790-7902-401

Russia – St. Petersburg
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Fax: +7-812-718-8193

Slovenia – Ljubljana
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Fax: +386-1561-3240

South Africa – Port Elizabeth
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Fax: +27-41-581-0440

Spain – Barcelona
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Fax: +34-93-201-7879

Sweden – Upplands Väsby
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Fax: +46-8-50-72-50-01

Switzerland – Steinach
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Fax: +41-71-447-0444

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Fax: +90-212-281-8184

Ukraine – Kiev
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Fax: +380-44-206-2264
Product Information Center:
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Fax: +380-44-206-2264

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1654254-1 Issued 4-2007 8M ST