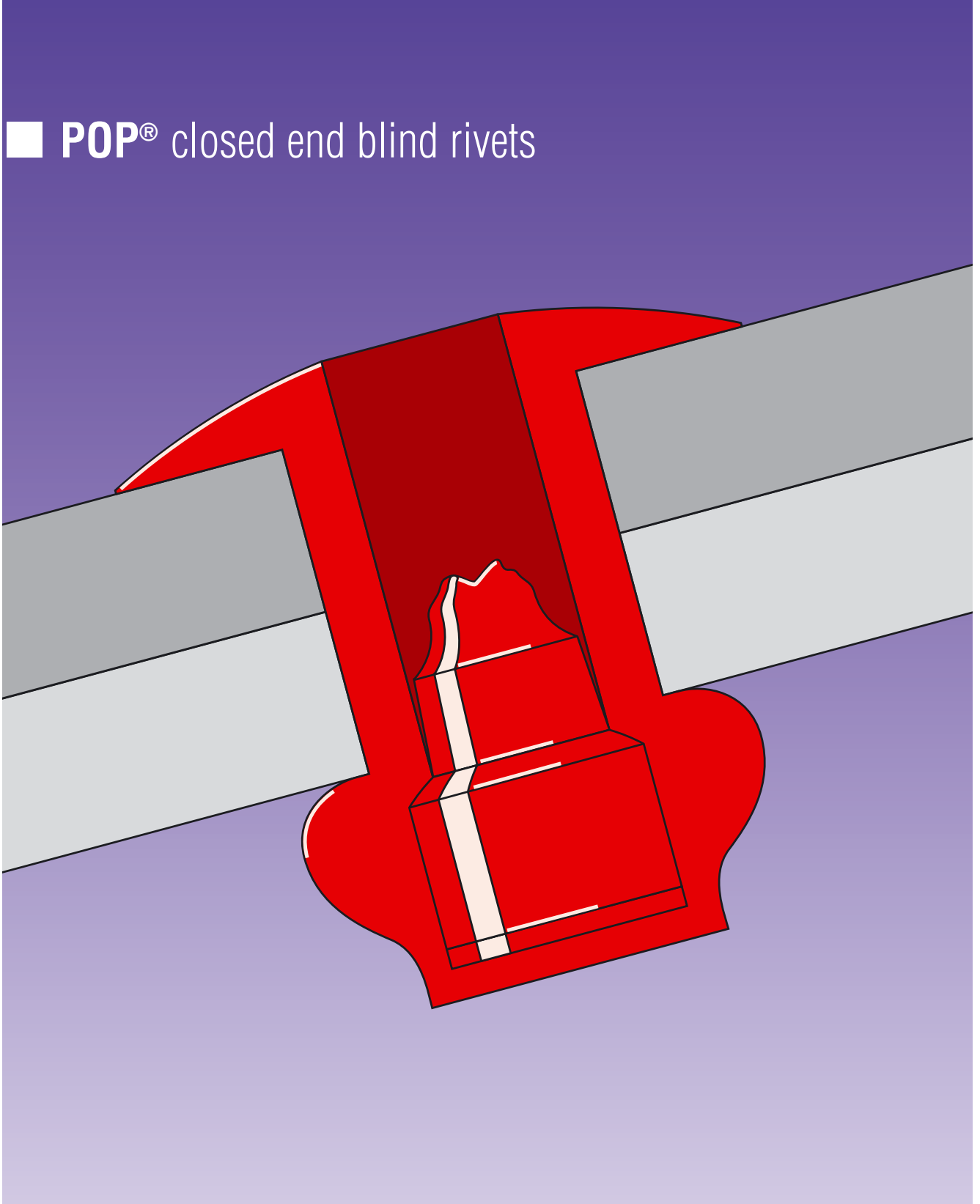


## ■ POP<sup>®</sup> closed end blind rivets



TITGEMEYER Tb1401GB(1011)1

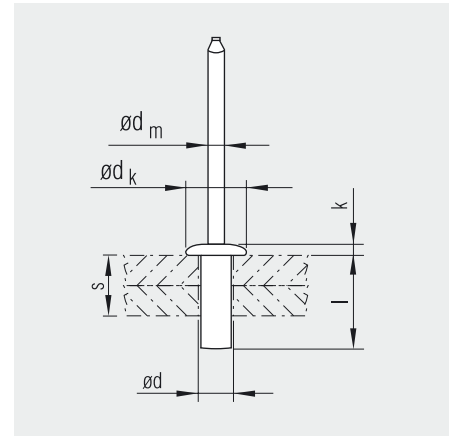
# POP® closed end blind rivets

Dome head

## Material

**Sleeve**  
Aluminium AlMg5  
Melting point 580 – 640 °C

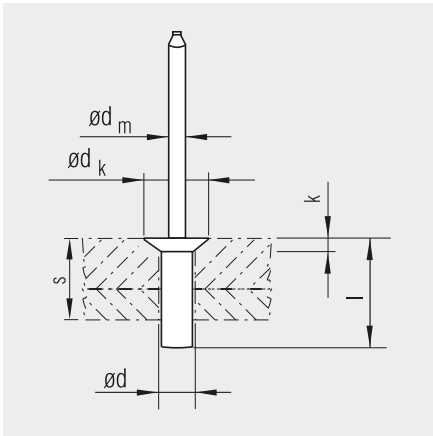
**Mandrel**  
Steel



Nominal size- $\varnothing$ d [mm]	Hole- $\varnothing$ [mm]	Grip range s [mm]	Sleeve length $l +1.0 -0.2$ [mm]	Head		Mandrel $\varnothing$ $d_{m\ nom}$ [mm]	Strength <sup>1</sup> nominal		Part No.
				$\varnothing$ $d_k \pm 0.3$ [mm]	Height $k \pm 0.2$ [mm]		Shear [N]	Tensile [N]	
3.2	3.3	0.5 – 1.6	6.0	6.0	1.1	1.6	1110	1400	315 629
		1.6 – 3.2	7.5	6.0	1.1	1.6	1110	1400	315 630
		3.2 – 4.8	9.0	6.0	1.1	1.6	1110	1400	315 631
		4.8 – 6.4	11.0	6.0	1.1	1.6	1110	1400	315 632
		6.4 – 7.9	12.5	6.0	1.1	1.6	1110	1400	315 633
		7.9 – 9.5	14.0	6.0	1.1	1.6	1110	1400	315 634
		9.5 – 12.7	17.2	6.0	1.1	1.6	1110	1400	315 635
4.0	4.1	– 3.2	8.0	7.9	1.5	2.2	1640	2200	315 670
		3.2 – 4.8	9.5	7.9	1.5	2.2	1640	2200	315 671
		4.8 – 6.4	11.0	7.9	1.5	2.2	1640	2200	315 672
		6.4 – 7.9	12.5	7.9	1.5	2.2	1640	2200	315 673
4.8	4.9	– 3.2	8.3	9.5	1.8	2.6	2260	3110	315 720
		3.2 – 4.8	10.0	9.5	1.8	2.6	2260	3110	315 721
		4.8 – 6.4	11.5	9.5	1.8	2.6	2260	3110	315 722
		6.4 – 7.9	13.0	9.5	1.8	2.6	2260	3110	315 723
		7.9 – 9.5	14.5	9.5	1.8	2.6	2260	3110	315 724
		9.5 – 12.7	18.0	9.5	1.8	2.6	2260	3110	315 725
		12.7 – 15.9	22.0	9.5	1.8	2.6	2260	3110	315 727
6.4	6.6	– 6.4	13.0	12.8	2.5	3.7	4000	4800	315 761
		6.4 – 9.5	16.0	12.8	2.5	3.7	4000	4800	315 762

<sup>1</sup> Minimum based on rivet failure

We reserve the right to amend specifications at any time.



Countersunk head 120°

**Material**

**Sleeve**  
Aluminium AlMg 5  
Melting point 580 – 640 °C

**Mandrel**  
Steel

Blind rivets

Nominal size- $\varnothing$ d [mm]	Hole- $\varnothing$ [mm]	Grip range s [mm]	Sleeve length l +1.0 -0.2 [mm]	Head		Mandrel $\varnothing$ d <sub>m nom</sub> [mm]	Strength <sup>1</sup> nominal		Part No.
				$\varnothing$ d <sub>k</sub> ±0.3 [mm]	Height k ±0.2 [mm]		Shear [N]	Tensile [N]	
<b>3.2</b>	3.3	-2.5	7.0	6.0	1.1	1.6	1110	1400	<b>315 639</b>
		2.5 – 4.1	8.5	6.0	1.1	1.6	1110	1400	<b>315 640</b>
		4.1 – 5.6	10.0	6.0	1.1	1.6	1110	1400	<b>315 641</b>
		5.6 – 7.2	11.7	6.0	1.1	1.6	1110	1400	<b>315 642</b>
		7.2 – 8.8	12.3	6.0	1.1	1.6	1110	1400	<b>315 643</b>
<b>4.0</b>	4.1	-4.4	9.5	8.0	1.5	2.2	1640	2220	<b>315 680</b>
		4.4 – 6.0	11.0	8.0	1.5	2.2	1640	2220	<b>315 681</b>
		6.0 – 7.6	12.5	8.0	1.5	2.2	1640	2220	<b>315 682</b>
		7.6 – 9.2	14.0	8.0	1.5	2.2	1640	2220	<b>315 683</b>
<b>4.8</b>	4.9	-4.7	10.0	9.5	1.8	2.6	2260	3110	<b>315 730</b>
		4.7 – 6.3	11.5	9.5	1.8	2.6	2260	3110	<b>315 731</b>
		6.3 – 7.9	13.5	9.5	1.8	2.6	2260	3110	<b>315 732</b>
		7.9 – 9.4	14.7	9.5	1.8	2.6	2260	3110	<b>315 733</b>
		9.4 – 11.0	16.5	9.5	1.8	2.6	2260	3110	<b>315 734</b>
		11.0 – 14.2	19.5	9.5	1.8	2.6	2260	3110	<b>315 735</b>

<sup>1</sup> Minimum based on rivet failure

We reserve the right to amend specifications at any time.

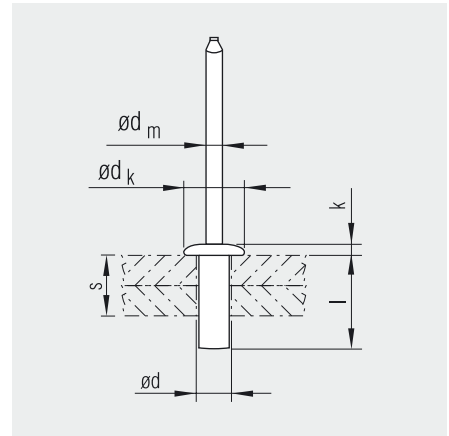
# POP® closed end blind rivets

Dome head

## Material

**Sleeve**  
**Aluminium** AlMg5  
 Melting point 580 – 640 °C

**Mandrel**  
**Stainless steel** 1.4541

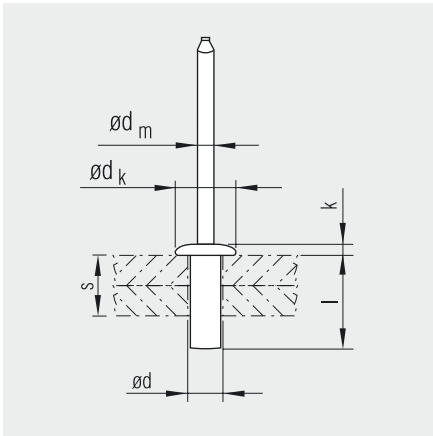


Nominal size- $\varnothing$ d [mm]	Hole- $\varnothing$ [mm]	Grip range s [mm]	Sleeve length $l +1.0 -0.2$ [mm]	Head		Mandrel $\varnothing$ $d_m \text{ nom}$ [mm]	Strength <sup>1</sup> nominal		Part No.
				$\varnothing$ $d_k \pm 0.3$ [mm]	Height $k \pm 0.2$ [mm]		Shear [N]	Tensile [N]	
<b>3.2</b>	3.3	0.5 – 1.6	6.0	6.0	1.1	1.6	1110	1400	<b>319 629</b>
		1.0 – 3.2	7.5	6.0	1.1	1.6	1110	1400	<b>319 630</b>
		3.2 – 4.8	9.0	6.0	1.1	1.6	1110	1400	<b>319 631</b>
		4.8 – 6.4	11.0	6.0	1.1	1.6	1110	1400	<b>319 632</b>
		6.4 – 7.9	12.0	6.0	1.1	1.6	1110	1400	<b>319 633</b>
<b>4.0</b>	4.1	3.2 – 4.8	9.5	7.9	1.5	2.2	1640	2220	<b>319 671</b>
		4.8 – 6.4	11.0	7.9	1.5	2.2	1640	2220	<b>319 672</b>
<b>4.8</b>	4.9	0.5 – 3.2	8.3	9.5	1.7	2.6	2260	3110	<b>319 720</b>
		3.2 – 4.8	10.0	9.5	1.7	2.6	2260	3110	<b>319 721</b>
		4.8 – 6.4	11.5	9.5	1.7	2.6	2260	3110	<b>319 722</b>
		6.4 – 7.9	13.0	9.5	1.7	2.6	2260	3110	<b>319 723</b>
		7.9 – 9.5	14.5	9.5	1.7	2.6	2260	3110	<b>319 724</b>
		9.5 – 12.7	18.0	9.5	1.7	2.6	2260	3110	<b>319 725</b>
		12.7 – 15.9	22.0	9.5	1.7	2.6	2260	3110	<b>319 727</b>

<sup>1</sup> Minimum based on rivet failure

Large dome head on request.

We reserve the right to amend specifications at any time.



Dome head

**Material**

**Sleeve**  
 Aluminium Al99  
 Melting point 630 – 660 °C

**Mandrel**  
 Aluminium AlZnMgCu 1.5

Blind rivets

Nominal size- $\varnothing$ d [mm]	Hole- $\varnothing$ [mm]	Grip range s [mm]	Sleeve length l +1.0 -0.2 [mm]	Head		Mandrel $\varnothing$ d <sub>m nom</sub> [mm]	Strength <sup>1</sup> nominal		Part No.
				$\varnothing$ d <sub>k ±0.3</sub> [mm]	Height k ±0.2 [mm]		Shear [N]	Tensile [N]	
<b>3.2</b>	3.3	- 3.2	7.6	6.0	1.2	1.8	460	660	<b>315 860</b>
		3.2 – 4.8	9.2	6.0	1.2	1.8	460	660	<b>315 861</b>
		4.8 – 6.4	10.8	6.0	1.2	1.8	460	660	<b>315 862</b>
<b>4.0</b>	4.1	3.2 – 4.8	9.6	8.0	1.6	2.3	680	1050	<b>315 881</b>
		4.8 – 6.4	11.2	8.0	1.6	2.3	680	1050	<b>315 882</b>
<b>4.8</b>	4.9	- 3.2	8.4	9.5	1.9	2.8	960	1360	<b>315 900</b>
		3.2 – 6.4	11.5	9.5	1.9	2.8	960	1360	<b>315 902</b>
		6.4 – 9.5	14.7	9.5	1.9	2.8	960	1360	<b>315 904</b>
		9.5 – 12.7	17.9	9.5	1.9	2.8	960	1360	<b>315 905</b>

<sup>1</sup> Minimum based on rivet failure

Countersunk head on request.

We reserve the right to amend specifications at any time.

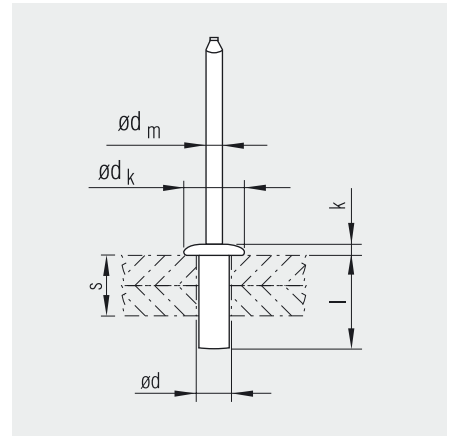
# POP® closed end blind rivets

Dome head

## Material

**Sleeve**  
**Steel** zinc, passivate  
 Melting point 1480 – 1510 °C

**Mandrel**  
**Steel** zinc

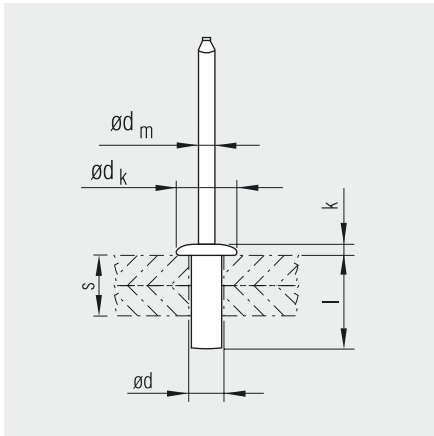


Nominal size- $\varnothing$ d [mm]	Hole- $\varnothing$ [mm]	Grip range s [mm]	Sleeve length l +1.0 -0.2 [mm]	Head		Mandrel $\varnothing$ dm nom [mm]	Strength <sup>1</sup> nominal		Part No.
				$\varnothing$ dk ±0.3 [mm]	Height k ±0.2 [mm]		Shear [N]	Tensile [N]	
3.2	3.3	3.2 – 4.8	9.7	6.3	0.9	1.9	1150	1200	315 401
4.0	4.1	1.6 – 4.8	10.2	8.0	1.1	2.3	1730	1860	315 421
4.8	4.9	– 3.2	9.2	9.5	1.2	2.9	2425	2840	315 440
		4.8 – 6.4	12.4	9.5	1.2	2.9	2425	2840	315 442

<sup>1</sup> Minimum based on rivet failure

We reserve the right to amend specifications at any time.

## POP® closed end blind rivets



Dome head

### Material

**Sleeve**  
**Nickel/Copper** alloy 70/30  
 zinc  
 Melting point 1300 – 1350 °C

**Mandrel**  
**Steel** zinc

Blind rivets

Nominal size- $\varnothing$ d [mm]	Hole- $\varnothing$ [mm]	Grip range s [mm]	Sleeve length $l +1.0 -0.2$ [mm]	Head		Mandrel $\varnothing$ $d_{m\ nom}$ [mm]	Strength <sup>1</sup> nominal		Part No.
				$\varnothing$ $d_k \pm 0.3$ [mm]	Height $k \pm 0.2$ [mm]		Shear [N]	Tensile [N]	
<b>3.2</b>	3.3	3.2 – 4.8	9.7	6.3	0.9	1.9	1500	1900	<b>315 101</b>
<b>4.0</b>	4.1	3.2 – 4.8	10.2	7.9	1.1	2.3	2200	3000	<b>315 121</b>
<b>4.8</b>	4.9	– 3.2	9.2	9.5	1.2	2.3	3300	3750	<b>315 140</b>
		4.8 – 6.4	12.4	9.5	1.2	2.3	3300	3750	<b>315 142</b>

<sup>1</sup> Minimum based on rivet failure

We reserve the right to amend specifications at any time.

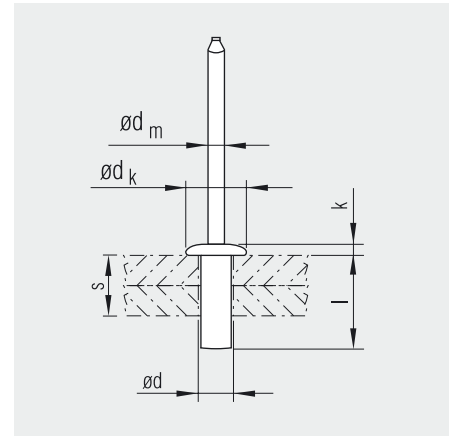
# POP® closed end blind rivets

Dome head

## Material

**Sleeve**  
**Stainless steel 1.4303**  
 Melting point 1480 – 1510 °C

**Mandrel**  
**Stainless steel 1.4006**



Nominal size- $\varnothing$ d [mm]	Hole- $\varnothing$ [mm]	Grip range s [mm]	Sleeve length l +1.0 -0.2 [mm]	Head		Mandrel $\varnothing$ d <sub>m nom</sub> [mm]	Strength <sup>1</sup> nominal		Part No.
				$\varnothing$ d <sub>k ±0.3</sub> [mm]	Height k ±0.2 [mm]		Shear [N]	Tensile [N]	
<b>3.2</b>	3.3	1.6 – 3.2	8.0	6.5	0.8	2.0	2100	2200	<b>319 400</b>
		3.2 – 4.8	9.7	6.5	0.8	2.0	2100	2200	<b>319 401</b>
		4.8 – 6.4	11.3	6.5	0.8	2.0	2100	2200	<b>319 402</b>
		6.4 – 7.9	12.9	6.5	0.8	2.0	2100	2200	<b>319 403</b>
<b>4.0</b>	4.1	– 3.2	8.6	8.0	0.9	2.3	3300	4000	<b>319 420</b>
		3.2 – 4.8	10.2	8.0	0.9	2.3	3300	4000	<b>319 421</b>
		4.8 – 6.4	11.8	8.0	0.9	2.3	3300	4000	<b>319 422</b>
		6.4 – 7.9	13.4	8.0	0.9	2.3	3300	4000	<b>319 423</b>
<b>4.8</b>	4.9	– 3.2	9.2	9.5	1.0	2.9	4300	4400	<b>319 440</b>
		3.2 – 4.8	10.8	9.5	1.0	2.9	4300	4400	<b>319 441</b>
		4.8 – 6.4	12.5	9.5	1.0	2.9	4300	4400	<b>319 442</b>
		6.4 – 9.5	15.5	9.5	1.0	2.9	4300	4400	<b>319 444</b>
<b>6.4</b>	6.6	– 6.4	14.2	12.7	1.4	3.9	6800	8700	<b>319 460</b>
		6.4 – 7.9	15.7	12.7	1.4	3.9	6800	8700	<b>319 461</b>
		7.9 – 12.8	20.5	12.7	1.4	3.9	6800	8700	<b>319 462</b>

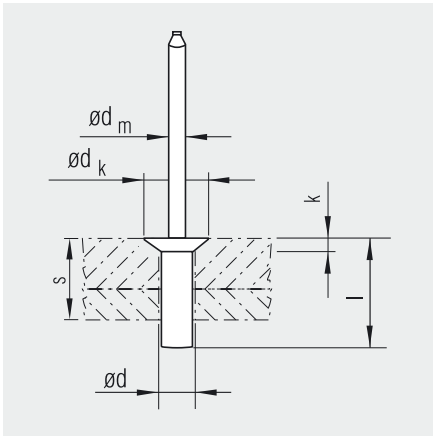
<sup>1</sup> Minimum based on rivet failure

**Note:** Grooved mandrel!

We reserve the right to amend specifications at any time.



# POP® closed end blind rivets



Countersunk head 120°

## Material

**Sleeve**  
Stainless steel 1.4303  
Melting point 1480–1510 °C

**Mandrel**  
Stainless steel 1.4006



Nominal size- $\varnothing$ d [mm]	Hole- $\varnothing$ [mm]	Grip range s [mm]	Sleeve length $l$ +1.0 -0.2 [mm]	Head		Mandrel $\varnothing$ $d_m$ nom [mm]	Strength <sup>1</sup> nominal		Part No.
				$\varnothing$ $d_k \pm 0.3$ [mm]	Height $k \pm 0.2$ [mm]		Shear [N]	Tensile [N]	
<b>3.2</b>	3.3	2.5 – 4.1	8.9	6.3	1.1	2.0	2100	2200	<b>319 410</b>
		4.1 – 5.6	10.5	6.3	1.1	2.0	2100	2200	<b>319 411</b>
		5.6 – 7.4	12.1	6.3	1.1	2.0	2100	2200	<b>319 412</b>
<b>4.8</b>	4.9	5.0 – 8.2	13.5	9.5	1.8	2.8	4300	4400	<b>319 447</b>
		8.2 – 11.3	16.6	9.5	1.8	2.8	4300	4400	<b>319 448</b>

<sup>1</sup> Minimum based on rivet failure

We reserve the right to amend specifications at any time.

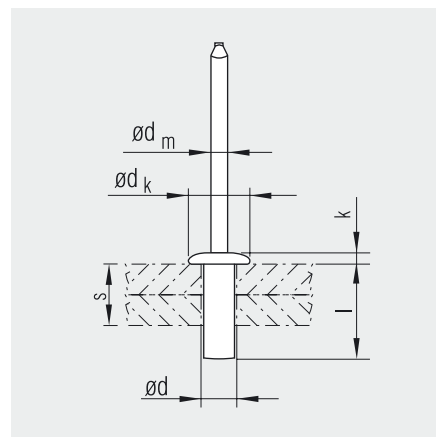
# POP® closed end blind rivets

Dome head

## Material

**Sleeve**  
**Stainless steel 1.4303**  
 Melting point 1480 – 1580 °C

**Mandrel**  
**Stainless steel 1.4303**

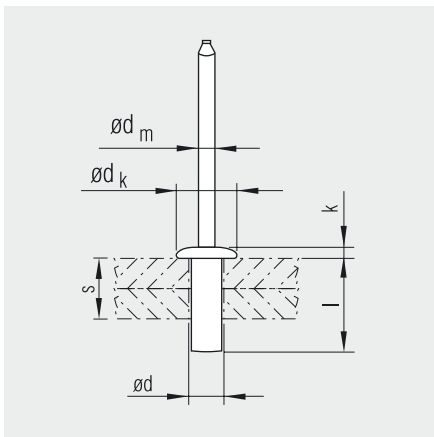


Nominal size- $\varnothing$ d [mm]	Hole- $\varnothing$ [mm]	Grip range s [mm]	Sleeve length $l +1.0 -0.2$ [mm]	Head		Mandrel $\varnothing$ $d_m \text{ nom}$ [mm]	Strength <sup>1</sup> nominal		Part No.
				$\varnothing$ $d_k \pm 0.3$ [mm]	Height $k \pm 0.2$ [mm]		Shear [N]	Tensile [N]	
4.8	4.9	2.0 – 4.5	12.3	9.3	1.1	3.0	4300	4800	319 451
		3.5 – 6.0	13.7	9.3	1.1	3.0	4300	4800	319 452
		6.5 – 9.0	16.8	9.3	1.1	3.0	4300	4800	319 453
		9.0 – 11.5	19.7	9.3	1.1	3.0	4300	4800	319 454

<sup>1</sup> Minimum based on rivet failure

**Note:** Grooved mandrel!

We reserve the right to amend specifications at any time.



Dome head

**Material**

**Sleeve**  
**Copper**  
 Melting point 1080 °C

**Mandrel**  
**Steel**

Blind rivets

Nominal size- $\phi$ d [mm]	Hole- $\phi$ [mm]	Grip range s [mm]	Sleeve length l +1.0 -0.2 [mm]	Head		Mandrel $\phi$ d <sub>m nom</sub> [mm]	Strength <sup>1</sup> nominal		Part No.
				$\phi$ d <sub>k</sub> ±0.3 [mm]	Height k ±0.2 [mm]		Shear [N]	Tensile [N]	
<b>3.2</b>	3.3	-1.6	6.0	6.0	1.1	1.6	1020	1420	<b>315 801</b>
		1.6 – 3.2	7.5	6.0	1.1	1.6	1020	1420	<b>315 802</b>
		3.2 – 4.8	9.0	6.0	1.1	1.6	1020	1420	<b>315 803</b>
		6.4 – 7.9	12.3	6.0	1.1	1.6	1020	1420	<b>315 805</b>
<b>4.0</b>	4.1	1.5 – 4.8	9.5	8.0	1.4	2.2	1550	2260	<b>315 821</b>
		4.8 – 7.9	12.7	8.0	1.4	2.2	1550	2260	<b>315 822</b>
<b>4.8</b>	4.9	0.5 – 3.2	8.5	9.5	1.7	2.6	2130	3110	<b>315 840</b>
		3.2 – 6.4	11.5	9.5	1.7	2.6	2130	3110	<b>315 842</b>

<sup>1</sup> Minimum based on rivet failure

Countersunk head on request.

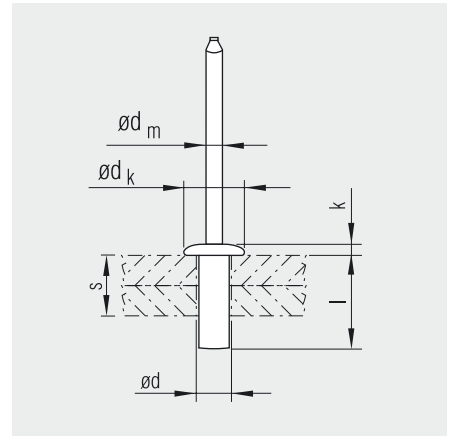
We reserve the right to amend specifications at any time.

# POP® closed end blind rivets

Dome head

## Material

- Sleeve**  
**Copper**  
Melting point 1080 °C
- Mandrel**  
**Stainless steel 1.4541**

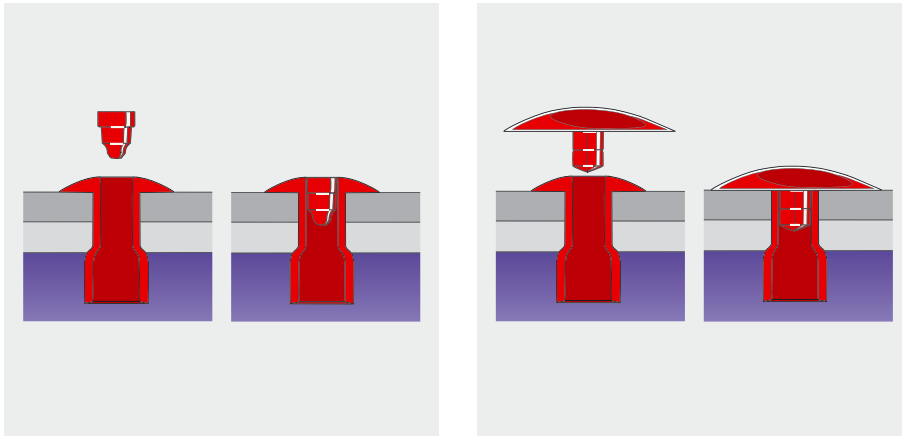


Nominal size-Ø d [mm]	Hole-Ø [mm]	Grip range s [mm]	Sleeve length l +1.0 -0.2 [mm]	Head		Mandrel Ø d <sub>m nom</sub> [mm]	Strength <sup>1</sup> nominal		Part No.
				Ø d <sub>k</sub> ±0.3 [mm]	Height k ±0.25 [mm]		Shear [N]	Tensile [N]	
3.2	3.3	-1.6	6.0	6.0	1.1	1.6	1020	1420	<b>319 801</b>
		1.6 – 3.2	7.5	6.0	1.1	1.6	1020	1420	<b>319 802</b>
		3.2 – 4.8	9.0	6.0	1.1	1.6	1020	1420	<b>319 803</b>
		6.4 – 7.9	12.0	6.0	1.1	1.6	1020	1420	<b>319 805</b>

<sup>1</sup> Minimum based on rivet failure

We reserve the right to amend specifications at any time.

# POP® blind rivets Filler for POP® blind rivets



For sealing the head of POP® blind rivets with standard dome head

Blind rivets

## Plastic filler with cap for POP® blind rivets

$\varnothing$ [mm]	Material	Colour	Similar RAL	Filler dimensions [mm]	Part No.
3.0/3.2	Al-alloy	white	9010	8.0 x 2.0 x 1.5	<b>408 360</b>
		black	9011	8.0 x 2.0 x 1.5	<b>408 361</b>
4.8/5.0	Steel, Stainless steel	white	9010	13.0 x 3.2 x 4.0	<b>408 367</b>
		black	9011	13.0 x 3.2 x 4.0	<b>408 368</b>
		silver	9006	13.0 x 3.2 x 4.0	<b>408 369</b>
	Al-alloy	silver	9006	13.0 x 2.6 x 4.0	<b>408 374</b>
		white	9010	13.0 x 2.6 x 4.0	<b>408 380</b>
		black	9011	13.0 x 2.6 x 4.0	<b>408 381</b>

## Plastic filler for POP® blind rivets

$\varnothing$ [mm]	Material	Colour	Part No.
3.0/3.2	Al-alloy, Steel, Stainless	white	<b>408 333</b>
4.0	Al-alloy, Steel, Stainless	white	<b>408 334</b>
4.8/5.0	Steel, Stainless steel	white	<b>408 335</b>
	Al-alloy	grey	<b>408 341</b>
6.4	Steel	white	<b>408 336</b>

## Washer

Material	Dimensions $d_2 \times d_1 \times s$ [mm]	Colour	Part No.
Neoprene	6.5 x 3.8 x 1	black	<b>408 235</b>
	10 x 3.5 x 1	black	<b>408 232</b>
	10 x 3.8 x 1	black	<b>408 230</b>
	11 x 6.0 x 1	black	<b>408 146</b>
Brass	12 x 3.3 x 1	–	<b>408 147</b>
	12 x 4.1 x 1	–	<b>408 114</b>
	12 x 4.9 x 1	–	<b>408 148</b>
Steel	9 x 4.3 x 1	zinc	<b>408 214</b>
	10 x 3.1 x 1	zinc	<b>408 213</b>
	12 x 3.1 x 1	zinc	<b>408 203</b>
	12 x 4.1 x 1	zinc	<b>408 204</b>
	12 x 5.1 x 1	zinc	<b>408 205</b>
Stainless steel	12 x 4.7 x 1	–	<b>408 100</b>
	12 x 5.0 x 1	–	<b>408 101</b>

