

C16E

Case-hardened steels

Material no.	1.1148
according to	DIN EN 10084
Tensile strength class	A

General

When either hot- or cold-rolled, casehardened steels are predominantly used for transmission parts (Plate springs, clutch disks). The hot-rolled steels offer good punching quality and formability. After case-hardening, the finished components have a very strong core, whereas the surface is characterised by good wear resistance.

As the melting and hot-rolling conditions have an effect on further treatment at the customer, the customer should always state the intended use when placing an order.

Chemical composition¹⁾

(in percent by weight)

	min.	max.
C	0.12 %	0.18 %
Si		0.40 %
Mn	0.60 %	0.90 %
P		0.035 %
S		0.035 %

1) Heat analysis

Available dimensions

Hot-rolled coils unpickled, mill edge

Thickness in mm	Width in mm
1.50 – 1.79	900 – 1250
1.80 – 1.99	900 – 1390
2.00 – 2.24	900 – 1540
2.25 – 2.49	900 – 1700
2.50 – 12.70	900 – 1880

Thicknesses ≤ 25 mm on request.

Widths ≤ 2000 mm on request.

Hot-rolled coils pickled, mill edge

Thickness in mm	Width in mm
1.50 – 1.79	900 – 1250
1.80 – 1.99	900 – 1390
2.00 – 2.24	900 – 1540
2.25 – 2.49	900 – 1700
2.50 – 6.00	900 – 1880
6.01 – 12.70	900 – 1520

Hot-rolled coils pickled, trimmed edge

Thickness in mm	Width in mm
1.50 – 1.79	900 – 1230
1.80 – 1.99	900 – 1370
2.00 – 2.24	900 – 1520
2.25 – 2.49	900 – 1680
2.50 – 6.00	900 – 1850
6.01 – 10.00	900 – 1500

Hot-rolled slit strip

Thickness in mm	Width in mm
1.50 – 1.79	100 – 515
1.80 – 1.99	100 – 635
2.00 – 2.24	100 – 760
2.25 – 7.00	100 – 800
7.01 – 8.00	140 – 800
8.01 – 9.00	175 – 800
9.01 – 10.00	233 – 800

Widths < 100 mm on request.

Condition of delivery, scope of testing and certificate

The provisions of DIN EN 10084, chapters 6.4.1 und 8 shall apply for delivery and inspection. All case-hardened steels are delivered in a hot-rolled and untreated condition.

Test certificates according to DIN EN 10204 can be supplied as follows: EDP, remote data transmission, fax, e-mail, paper.