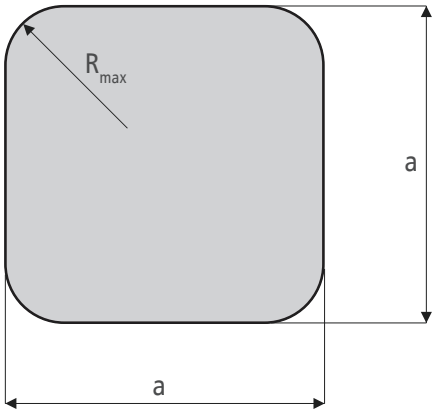
SQUARE BILLETS



SQUARE BILLETS ARE MANUFACTURED AS HOT-ROLLED OF THE FOLLOWING SIZES AND TOLERANCES:

Side of the square	Tolerance of the square's side	Radius	Length	Weight
a (mm)	A (mm)	Rmax (mm)	L (m)	1 mb/kg
80	+2,0/-3,0	12	2÷8* or other dimensions within the range, tolerance of cutting +100/-0 mm	49,3
90				62,6
100	+2,5/-3,5	15		77,0
110		18		93,0
120				111,0
130	+3,0/-4,0	21		124,2
140				151,0

Side of the square	Dimension tolerance		Length
	Regular accuracy class	Increased accuracy class /pd/	
a (mm)	mm	mm	m
140	+/-5	+/-3,5	2÷6*
150			
160		+/-4	
170			
180	+/-6	+/-4,5	
190			
200	+/-7	+/-5	
220			
240			
260	+/-8	+/-6	
280			
300			

*Upon agreement, we may offer exact lengths with tolerance +100/-0 mm.
Corner radius – resulting from rolling on the flat barrel of a roll.

MANUFACTURING SPECIFICATIONS

acc. to PN-H-93020:1981 – dimensions
acc. to PN-H-93021:1989 – die forging
acc. to PN-H-93022:1989 – rolling and forging
acc. to PN-H-93000:1984 – ordinary steel for mechanical treatment
acc. to PN-H-93001:1985 – quality steel for mechanical treatment
acc. to the certifications EN standard

STRAIGHTNESS

Straightness tolerance max. 2% of the product length

SPECIFICATIONS OF THE DELIVERY

Billets are delivered as rolled, soft annealed or normalised

PACKAGING

Billets are delivered loose or in bundles of max. 3.5 ton weight

ACCEPTANCE TESTS / CERTIFICATES

Acceptance tests are performed according to conditions of appropriate standards determined by the Huta Bankowa's Quality Control Service or external representatives of Classifying Associations determinated by the customer.
The test results are confirmed in the Certificates: 2.2; 3.1; 3.2 according to the EN 10204 Standard.

GRADES OF STEEL

Square billets are manufactured of carbon and alloy steel according to the EN 10025; EN 10084; EN 10273 or/and other agreed while ordering

NO.	STANDARD NO.	GRADES OF STEEL
1	PN-EN 10025-2	E295; E335; E360; S235JR; S235JO; S235J2; S275JR; S275JO; S275JS2; 355JR; S355JO; S355J2; S355K2
2	PN-EN 10025-3	S275N; S355N
3	PN-EN 10083-1	C22E; C35E; C45E; C55E; C60E; 41Cr4; 34CrMo4; 42CrMo4
4	EN 10084	C10E; C15E; 16MnCr5, 20MnCr5
5	PN-EN 10273	P235GH; P250GH; P265GH; P295GH; P355GH; 16Mo3
6	DIN 2528	C21
7	DIN 17243	C22.8
8	PN-H-84023/07:1989	R35; R45
9	PN-H-84024:1975	K10, K18
10	DIN 1629 (Acceptance of TÜV Hannover)	St37.0, St44.0; St52.0
11	DIN 17175 (Acceptance of TÜV Hannover)	St35.8, St45.8
12	PN-H-93011:1996	35, 28Mn6; 30G2F; 34CrMo4
13	VdTÜV 311-12-89 VdTÜV 342-06-96	34CrMo4
14	PN-H-92147:1993 Acceptance regulations of maritime associations: PRS, LRS, GL, DNV, BV, ABS	A; B; D; AH32; AH36; DH32; DH36