This technical specification aims to define the chemical/mechanical properties and standards for cold rolled grade 316L stainless steel strips.

Grade 316L Stainless Steel Strips Technical Specifications

1. 316L Stainless Steel Strips Chemical Composition

Grade	Spec.	Range	%C	%Si	%Mn	%P	%S	%Cr	%Ni	%Mo	%Ti	%N
316L	ASTM A240	Min.						16.00	10.00	2.00	-	-
		Max.	0.03	0.75	2.00	0.045	0.03	18.00	14.00	3.00	-	0.10

Stainless Steel Grade Comparison

STS	USA	UNS	CHINA	EURONORM		RUSSIA	SWEDISH	JAPANESE
GRADE	AISI/ASTM	NO	GB	NO	NAME	GOST	SS	JIS
316L	316L	S31603	022Cr17Ni12Mo2	1.4404	X2CrNiMo17-12-2	-	2348	SUS316L

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2. 316L Stainless Steel Strips Mechanical Properties

Grade	EN Grade	Yield Strength Rp0.2 (N/mm²)	Tensile Strength Rm (N/mm²)	Hardness	Vickers Hardness (HV)	Elongation A80 % Min.
316L	1.4404	⩾205	⩾520	ANN	⩾150	⩾40
		⩾450	⩾700	1/4 Hard	220-250	⩾20
		⩾700	⩾850	1/2 Hard	250-310	⩾8
		⩾880	⩾1000	3/4 Hard	310-370	⩾4
		⩾1020	⩾1150	Full Hard	⩾370	⩾1

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3. 316L Stainless Steel Strips Shipping Mark

- Below information must be mentioned on each 316L stainless steel strips marking (shipping mark)

Supplier:		Customer:	
Alloy/Steel Grade:		Edge:	
Surface Finish:		Package No.:	
Materials Heat No.:		Net Weight:	
Size:		Gross Weight:	
Coil Quantity:		Date:	

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4. 316L Stainless Steel Strips Standard Packaging

1）Cardboard/inner core inner diameter: 300/400/500mm.

2）Each coil net weights to be within 500 kg. Max gross weight of each wooden pallet 1200 Kg.

3）Overall diameter of each coil should not exceed 1100mm.

4）All coils to have no splices or joints.

5）Material to be consistent throughout each coil, especially width, thickness and formability.

6）Wooden pallet with coils packed eye to sky with 40mm spacers between coils and an identification label with information relating to material.

7）To be supplied on pallets with a minimum leg height of 100mm.

8）Coils must be stored and transported in a dry environment to minimise condensation.

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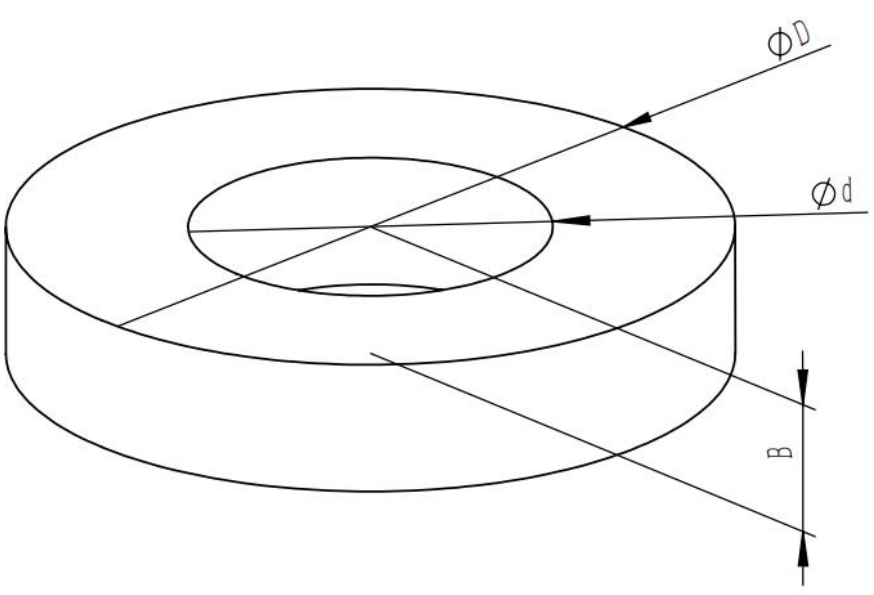
COIL B (Width)	OD		ID
	ØD MAX	ØD MIN	Ød
000-500mm	1100mm	600mm	200mm/300mm/400mm/500mm



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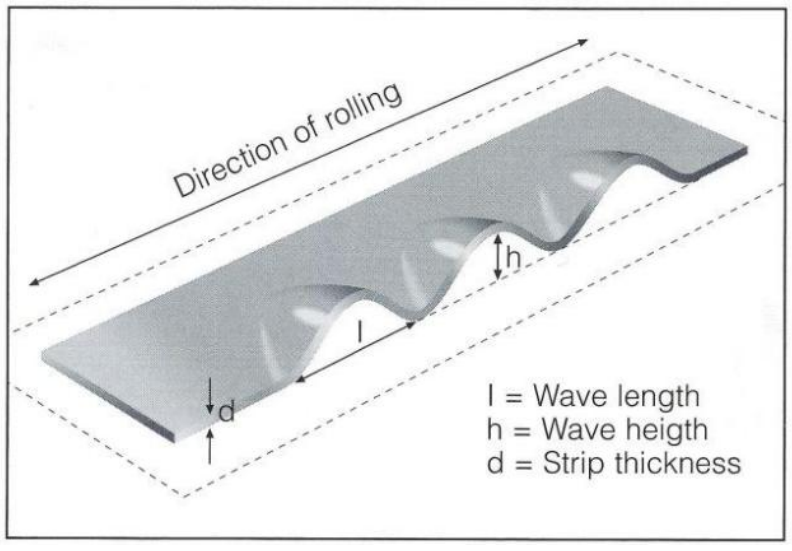
5. 316L Stainless Steel Strips Flatness Tolerance

316L stainless steel strips flatness and edge waviness tolerances must be as customer's requested.

Thickness	HZW Standard		EN 1.4404	
	h/l	h/l in %	h/l	h/l in %
≤1mm	≤0.015	≤1.5	≤0.03	≤3.0
>1mm	≤0.015	≤1.5	≤0.02	≤2.0



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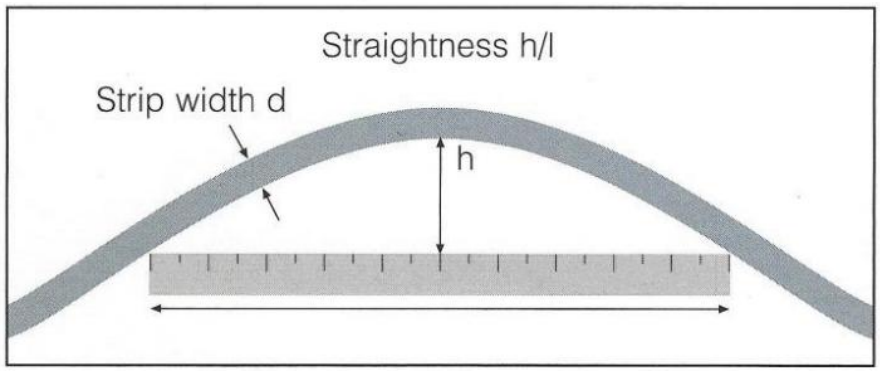
6. 316L Stainless Steel Strips Straightness Tolerance

316L stainless steel strips straightness tolerance tolerances must be as customer's requested.

Width/mm		EN 1.4404 standard Straightness tolerance in mm			
		Normal		HZW Standard	
≥	<	Measured length		Measured length	
		1000mm	2000mm	1000mm	2000mm
3	10	≤ 5	≤ 20	≤ 2.5	≤ 10
10	25	≤ 4	≤ 16	≤ 1.5	≤ 6
25	40	≤ 3	≤ 12	≤ 1.25	≤ 5
40	125	≤ 2	≤ 8	≤ 1.0	≤ 4
125	400	≤ 1.5	≤ 6	≤ 0.75	≤ 3



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7. 316L Stainless Steel Strips Thickness Tolerance

Width	JIS4305（ET）				ASTM A240				GB/T 4239			
Thickness	＜160	≥160 ＜ 250	≥250 ＜ 400	≥400 ＜ 600	＞5 ≤25	＞25 ≤76	＞76 ≤150	＞150 ≤300	＞20 ≤150	＞150 ≤250	＞250 ≤400	＞400 ≤600
＜0.10	±0.01	±0.020	-	-	±10%	±10%	0.1	±10%	±0.010	±0.010	0.01	-
≥0.10-0.16	±0.015	±0.020	-	-	±10%	±10%	0.1	±10%	±0.010	±0.010	0.01	-
≥0.16-0.25	±0.020	±0.025	±0.030	±0.030	±0.04	±0.04	0.04	±0.40	±0.010	±0.010	0.01	-
≥0.25-0.40	±0.025	±0.030	±0.035	±0.035	±0.05	±0.05	0.05	±0.06	±0.020	±0.020	±0.020	±0.020
≥0.40-0.60	±0.035	±0.040	±0.040	±0.040	±0.06	±0.06	0.06	±0.06	±0.020	0.02	±0.020	±0.030
≥0.60-0.80	±0.040td	±0.045	±0.045	±0.045	±0.06	±0.06	±0.06	±0.09	0.03	0.03	±0.030	±0.040

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8. 316L Stainless Steel Strips Width Tolerance

316L Stainless Steel Strips Width Tolerance Range

Thickness	JIS4305 (EW)		ASTM A240		GB/T 4239	
Width	**< 0.60**	**≥0.60-1.00**	**< 0.38**	**≥0.38-1.00**	**< 0.50**	**≥0.50-1.00**
< 10	-	-	-	-	-	-
≥10-80	±0.15	±0.20	±0.127	±0.127	±0.15	±0.20
≥80-160	±0.15	±0.20	±0.127	±0.127	±0.20	±0.010
≥160-280	±0.20	±0.25	±0.254	±0.254	±0.20	±0.25
≥260-400	±0.25	±0.25	±0.254	±0.254	±0.25	±0.30
≥400-600	±0.30	±0.30	±0.406	±0.406	±0.30	±0.30