



Designation: **A276 – 13a A276/A276M – 15**

Standard Specification for Stainless Steel Bars and Shapes¹

This standard is issued under the fixed designation ~~A276~~; **A276/A276M**; the number immediately following the designation indicates the year of original adoption or, in the case of revision, the year of last revision. A number in parentheses indicates the year of last reappraisal. A superscript epsilon (ϵ) indicates an editorial change since the last revision or reappraisal.

This standard has been approved for use by agencies of the U.S. Department of Defense.

1. Scope*

1.1 This specification covers hot-finished or cold-finished bars except bars for reforging (**Note 1**). It includes rounds, squares, and hexagons, and hot-rolled or extruded shapes, such as angles, tees, and channels in the more commonly used types of stainless steels. The free-machining types (**Note 2**) for general corrosion resistance and high-temperature service are covered in a separate specification.

NOTE 1—For bars for reforging, see Specification **A314**.

NOTE 2—For free-machining stainless bars designed especially for optimum machinability, see Specification **A582/A582M**.

NOTE 3—There are standards covering high nickel, chromium, austenitic corrosion, and ~~heat-resisting~~ heat-resisting alloy materials. These standards are under the jurisdiction of ASTM Subcommittee B02.07 and may be found in *Annual Book of ASTM Standards*, Vol. 02.04.

1.2 The values stated in either SI units or inch-pound units are to be regarded as standard. ~~The values given in parentheses are mathematical conversions to SI units that are provided for information only and are not considered standard separately as standard. Within the text, the SI units are shown in brackets. The values stated in each system may not be exact equivalents; therefore, each system shall be used independently of the other. Combining values from the two systems may result in non-conformance with the standard. The inch-pound units shall apply unless the “M” designation of this specification is specified in the order.~~

2. Referenced Documents

2.1 ASTM Standards:²

A314 Specification for Stainless Steel Billets and Bars for Forging

A370 Test Methods and Definitions for Mechanical Testing of Steel Products

A484/A484M Specification for General Requirements for Stainless Steel Bars, Billets, and Forgings

A582/A582M Specification for Free-Machining Stainless Steel Bars

A751 Test Methods, Practices, and Terminology for Chemical Analysis of Steel Products

A1058 Test Methods for Mechanical Testing of Steel Products—Metric

E527 Practice for Numbering Metals and Alloys in the Unified Numbering System (UNS)

2.2 SAE Document:³

SAE J 1086 Recommended Practice for Numbering Metals and Alloys

3. Ordering Information

3.1 It is the responsibility of the purchaser to specify all requirements that are necessary for material ordered under this specification. Such requirements may include but are not limited to the following:

3.1.1 Quantity (weight or number of pieces),

3.1.2 Name of material: stainless steel,

3.1.3 Form (bars, angles, etc.) and so forth),

3.1.4 Condition (Section 4.1),

3.1.5 Finish (Section 8 of Specification **A484/A484M**),

3.1.6 Surface preparation of shapes (Section 8 of Specification **A484/A484M**),

¹ This specification is under the jurisdiction of ASTM Committee **A01** on Steel, Stainless Steel and Related Alloys and is the direct responsibility of Subcommittee **A01.17** on Flat-Rolled and Wrought Stainless Steel.

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² For referenced ASTM standards, visit the ASTM website, www.astm.org, or contact ASTM Customer Service at service@astm.org. For *Annual Book of ASTM Standards* volume information, refer to the standard's Document Summary page on the ASTM website.

³ Available from Society of Automotive Engineers (SAE), 400 Commonwealth Dr., Warrendale, PA 15096-0001, <http://www.sae.org>.

*A Summary of Changes section appears at the end of this standard



- 3.1.7 Applicable dimensions including size, thickness, width, and length, l.
 - 3.1.8 Cross section (round, square, etc.) and so forth).
 - 3.1.9 Type or UNS designation ([Table 1](#)),
 - 3.1.10 ASTM designation and date of issue, and
 - 3.1.11 Whether bars are to be rolled as bars or cut from strip or plate.
 - 3.1.12 Test for magnetic permeability when specified by customer purchase order when ordering Types 201 and 205.
 - 3.1.13 ~~Special requirements. Choice of testing track from the options listed in Test Methods [A1058](#) when material is ordered to an M suffix (SI units) product standard. If the choice of test track is not specified in the order, then the default ASTM track shall be used as noted in Test Methods [A1058](#)~~
- NOTE 4—A typical ordering description is as follows: 5000 lb (2268 kg) Stainless Steel Bars, Annealed and Centerless Ground, 1½ in. (38.10 mm) Round, 10 to 12 ft (3.05 to 3.66 m) in length, Type 304, ASTM Specification A276 dated _____. End use: machined valve parts.
- 3.1.14 Supplementary requirements, and
 - 3.1.15 Additional requirements.

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[ASTM A276/A276M-15](#)

<https://standards.iteh.ai/catalog/standards/sist/b12d8e8b-c553-4fb4-9346-7fbf85cc1504/astm-a276-a276m-15>

TABLE 1 Chemical Requirements^A

UNS Designation ^B	Type	Composition, %									
		Carbon	Manganese	Phosphorus	Sulfur	Silicon	Chromium	Nickel	Molybdenum	Nitrogen	Other Elements
Austenitic Grades											
N08367	...	0.030	2.00	0.040	0.030	1.00	20.0–22.0	23.5–25.5	6.0–7.0	0.18–0.25	Cu 0.75
N08700	...	0.04	2.00	0.040	0.030	1.00	19.0–23.0	24.0–26.0	4.3–5.0	...	Cu 0.50 Cb 8 × C min 0.40 max
N08800	800	0.10	1.50	0.045	0.015	1.00	19.0–23.0	30.0–35.0	...	...	Fe ^V 39.5 min. Cu 0.75 Al 0.15–0.60 Ti 0.15–0.60
N08810	800H	0.05–0.10	1.50	0.045	0.015	1.00	19.0–23.0	30.0–35.0	...	...	Fe ^V 39.5 min. Cu 0.75 Al 0.15–0.60 Ti 0.15–0.60
N08811	...	0.06–0.10	1.50	0.045	0.015	1.00	19.0–23.0	30.0–35.0	...	...	Fe ^V 39.5 min. Cu 0.75 Al ^K 0.25–0.60 Ti ^K 0.25–0.60
N08904	904L	0.020	2.00	0.045	0.035	1.00	19.0–23.0	23.0–28.0	4.0–5.0	0.10	Cu 1.0–2.0
N08925	...	0.020	1.00	0.045	0.030	0.50	19.0–21.0	24.0–26.0	6.0–7.0	0.10–0.20	Cu 0.80–1.50
N08926	...	0.020	2.00	0.030	0.015	0.50	19.0–21.0	24.0–26.0	6.0–7.0	0.15–0.25	Cu 0.50–1.50
S20100	201	0.15	5.5–7.5	0.060	0.030	1.00	16.0–18.0	3.5–5.5	...	0.25	...
S20161	...	0.15	4.0–6.0	0.045	0.030	3.0–4.0	15.0–18.0	4.0–6.0	...	0.08–0.20	...
S20162	...	0.15	4.0–8.0	0.040	0.040	2.5–4.5	16.5–21.0	6.0–10.0	0.50–2.50	0.05–0.25	...
S20200	202	0.15	7.5–10.0	0.060	0.030	1.00	17.0–19.0	4.0–6.0	...	0.25	...
S20500	205	0.12–0.25	14.0–15.5	0.060	0.030	1.00	16.5–18.0	1.0–1.7	...	0.32–0.40	...
S20910	XM-19	0.06	4.0–6.0	0.045	0.030	1.00	20.5–23.5	11.5–13.5	1.50–3.00	0.20–0.40	Cb 0.10–0.30, V 0.10–0.30
S21800	...	0.10	7.0–9.0	0.060	0.030	3.5–4.5	16.0–18.0	8.0–9.0	...	0.08–0.18	...
S21900	XM-10	0.08	8.0–10.0	0.045	0.030	1.00	19.0–21.5	5.5–7.5	...	0.15–0.40	...
S21904	XM-11	0.04	8.0–10.0	0.045	0.030	1.00	19.0–21.5	5.5–7.5	...	0.15–0.40	...
S24000	XM-29	0.08	11.5–14.5	0.060	0.030	1.00	17.0–19.0	2.3–3.7	...	0.20–0.40	...
S24100	XM-28	0.15	11.0–14.0	0.045	0.030	1.00	16.5–19.0	0.50–2.50	...	0.20–0.45	...
S28200	...	0.15	17.0–19.0	0.045	0.030	1.00	17.0–19.0	...	0.75–1.25	0.40–0.60	Cu 0.75–1.25
S30200	302	0.15	2.00	0.045	0.030	1.00	17.0–19.0	8.0–10.0	...	0.10	...
S30215	302B	0.15	2.00	0.045	0.030	2.00–3.00	17.0–19.0	8.0–10.0	...	0.10	...
S30400	304	0.08	2.00	0.045	0.030	1.00	18.0–20.0	8.0–11.0	...	...	...
S30403	304L ^C	0.030	2.00	0.045	0.030	1.00	18.0–20.0	8.0–12.0	...	...	...
S30451	304N	0.08	2.00	0.045	0.030	1.00	18.0–20.0	8.0–11.0	...	0.10–0.16	...
S30452	XM-21	0.08	2.00	0.045	0.030	1.00	18.0–20.0	8.0–10.0	...	0.16–0.30	...
S30453	304LN	0.030	2.00	0.045	0.030	1.00	18.0–20.0	8.0–11.0	...	0.10–0.16	...
S30454	...	0.03	2.00	0.045	0.030	1.00	18.0–20.0	8.0–11.0	...	0.16–0.30	...
S30500	305	0.12	2.00	0.045	0.030	1.00	17.0–19.0	11.0–13.0	...	...	...
S30800	308	0.08	2.00	0.045	0.030	1.00	19.0–21.0	10.0–12.0	...	...	...
S30815	...	0.05–0.10	0.80	0.040	0.030	1.40–2.00	20.0–22.0	10.0–12.0	...	0.14–0.20	Ce 0.03–0.08
S30900	309	0.20	2.00	0.045	0.030	1.00	22.0–24.0	12.0–15.0	...	...	...
S30908	309S	0.08	2.00	0.045	0.030	1.00	22.0–24.0	12.0–15.0	...	...	...
S30940	309Cb	0.08	2.00	0.045	0.030	1.00	22.0–24.0	12.0–16.0	...	...	Cb 10×C-1.10
S31000	310	0.25	2.00	0.045	0.030	1.50	24.0–26.0	19.0–22.0	...	...	...
S31008	310S	0.08	2.00	0.045	0.030	1.50	24.0–26.0	19.0–22.0	...	...	...
S31040	310Cb	0.08	2.00	0.045	0.030	1.50	24.0–26.0	19.0–22.0	...	...	Cb 10×C-1.10
S31254	...	0.020	1.00	0.030	0.010	0.80	19.5–20.5	17.5–18.5	6.0–6.5	0.18–0.25	Cu 0.50–1.00
S31266	...	0.030	2.00–4.00	0.035	0.020	1.00	23.0–25.0	21.0–24.0	5.2–6.2	0.35–0.60	Cu 1.00–2.50 W 1.50–2.50
S31400	314	0.25	2.00	0.045	0.030	1.50–3.00	23.0–26.0	19.0–22.0	...	...	...
S31600	316	0.08	2.00	0.045	0.030	1.00	16.0–18.0	10.0–14.0	2.00–3.00	...	...
S31603	316L ^C	0.030	2.00	0.045	0.030	1.00	16.0–18.0	10.0–14.0	2.00–3.00	...	...
S31635	316Ti	0.08	2.00	0.045	0.030	1.00	16.0–18.0	10.0–14.0	2.00–3.00	0.10	Ti 5×(C+N)-0.70
S31640	316Cb	0.08	2.00	0.045	0.030	1.00	16.0–18.0	10.0–14.0	2.00–3.00	0.10	Cb 10×C-1.10
S31651	316N	0.08	2.00	0.045	0.030	1.00	16.0–18.0	10.0–14.0	2.00–3.00	0.10–0.16	...
S31653	316LN	0.030	2.00	0.045	0.030	1.00	16.0–18.0	10.0–13.0	2.00–3.00	0.10–0.16	...
S31654	...	0.03	2.00	0.045	0.030	1.00	16.0–18.0	10.0–13.0	2.00–3.00	0.16–0.30	...



TABLE 1 Continued

UNS Designation ^A	Type	Composition, %									
		Carbon	Manganese	Phosphorus	Sulfur	Silicon	Chromium	Nickel	Molybdenum	Nitrogen	Other Elements
S31700	317	0.08	2.00	0.045	0.030	1.00	18.0–20.0	11.0–15.0	3.0–4.0	0.10	...
S31725	...	0.030	2.00	0.045	0.030	1.00	18.0–20.0	13.5–17.5	4.0–5.0	0.20	...
S31726	...	0.030	2.00	0.045	0.030	1.00	17.0–20.0	14.5–17.5	4.0–5.0	0.10–0.20	...
S31727	...	0.030	1.00	0.030	0.030	1.00	17.5–19.0	14.5–16.5	3.8–4.5	0.15–0.21	Cu 2.8–4.0
S31730	...	0.030	2.00	0.040	0.010	1.00	17.0–19.0	15.0–16.5	3.0–4.0	0.045	Cu 4.0–5.0
S32053	...	0.030	1.00	0.030	0.010	1.00	22.0–24.0	24.0–26.0	5.0–6.0	0.17–0.22	...
S32100	321	0.08	2.00	0.045	0.030	1.00	17.0–19.0	9.0–12.0	...	...	Ti 5x(C+N)-0.70 ^D
S32654	...	0.020	2.0–4.0	0.030	0.005	0.50	24.0–25.0	21.0–23.0	7.0–8.0	0.45–0.55	Cu 0.30–0.60
S34565	...	0.030	5.0–7.0	0.030	0.010	1.00	23.0–25.0	16.0–18.0	4.0–5.0	0.40–0.60	Cb 0.10
S34700	347	0.08	2.00	0.045	0.030	1.00	17.0–19.0	9.0–12.0	...	...	Cb 10xC–1.10
S34800	348	0.08	2.00	0.045	0.030	1.00	17.0–19.0	9.0–12.0	...	...	Cb 10xC–1.10, Ta 0.10 Co 0.20
Austenitic-Ferritic Grades											
S31100	XM-26	0.06	1.00	0.045	0.030	1.00	25.0–27.0	6.0–7.0	...	...	Ti 0.25
S31803	...	0.030	2.00	0.030	0.020	1.00	21.0–23.0	4.5–6.5	2.5–3.5	0.08–0.20	...
S32101	...	0.040	4.0–6.0	0.040	0.030	1.00	21.0–22.0	1.35–1.70	0.10–0.80	0.20–0.25	Cu 0.10–0.80
S32202	...	0.030	2.00	0.040	0.010	1.00	21.5–24.0	1.00–2.80	0.45	0.18–0.26	...
S32205	...	0.030	2.00	0.030	0.020	1.00	22.0–23.0	4.5–6.5	3.0–3.5	0.14–0.20	...
S32304	...	0.030	2.50	0.040	0.030	1.00	21.5–24.5	3.0–5.5	0.05–0.60	0.05–0.20	Cu 0.05–0.60
S32506	...	0.030	1.00	0.040	0.015	0.90	24.0–26.0	5.5–7.2	3.0–3.5	0.08–0.20	W 0.05–0.30
S32550	...	0.04	1.50	0.040	0.030	1.0	24.0–27.0	4.5–6.5	2.9–3.9	0.10–0.25	Cu 1.50–2.50
S32750	...	0.030	1.20	0.035	0.020	0.80	24.0–26.0	6.0–8.0	3.0–5.0	0.24–0.32	Cu 0.50
S32760 ^E	...	0.030	1.00	0.030	0.010	1.00	24.0–26.0	6.0–8.0	3.0–4.0	0.20–0.30	Cu 0.50–1.00 W 0.50–1.00
S82441	...	0.030	2.5–4.0	0.035	0.005	0.070	23.0–25.0	3.0–4.5	1.00–2.00	0.20–0.30	Cu 0.10–0.80
Ferritic Grades											
S40500	405	0.08	1.00	0.040	0.030	1.00	11.5–14.5	0.50	...	...	Al 0.10–0.30
S40976	...	0.030	1.00	0.040	0.030	1.00	10.5–11.7	0.75–1.00	...	0.040	Cb 10x(C+N)-0.80
S42900	429	0.12	1.00	0.040	0.030	1.00	14.0–16.0	...	...	...	...
S43000	430	0.12	1.00	0.040	0.030	1.00	16.0–18.0	...	...	...	...
S44400	444	0.025	1.00	0.040	0.030	1.00	17.5–19.5	1.00	1.75–2.50	0.035	Ti+Cb 0.20+4 x (C+N)-0.80
S44600	446	0.20	1.50	0.040	0.030	1.00	23.0–27.0	0.75	...	0.25	...
S44627	XM-27 ^F	0.010 ^G	0.40	0.020	0.020	0.40	25.0–27.5	0.50	0.75–1.50	0.015 ^G	Cu 0.20 Cb 0.05–0.20
S44700	...	0.010	0.30	0.025	0.020	0.20	28.0–30.0	0.15	3.5–4.2	0.020	C+N 0.025 Cu 0.15
S44800	...	0.010	0.30	0.025	0.020	0.20	28.0–30.0	2.00–2.50	3.5–4.2	0.020	C+N 0.025 Cu 0.15
Martensitic Grades											
S40300	403	0.15	1.00	0.040	0.030	0.50	11.5–13.0	...	...	...	...
S41000	410	0.08–0.15	1.00	0.040	0.030	1.00	11.5–13.5	...	...	...	...
S41040	XM-30	0.18	1.00	0.040	0.030	1.00	11.0–13.0	...	...	...	Cb 0.05–0.30
S41400	414	0.15	1.00	0.040	0.030	1.00	11.5–13.5	1.25–2.50	...	...	...
S41425	...	0.05	0.50–1.00	0.020	0.005	0.50	12.0–15.0	4.0–7.0	1.50–2.00	0.06–0.12	Cu 0.30
S41500	^H	0.05	0.50–1.00	0.030	0.030	0.60	11.5–14.0	3.5–5.5	0.50–1.00	...	...
S42000	420	0.15 min	1.00	0.040	0.030	1.00	12.0–14.0	...	...	...	...
S42010	...	0.15–0.30	1.00	0.040	0.030	1.00	13.5–15.0	0.35–0.85	0.40–0.85	...	...
S43100	431	0.20	1.00	0.040	0.030	1.00	15.0–17.0	1.25–2.50	...	...	...
S44002	440A	0.60–0.75	1.00	0.040	0.030	1.00	16.0–18.0	...	0.75	...	...
S44003	440B	0.75–0.95	1.00	0.040	0.030	1.00	16.0–18.0	...	0.75	...	...
S44004	440C	0.95–1.20	1.00	0.040	0.030	1.00	16.0–18.0	...	0.75	...	...

^A Maximum, unless range or minimum is indicated. Where ellipses (...) appear in this table, there is no requirement and the element need not be determined or reported.

^B Designations established in accordance with Practice E527 and SAE J 1086.

^C For some applications, the substitution of Type 304L for Type 304, or Type 316L for Type 316 may be undesirable because of design, fabrication, or service requirements. In such cases, the purchaser should so indicate on the order.

^D Nitrogen content is to be reported for this grade.

^E % Cr + 3.3 x % Mo + 16 x % N ≥ 40.

^F Nickel plus copper shall be 0.50 % max.

^G Product analysis tolerance over the maximum limit for carbon and nitrogen shall be 0.002 %.

^H Wrought version of CA 6NM.

^I Maximum, unless otherwise indicated.

^J Iron shall be determined arithmetically by difference of 100 minus the sum of specified elements.

^K (Al+Ti) 0.85–1.20.

NOTE 4—A typical ordering description is as follows: 5000 lb [2270 kg] Stainless Steel Bars, Annealed and Centerless Ground, 1½ in. [40 mm] Round, 10 to 12 ft [3 to 3.7 m] in length, Type 304, ASTM Specification A276/A276M dated _____. End use: machined valve parts.

4. Manufacture

4.1 Condition:

4.1.1 Bars shall be furnished in one of the following conditions listed in the Mechanical Requirements table:

4.1.1.1 *Condition A*—~~Annealed~~Annealed.

4.1.1.2 *Condition H*—Hardened and tempered at a relatively low ~~temperature~~temperature.

4.1.1.3 *Condition T*—Hardened and tempered at a relatively high ~~temperature~~temperature.

4.1.1.4 *Condition S*—*Strain Hardened*—Relatively light cold ~~work~~work.

4.1.1.5 *Condition B*—Relatively severe cold ~~work~~work.

5. Chemical Composition

5.1 The steel shall conform to the requirements for chemical composition specified in **Table 1**.

5.2 Methods and practices relating to chemical analysis required by this specification shall be in accordance with Test Methods, Practices, and Terminology **A751**.

6. Mechanical Properties Requirements

6.1 The material shall conform to the mechanical test requirements specified in **Table 2**.

6.2 The martensitic grades shall be capable of meeting the hardness requirements after heat treating as specified in **Table 3**.

6.3 Hardness measurements, when required, shall be made at a location midway between the surface and the center of the cross section.

7. Magnetic Permeability

7.1 When required by the purchase order, the magnetic permeability of Types 201 and 205 in the annealed condition shall not exceed 1.2 as tested by a Severn-type indicator.

8. General Requirements

8.1 In addition to the requirements of this specification, all requirements of the current edition of Specification **A484/A484M** shall apply. Failure to comply with the general requirements of Specification **A484/A484M** constitutes nonconformance to this specification.

9. Certification

9.1 Upon request of the purchaser in the contract or order, the producer's certification that the material was manufactured and tested in accordance with this specification, together with a certified report of the test results shall be furnished at the time of the shipment.

10. Keywords

10.1 austenitic stainless steel; austenitic-ferritic duplex stainless steel; ferritic stainless steel; martensitic stainless steel; stainless steel bars; stainless steel shapes



TABLE 2 Mechanical Requirements

Type	Condition	Finish	Diameter or Thickness, in. (mm)[mm]	Tensile Strength, min		Yield Strength, ^A min		Elongation in 2 in. (50 mm) ^B or 4D min %		Reduction of Area, ^C min, %	Tensile, ^D HBW un
				ksi	MPa	ksi	MPa				
Austenitic Grades											
N08367	A	hot-finished or cold-finished	all	95	655	45	310	30	50	...	
N08700	A	hot-finished or cold-finished	all	80	550	35	240	30	50	...	
N08800 800	A	hot-finished or cold-finished	all	75	515	30	205	30	...	192	
N08810 800H	A	hot-finished or cold-finished	all	65	450	25	170	30	...	192	
N08811	A	hot-finished or cold-finished	all	65	450	25	170	30	...	192	
N08904 904L	A	hot-finished or cold-finished	all	71	490	31	220	35	...	...
N08925	A	hot-finished or cold-finished	all	87	600	43	295	40	...	217	
N08926	A	hot-finished or cold-finished	all	94	650	43	295	35	...	256	
201, 202	A	hot-finished or cold-finished	all	75	515	40	275	40	45	...	
S20161	A	hot-finished	all	125	860	50	345	40	40	255	
		cold-finished	all	125	860	50	345	40	40	311	
S20162	A	hot-finished or cold-finished	all	100	690	50	345	345	50	60	
205	A	hot-finished or cold-finished	all	100	690	60	414	40	50	...	
XM-19	A	hot-finished or cold-finished	all	100	690	55	380	35	55	...	
	As hot-rolled	hot-finished or cold-finished	up to 2 (50.8), incl	135	930	105	725	20	50	...	
	As hot-rolled	hot-finished or cold-finished	up to 2 [50.8], incl	135	930	105	725	20	50	...	
			over 2 to 3 (50.8 to 76.2), incl	115	795	75	515	25	50	...	
			over 2 to 3 [50.8 to 76.2], incl	115	795	75	515	25	50	...	
			over 3 to 8 (76.2 to 203.2), incl	100	690	60	415	30	50	...	
			over 3 to 8 [76.2 to 203.2], incl	100	690	60	415	30	50	...	
S21800	A	hot-finished or cold-finished	all	95	655	50	345	35	55	241	
XM-10, XM-11	A	hot-finished or cold-finished	all	90	620	50	345	45	60	...	
XM-29	A	hot-finished or cold-finished	all	100	690	55	380	30	50	...	
XM-28	A	hot-finished or cold-finished	all	100	690	55	380	30	50	...	
S24565	A	hot-finished or cold-finished	all	115	795	60	415	35	40	...	
S28200	A	hot-finished or cold-finished	all	110	760	60	410	35	55	...	
302, 302B, 304, 304LN, 305, 308, 309, 309S, 305, 308, 309, 309S, 309Cb, 310, 310S, 309Cb, 310, 310S, 310Cb, 314, 316, 316LN, 316Cb, 316Ti, 317, 321, 347, 348	A	hot-finished or cold-finished	all	75 ^F	515	30 ^F	205	40 ^G	50	...	
			up to 1/2 (12.70) incl	90	620	45	310	30	40	...	
			up to 1/2 [12.70] incl	90	620	45	310	30	40	...	
			over 1/2 (12.70)	75 ^F	515	30 ^F	205	30	40	...	
			over 1/2 [12.70]	75 ^F	515	30 ^F	205	30	40	...	
304L, 316L	A	hot-finished	all	70	485	25	170	40 ^G	50	...	
-	-	cold-finished	up to 1/2 (12.70) incl	90	620	45	310	30	40	...	
			over 1/2 (12.70)	70	485	25	170	30	40	...	
			up to 1/2 [12.70] incl	90	620	45	310	30	40	...	
			over 1/2 [12.70]	70	485	25	170	30	40	...	
304N, 316N	A	hot-finished or cold-finished	all	80	550	35	240	30	...	...
202, 302, 304, 304N, 316, 316N	B	cold-finished	up to 3/4 (19.05) incl	125	860	100	690	12	35	...	