alform®

HIGH-STRENGTH AND ULTRA-HIGH-STRENGTH THERMOMECHANICALLY ROLLED FINE-GRAINED STEELS

Technical terms of delivery for heavy plates
1 April 2026

greentec steel

PREMIUM QUALITY WITH REDUCED CARBON FOOTPRINT

voestalpine Grobblech GmbH
www.voestalpine.com/grobblech

voestalpine
ONE STEP AHEAD.

These general terms apply to all deliveries of high-strength and ultra-high-strength thermomechanically rolled fine-grained steel – alform® x-treme supplied as heavy plate by companies in the voestalpine Steel Division. Please use the following link to find a list of the companies affiliated with the Steel Division:

www.voestalpine.com/stahl/en/Companies

The names of companies in the voestalpine Steel Division are referred to simply as **voestalpine** in this document.

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INTRODUCTION

voestalpine operates one of Europe's most modern steelmaking facilities in Linz. Each of the modern lines required for the production of high-quality heavy plates is located next to related facilities and is highly integrated into the works.

Our goal is to innovate and go beyond standard steels, to continually offer high-quality products. The most modern manufacturing technologies, continuous quality control systems as well as intense research and development guarantee optimum product quality.

These technical terms of delivery provide information on the ordering and processing of **high-strength and ultra-high-strength thermomechanically rolled fine-grained heavy plates**. Please direct any of your questions to your responsible sales personnel or technical specialist at voestalpine.

Subject to change pursuant to further development.
The current version is available at www.voestalpine.com/alform/en

STEEL GRADES

- High-strength:
  alform plate 620 M
  alform plate 700 M
- Ultra-high-strength:
  alform plate 900 M x-treme
  alform plate 960 M x-treme
  alform plate 1100 M x-treme
  alform plate 1100 MH x-treme
  alform plate 1300 M x-treme

More information you will find in our technical terms of delivery for thermomechanically rolled fine-grained steels.

OUR PATH TO A GREENER FUTURE

PREMIUM PRODUCTS IN THE GREENTEC STEEL EDITION

With greentec steel, voestalpine is pursuing an ambitious step-by-step plan in the long-term decarbonization of steel production. The declared objective is to achieve carbon-neutral production by 2050, and the initial steps have already been taken. Process-optimized production operations already prevent up to 10% of the direct CO_2 emissions at the Linz site. The material and processing properties of the steel are not affected in any way in this production route. Each voestalpine heavy plate product is available in premium quality in the greentec steel Edition with a reduced carbon footprint and unique benefits.

greentec steel

Premium quality with reduced carbon footprint

Heavy plates (excl. heads and clad plates) – greentec steel Edition
Max. carbon footprint 2.21 kg CO_2e per kg of steel [1)]

[1)] per EN 15804+A2 (EPD methodology) cradle to gate

QUALITY MANAGEMENT

voestalpine is a quality leader in a challenging market environment, and it has become the company philosophy to meet the justified expectations and requirements of both the market and the customer with respect to every possible aspect of quality. Comprehensive quality management is a central component of the company strategy. In addition to this comprehensive quality management system, production monitoring using the most modern testing systems is also a necessity. These systems are inspected on a regular basis by external and independent agencies.

COMPREHENSIVE QUALITY MANAGEMENT

The voestalpine companies meet the highest standards of quality management and are certified pursuant to **Lloyd's Register QA Ltd.** in the United Kingdom as well as **ISO 9001** and **IATF 16949**.

This has been confirmed by numerous customer awards presented for best quality performance. Focus has been continually on this pursued path as well as on consistent implementation of all quality standards.

STATE-OF-THE-ART TESTING TECHNIQUES

voestalpine uses the most modern testing techniques and methods, laboratory information and management systems equipped with state-of-the-art technologies. The technical expertise of our testing and inspection laboratories is certified in accordance with international standards, e.g. **ISO/IEC 17025** and **ISO/IEC 17020**, and is accredited by Austrian national standards.

alform® x-treme

The high-strength steel grades alform plate 620 M, alform plate 700 M and the ultra-high-strength steel grades alform plate 900 M x-treme, alform plate 960 M x-treme, alform plate 1100 M x-treme, alform plate 1100 MH x-treme and alform plate 1300 M x-treme are thermomechanically rolled fine-grain structural steels with excellent weldability and good bending properties. They are predominantly used for mobile cranes, concrete pump cars, steel construction industry and architecture, penstocks and vehicles.

The technical terms of delivery apply for plate thicknesses as shown in the steel grade overview.

STEEL GRADE OVERVIEW

Table 1: Steel grades

Steel grade	Plate thickness mm
alform plate 620 M	8 - 50
alform plate 700 M	6 - 60
alform plate 900 M x-treme	6 - 30
alform plate 960 M x-treme	6 - 30
alform plate 1100 M x-treme	6 - 30
alform plate 1100 MH x-treme	8 - 25
alform plate 1300 M x-treme	6 - 30

PRODUCTION PROCESS

alform® steels are produced via the LD-route and are fully killed. The alloying concept provides very low carbon contents and low carbon equivalents, which aims in very good weldability. The high strength provide special advantages in areas, where weight savings are of great importance.

CHEMICAL COMPOSITION

HEAT ANALYSIS

GUARANTEED VALUES

Table 2: Chemical composition

Steel grade	Mass [%]												
	C max.	Si max.	Mn max.	P max.	S max.	$Al_{tot.}$ min.	Cr max.	Mo max.	Ni max.	V[1] max.	Nb[1] max.	Ti[1] max.	B max.
alform plate 620 M	0.12	0.50	2.00	0.020	0.008	0.020	1.50	0.50	2.00	0.12	0.06	0.05	0.0050
alform plate 700 M	0.12	0.60	2.10	0.020	0.008	0.020	1.50	0.50	2.00	0.12	0.06	0.05	0.0050
alform plate 900 M x-treme	0.12	0.60	1.70	0.020	0.008	0.020	1.50	0.70	2.00	0.12	0.06	0.05	0.0050
alform plate 960 M x-treme	0.12	0.60	1.70	0.020	0.008	0.020	1.50	0.70	2.00	0.12	0.06	0.05	0.0050
alform plate 1100 M x-treme	0.18	0.60	2.10	0.020	0.008	0.020	1.50	0.80	2.00	0.12	0.06	0.05	0.0050
alform plate 1100 MH x-treme	0.18	0.60	2.10	0.020	0.008	0.020	1.50	0.80	2.00	0.12	0.06	0.05	0.0050
alform plate 1300 M x-treme	0.26	0.60	2.10	0.020	0.008	0.020	1.50	0.80	2.00	0.12	0.06	0.05	0.0050

[1] The total of Nb, V und Ti must not exceed 0.22 %.

The chemical composition of alform plate 700 M is according to EN 10149-2 for steel grade S700MC. The chemical composition of alform plate 900 M x-treme is according to EN 10025-6 for steel grade S890QL. The chemical composition of alform plate 960 M x-treme is according to EN 10025-6 for steel grade S960QL.

CARBON EQUIVALENT

STANDARD VALUES FOR CARBON CONTENT AND CARBON EQUIVALENT

Table 3: Carbon content and equivalent

Steel grade	Plate thickness mm	C %	CEV[1] %	CET[2] %	PCM[3] %
alform plate 620 M	15	0.06	0.51	0.30	0.21
	40	0.06	0.52	0.31	0.21
alform plate 700 M	15	0.04	0.43	0.26	0.18
	40	0.06	0.47	0.26	0.19
alform plate 900 M x-treme	12	0.08	0.56	0.31	0.24
	20	0.08	0.60	0.33	0.25
alform plate 960 M x-treme	12	0.09	0.58	0.32	0.26
	20	0.08	0.60	0.33	0.25
alform plate 1100 M x-treme	12	0.16	0.57	0.37	0.30
alform plate 1100 MH x-treme	20	0.13	0.70	0.40	0.31
alform plate 1300 M x-treme	12	0.23	0.64	0.44	0.36

[1] CEV = C + Mn/6 + (Cr + Mo + V)/5 + (Ni + Cu)/15, according to IIW
[2] CET = C + (Mn + Mo)/10 + (Cr + Cu)/20 + Ni/40, according to SEW 088
[3] PCM = C + Si/30 + (Mn + Cu + Cr)/20 + Ni/60 + Mo/15 + V/10 + 5*B, according to API 5L

AS-DELIVERED CONDITION

Plates of alform plate 620 M and alform plate 700 M are delivered in a thermomechanical rolled condition with accelerated cooling. Exceptionally conventional quenching and tempering is permitted. Plates made of alform plate 900 M x-treme and alform plate 960 M x-treme are thermomechanically rolled, accelerated cooled and tempered at roughly 580 °C. Plates made of alform 1100 M x-treme, alform 1100 MH x-treme, and alform 1300 M x-treme are thermomechanically rolled, accelerated cooled and tempered at approximately 200 °C.

MECHANICAL PROPERTIES

MECHANICAL PROPERTIES IN AS-DELIVERED CONDITION

Table 4: Mechanical properties

Stahlsorte	Plate thickness range mm	Yield strength $R_{p0.2}$ min. MPa	Tensile strength[1] R_m MPa	Fracture elongation[1] $L_0 = 5.65 \sqrt{S_0}$ min. %	Notch impact energy[2] min. J	
					längs	quer
alform plate 620 M	8 ≤ 50	620	700 - 890	15	40	30
alform plate 700 M	6 ≤ 15	700	770 - 1,050	10	40	30
	> 15 ≤ 50	680	770 - 1,050	12	40	30
	> 50 ≤ 60	650	770 - 1,050	12	30	27
alform plate 900 M x-treme	6 ≤ 30	900	940 - 1,100	11	30	27
alform plate 960 M x-treme	6 ≤ 30	960	980 - 1,150	10	30	27
alform plate 1100 M x-treme	6 ≤ 16	1,100	1,250 - 1,550	8	27	27
	> 16 ≤ 30	1,100	1,250 - 1,550	8	27	27
alform plate 1100 MH x-treme	8 ≤ 20	1,100	1,160 - 1,550	7	27	27
	> 20 ≤ 25	1,080	1,100 - 1,550	7	27	27
alform plate 1300 M x-treme	6 ≤ 16	1,300	1,400 - 1,700	8	27	27
	> 16 ≤ 30	1,300	1,400 - 1,700	8	27	27

[1] Tensile test in accordance with EN ISO 6892-1 on transverse samples.
[2] Notch impact bending test in accordance with EN ISO 148-1 on Charpy-V longitudinal samples at –40 °C or –20 °C for alform plate 1300 M x-treme >16 mm.
The mean value from 3 individual samples must reach the specified requirements. No individual value may be below 70 % of the guaranteed mean value. For thicknesses < 12 mm, subsize-specimen with dimensions of 10 x 7.5 mm or 10 x 5 mm are tested. The guaranteed value is reduced in proportion to the sample cross-section.

The mechanical properties of alform plate 620 M are according to EN 10025-6 for steel grade S620QL. The mechanical properties of alform plate 900 M x-treme are according to EN 10025-6 for steel grade S890QL. The mechanical properties of alform plate 960 M x-treme are according to EN 10025-6 for steel grade S960QL.

QUALITY TEST

TEST UNIT

Unless otherwise agreed upon ordering, 40 t of a heat or a smaller portion is used as test unit for the mechanical properties. The test unit must consist of plates with the same steel grade and the same thickness range for the yield strength according to table 4.

SCOPE OF TESTING

Quality testing includes the tensile test. The Charpy V-notch impact test is performed at –40 °C on longitudinal specimens (or –20 °C for alform plate 1300 M x-treme >16 mm). A different sample position or testing temperature must be agreed on request. The heat analysis is provided as proof of the chemical composition.

TOLERANCES AND SURFACE FINISH

Unless otherwise agreed, tolerances pursuant to EN 10029 (thickness tolerance according to class A, flatness tolerance according to class N), and surface finish according to EN 10163-A1 are valid.

MARKING

In general, marking consists of:
» voestalpine symbol
» Steel grade designation
» Heat number
» Plate number

MATERIAL TESTING CERTIFICATE

Type of certificate accordig to EN 10204 must be agreed upon ordering.

PROCESSING GUIDELINES

COLD FORMING

alform® steels provide good cold forming properties. On condition that cut edges have been ground very smooth and that the bending process is done skillfully 90°-bending without cracks is guaranteed for die-radii according to table 5.

RECOMMENDED EDGING RADII

Steel grade	Edging radii Ri min. at 90° edging (s = plate thickness)
alform plate 620 M	3 s
alform plate 700 M	3 s
alform plate 900 M x-treme	4 s
alform plate 960 M x-treme	4 s
alform plate 1100 M x-treme	5 s
alform plate 1100 MH x-treme	5 s
alform plate 1300 M x-treme	5 s

Table 5: Recommended edging radii

HOT FORMING AND HEAT TREATMENT

These steels are provided in a thermomechanically rolled condition and are intended for cold forming. Hot forming and stress-relief annealing are permitted up to 520 °C. However, for the steel grades alform plate 1100 M x-treme and alform plate 1300 M x-treme, tempering is only permitted up to a maximum of 200 °C. For optimal toughness properties in the welded joint, we recommend a stress-relief annealing temperature up to 520 °C max. Heat input causes the tensile strength of alform plate 620 M, alform plate 700 M, and alform plate 1100 MH to decrease when compared to the non-tempered as-delivered condition or when tempered at 200 °C max., but it remains within the guaranteed limits shown in Table 4. Normalizing and quenching and tempering destroy the microstructure of TM steel and its properties; therefore, these processes must not be performed.

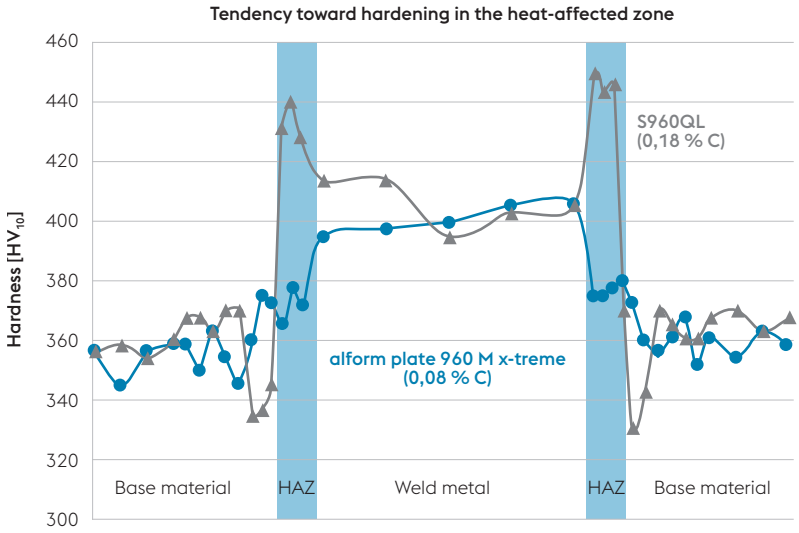
WELDING

GENERAL

The thermomechanical manufacturing process for alform® plate grades makes it possible to achieve high yield strengths with significantly lower alloy content and reduced carbon equivalents. In particular, the low carbon content significantly reduces hardening in the heat-affected zone (HAZ) and thus increases the cold cracking resistance.

Figure 1 shows the hardness curve across the welded joints of an alform plate 960 M x-treme and a typical quenched and tempered steel S960QL with significantly higher carbon content. The welds were created under the same conditions. Hardening in the HAZ and thus the risk of cold cracking is significantly lower in alform plate 960 M x-treme than in S960QL. This is why alform® plate (x-treme) grades exhibit such excellent weldability.

COMPARISON OF HARDENING IN THE HAZ OF alform plate 960 M x-treme AND THAT OF S960QL



Welding conditions

Filler metal:	Union X96
Welding techniques:	MAG-2 wire
Heat input:	0.7 kJ/mm
Preheating/interpass temperature:	60–125 °C
Weld seam preparation:	V-type weld
Plate thickness:	10 mm
Resulting $t_{8/5}$:	approx. 6 seconds

Figure 1: Comparison of hardness increase

In spite of these advantages, increased care is required during welding because of the high yield strength of the steel grade. Compliance with the generally valid and accepted rules for the welding of low-alloy, high-strength, fine-grain structural steels is mandatory pursuant to EN 1011-2 and the STAHL-EISEN material data sheet SEW 088.

WELD SEAM PREPARATION

Weld preparation can be in the form of machining or thermal cutting.

Figure 2 shows the recommended preheating temperatures for thermal cutting for the available ranges of plate thicknesses. The fusion faces must be dry and free of impurities before welding begins.

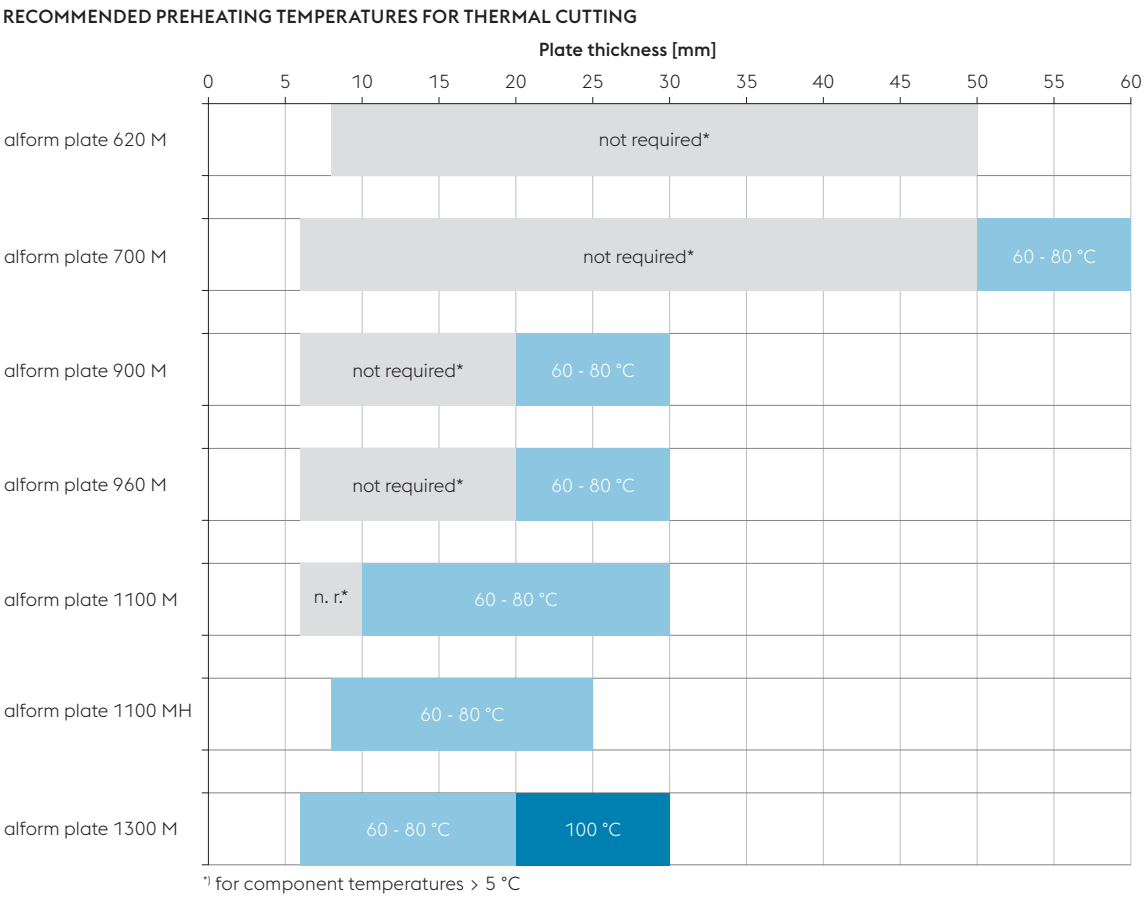


Figure 2: Recommended preheating temperatures for thermal cutting

WELDING TECHNIQUES

All conventional welding techniques, both automatic and manual, can be used. Inert-gas-shielded arc welding (MAG, MIG) with solid wire has the advantage of very low hydrogen content in the weld metal and is particularly suitable with regard to resistance against cold cracking.

WELDING CONSUMABLES

The welding consumables should be selected so that the properties of the weld metal are matched to the mechanical-technological properties of the base material. The recommended welding consumables are listed in Table 6. The hydrogen content HD should not exceed 5 ml per 100 grams of weld metal. This is guaranteed by using solid wires in inert gas shielded arc welding. Basic electrodes or welding powder for submerged arc welding must be subjected to secondary drying. Compliance with the instructions of the manufacturer with regard to drying and hydrogen adjustment is mandatory.

RECOMMENDED WELDING CONSUMABLES FOR alform plate 620 / 700 M AND alform plate 900 / 960 / 1100 M / 1100 MH / 1300 M x-treme

Base material	Welding process, welding filler metals				
	Manual electric welding (SMAW) -111	WIG (GTAW) -141	MAG (GMAW) -135	MAG cored wire (FCAW) -136 / -138	UP (SAW) -12
alform plate 620 M	BÖHLER Fox EV 75 (AWS A5.5: E10018-GH4R)	BÖHLER NiCrMo 2,5-IG (AWS A5.28: ER110S-G)	BÖHLER NiCrMo 2,5-IG (AWS A5.28: ER110S-G)	BÖHLER Kb 85 T-FD (AWS A5.36: E110T5-M21A8-K4-H4)	Union S 3 NiMoCr + UV421TT (AWS A5.23: F11A8-EG-F6)
	BÖHLER Fox EV 85 (AWS A5.5: E11018-GH4R)				
	Phoenix SH Ni 2 K 100 (AWS A5.5: E11018-G)		Union MoNi (AWS A5.28: ER90S-G)	BÖHLER Ti 80 T-FD (AWS A5.36: E111T1-M21A8-GH4)	Subarc T85 + UV421TT (AWS A5.23: F11A10-ECF5-F5)
alform plate 700 M	BÖHLER FOX EV 85 (AWS A5.5: E11018-GH4R)	BÖHLER NiCrMo 2,5-IG (AWS A5.28: ER110S-G)	BÖHLER alform 700-IG (AWS A5.28: ER110S-G)	BÖHLER alform 700-MC (AWS A5.36: E110T15-M21A8-K4-H4)	Union S 3 NiMoCr + UV422TT LH (AWS A5.23: F12A10-EF5-F5-H4)
	Phoenix SH Ni 2 K 100 (AWS A5.5: E11018-G)		BÖHLER NiCrMo 2,5-IG (AWS A5.28: ER110S-G)	BÖHLER Kb 85 T-FD (AWS A5.36: E110T5-M21A8-K4H4)	Subarc T85 + UV421TT (AWS A5.23: F11A10-ECF5-F5)
			Union X 85 (AWS A5.28: ER110S-G)		
alform plate 900 M x-treme	Phoenix SH Ni 2 K 130 (AWS A5.5: E12018-G)	---	BÖHLER alform 900-IG (AWS A5.28: ER120SG)	BÖHLER alform 900-MC (AWS A5.36: E120C-GH4)	Subarc T95 + UV 422 TT LH (AWS A5.23: F13A5-ECF5-F5)
			Union X 90 (AWS A5.28: ER120SG)		
			BÖHLER X 90-IG (AWS A5.28: ER120SG)		
alform plate 960 M x-treme	Phoenix SH Ni 2 K 130 (AWS A5.5: E12018-G)	---	BÖHLER alform 960-IG (AWS A5.28: ER120SG)	BÖHLER alform 960-MC (AWS A5.36: E120C-GH4)	---
			Union X 96 (AWS A5.28: ER120SG)		
alform plate 1100 M x-treme	Phoenix SH Ni 2 K 130 (AWS A5.5: E12018-G)	---	BÖHLER alform 960-IG (AWS A5.28: ER120SG)	BÖHLER alform 960-MC (AWS A5.36: E120C-GH4)	---
			Union X 96 (AWS A5.28: ER120SG)		
alform plate 1100 MH x-treme	---	---	BÖHLER alform 1100-IG non-classified	---	---
alform plate 1300 M x-treme	Phoenix SH Ni 2 K 130 (AWS A5.5: E12018-G)	---	BÖHLER alform 960-IG (AWS A5.28: ER120SG)	BÖHLER alform 960-MC (AWS A5.36: E120C-GH4)	---
			Union X 96 (AWS A5.28: ER120SG)		

Table 6: Recommended welding consumables

The alform® welding system (e.g. alform plate 700 M in combination with BÖHLER alform 700-IG) is the world's first custom-matched system of steels and welding consumables for high-strength and ultra-high-strength welded structures.
www.voestalpine.com/alform/en/Why-alform-R/alform-R-welding-system

You will find further information and alternative welding consumables at www.voestalpine.com/welding. Our experienced welding experts will be happy to consult you.

HEAT CONTROL DURING WELDING

Table 7 contains recommendations for heat control during the welding of alform® plate grades. Welding parameters should be set to achieve $t_{8/5}$ times of 3 to 15 seconds in an effort to ensure high strength and toughness properties. Longer cooling times are permissible under certain conditions (such as overmatching) and must be verified, e.g. by means of testing in accordance with EN 15614-1. The alform® welding system also allows significant widening of the welding ranges as a result of higher heat input and thus longer $t_{8/5}$ times. This in turn increases process reliability, e.g. by reducing the risk of incomplete joint penetration, and reduces production costs based on an increased deposition rate.

RECOMMENDED HEAT CONTROL FOR THE ARC WELDING OF alform plate 620 / 720 M AND alform plate 900 / 960 / 1100 M / 1100 MH / 1300 M x-treme

Base material	Recommended preheating [°C]	Interpass temperature [°C]	$t_{8/5}$ range [s]
alform plate 620 M	Ambient temperature (> 5) - 150[1)]	≤ 150	3 - 15
alform plate 700 M			
alform plate 900 M x-treme			
alform plate 960 M x-treme			
alform plate 1100 M x-treme			
alform plate 1100 MH x-treme			
alform plate 1300 M x-treme			

Table 7: Recommended heat control during electric arc welding

[1)] When component temperatures fall below +5 °C or components are subject to higher humidity, the pre-drying of fusion faces immediately prior to welding is recommended (60 °C with electric heating mat or 80 °C with acetylene, propane or natural gas burner).

Preheating and associated costs can be reduced as a result of the low carbon content and the low hardening tendency of alform® plate grades. This is illustrated by the example in Figure 3, which shows the minimum preheating temperatures calculated according to EN 1011-2 (C.3 Method B) for alform plate 700 M and a commercially available S690QL1 in sheet thicknesses ranging between 20 and 50 mm, with otherwise identical welding parameters and conditions. Due to its significantly higher carbon content, the minimum preheating temperature of S690QL1 is more than 60 °C higher in both welding processes than for alform plate 700 M. Submerged arc welding is usually preferred for thicker plates because of the high deposition rate. The higher heat input associated with this welding technique reduces the minimum preheating temperature, in the case of alform plate 700 M (solid blue line) to such an extent that preheating can be foregone.

COMPARISON OF CALCULATED MINIMUM PREHEATING TEMPERATURES ACCORDING TO EN 10-11-2 (METHOD B)
for alform plate 700 M AND S690QL1 with MAG (ES = 1 kJ/mm, k = 0.8) and UP (Es = 3 kJ/mm, k = 0.95), each with HD = 3 ml/100 g SG

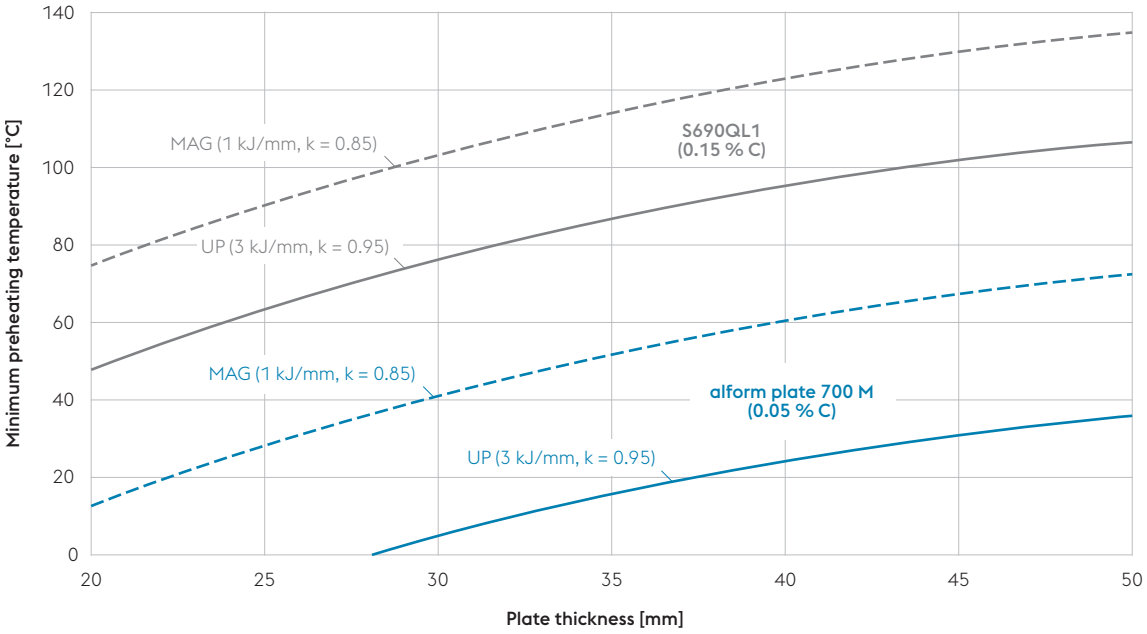
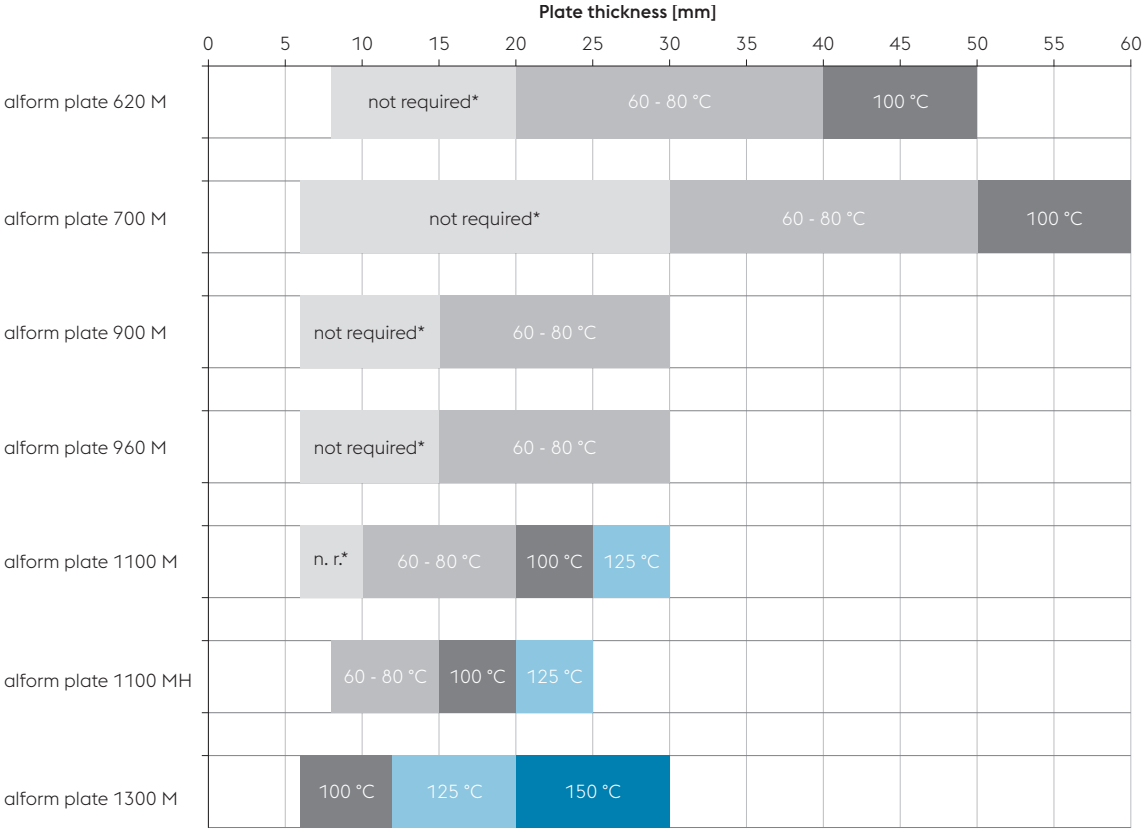


Figure 3: Comparison of calculated minimum preheating temperatures

If welding is to be carried out with low heat input, the recommended preheating temperatures in Figure 4 are shown for MAG welding with 1 kJ/mm as an example, depending on the range of available plate thicknesses.

RECOMMENDED PREHEATING TEMPERATURES
in the example of MAG welds with Es = 1 kJ/mm (k = 0.85) and HD = 3 ml/100 g SG



*) for component temperatures > 5 °C and dry, clean faces

Figure 4: Recommended preheating temperatures for welding

The necessity of preheating increases along with a higher carbon equivalent (CET), larger plate thickness, higher hydrogen content in the weld metal and lower heat input. Determination of each case separately pursuant to EN 1011-2 is recommended for this reason. Should the carbon equivalent CET of the base material not exceed that of the weld metal by at least 0.03 %, the CET of the weld metal must be applied in calculating the preheating temperature and must be increased by 0.03 %.

The preheating temperatures recommended here apply to butt welds. For single fillet welds, lower preheating temperatures can be assumed because of the lower residual stress under normal circumstances and assuming sufficient experience of the welder.

Where special strength and toughness is required of the weld metal, an interpass temperature of 150 °C should not be exceeded.

High notch impact energy in the welded joint is achieved by multi-pass welding where the number of passes can be determined according to the following approximation:

$$\text{Minimum number of layers} \sim \frac{\text{Plate thickness (mm)}}{3}$$

WELDING CALCULATOR APP

With the Welding Calculator App from voestalpine (available for Android and iOS), you can now easily calculate cooling times $t_{8/5}$ and preheating temperatures pursuant to EN 1011-2 and based on your individual specifications. You can also optimize your welding activities with retroactive calculations. Based on climatic conditions, the app also recommends parameters for edge drying and features a module for calculating the required volume of welding consumables.

You will find more detailed information about the Welding Calculator App at
www.voestalpine.com/alform/en/Service/Welding-Calculator

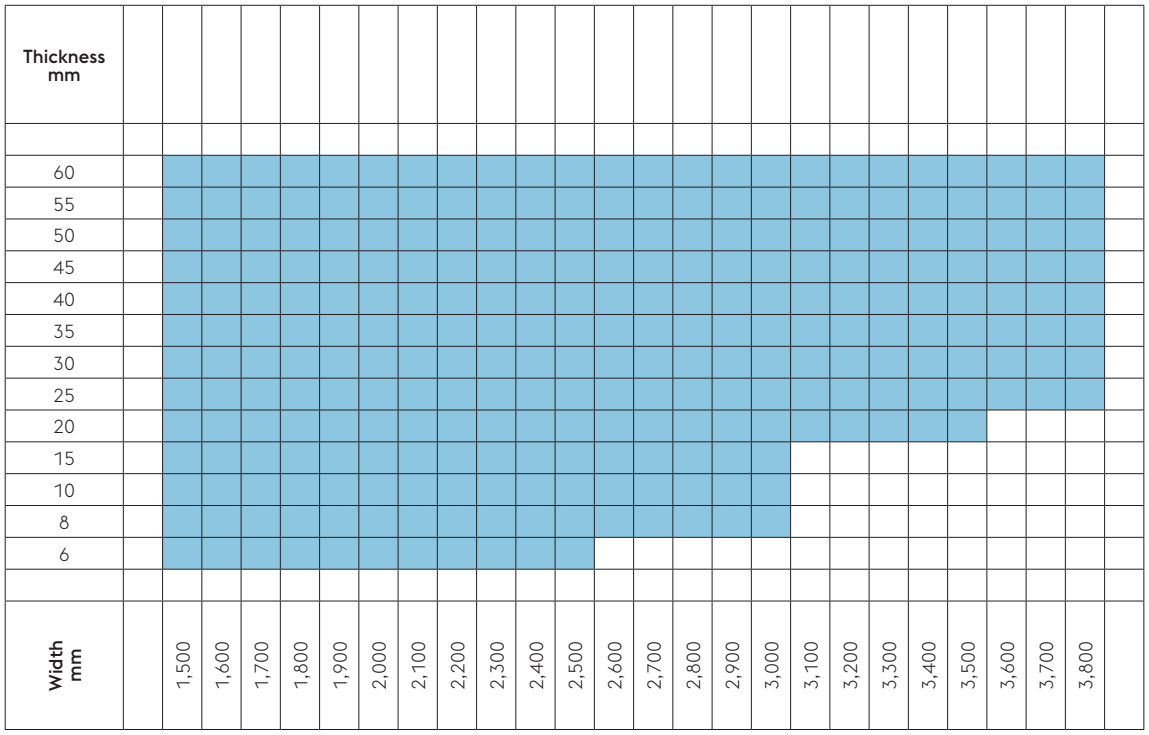
DELIVERABLE DIMENSIONS alform plate 620 M

Thickness mm																									
50																									
45																									
40																									
35																									
30																									
25																									
20																									
15																									
10																									
8																									
Width mm		1,500	1,600	1,700	1,800	1,900	2,000	2,100	2,200	2,300	2,400	2,500	2,600	2,700	2,800	2,900	3,000	3,100	3,200	3,300	3,400	3,500	3,600	3,700	3,800	

Maximum width: max. width of 3,750 mm for weight per piece > 15 t
Maximum length: 18,700 mm

Different dimensions on request.

DELIVERABLE DIMENSIONS alform plate 700 M



Maximum width: max. width of 3,750 mm for weight per piece > 15 t
Maximum length: 18,700 mm

Different dimensions on request.

DELIVERABLE DIMENSIONS alform plate 900 M x-treme

Thickness mm													
30													
25													
20													
15													
10													
8													
6													
Width mm		1,500	1,600	1,700	1,800	1,900	2,000	2,100	2,200	2,300	2,400	2,500	

Maximum length: 16,000 mm

Different dimensions on request.

DELIVERABLE DIMENSIONS alform plate 960 M x-treme

Thickness mm													
30													
25													
20													
15													
10													
8													
6													
Width mm		1,500	1,600	1,700	1,800	1,900	2,000	2,100	2,200	2,300	2,400	2,500	

Maximum length: 16,000 mm

Different dimensions on request.

DELIVERABLE DIMENSIONS alform plate 1100 M x-treme

Thickness mm													
30													
25													
20													
15													
10													
8													
6													
Width mm		1,500	1,600	1,700	1,800	1,900	2,000	2,100	2,200	2,300	2,400	2,500	

Maximum length: 16,000 mm

Different dimensions on request.

DELIVERABLE DIMENSIONS alform plate 1100 MH x-treme

Thickness mm													
25		■	■	■	■	■	■	■	■	■	■	■	
20		■	■	■	■	■	■	■	■	■	■	■	
15		■	■	■	■	■	■						
10		■	■	■	■	■	■						
8		■	■	■	■	■	■						
Width mm		1,500	1,600	1,700	1,800	1,900	2,000	2,100	2,200	2,300	2,400	2,500	

Maximum length: 16,000 mm

Different dimensions on request.

DELIVERABLE DIMENSIONS alform plate 1300 M x-treme

Thickness mm													
30													
25													
20													
15													
10													
8													
6													
Width mm		1,500	1,600	1,700	1,800	1,900	2,000	2,100	2,200	2,300	2,400	2,500	

Maximum length: 16,000 mm

Different dimensions on request.

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voestalpine
ONE STEP AHEAD.