



# Test Certificate

12400 Highway 43 North, Axis, Alabama 36505, US

**WARNING:** This product can expose you to chemicals including nickel and nickel compounds, which are known to the State of California to cause cancer. For more information go to [www.P65Warnings.ca.gov](http://www.P65Warnings.ca.gov).

Form TC1: Revision 5: Date 22 Aug 2022

<b>Customer:</b>	<b>Customer P.O.No.:</b> HOU-18654	<b>Mill Order No.:</b> 41-758400-02	<b>Shipping Manifest:</b> AR411425
<b>Product Description:</b> ABS (2024) GR A / GR B ASTM A36(19)/A709(21)36/ASME SA36(23) ASTM A283-C(24)/ASME SA283-C(23) 0.80-0.90% MN, 0.10% MAX S	<b>Ship Date:</b> 18 Nov 24	<b>Cert No:</b> 081201741	<b>Cert Date:</b> 18 Nov 24 (Page 1 of 1)
<b>Size:</b> 0.250 X 120.0 X 480.0 (IN)			

Heat Id	Piece Id	Tested Thickness	Tst Loc	Tensiles:			Charpy Impact Tests			Tst Dir	Tst Temp	Tst Siz (mm)	BDWTT Temp %Shr
				YS (KSI)	UTS (KSI)	%RA	Elong % 2in	Elong % 8in	Tst Dir				
M4K645	B05	0.256 (DISCRT)	L	62	69	34							
W4K645	B03	0.255 (DISCRT)	L	62	71	40							
W4K645	B04	0.196 (DISCRT)	L	64	72	27							

Heat Id	Chemical Analysis												ORGN			
	C	Mn	P	S	Si	Total	Sol	Al	Cu	Ni	Cr	Mo		V	Ti	Cev
M4K645-B05	.06	.83	.010	.002	.26	.024	.021	.29	.10	.10	.10	.03	.004	.016	.19	USA
W4K645	.06	.83	.008	.002	.28	.025	.020	.29	.10	.10	.10	.03	.005	.021	.20	USA

KILLED STEEL  
 MERCURY IS NOT A METALLURGICAL COMPONENT OF THE STEEL AND NO MERCURY WAS INTENTIONALLY ADDED DURING THE MANUFACTURE OF THIS PRODUCT.  
 WE HEREBY CERTIFY THAT MATERIAL DESCRIBED HEREIN HAS BEEN MADE BY SSAB AMERICAS BY THE ELECTRIC FURNACE / STRAND CAST PROCESS AND TESTED IN ACCORDANCE WITH THE REQUIREMENTS OF THE AMERICAN BUREAU OF SHIPPING RULES WITH SATISFACTORY RESULTS.  
 CEV = C + MN/6  
 KILLED STEEL, PRODUCED TO A FINE GRAIN PRACTICE  
 MTR EN 10204:2004 INSPECTION CERTIFICATE 3.1 COMPLIANT  
 100% MELTED, Poured, AND ROLLED IN THE USA  
 NO WELD REPAIR HAS BEEN PERFORMED ON THIS MATERIAL.  
 PRODUCTS SHIPPED:  
 M4K645 B05 PCES: 15, LBS: 61260  
 W4K645 B01 PCES: 1, LBS: 4084  
 W4K645 B02 PCES: 3, LBS: 12252

<b>Customer Part #:</b>		<b>WE HEREBY CERTIFY THAT THIS MATERIAL WAS TESTED IN ACCORDANCE WITH, AND MEETS THE REQUIREMENTS OF, THE APPROPRIATE SPECIFICATION</b>
		<b>Jason Thomas</b> Director, Technical Services