



Industrial de Valvulas, S.A. de C.V.  
 Av. de La Industria Lote 16 Fracc. Industrial El Trebol  
 Tepetzotlan, Estado de Mexico C.P. 54600

(Numero) Number **V09R308**  
 (Fecha) Date **16/12/2009**

## QUALITY ASSURANCE CERTIFICATE OF COMPLIANCE

(ACCORDING TO EN10204 TYPE 3.1)  
**ASEGURAMIENTO DE CALIDAD CERTIFICADO DE CUMPLIMIENTO**

WE CERTIFY THAT THE PRODUCT LISTED BELOW WAS DESIGNED, MANUFACTURED AND TESTED ACCORDING TO OUR QUALITY SYSTEM AND REQUIREMENTS GIVEN IN ONE OR MORE OF THE FOLLOWING STANDARDS LAST EDITION:

(CERTIFICAMOS QUE EL PRODUCTO LISTADO ABAJO FUE DISEÑADO, FABRICADO Y PRABADO DE ACUERDO CON NUESTRO SISTEMA DE CALIDAD Y CON REQUISITOS ESTABLECIDOS EN UNO O MAS DE LOS SIGUIENTES ESTANDARES ULTIMA EDICIÓN.)

- |             |   |             |   |
|-------------|---|-------------|---|
| API 598     | - VALVE INSPECTION AND TESTING                      | API 6D      | - PIPELINE VALVES - GATE, PLUG, BALL AND CHECK                                    |
| API 599     | - METAL PLUG VALVES - FLANGED, THREADED AND WELDING | API 600     | - STEEL GATE VALVES, FLANGED AND WELDING ENDS                                     |
| ANSI B16-10 | - FACE TO FACE AND END TO END DIMENSIONS OF VALVES  | ANSI B16-11 | - FORGED FITTINGS, SOCKET - WELDING AND THREADED                                  |
| ANSI B16-34 | - VALVES - FLANGED, THREADED AND WELDING ENDS       | API 602     | - COMPACT STEEL GATE VALVES - FLANGED, THREADED, WELDING AND EXTENDED - BODY ENDS |
| MSS-SP61    | - PRESSURE TESTING OF STEEL VALVES                  |             |   |

**Part No.** AR201A08MAB830000M  
 (Código) **20" Fig. 5341 F UT WCB, API TRIM No.8 830000M**  
**Description** CAST STEEL SWING CHECK VALVE 150 PSI  
 Descripción (VALVULA RETENCIÓN TIPO COLUMPIO DE ACERO FUNDIDO 150 PSI)

VALVE WITH LOW EMISSION CONTROL (VALVULA SUMINISTRADA CON CONTROL DE EMISIONES FUGITIVAS A 50 PPM'S MAX )

PRESSURE TEST (PRUEBAS DE PRESION)	SHELL (CASCO)	BACK (SEAT)	SIDE (LADO)	
			1	2
HYDROSTATIC (PSI) (HIDROSTATICA)	450	N A	315	N A
PNEUMATIC (PSI) (NEUMATICA)			N A	N A

**MECHANICAL TESTS (PROP. MECANICAS)**

**CHEMICAL COMPOSITION (%)      COMPOSICIÓN QUIMICA (%)**

ITEM (PARTE)	HEAT No. (COLADA)	MATERIAL (ASTM)	CHEMICAL COMPOSITION (%)										TENS KPSI CVN@	YIELD KPSI 1ST	ELG %	RED %	BHN AVG
			C	Mn	P	S	Si	Ni	Cr	Mo	Cu	V					
<b>BODY</b> CUERPO	HL1910	ASTM A-216/WCB	0.180	0.820	0.023	0.020	0.380	0.040	0.090	0.050	0.050	0.001	72.35	40.60	29	48	150
<b>COVER</b> TAPA	HL1902	ASTM A-216/WCB	Normalized to (Normalizado a) 930 °C		Temper to (Temple a) 650 °C		Cooled in air. (Cooled in air. (Enfr)										
<b>WEDGE</b> DISCO	HL1872	ASTM A-216/WCB	0.220	0.760	0.018	0.014	0.380	0.040	0.040	0.050	0.040	0.001	76.12	42.63	24	45	156
			Normalized to (Normalizado a) 920 °C		Temper to (Temple a) 650 °C		Cooled in air. (Cooled in air. (Enfr)										
			0.210	0.860	0.021	0.017	0.440	0.110	0.030	0.050	0.060	0.001	75.98	42.05	24	45	155
			Normalized to (Normalizado a) 920 °C		Temper to (Temple a) 650 °C		Cooled in air. (Cooled in air. (Enfr)										

FAC10-21 REV "3"

CERTIFICADO POR: ASEGURAMIENTO DE CALIDAD      CERTIFIED BY: QUALITY ASSURANCE

**JESSICA GARCIA**