INSPECTION CERTIFICATE

According to EN10204 3.1

CERTIFICATE No. 20222076

DATE 04-11-2022

PURCHASE ORDER DESCRIPTION		
CUSTOMER	**CUSTOMER ORDER**	**VINCO ORDER**
661-VCC B.V.	9307513	3020220019.1

VALVE DESCRIPTION		
VALVE CODE		
CF11F100F1F1FFF31 - CF DN100 FB FLG CL150 RF CF8M/ CF8M/ CG-RPTFE		
VALVE CLASS	**QUANTITY**	**BATCH NUMBER**
150	4	2019LF450228001 to 004

MATERIAL CERTIFICATE REPORT

VALVE PART	TYPE OF MATERIAL	CERTIFICATE No.	HEAT No.	VINCO BATCH No.
BODY (CORPO)	A351 CF8M	E708/15-16/3	EBOR	2016LC200097
BODY (CORPO)	A351 CF8M	E708/15-16/3	EYTP	2016LC200104
END (TERMINAL)	A351 CF8M	E708/15-16/7	EYKW	2016LC200137
END (TERMINAL)	A351 CF8M	E708/15-16/7	EYLR	2016LC200139
END (TERMINAL)	A351 CF8M	E708/15-16/7	EYKU	2016LC200142
BALL (ESFERA)	A351 CF8M	BT-20180574	1806025	2018LC430002
STEM (EIXO)	A479 316/L	1778681	900313	2018LC400007

TESTING REPORT

TEST	STANDARD	TEST PRESSURE [bar]	DURATION [s]	RESULT
HYDROSTATIC SHELL TEST [1.5x]	ASME B16.34 / API 598 / EN12266	29	60	SATISFACTORY
HYDROSTATIC SEAT TEST [1.1x]	ASME B16.34 / API 598 / EN12266	21	60	SATISFACTORY
PNEUMATIC SHELL TEST	ASME B16.34 / API 598 / EN12266	6	60	SATISFACTORY
PNEUMATIC SEAT TEST	ASME B16.34 / API 598 / EN12266	6	60	SATISFACTORY

NON DESTRUTIVE REPORT

PMI	PT	MT	UT	RT
-	-	-	-	-

CERTIFICATION NOTES

Valves are in compliance with the requirements of the order

Valves are in compliance with Pressure Equipment Directive (PED) 2014/68/EU

Valves are in compliance with ATEX Directive 2014/34/EU (Group II 2 GD)

Valves are fire safe certified in compliance with ISO 10497 and API 607

QUALITY CONTROL	
VINCO QUALITY CONTROL	**CUSTOMER / THIRD PARTY**
LUIS ESTEVES	
VINCO VALVES QUALITY DEPARTMENT	

Vinco Válvulas S.A.
Rua do Progresso Lote 15
4760-841 Vilarinho das Cambas - PORTUGAL

Tel. +351 252 303 210 - Fax. +351 252 303 219
www.vincovalves.com
comercial@vincovalves.com

Certificado Nr. E708/15-16/3

Colata / Heat Number: EBOR
Material: ASTM A351-14 GR.CF8M
Dimensions: DN 100 FB CL.150 - CORPO
Int. Code: 2016LC200097

CHEMICAL ANALYSIS

Colata	C	Mn	Si	P	Cr	Ni	Mo	S
	0.028	0.970	0.770	0.027	19.030	10.210	2.340	0.007

MECHANICAL PROPERTIES

Rp02% N/MM2	R N/MM2	A%	Z%	Impact test		HARDNESS BHN
				Temp. test ºC	RES	
288.01	533.16	36.00	—	20	176.00	155

Quality Dep

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e-mail: vinco@vincovalves.com

Certificado Nr. E708/15-16/3

Colata / Heat Number: EYTP
Material: ASTM A351-14 GR.CF8M
Dimensions: DN 100 FB CL.150 - CORPO
Int. Code: 2016LC200104

CHEMICAL ANALYSIS

Colata	C	Mn	Si	P	Cr	Ni	Mo	S
	0.042	0.840	1.110	0.028	18.878	9.720	2.320	0.010

MECHANICAL PROPERTIES

Rp02% N/MM2	R N/MM2	A%	Z%	Impact test		HARDNESS BHN
				Temp. test ºC	RES	
318.59	559.16	42.00	—	20	187.33	154

Quality Dep

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Certificado Nr. E708/15-16/7

Colata / Heat Number: EYKW
Material: ASTM A351-14 GR.CF8M
Dimensions: DN 100 FB CL.150 - TERMINAL
Int. Code: 2016LC200137

CHEMICAL ANALYSIS

Colata	C	Mn	Si	P	Cr	Ni	Mo	S
	0.045	0.840	1.000	0.026	18.619	9.910	2.320	0.003

MECHANICAL PROPERTIES

Rp02% N/MM2	R N/MM2	A%	Z%	Impact test		HARDNESS BHN
				Temp. test ºC	RES	
316.37	541.42	40.8	—	20	100.67 J	152-154

Quality Dep

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Certificado Nr. E708/15-16/7

Colata / Heat Number: EYLR
Material: ASTM A351-14 GR.CF8M
Dimensions: DN 100 FB CL.150 - TERMINAL
Int. Code: 2016LC200139

CHEMICAL ANALYSIS

Colata	C	Mn	Si	P	Cr	Ni	Mo	S
	0.041	0.840	0.990	0.028	18.697	9.990	2.290	0.007

MECHANICAL PROPERTIES

Rp02% N/MM2	R N/MM2	A%	Z%	Impact test		HARDNESS BHN
				Temp. test ºC	RES	
319.63	554.46	40.8	—	20	133.33 J	153-154

Quality Dep

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e-mail: vinco@vincovalves.com

Certificado Nr. E708/15-16/7

Colata / Heat Number: ETKU
Material: ASTM A351-14 GR.CF8M
Dimensions: DN 100 FB CL.150 - TERMINAL
Int. Code: **2016LC200142**

CHEMICAL ANALYSIS

Colata	C	Mn	Si	P	Cr	Ni	Mo	S
	0.043	0.840	1.060	0.027	18.863	9.810	2.340	0.009

MECHANICAL PROPERTIES

Rp02% N/MM2	R N/MM2	A%	Z%	Impact test		HARDNESS BHN
				Temp. test ºC	RES	
321.84	562.41	42.0	—	20	110.67 J	152-153

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e-mail: vinco@vincovalves.com

BALL CERTIFICATE
According EN10204-3.1

Certificate nrº : BT-20180574		
Order Nº: 20180574	**Material**: CF8M	
Heat Treatment: Solution annealed quenched 1080ºC Heating and water Cool 1.5 hours		

Heat Nº	Item
1806025	158X100

MECHANICAL PROPERTIES

Heat Nº	**Yield Point N/mm^2**	**Tensile Strength N/mm^2**	**Elongation %**	**Int. Code**
1806025	**251.0**	**513.00**	**50.00**	**2018LC430002**

CHEMICAL ANALYSIS %

Heat Nº	**C**	**Si**	**Mn**	**P**	**S**	**Ni**	**Cr**	**Mo**
1806025	0.0423	0.5491	0.9175	0.0325	0.0067	9.1481	18.4003	2.1935

Quality Dep.

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MOD036.00

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Inspection Certificate

EN 10204 Type 3.1
ASTM A182 F316-F316L

DOCUMENTATION	
Certificate Number:	**1778681**
Heat Number:	**900313**
Vinco Batch Number:	**2018LC400007**
Dimension:	**38 MM**

HEAT TREATMENT
Annealed (min. 1040ºC) and quenched in water (max. 260ºC)

CHEMICAL ANALYSIS [%]								
C	**Mn**	**P**	**S**	**Si**	**Ni**	**Cr**	**Mo**	**N**
0,03 max.	**2 max.**	**0,045 max.**	**0,03 max.**	**1 max.**	**10 14**	**16 18**	**2 3**	**0,1 max.**
0,019	1,39	0,026	0,025	0,459	10,05	16,7	2,03	0,072

MECHANICAL PROPERTIES				
Tensile Strength [MPa]	**Yield Strength [MPa]**	**A [%]**	**Z [%]**	**Hardness [HB]**
515 min.	**205 min.**	**30 min.**	**50 min.**	**233 max.**
617	284	49,8	72,7	147

CORROSION TEST
Intergranular corrosion test in accordance with practice E of standard ASTM A262

CRACKING RESISTANCE
Material in compliance with requirements of ANSI/NACE MR0175 and ISO 15156

This document is a copy of the original raw material certificate. Este documento é cópia integral do certificado original da matéria-prima.

IC.005.R01

Rua do Progresso, Lote 15
4760-841 Vilarinho das Cambas
V. N. de Famalicão - Portugal
MOD.036.01

Vinco Válvulas, S.A.
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vinco@vincovalves.com

Appareil non électrique destiné à être utilisé en atmosphères explosibles
Non electrical equipment intended for use in potentially explosive atmospheres
Aparato destinado a ser utilizado en atmósferas explosivas

Directive 2014/34/UE
Directive 2014/34/EU / Directiva 2014/34/UE

ACCUSÉ DE RECEPTION D'UN DOSSIER TECHNIQUE
ACKNOWLEDGE RECEIPT OF TECHNICAL DOCUMENTATION
ACUSADO DE RECEPCIÓN DEL EXPEDIENTE TECNICO

Appareil / Equipment / Aparato :

Soft or Metal seated ball valves

Type(s)/ Type(s) / Tipo(s) : **CF**

Marquage/ Marking / Marcado : Ex II 2 GD

Dépositaire / Applicant / Depositario : **VINCO VÁLVULAS, S.A.**
Rua do Progresso, Lote 15-18

P- 4760-841 Vilarinho das Cambas

L'INERIS, organisme notifié et identifié sous le numéro 0080, conformément aux articles 17 et 21 de la Directive du Conseil 2014/34/UE du 26 février 2014, accuse réception du dossier conformément à la procédure décrite au chapitre 3, article 13 1) b) ii) de la Directive.

La documentation technique référencée : Dossier 9 - Serie CF - November 2016

est consignée sous le numéro d'enregistrement :

n° INERIS-EQEN 032089/17.

Dans le cadre de cet enregistrement, l'INERIS n'a pas examiné le contenu de la documentation technique.

Date de fin de validité :
2026.05.18

INERIS, notified body and identified under number 0080, in accordance with articles 17 and 21 of Council Directive 2014/34/EU of the 26 february 2014, acknowledges receipt of file according to the procedure described chapiter 3, article 13 1) b) ii) of the Directive.

The technical documentation referenced : Dossier 9 - Serie CF - November 2016

is consigned under the reference :

no INERIS-EQEN 032089/17.

Within the scope of the recording, INERIS did not examine the contain of the technical documentation.

Validity completion date :
2026.05.18

El INERIS, organismo notificado y identificado bajo el numero 0080, conforme con los artículos 17 y 21 de la Directiva 2014/34/UE de 26 de febrero 2014, acusa recepción del expediente de acuerdo con el procedimiento descrito en el capítulo 3, artículo 13 1) b) ii) de la Directiva.

La documentación técnica referenciada : Dossier 9 - Serie CF - November 2016

se consigna bajo el número de referencia :

n°INERIS-EQEN 032089/17.

Bajo este registro, INERIS no ha examinado el contenido de la documentación tecnica.

Fecha final de caducidad :
2026.05.18

Verneuil-en-Halatte, le 2016.05.18

ATMOSPHERES EXPLOSIVES ORGANISME NOTIFIE INERIS NOTIFIED BODY EXPLOSIVE ATMOSPHERES

Le Directeur Général de l'INERIS,
Par délégation,

The Chief Executive Officer of INERIS,
By delegation,

Thierry HOUEIX
Délégué Certification ATEX
Ex Certification Officer

El Director General del INERIS,
Por delegación,

IM-1423AB - Mise en application : 20/04/2016

Parc Technologique Alata BP 2 F-60550 Verneuil-en-Halatte
tél +33(0)3 44 55 66 77 fax +33(0)3 44 55 66 99 internet www.ineris.fr
Institut national de l'environnement industriel et des risques
Etablissement public à caractère industriel et commercial - RCS Compiègne B 381 984 924 - Siret 381 984 921 00019 - APE 7120B - TVA Intracom FR 73 381 984 921

SGS Portugal, S.A.
Industrial Services
Pólo Tecnológico de Lisboa
R. Cupertino de Miranda, Lt 6, Piso 0 e 1
1600-546 Lisboa - Portugal
T. (351) 21 710 42 00
F. (351) 21 715 75 26

Full Quality Assurance

According to Directive 2014/68/EU

IPAC acreditação
A0022
ISO/IEC 17021-1
Sistemas de Gestão

Certificate of Conformity

Certificate Nº: ***PTC20.09585.5120***

Date: ***2020.12.04***

Name and Address of the Manufacturer: ***VINCO Válvulas***
Rua do Progresso, lote 15
4706-841 Vilarinho das Cambas
Portugal

SGS Portugal SA as a notified body for the scope of Pressure Equipment Directive 2014/68/EU, certifies that the capabilities shown by the manufacturer and their quality system are in accordance with the demands of the pressure equipment directive stated, according module H.

CE 1155

Assessed According to Directive 2014/68/EU: **Module H**

Inspection Report Nº: ***PTR20.09812.5120***

Scope: ***Design, Manufacturing and Final Inspection and Testing of Ball Valves***

Manufacturing Plant: ***Rua do Progresso, lote 15***
Vilarinho das Cambas, Portugal

Valid Until: ***2023.12.10***

SOCIEDADE GERAL DE SUPERINTENDÊNCIAS SGS Felgueiras

Carlos Felgueiras
Technical Responsible

EC DECLARATION OF CONFORMITY
DECLARAÇÃO DE CONFORMIDADE CE

Issued in accordance with the
Emitida em conformidade com a

PRESSURE EQUIPMENT DIRECTIVE (PED) 2014/68/EU
DIRETIVA (PED) 2014/68/EU

We hereby declare that in compliance with the above Directive the products supplied by VINCO are manufactured in accordance with conformity assessment module H with inspection report nº PTC20.09585.5120.
Vimos por este meio declarar que os equipamentos mencionados abaixo estão em conformidade com a diretiva supra citada e foram fabricados de acordo com o módulo de conformidade H com o número de relatório PTC20.09585.5120.

Product Description: Ball Valves
Descrição do produto: Válvula de Esfera

TYPE: CF11F100F1F1FFF31
TIPO: CF11F100F1F1FFF31

CATEGORY: III
CATEGORIA: III

TYPE OF FLUID: Group 1 & 2
TIPO DE FLUIDO: Grupo 1 e 2

SIZES: DN 32 - 1¼'' and above
TAMANHOS: DN 32 - 1¼" and above

BATCH NUMBER: 2019LF450228001 to 004
NÚMERO LOTE: 2019LF450228001 to 004

Applied standards or technical rules:
Normas ou regulamentos aplicados:
API 6D; ASME B16.34; EN 12266-1

Final assessment performed by VINCO Válvulas, S.A. is monitored by the Notified Body nº 1155, SGS Portugal, S.A., sited at Rua Cupertino Miranda, Pólo Tecnológico de Lisboa, Lote 6 Piso 0 e 1, 1600-513, Lisboa, Portugal.

A verificação final realizada internamente pela Vinco Válvulas, S.A. é supervisionada pelo Organismo Notificado nº 1155, SGS Portugal, S.A., com sede na Rua Cupertino Miranda, Pólo Tecnológico de Lisboa, Lote 6 Piso 0 e 1, 1600-513, Lisboa, Portugal.

VINCO VALVES
VINCO VÁLVULAS S.A.
QUALITY DEPARTMENT

Vânia Silva

Fire-Safe Test Certificate

Certificate n.º PTC20.00470.5123

Job	***J20.0015.IND.POR***
Manufacturer	***VINCO Válvulas, S.A.***
Test Place	***Rua do Progresso, Lote 15, Vilarinho das Cambas***
Test Date	***07/01/2020***
Standard(s) Used	***ISO 10497: 2010 and API 607 6th Edition (Set 2010)***
Type	***Floating Ball Valve***
DN	***50***
Class	***150***
Valve Form	***3 pieces***
Reference Nº	***XX1F050XXXXFF3***
Material	***Body/End: ASTM A351 CF8M*** ***Ball: ASTM A351 CF8M*** ***Seats: CRPTFE*** ***Stem: ASTM A479 316/L***
Drawings	***FL013.R00***
Fire Safe Test Report n.º	***FST13/2019***

All the following values were determined and recorded together with temperatures, times and pressures on fire safe test report

Result of Tests ***Satisfactory***

It was performed by Vinco Válvulas, S.A. the following test:

1- Through seat leakage during burn period

2 - Through-seat leakage after cool-down period

3 - External leakage during burn and cool-down period

4 - External leakage after operational test period

5 - Through-seat leakage at low pressure

6 - External leakage at high test pressure to the fully open position

7 - Through seat leakage during burn period

8 -Visual inspection

This is to certify that the fire test has performed by VINCO Válvulas, S.A., under our witness as above, and the results are SATISFIED with the requirements of ISO 10497:2010 and API 607 6th Edition (Set 2010) for the above product, so SGS PORTUGAL, S.A. hereby confirm the qualification as follows:
DN: 100 and below
CLASS RATING: 150; 300

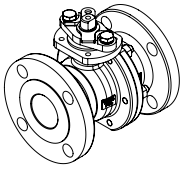
Date: ***10/01/2020***

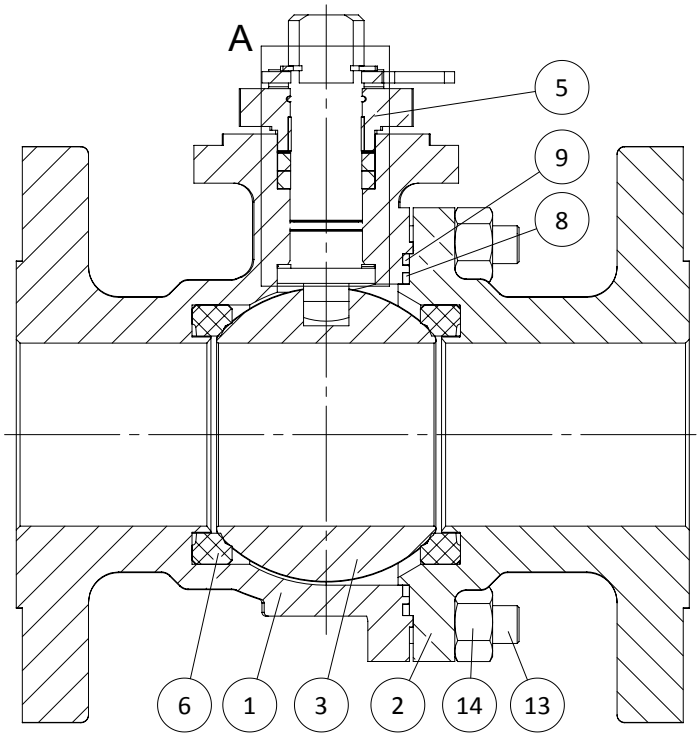
SOCIEDADE GERAL DE SUPERINTENDÊNCIAS SGS Felgueiras

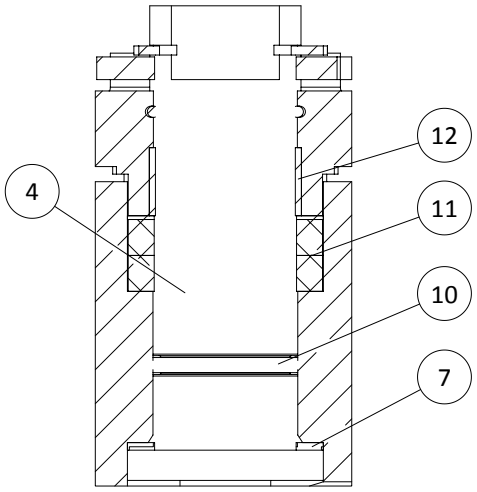
Carlos Felgueiras
Technical Responsible

VINCO VALVES

FLOATING BALL VALVE DESIGN
FL013.R00







DETAIL A
SCALE 1 : 1

Part number	Description	Material
1	Body	A351 CF8M
2	Closure	A351 CF8M
3	Ball	A351 CF8M
4	Stem	A479 316/L
5	Gland Packing	A351 CF8M
6	Seat	CG-RPTFE
7	Stem Thrust Seal	CG+PEEK
8	1st Body Seal	CG-RPTFE
9	2st Body Seal	GRAPHITE
10	Stem O'ring	FKM
11	Stem Packing Set	GRAPHITE
12	Stem Bearing	PTFE
13	Stud	A320 L7M
14	Nut	A194 7