Certificate								
	Quality management system for Manufacturer of Materials acc. to Directive 2014/68/EU							
Certificate no.:	01 202 711/Q-02 0003							
Name and address of the certificate holder:	Gräf Verbindungsteile GmbH Dieselstr. 26 54634 Bitburg Germany Herewith we certify that the material manufacturer has established and applies a Quality Management System.							
	The system was audited according to the European Directive 2014/68/EU, Annex I, Par. 4.3, with regard to the materials as listed in the scope of approval.							
Test basis:	QM System acc. to EN 764-5, article 4.2 and AD 2000-Merkblatt W0							
Audit report no.:	01 202 711/Q-02 0003							
Scope:	Production of fasteners, see annex to certificate							
Manufacturing plant:	Gräf Verbindungsteile GmbH Dieselstr. 26 54634 Bitburg Germany							
Validity:	This certificate is valid from 2021-08-19 to 2024-05-28. Initial issuance: 2002							
Cologne, 2021-08-19	DiplIng. (FH) Vera Ruff 0035 0 <i>votified</i> 80							

TÜV Rheinland Industrie Service GmbH Notified Body for Pressure Equipment, ID-No. 0035 Am Grauen Stein, D-51105 Cologne

E-108a



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	ScopeDirective 2014/68/EUcording toAnnex I §4.3				EN 764-	4				AD 2000- erkblatt W0		FPC, Regulation (EU) No. 305/2011(System 2+		
	Manufacturer					Work			Natio	onality	Date	Pa	ige No	
Compa	ny Name: Gräf	f Verbindungsteile	GmbH										1	TÜV Rheinland
	Dieselstrasse 26				54634 Bitb	urg, Dieselstr	aße 26		Ger	man	16.06.2021			Industrie Service
Location	n: D-54	4634 Bitburg									Rev.:9	of :	4	GmbH
Cur -		als-term als-No.	Material Specification	Delivery Cond.	Article Type of Product		ensions			eight ax	Technical Specification			Remarks
						Thick-	Q	Ø			Requirement	ts		
						ness mm	m	m	1=	=t /	Technical			
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			· · · · · · · · · · · · · · · · · ·	notondo	rda (hEN) and	Europoa	n Ann	roval	for	Mator	ials (FAM)	acc I	Diractiva	2014/68/EU
The use material	of the materials appraisal. With	s according to Dire that the manufact	nonized Europea ctive 2014/68/EU is bou uring reliability for equi ed for the use of mater	nd to the pub valent materi	plication of Harmo al grades accordi	nized Europea	n Standa	ards or	to the	e qualific	cation by a Euro	opean m	aterial appro	val or to the particular
The use material	of the materials appraisal. With spectively the P	s according to Dire that the manufactu ED must be observ	ctive 2014/68/EU is bou iring reliability for equi ed for the use of mater	nd to the puk valent materi ial grades lis	olication of Harmo al grades accordii ted in column 2 to	nized Europea	n Standa	ards or	to the	e qualific	cation by a Euro ME) is proved.	opean m The requ	aterial appro	val or to the particular
The use material	of the materials appraisal. With spectively the P	s according to Dire that the manufact	ctive 2014/68/EU is bou uring reliability for equi	nd to the pub valent materi	plication of Harmo al grades accordi	nized Europea	n Standa	ards or	to the	e qualific	cation by a Euro	opean m The requ	aterial appro	val or to the particular
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The use material	of the materials appraisal. With spectively the Pr stainle carbo Carbon/au special n special n	s according to Dire that the manufacture ED must be observer ess steel on steel ustenic steel materials = solution annea	Etive 2014/68/EU is boun uring reliability for equi- ed for the use of matern EN 10269 EN 10272 EN 10269 EN 10272 EN 10269 EN 10272 EN 10269 EN 10272	nd to the pub valent materi ial grades liss AT N,QT AT AT	fasteners fasteners fasteners fasteners	nized Europea ng to other star 4.	n Standa ndards (1 I tempe	200	to the	e qualific	EN ISO 898	6 3 = PMA	aterial appro irements an	in pressure equipmen
The use material code res	of the materials appraisal. With spectively the Pr stainle carbo Carbon/au special n <u>s</u> +AT +AR	s according to Dire that the manufacture ED must be observed ass steel an steel astenic steel materials = solution annea = as rolled	Etive 2014/68/EU is bou ring reliability for equired for the use of matern EN 10269 EN 10272 EN 10269 EN 10272 EN 10269 EN 10272 EN 10269 EN 10272 EN 10269 EN 10272 Aled	nd to the pub valent materi ial grades liss AT N,QT AT AT	fasteners fasteners fasteners fasteners fasteners	nized Europea ng to other star 4.	n Standa ndards (1 I tempe	200	to the	e qualific	EN ISO 898	6 3 = PMA	aterial appro irements an	val or to the particular d limits of the applicabl
The use material code res	of the materials appraisal. With spectively the Pr stainle carbo Carbon/au special n special n	s according to Dire that the manufactu <u>ED must be observ</u> ess steel n steel ustenic steel materials = solution annea = as rolled = thermo mecha	Etive 2014/68/EU is bou ring reliability for equired for the use of matern EN 10269 EN 10272 EN 10269 EN 10272 EN 10269 EN 10272 EN 10269 EN 10272 EN 10269 EN 10272 Aled	nd to the pub valent materi ial grades liss AT N,QT AT AT	fasteners fasteners fasteners fasteners fasteners fasteners fasteners fasteners	nized Europea ng to other star 4.	n Standa ndards (1 I tempe	200	to the	e qualific	EN ISO 898	6 3 = PMA	aterial appro irements an	in pressure equipmer



Annex to Certificate No. : 01 202 711/Q-02 0003



aco	Scope Directive 2014/68/EU according to Annex I §4.3				EN 764-4							AD 2000- lerkblatt W0	FPC, Regulation (EU) No. 305/2011(System 2+)		
Manufacturer					Work					Natio y		Date	Page No		
Comp	any Name: Grä	if Verbindungsteile	GmbH										2	TÜV Rheinland	
	Die		54634 Bitburg	, Diesels	straß	e 1+5+	10	Gerr	man	16.06.2021		Industrie Service			
Locati				99996 Menteroo	9996 Menteroda, Holzthalebenerstr. 30						Rev.:9	of: 4	GmbH		
Mate		ials-term ials-No.	Material Specification	Delivery Cond.	Article Type of Product		Dime	nsions	I		eight nax	Technical Specification	s	Remarks	
						Thic		Ç	Ø			Requirement	s		
						nes mr		m	m		=t / =kg	Technical Regulations			
						from	Up	from	Up	₩	res				
							to		to		ult				
1		2 ording to the A	3	4	5	6a	6b	7a	7b	8a	8b	9		10	
materia	al appraisal. Witl	h that the manufactu	R 2014/68/EU is bound t Iring reliability for equi ed for the use of mater	valent mater	ial grades accordir	ng to othe	ean S er sta	tandard ndards	ls or to (e.g. BS	the qu S, AFN	ualifica IOR, A	ition by a Europe SME) is proved. 1	an material approva	al or to the particular Id limits of the applicabl	
materia	al appraisal. Witl espectively the F	h that the manufactu	rring reliability for equi ed for the use of mater EN 10269	valent mater	ial grades accordir	ng to othe	ean S er sta	tandard ndards	ls or to (e.g. BS	the qu S, AFN	IOR, A	SME) is proved. 1 AD2000 W7	he requirements an	al or to the particular Id limits of the applicable	
materia	al appraisal. Witl espectively the F carbo	h that the manufactu PED must be observ	iring reliability for equi ed for the use of mater	valent mater ial grades lis	ial grades accordir sted in column 2 to	ng to othe	ean S er sta	tandards	(e.g. B\$	the qu S, AFN	IOR, A	SME) is proved. 1	he requirements an	al or to the particular Id limits of the applicabl	
materia	al appraisal. Witl espectively the F carbo stainle	h that the manufactu PED must be observ	EN 10269 EN 10269 EN 10272	valent mater ial grades lis N, QT	ial grades accordir ted in column 2 to fasteners	ng to othe	ean S er star	tandards	ls or to (e.g. BS	the qu S, AFN	ualifica	SME) is proved. 1 AD2000 W7 EN ISO 898 AD2000 W2	The requirements and	al or to the particular Id limits of the applicable	
materia	al appraisal. With espectively the F carbo stainle carbon	h that the manufactu PED must be observ on steel	EN 10269 EN 10269 EN 10272 EN 10269 EN 10272 EN 10272 EN 10272 EN 10272	AT	ial grades accordir ted in column 2 to fasteners fasteners	ng to othe	ean S er sta	ndards	(e.g. B\$	the qu S, AFN	IOR, A	AD2000 W7 EN ISO 898 AD2000 W2 EN ISO 350	The requirements and	ad limits of the applicable	

Annex to Certificate No. : 01 202 711/Q-02 0003



ac	ScopeDirective 2014/68/EUaccording toAnnex I §4.3			EN 764-4							AD 2000- erkblatt W0	FPC, Regulation (EU) No. 305/2011(System 2+)			
		Manufactu	rer			Work				Natio	nality	Date	Pag	ge No	
Comp	oany Name: Grä	if Verbindungsteile	GmbH											3	TÜV Rheinland
	Dieselstrasse 26				54634 Bitburg,	Diesels	traße	1 + 5 +	· 10	Ger	man	16.06.2021			Industrie Service
Locat	ion: D-5	4634 Bitburg			99996 Menterod	a, Holz	thale	penerstr	r. 30			Rev.:9	of :	4	GmbH
		ials-term	Material	Delivery	Article		Dime	ensions		We	ight	Technical			Remarks
Cur -		ials-No.	Specification	Cond.	Type of Product						nax	Specification			
						Thic		Q	ð			Requirement	s		
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								mm		2=kg		Regulations	;		
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1		2	3	4	5	6a	6b	7a	7b	8a	8b	9			10
			national standard												
code		PED must be observ ainless steel	ed for the use of materi ASTM A193/ ASME SA193	AT,N,QT	bolts	4.						ASTM A193 ASME SA19			
	carbon/sta	ainless steel	ASTM A194/	AT,N,QT	nuts							ASTM A194	/ а		
	stainle	ess steel	ASME SA194 ASTM A276/	АТ	fasteners							ASME SA19 ASTM A276			
	Stairing		ASME SA276		lasteners							ASME SA27	-		
	stainle	ess steel	ASTM A479/	AT	fasteners							ASTM A479	/ а		
			ASME SA479	AT ALL	£			1	200			ASME SA47			
	nickel and	nickel alloys	ASTM B637/ ASME SB637	AT,AH	fasteners							ASTM B637 ASME SB63			
	titatium and	titanium alloys	ASTM B348/	S	fasteners							ASTM B348	-		
			ASME SB348									ASME SB34			
		materials	ASTM A479/	AT	fasteners							ASTM A479	-		
	dupiex/si	uperduplex	ASME SA479									ASME SA47	9		
	carbo			NOT	_							ASTM A320	/		
		on steel	ASTM A320/ ASME SA320	N,QT	fasteners							ASME SA32			
Resul		= solution annea	ASME SA320	N,QT	+NT = nc	ormalize						ASME SA32		or the use	in pressure equipment
<u>Resul</u>			ASME SA320 led	N,QI	+NT = nc +QT = qu	ormalize lenched	and					ASME SA32		or the use ective 2014	in pressure equipment /68/EU neccessary

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	ScopeDirective 2014/68/EUaccording toAnnex I §4.3				EN 764-4							AD 2000- erkblatt W0	FPC, Regulation (EU) No. 305/2011(System 2+)		
	Manufacturer					Work						Date	P	age No	
Company Name: Gräf Verbindungsteile GmbH Dieselstrasse 26					54634 Bitburg, Dieselstraße 26					German		16.06.2021		4	TÜV Rheinland Industrie Service
Locat	ion: D-5	4634 Bitburg										Rev.:9	of :	4	GmbH
Cur -		als-term ials-No.	Material Specification	Delivery Cond.	Article Type of Product			ensions			eight nax	Technical Specification			Remarks
						Thio		Ç	Ø			Requirement	ts		
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1		2	3	4	5	6a	6b	7a	7b	8a	8b	9			10
	carbo	on steel	ASTM F467	N,QT	nuts							ASTM F467	7 a	3	
			ring reliability for equived for the use of materi				er sta	ndards	(e.g. BS	S, AFN	IOR, AS	ME) is proved. ⁻	The req	uirements and	l limits of the applicable
	carbo	on steel	ASTM F468	N,QT	bolts							ASTM F468	3а	1	
	stainle	ess steel	ASTM F593	AT	bolts							ASTM F593	3а	1	
	stainle	ess steel	ASTM F594	AT	nuts			1	200			ASTM F594	1 a	a	
		ess steel	ASTM B408/ ASME SB408	AT	fasteners							ASTM B408 ASME SB40	8		
		ess steel nickel alloys	ASTM A453/ ASME SA453 ASTM B446/ ASME SB446	AT S,AT,AH	fasteners fasteners							ASTM A453 ASME SA45 ASTM B446 ASME SB44	53 5/ a		
Result	+AR +M +N	= solution anneal = as rolled = thermo mechar = normalized or r = hardened/aged	nical treated		+QT = qu +S = so	ormalize uenched oft anne ress reli	l and aled					a =			n pressure equipment 68/EU neccessary