

RECOMMENDED SPARES LIST

CUSTOMER NAME		ALSTOM POWER GENERATION AG	VENDOR CONTRACT N°	WH/00026	DATE	29-Mar-07
PROJECT NAME		D81-4500058139	DOCUMENT N°	RSL CW3265001	AFTERMARKET REF	WB/07/011/RSL17
CUSTOMER PO N°			REV STATUS	0	CONTACT	W. BAKER

Qty Of Valves	1	Description	GLOBE, 6" ANSI 300
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Tag N°	Serial N°	Qty Installed Per Valve	CD Drawing N°	Drawing Item	Description	Part N°	Notes	Recommended 2 Yrs Operation	Delivery	Unit Price	Total Ex-Works
01 MAN 21 AA061	CW3265001	1	CD32650	3,4,5,25,33,39,71	Assy, Trim 6" B SSH 3S 420 Consisting of #	TRM506020410302		1	8 weeks	€ 6,585.00	€ 6,585.00
01 MAN 21 AA061	CW3265001	1	CD32650	3 & 5	Mating Plug and Seat #	TRM404020102	⑥	1	8 weeks	€ 1,950.00	
01 MAN 21 AA061	CW3265001	1	CD32650	3+	Plug #	PLG304020102	⑥	1	8 weeks	€ 1,125.00	
01 MAN 21 AA061	CW3265001	1	CD32650	4+	Cage #	CAG30401020302		1	8 weeks	€ 2,287.50	
01 MAN 21 AA061	CW3265001	1	CD32650	5+	Seat #	SRG30410402	⑥	1	8 weeks	€ 825.00	
01 MAN 21 AA061	CW3265001	1	CD32650	25++	U Cup Seal #	VAS040101	①	2	8 weeks	€ 262.50	€ 525.00
01 MAN 21 AA061	CW3265001	1	CD32650	33+	Seal Retainer #	RE13040101	①		8 weeks	€ 142.50	
01 MAN 21 AA061	CW3265001	1	CD32650	39++	Retaining Ring #	342267	①	2	8 weeks	€ 67.50	€ 135.00
01 MAN 21 AA061	CW3265001	1	CD32650	71	Seat Adaptor Ring #	ADR3060402		1	8 weeks	€ 1,875.00	
01 MAN 21 AA061	CW3265001	1	CD32650	6+	Stem	STM340214502		1	8 weeks	€ 225.00	€ 225.00
01 MAN 21 AA061	CW3265001	1	CD32650	9++	Bonnet Gasket	282694	①	2	8 weeks	€ 37.50	€ 75.00
01 MAN 21 AA061	CW3265001	1	CD32650	10++	Gland Washer	373407		2	8 weeks	€ 75.00	€ 150.00
01 MAN 21 AA061	CW3265001	1	CD32650	16++	Gland Packing	368489	①	2	8 weeks	€ 45.00	€ 90.00
01 MAN 21 AA061	CW3265001	1	CD32650	18+	Spirol Pin #	U20-120		1	8 weeks	€ 1.50	€ 1.50
01 MAN 21 AA061	CW3265001	1	CD32650	20.22	Trim Gasket Consisting Of # #	GSK5060401061	①	2	8 weeks	€ 97.50	€ 195.00
01 MAN 21 AA061	CW3265001	1	CD32650	20++	Trim Gasket # #	268031	①	2	8 weeks	€ 22.50	
01 MAN 21 AA061	CW3265001	2	CD32650	22++	Trim Gasket # #	325432		4	8 weeks	€ 37.50	
01 MAN 21 AA061	CW3265001	1	REFER TO MANUAL	14,32,33,35,36	Actuator Spares Kit 100R Consisting of # #	C80135-AQA		1	8 weeks	€ 310.50	€ 310.50
01 MAN 21 AA061	CW3265001	1	REFER TO MANUAL	14+	Diaphragm # #	S185989BPP		1	8 weeks	€ 255.00	
01 MAN 21 AA061	CW3265001	1	REFER TO MANUAL	32++	Gasket # # #	S356959		1	8 weeks	€ 37.50	
01 MAN 21 AA061	CW3265001	1	REFER TO MANUAL	33+	U Cup Seal # # #	S357800		1	8 weeks	€ 12.00	
01 MAN 21 AA061	CW3265001	1	REFER TO MANUAL	35+	O Ring (Inner) # # #	S357801		1	8 weeks	€ 3.00	
01 MAN 21 AA061	CW3265001	1	REFER TO MANUAL	36+	O Ring (Outer) # # #	S357802		1	8 weeks	€ 3.00	
01 MAN 21 AA061	CW3265001	1	REFER TO MANUAL	30+	Bushing	S356093		1	8 weeks	€ 502.50	€ 502.50
Total Ex-Works Value Sheet										€ 8,794.50	€ 8,794.50
Packing										See Summary Sheet	See Summary Sheet
Carriage CPT Job Site Galabovo Romania										See Summary Sheet	See Summary Sheet
Total Price Packed and Delivered CPT Job Site Galabovo Romania										€ 8,794.50	€ 8,794.50

For And On Behalf Of SPX Flow Control

Compiled By	Mr D.G. Edwards
Title/Position	Aftermarket Manager
Date	27/01/2010

① Please note that items marked ① must be changed during an inspection or maintenance overhaul it should be ensured that these items are available before commencing the inspection.
Do Not Re-Use

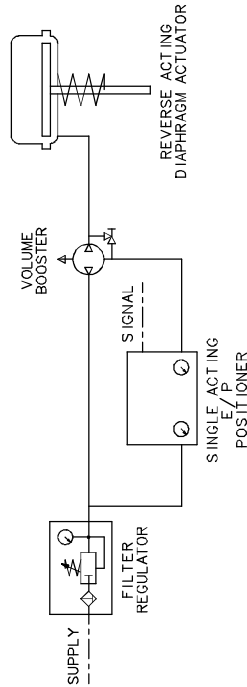
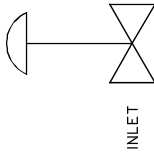
⑥ Please note that items marked ⑥ are operational spares
Please note that these items require factory mating prior to shipment and form a unique matched set that must not be separated in storage or during valve rebuild
We will lap the plug with the seat prior to shipment
Plug and seat cannot be purchased as individual components

COPES-VULCAN, SPX Valves & Controls Road Two, Winsford Industrial Estate, Cheshire. CW7 3QL Phone: 0044 1606 552041 Fax: 0044 1606 558275					CONTROL VALVE SPECIFICATION SHEET					
Customer Name: ALSTOM POWER GENERATION AG Customer Inquiry: EMAIL Customer PO: D61-4500058139 Ultimate User: MARITZA EAST 1, BULGARIA Tag: 01 MAN21AA061 Application: STEAM DUMPING DEVISE					CV Inquiry: DMS/061019/RK1 CV Job: WH/00026 CV Job Ref: CW32650 CV Serial #: 07CW32650/01 Item: 1 Quantity: 1					
Description: 6" (150 mm), CL300, WCB , BW, GS-700-100 RA										
FLUID: Water		SERVICE CONDITIONS								
	FLOW (kg/sec)	P1 (bar a)	P2 (bar a)	Temp. (deg C)	Cv	CV (%)	Travel (%)	Valve Outlet Vel. (ft/sec)	Noise * (dBA)	Remarks
COND 1	99.6	22.5	11.5	60	126	84%	74%	18	84	
COND 2										
COND 3										
COND 4										
COND 5										
SHUTOFF		40	1		Allowable Leakage:			* Estimated Noise Level with 0" of Insulation		
DESIGN		40		100	Class IV					
BODY AND BONNET										
Style: GS - General Service, Globe Size: 6 inch ASME Class: 300 Standard Body Inlet: Butt Weld, Sch 40 per ANSI B16.25, Fig. 2b Body Outlet: Butt Weld, Sch 40 per ANSI B16.25, Fig. 2b Material: A-216 WCB Inlet Pipe: 10 In. (250 mm), Sch 40 Inlet Reducer: 6" X 10" Sch 40, Length: 7.00 In., Material: A-234 WPB Outlet Pipe: 10 In. (250 mm), Sch 40 Outlet Expander: 6" X 10" Sch 40, Length: 7.00 In., Material: A-234 WPB					Bonnet Type: Bolted Packing Material: Grafoil Packing Hardware: Stainless Steel Packing Nut Torque: 6 ft-lbs. Options: Single Packed Service: Intermittent Modulation					
TRIM										
Size: 4 inch with 3 Starts Style: ONE STAGE HUSH (Balanced w/U-Cup Seals) Flow Direction: OVER THE WEB Stem Diameter: .75 in. Characteristic: ONE STAGE HUSH					Seat Type: METAL Trim Material: 400/47 SST Max. Cv Available: 150 @Max. Trim Travel of 2" (±1/8) Min. Controllable Cv of Trim: 2					
ACTUATOR										
Style: 700 DIAPHRAGM Size: 100 (Square Inch) Action: Spring Closing (Reverse) Handwheel: None Frame Material: Ductile Iron Air Pressure Available: 5.0 bar a (58 psig) Air Pressure Required: 2.1 bar a (31 psig)					Actuator Mounting Style: 4x Studded Actuator Spring: 357569 Spring Rate: 600 (lbs/inch) Max. Stem Thrust Required to Close: 1089 (lbs) Max. Stem Thrust Required to Open: 291 (lbs) Spring Precompression (Diaphragm Air Pressure): 10 (psig) Pressure @ Full Valve Travel (With No Internal Valve Pres.): 23 (psig)					
ACCESSORIES										
Positioner: Copes SIPART PS2, Single Acting Positioner Input Range: 4-20 mA Position FeedBack Module (4-20ma) : YES Alarm Module : NO HART Module : NO					Airlock: None Filter/Regulator: Bellofram 51FR w/Gauge Qty: 1 Solenoid Valve: None Booster Relay: SMC IL100-03 Qty: 1 Additional Acc'y:					
Piping: Stainless Steel Tubing (Hoke) Limit Switches: None										
COMMENTS										
Model = GS6 Body Option: BDY506080401 Bonnet Option: BNT506180401 Trim Option: TRM506020410302 Hardware Pack Option: HDP5115112 Actuator Option: ACT51004**11 Stem Option: STM50406021012 Gasket Option: GSK5060401061 Accessory Kit Option: AC7A25*00*62020 I.D. Plate: OPT187020										
					02	DMC	Updated for Contract Use			Jan-09-2007
					01	DMC	Amended Inlet/ Outlet Pipe Dimensions			Nov-13-2006
					00	DMC	INITIAL BID			Oct-19-2006
					Rev	Initials	Description			Date

Program Rev Level: **9.2.11** S
File Name: **K:\...\Technical\Contract Docs\DS-CW32650.VS3 (9.2.11)**



Flow



SUPPLY - 0.250" NPT FEMALE
SIGNAL - ELECTRICAL

THIS DRAWING IS THE PROPERTY OF COPES-VULCAN AND MUST NOT BE USED WITHOUT THE EXPRESS PERMISSION AND LICENSE OF COPES-VULCAN.	GENERAL ARRANGMENT DRAWING OF 8" ANSI 300 GLOBE VALVE WITH HUSH TRIM & CV700-100P REVERSE ACTING PNEUMATIC DIAPHRAGM ACTUATOR WITHOUT HANDWHEEL										CUSTOMER NAME CUSTOMER PO NO CUSTOMER COUNTRY VENDOR NAME VENDOR CONTRACT NO VENDOR JOB NO ITEM DESCRIPTION										ALSTOM POWER GENERATION AG P.O. BOX 10000, SUILE GARTIA D61-540028139 COPES-VULCAN, WINSFORD ENGLAND COPES-VULCAN, WINSFORD ENGLAND SW422SSG										USE	MODIFICATION	DATE	97	SCALE	DRAWN	JRL	COPES-VULCAN																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																										
	DO NOT SCALE IF IN DOUBT - ASK!	DATE	97	SCALE	DRAWN	JRL	CUSTOMER CHECKED	MATL	USED ON	CP33606	APPROVED	DATE	26-04-07	THICKED	CD32650	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00		00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00	00