

TECHNICAL DATA

PROJECT NO.	: 42297	ITEM NO.	:
BELT BUCKET ELEVATOR SIZE	: BW-G 630/320	BUCKET SPACING [mm]	: 380
DRIVE DRUM Ø [mm]	: 1000	FILLING RATE [%]	: 73.4
CENTRE DISTANCE [mm]	: 42500	MATERIAL	: Cement
BELT QUALITY	: H 12 ($t < 130^\circ\text{C}$)	BULK DENSITY [t/m^3]	: 0.8
CONVEYING CAPACITY [t/h]	: 250	PARTICLE SIZE [mm]	: 1
VELOCITY [m/s]	: 1.57	MATERIAL TEMP. [$^\circ\text{C}$]	: 120
AMBIENT TEMPERATURE [$^\circ\text{C}$]	: 45		

REQUIRED DRIVE DATA

DRIVE SHAFT CAPACITY [kW]	: 32.4
SPEED OF ROTATION [rpm]	: 28.6
TORQUE ON DRIVE SHAFT [kNm]	: 10.8

DRIVE DATA

2.1	AC-MOTOR	: ABB	SPEED OF ROTATION [rpm]	: 1482
	STANDARD	: IEC	SHAFT SIZE [ØxL mm]	: 75 x 140
	TYPE AND SIZE	: 280S	INSULATION	: F/B
	CAPACITY [kW]	: 75	TYPE OF PROTECTION	: IP54
	VOLTAGE [V]	: 380	STRUCTURAL FORM	: B3
	FREQUENCY [Hz]	: 50	WEIGHT [kg]	: 590
2.2	SUPPLIER	: Customer		
	BEVEL-HELICAL GEAR UNIT	: FLENDER	WITH FAN	: yes
	OUTPUT SHAFT DESIGN	: Hollow Shaft	WITH BACKSTOP	: yes
	GEARBOX SIZE	: B3DH8	OIL QUANTITY [l]	: 17
	NOM. POWER RATING [kW]	: 80	INPUT SHAFT [ØxL mm]	: 50 x 90
	NOM. RATIO	: 50	OUTPUT SHAFT [ØxL mm]	: 130 x 458
	DESIGN	: B	SENSE OF ROTATION	: left
	SUPPLIER	: AUMUND	OPERATING WEIGHT [kg]	: 870
	AUXILIARY GEAR UNIT for	: empty buckets	OVERRUNNING CLUTCH	: yes
	GEARBOX TYPE AND SIZE	: KZ 48	SPEED MONITOR	: yes
2.5	MOTOR TYPE AND SIZE	: M90L4-W	OIL QUANTITY [l]	: 2.3
	POWER [kW]	: 1.5	OPERATING WEIGHT [kg]	: 65
	SUPPLIER	: AUMUND		
	TURBO COUPLING	: FLENDER	BORE INPUT SIDE [ØxL mm]	: 75 x 140
2.5	TYPE AND SIZE	: FLUDEX-FAD 450	BORE OUTPUT SIDE [ØxL mm]	: 50 x 100
	SUPPLIER	: AUMUND	OPERATING WEIGHT [kg]	: 72

CONTROL EQUIPMENT

5.1	LEVEL LIMIT SWITCH IN THE BUCKET ELEVATOR BOOT		
	TYPE	: AD311 (CE) (MEPA / FILSA)	
	VOLTAGE	: 115 - 230 V AC ; 24 - 250 V DC	
5.2	PROXIMITY SWITCH MOVEMENT DETECTOR		
	TYPE	: NJ5-18-GK-N-150 (Pepperl & Fuchs)	
	VOLTAGE	: 8 V DC Namur (KFU8-DWB-1.D)	
5.3	SPEED MONITOR INSTALLED IN THE MOTION CONTROL CENTRE		
	TYPE	: KFU8-DWB-1.D (Pepperl & Fuchs)	
	VOLTAGE	: 48 - 253 V AC ; 20 - 90 V DC	
5.4	PROXIMITY SWITCH FOR STRAIGHT-RUN CONTROL OF BELT		
	TYPE	: NCB15+U1+U (Pepperl & Fuchs)	
	VOLTAGE	: 20 - 253 V AC ; 20 - 300 V DC	
2.11	NON-CONTACTING THERMAL SWITCH UNIT		
	TYPE	: EOC-M18x1.5 / BM5-G18-DYO (Fleender)	
	VOLTAGE	: 8 V DC Namur (EWD)	
2.12	EVALUATOR INSTALLED IN THE CONTROL ROOM		
	TYPE	: EWD/20-250VDC (Fleender)	
	VOLTAGE	: 20 - 250 V AC / DC	
2.13	SPEED INDICATOR IN THE AUXILIARY DRIVE UNIT		
	TYPE	: Bi5-G18-Y1 (Turck / Fleender)	
	VOLTAGE	: 8 V DC Namur (KFU8-DWB-1.D)	
2.14	SPEED MONITOR INSTALLED IN THE MOTION CONTROL CENTRE		
	TYPE	: KFU8-DWB-1.D (Pepperl & Fuchs)	
	VOLTAGE	: 48 - 253 V AC ; 20 - 90 V DC	