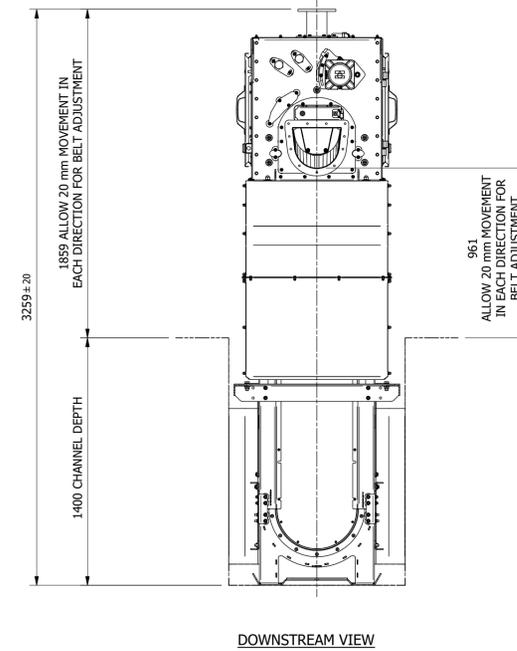
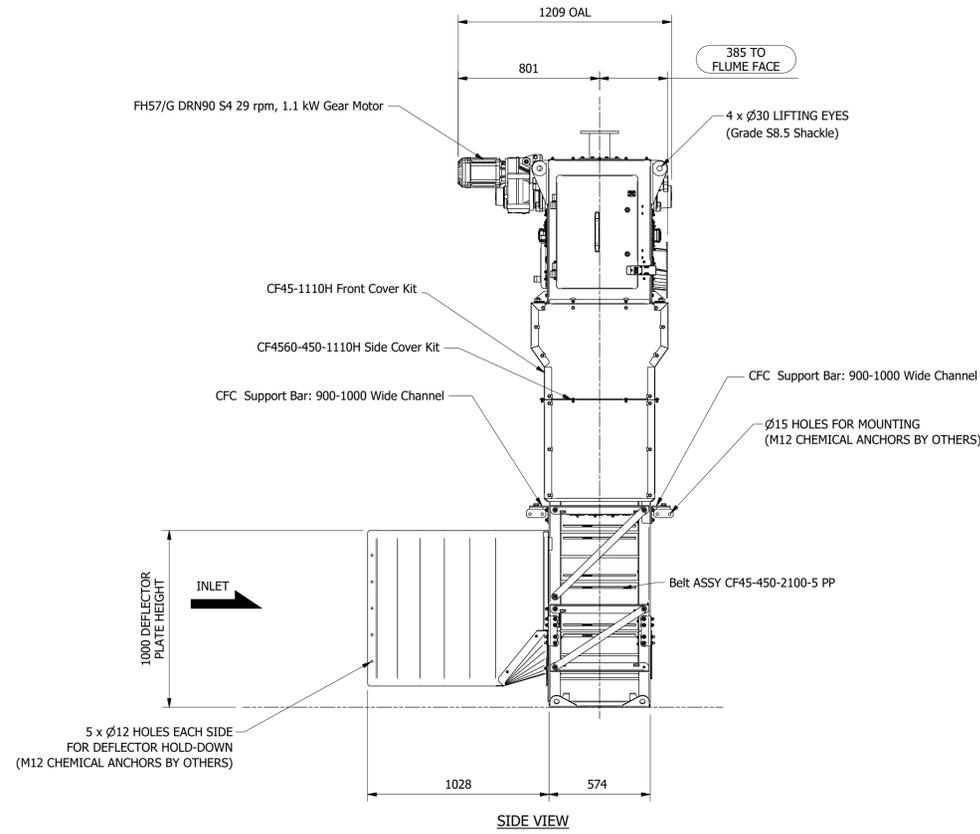
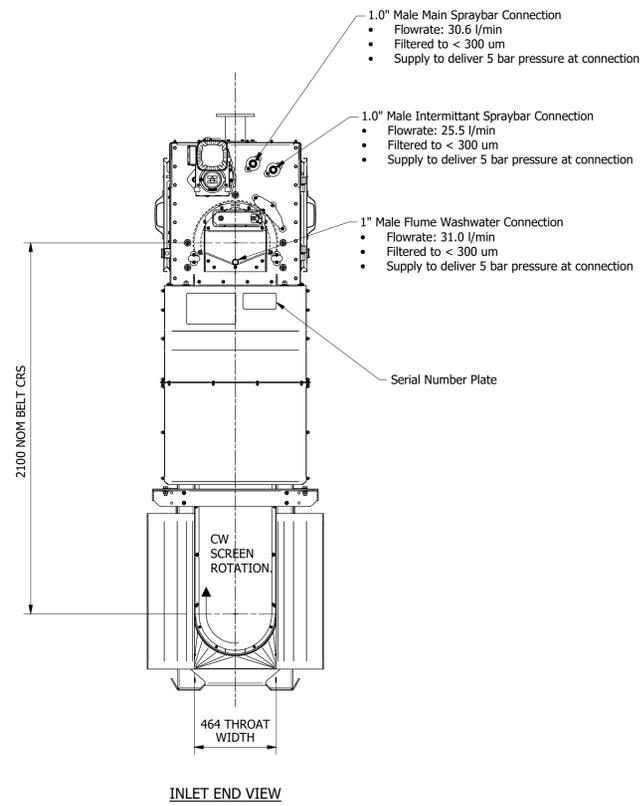
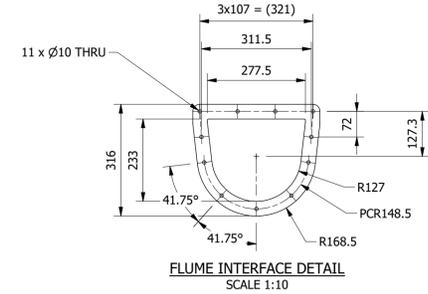
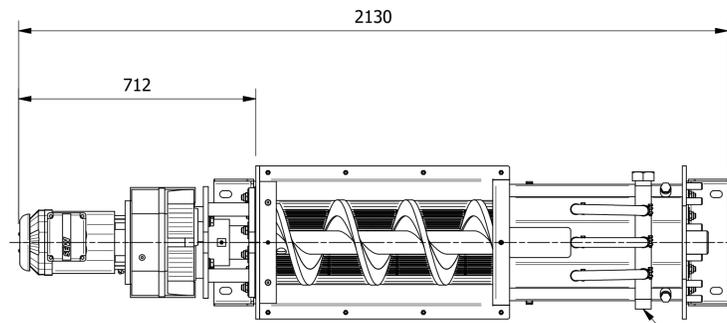


- NOTES:
- ESTIMATED DRY WEIGHT: 701 kg.
 - INSPECTION OPENINGS: PROTECTION LEVEL 3: Keylock & Interlock.
 - BELT SCREEN APERTURE: 5 mm. BELT SPEED: 12 m/min at 50 Hz.
 - BASE PLATE ASSEMBLY AND DEFLECTOR PLATES TO BE PERMANENTLY FIXED IN CHANNEL TO ENABLE FASTENER-FREE ATTACHMENT OF CENTER-FLO TO CHANNEL FLOOR.



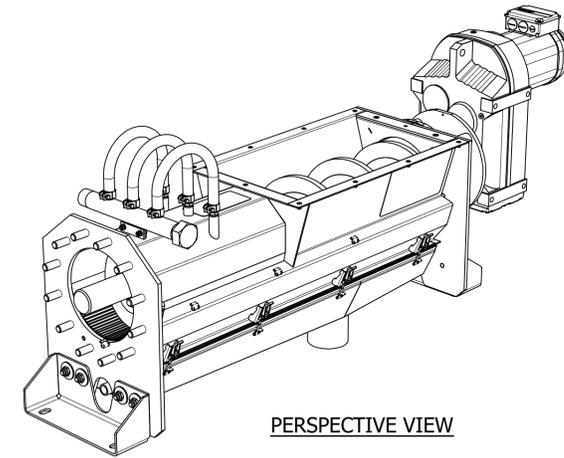
REV	DESCRIPTION	DATE	APPROVED
A	BELT SCREEN APERTURE SIZE CORRECTED FROM 6mm to 5mm TO MATCH TECHNICAL PROPOSAL.	29/11/2023	SGB

IF IN DOUBT ASK		REVISION HISTORY	
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LINEAR DIMENSIONS: mm TOLERANCES UNLESS NOTED		DRAWN BY: IS DATE: 9/05/2023 CHECKED BY: [] DATE: [] EXT APPROVAL / MFG CHECK: [] DATE: [] APPROVED BY: JL DATE: 9/05/2023 REFERENCE: []	
FABRICATION MACHINING 0-1500 ± 3 mm X ± 0.5 1500-3000 ± 6 mm X.X ± 0.1 Over 3000 ± 12 mm X.XX ± 0.02 Angles ± 0.5° X.XXX ± 0.005		CUSTOMER: City of Kalgoorlie-Boulder TITLE: South Boulder WWTP WA CF45-450-2100-5 DSF USD 960 IH	
6.3/ MACHINED FACES SURFACE FINISH UNLESS NOTED OTHERWISE		GEEBUNG, QLD. AUSTRALIA THIRD ANGLE PROJECTION SCALE: A1 DWG NO: 1000552937_999 SHEET: 1 OF 1	



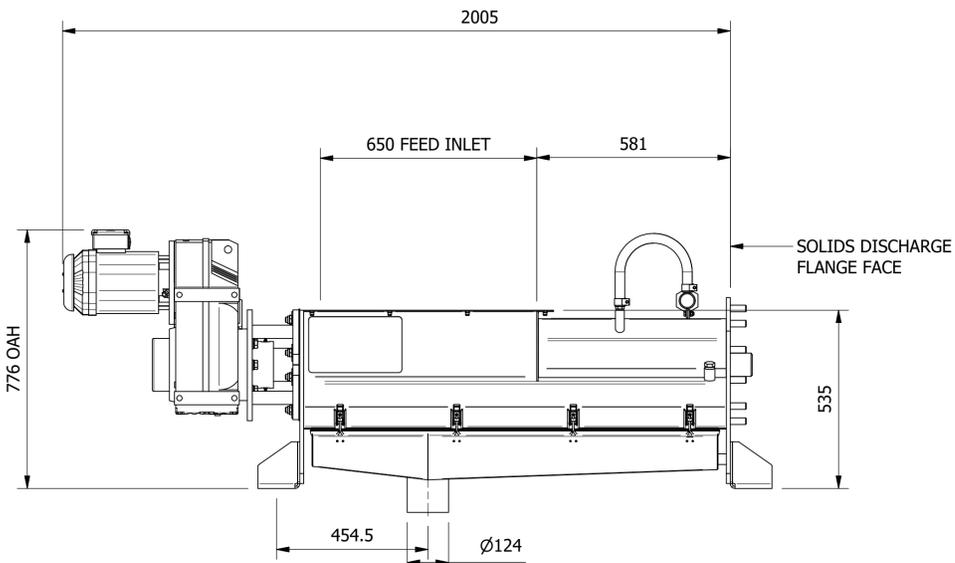
TOP VIEW

WASH-WATER CONNECTION
1-1/2" BSP MALE THREAD (40NB)



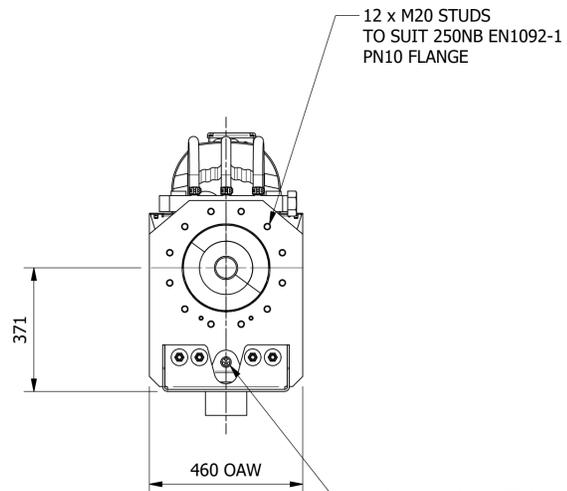
PERSPECTIVE VIEW

GEARMOTOR
SEW FH87B DRE100M4
RPM @ 50Hz: 7.2
POWER [kW]: 2.2
FREQUENCY [Hz]: 50
SYSTEM VOLTAGE [V]: 400
IP: 56



SIDE VIEW

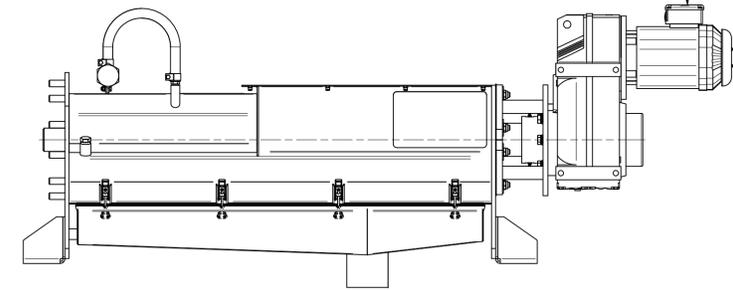
SOLIDS DISCHARGE
FLANGE FACE



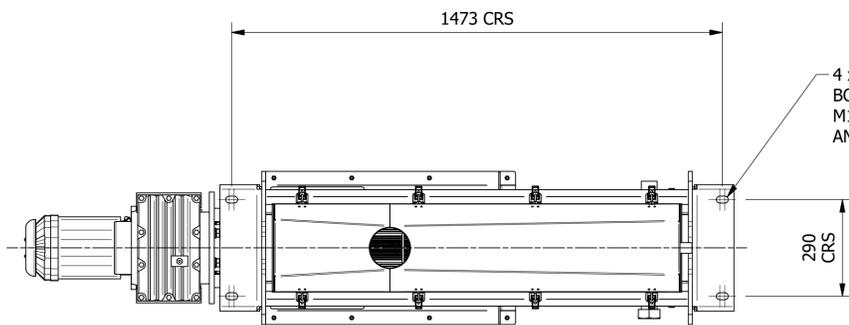
DISCHARGE VIEW

12 x M20 STUDS
TO SUIT 250NB EN1092-1
PN10 FLANGE

DRAIN PAN CONNECTION
3/4" BSP FULL SOCKET (20NB)



SIDE VIEW



BOTTOM VIEW

4 x Ø21 x 15 SLOTTED
BOLT DOWN HOLES FOR
M16 CHEMICAL MASONRY
ANCHORS.

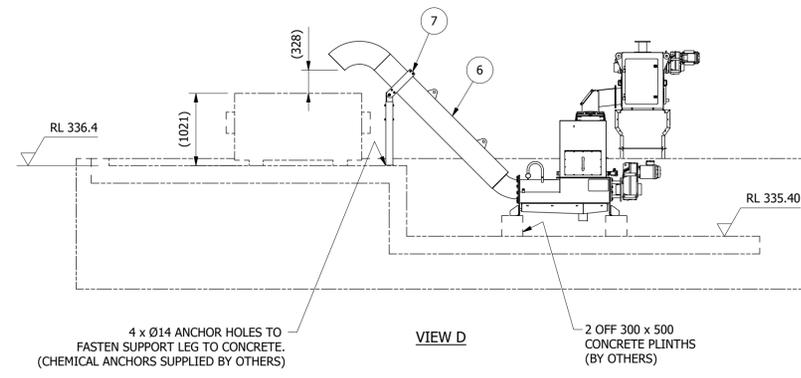
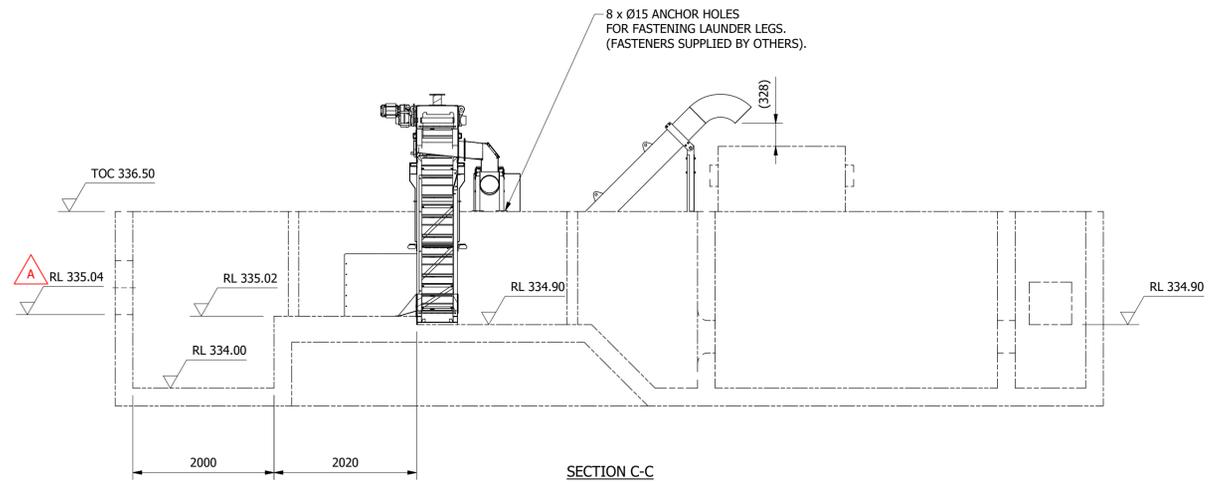
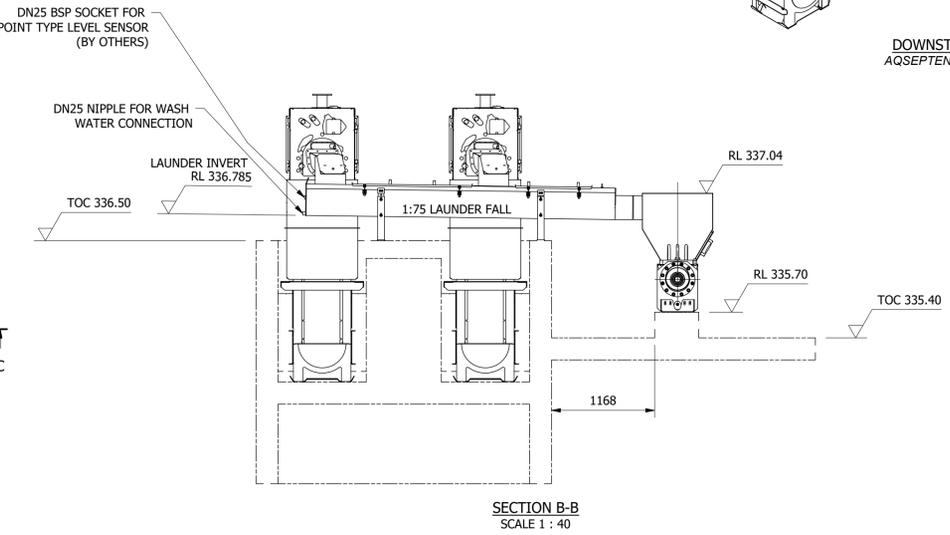
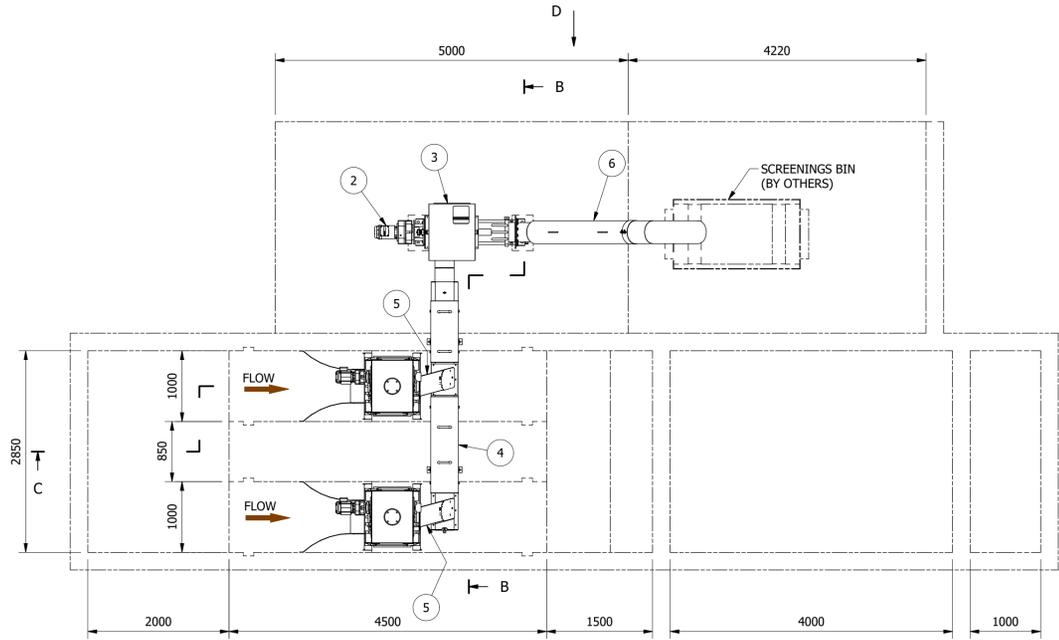
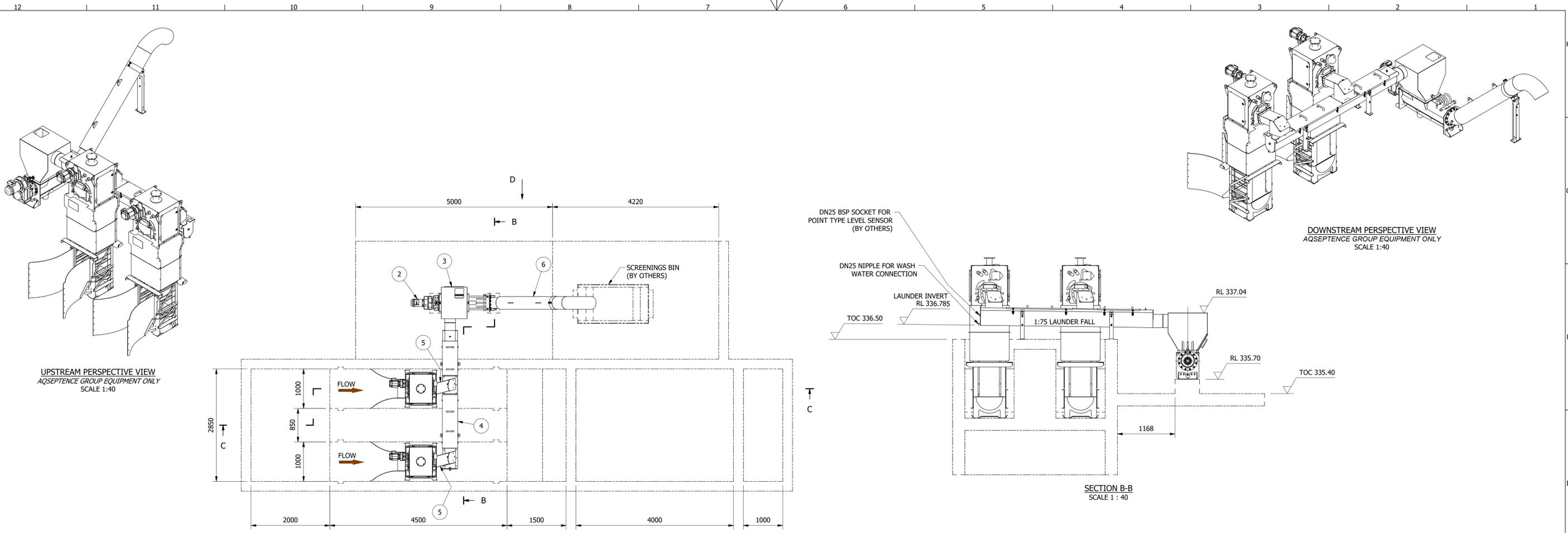
NOTES:

- EST. DRY MASS: 386 kg
- EST. WET MASS: 612 kg
- CHASSIS MATERIAL: 316 SS
- SCREW MATERIAL; st52 CARBON STEEL

IF IN DOUBT ASK		COPYRIGHT © 2023 AQSEPTENCE GROUP. ALL RIGHTS RESERVED. THIS DRAWING AND ALL OF THE INFORMATION AND INTELLECTUAL PROPERTY CONTAINED HEREIN IS CONFIDENTIAL AND PROPRIETARY AND BELONG TO AQSEPTENCE GROUP. ANY UNAUTHORIZED REDISTRIBUTION, REPRODUCTION, DUPLICATION, OR DISCLOSURE WITHOUT WRITTEN CONSENT FROM AN OFFICER OF AQSEPTENCE GROUP IS STRICTLY PROHIBITED.			
LINEAR DIMENSIONS: mm		DRAWN BY: SGB		DATE: 3/10/2023	
TOLERANCES UNLESS NOTED		CHECKED BY:		DATE:	
FABRICATION	MACHINING	EXT APPROVAL / MFG CHECK		DATE:	
0-1500 ± 3 mm	X ± 0.5	APPROVED BY:		DATE:	
1500-3000 ± 6 mm	X.X ± 0.1	REFERENCE			
Over 3000 ± 12 mm	X.XX ± 0.02	THIRD ANGLE PROJECTION			
Angles ± 0.5°	X.XXX ± 0.005	GEEBUNG, QLD. AUSTRALIA			
6.3/	MACHINED FACES SURFACE FINISH UNLESS NOTED OTHERWISE	CONTENT: Submittal		SIZE: A2	DWG NO: 1000567619_999
		SCALE: 1:15		PROJECT NO:	SHEET: 1 OF 1



CUSTOMER	CITY OF KALGOORLIE	
TITLE	SOUTH BOULDER WWTP NW250EV-650-F BO RPW PD 316 St52	



ITEM	DESCRIPTION	MATERIAL SPEC.	ESTIMATED DRY WEIGHT	ESTIMATED WET WEIGHT	QTY
7	SUPPORT LEG 1000/1500	316L SS	95 kg	N/A	1
6	NW300-DN350 Drainer Neck	316L SS	120 kg	310 kg	1
5	CF TRANSITION CHUTE	316L SS	15 kg	N/A	2
4	DN250 COMMON SCREENINGS LAUNDRER	316L SS	200 kg	600 kg	1
3	Feed Hopper - NW250-650	316L SS	100 kg	300 kg	1
2	NW250EV-650 BO LHW PD 316 St52	316L SS	386 kg	612 kg	1
1	CF45-450-2100-6-DSF USD 960 IH	316L SS	703 kg	850 kg	2

- GENERAL NOTES:**
- THIS DRAWING TO BE READ IN CONJUNCTION WITH THE DRAWINGS IN THE BOM. SUPPLIED AFTER PRELIMINARY LAYOUT DESIGN IS APPROVED.
 - EQUIPMENT DESIGNED, ENGINEERED & SUPPLIED BY OTHERS IS SHOWN IN DOUBLE CHAIN LINK LINE WORK.
 - ALL LAUNDRER INSPECTION HATCHES FIXED VIA 4 x OVER CENTER LATCHES.
 - DOWNSTREAM WEIR REQUIREMENT TO BE CONFIRMED.

PRELIMINARY LAYOUT ONLY

REV	DESCRIPTION	DATE	APPROVED
A	INLET PIPE RL LEVEL CORRECTED	8/11/2023	SGB

IF IN DOUBT ASK

LINEAR DIMENSIONS: mm
TOLERANCES UNLESS NOTED

FABRICATION	MACHINING	0-1500 ± 3 mm	X ± 0.5
1500-3000 ± 6 mm	X.X ± 0.1	Over 3000 ± 12 mm	X.XX ± 0.02
Angles ± 0.5°	X.XXX ± 0.005		

6.3 MACHINED FACES SURFACE FINISH UNLESS NOTED OTHERWISE

Johnson Screens
A brand of Aqseptence Group

GEEBUNG, QLD. AUSTRALIA

THIRD ANGLE PROJECTION

CITY OF KALGOORLIE-BOULDER
SOUTH BOULDER WWTP
PRELIMINARY EQUIPMENT LAYOUT

DATE: 23/10/2023
DRAWN BY: SGB
CHECKED BY: GA
EXT APPROVAL / MFG CHECK: DATE: 26/10/2023

PROJECT NO: 1000567637_999
SHEET: 1 OF 1



Reliable Performance.
Sustainable Results.

NOGGERATH® CENTRE-FLO™ BAND SCREEN



BENEFITS

- Highest screenings capture rate technology on market due to efficient flow path and panel media.
- Best hydraulic performance on market with our full bore perforated panel or Patented Honeycomb Panel.
- Low maintenance with virtually no wearing parts and no requirement for channel access.
- Effective organics washing and recycling of the screened solids.
- Improvement of downstream processes provides operational and maintenance efficiencies.

DESIGN FEATURES

- Proven screen capture rates above 85% for 5mm aperture panels.
- Proven pre-MBR screening with 1 to 2mm screen panel apertures.
- Fully sealed guide link arrangement to ensure screenings cannot bypass the screen.
- Patented external drive system with all moving parts, including drive shaft and sprocket, on the clean side of the screen which eliminates risk of internal catchpoints.
- Patented Honeycomb Panel provides the industry's highest hydraulic performance with over 90% open area; provides for increases of 20 to 40% hydraulic capacity compared to full-bore perforated panels.
- Flexible material design with various options including UHMWPE, Polypropylene and 316 stainless steel panels.
- Flexible panel media design with slotted, perforated and Honeycomb panel options.

TASK

Coarse and fine screening of municipal fresh water, sea water, wastewater and industrial wastewater; fully customizable and highly efficient machine to improve and protect downstream treatment processes.

SOLUTION

Aqseptence Group offers you a range of high-quality, Australian designed and manufactured band screens. The Centre-Flo™ band screen includes integral bypass, fully contained enclosure for odour containment and control as well as a choice of slotted, perforated or honeycombed screen elements. Each machine is custom designed to suit the specific treatment needs, allowing the machine to handle all treatment processes, from conventional to membranes.

FUNCTION

The diverter plates direct the influent flow into the submerged section of the screen. The flow then undergoes a 90 degree change in direction to flow through the Centre-Flo™ screen panels. The screen panels retain the solids and allow the screened effluent to pass through to the subsequent treatment processes. Centre-Flo's are typically controlled based on upstream water level or differential level allowing the band screen to remain stationary allowing solids to build up on the screening elements. This build-up of solids helps the screen capture finer particles, further increasing capture efficiency.

While in this stationary mode, the head loss across the screening element increases, causing the upstream water level to rise. Once the upstream water level or differential level reaches a pre-set high, the screen will automatically enter a cleaning cycle.

FUNCTION (CONT)

During the cleaning cycle, the band screen will rotate, lifting the collected solids and dropping them into the discharge flume. The finer solids captured on the screen panels are flushed off the screen using the wash sparge system located on the opposite side of the screen. The cleaning cycle will typically run through a complete revolution of the band screen, effectively cleaning the entire screen. During the cleaning cycle the upstream water level will continue to drop until the screen is completely cleaned and normal operating levels are reached.

DESIGN SIZES & PERFORMANCE

The Centre-Flo™ can be customised for channel depths up to 10 m and suitable for flowrates in the order of 200 to 3,000 litres per second. The Centre-Flo™ can also be integrated with various solids transport options including integral screw wash press, sluicing trough or screw conveying arrangements.

MATERIALS

The Centre-Flo™ is an extremely robust unit with no submerged chains or sprockets; all materials are high-grade and suitable for aggressive wastewater environments resulting in virtually no wearing parts. The frame is constructed from 316 Stainless Steel with oil-impregnated UHMWPE drive links and various material options for the panel including Polypropylene, UHMWPE and 316 Stainless Steel.

APPLICATIONS & FIELDS OF USE

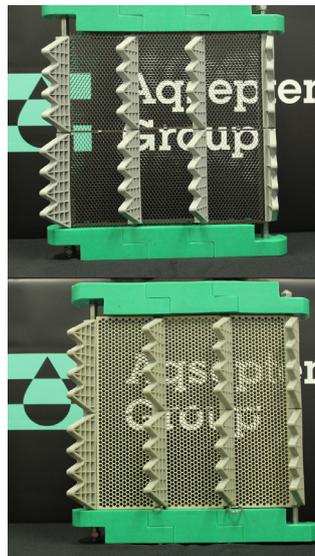
- Suitable for municipal fresh water, sea water, wastewater and industrial wastewater applications.
- Screening elements available in Honeycomb panels (2 to 5 mm apertures), perforated plate (1 to 6 mm apertures), laced hooks and links (2 to 6 mm slots)
- 1 to 2 mm apertures suitable for final pre-screening for Membrane Bioreactor (MBR) processes.
- 3 to 6 mm apertures and slots suitable for conventional wastewater treatment processes
- Excellent retrofitting capability to existing channels to improve plant hydraulics and screenings capture efficiency e.g. coarse screen or step screen replacement
- Can be designed to accommodate channel dimensions and hydraulic requirements; highly suitable for deep channel designs

DESIGN FEATURES (CONT)

- Patented Honeycomb Panel also provides improved screen capture rates over perforated plate as well as improved screen cleaning efficiency and reduced aerosol production with over 40% increase in open area compared to equivalently sized full-bore perforated panels.
- Unique screen panels with one single panel the entire width of the band screen belt for maximum screen open area and easy panel replacement for maintenance or future panel upgrades.
- Flexible safety options including limit switches or safety mesh on all inspection hatches.
- Standard dual wash sparge arrangement for effective screen element washing and screenings organics washing and recycling to improve treatment processes and reduce disposal costs.
- Able to handle influent with high grit and gravel loads.
- Modular design allows the Centre-Flo™ height and band screen width to be optimised to suit channel, capacity and head loss requirements.
- Ability to run continuous clean screen operation to maintain low and consistent head loss.
- Proven design and operation with reference sites in many countries.
- Optional integral manual or actuated by-pass gate to eliminate the need for a separate by-pass channels.



Option for direct discharge to our Noggerath® Noggwash™ Screw Wash Press.



Comparison of our new patented Honeycomb Panel versus full-bore Perforated Panel.



Perforated Plate Version with Lifters.



A brand of
Aqseptence Group

Noggerath® Screenings Wash Press NSP/NWP

Dewatering, compaction, pressing, and conveyance of solids, combined with the optional washing out of soluble organic constituents.



The Aqseptence Group offers with the Noggerath® screenings wash press NSP / NWP a simple and reliable solution; a versatile and flexible manner, even into existing plants. The technology has been continuously improved since the first Noggerath® screenings washer was supplied. Due to the large number of machines already in operation, Aqseptence Group has gained extensive knowledge and experience concerning their application in both municipal and industrial installations.

The material, which is introduced via the infeed section, is taken up by the conveying screw and pushed in the direction of the wash and compacting section. The slotted bottom of the conveyor section enables a static dewatering of the medium. In the washing section fecals are broken up and washed out and in the compacting section the material is compacted, dewatered further and pushed through the friction pipe. For high organic

Benefits

- Tried and tested design with high performance and low operating costs
- No necessity for wear rails
- Significantly improved drainage efficiency in the slotted bottom vs. using perforations
- Brushless screw made of wear-resistant special steel guarantees a Continuous, self-cleaning and sturdy slotted bottom; eliminates the need for wear rails
- Variably adjustable pressing force
- Reduction of wear costs due to individually replaceable modules
- Non-clogging even with fibrous materials
- Low wear and tear due to low rotational speed

Applications & fields of operation

- The Noggerath® Screenings Wash Presses have a wide variety of applications in industry and municipality:
- Washing and dewatering of screenings
 - Compaction of all kinds of short-fibred solids

Product variants

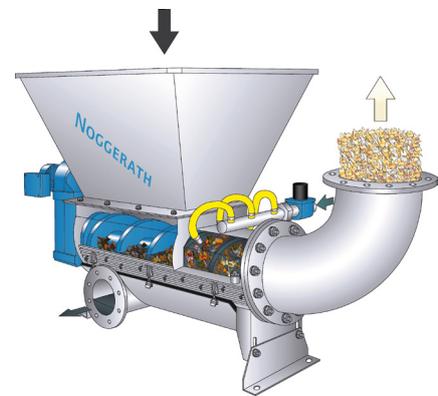
NSP/NWP	Bottom trough non-placeable, compact unit
NSP/NWP-R	With flanged washing module and placeable bottom trough
NSP/NWP-A	With screw adjustment, flanged washing module and circumferential dewatering in the compacting zone

Unique features

- Low rotational speed ensures gentle washing
- Wear resistant profiles
- Modular design particularly easy to maintain
- Axial adjustment of the screw for variable adaptation to the press plug volume (optional)
- Very high drainage capacity due to new profile geometry and arrangement
- No blockage of the drainage section due to direct contact between screw and slotted bottom
- No "shear forces exerted on the basket" as there are no wear rails

Design sizes & performance

NSP / NWP-size	max. output [m ³ /h]
200	1,4
250	2,2
300	3,5
400	5,3
500	10,0



Materials

Casing, covers, supports, hoppers	Stainless steel AISI 304 or AISI 316 Others on request
Screw	Special Micro Alloy Steel St 52 (carbon steel in acc. with AS Group standard), alternatively stainless steel AISI 316

Options

- Hygienic bagging for the compacted material
- Can be mounted on castors
- NIR-hopper with integrated impeller for better organic washing

Aqseptence Group Pty Ltd

88 Brickyard Road
Geebung, QLD, 4034
Australia

info.johnsonscreens.au@aqseptence.com

www.aqseptence.com

Version 1.1

The technical data stated in this brochure are indicative only and have to be determined for each individual case. Reserve technical changes.