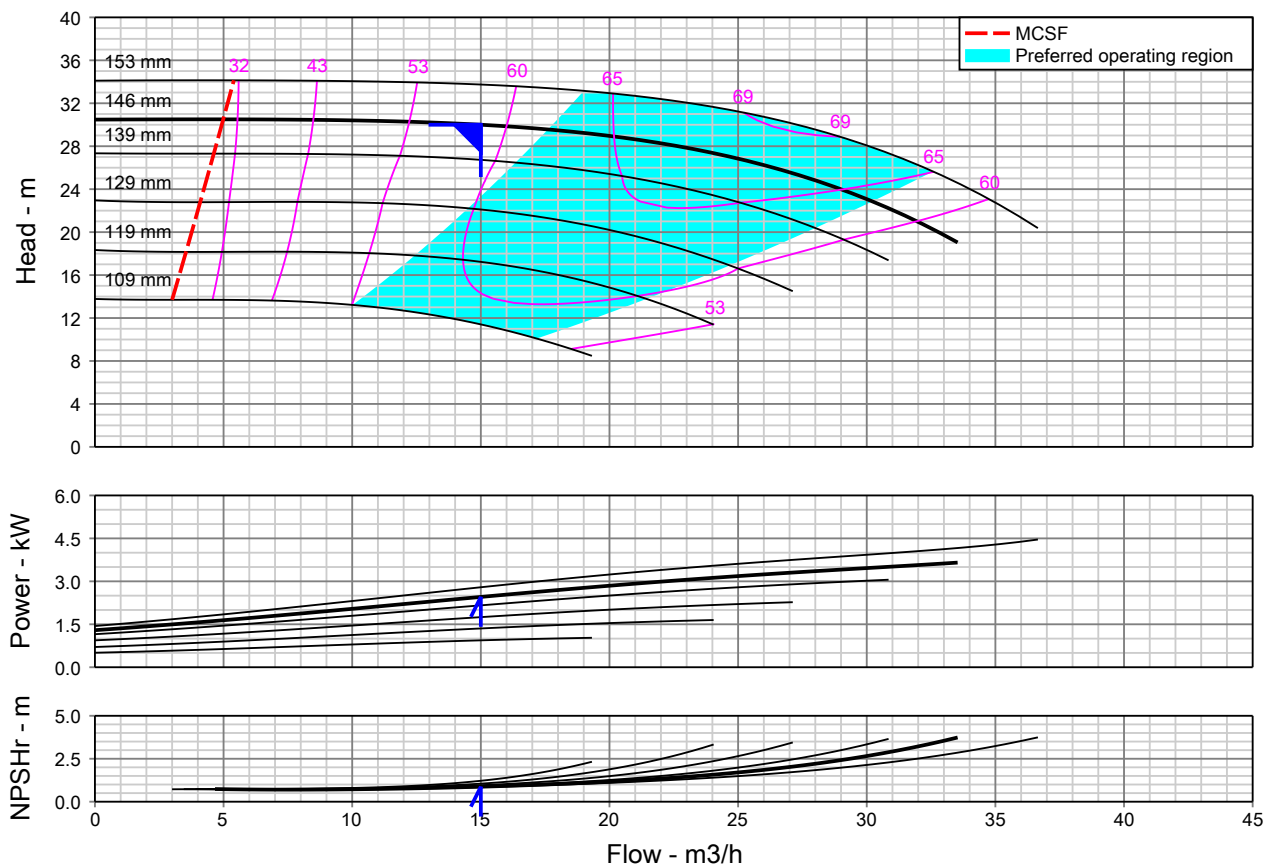


Item number	: 001	Size	: ETN60
Service	: Replacement sn 59313	Stages	: 1
Quantity	: 1	Based on curve number	: ETN602900-2-50 Rev 0_20130722
Quote number		Date last saved	: 02 Feb 2017 17:40

Operating Conditions		Liquid	
Flow, rated	: 15.00 m3/h	Liquid type	: Hydrochloric Acid [33.00 %]
Differential head / pressure, rated (requested)	: 30.00 m	Additional liquid description	:
Differential head / pressure, rated (actual)	: 30.16 m	Solids diameter, max	: 0.00 mm
Suction pressure, rated / max	: 0.00 / 0.00 bar.g	Solids concentration, by volume	: 0.00 %
NPSH available, rated	: Ample	Temperature, max	: 20 deg C
Frequency	: 50 Hz	Fluid density, rated / max	: 1.170 / 1.170 kg/dm3
Performance		Viscosity, rated	: 1.00 cSt
Speed, rated	: 2900 rpm	Vapor pressure, rated	: 0.00 bar.a
Impeller diameter, rated	: 146 mm	Material	
Impeller diameter, maximum	: 153 mm	Material selected	: PP
Impeller diameter, minimum	: 109 mm	Pressure Data	
Efficiency	: 58.40 %	Maximum working pressure	: 3.50 bar.g
NPSH required / margin required	: 0.87 / 0.00 m	Maximum allowable working pressure	: 7.00 bar.g
nq (imp. eye flow) / S (imp. eye flow)	: 20 / 167 Metric units	Maximum allowable suction pressure	: 2.00 bar.g
MCSF	: 5.00 m3/h	Hydrostatic test pressure	: 10.00 bar.g
Head, maximum, rated diameter	: 30.50 m	Driver & Power Data (@Max density)	
Head rise to shutoff	: 1.60 %	Driver sizing specification	: Maximum power
Flow, best eff. point	: 24.92 m3/h	Margin over specification	: 0.00 %
Flow ratio, rated / BEP	: 60.19 %	Service factor	: 1.00
Diameter ratio (rated / max)	: 95.42 %	Power, hydraulic	: 1.43 kW
Head ratio (rated dia / max dia)	: 88.90 %	Power, rated	: 2.46 kW
Cq/Ch/Ce/Cn [ANSI/HI 9.6.7-2010]	: 1.00 / 1.00 / 1.00 / 1.00	Power, maximum, rated diameter	: 3.65 kW
Selection status	: Acceptable	Minimum recommended motor rating	: 4.00 kW / 5.36 hp



Construction Datasheet

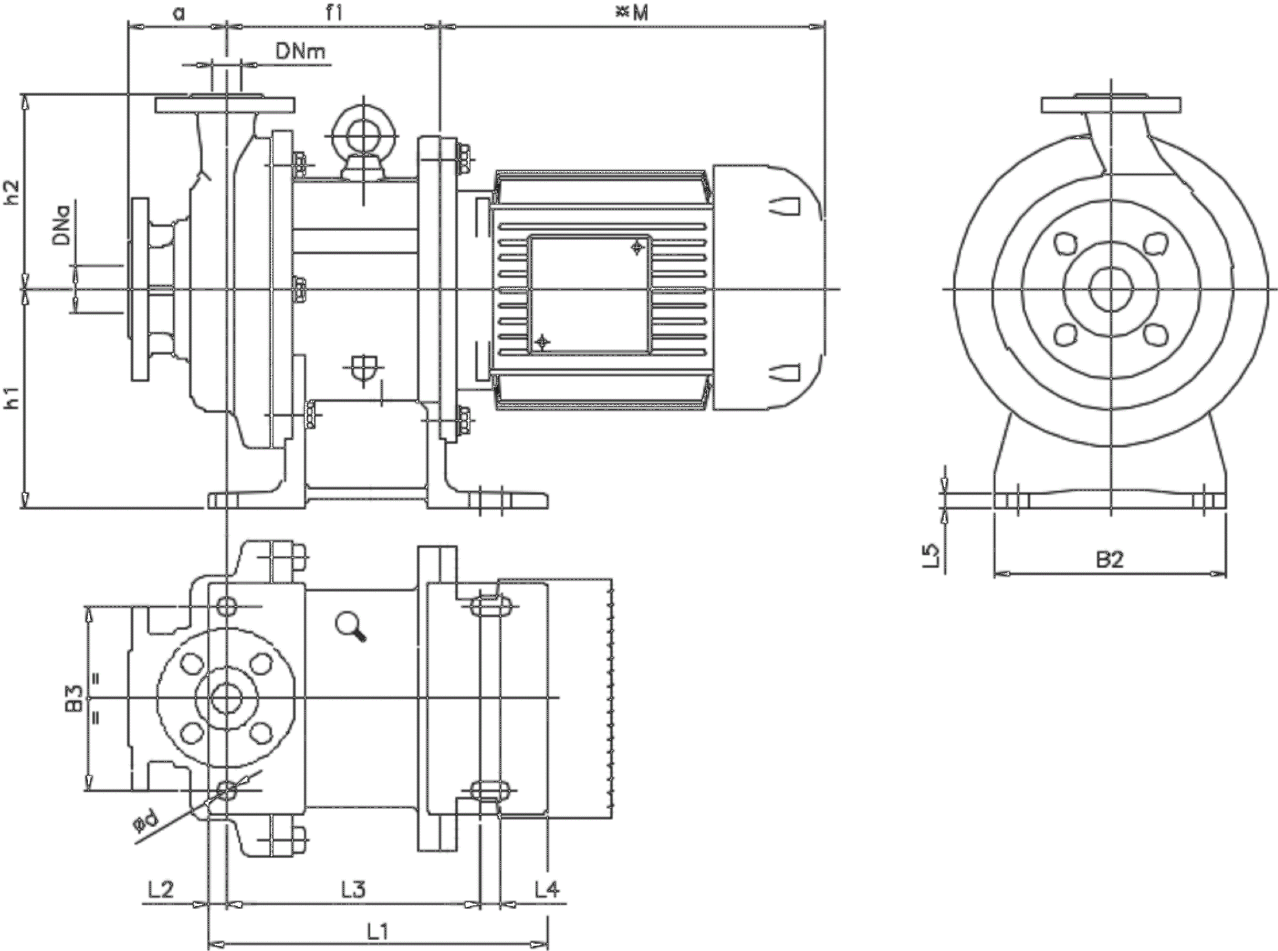
1	Customer		: IMPEXRON GMBH IMPORT EXPORT			Quote number		: 3170040		
2	Customer reference		:			Design to		: Sub-ISO 2858		
3	Item number		: 001			Comply to		: -		
4	Service		: Replacement sn 59313			Comply to		: -		
5	Quantity		: 1			ATEX		: 2014/34/EU		
6	Pump Design						Construction Features			
7	Flanged	Standard	Size	Rating	Face	Slotted	Motor Coupling Arrangement		B5	
8	Suction	EN 1092-2	DN65	PN10	RF	ANSI150	Magnet Length		35mm	
9	Discharge	EN 1092-2	DN40	PN10	RF	ANSI150	Torque, pump shaft limit		19.15 N.m	
10	Pump Type			Horizontal Centrifugal			Permanent Magnet Material (Inner)		NdFeB	
11	Sealing Type			Magnetic Drive			Permanent Magnet Material (Outer)		NdFeB	
12	Execution			Close Coupled			Drained Casing		None	
13	Pump Model			ETN			Drained Lantern		YES	
14	Pump Size			60			Flushed Lantern		NOT AVAILABLE	
15	Number of Stages			Single			Driver Information			
16	Rotation			Clockwise						
17	Impeller Type			Closed						
18	Casing Split			Radial						
19	Casing Type			Single Volute			Manufacturer		N/A	
20	Materials						Poles		N/A	
21	102	Casing	PP- Lined			Power		N/A		
22	240	Impeller	PP- Lined			Speed		N/A		
23	106	Suction Housing	PP- Lined			Driver Type		N/A		
24	157	Isolation Shell	PP			Efficiency Rating		N/A		
25	211	Shaft	Al2O3			Enclosure		N/A		
26	529	Rotating Bushes	PTFE-Al2O3			Voltage		N/A		
27	510	Axial Thrust	Al2O3			Frame Size		N/A		
28	412	Casing Gasket	EPDM			Mounting Arrangement		N/A		
29	344	Lantern	GS400			Hertz		N/A		
32	Baseplate, Coupling & Guard						Protection		N/A	
33	Baseplate Type			None			Isolation		N/A	
34	Baseplate Material			-			Cooling System		N/A	
35	Coupling Manufacturer			N/A			Tropicalization		N/A	
36	Coupling Type			N/A			PT-100		N/A	
37	Coupling Size			N/A			Space Heater		N/A	
38	Spacer Length			N/A			Notes		-	
39	Coupling Guard			N/A			Weight (Approx.)			
40	Bearing Bracket Details						Pump	32.00 kg		
41	Pumps Side Bearing Type			N/A			Base	0.00 kg		
42	Motor Side Bearing Type			N/A			Motor	0.00 kg		
43	Bearing Lubrication			N/A			Total	32.00 kg		
44	Oil Seal			N/A						
45	Painting Specifications									
46	Color			RAL 1017						
47	Specifications			ISO 12944-5 - C4M						
48	System - Thickness			A4.14 - 260micron NDFT						
49	-			-						

Construction Features	
Motor Coupling Arrangement	B5
Magnet Length	35mm
Torque, pump shaft limit	19.15 N.m
Permanent Magnet Material (Inner)	NdFeB
Permanent Magnet Material (Outer)	NdFeB
Drained Casing	None
Drained Lantern	YES
Flushed Lantern	NOT AVAILABLE
Driver Information	
Manufacturer	N/A
Poles	N/A
Power	N/A
Speed	N/A
Driver Type	N/A
Efficiency Rating	N/A
Enclosure	N/A
Voltage	N/A
Frame Size	N/A
Mounting Arrangement	N/A
Hertz	N/A
Protection	N/A
Isolation	N/A
Cooling System	N/A
Tropicalization	N/A
PT-100	N/A
Space Heater	N/A
Notes	-
Weight (Approx.)	
Pump	32.00 kg
Base	0.00 kg
Motor	0.00 kg
Total	32.00 kg

02 Feb 2017 17:40

General Arrangement

Customer	: IMPEXRON GMBH IMPORT EXPORT	Quote number	
Customer reference	: MG200170992	Design to	: Sub-ISO 2858
Item number	: 001	Comply to	: -
Service	: Replacement sn 59313	Comply to	: -
Quantity of pumps	: 1	ATEX	: 2014/34/EU



Pump Model	DNa		DNm		a	h1	h2	L4	L1	L2	L3	L5	B2	B3	-	Ød
ETN60	65	EN 1092-2 PN10RF slotted ANSI150	40	EN 1092-2 PN10RF slotted ANSI150	80.00	180	160	17.00	277	15.00	208	11.50	190	152	0.00	17.00

Motor Size	f1	Frame
112	176	B5

Weight (w/o motor)
32.00 kg

All dimensions are in mm unless stated otherwise.
*M dimension is according to installed motor manufacturer

SECTIONAL DRAWING - ETN

