PRESSURE GAUGE

CLIENT: VD-GPIC-MA-3029-3029-0038

ULT DOC.: ULT003- 20101 A

NO.	BY	APP	DATE	DESCRIPTION
0	FAD	IMA	02/14/23	FOR APPROVAL
1	FAD	IMA	11/24/2025	FOR CONSTRUCTION

CLIENT DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACKAGE

1. Type: Direct Reading [x] Other [ ] 3-15 lb Receiver [ ]
2. Mounting: Surface [ ] Local [x] Flush [ ]
3. Dial: Diameter 6" (150) [x] Color: WHITE (NOTE 13)
4. Case: Cast Iron [ ] Aluminum [ ] Phenolic [ ] Stainless Steel [x] Other: [ ]
5. Ring: Screwed [x] Hinged [ ] Slip [ ] Std [ ] Other [ ]
6. Blow-out Protection: None [ ] Back [x] Disc [ ] Solid Front [ ] Other [ ]
7. Lens: Glass [x] SAFETY GLASS FRONT Plastic [ ]
8. Option: Syphon [ ] Material: NONE Snubber [ ] Material: NONE Pressure Limit Valve [ ] Movement Damping [x] GLYCERINE FILLED
9. Nominal Accuracy Required: +/- 1%
10. Mfr & Model No.: SEE LIST BELOW
11. Pressure Element: Bourdon [x] Bellows [ ] Other [ ]
12. Bourdon Mat'l: Bronze [ ] Steel [ ] 316SS [x] Other [ ]
13. Socket Mat'l: Bronze [ ] Steel [ ] 316SS [x] Other [ ]
14. MNPT Conn.: 1/4" [ ] 1/2" [x] Other [ ] Bottom [x] Back [ ]
15. Movement Mat'l: Bronze [ ] 316SS [x] Nylon [ ] Other [ ]
16. Diaphragm Seal [ ] NOT REQUIRED
MFG Type
Wetted Part Mtl. Other Mat'l
Fill Fluid
Process Conn. Gage Conn.

Item	Qty.	Tag No.	Range PSIG / BAR	Oper. Pressure PSIG (BarG) OPER.	MAX.	Service	MANUFACTURER Model NO.
A	1	PG-61133	0 to 590	336	351	PROPYLENE GAS	
		PUMP DISCHARGE	0 to 40	23.2	24.2	& SYNTHETIC OIL	
B	1	PG-61134	0 to 590	336	351	PROPYLENE GAS	
		PUMP DISCHARGE	0 to 40	23.2	24.2	& SYNTHETIC OIL	
C	1	PG-61142	0 to 590	270	351	PROPYLENE GAS	
		RECEIVER	0 to 40	18.6	24.2	& SYNTHETIC OIL	
D	1	PG-61111	0 to 60	23	26	PROPYLENE GAS	
		SUCTION	0 to 4	1.6	1.8	& SYNTHETIC OIL	
E	1	PG-61121	0 to 60	23	26	PROPYLENE GAS	
		SUCTION	0 to 4	1.6	1.8	& SYNTHETIC OIL	
F	1	PG-61113	0 to 590	305	335	PROPYLENE GAS	
		OIL SUPPLY	0 to 40	21.0	23.1	& SYNTHETIC OIL	
G	1	PG-61123	0 to 590	305	335	PROPYLENE GAS	
		OIL SUPPLY	0 to 40	21.0	23.1	& SYNTHETIC OIL	
H							
J							
K	1	PG-61131	0 to 590	276	303	PROPYLENE GAS	WIKA
		DISCHARGE	0 to 40	19.0	20.9	& SYNTHETIC OIL	233.50
L							
M							
N							
O							

Notes:

1 SYSTEM DESIGN PRESSURE & TEMPERATURE:
FV to 362.5 PSIG 25.0 BarG @ 250 °F 121 °C FOR ITEMS: 3
-45 °F -43 °C
FV to 406 PSIG 28.0 BarG @ 250 °F 121 °C FOR ITEMS: 1, 2
-20 °F -29 °C

2 WETTED MATERIAL IS 316 STAINLESS STEEL
3 INSTRUMENT SHALL BE SUITABLE FOR MARINE, SALT LADEN, CORROSIVE ENVIRONMENT
4 CALIBRATION CERTIFICATE [x] REQUIRED [ ] NOT REQUIRED
5 CERTIFICATE OF COMPLIANCE [x] REQUIRED [ ] NOT REQUIRED
6 CUSTOMER SPECIFICATION: N/A & N/A
7 MECHANICAL OVERPRESSURE PROTECTION IS REQUIRED
8 MATERIAL SHALL BE PER APPROVED VENDOR LIST. DEVIATION FROM "AVL" IS NOT ALLOWED.
9 ALL DOCUMENTS TO BE SUBMITTED IN BOTH HARD AND ELECTRONIC FORMAT
10 GAUGE OPERATING TEMPERATURE RATING OF 100 C IS ACCEPTBLE AS THE OIL SYSTEM WILL NOT REACG 100C.
11 INGRESS PROTECTION: IP65
12 SCALE PRINTED IN BLACK ON WHITE BACKGROUND
13 REFER TO P&ID AND VALVE DATA SHEETS FOR MANIFOLD VALVE INFORMATION.

PRESSURE TRANSMITTER

CONTROL DEVICES

CLIENT DOC.: *VD-GPIC-MA-3029-3029-0038*

ULT DOC: *ULT003- 20103 A*

NO.	BY	APP	DATE	DESCRIPTION
0	FAD	IMA	05/09/25	FOR QUOTATION & APPROVAL
1	FAD	IMA	11/24/2025	FOR QUOTATION & APPROVAL

CLIENT: DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACKAGE

GENERAL	1	Tag No.	**SEE TABLE BELOW** — Service: **See Table Below**
	2	Qty	
	3	Function	Record [ ] Indicate [X] Control [X] VIA MCS Blind [ ] Trans [X] Other
	4	Case	Mfr. Std. [x] Nom. Size Color : [ ] Other **NOTE 2**
	5	Mounting	Flush [ ] Surface [ ] Yoke [x] Other
	6	Enclosure Class	Gen. Purpose [ ] Weather Proof [ ] Explosion Proof [ ]
			Use in intrinsically [X] **EExia** Safe System [ ] Other [X] **IIB-T5 - ZONE 1, CL1**
	7	Power Supply	117V 60 Hz [ ] Other ac [ ] DC [X] Volts **24 V**
	8	Chart **N/A**	Strip [ ] Roll [ ] Fold [ ] Circular [ ] Time Marks [ ]
			Range Number
	9	Chart Drive **N/A**	Speed Power
	10	Scales	Type: **LCD / DIGITAL (UNITS per NOTE 15)**
			Range **SEE TABLE BELOW**
XMTR	11	Transmitter Output	4-20 mA [X] **NOTE 9** 10-50mA [ ] 21-103 kPa (3-15 psig) [ ] Other
			For Receiver, see spec sheet. **WIRED TO UCP VIA JUNCTION BOXES (2 WIRE OUTPUT)** **NOTE 9**
CONTROLLER	12	Control Modes	P = Prop (Gain), 1-Integral (Auto Reset), D = Derivative (Rate)
VIA UCP			Sub: s = slow, f = fast, If [ ] Df [ ] P [X] PID [ ] PD [ ] PI [ ] Is [ ] Ds [ ]
			Other
	14	Action	On Measurement Increase, Output: Increases [ ] Decreases [ ]
	15	Auto-Man Switch	None [ ] MFR Std [ ] Other [x] **NOTE 21**
	16	Set Point Adj.	Manual [ ] External [ ] Remote [X] **UCP** Other **NOTE 9**
	17	Manual Reg.	None [ ] MFR Std [ ] Other
	18	Output	4-20 mA [ ] **NOTE 9** 10-50 mA [ ] 21-103 kPa (3-15 psig) [ ] Other
ELEMENT	19	Service	Gage Press [X] Vacuum [ ] Absolute [ ] Compound [ ]
	20	Element Type	Diaphragm [ ] Helix [ ] Bourdon [ ] Bellows [ ] Other **NOTE 19**
	21	Material (body)	316SS [X] Ber Copper [ ] Other [ ]
	22	Range	Fixed [ ] Adj. Range [X]
			Overrange Protection to: **SEE TABLE BELOW**
	23	Process Data	Press.: Nor.: **SEE TABLE BELOW** MAX.: Element Range:
	24	Process Conn.	1/4" in NPT [ ] 1/2" in NPT (F) [X] Other: **1/2" CONDUIT CONNECTION**
			Location: Bottom: [X] Back [ ] Other
	25	Alarm Switches	Quantity: **BY UCP** **REFER TO SETPOINT LIST** Form Rating
VIA UCP	26	Function	Press. [X] Deviation [ ] Contacts On Incr. Meas.
OPTIONS	27	Options	Filter Reg. [ ] Sup. Gage [ ] Output Gage [ ] Charts
			Diaphragm Seal [ ] Type **N/A** Diaphragm Bot. Bowl
			Conn. Capillary: **N/A** Length Mtl.
			Other **ELECTRICAL GROUND SCREW REQUIRED**
AREA CLASSIFICATION			**IEC** [X] **ZONE 2, EExia IIB-T3** **IP-65 / NEMA4X** Agency Approval: **ATEX**

Item	Qty	Tag No.	Pressure PSIG - *BarG* Range	Over	Operating Press. PSIG / *BarG* Min	Max	Calibration mA PSIG / *BarG* 4	20	Manufacturer/ (Note 16) Model no.	Service
A	1	PT-61111	-14.7 to 290	580	*22.5*	*25.9*	0.00	250	WIKA	PROPYLENE &
		SUCTION	*-1.01 to 20.0*	*40.0*	*1.55*	*1.76*	*0.0*	*17.2*		SYNTHETIC OIL
B	1	PT-61113	-14.7 to 580	1160	*304.6*	*343.3*	0.00	580	WIKA	PROPYLENE &
		OIL SUPPLY	*-1.01 to 40.0*	*80.0*	*21.0*	*23.7*	*0.0*	*40.0*		SYNTHETIC OIL
C										
D										
AA	1	PT-61121	-14.7 to 290	580	*22.5*	*25.9*	0.00	250	WIKA	PROPYLENE &
		SUCTION	*-1.01 to 20.0*	*40.0*	*1.55*	*1.76*	*0.0*	*17.2*		SYNTHETIC OIL
BB	1	PT-61123	-14.7 to 580	1160	*304.6*	*256.1*	0.00	580	WIKA	PROPYLENE &
		OIL SUPPLY	*-1.01 to 40.0*	*80.0*	*21.0*	*17.7*	*0.0*	*40.0*		SYNTHETIC OIL
CC	1									
DD	1	PT-61141	-14.7 to 580	1160	*85.5*	*289.1*	0.00	580	WIKA	PROPYLENE &
		ECONOMIZER	*-1.01 to 40.0*	*80.0*	*5.90*	*19.9*	*0.0*	*40.0*		SYNTHETIC OIL

DELTA PROCESS EQUIPMENT GmbH

PRESSURE TRANSMITTER

CONTROL DEVICES

CLIENT DOC.: VD-GPIC-MA-3029-3029-0038

ULT DOC: ULT003- 20103 A

CLIENT:	DELTA	0
P.O. NO.:	GPIC DD MA REQ 000 3029	
PROJECT:	---	
JOB NO.:	ULT003-	
SERVICE:	PROPYLENE REFERIGERATION PACKAGE	

NO.	BY	APP	DATE	DESCRIPTION
0	FAD	IMA	05/09/25	FOR QUOTATION & APPROVAL
1	FAD	IMA	11/24/2025	FOR QUOTATION & APPROVAL

Notes:

1 SYSTEM DESIGN PRESSURE & TEMPERATURE: FV to 362.5 PSIG 25.0 BarG @ 250 °F 121 °C FOR ITEMS: 1, 2
-45 °F -43 °C
FV to 406 PSIG 28.0 BarG @ 250 °F 121 °C FOR ITEMS: 3
-20 °F -29 °C

2 TRANSMITTER ELECTRICAL HOUSING MUST BE POLYURETHANE COVERED ALUMINUM

3 REFERENCE ACCURACY: +/- 0.1 % OF FULL SCALE & +/- 0.15 % GUARRANTEED STABILITY OVER FIVE YEARS

4 INSTRUMENT SHALL BE SUITABLE FOR MARINE, SALT LADEN, CORROSIVE ENVIRONMENT

5 CALIBRATION CERTIFICATE ☒ REQUIRED ☐ NOT REQUIRED

6 HARD COPY OF *IEC-79, EExia IIB-T5* CERTIFICATE ☒ REQUIRED ☐ NOT REQUIRED PER IEC 60079

7 CUSTOMER SPECIFICATION: N/A , N/A & N/A

8 ELECTRICAL CLASS CERTIFICATION SHALL BE SHOWN ON ALUMINUM DIE-CASTING HOUSING STAMPED USING STAINLESS STEEL TAG PERMANENTLY ATTACHED TO THE DEVICE

9 HART COMMUNICATION SHALL BE SUITABLE OVER RANGE OF APPLICATION

10 AUSTENSIC 316 SS BOLTS REQUIRED

12 MOUNTING BRACKET FOR 2-IN PIPE BY VENDOR (AGCO)

13 LCD METER WITH POLYURETHANE COVERED ALUMINUM COVER REQUIRED

14 ALL DOCUMENTS TO BE SUBMITTED IN BOTH HARD AND ELECTRONIC FORMAT

15 INDICATOR TO SHOW BARG

16 MATERIAL SHALL BE PER APPROVED VENDOR LIST. MANUFACTURER LISTED ABOVE IS FOR REFERENCE.

17 ELECTRICAL CONNECTION: M20 ~~1/2" NPT~~

18 REQUIRED ASSEMBLY AS PER BELOW PICTURE WITH 2-WAY MANIFOLD OR ISOLATION VALVE

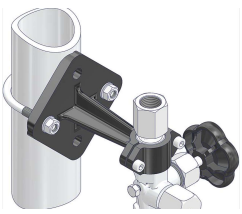
19 TRANSMITTERS ARE SUPPLIED WITH THIN FILM TYPE PIEZORESISTIVE SENSORS

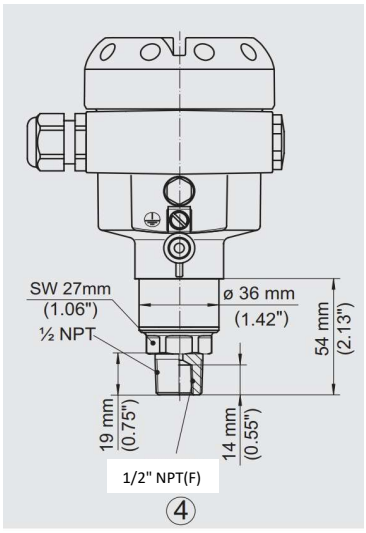
20 SENSOR FILLING: PAG SYNTHETIC OIL

21 REFER TO CONTROL NARRATIVE AND SET POINT LIST FOR THE CONTROLLER ACTION

22 HOUSING SHALL BE SELECTED TO SHOW TRANSMITTER LCD AT 90 DEGREE FROM INLET AS SHOWN BELOW.

23 REFER TO P&ID AND VALVE DATA SHEETS FOR 2-WAY MANIFOLD VALVE INFORMATION.





DELTA GmbH PROCESS EQUIPMENT

PRESSURE TRANSMITTER

INDICATOR DEVICES

CLIENT DOC.: *VD-GPIC-MA-3029-3029-0038*

ULT DOC: *ULT003- 20103 A*

NO.	BY	APP	DATE	DESCRIPTION
0	FAD	IMA	05/09/25	FOR QUOTATION & APPROVAL
1	FAD	IMA	11/24/2025	FOR QUOTATION & APPROVAL

CLIENT: DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACKAGE

GENERAL	1	Tag No.	**SEE TABLE BELOW** Service: **See Table Below**
	2	Qty	
	3	Function	Record ☐ Indicate ☒ Control ☐ VIA MCS Blind ☐ Trans ☒ Other
	4	Case	Mfr. Std. ☒ Nom. Size Color : ☐ Other **NOTE 2**
	5	Mounting	Flush ☐ Surface ☐ Yoke ☒ Other
	6	Enclosure Class	Gen. Purpose ☐ Weather Proof ☐ Explosion Proof ☐
			Use in intrinsically ☒ **EExia** Safe System ☐ Other ☒ **IIB-T5 - ZONE 1, CL1**
	7	Power Supply	117V 60 Hz ☐ Other ac ☐ DC ☒ Volts **24 V**
	8	Chart **N/A**	Strip ☐ Roll ☐ Fold ☐ Circular ☐ Time Marks ☐
			Range Number
	9	Chart Drive **N/A**	Speed Power
	10	Scales	Type: **LCD / DIGITAL (UNITS per NOTE 15)**
			Range **SEE TABLE BELOW**
XMTR	11	Transmitter Output	4-20 mA ☒ **NOTE 9** 10-50mA ☐ 21-103 kPa (3-15 psig) ☐ Other
			For Receiver, see spec sheet. **WIRED TO UCP VIA JUNCTION BOXES (2 WIRE OUTPUT)** **NOTE 9**
CONTROLLER	12	Control Modes	P = Prop (Gain), 1-Integral (Auto Reset), D = Derivative (Rate)
VIA UCP			Sub: s = slow, f = fast, If ☐ Df ☐ P ☐ PID ☐ PD ☐ PI ☐ Is ☐ Ds ☐
			Other
	14	Action	On Measurement Increase, Output: Increases ☐ Decreases ☐
	15	Auto-Man Switch	None ☐ MFR Std ☐ Other ☒ **NOTE 21**
	16	Set Point Adj.	Manual ☐ External ☐ Remote ☒ **UCP** Other **NOTE 9**
	17	Manual Reg.	None ☐ MFR Std ☐ Other
	18	Output	4-20 mA ☐ **NOTE 9** 10-50 mA ☐ 21-103 kPa (3-15 psig) ☐ Other
ELEMENT	19	Service	Gage Press ☒ Vacuum ☐ Absolute ☐ Compound ☐
	20	Element Type	Diaphragm ☐ Helix ☐ Bourdon ☐ Bellows ☐ Other **NOTE 19**
	21	Material (body)	316SS ☒ Ber Copper ☐ Other ☐
	22	Range	Fixed ☐ Adj. Range ☒
			Overrange Protection to: **SEE TABLE BELOW**
	23	Process Data	Press.: Nor.: **SEE TABLE BELOW** MAX.: Element Range:
	24	Process Conn.	1/4" in NPT ☐ 1/2" in NPT (F) ☒ Other: **1/2" CONDUIT CONNECTION**
			Location: Bottom: ☒ Back ☐ Other
	25	Alarm Switches	Quantity: **BY UCP** **REFER TO SETPOINT LIST** Form Rating
VIA UCP	26	Function	Press. ☒ Deviation ☐ Contacts On Icr. Meas.
OPTIONS	27	Options	Filter Reg. ☐ Sup. Gage ☐ Output Gage ☐ Charts
			Diaphragm Seal ☐ Type **N/A** Diaphragm Bot. Bowl
			Conn. Capillary: **N/A** Length Mtl.
			Other **ELECTRICAL GROUND SCREW REQUIRED**
AREA CLASSIFICATION			**IEC** ☒ **ZONE 2, EExia IIB-T3** **IP-65 / NEMA4X** Agency Approval: **ATEX**

Item	Qty	Tag No.	Pressure PSIG - *BarG* Range	Over	Operating Press. PSIG / *BarG* Min	Max	Calibration mA PSIG / *BarG* 4	20	Manufacturer/ (Note 16) Model no.	Service
A	1	PT-61131	-14.7 to 580	1160	*275.6*	*303.1*	0.00	580	WIKA	PROPYLENE &
		SEPARATOR	*-1.01 to 40.0*	*80.0*	*19.0*	*20.6*	*0.0*	*40.0*		SYNTHETIC OIL
B	1	PT-61132	-14.7 to 580	1160	*275.6*	*303.1*	0.00	580	WIKA	PROPYLENE &
		COALESCER	*-1.01 to 40.0*	*80.0*	*19.0*	*20.9*	*0.0*	*40.0*		SYNTHETIC OIL
C	1	PT-61133	-14.7 to 580	1160	*329.0*	*361.8*	0.00	580	WIKA	PROPYLENE &
		OIL FILTER	*-1.01 to 40.0*	*80.0*	*22.7*	*25.0*	*0.0*	*40.0*		SYNTHETIC OIL
D	1	PT-61134	-14.7 to 580	1160	*290.1*	*319.1*	0.00	580	WIKA	PROPYLENE &
		OIL FILTER	*-1.01 to 40.0*	*80.0*	*20.0*	*22.0*	*0.0*	*40.0*		SYNTHETIC OIL

DELTA PROCESS EQUIPMENT	PRESSURE TRANSMITTER				CLIENT DOC.:	VD-GPIC-MA-3029-3029-0038
	INDICATOR DEVICES				ULT DOC:	*ULT003- 20103 A*
	NO.	BY	APP	DATE	DESCRIPTION	
CLIENT: DELTA 0	0	FAD	IMA	05/09/25	FOR QUOTATION & APPROVAL	
P.O. NO.: GPIC DD MA REQ 000 3029	1	FAD	IMA	11/24/2025	FOR QUOTATION & APPROVAL	
PROJECT: ---						
JOB NO.: ULT003-						
SERVICE: PROPYLENE REFERIGERATION PACKAGE						

Notes:

1 SYSTEM DESIGN PRESSURE & TEMPERATURE: FV to 362.5 PSIG 25.0 BarG @ 250 °F 121 °C FOR ITEMS: 1, 2
-45 °F -43 °C
FV to 406 PSIG 28.0 BarG @ 250 °F 121 °C FOR ITEMS: 3
-20 °F -29 °C

2 TRANSMITTER ELECTRICAL HOUSING MUST BE POLYURETHANE COVERED ALUMINUM

3 REFERENCE ACCURACY: +/- 0.1 % OF FULL SCALE & +/- 0.15 % GUARRANTEED STABILITY OVER FIVE YEARS

4 INSTRUMENT SHALL BE SUITABLE FOR MARINE, SALT LADEN, CORROSIVE ENVIRONMENT

5 CALIBRATION CERTIFICATE ☒ REQUIRED ☐ NOT REQUIRED

6 HARD COPY OF *IEC-79, EExia IIB-T5* CERTIFICATE ☒ REQUIRED ☐ NOT REQUIRED PER IEC 60079

7 CUSTOMER SPECIFICATION: N/A , N/A & N/A

8 ELECTRICAL CLASS CERTIFICATION SHALL BE SHOWN ON ALUMINUM DIE-CASTING HOUSING STAMPED USING STAINLESS STEEL TAG PERMANENTLY ATTACHED TO THE DEVICE

9 HART COMMUNICATION SHALL BE SUITABLE OVER RANGE OF APPLICATION

10 AUSTENSIC 316 SS BOLTS REQUIRED

12 MOUNTING BRACKET FOR 2-IN PIPE BY VENDOR (AGCO)

13 LCD METER WITH POLYURETHANE COVERED ALUMINUM COVER REQUIRED

14 ALL DOCUMENTS TO BE SUBMITTED IN BOTH HARD AND ELECTRONIC FORMAT

15 INDICATOR TO SHOW BARG

16 MATERIAL SHALL BE PER APPROVED VENDOR LIST. MANUFACTURER LISTED ABOVE IS FOR REFERENCE.

17 ELECTRICAL CONNECTION: M20 ~~1/2" NPT~~

18 REQUIRED ASSEMBLY AS PER BELOW PICTURE WITH 2-WAY MANIFOLD OR ISOLATION VALVE

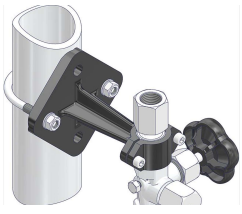
19 TRANSMITTERS ARE SUPPLIED WITH THIN FILM TYPE PIEZORESISTIVE SENSORS

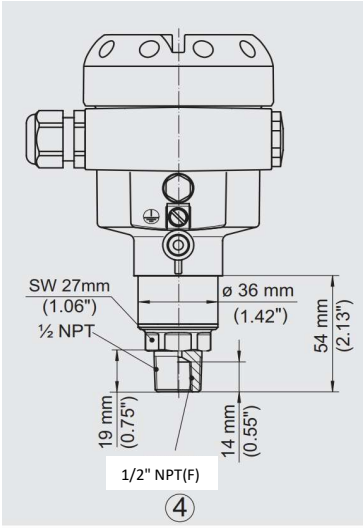
20 SENSOR FILLING: PAG SYNTHETIC OIL

21 REFER TO CONTROL NARRATIVE AND SET POINT LIST FOR THE CONTROLLER ACTION

22 HOUSING SHALL BE SELECTED TO SHOW TRANSMITTER LCD AT 90 DEGREE FROM INLET AS SHOWN BELOW.

23 REFER TO P&ID AND VALVE DATA SHEETS FOR 2-WAY MANIFOLD VALVE INFORMATION.





DELTA GmbH PROCESS EQUIPMENT

INDUSTRIAL BIMETAL & GLASS THERMOMETER

CLIENT DOC.: *VD-GPIC-MA-3029-3029-0038*

ILT DOC: *ULT003- 20107 A*

REV	BY	APP	DATE	DESCRIPTION
0	FAD	IMA	05/09/25	FOR APPROVAL

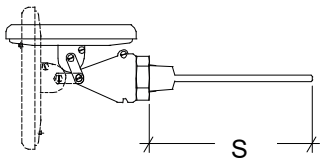
CLIENT: DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACKAGE

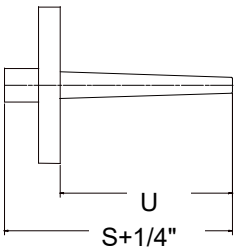
THERMOMETER

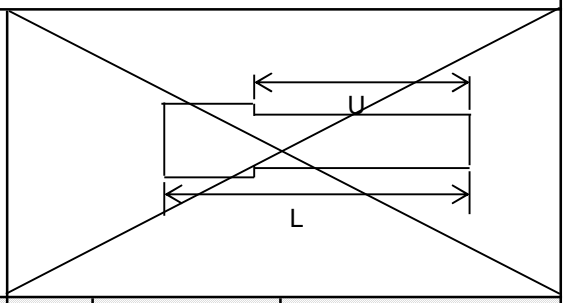
1. Stem: Threaded [x] Plain [ ] Union [ ]
   Material: STAINLESS STEEL Type:
2. Stem or Union Thread: 1/2" [x] 3/4" [ ]
3. Stem Diameter: Std [ ] 1/4" [x] 3/8" in. [ ]
4. Case Material: Std [ ] Others [x] 316SS
5. Dial Size: 6" in (150 mm) Color: WHITE
6. Scale: SEE BELOW Color: BLACK
7. Form: Adjustable [x]
8. External Calibrator [x] Hermetically Sealed Case [x]
9. MFR. & Model No. WIKA OR EQUAL & SEE TABLE BELOW

WELL

10. None [ ] Included [x] By others [ ]
11. Material: 304SS [ ] 316SS [x]
    Other: [ ]
13. Construction: Drilled [ ] Built-up [x]
    Other: FLANGED TAPERED SHANK FROM SOLID BAR STOCK
14. MFR. & Model ASHCROFT & SEE TABLE BELOW
15. Connection: SEE TABLE BELOW







Item	Qty	Tag No.	Range °F (°C)	Oper. Temp. °F (°C)	Stem Depth (S)	Well Conn. / Inst. Con.	Lag Ext.	Insert (U)	Service	Model Number Sensor/Well
A	1	TG-61141 RECEIVER	-4 to 212 / -20 to 100	117.716 / 47.62	14 " / 355.6	1-1/2"- 300# / 1/2" NPT	-	12 / 304.8	PROPYLENE (RECEIVER VESSEL)	
B	1	TG-61131 OIL SEPARATOR	-4 to 212 / -20 to 100	171.86 / 77.7	14 " / 355.6	1-1/2"- 300# / 1/2"NPT	-	12 / 304.8	SYNTHETIC OIL (OIL SEPARATOR)	
C	1	TG-61132 OIL SUPPLY	-4 to 212 / -20 to 100	122 / 50	7.67" / 195	1-1/2"- 300# / 1/2"NPT	-	5.7 / 145	SYNTHETIC OIL (OIL HEADER)	
D										
E										
F										
G										

Notes:

1 SYSTEM DESIGN PRESSURE & TEMPERATURE: FV to 362.5 PSIG 25.0 BarG @ 250 °F 121 °C FOR ITEMS: 1
-45 °F -43 °C

2 WETTED MATERIAL IS 316 STAINLESS STEEL

3 ACCURACY: +/- 1 % FULL SPAN

4 INSTRUMENT SHALL BE SUITABLE FOR MARINE, SALT LADEN, CORROSIVE ENVIRONMENT

5 CALIBRATION CERTIFICATE [x] REQUIRED [ ] NOT REQUIRED

6 CERTIFICATE OF COMPLIANCE [x] REQUIRED [ ] NOT REQUIRED

7 HERMETIC SEAL REQUIRED

8 CUSTOMER SPECIFICATION: &

9 ALL DOCUMENTS TO BE SUBMITTED IN BOTH HARD AND ELECTRONIC FORMAT

10 DUAL SCALE IS REQUIRED

11 MATERIAL SHALL BE PER APPROVED VENDOR LIST. DEVIATION FROM "AVL" IS NOT ALLOWED.

12 THERMOWELL SHALL BE FULL PENETRATION WELD

13 THERMOWELL NATURAL FREQUENCE CALCULATION REQUIRED

DELTA GmbH
PROCESS EQUIPMENT

TEMPERATURE TRANSMITTER

CONTROL DEVICES

CLIENT DOC.: *VD-GPIC-MA-3029-3029-0038*

ULT DOC: *ULT003- 20109 A*

NO.	BY	APP	DATE	DESCRIPTION
0	SES	IES	05/09/25	FOR APPROVAL
1	FAD	IMA	11/24/2025	FOR QUOTATION & APPROVAL

CLIENT: DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACK

GENERAL	1	Tag No.	SEE TABLE BELOW — Service: SEE TABLE BELOW
	2	Function	Record ☐ Indicate ☒ Control ☒ Blind ☐ Trans ☒ Other
	3	Case	MFR. Std. ☐ Nom ☐ Nom. Size — Color: MFR. Std ☐ Other NOTE 2
	4	Mounting	Flush ☐ Surface ☐ Yoke ☒ Other RACK MOUNT
	5	Enclosure Class	Gen. Purpose ☐ Weather Proof ☐ Explosion Proof ☐
			Use in intrinsically ☒ EExia Safe System ☐ Other ☒ IIB-T5 - ZONE 2, CL1
	6	Power Supply	117V 60 Hz ☐ Other ac DC ☒ Volts 24 V
	7	Chart N/A	Strip ☐ Roll ☐ Fold ☐ Circular ☐ Time marks ☐
	8	Chart Drive	Speed — Power
	9	Scale N/A	Type: — Range:
XMTR	10	Output NOTE 12	4-20 mA ☒ 10-50mA ☐ 21-103 kPa (3-15 psig) ☐ Other
			For Receiver, see spec sheet. WIRED TO UCP VIA JUNCTION BOXES (2 WIRE OUTPUT) NOTE 12
CONTROLLER VIA PLC	11	Control Modes	P = Prop (Gain _, 1-Integral (Auto Reset), D = Derivative (Rate)
			Sub: s = slow, f = fast, If ☐ Df ☐ P ☐ PI ☐ PD ☒ PID ☐ Is ☐ Ds ☐
			Other
	12	Action	On Measurement Increase, Output: Increases ☐ Decreases ☐
	13	Auto-Man Switch	None ☐ MFR Std ☐ Other ☒ NOTE 18
	14	Set Point Adj.	Manual ☐ External ☐ Remote ☒ UCP Other NOTE 12
	15	Manual Reg.	None ☐ MFR Std ☐ Other
	16	Output	4-20 mA ☐ 10-50mA ☐ 21-103 kPa (3-15 psig) ☐ Other
ELEMENT	17	Fill	SAMA Class — Compensation
	18	Process Data	SEE TABLE BELOW — Compensation
	19	Range	Fixed ☐ Adj. Range ☐ Set @ SEE BELOW
			Overrange Protection to: — Electrical Connection: M20 ~~1/2" NPT~~
	20	Bulb	Type: RTD-Pt-100 α = 0.00385 — Sheath Material: 316 S.S W/ MINERAL INSULATION
			Size: SEE TABLE BELOW Diameter: 1/4" Number of Wires: 3 WIRES (DUAL) NOTE 15
	21		
	22		
	23	Alarm Switches	Quantity: — Form — Rating
VIA UCP	24	Function	Temp. ☒ Deviation ☐ Contacts to On Temp. Incr.
	25	Options	Filter Reg. ☐ Sup Gage ☐ Output Gage ☐ Charts ☐
	26		Other:
AREA CLASS.	27		IEC ☒ ZONE 2, EExia IIB-T3 IP-65 / NEMA4X Agency Approval: ATEX

TRANSMITTER

Item	Qty	Tag No.	Temperature °F / °C Range	Temperature °F / °C Oper.	Oper. Press. PSIG *BARG* Min.	Oper. Press. PSIG *BARG* Max.	Calibration (mA) °F / °C 4	Calibration (mA) °F / °C 20	Manufacturer / Model No.	Service
A	1	TT-61141	-328 to 1562	45.77	*85.5*	*96.4*	-58	212	WIKA TIF50-I-	HYDROCARBON GAS &
		ECONOMIZER	*-200 to 850*	*7.65*	*5.90*	*6.6*	*-50*	*100*		SYNTHETIC OIL
B										
C										
D										
E										

DELTA GmbH PROCESS EQUIPMENT

TEMPERATURE TRANSMITTER

CONTROL DEVICES

CLIENT DOC.: *VD-GPIC-MA-3029-3029-0038*

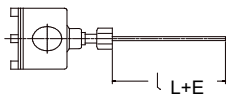
ULT DOC: *ULT003- 20109 A*

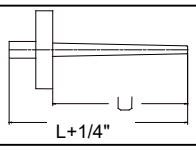
NO.	BY	APP	DATE	DESCRIPTION
0	SES	IES	05/09/25	FOR APPROVAL
1	FAD	IMA	11/24/2025	FOR QUOTATION & APPROVAL

CLIENT: DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACK

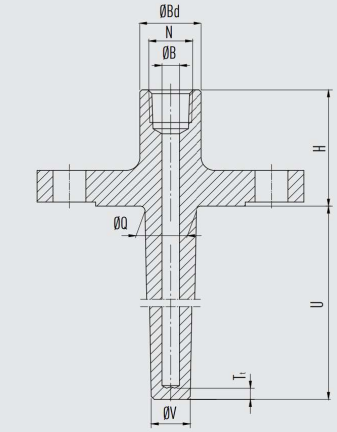
SENSOR WITH THERMOWELL

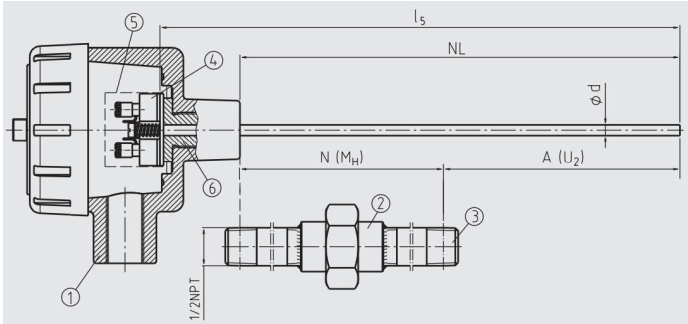
Item	Qty	Tag No.	Range °F (°C)	Oper. Temp. °F (°C)	LG (L) = (U+H) IN (mm)	Well Conn. Proc./Inst.	EXT. (N)	Ins (U) IN (mm)	LAG (H)	Well Type	Head Mtg	Model Number Sensor/Well
A	1	TE-61141	-148 to 842	45.8	10 "	1-1/2"- 300# RF	3.0 "	4.0 "	3.0	TAPERED	YES	WIKA
		INLET	-100 to 450	7.65	254 mm	1/2" NPT	76.2	101.6	76.2	NOTE 20		TW10-F-
B												
C												
D												
E												





Design TW10-W





DELTA GmbH PROCESS EQUIPMENT		**TEMPERATURE TRANSMITTER**				CLIENT DOC.:	*VD-GPIC-MA-3029-3029-0038*
		CONTROL DEVICES				ULT DOC:	*ULT003- 20109 A*
		NO.	**BY**	**APP**	**DATE**	**DESCRIPTION**	
CLIENT:	**DELTA** 0	0	SES	IES	05/09/25	FOR APPROVAL	
P.O. NO.:	**GPIC DD MA REQ 000 3029**	1	FAD	IMA	11/24/2025	FOR QUOTATION & APPROVAL	
PROJECT:	**---**						
JOB NO.:	**ULT003-**						
SERVICE:	**PROPYLENE REFERIGERATION PACK**						

Notes:

1 **SYSTEM DESIGN PRESSURE & TEMPERATURE:** FV to 362.5 PSIG 25.0 BarG @ 250 °F 121 °C FOR ITEMS: 1
-45 °F -43 °C
FV to 406 PSIG 28.0 BarG @ 250 °F 121 °C FOR ITEMS:
-20 °F -29 °C

2 TRANSMITTER AND SENSOR ELECTRICAL HOUSING MUST BE POLYURETHANE COVERED DIE ALUMINUM-HOUSING, THERMOWELL IS 316 STAINLESS STEEL

3 **REFERENCE ACCURACY:** +/- 0.075 **% OF FULL SCALE & +/- 0.15 % GUARRANTEED STABILITY OVER FIVE YEARS**

4 **INSTRUMENT SHALL BE SUITABLE FOR MARINE, SALT LADEN, CORROSIVE ENVIRONMENT**

5 **CALIBRATION CERTIFICATE** ☒ **REQUIRED** ☐ **NOT REQUIRED**

6 **HARD COPY OF** *IIEC-79, EExia IIB-T5* **CERTIFICATE** ☒ **REQUIRED** ☐ **NOT REQUIRED** PER IEC 60079

7 **CUSTOMER SPECIFICATION:** N/A & N/A

8 ELECTRICAL CLASS CERTIFICATION SHALL BE SHOWN ON ALUMINUM DIE-CASTING HOUSING STAMPED USING STAINLESS STEEL TAG PERMANENTLY ATTACHED TO THE DEVICE

9 ALL DOCUMENTS TO BE SUBMITTED IN BOTH HARD AND ELECTRONIC FORMAT

10 TERMINAL HEAD TO BE ASSEMBLIED WITH THERMOWELL USING A UNION

11 EXTENSION SECTION OF 3 INCHES (76.2 mm) TO INCLUDE NIPPLE AND UNION

12 "SMART" ELECTRONIC TRANSMITTERS WITH "HART PROTOCOL" COMMUNICATION SHALL BE SUITABLE OVER RANGE OF APPLICATION

13 EACH TEMPERATURE TRANSMITTER SHALL INCLUDE A MOUNTING BRACKET FOR 2-IN PIPE RACK

14 INDICATOR TO SHOW °C

15 MATERIAL SHALL BE PER APPROVED VENDOR LIST. MANUFACTURER LISTED ABOVE IS FOR REFERENCE.

15 BOTH RTD ELEMENTS ARE WIRED AND TERMINATED IN TERMINAL HEAD ~~OR TRANSMITTER~~

16 REQUIRED ASSEMBLY AS PER BELOW PICTURES WITH A UNION. ELEMENT LENGTH SHALL BE ADJUSTED FOR THE UNION USE.

17 RTD TO BE TERMINATED IN THE TERMINAL HEAD, AND TRANSMITTER TO BE INSTALLED REMOTELY

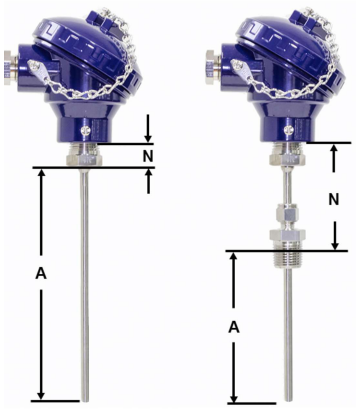
18 REFER TO CONTROL NARRATIVE AND SET POINT LIST FOR THE CONTROLLER ACTION

19 THERMOWELL NATURAL FREQUENCE CALCULATION REQUIRED

20 THERMOWELL MATERIAL SHALL BE 316SS

THERMOWELL & HEAD

REMOTE TRANSMITTER WITH ELECTRONIC DISPLAY



A = U + H

DELTA GmbH PROCESS EQUIPMENT

TEMPERATURE TRANSMITTER

INDICATOR DEVICES

CLIENT DOC.: *VD-GPIC-MA-3029-3029-0038*

ULT DOC: *ULT003- 20109 B*

NO.	BY	APP	DATE	DESCRIPTION
0	SES	IES	05/09/25	FOR APPROVAL
1	FAD	IMA	11/24/2025	FOR QUOTATION & APPROVAL

CLIENT: DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACK

GENERAL	1	Tag No.	SEE TABLE BELOW — Service: SEE TABLE BELOW
	2	Function	Record ☐ Indicate ☒ Control ☐ Blind ☐ Trans ☒ Other
	3	Case	MFR. Std. ☐ Nom ☐ Nom. Size Color: MFR. Std ☐ Other NOTE 2
	4	Mounting	Flush ☐ Surface ☐ Yoke ☒ Other RACK MOUNT
	5	Enclosure Class	Gen. Purpose ☐ Weather Proof ☐ Explosion Proof ☐
			Use in intrinsically ☒ EExia Safe System ☐ Other ☒ IIB-T5 - ZONE 2, CL1
	6	Power Supply	117V 60 Hz ☐ Other ac DC ☒ Volts 24 V
	7	Chart N/A	Strip ☐ Roll ☐ Fold ☐ Circular ☐ Time marks ☐
	8	Chart Drive	Speed Power
	9	Scale N/A	Type: Range:
XMTR	10	Output NOTE 12	4-20 mA ☒ 10-50mA ☐ 21-103 kPa (3-15 psig) ☐ Other
			For Receiver, see spec sheet. WIRED TO UCP VIA JUNCTION BOXES (2 WIRE OUTPUT) NOTE 12
CONTROLLER VIA N/A	11	Control Modes	P = Prop (Gain _, 1-Integral (Auto Reset), D = Derivative (Rate)
			Sub: s = slow, f = fast, If ☐ Df ☐ P ☐ PI ☐ PD ☐ PID ☐ Is ☐ Ds ☐
			Other
	12	Action	On Measurement Increase, Output: Increases ☐ Decreases ☐
	13	Auto-Man Switch	None ☐ MFR Std ☐ Other
	14	Set Point Adj.	Manual ☐ External ☐ Remote ☒ UCP Other NOTE 12
	15	Manual Reg.	None ☐ MFR Std ☐ Other
	16	Output	4-20 mA ☐ 10-50mA ☐ 21-103 kPa (3-15 psig) ☐ Other
ELEMENT	17	Fill	SAMA Class Compensation
	18	Process Data	SEE TABLE BELOW Compensation
	19	Range	Fixed ☐ Adj. Range ☐ Set @ SEE BELOW
			Overrange Protection to: **Electrical** Connection: M20 ~~1/2" NPT~~
	20	Bulb	Type: RTD-Pt-100 α = 0.00385 Sheath Material: 316 S.S W/ MINERAL INSULATION
			Size: SEE TABLE BELOW Diameter: 1/4" Number of Wires: 3 WIRES (DUAL) NOTE 15
	21		
	22		
	23	Alarm Switches	Quantity: Form Rating
VIA UCP	24	Function	Temp. ☒ Deviation ☐ Contacts to On Temp. Incr.
	25	Options	Filter Reg. ☐ Sup Gage ☐ Output Gage ☐ Charts ☐
	26		Other:
AREA CLASS.	27		IEC ☒ ZONE 2, EExia IIB-T3 IP-65 / NEMA4X Agency Approval: ATEX

TRANSMITTER

Item	Qty	Tag No.	Temperature °F / °C Range	Temperature °F / °C Oper.	Oper. Press. PSIG *BARG* Min.	Oper. Press. PSIG *BARG* Max.	Calibration (mA) °F / °C 4	Calibration (mA) °F / °C 20	Manufacturer / Model No.	Service
A	1	TT-61121	-328 to 1562	-12.44	*22.5*	*24.8*	-58	212	WIKA TIF50-I-	HYDROCARBON GAS &
		SUCTION	*-200 to 850*	*-24.69*	*1.55*	*1.69*	*-50*	*100*		SYNTHETIC OIL
B										
C										
D										
E										

DELTA GmbH
PROCESS EQUIPMENT

TEMPERATURE TRANSMITTER

INDICATOR DEVICES

CLIENT DOC.: *VD-GPIC-MA-3029-3029-0038*

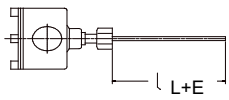
ULT DOC: *ULT003- 20109 B*

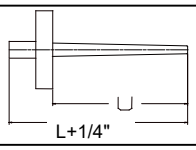
NO.	BY	APP	DATE	DESCRIPTION
0	SES	IES	05/09/25	FOR APPROVAL
1	FAD	IMA	11/24/2025	FOR QUOTATION & APPROVAL

CLIENT: DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACK

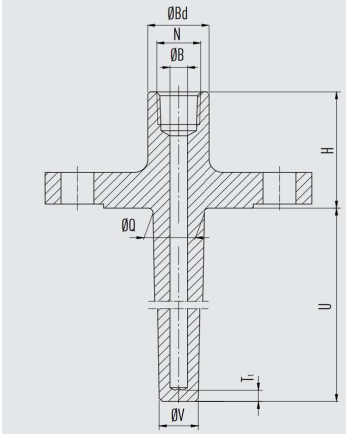
SENSOR WITH THERMOWELL

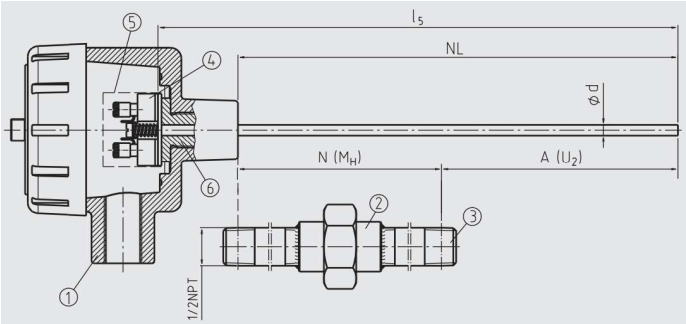
Item	Qty	Tag No.	Range °F (°C)	Oper. Temp. °F (°C)	LG (L) = (U+H) IN (mm)	Well Conn. Proc./Inst.	EXT. (N)	Ins (U) IN (mm)	LAG (H)	Well Type	Head Mtg	Model Number Sensor/Well
A	1	TE-61121	-148 to 842	-12.4	18 "	1-1/2"- 300# RF	3.0 "	12.0 "	3.0	TAPERED	YES	WIKA
		INLET	-100 to 450	-24.69	457 mm	1/2" NPT	76.2	304.8	76.2	NOTE 20		TW10-F-
B												
C												
D												
E												





Design TW10-W





DELTA GmbH PROCESS EQUIPMENT

TEMPERATURE TRANSMITTER

INDICATOR DEVICES

CLIENT DOC.: *VD-GPIC-MA-3029-3029-0038*

ULT DOC: *ULT003- 20109 B*

CLIENT:	DELTA	0
P.O. NO.:	GPIC DD MA REQ 000 3029	
PROJECT:	---	
JOB NO.:	ULT003-	
SERVICE:	PROPYLENE REFERIGERATION PACK	

NO.	BY	APP	DATE	DESCRIPTION
0	SES	IES	05/09/25	FOR APPROVAL
1	FAD	IMA	11/24/2025	FOR QUOTATION & APPROVAL

Notes:

1 SYSTEM DESIGN PRESSURE & TEMPERATURE: FV to 362.5 PSIG 25.0 BarG @ 250 °F 121 °C FOR ITEMS: 1
-45 °F -43 °C
FV to 406 PSIG 28.0 BarG @ 250 °F 121 °C FOR ITEMS:
-20 °F -29 °C

2 TRANSMITTER AND SENSOR ELECTRICAL HOUSING MUST BE POLYURETHANE COVERED DIE ALUMINUM-HOUSING, THERMOWELL IS 316 STAINLESS STEEL

3 REFERENCE ACCURACY: +/- 0.075 % OF FULL SCALE & +/- 0.15 % GUARRANTEED STABILITY OVER FIVE YEARS

4 INSTRUMENT SHALL BE SUITABLE FOR MARINE, SALT LADEN, CORROSIVE ENVIRONMENT

5 CALIBRATION CERTIFICATE [x] REQUIRED [ ] NOT REQUIRED

6 HARD COPY OF *IIEC-79, EExia IIB-T5* CERTIFICATE [x] REQUIRED [ ] NOT REQUIRED PER IEC 60079

7 CUSTOMER SPECIFICATION: N/A & N/A

8 ELECTRICAL CLASS CERTIFICATION SHALL BE SHOWN ON ALUMINUM DIE-CASTING HOUSING STAMPED USING STAINLESS STEEL TAG PERMANENTLY ATTACHED TO THE DEVICE

9 ALL DOCUMENTS TO BE SUBMITTED IN BOTH HARD AND ELECTRONIC FORMAT

10 TERMINAL HEAD TO BE ASSEMBLIED WITH THERMOWELL USING A UNION

11 EXTENSION SECTION OF 3 INCHES (76.2 mm) TO INCLUDE NIPPLE AND UNION

12 "SMART" ELECTRONIC TRANSMITTERS WITH "HART PROTOCOL" COMMUNICATION SHALL BE SUITABLE OVER RANGE OF APPLICATION

13 EACH TEMPERATURE TRANSMITTER SHALL INCLUDE A MOUNTING BRACKET FOR 2-IN PIPE RACK

14 INDICATOR TO SHOW °C

15 MATERIAL SHALL BE PER APPROVED VENDOR LIST. MANUFACTURER LISTED ABOVE IS FOR REFERENCE.

15 BOTH RTD ELEMENTS ARE WIRED AND TERMINATED IN TERMINAL HEAD ~~OR TRANSMITTER~~

16 REQUIRED ASSEMBLY AS PER BELOW PICTURES WITH A UNION. ELEMENT LENGTH SHALL BE ADJUSTED FOR THE UNION USE.

17 RTD TO BE TERMINATED IN THE TERMINAL HEAD, AND TRANSMITTER TO BE INSTALLED REMOTELY

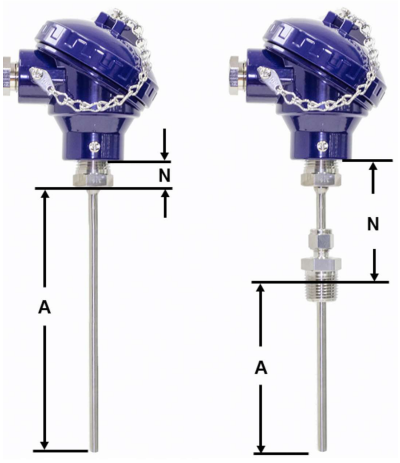
18 REFER TO CONTROL NARRATIVE AND SET POINT LIST FOR THE CONTROLLER ACTION

19 THERMOWELL NATURAL FREQUENCE CALCULATION REQUIRED

20 THERMOWELL MATERIAL SHALL BE 316SS

THERMOWELL & HEAD

REMOTE TRANSMITTER WITH ELECTRONIC DISPLAY



A = U + H

DELTA GmbH PROCESS EQUIPMENT

TEMPERATURE TRANSMITTER

INDICATOR DEVICES

CLIENT DOC.: *VD-GPIC-MA-3029-3029-0038*

ULT DOC: *ULT003- 20109 B*

NO.	BY	APP	DATE	DESCRIPTION
0	SES	IES	05/09/25	FOR APPROVAL
1	FAD	IMA	11/24/2025	FOR QUOTATION & APPROVAL

CLIENT: DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACK

GENERAL	1	Tag No.	SEE TABLE BELOW — Service: SEE TABLE BELOW
	2	Function	Record ☐ Indicate ☒ Control ☐ Blind ☐ Trans ☒ Other
	3	Case	MFR. Std. ☐ Nom ☐ Nom. Size — Color: MFR. Std ☐ Other NOTE 2
	4	Mounting	Flush ☐ Surface ☐ Yoke ☒ Other RACK MOUNT
	5	Enclosure Class	Gen. Purpose ☐ Weather Proof ☐ Explosion Proof ☐
			Use in intrinsically ☒ EExia Safe System ☐ Other ☒ IIB-T5 - ZONE 2, CL1
	6	Power Supply	117V 60 Hz ☐ Other ac DC ☒ Volts 24 V
	7	Chart N/A	Strip ☐ Roll ☐ Fold ☐ Circular ☐ Time marks ☐
	8	Chart Drive	Speed — Power
	9	Scale N/A	Type: — Range:
XMTR	10	Output NOTE 12	4-20 mA ☒ 10-50mA ☐ 21-103 kPa (3-15 psig) ☐ Other
			For Receiver, see spec sheet. WIRED TO UCP VIA JUNCTION BOXES (2 WIRE OUTPUT) NOTE 12
CONTROLLER VIA N/A	11	Control Modes	P = Prop (Gain _, 1-Integral (Auto Reset), D = Derivative (Rate)
			Sub: s = slow, f = fast, If ☐ Df ☐ P ☐ PI ☐ PD ☐ PID ☐ Is ☐ Ds ☐
			Other
	12	Action	On Measurement Increase, Output: Increases ☐ Decreases ☐
	13	Auto-Man Switch	None ☐ MFR Std ☐ Other
	14	Set Point Adj.	Manual ☐ External ☐ Remote ☒ UCP Other NOTE 12
	15	Manual Reg.	None ☐ MFR Std ☐ Other
	16	Output	4-20 mA ☐ 10-50mA ☐ 21-103 kPa (3-15 psig) ☐ Other
ELEMENT	17	Fill	SAMA Class — Compensation
	18	Process Data	SEE TABLE BELOW — Compensation
	19	Range	Fixed ☐ Adj. Range ☐ Set @ SEE BELOW
			Overrange Protection to: — Electrical Connection: M20 ~~1/2" NPT~~
	20	Bulb	Type: RTD-Pt-100 α = 0.00385 — Sheath Material: 316 S.S W/ MINERAL INSULATION
			Size: SEE TABLE BELOW Diameter: 1/4" Number of Wires: 3 WIRES (DUAL) NOTE 15
	21		
	22		
	23	Alarm Switches	Quantity: — Form — Rating
VIA UCP	24	Function	Temp. ☒ Deviation ☐ Contacts to On Temp. Incr.
	25	Options	Filter Reg. ☐ Sup Gage ☐ Output Gage ☐ Charts ☐
	26		Other:
AREA CLASS.	27		IEC ☒ ZONE 2, EExia IIB-T3 IP-65 / NEMA4X Agency Approval: ATEX

TRANSMITTER

Item	Qty	Tag No.	Temperature °F / °C Range	Oper.	Oper. Press. PSIG BARG Min.	Max.	Calibration (mA) °F / °C 4	20	Manufacturer / Model No.	Service
A	1	TT-61111	-328 to 1562	-12.44	22.5	24.8	-58	212	WIKA TIF50-I-	HYDROCARBON GAS &
		SUCTION	-200 to 850	-24.69	1.55	1.69	-50	100		SYNTHETIC OIL
B		TT-61132	-328 to 1562	120	304.6	335.0	-58	212	WIKA TIF50-I-I	HYDROCARBON GAS &
		OIL SUPPLY	-200 to 850	48.89	21.0	22.8	-50	100		SYNTHETIC OIL
C										
D		TT-61131	-328 to 1562	171.86	275.6	310.6	-58	212	WIKA TIF50-I-	HYDROCARBON GAS &
		OIL SEPARATOR	-200 to 850	77.70	19.0	21.1	-50	100		SYNTHETIC OIL
E										

DELTA GmbH PROCESS EQUIPMENT

TEMPERATURE TRANSMITTER

INDICATOR DEVICES

CLIENT DOC.: *VD-GPIC-MA-3029-3029-0038*

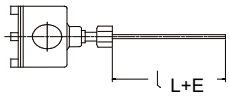
ULT DOC: *ULT003- 20109 B*

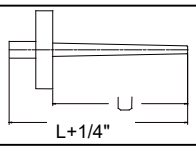
NO.	BY	APP	DATE	DESCRIPTION
0	SES	IES	05/09/25	FOR APPROVAL
1	FAD	IMA	11/24/2025	FOR QUOTATION & APPROVAL

CLIENT: DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACK

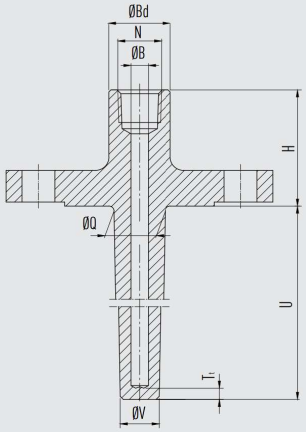
SENSOR WITH THERMOWELL

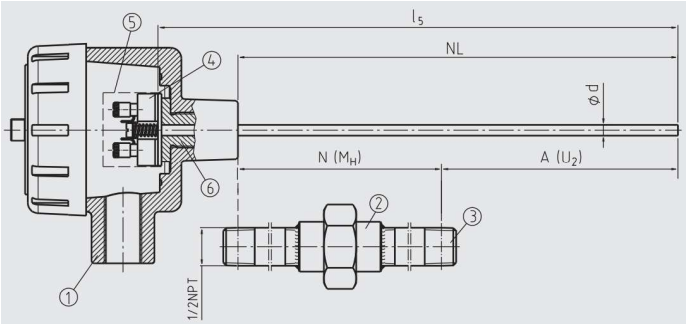
Item	Qty	Tag No.	Range °F (°C)	Oper. Temp. °F (°C)	LG (L) = (U+H) IN (mm)	Well Conn. Proc./Inst.	EXT. (N)	Ins (U) IN (mm)	LAG (H)	Well Type	Head Mtg	Model Number Sensor/Well
A	1	TE-61111 INLET	-148 to 842 -100 to 450	-12.4 -24.69	18 " 457 mm	1-1/2"- 300# RF 1/2" NPT	3.0 " 76.2	12.0 " 304.8	3.0 76.2	TAPERED NOTE 20	YES	WIKA TW10-F-
B		TE--61132 OIL SUPPLY	-148 to 842 -100 to 450	120.0 50	12 " 305 mm	1-1/2"- 300# RF 1/2" NPT	3.0 " 76.2	6.0 " 152.4	3.0 76.2	TAPERED NOTE 20	YES	WIKA TW10-F-
C												
D		TE-61131 OIL SEPARATOR	-148 to 842 -100 to 450	171.9 77.70	24 " 610 mm	1-1/2"- 300# RF 1/2" NPT	3.0 " 76.2	18.0 " 457.2	3.0 76.2	TAPERED NOTE 20	YES	WIKA TW10-F
E												





Design TW10-W





TEMPERATURE TRANSMITTER

INDICATOR DEVICES

CLIENT DOC.: *VD-GPIC-MA-3029-3029-0038*

ULT DOC: *ULT003- 20109 B*

NO.	BY	APP	DATE	DESCRIPTION
0	SES	IES	05/09/25	FOR APPROVAL
1	FAD	IMA	11/24/2025	FOR QUOTATION & APPROVAL

CLIENT:	DELTA	0
P.O. NO.:	GPIC DD MA REQ 000 3029	
PROJECT:	---	
JOB NO.:	ULT003-	
SERVICE:	PROPYLENE REFERIGERATION PACK	

Notes:

1 SYSTEM DESIGN PRESSURE & TEMPERATURE: FV to 362.5 PSIG 25.0 BarG @ 250 °F 121 °C FOR ITEMS: 1, 3
-45 °F -43 °C
FV to 406 PSIG 28.0 BarG @ 250 °F 121 °C FOR ITEMS: 2
-20 °F -29 °C

2 TRANSMITTER AND SENSOR ELECTRICAL HOUSING MUST BE POLYURETHANE COVERED DIE ALUMINUM-HOUSING, THERMOWELL IS 316 STAINLESS STEEL

3 REFERENCE ACCURACY: +/- 0.075 % OF FULL SCALE & +/- 0.15 % GUARRANTEED STABILITY OVER FIVE YEARS

4 INSTRUMENT SHALL BE SUITABLE FOR MARINE, SALT LADEN, CORROSIVE ENVIRONMENT

5 CALIBRATION CERTIFICATE [X] REQUIRED [ ] NOT REQUIRED

6 HARD COPY OF *IIEC-79, EExia IIB-T5* CERTIFICATE [X] REQUIRED [ ] NOT REQUIRED PER IEC 60079

7 CUSTOMER SPECIFICATION: N/A & N/A

8 ELECTRICAL CLASS CERTIFICATION SHALL BE SHOWN ON ALUMINUM DIE-CASTING HOUSING STAMPED USING STAINLESS STEEL TAG PERMANENTLY ATTACHED TO THE DEVICE

9 ALL DOCUMENTS TO BE SUBMITTED IN BOTH HARD AND ELECTRONIC FORMAT

10 TERMINAL HEAD TO BE ASSEMBLIED WITH THERMOWELL USING A UNION

11 EXTENSION SECTION OF 3 INCHES (76.2 mm) TO INCLUDE NIPPLE AND UNION

12 "SMART" ELECTRONIC TRANSMITTERS WITH "HART PROTOCOL" COMMUNICATION SHALL BE SUITABLE OVER RANGE OF APPLICATION

13 EACH TEMPERATURE TRANSMITTER SHALL INCLUDE A MOUNTING BRACKET FOR 2-IN PIPE RACK

14 INDICATOR TO SHOW °C

15 MATERIAL SHALL BE PER APPROVED VENDOR LIST. MANUFACTURER LISTED ABOVE IS FOR REFERENCE.

15 BOTH RTD ELEMENTS ARE WIRED AND TERMINATED IN TERMINAL HEAD ~~OR TRANSMITTER~~

16 REQUIRED ASSEMBLY AS PER BELOW PICTURES WITH A UNION. ELEMENT LENGTH SHALL BE ADJUSTED FOR THE UNION USE.

17 RTD TO BE TERMINATED IN THE TERMINAL HEAD, AND TRANSMITTER TO BE INSTALLED REMOTELY

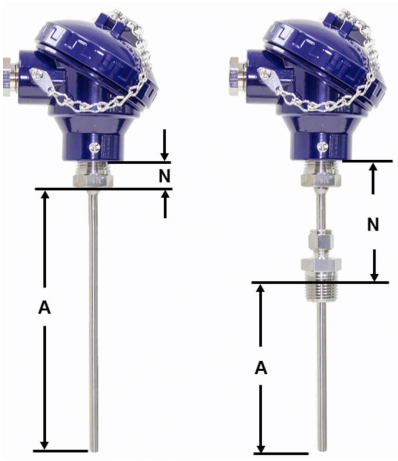
18 REFER TO CONTROL NARRATIVE AND SET POINT LIST FOR THE CONTROLLER ACTION

19 THERMOWELL NATURAL FREQUENCE CALCULATION REQUIRED

20 THERMOWELL MATERIAL SHALL BE 316SS

THERMOWELL & HEAD

REMOTE TRANSMITTER WITH ELECTRONIC DISPLAY



A = U + H

DELTA GmbH PROCESS EQUIPMENT

GAUGES

GLASSES & COCKS

CLIENT DOC.: *VD-GPIC-MA-3029-3029-0038*

ULT DOC: *ULT003- 20110 A*

NO.	BY	APP	DATE	DESCRIPTION
0	FAD	IMA	14/9/2025	FOR APPROVAL
1	FAD	IMA	11/24/2025	FOR CONSTRUCTION

CLIENT: DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACKAGE

1. Gage Column [x] Cocks [x]
   Assembled w/ Nipples [x] Unassemled [x]

GAGE CLASSES

2. Type: Reflex [x] Transparent [ ] Tubular [ ]
   Large Chamber [ ] Weld Pad [ ]
3. Conn. Size & Type [x] 2"-300# ANSI RF FLG
   Top & Bottom [x] Side [ ] Back [ ]
   Vent [ ] Drain [ ]
4. Material: Body / Cover LT C.S. (SA350-LF2) *OR SS*
   Glass Borosilicate (TEMPERED)
5. Min. Rating SEE NOTES BELOW
6. Options. Illuminator [ ] Mica Shield [ ]
   Internal Tube [ ] External Jkt. [ ]
   Non Frost [ ] External Length [ ]
   Calb. Scale [ ] Other [ ]
7. Manufacturer & Model: EMKOMETER (SEE TABULATION)

GAGE COCKS

8. Type: Offset [x] Straight [ ]
9. Conn. Vessel [x] 2"-300# Gage [x] 1/2" Vent / Drain [x] 1/2" W/VALVES
10. Mat: Body: S.S. A182 Trim: 316 SS
11. Min. Rating: 507.5 PSIG @ 300 °F
12. Construction: INTEGRAL BALL-CHECK / UNION
13. Type of Conn.: Vessel: NPT (M) UNION CONNECTOR
    Gage: NPT (F) UNION CONNECTOR
    Vent / Drain: NPT (F)
    Other: DIRECT MOUNT
14. Bonnet: PACKING NUT / TEFLON PACKING
15. Options: Ball Checks [x] Renewal Seats [x]
    Other: RENEWAL SEATS
16. Manufacturer & Model: OTHERS
17. Bolting Material: A193-L7 / A194-7

Item	Qty.	Tag No.	Visible Glass "V"	CONNECTION CENTER TO CENTER "X"	Model No.	Operating Pressure PSIG (BarG)	Operating Temp. °F (°C)	Service
A	1	LG-61141 RECEIVER HEADER	36.0 " 914 mm	36.0 " 914 mm	L21SR/1219.2/A2"300lbR F/N/Ex	268.4 18.5	117.3 47.4	PROPYLENE REFRIGERANT & SYNTHETIC OIL
B								
B								

DELTA GmbH
PROCESS EQUIPMENT

GAUGES

GLASSES & COCKS

CLIENT DOC.: *VD-GPIC-MA-3029-3029-0038*

ULT DOC: *ULT003- 20110 A*

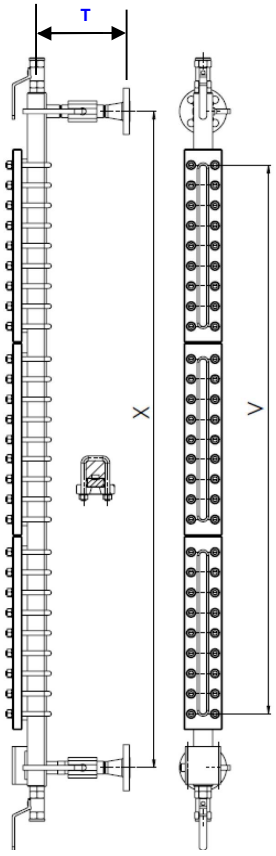
NO.	BY	APP	DATE	DESCRIPTION
0	FAD	IMA	14/9/2025	FOR APPROVAL
1	FAD	IMA	11/24/2025	FOR CONSTRUCTION

CLIENT:	DELTA 0
P.O. NO.:	GPIC DD MA REQ 000 3029
PROJECT:	---
JOB NO.:	ULT003-
SERVICE:	PROPYLENE REFERIGERATION PACKAGE

NOTES:

1. SYSTEM DESIGN PRESSURE & TEMPERATURE: FV to 362.5 PSIG *25.0* BarG @ 250 °F *121* °C
   -45 °F *-43* °C
2. WETTED MATERIAL IS 316L STAINLESS STEEL
3. MATERIAL TEST REPORT TO INCLUDE CHARPY IMPACT TEST PER ASME & ASTM CODES
4. INSTRUMENT SHALL BE SUITABLE FOR ON-SHORE SERVICE
5. CALIBRATION CERTIFICATE ☐ REQUIRED ☒ NOT REQUIRED
6. CERTIFICATE OF COMPLIANCE ☒ REQUIRED ☐ NOT REQUIRED
7. 316SS NAMEPLATE ☒ REQUIRED ☐ NOT REQUIRED
8. CUSTOMER SPECIFICATION: N/A & N/A
9. ~~WHERE APPLICABLE, PMI REQUIRED PER SPECIFICATION~~
10. PAINTING PER CLIENT SPECIFICATION
11. C TO C DISTA 48 inches *1,219.2 mm*
12. VENT AND DRAIN CONNECTION SHALL BE SUPPLIED WITH BALL VALVES

REQUIREMENTS



T = MFR STD

X = 48.00 in
1219.2 mm

V = 36.00 in MAX
914.4 mm

U = MFR STD
AS SHORT AS POSSIBLE

DELTA GmbH PROCESS EQUIPMENT

LEVEL TRANSMITTER

CONTROL DEVICES

CLIENT DOC.:	*VD-GPIC-MA-3029-3029-0038*
ULT DOC:	*ULT003- 20112 A*

NO.	BY	APP	DATE	DESCRIPTION
0	FAD	IMA	09/14/25	FOR QUOTATION & APPROVAL

CLIENT: DELTA **0**
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACKAGE

GENERAL	1	Tag No.	SEE TABLE BELOW — Service: SEE TABLE BELOW
	2	Qty	
	3	Function	Record ☐ Indicate ☒ Control ☒ VIA MCS Blind ☐ Trans ☒ Other
	4	Case	Mfr. Std. ☒ Nom. Size Color : ☐ Other **NOTE 2**
	5	Mounting	Flush ☐ Surface ☒ Yoke ☐ Other
	6	Enclosure Class	Gen. Purpose ☐ Weather Proof ☐ Explosion Proof ☐
			Use in intrinsically ☒ EExia Safe System ☐ Other ☒ **IIB-T5 - ZONE 2, CL1**
	7	Power Supply	117V 60 Hz ☒ Other ac ☐ DC ☒ Volts **24 V**
	8	Chart **N/A**	Strip ☐ Roll ☐ Fold ☐ Circular ☐ Time Marks ☐
			Range Number
	9	Chart Drive **N/A**	Speed Power
	10	Scales	Type: **LCD / DIGITAL**
			Range **SEE TABLE BELOW**
XMTR	11	Transmitter Output	4-20 mA ☒ 10-50mA ☐ 21-103 kPa (3-15 psig) ☐ Other
			For Receiver, see spec sheet. **WIRED TO UCP VIA JUNCTION BOXES (2 WIRE OUTPUT)** **NOTE 18**
CONTROLLER VIA UCP	12	Control Modes	P = Prop (Gain), 1-Integral (Auto Reset), D = Derivative (Rate)
			Sub: s = slow, f = fast, If ☐ Df ☐ P ☐ PI ☐ PD ☐ PID ☒ Is ☐ Ds ☐
			Other
	14	Action	On Measurement Increase, Output: Increases ☐ Decreases ☐
	15	Auto-Man Switch	None ☐ MFR Std ☐ Other
	16	Set Point Adj.	Manual ☐ External ☐ Remote ☐ Other
	17	Manual Reg.	None ☐ MFR Std ☐ Other
	18	Output **NOTE 18**	4-20 mA ☒ 10-50 mA ☐ 21-103 kPa (3-15 psig) ☐ Other
ELEMENT	19	Service	Gage Press ☐ Vacuum ☐ Absolute ☐ Differential ☒
	20	Element Type	Diaphragm ☒ Helix ☐ Bourdon ☐ Bellows ☐ Other
	21	Material (body)	316SS ☒ Ber Copper ☐ Other ☐
	22	Range	Fixed ☐ Adj. Range ☒
			Overrange Protection to: **SEE TABLE BELOW** **Electrical** Connection: **M20 ~~1/2" NPT~~**
	23	Process Data	Press.: Nor.: **SEE TABLE BELOW** MAX.: Element Range:
	24	Process Conn.	1/4" in NPT ☐ 1/2" in NPT (F) ☒ Other: **2"-300# ANSI RF FLG**
			Location: Bottom: ☒ Back ☐ Other
	25	Alarm Switches	Quantity: Form Rating
	26	Function	Press. ☒ Deviation ☐ Contacts On Icr. Meas.
OPTIONS	27	Options	Filter Reg. ☐ Sup. Gage ☐ Output Gage ☐ Charts
			Diaphragm Seal ☐ Type **N/A** Diaphragm Bot. Bowl
			Conn. Capillary: **N/A** Length Mtl.
			Other
AREA CLASSIFICATION			IEC ☒ **ZONE 2, EExia IIB-T3** **IP-65 / NEMA4X** Agency Approval: **ATEX**

Item	Qty	Tag No.	Pressure in (mm) Range	Over	Operating Pressure PSIG / *BarG* Min	Max	Calibration mA *in (mm)* NOTE 23 4	20	Manufacturer/ Model no.	Service
A	**1**	**LT-61151**	**0.00 to 120.9**	**2000**	**22.5**	**25.9**	**0**	**111.4**	**WIKA**	**PROPYLENE REFRIGERANT**
		CHILLER	***0 to 3,071***	***137.9***	***1.55***	***1.79***	***0.00***	***2,830.5***	**CHAMBER:**	
							0%	***100%***	**BNA-**	**SYNTHETIC OIL**
									TRANSMITTER:	
									BLM-	
B										
C										

DELTA GmbH PROCESS EQUIPMENT

LEVEL TRANSMITTER

CONTROL DEVICES

CLIENT DOC.: VD-GPIC-MA-3029-3029-0038

ULT DOC: ULT003- 20112 A

NO.	BY	APP	DATE	DESCRIPTION
0	FAD	IMA	09/14/25	FOR QUOTATION & APPROVAL

CLIENT: DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACKAGE

Notes:

1 SYSTEM DESIGN PRESSURE & TEMPERATURE: FV to 362.5 PSIG 25.0 BarG @ 250 °F 121 °C
-45 °F -43 °C

2 NORMAL OPERATING CONDITIONS ARE: 22.5 PSIG 1.55 BarG @ -10.9 °F -23.82 °C

3 TRANSMITTER ELECTRICAL HOUSING MUST BE POLYURETHANE COVERED ALUMINUM

4 REFERENCE ACCURACY: +/- 0.1 % OF FULL SCALE & +/- 0.15 % GUARRANTEED STABILITY OVER FIVE YEARS

5 INSTRUMENT SHALL BE SUITABLE FOR MARINE, SALT LADEN, CORROSIVE ENVIRONMENT

6 CALIBRATION CERTIFICATE ☒ REQUIRED ☐ NOT REQUIRED

7 HARD COPY OF *IIEC-79, EExia IIB-T5* CERTIFICATE ☒ REQUIRED ☐ NOT REQUIRED PER IEC 60079

8 MATERIAL TEST REPORT ☒ REQUIRED ☐ NOT REQUIRED

9 CUSTOMER SPECIFICATION: N/A , N/A & N/A

10 ALL DOCUMENTS TO BE SUBMITTED IN BOTH HARD AND ELECTRONIC FORMAT

11 INDICATOR TO SHOW PERCENTAGE

12 AUSTENSIC 316 SS BOLTS REQUIRED

13 NAMEPLATE TO BE MOUNTED TO TOP FLANGE

14 HIGH PRESSURE SIDE, ~~REMOTE MOUNT SEAL,~~ PROCESS CONNECTION IS 2"-300# ANSI RF FLG.

15 LIQUID DENSITY : 36.05 LB/FT3 *579 KG/M3*

16 LOW PRESSURE SIDE, PROCESS CONNECTION 2"-300# ANSI RF FLG

17 LCD METER WITH POLYURETHANE COVERED ALUMINUM COVER REQUIRED

18 "SMART" ELECTRONIC TRANSMITTERS WITH "HART PROTOCOL" COMMUNICATION SHALL BE SUITABLE OVER RANGE OF APPLICATION

19 ELECTRICAL CLASS CERTIFICATION SHALL BE SHOWN ON A DIE-STAMPED STAINLESS STEEL TAG PERMANENTLY ATTACHED TO THE

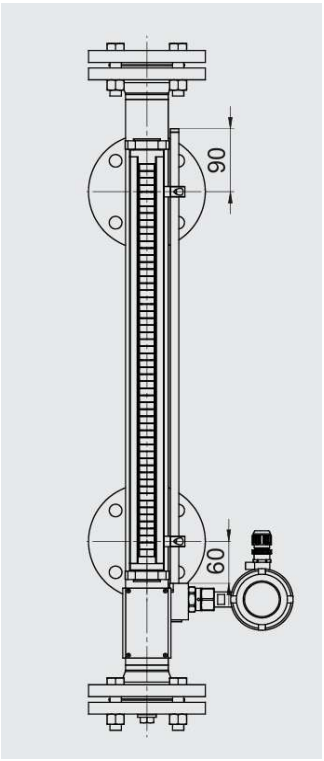
20 DEVICE ELECTRICAL CONNECTION: M20

21 REFRIGERANT IS PROPYLENE WITH OPERATING CONDITIONS SHOWN IN TABULATION

22 C to C DISTANCE BETWEEN NOZZLES THAT COVERS THE TRANSMITTER CALIBRATION RANGE IS: 111.44 inches *2,830.5*

23 IT IS THE RESPONSIBILITY OF THE SUPPLIER TO ASSURE THAT THE FLOATS FIT INSIDE THE CHAMBER *mm*

24 TRANSMITTER ORIENTATION SHALL AS PER SHOWN PER BELOW SNAPSHOT CALLED "ACTUAL DESIGN"



REQUIREMENTS

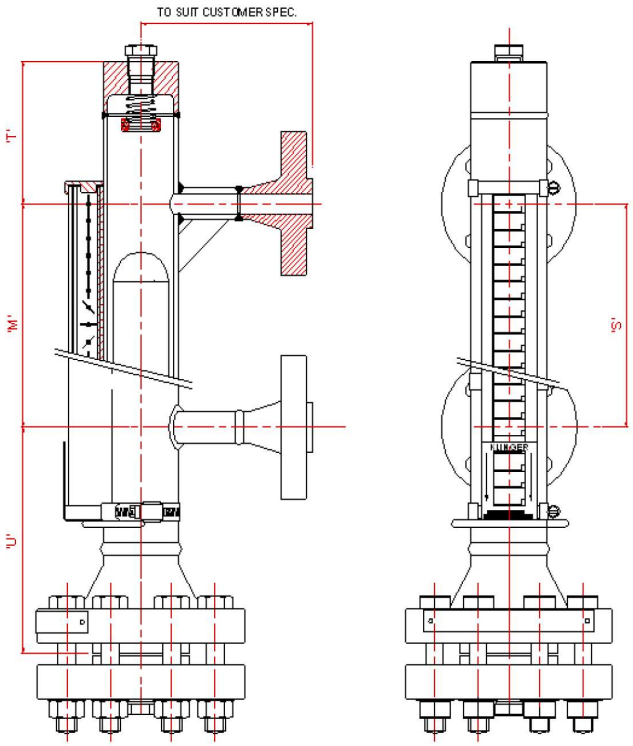
X = 11.5 in
292.1 mm

T = MFR STD

M = 111.44 in
2,830.5 mm

U = MFR STD
AS SHORT AS POSSIBLE

Z = 1 in
25.4 mm



DELTA GmbH PROCESS EQUIPMENT

LEVEL TRANSMITTER

INDICATOR DEVICES

CLIENT DOC.: *VD-GPIC-MA-3029-3029-0038*

ULT DOC: *ULT003- 20112 B*

NO.	BY	APP	DATE	DESCRIPTION
0	FAD	IMA	09/14/25	FOR QUOTATION & APPROVAL

CLIENT: DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACKAGE

GENERAL	1	Tag No.	SEE TABLE BELOW — Service: SEE TABLE BELOW
	2	Qty	
	3	Function	Record ☐ Indicate ☒ Control ☐ VIA MCS Blind ☐ Trans ☒ Other
	4	Case	Mfr. Std. ☒ Nom. Size Color : ☐ Other NOTE 2
	5	Mounting	Flush ☐ Surface ☒ Yoke ☐ Other
	6	Enclosure Class	Gen. Purpose ☐ Weather Proof ☐ Explosion Proof ☐
			Use in intrinsically ☒ Safe System ☐ Other ☒ IIB-T5 - ZONE 2, CL1
	7	Power Supply	117V 60 Hz ☒ Other ac ☐ DC ☒ Volts 24 V
	8	Chart N/A	Strip ☐ Roll ☐ Fold ☐ Circular ☐ Time Marks ☐
			Range Number
	9	Chart Drive N/A	Speed Power
	10	Scales	Type: LCD / DIGITAL
			Range SEE TABLE BELOW
XMTR	11	Transmitter Output	4-20 mA ☒ 10-50mA ☐ 21-103 kPa (3-15 psig) ☐ Other
			For Receiver, see spec sheet. WIRED TO UCP VIA JUNCTION BOXES (2 WIRE OUTPUT) NOTE 18
CONTROLLER VIA N/A	12	Control Modes	P = Prop (Gain), 1-Integral (Auto Reset), D = Derivative (Rate)
			Sub: s = slow, f = fast, If ☐ Df ☐ P ☐ PI ☐ PD ☐ PID ☐ Is ☐ Ds ☐
			Other
	14	Action	On Measurement Increase, Output: Increases ☐ Decreases ☐
	15	Auto-Man Switch	None ☐ MFR Std ☐ Other
	16	Set Point Adj.	Manual ☐ External ☐ Remote ☐ Other
	17	Manual Reg.	None ☐ MFR Std ☐ Other
	18	Output NOTE 18	4-20 mA ☐ 10-50 mA ☐ 21-103 kPa (3-15 psig) ☐ Other
ELEMENT	19	Service	Gage Press ☐ Vacuum ☐ Absolute ☐ Differential ☒
	20	Element Type	Diaphragm ☒ Helix ☐ Bourdon ☐ Bellows ☐ Other
	21	Material (body)	316SS ☒ Ber Copper ☐ Other ☐
	22	Range	Fixed ☐ Adj. Range ☐ X
			Overrange Protection to: SEE TABLE BELOW **Electrical** Connection: M20 ~~1/2" NPT~~
	23	Process Data	Press.: Nor.: SEE TABLE BELOW MAX.: Element Range:
	24	Process Conn.	1/4" in NPT ☐ 1/2" in NPT (F) ☒ Other: 2"-300# ANSI RF FLG
			Location: Bottom: ☒ Back ☐ Other
	25	Alarm Switches	Quantity: Form Rating
	26	Function	Press. ☒ Deviation ☐ Contacts On Icr. Meas.
OPTIONS	27	Options	Filter Reg. ☐ Sup. Gage ☐ Output Gage ☐ Charts
			Diaphragm Seal ☐ Type N/A Diaphragm Bot. Bowl
			Conn. Capillary: N/A Length Mtl.
			Other
AREA CLASSIFICATION			IEC ☒ ZONE 2, EExia IIB-T3 IP-65 / NEMA4X Agency Approval: ATEX

Item	Qty	Tag No.	Pressure in (mm) Range	Over	Operating Pressure PSIG / *BarG* Min	Max	Calibration mA *in (mm)* NOTE 23 4	20	Manufacturer/ Model no.	Service
A	1	LT-61131	0.00 to 57.4	2000	*275.6*	*289.1*	0	48.0	WIKA	NATURAL GAS &
		OIL SEPARATOR	*0 to 1,459*	*137.9*	*19.0*	*19.9*	*0.00*	*1,214.4*	CHAMBER: BNA-	SYNTHETIC OIL
							0%	*100%*	TRANSMITTER: BLM-	
B										
C										

DELTA GmbH
PROCESS EQUIPMENT

LEVEL TRANSMITTER

INDICATOR DEVICES

CLIENT DOC.: *VD-GPIC-MA-3029-3029-0038*

ULT DOC: *ULT003- 20112 B*

NO.	BY	APP	DATE	DESCRIPTION
0	FAD	IMA	09/14/25	FOR QUOTATION & APPROVAL

CLIENT: DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACKAGE

Notes:

1 SYSTEM DESIGN PRESSURE & TEMPERATURE: FV to 362.5 PSIG 25.0 BarG @ 250 °F 121 °C
-49 °F -45 °C

2 NORMAL OPERATING CONDITIONS ARE: FV to 59.6 PSIG 4.1 BarG @ 158 °F 70 °C FOR ITEMS: 1
158 °F 70 °C FOR ITEMS:

3 TRANSMITTER ELECTRICAL HOUSING MUST BE POLYURETHANE COVERED ALUMINUM

4 REFERENCE ACCURACY: +/- 0.075 % OF FULL SCALE & +/- 0.15 % GUARRANTEED STABILITY OVER FIVE YEARS

5 INSTRUMENT SHALL BE SUITABLE FOR MARINE, SALT LADEN, CORROSIVE ENVIRONMENT

6 CALIBRATION CERTIFICATE [X] REQUIRED [ ] NOT REQUIRED

7 HARD COPY OF *IIEC-79, EExia IIB-T5* CERTIFICATE [X] REQUIRED [ ] NOT REQUIRED PER IEC 60079

8 MATERIAL TEST REPORT [X] REQUIRED [ ] NOT REQUIRED

9 CUSTOMER SPECIFICATION: N/A , N/A & N/A

10 ALL DOCUMENTS TO BE SUBMITTED IN BOTH HARD AND ELECTRONIC FORMAT

11 INDICATOR TO SHOW PERCENTAGE

12 AUSTENSIC 316 SS BOLTS REQUIRED

13 NAMEPLATE TO BE MOUNTED TO TOP FLANGE

14 HIGH PRESSURE SIDE, ~~REMOTE MOUNT SEAL,~~ PROCESS CONNECTION IS 2"-300# ANSI RF FLG.

15 LIQUID DENSITY := 65= LB/FT3= *1044 KG/M3*

16 LOW PRESSURE SIDE, PROCESS CONNECTION 2"-300# ANSI RF FLG

17 LCD METER WITH POLYURETHANE COVERED ALUMINUM COVER REQUIRED

18 "SMART" ELECTRONIC TRANSMITTERS WITH "HART PROTOCOL" COMMUNICATION SHALL BE SUITABLE OVER RANGE OF APPLICATION=

19 ELECTRICAL CLASS CERTIFICATION SHALL BE SHOWN ON A DIE-STAMPED STAINLESS STEEL TAG PERMANENTLY ATTACHED TO THE DEVICE=

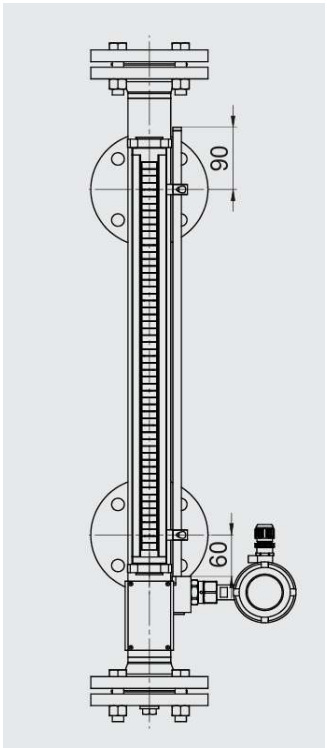
20 ELECTRICAL CONNECTION: M20

21 LIQUID MEDIA IS PAG OIL WITH OPERATING CONDITIONS SHOWN IN TABULATION

22 DISTANCE BETWEEN NOZZLES THAT COVERS THE TRANSMITTER CALIBRATION RANGE IS: 48.00 inches *1,214.4 mm*

23 IT IS THE RESPONSIBILITY OF THE SUPPLIER TO ASSURE THAT THE FLOATS FIT INSIDE THE CHAMBER

24 TRANSMITTER ORIENTATION SHALL AS PER SHOWN PER BELOW SNAPSHOT CALLED "ACTUAL DESIGN"



REQUIREMENTS

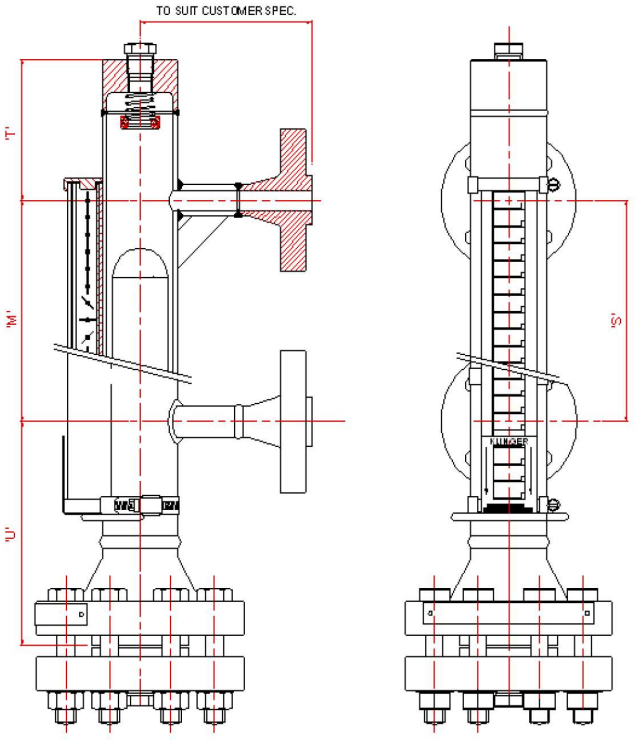
X = 14.4 in
365.76 mm

T = MFR STD

M = 48.00 in
1,219.2 mm

U = MFR STD
AS SHORT AS POSSIBLE

Z = 1 in
25.4 mm



DELTA GmbH
PROCESS EQUIPMENT

SIGHT INDICATOR
(ROTAMETER)

ULT DOC.: *VD-GPIC-MA-3029-3029-0038*

CLIENT DOC: *ULT003- 20113 A*

REV.	BY	APP	DATE	DESCRIPTION
0	FAD	IMA	09/14/25	FOR APPROVAL

CLIENT DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACKAGE

Item No.	A	B	C
Tag No.	SI-701-O-4 RECEIVER	FG-61131 OIL DEPARATOR	
Connections			
Inlet	3/4"-300# ANSI RF	1-1/2"-300# ANSI RF	
Outlet	3/4"-300# ANSI RF	1-1/2"-300# ANSI RF	
Rating	300#	300#	
Drawing			
P&ID	ULT003-20001-4	ULT003-20001-3	
Type			
Mounting	IN-LINE HORIZONTALLY MOUNTED	IN-LINE HORIZONTALLY MOUNTED	
Construction	BULL'S EYE TYPE (DUAL WINDOW)	BULL'S EYE TYPE (DUAL WINDOW)	
Type	ROTOR	ROTOR	
Material			
Body	STAINLESS STEEL - A351-CF8	STAINLESS STEEL - A351-CF8	
Glass	TEMPERED BOROSILICATE GLASS (SHATTER PROOF)	TEMPERED BOROSILICATE GLASS (SHATTER PROOF)	
Seal/Elastomer	TEFLON	TEFLON	
Bolts / Nuts	SA193-B7 / SA194-2H	SA193-B8 / SA194-8	
Service			
Media	SYNTHETIC OIL / PROPYLENE REFRIGERANT	SYNTHETIC OIL / PROPYLENE REFRIGERANT	
Phase	LIQUID / VAPOR	GAS / VAPOR	
Operating Conditions			
Pressure	270.2 PSIG / 18.6 BarG	270.7 / 18.67 BarG	
Temperature	116.96 °F / 47.2 °C	171 / 77.2 °C	
Manufacture	NIRRUF	NIRRUF	
Model	FS03-02-02-04 (3/4")	FS03-02-02-04 (3/4")	
Quantity	2	2	

Notes:

1 SYSTEM DESIGN PRESSURE & TEMPERATURE: FV to 362.5 PSIG 25.0 BarG @ 250 °F 121 °C
MINIMUM DESIGN TEMPERATURE -45 °F -43 °C FOR: *', 3*
-20 °F -29 °C FOR: *1*

2 WETTED MATERIAL IS 316 STAINLESS STEEL
3 INSTRUMENT SHALL BE SUITABLE FOR MARINE, SALT LADEN, CORROSIVE ENVIRONMENT

4 CALIBRATION CERTIFICATE	☐	REQUIRED	☒ NOT REQUIRED
5 CERTIFICATE OF COMPLIANCE	☒	REQUIRED	☐ NOT REQUIRED
6 316SS NAMEPLATE	☒	REQUIRED	☐ NOT REQUIRED

7 ~~NACE MR-0175 RATED~~
8 ALL DOCUMENTS TO BE SUBMITTED IN BOTH HARD AND ELECTRONIC FORMAT
9 BOLTS / NUTS SHALL BE CADMIUM PLATED
10 INDIVIDUAL PART WEIGHT MUST BE CERTIFIED
11 WHERE APPLICABLE, PMI REQUIRED PER SPECIFICATION
12 INSPECTION PER STATED CODES
13 STAINLESS STEEL MATERIAL CAN BE QUOTED IF CARBON STEEL IS NOT AVAILABLE
14 HYDROSTATICE CERTIFICE REQUIRED FOR ALL VALVES
15 INLET AND OUTLET BORES SHALL MATCH WITH SCH80 PIPE

			RESISTANCE CONVERTER				CLIENT DOC.:	VD-GPIC-MA-3029-3029-0038
							ULT DOC:	ULT003- -20119
			NO.	BY	APP	DATE	DESCRIPTION	
			0	FAD	IMA	11/24/2025	FOR APPROVAL	

GENERAL	1	Tag No.	**SEE TABLE BELOW**	Service: **See Table Below**
	2	Function	Record ☐ Indicate ☒ Control ☒ Blind ☐ Trans ☒ Other	
	3	Case	MFR. Std. ☒ Nom ☐ Nom. Size Color: MFR. Std ☒ Other **NOTE 2**	
	4	Mounting	Flush ☐ Surface ☐ Yoke ☐ Other **RACK MOUNT**	
	5	Enclosure Class	Gen. Purpose ☐ Weather Proof ☒ Explosion Proof ☒ **IIB-T5 - ZONE 2, CL1**	
			For use in intrinsically ☒ **EExia** Safe System ☐ Other	
	6	Power Supply	117V 60 Hz ☐ Other ac dc ☒ Volts: **24 V**	
	7	Chart	Strip ☐ Roll ☐ Fold ☐ Circular ☐ Time marks ☐	
	8	Chart Drive	Speed	Power
	9	Scale	Type: **LCD / DIGITAL** Range: **0 - 2000 OHMS**	
XMTR	10	Transmitter Output	4-20 mA ☒ 10-50mA ☐ 21-103 kPa (3-15 psig) ☐ Other	
			For Receiver, see spec sheet. **WIRED TO PLC VIA I/O RACK (2 WIRES OUTPUT)**	
CONTROLLER **VIA PLC**	11	Control Modes	Sub: s = slow, f = fast, If ☐ Df ☐ P ☐ PI ☐ PD ☐ PID ☐ Is ☐ Ds ☐	
			Other	
			On Measurement Increase, Output: Increases ☐ Decreases ☐	
	12	Action	None ☐ MFR Std ☒ Other	
	13	Auto-Man Switch	Manual ☐ External ☒ Remote ☒ Other	
	14	Set Point Adj.	None ☐ MFR Std ☒ Other	
	15	Manual Reg.	4-20 mA ☒ 10-50mA ☐ 21-103 kPa (3-15 psig) ☐ Other	
	16	Output		
ELEMENT	17	Fill	SAMA Class Compensation	
	18	Process Data	**SEE TABLE BELOW**	
	19	Range	Fixed ☒ Adj. Range **0-1000 ohms** Set @ **SEE BELOW**	
			Instrument Connection: Electrical Connection: **M20 ~~1/2" NPT~~**	
	20	Bulb	Type: **POTENTIOMETER (0-5 VDC)** Sheat Material:	
			Size: Diameter: Number of Wires: **3-WIRES**	
	21			
	22			
	23	Alarm Switches	Quantity: **1 / TRANSMITTER** Form **SOFT** Rating **VIA PLC**	
	24	Function	Resistor ☒ Deviation ☐ Contacts to On Temp. Incr.	
	25	Options		
			Other: **DIGITAL DISPLAY**	
AREA CLASS.	27		**IEC** ☒ **ZONE 2, EExia IIB-T; IP-65 / NEMA4X** Agency Approval: **ATEX**	

TRANSMITTER

Item	Qty	Tag No.	Resistance (ohms)		Oper. Press. (PSIG)		Calibration (ohms)		Manufacturer / Model No.	Service
			Range	Oper.	Min.	Max.	4 mA	20 mA		
A	1	ZT-61111	0-2000	0-1000	ATM	ATM	0 ohms	1000 ohms	WIKA	HYDROCARBON GAS & SYNTHETIC OIL
B	1	ZT-61111	0-2000	0-1000	ATM	ATM	0 ohms	1000 ohms	WIKA	HYDROCARBON GAS & SYNTHETIC OIL

Notes:

1 SYSTEM DESIGN PRESSURE & TEMPERATURE: 300 ˚F 149 ˚C

2 ACCURACY: +/- 0.02 % FS

3 INSTRUMENT SHALL BE SUITABLE FOR MARINE, SALT LADEN, CORROSIVE ENVIRONMENT

4 CALIBRATION CERTIFICATE ☒ REQUIRED ☐ NOT REQUIRED

5 HARD COPY OF *IIEC-79, EExia IIB-T5* CERTIFICATE ☒ REQUIRED ☐ NOT REQUIRED PER IEC 60079

6 CUSTOMER SPECIFICATION: 1400-20-IC-SP-5102

7

8= ELECTRICAL CLASS CERTIFICATION SHALL BE SHOWN ON A DIE-STAMPED STAINLESS STEEL TAG PERMANENTLY ATTACHED TO THE DEVICE=

9= "SMART" ELECTRONIC TRANSMITTERS SHALL BE SUITABLE OVER RANGE OF APPLICATION

10= ALL HARDWARE SHALL BE 316 SS

11= ALL DOCUMENTS TO BE SUBMITTED IN ELECTRONIC FORMAT

12= AUSTENSIC 316 SS BOLTS REQUIRED

13

14= BRACKET FOR 2" PIPE OR PANEL MOUNTING OF STAINLESS STEEL CONSTRUCTION REQUIRED

15= LCD METER WITH STAINLESS STEEL COVER REQUIRED

16= INDIVIDUAL PART WEIGHT MUST BE CERTIFIED

DELTA GmbH PROCESS EQUIPMENT

SOLENOID VALVE	CLIENT DOC. :	VD-GPIC-MA-3029-3029-0038
	ULT DOC. :	ULT003- 20517 A

NO.	BY	APP	DATE	DESCRIPTION
0	FAD	IMA	09/14/25	FOR APPROVAL
1	FAD	IMA	11/24/2025	FOR CONSTRUCTION

CLIENT	DELTA	0			
P.O. NO.:	GPIC DD MA REQ 000 3029				
PROJECT:	---				
JOB NO.:	ULT003-				
SERVICE:	PROPYLENE REFERIGERATION PACKAGE				

GENERAL	0	Item No.	A	
	1	Tag No. LOAD	XY-61112 & XY-61122	
		UNLOAD	XY-61111 & XY-61121	
	2	Service	AIR	
	3	Line No. / Vessel No.	COMPRESSOR LOADING / UNLOADING	
	4	Valve No.	DIRV-61111 DIRV-61111	
VALVE BODY	5	Type	3 WAY DIRECT ACTING w/ QUICK EXHAUST	
	6	Size - Body / Port	1/4" / 3	
	7	Rating & Type Connection	NPT	
	8	Material - Body	316 STAINLESS STEEL	
	9	Material - Disc (Trim)	BUNA (HIGH NITRILE)	
	10	Material-Diaphragm / Coil	EPOXY MOLDED	
	11	Operation - Direct/Pilot	DIRECT	
	12	Packless or Type Packed	-----	
	13	Manual Reset Lever	-----	
	14	Manual Operator(override)	INCLUDED	
	15			
	16			
WHEN DE-ENERGIZE	17	2-Ways Valve Opens/Close	---	
	18	3-Way (NOTE 10)	YES	
	19	Vent Port Opens/Close	OPENS	
	20	Pressure Port Opens/Close	CLOSES	
	21	4-Way	----	
	22	Pressure to Cyl. 1/ Cyl. 2	----	
	23	Exh. from Cyl. 1/ Cyl. 2	----	
	24			
	25			
SOLENOID	26	Enclosure	IEC-79, Eex(d) IIB-T3 IP66 (NEMA-4X)	
	27	Voltage/Hz	24 VDC (LOW POWER OPERATOR)	
	28	Style of Coil	CL. "H" HERMETICALLY SEALED HIGH TEMP.	
	29	Single or Double Coil	SINGLE	
	30	Area Classification	*IEC-79, ZONE 2, GROUP IIB, T3 , EE x(d)*	
	31	Cable Entry	M20 x 1.5 mm	~~1/2"XM20 ADAPTOR BY DELTA~~
SERVICE CONDITION	32	Fluid	AIR	
	33	Qty., Max	8 SCFM 12.7 S M3/HR	
	34	Operating Differential Min/Max	10 / 15 PSID 0.7 / 1.03 BarD	
	35	Allow . Differential Min/Max	20 / 150 PSID 1.4 / 10.3 BarD	
	36	Temperature Norm/Max	70 / 100 °F 21 / 37.8 °C	
	37	Operating Specific Gravity	1.0	
	38	Operating Viscosity	-----	
	39	Required Cv	0.200	
	40	Valve Cv / Orifice	0.8 /	
	41			
	42	Agency Approval	ATEX	
	43			
	44			
	45	Manufacturer	ASCO	
	46	Model No.	WSNFET8327B302MS 24VDC	MOUNTING BRACKET NO.: C133441
	47	QTY	4	

NOTES:

1. SYSTEM DESIGN PRESSURE & TEMPERATURE: 150 PSIG 10 BarG @ 300 °F 149 °C
2. -20 °F -29 °C
3. INSTRUMENT SHALL BE SUITABLE FOR MARINE, SALT LADEN, CORROSIVE ENVIRONMENT
4. CALIBRATION CERTIFICATE ☐ REQUIRED ☒ NOT REQUIRED
5. CERTIFICATE OF COMPLIANCE ☒ REQUIRED ☐ NOT REQUIRED
6. HARD COPY OF *IEC-79, EEXD IIB-T3* CERTIFICATE ☒ REQUIRED ☐ NOT REQUIRED PER IEC 60079
7. AREA CLASSIFICATION: *IEC-79, ZONE 2, GROUP IIB, T3, EE x(d)*
8. MANUFACTURER CALCULATION / SIZING SHEET ☐ REQUIRED ☒ NOT REQUIRED
9. STAINLESS STEEL NAMEPLATE (316) ☒ REQUIRED ☐ NOT REQUIRED
10. COILS SHALL BE FITTED WITH SURGE SUPPRESSION DIODES.
11. SOLENOID VALVE POWER CONSUMPTION SHALL BE LESS LESS THAN 10 WATTS.
12. BUG SCREENS SHALL BE INSTALLED ON EXHAUST
13. LEADS TO BE TERMINATED IN A CONDUIT BOX SUITABLE FOR AREA CLASSIFICATION.
14. ALL DOCUMENTS TO BE SUBMITTED IN BOTH HARD AND ELECTRONIC FORMAT
15. INDIVIDUAL PART WEIGHT MUST BE CERTIFIED

DELTA PROCESS EQUIPMENT GmbH

SOLENOID VALVE (CAPACITY CONTROL)	CLIENT DOC. :	VD-GPIC-MA-3029-3029-0038
	ULT DOC. :	ULT003- 20517 B

NO.	BY	APP	DATE	DESCRIPTION
0	FAD	IMA	09/14/25	FOR APPROVAL
1	FAD	IMA	11/24/2025	FOR CONSTRUCTION

CLIENT DELTA 0
P.O. NO.: GPIC DD MA REQ 000 3029
PROJECT: ---
JOB NO.: ULT003-
SERVICE: PROPYLENE REFERIGERATION PACKAGE

GENERAL	0	Item No.	A	
	1	Tag No.	XV-61151 XV-61152	
	2	Service	OIL	
	3	Line No. / Vessel No.	OIL RECOVERY SYSTEM	
	4	Valve No.	N/A	
VALVE BODY	5	Type (NOTE 16)	2 WAY DIRECT ACTING w/ QUICK EXHAUST	
	6	Size - Body / Port	1/2" / 2 ~~OR 3 IF NEEDED~~	
	7	Rating & Type Connection	NPT	
	8	Material - Body	316 STAINLESS STEEL	
	9	Material - Disc (Trim)	VITON	
	10	Material-Diaphragm / Coil	EPOXY MOLDED	
	11	Operation - Direct/Pilot	DIRECT	
	12	Packless or Type Packed	-----	
	13	Manual Reset Lever	-----	
	14	Manual Operator(override)	INCLUDED	
	15			
	16			
WHEN DE-ENERGIZE	17	2-Ways Valve Opens/Close	YES	
	18	3-Way (NOTE 10)	NO	
	19	Vent Port Opens/Close	N/A	
	20	Pressure Port Opens/Close	CLOSES	
	21	4-Way	----	
	22	Pressure to Cyl. 1/ Cyl. 2	----	
	23	Exh. from Cyl. 1/ Cyl. 2	----	
	24			
	25			
SOLENOID	26	Enclosure	IEC-79, Eex(d) IIB-T3 IP66 (NEMA-4X)	
	27	Voltage/Hz	24 VDC (LOW POWER OPERATOR)	
	28	Style of Coil	CL. "H" HERMETICALLY SEALED HIGH TEMP.	
	29	Single or Double Coil	SINGLE	
	30	Area Classification	*IEC-79, ZONE 2, GROUP IIB, T3 , EE x(d)*	
	31	Cable Entry	M20 x 1.5 mm	~~1/2"XM20 ADAPTOR BY DELTA~~
SERVICE CONDITION	32	Fluid	OIL (PAG) / PROPYLENE	
	33	Qty., Max	5 GPM 19 LPM	
	34	Operating Differential Min/Max	1 / 5 PSID 0.1 / 0.345 BarD	
	35	Allow . Differential Min/Max	5 / 290 PSID 0.3 / 20 BarD	
	36	Temperature Norm/Max	-12.4 / 145 °F -25 / 62.78 °C	
	37	Operating Specific Gravity	0.96	
	38	Operating Viscosity	-----	
	39	Required Cv	2.191	
	40	Valve Cv / Orifice	3.80	
	41			
	42	Agency Approval	ATEX	
	43			
	44			
	45	Manufacturer	ROTORK	
	46	Model No.	ICO4S-1/2" WITH MANUAL OVERIDE	PART NO.: Y131PA3V1B
	47	QTY	2	

NOTES:

1. SYSTEM DESIGN PRESSURE & TEMPERATURE: FV to 362.5 PSIG 25.0 BarG @ 250 °F 121 °C
2. -45 °F -43 °C
3. INSTRUMENT SHALL BE SUITABLE FOR MARINE, SALT LADEN, CORROSIVE ENVIRONMENT
4. CALIBRATION CERTIFICATE ☐ REQUIRED ☒ NOT REQUIRED
5. CERTIFICATE OF COMPLIANCE ☒ REQUIRED ☐ NOT REQUIRED
6. HARD COPY OF *IEC-79, EEXD IIB-T3* CERTIFICATE ☒ REQUIRED ☐ NOT REQUIRED PER IEC 60079
7. AREA CLASSIFICATION: *IEC-79, ZONE 2, GROUP IIB, T3, EE x(d)*
8. MANUFACTURER CALCULATION / SIZING SHEET ☐ REQUIRED ☒ NOT REQUIRED
9. STAINLESS STEEL NAMEPLATE (316) ☒ REQUIRED ☐ NOT REQUIRED
10. COILS SHALL BE FITTED WITH SURGE SUPPRESSION DIODES.
11. SOLENOID VALVE POWER CONSUMPTION SHALL BE LESS LESS THAN 10 WATTS.
12. ~~BUG SCREENS SHALL BE INSTALLED ON EXHAUST~~
13. LEADS TO BE TERMINATED IN A CONDUIT BOX SUITABLE FOR AREA CLASSIFICATION.
14. ALL DOCUMENTS TO BE SUBMITTED IN BOTH HARD AND ELECTRONIC FORMAT
15. INDIVIDUAL PART WEIGHT MUST BE CERTIFIED
16. 3-WAY VALVES MAY BE USED BY PLUGGING BLEED PORT.