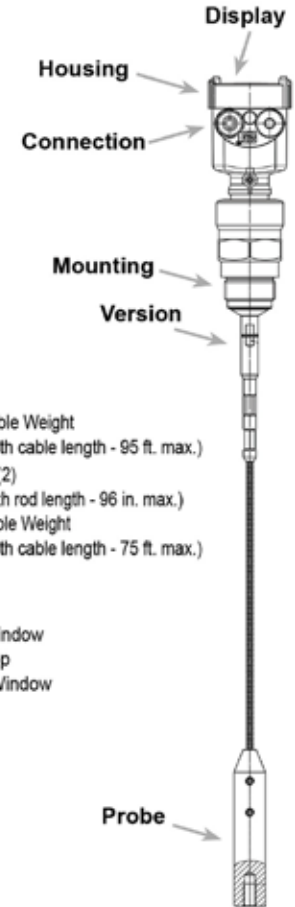
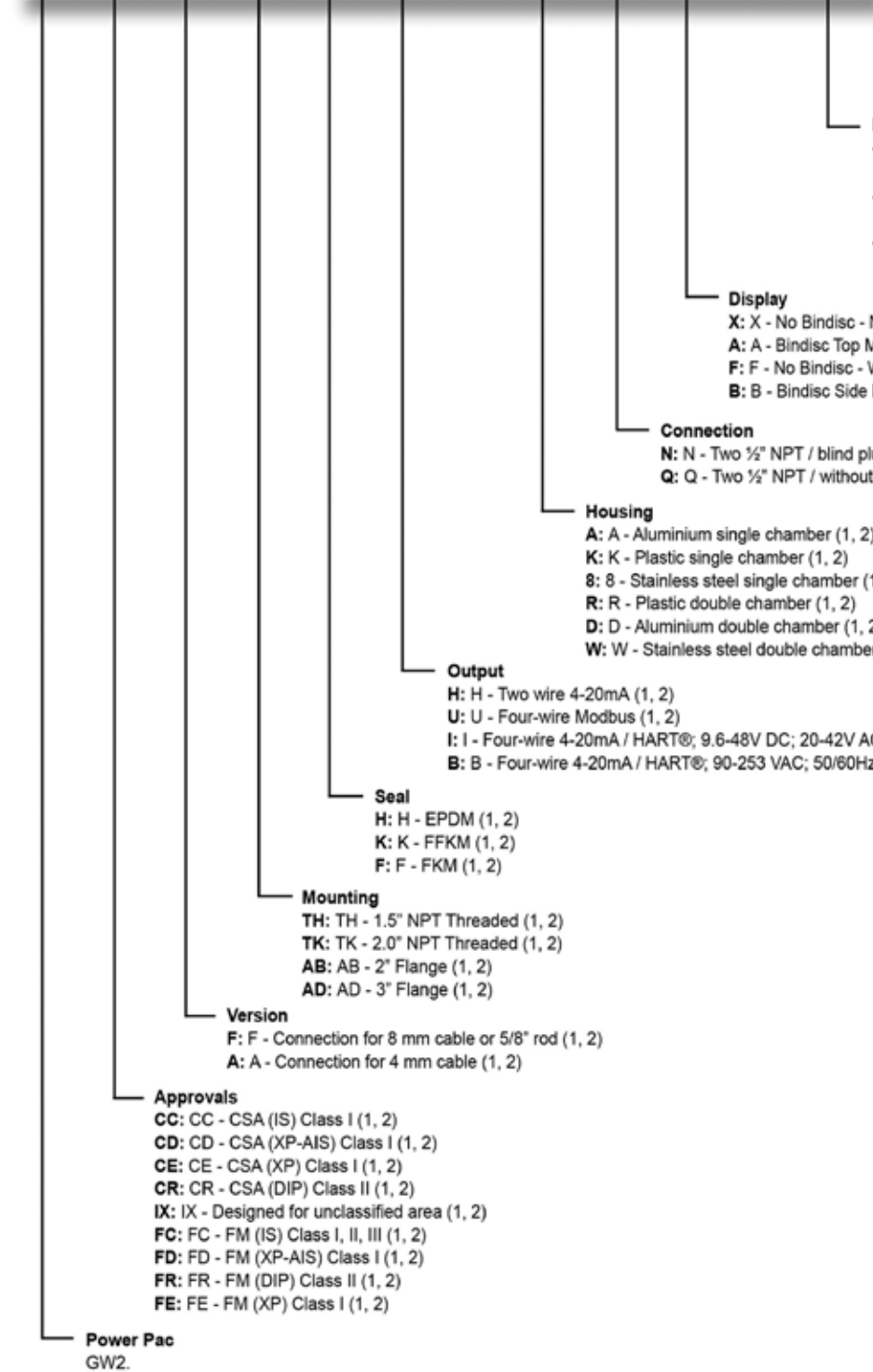


Mark X if none											
						X					X
Sample											
GW2.	IX	F	TH	F	H	X	A	N	A	X	-R36



1: Cable
2: Rod



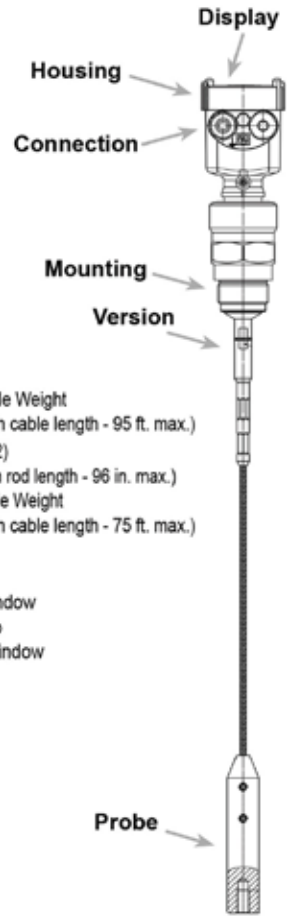
Guided Wave Radar for Solids

Guided wave radar provides highly accurate, continuous level measurement utilizing time domain reflectometry (TDR) to measure the distance, level, and volume of material contained in bins, tanks, and silos. It performs reliably and is immune to dust, humidity, temperature, pressure, and bulk density changes as well as noise that might be present when filling or emptying the vessel.

Description	CODE	Part No.
POWER PAC		
GWR-2000 Guided Wave Radar	GW2.	
APPROVALS		
Approvals: CC - CSA (IS) Class I, II, III, Div 1, Groups A, B, C, D, E, F, G	CC	
Approvals: CD - CSA (XP-AIS) Class I, Div 1, Groups A, B, C, D, (DIP-AIS) Class II, III Div 1, Groups E, F, G	CD	
Approvals: CE - CSA (XP) Class I, Div 1, Groups A, B, C, D, (DIP) Class II, III Div 1, Groups E, F, G	CE	
Approvals: CR - CSA (DIP) Class II, DIV 1 Groups E, F, G	CR	
Approvals: IX - Designed for unclassified area, non-EX environment	IX	
Approvals: FC - FM (IS) Class I, II, III, Div 1, Groups A, B, C, D, E, F, G	FC	
Approvals: FD - FM (XP-AIS) Class I, Div 1, Groups A, B, C, D, (DIP-AIS) Class II, III Div 1, Groups E, F, G	FD	
Approvals: FR - FM (DIP) Class II, DIV 1 Groups E, F, G	FR	
Approvals: FE - FM (XP) Class I, Div 1, Groups A, B, C, D, (DIP) Class II, III Div 1, Groups E, F, G	FE	
VERSION		
Version: A - Threaded connection to sensor for 4 mm cable	A	
Version: F - Threaded connection to sensor for 8 mm cable or 5/8" rod	F	
MOUNTING		
Mounting: TH - 1.5" NPT PN40, ASME B1.20.1 / 316L	TH	
Mounting: TK - 2.0" NPT PN40, ASME B1.20.1 / 316L	TK	
Mounting: AB - 2" 150lb RF, ASME B16.5 / 316/316L	AB	
Mounting: AD - 3" 150lb RF, ASME B16.5 / 316/316L	AD	
Mounting: AG - 4" 150lb RF, ASME B16.5 / 316/316L	AG	
SEAL		
Seal: H - EPDM (A+P 75.5 / KW75F) / -40°F to +302°F (150°C)	H	
Seal: K - FFKM (Kalrez 6375) / -4°F (20°C) to +392°F (200°C)	K	
Seal: F - FKM (SHS FPM 70C3 GLT) / -40°F to +302°F (150°C)	F	
OUTPUT		
Output: H - Two wire 4-20mA / HART®; 12-35V DC	H	
Output: U - Four-wire Modbus (Requires Dual Chamber Housing); 8-30V DC	U	
Output: I - Four-wire 4-20mA / HART®; 9.6-48V DC; 20-42V AC (Requires Dual Chamber Housing)	I	
Output: B - Four-wire 4-20mA / HART®; 90-253 VAC; 50/60Hz (Requires Dual Chamber Housing)	B	

Description	CODE	Part No.
HOUSING		
Housing: A - Aluminium single chamber / IP66/IP68 (0.2bar)	A	
Housing: K - Plastic single chamber / IP66/IP67	K	
Housing: 8 - Stainless steel single chamber (electropolished) / IP66/IP68 (0.2 bar)	8	
Housing: R - Plastic double chamber / IP66/IP67	R	
Housing: D - Aluminium double chamber / IP66/IP67	D	
Housing: W - Stainless steel double chamber / IP66/IP67	W	
CONNECTION		
Cable Entry: N - Two ½" NPT / blind plug in one opening	N	
Cable Entry: Q - Two ½" NPT / without plug in either opening	Q	
DISPLAY		
Display: X - Without inspection window or BinDisc	X	
Display: A - Bindisc top mounted with display window	A	
Display: F - Top mounted without BinDisc with inspection window	F	
Display: B - Side mounted BinDisc with window	B	
PROBE / ROD		
ft. single flexible 8 mm diameter 316 stainless steel cable, with counter weight (95 ft. maximum)	-CXX	
in. solid 5/8" diameter 316 stainless steel sensing rod (96 in. maximum)	-RXX	
ft. single flexible 4 mm diameter 316 stainless steel cable, with counter weight (75 ft. maximum)	-KXX	
MOUNTING PLATES		
GRMP-6 - 0° 1.5" NPT Powder coated carbon steel mounting plate with half coupling		730-0298
GRMP-8 - 0° 1.5" NPT Stainless steel mounting plate with half coupling		730-0469
GRMP-11 - 5° 1.5" NPT Powder coated carbon steel mounting plate with half coupling		730-0501
GRMP-12 - 10° 1.5" NPT Powder coated carbon steel mounting plate with half coupling		730-0502
GRMP-18 - 30° 1.5" NPT Powder coated carbon steel mounting plate with half coupling		730-0633

Mark X if none											
						X					X
Sample											
GW3.	IX	F	TH	F	H	X	A	N	A	X	-R36



Probe / Rod
-CXX: 8 mm Cable Weight
 (Replace XX with cable length - 95 ft. max.)
-RXX: 5/8" Rod (2)
 (Replace XX with rod length - 96 in. max.)
-KXX: 4 mm Cable Weight
 (Replace XX with cable length - 75 ft. max.)

Display
X: X - No Bindisc - No Window
A: A - Bindisc Top Mounted with Window
F: F - No Bindisc - With Window Top
B: B - Bindisc Side Mounted with Window

Connection
N: N - Two 1/2" NPT / blind plug
Q: Q - Two 1/2" NPT / without plug

Housing
A: A - Aluminium single chamber (1, 2)
K: K - Plastic single chamber (1, 2)
8: 8 - Stainless steel single chamber (1, 2)
R: R - Plastic double chamber (1, 2)
D: D - Aluminium double chamber (1, 2)
W: W - Stainless steel double chamber (1, 2)

Output
H: H - Two wire 4-20mA (1, 2)
U: U - Four-wire Modbus (1, 2)
I: I - Four-wire 4-20mA / HART®; 9.6-48V DC; 20-42V AC (1, 2)
B: B - Four-wire 4-20mA / HART®; 90-253 VAC; 50/60Hz (1, 2)

Seal
K: K - FFKM (1, 2)
F: F - FKM (1, 2)

Mounting
TH: TH - 1.5" NPT Threaded (1, 2)
TK: TK - 2.0" NPT Threaded (1, 2)
AB: AB - 2" Flange (1, 2)
AD: AD - 3" Flange (1, 2)
AG: AG - 4" Flange (1, 2)

Version
E: E - Connection for 8 mm cable or 5/8" rod (1, 2)
A: A - Connection for 4 mm cable (1, 2)

Approvals
CC: CC - CSA (IS) Class I (1, 2)
CD: CD - CSA (XP-AIS) Class I (1, 2)
CE: CE - CSA (XP) Class I (1, 2)
CR: CR - CSA (DIP) Class II (1, 2)
IX: IX - Designed for unclassified area (1, 2)
FC: FC - FM (IS) Class I, II, III (1, 2)
FD: FD - FM (XP-AIS) Class I (1, 2)
FR: FR - FM (DIP) Class II (1, 2)
FE: FE - FM (XP) Class I (1, 2)

Power Pac
 GW3.

1: Cable
 2: Rod



Guided Wave Radar for Liquids

The GWR-3000 is a guided wave radar designed specifically for liquid applications. It uses time domain reflectometry (TDR) to continuously measure levels in tanks and standpipes. It is offered with either a cable or rod customized to the depth of the vessel. The GWR-3000 level sensor measures all types of liquids including those with steam, vapor, foam, condensation or those prone to residual buildup.

Description	CODE	Part No.
POWER PAC		
GWR-3000 Guided Wave Radar	GW3.	
APPROVALS		
Approvals: CC - CSA (IS) Class I, II, III, Div 1, Groups A, B, C, D, E, F, G	CC	
Approvals: CD - CSA (XP-AIS) Class I, Div 1, Groups A, B, C, D, (DIP-AIS) Class II, III Div 1, Groups E, F, G	CD	
Approvals: CE - CSA (XP) Class I, Div 1, Groups A, B, C, D, (DIP) Class II, III Div 1, Groups E, F, G	CE	
Approvals: CR - CSA (DIP) Class II, DIV 1 Groups E, F, G	CR	
Approvals: IX - Designed for unclassified area, non-EX environment	IX	
Approvals: FC - FM (IS) Class I, II, III, Div 1, Groups A, B, C, D, E, F, G	FC	
Approvals: FD - FM (XP-AIS) Class I, Div 1, Groups A, B, C, D, (DIP-AIS) Class II, III Div 1, Groups E, F, G	FD	
Approvals: FR - FM (DIP) Class II, DIV 1 Groups E, F, G	FR	
Approvals: FE - FM (XP) Class I, Div 1, Groups A, B, C, D, (DIP) Class II, III Div 1, Groups E, F, G	FE	
VERSION		
Version: A - Threaded connection to sensor for 4 mm cable	A	
Version: E - Threaded connection to sensor for 8 mm cable or 5/8" rod	E	
MOUNTING		
Mounting: TH - 1.5" NPT PN40, ASME B1.20.1 / 316L	TH	
Mounting: TK - 2.0" NPT PN40, ASME B1.20.1 / 316L	TK	
Mounting: AB - 2" 150lb RF, ASME B16.5 / 316/316L	AB	
Mounting: AD - 3" 150lb RF, ASME B16.5 / 316/316L	AD	
Mounting: AG - 4" 150lb RF, ASME B16.5 / 316/316L	AG	
SEAL		
Seal: K - FFKM (Kalrez 6375) and PTFE / -4°F (-20°C) to +510°F (266°C)	K	
Seal: F - FKM (SHS FPM 70C3 GLT) / -40°F to +302°F (150°C)	F	
OUTPUT		
Output: H - Two wire 4-20mA / HART®; 12-35V DC	H	
Output: U - Four-wire Modbus (Requires Dual Chamber Housing); 8-30V DC	U	
Output: I - Four-wire 4-20mA / HART®; 9.6-48V DC; 20-42V AC (Requires Dual Chamber Housing)	I	
Output: B - Four-wire 4-20mA / HART®; 90-253 VAC; 50/60Hz (Requires Dual Chamber Housing)	B	
HOUSING		
Housing: A - Aluminium single chamber / IP66/IP68 (0.2bar)	A	

Description	CODE	Part No.
Housing: K - Plastic single chamber / IP66/IP67	K	
Housing: 8 - Stainless steel single chamber (electropolished) / IP66/IP68 (0.2 bar)	8	
Housing: R - Plastic double chamber / IP66/IP67	R	
Housing: D - Aluminium double chamber / IP66/IP67	D	
Housing: W - Stainless steel double chamber / IP66/IP67	W	
CONNECTION		
Cable Entry: N - Two 1/2" NPT / blind plug in one opening	N	
Cable Entry: Q - Two 1/2" NPT / without plug in either opening	Q	
DISPLAY		
Display: X - Without inspection window or BinDisc	X	
Display: A - Bindisc top mounted with display window	A	
Display: F - Top mounted without BinDisc with inspection window	F	
Display: B - Side mounted BinDisc with window	B	
PROBE / ROD		
ft. single flexible 8 mm diameter 316 stainless steel cable, with counter weight (95 ft. maximum)	-CXX	
in. solid 5/8" diameter 316 stainless steel sensing rod (96 in. maximum)	-RXX	
ft. single flexible 4 mm diameter 316 stainless steel cable, with counter weight (75 ft. maximum)	-KXX	
MOUNTING PLATES		
GRMP-6 - 0° 1.5" NPT Powder coated carbon steel mounting plate with half coupling		730-0298
GRMP-8 - 0° 1.5" NPT Stainless steel mounting plate with half coupling		730-0469
GRMP-11 - 5° 1.5" NPT Powder coated carbon steel mounting plate with half coupling		730-0501
GRMP-12 - 10° 1.5" NPT Powder coated carbon steel mounting plate with half coupling		730-0502
GRMP-18 - 30° 1.5" NPT Powder coated carbon steel mounting plate with half coupling		730-0633