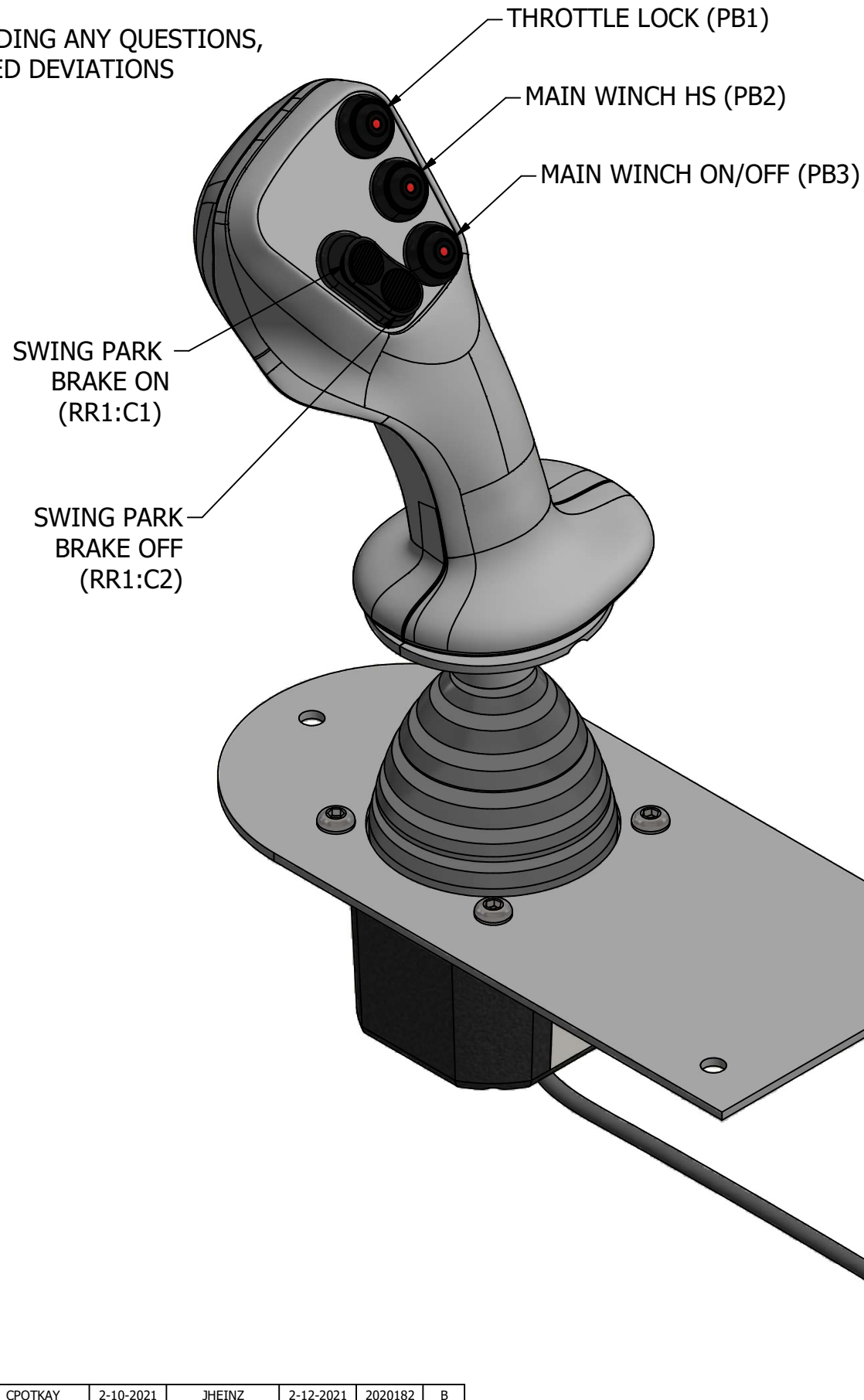


NOTE:
CONTACT ENGINEERING REGARDING ANY QUESTIONS,
CLARIFICATIONS, OR REQUESTED DEVIATIONS



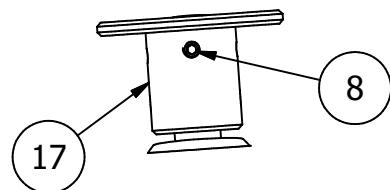
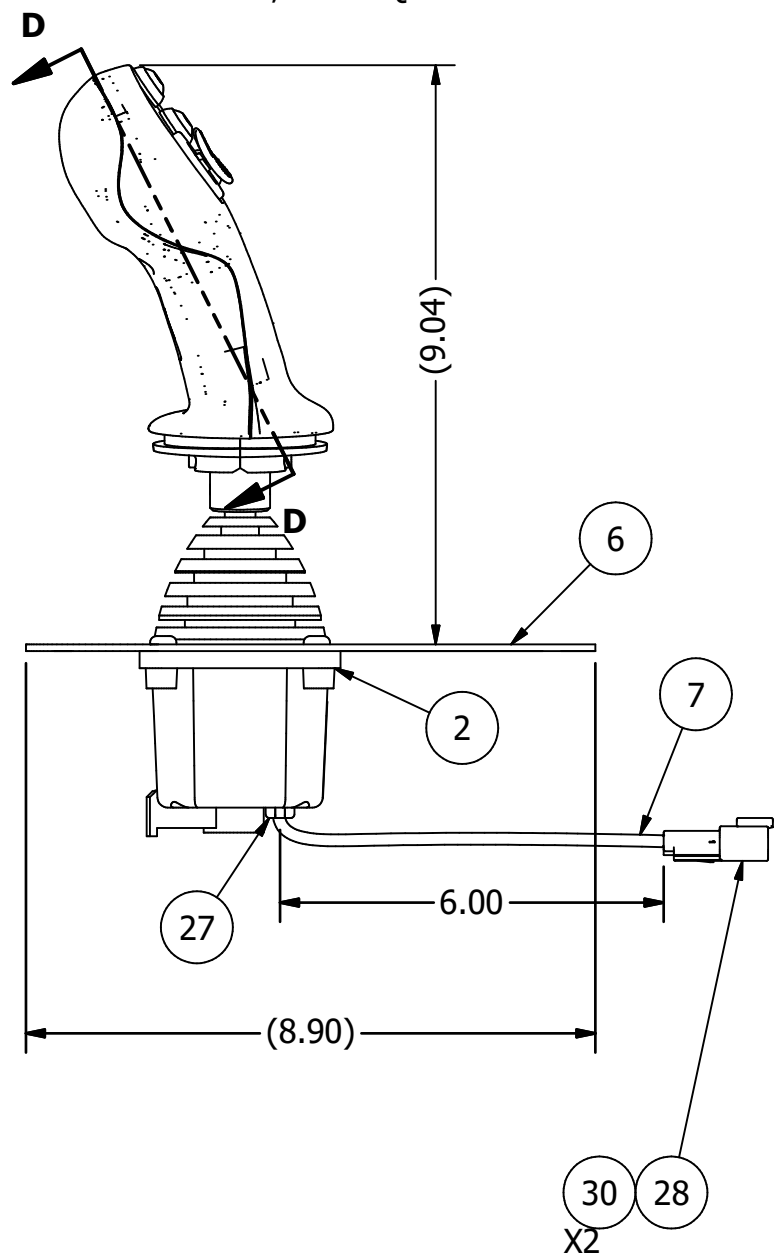
BILL OF MATERIAL						
ITEM	PART NUMBER	STOCK NUMBER	REV	MANUFACTURER	DESCRIPTION	QTY
1	19234722	MG25RM17549		OEM CONTROLS-2027	MG25 RIGHT HAND JOYSTICK HANDLE	1
2	19229989	JC6000-XY-HC2-H-S-NL-N-JR1-NH		CURTISS-WRIGHT CONTROLS-1516	JC6000 JOYSTICK BASE J1939 DUAL AXIS	1
3	19229527	IPR1SAD2LOS		APEM-1010	PUSHBUTTON ILLUMINATED IP67 MAINTAINED	3
4	19232566	M12221-018	C	GS GLOBAL RESOURCES-1038	SOLENOID MOUNT W/ WINGS FOR WM580 HANDLE	1
5	19237992	S-10-50-33		MAGNETIC SENSOR SYSTEMS-1911	THUMPER SOLENOID 20.5V 25%	1
6	20003214	GS19109-0007	A	GS GLOBAL RESOURCES-1038	CROSSOVER CRANE JOYSTICK MOUNTING PLATE	1
7	19201529	00100004		WIRE-1124	WIRE OLFLEX CABLE .5MMSQ/2 CONDUCTOR	1
8	20012715	95235A525		MISC-1040	SET SCREW #10-32X1/4 DOG POINT LOCTITE	2
9	19213205	38-004-012		WIRE-1124	WIRE 28 AWG PTFE RED	2
10	19213206	38-004-013		WIRE-1124	WIRE 28 AWG PTFE BLUE	2
11	19213208	38-004-015		WIRE-1124	WIRE 28 AWG PTFE YELLOW	2
12	19213209	38-004-016		WIRE-1124	WIRE 28 AWG PTFE BLACK	2
13	19213212	38-004-856		WIRE-1124	WIRE 28 AWG PTFE WHITE/RED	2
14	19213214	38-004-860		WIRE-1124	WIRE 28 AWG PTFE BLUE/ORANGE	2
15	19213215	38-004-861		WIRE-1124	WIRE 28 AWG PTFE PINK/GREY	2
16	19238352	SFR16S0001500FR500		VISHAY-1119	METAL FILM RESISTOR 1/2WATT 150	3
17	19232565	M12221-013	A	GS GLOBAL RESOURCES-1038	ADAPTER SLEEVE FOR MG25 HANDLE	1
18	19238822	SP05		MAGNETIC SENSOR SYSTEMS-1911	MSS 4GRAM SPRING	1
19	19109247	SSCSH#10-32X1/4-SS		MISC-1040	SET SCREW CUP SOCKET HEAD #10-32X1/4-SS	2
20	19215577	67594127		MISC-1040	ROLL-PIN 1/16 X 5/16 420SS	1
21	19232305	M11204-011	A	GS GLOBAL RESOURCES-1038	THUMPER SOLENOID MODIFIED SPACER	1
22	19217975	99397A438		MISC-1040	18-8 SS TORX 6MM SCREW	2
23	19217976	99397A441		MISC-1040	METRIC SCREW 18-8 SS 12	2
24	19217668	93705A260		MISC-1040	SOCKET HEAD CAP SCREW #10-32X3/8 SS WITH NYLON PATCH	2
25	19236735	PTL-30-486		BRADY-1420	METALIZED POLYESTER 0.75 X 1.5"	1
26	20030173	RM2-S1S-2MA		SURE GRIP CONTROLS-2273	ROCKER MODULE 2MA SEALED SWITCHES KIT	1
27	20031692	74125K11		MISC-1040	SNAP IN PLASTIC CORD GRIP .13"-.19" FOR 3/8" HOLE	1
28	19203744	DT04-2P-C015		DEUTSCH-1027	DT RECEIPT 2P ENHC. SEAL	1
29	19205194	W2P		DEUTSCH-1027	DT 2 POS GREEN WEDGE	1
30	19202412	0460-202-16141		DEUTSCH-1027	DEUTSCH TERM SIZE 16 PIN 16-20 AWG	2

RELEASED 2-12-2021

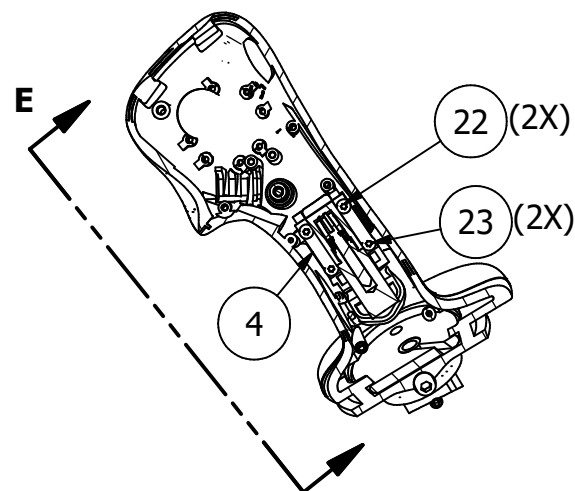
UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCHES		ORIGINATED BY: RDANKO		ORIGINATION DATE: 4-3-2020	
SPEC. = IPC/WHMA-A-620B		PROJECT ENGINEER: JHEINZ		ACCOUNT MANAGER: JPORTER	
THIRD ANGLE PROJECTION		MATERIAL: N/A		COATING/PLATING: N/A	
FRACTIONS ± 1/16in ± 1.59mm		CUSTOMER PART NUMBER:		DRAWING TITLE: RIGHT HAND JOYSTICK ASSEMBLED UNIT	
TOLERANCES ON DECIMALS:		SHT SIZE: B		DRAWING NUMBER: 20043438	
1 PLACE ±.030		2 PLACE ±.010		3 PLACE ±.005	
mm ±.76		±.25		±.13	
ANGULAR DIMENSIONS ± 1 DEG		DISCLOSURE REFERENCE: M19109-0004		SCALE: 5:8	
REMOVE BURRS		PERMISSION OF: GS GLOBAL RESOURCES INC.		SHEET INFO: 1 OF 4	
BREAK EDGES 0.01in 0.25mm Max		MAX SURFACE ROUGHNESS 125		TITLE BLOCK REVISION DATE: 4-18-2020	

REVISION DESCRIPTION	REVISOR	DATE	REVIEWED BY	DATE	ECO	REV
REPLACED M12 CONNECTOR WITH 6" CORD	CPOTKAY	2-10-2021	JHEINZ	2-12-2021	2020182	B

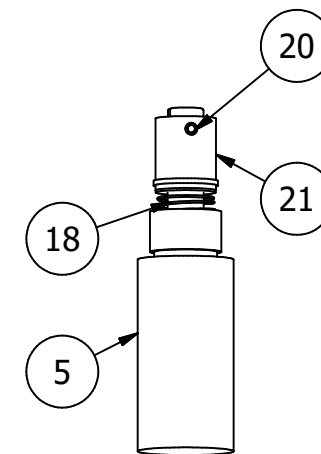
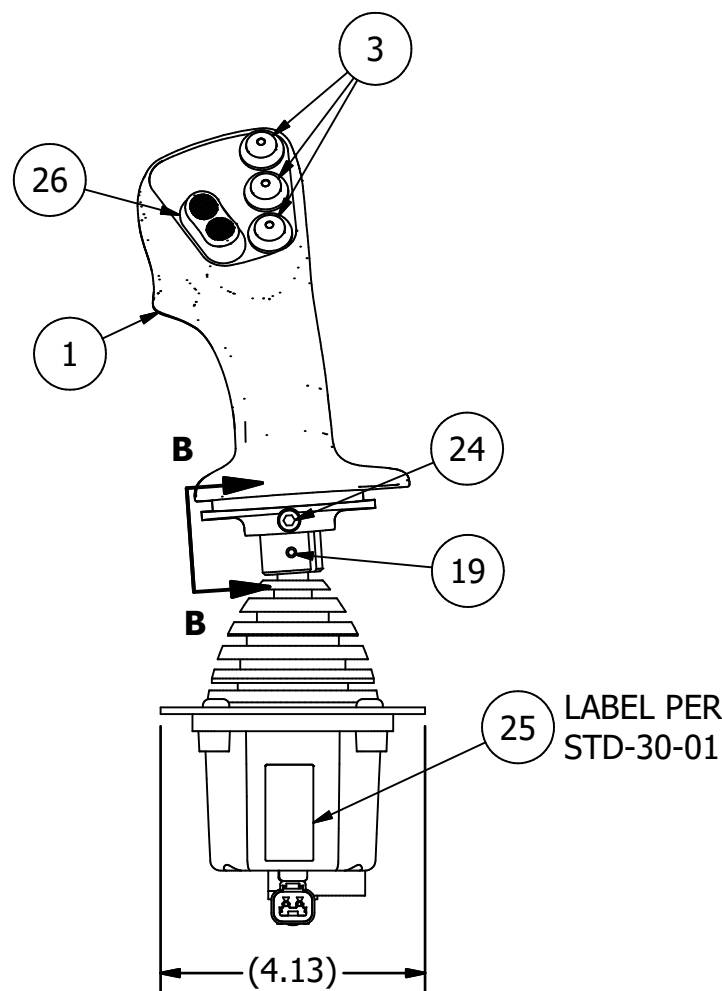
NOTE:
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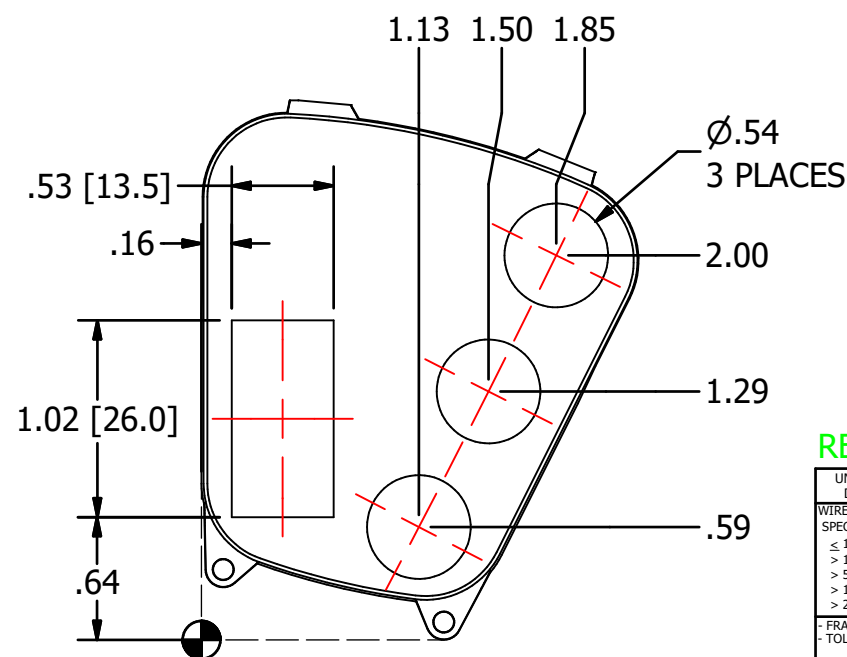
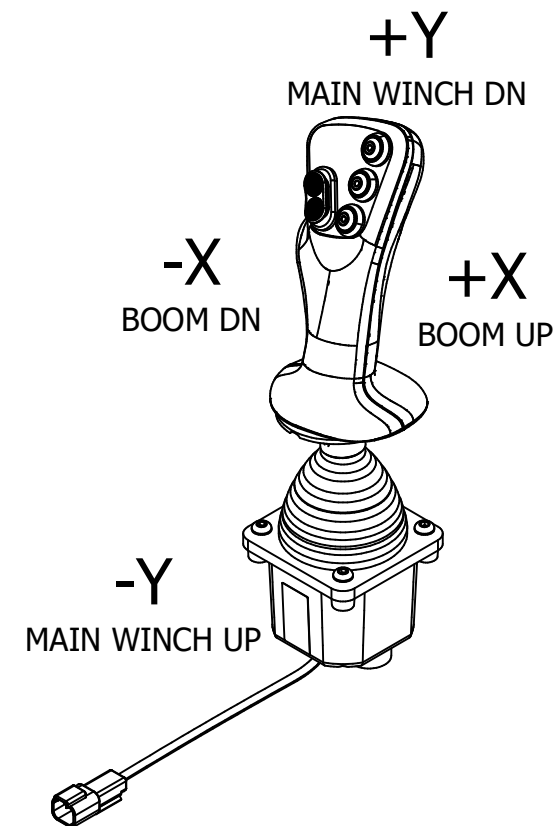
SECTION B-B
SCALE 1:2



SECTION D-D
SCALE 1:3



SECTION E-E
SCALE 1:1



SWITCH CUTOUTS
SCALE 1:1

NOTES:

1. JOYSTICK CONFIGURED WITH SOURCE ADDRESS 33(HEX), 51(DEC).
2. TORQUE HANDLE SCREWS TO 5 IN/LBS.
3. TORQUE SET SCREWS TO 10 IN/LBS.
4. APPLY RTV SILICONE OVER HANDLE AND SET SCREWS TO KEEP THEM FROM BACKING OUT.
4. INSTALL GS LABEL DECAL ON Y- SIDE OF JOYSTICK.
5. JOYSTICK SUPPLIED WITH (QTY. 4) M6 TORX T30 MOUNTING SCREWS.
6. BOM ITEMS 9-16 ARE NOT BALLOONED. THEY ARE THE WIRES AND RESISTORS INSIDE OF THE HANDLE TO THE BASE.

RELEASED 2-12-2021

UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCHES		ORIGINATED BY: RDANKO		GLOBAL RESOURCES MUKWONAGO, WI 53149	
SPEC. = IPC/WHMA-A-620B		ORIGINATION DATE: 4-3-2020		PROJECT ENGINEER: JHEINZ	
THIRD ANGLE PROJECTION		ACCOUNT MANAGER: JPORTER		DRAWING TITLE: RIGHT HAND JOYSTICK PREASSEMBLED UNIT ASSEMBLY DRAWING	
WIRE LENGTH TOLERANCES		MATERIAL: N/A		SHY SIZE: B	
≤ 1ft +1in -0in		COATING/PLATING: N/A		DRAWING NUMBER: 20043438	
> 1ft-5ft +2in -0in		CUSTOMER PART NUMBER:		REV: B	
> 5ft-10ft +4in -0in		ALL TECHNICAL DATA ON THIS DRAWING IS THE PROPERTY OF GS GLOBAL RESOURCES INC. AND SHALL NOT BE USED BY OTHERS FOR MANUFACTURE, PROCUREMENT, OR DISCLOSURE WITHOUT THE WRITTEN PERMISSION OF GS GLOBAL RESOURCES INC.		SCALE: 1:3	
> 10ft-25ft +6in -0in		SHEET INFO: 2 OF 4		TITLE BLOCK REVISION DATE: 4-18-2020	
> 25ft +5% -0%		TOLERANCES ON DECIMALS:		ECO: 2020182	
1 PLACE ±.030		2 PLACE ±.010		REV: B	
3 PLACE ±.005		FRACTIONS ± 1/16in ± 1.59mm		DATE: 2-12-2021	
mm ±.76		TOLERANCES ON DECIMALS:		REVIEWED BY: JHEINZ	
±.25		1 PLACE ±.030		DATE: 2-10-2021	
±.13		2 PLACE ±.010		REVISION DESCRIPTION: REPLACED M12 CONNECTOR WITH 6" CORD	
±.075		3 PLACE ±.005		CPOTKAY	
ANGULAR DIMENSIONS ±1 DEG		DIMENSIONS IN () ARE REFERENCE		DATE: 2-10-2021	
REMOVE BURRS		BREAK EDGES 0.01in 0.25mm Max		DATE: 2-12-2021	
MAX SURFACE ROUGHNESS 125√		PERMISSION OF: GS GLOBAL RESOURCES INC.		DATE: 2020182	

REVISION DESCRIPTION	REVISOR	DATE	REVIEWED BY	DATE	ECO	REV
REPLACED M12 CONNECTOR WITH 6" CORD	CPOTKAY	2-10-2021	JHEINZ	2-12-2021	2020182	B