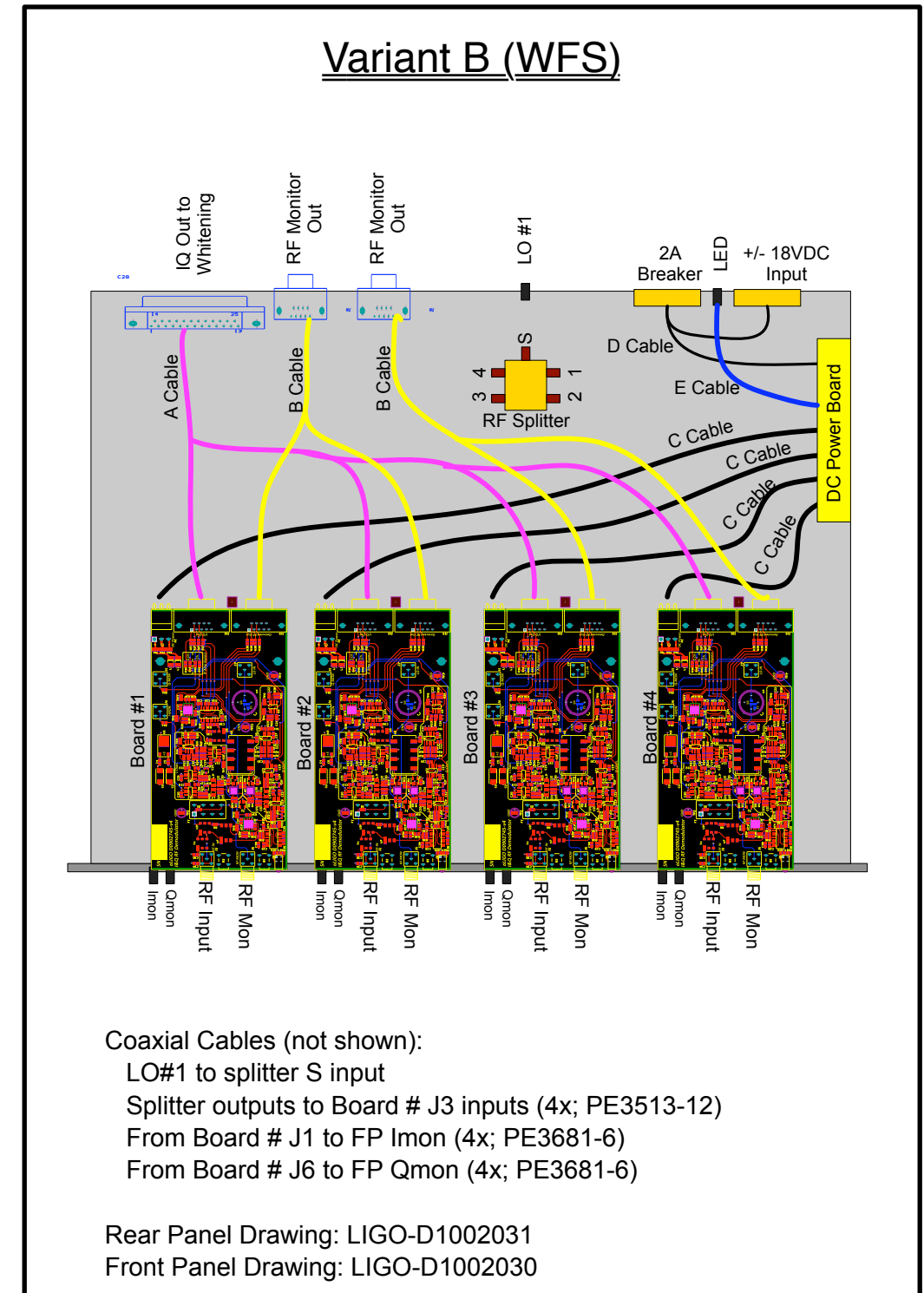
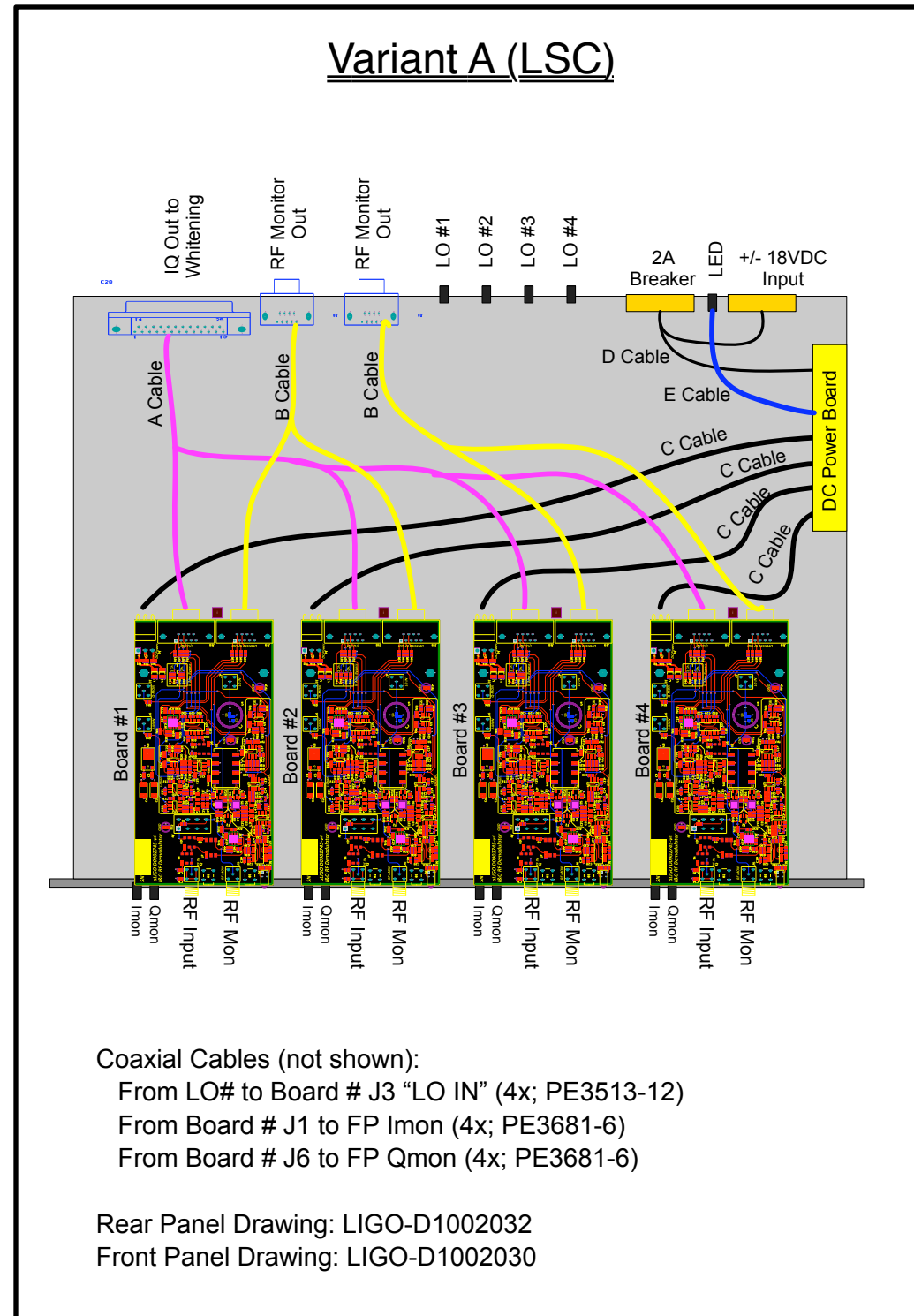


D0902796-v3: Quad I&Q Demodulator Module

Notes:

- a. A Cable detailed in LIGO-D1002028
- b. B Cable detailed in LIGO-D1002029
- c. C Cable detailed in LIGO-D1002034
- d. D Cable detailed in LIGO-T1000453, Figure 2, Power Wiring
- e. E Cable detailed in LIGO-D1002033
- f. Printed Circuit Boards # 1, 2, 3, 4: LIGO-D0902745-v4
- g. DC Power Board: LIGO-D1000217 (PCB supplied by customer)
- h. Assembly Bill of Materials found on page 2 of this document
- i. Assembly instructions are found in LIGO-T1000453
- j. Coaxial cables not shown in drawing



Bill of Materials (not including PCBs):

Off-PCB/Chassis-Mount Components							Qty per Module	
PartType	Description	Designator	Manufacturer	Supplier	Supplier Part Number	Qty per PCB	Variant A	Variant B
	Female connector terminal (0.156")		Molex Connector Corporation	Digikey	WM2305-ND		28	
	Female connector terminal (0.100")		Molex Connector Corporation	Digikey	WM2624-ND		4	
	4-pin connector housing (0.156")	To P1 on Regulator PCB	Molex Connector Corporation	Digikey	WM2113-ND		1	
	3-pin connector housing (0.156")	Regulator PCB P2, P3, P4 and P5 to P1 DC Power Connector on I&Q Demod PCB, Ch. 1, 2, 3 and 4	Molex Connector Corporation	Digikey	WM2112-ND		8	
	4-pin connector housing (0.100")	To P6 on Regulator PCB	Molex Connector Corporation	Digikey	WM2614-ND		1	
	Green LED, leaded, panel mount		Chicago Miniature Lighting	Digikey	L10005-ND		2	
	Insulating mounting kit for regulators on DC Power PCB		Avvid Technologies	Newark	82K6096		2	
Monitor cable	SMA-BNC, 6"	J1, J6	Pasternack	Pasternack	PE3681-6	2	8	
LO cable	SMA-SMA, 12"	J3	Pasternack	Pasternack	PE3513-12 (or equiv.)	1	4	
LO cable	SMA-SMA, 3"		Amphenol	Digikey	ACX1675-ND (or equiv.)			1
Feedthrough	Female SMA, isolated		Pasternack	Pasternack	PE9067	1	4	1
	Nylon #4-40 Hex Stand-off		Keystone Electronics	Digikey	4800K-ND			4
Nylon Washer	WASHER/BUSHING #1/4 .032"L NYLON	J2, J5	Keystone Electronics	Digikey	7687K-ND	4	16	
	Female crimp-on terminal, 22-18AWG			Digikey	920044-18-ND		4	
	1U Custom Drilled, Vented Chassis		Hamilton Metalcraft Inc.	Hamilton	070012-21U		1	
	Retrofit Deep Mount Rack Ears		Hamilton Metalcraft Inc.	Hamilton	070012 RETROFIT		2	
	Front Panel		Front Panel Express		LIGO-D1002030 (.FPD)		1	
	Rear Panel		Front Panel Express		LIGO-D1002032 (.FPD)		1	
	Rear Panel		Front Panel Express		LIGO-D1002031 (.FPD)			1
	DSUB Mount Female Screw 10-pack		Amphenol	Mouser	523-17-D20418-2-TX		1	
	Chassis Handles		Keystone	Mouser	534-9106		2	
	Chassis Handle Ferrules		Keystone	Mouser	534-9121		4	
	4-40 Screws for Securing DSUB connectors			McMaster-Carr	90279A103	4	16	
	4-40 Screws for Chassis Lid, Front & Rear Panel, PCB Mount			McMaster-Carr	91771A111		64	
	6-32 Screws for Chassis Handles, Ears			McMaster-Carr	917500A146		10	
	4-40 Screws for Mounting DC Power PCB			McMaster-Carr	91772A108		7	
	4-40x3/16 Screws for DC Power Regulators			McMaster-Carr	91400A104		2	
	Conec 3-pin Male Panel Mount Connector		Conec	Conec	3003W3PXX42A10X		1	
	25 conductor/28AWG Flat Ribbon Cable				3M 3365/25 or equivalent		wire/cable lengths as needed	
	9 conductor/28AWG Flat Ribbon Cable				3M 3365/9 or equivalent			
	18 AWG Stranded Hook-Up Wire - Orange	Positive Voltage Power Wiring			Belden 9918 or equivalent			
	18 AWG Stranded Hook-Up Wire - Blue	Negative Voltage Power Wiring			Belden 9918 or equivalent			
	18 AWG Stranded Hook-Up Wire - Black	Ground Power Wiring			Belden 9918 or equivalent			
		Supplied by Customer						
			ETA circuit breaker	Allied	3130-F120-P7T1-W02Q-2A		1	