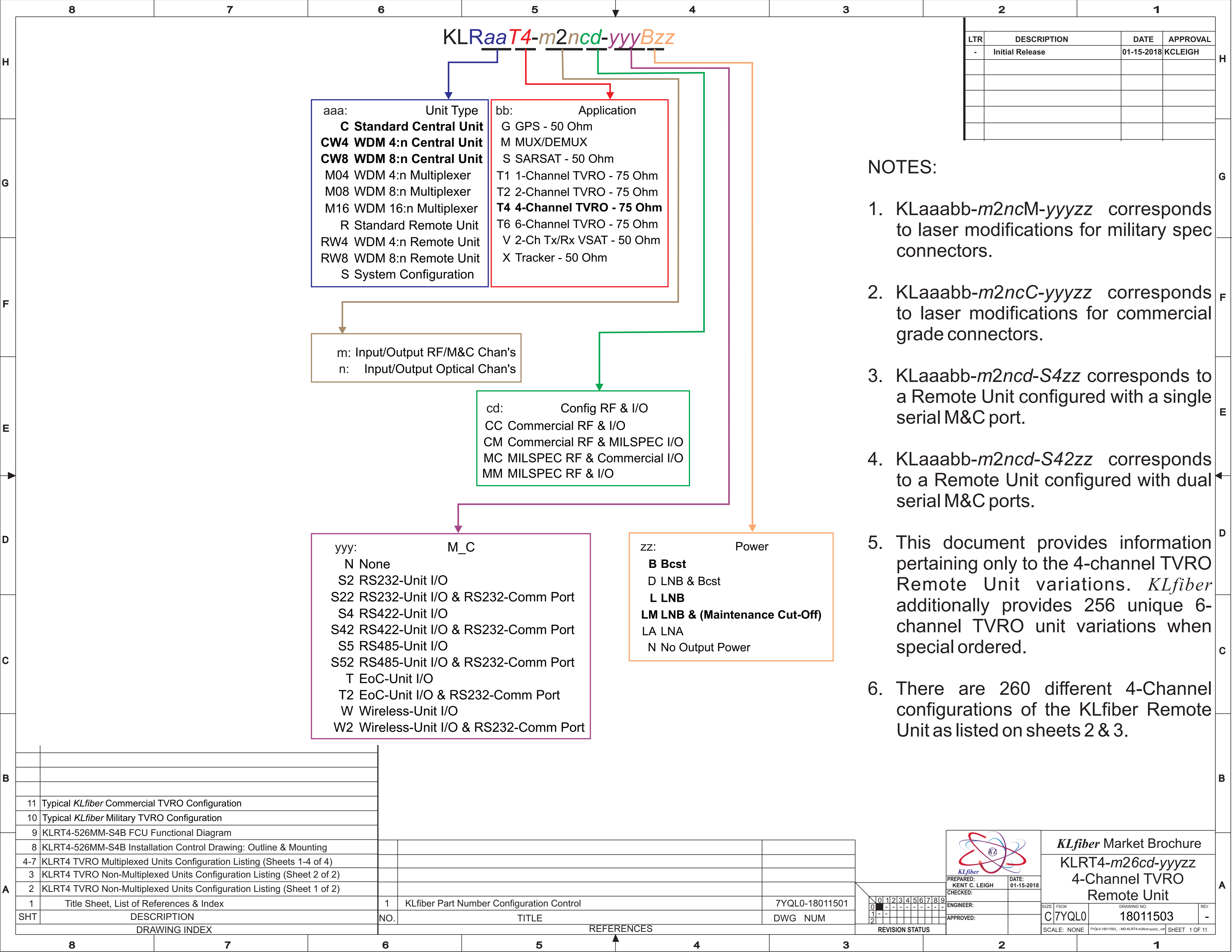


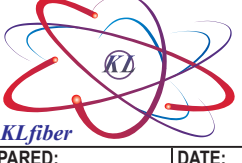


LTR	DESCRIPTION	DATE	APPROVAL
-	Initial Release	01-15-2018	KCLEIGH

- NOTES:
- KLaaabb-*m2nc*M-yyyzz corresponds to laser modifications for military spec connectors.
 - KLaaabb-*m2nc*C-yyyzz corresponds to laser modifications for commercial grade connectors.
 - KLaaabb-*m2ncd*-S4zz corresponds to a Remote Unit configured with a single serial M&C port.
 - KLaaabb-*m2ncd*-S42zz corresponds to a Remote Unit configured with dual serial M&C ports.
 - This document provides information pertaining only to the 4-channel TVRO Remote Unit variations. *KLfiber* additionally provides 256 unique 6-channel TVRO unit variations when special ordered.
 - There are 260 different 4-Channel configurations of the KLfiber Remote Unit as listed on sheets 2 & 3.

11	Typical <i>KLfiber</i> Commercial TVRO Configuration				
10	Typical <i>KLfiber</i> Military TVRO Configuration				
9	KLRT4-526MM-S4B FCU Functional Diagram				
8	KLRT4-526MM-S4B Installation Control Drawing: Outline & Mounting				
4-7	KLRT4 TVRO Multiplexed Units Configuration Listing (Sheets 1-4 of 4)				
3	KLRT4 TVRO Non-Multiplexed Units Configuration Listing (Sheet 2 of 2)				
2	KLRT4 TVRO Non-Multiplexed Units Configuration Listing (Sheet 1 of 2)				
1	Title Sheet, List of References & Index	1	KLfiber Part Number Configuration Control	7YQL0-18011501	
SHT	DESCRIPTION	NO.	TITLE	DWG	NUM
DRAWING INDEX		REFERENCES			

REVISION STATUS
0
1
2

		<i>KLfiber</i> Market Brochure	
PREPARED: KENT C. LEIGH CHECKED: ENGINEER: APPROVED:		DATE: 01-15-2018 	
SIZE: C FSCM: 7YQL0		DRAWING NO.: 18011503 REV: -	
SCALE: NONE		7YQL0-18011503_-MD-KLRT4-m26cd-yyyzz_-cd	
		SHEET 1 OF 11	

	8	7	6	5	4	3	2	1	
H									H
G		Remote Converter Unit Configurations							
		Model Number	RF/M&C	OPTICAL	Function	Configuration	M&C	Output Power	
	1	KLRT4-424CC-NL	4 Chans	4 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & I/O	None	LNB	
	2	KLRT4-424CC-NLM	4 Chans	4 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & I/O	None	LNB (Maint)	
F	3	KLRT4-424CC-NN	4 Chans	4 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & I/O	None	None	
	4	KLRT4-424CM-NL	4 Chans	4 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & MILSPEC I/O	None	LNB	
	5	KLRT4-424CM-NLM	4 Chans	4 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & MILSPEC I/O	None	LNB (Maint)	
	6	KLRT4-424CM-NN	4 Chans	4 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & MILSPEC I/O	None	None	
E	7	KLRT4-424MC-NL	4 Chans	4 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & Commercial I/O	None	LNB	
	8	KLRT4-424MC-NLM	4 Chans	4 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & Commercial I/O	None	LNB (Maint)	
	9	KLRT4-424MC-NN	4 Chans	4 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & Commercial I/O	None	None	
	10	KLRT4-424MM-NL	4 Chans	4 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & I/O	None	LNB	
D	11	KLRT4-424MM-NLM	4 Chans	4 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & I/O	None	LNB (Maint)	
	12	KLRT4-424MM-NN	4 Chans	4 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & I/O	None	None	
	13	KLRT4-426CC-S2L	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & I/O	RS232-Unit I/O	LNB	
	14	KLRT4-426CC-S2LM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & I/O	RS232-Unit I/O	LNB (Maint)	
C	15	KLRT4-426CC-S4L	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & I/O	RS422-Unit I/O	LNB	
	16	KLRT4-426CC-S4LM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & I/O	RS422-Unit I/O	LNB (Maint)	
	17	KLRT4-426CC-S5L	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & I/O	RS485-Unit I/O	LNB	
	18	KLRT4-426CC-S5LM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & I/O	RS485-Unit I/O	LNB (Maint)	
B	19	KLRT4-426CC-TL	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & I/O	EoC-Unit I/O	LNB	
	20	KLRT4-426CC-TLM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & I/O	EoC-Unit I/O	LNB (Maint)	
	21	KLRT4-426CC-WL	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & I/O	Wireless-Unit I/O	LNB	
	22	KLRT4-426CC-WLM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & I/O	Wireless-Unit I/O	LNB (Maint)	
A	23	KLRT4-426CM-S2L	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & MILSPEC I/O	RS232-Unit I/O	LNB	
	24	KLRT4-426CM-S2LM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & MILSPEC I/O	RS232-Unit I/O	LNB (Maint)	
	25	KLRT4-426CM-S4L	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & MILSPEC I/O	RS422-Unit I/O	LNB	
	26	KLRT4-426CM-S4LM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & MILSPEC I/O	RS422-Unit I/O	LNB (Maint)	
	27	KLRT4-426CM-S5L	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & MILSPEC I/O	RS485-Unit I/O	LNB	
	28	KLRT4-426CM-S5LM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & MILSPEC I/O	RS485-Unit I/O	LNB (Maint)	
	29	KLRT4-426CM-TL	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & MILSPEC I/O	EoC-Unit I/O	LNB	
	30	KLRT4-426CM-TLM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & MILSPEC I/O	EoC-Unit I/O	LNB (Maint)	
	31	KLRT4-426CM-WL	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & MILSPEC I/O	Wireless-Unit I/O	LNB	
	32	KLRT4-426CM-WLM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	Commercial RF & MILSPEC I/O	Wireless-Unit I/O	LNB (Maint)	
	33	KLRT4-426MC-S2L	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & Commercial I/O	RS232-Unit I/O	LNB	
	34	KLRT4-426MC-S2LM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & Commercial I/O	RS232-Unit I/O	LNB (Maint)	
	35	KLRT4-426MC-S4L	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & Commercial I/O	RS422-Unit I/O	LNB	
	36	KLRT4-426MC-S4LM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & Commercial I/O	RS422-Unit I/O	LNB (Maint)	
	37	KLRT4-426MC-S5L	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & Commercial I/O	RS485-Unit I/O	LNB	
	38	KLRT4-426MC-S5LM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & Commercial I/O	RS485-Unit I/O	LNB (Maint)	
	39	KLRT4-426MC-TL	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & Commercial I/O	EoC-Unit I/O	LNB	
	40	KLRT4-426MC-TLM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & Commercial I/O	EoC-Unit I/O	LNB (Maint)	
	41	KLRT4-426MC-WL	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & Commercial I/O	Wireless-Unit I/O	LNB	
	42	KLRT4-426MC-WLM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & Commercial I/O	Wireless-Unit I/O	LNB (Maint)	
	43	KLRT4-426MM-S2L	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & I/O	RS232-Unit I/O	LNB	
	44	KLRT4-426MM-S2LM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & I/O	RS232-Unit I/O	LNB (Maint)	
	45	KLRT4-426MM-S4L	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & I/O	RS422-Unit I/O	LNB	
	46	KLRT4-426MM-S4LM	4 Chans	6 Chans	4-Channel TVRO - 75 Ohm; Standard Remote Unit	MILSPEC RF & I/O	RS422-Unit I/O	LNB (Maint)	
KLRT4-m2ncd-yyyzz Remote Unit Configurations Non-Multiplexed Units (Sht 1 of 2) SIZE FSCM C7YQL0 SCALE: N/A DRAWING NO. 18011503 REV - SHEET 2 OF									
	8	7	6	5	4	3	2	1	

8		7		6		5		4		3		2		1	
Remote Converter Unit Configurations															
Model Number		RF/M&C	OPTICAL	Function		Configuration		M&C		Output Power					
133	KLRW8T4-622CC-S52L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & I/O		RS485-Unit I/O & RS232-Comm Port		LNB					
134	KLRW8T4-622CC-S52LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & I/O		RS485-Unit I/O & RS232-Comm Port		LNB (Maint)					
135	KLRW8T4-622CC-T2L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & I/O		EoC-Unit I/O & RS232-Comm Port		LNB					
136	KLRW8T4-622CC-T2LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & I/O		EoC-Unit I/O & RS232-Comm Port		LNB (Maint)					
137	KLRW8T4-622CC-W2L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & I/O		Wireless-Unit I/O & RS232-Comm Port		LNB					
138	KLRW8T4-622CC-W2LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & I/O		Wireless-Unit I/O & RS232-Comm Port		LNB (Maint)					
139	KLRW8T4-622CM-S22L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & MILSPEC I/O		RS232-Unit I/O & RS232-Comm Port		LNB					
140	KLRW8T4-622CM-S22LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & MILSPEC I/O		RS232-Unit I/O & RS232-Comm Port		LNB (Maint)					
141	KLRW8T4-622CM-S42L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & MILSPEC I/O		RS422-Unit I/O & RS232-Comm Port		LNB					
142	KLRW8T4-622CM-S42LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & MILSPEC I/O		RS422-Unit I/O & RS232-Comm Port		LNB (Maint)					
143	KLRW8T4-622CM-S52L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & MILSPEC I/O		RS485-Unit I/O & RS232-Comm Port		LNB					
144	KLRW8T4-622CM-S52LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & MILSPEC I/O		RS485-Unit I/O & RS232-Comm Port		LNB (Maint)					
145	KLRW8T4-622CM-T2L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & MILSPEC I/O		EoC-Unit I/O & RS232-Comm Port		LNB					
146	KLRW8T4-622CM-T2LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & MILSPEC I/O		EoC-Unit I/O & RS232-Comm Port		LNB (Maint)					
147	KLRW8T4-622CM-W2L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & MILSPEC I/O		Wireless-Unit I/O & RS232-Comm Port		LNB					
148	KLRW8T4-622CM-W2LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		Commercial RF & MILSPEC I/O		Wireless-Unit I/O & RS232-Comm Port		LNB (Maint)					
149	KLRW8T4-622MC-S22L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & Commercial I/O		RS232-Unit I/O & RS232-Comm Port		LNB					
150	KLRW8T4-622MC-S22LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & Commercial I/O		RS232-Unit I/O & RS232-Comm Port		LNB (Maint)					
151	KLRW8T4-622MC-S42L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & Commercial I/O		RS422-Unit I/O & RS232-Comm Port		LNB					
152	KLRW8T4-622MC-S42LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & Commercial I/O		RS422-Unit I/O & RS232-Comm Port		LNB (Maint)					
153	KLRW8T4-622MC-S52L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & Commercial I/O		RS485-Unit I/O & RS232-Comm Port		LNB					
154	KLRW8T4-622MC-S52LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & Commercial I/O		RS485-Unit I/O & RS232-Comm Port		LNB (Maint)					
155	KLRW8T4-622MC-T2L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & Commercial I/O		EoC-Unit I/O & RS232-Comm Port		LNB					
156	KLRW8T4-622MC-T2LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & Commercial I/O		EoC-Unit I/O & RS232-Comm Port		LNB (Maint)					
157	KLRW8T4-622MC-W2L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & Commercial I/O		Wireless-Unit I/O & RS232-Comm Port		LNB					
158	KLRW8T4-622MC-W2LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & Commercial I/O		Wireless-Unit I/O & RS232-Comm Port		LNB (Maint)					
159	KLRW8T4-622MM-S22L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & I/O		RS232-Unit I/O & RS232-Comm Port		LNB					
160	KLRW8T4-622MM-S22LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & I/O		RS232-Unit I/O & RS232-Comm Port		LNB (Maint)					
161	KLRW8T4-622MM-S42L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & I/O		RS422-Unit I/O & RS232-Comm Port		LNB					
162	KLRW8T4-622MM-S42LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & I/O		RS422-Unit I/O & RS232-Comm Port		LNB (Maint)					
163	KLRW8T4-622MM-S52L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & I/O		RS485-Unit I/O & RS232-Comm Port		LNB					
164	KLRW8T4-622MM-S52LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & I/O		RS485-Unit I/O & RS232-Comm Port		LNB (Maint)					
165	KLRW8T4-622MM-T2L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & I/O		EoC-Unit I/O & RS232-Comm Port		LNB					
166	KLRW8T4-622MM-T2LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & I/O		EoC-Unit I/O & RS232-Comm Port		LNB (Maint)					
167	KLRW8T4-622MM-W2L	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & I/O		Wireless-Unit I/O & RS232-Comm Port		LNB					
168	KLRW8T4-622MM-W2LM	6 Chans	2 Chans	4-Channel TVRO - 75 Ohm; WDM 8:n Remote Unit		MILSPEC RF & I/O		Wireless-Unit I/O & RS232-Comm Port		LNB (Maint)					
KLRaaT4-m2ncd-yyyzz Remote Unit Configurations Multiplexed Units (Sheet 4 of 4)															
C7YQL0		DRAWING NO. 18011503		REV -		SCALE: N/A									
8		7		6		5		4		3		2		1	

TOP VIEW

Powder coat:
RAL 7032 or Equiv

NOTES:

1. FCA COMM (J7) is available upon request and is a special order item.
2. All dimensions, unless otherwise specified, are in inches.

18.18"

18.99 +.01/.00"

Note 1

4.85"

160"

325"

LID

LID
SCREW

BASE

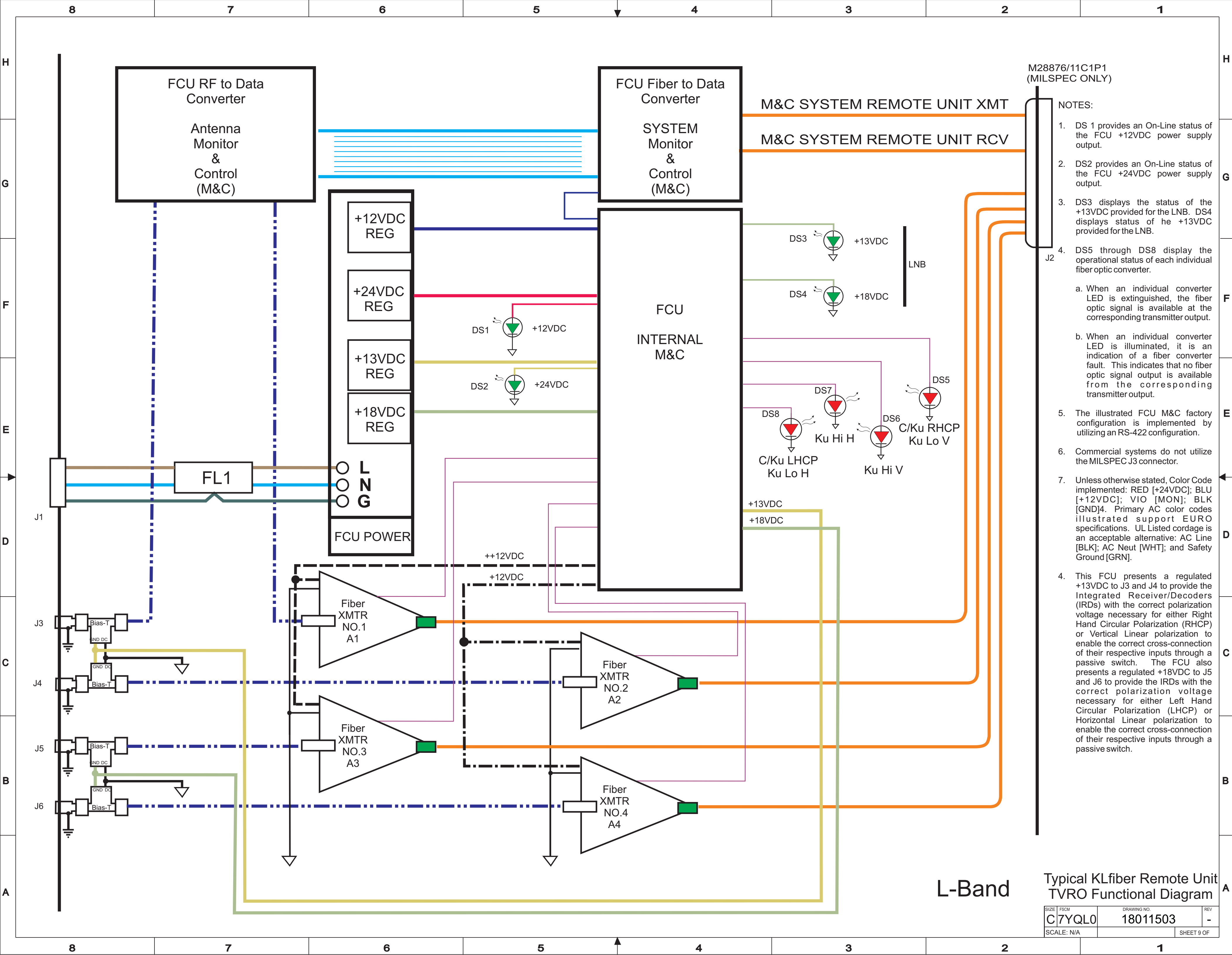
M14 CAPTIVE MOUNTING SCREWS

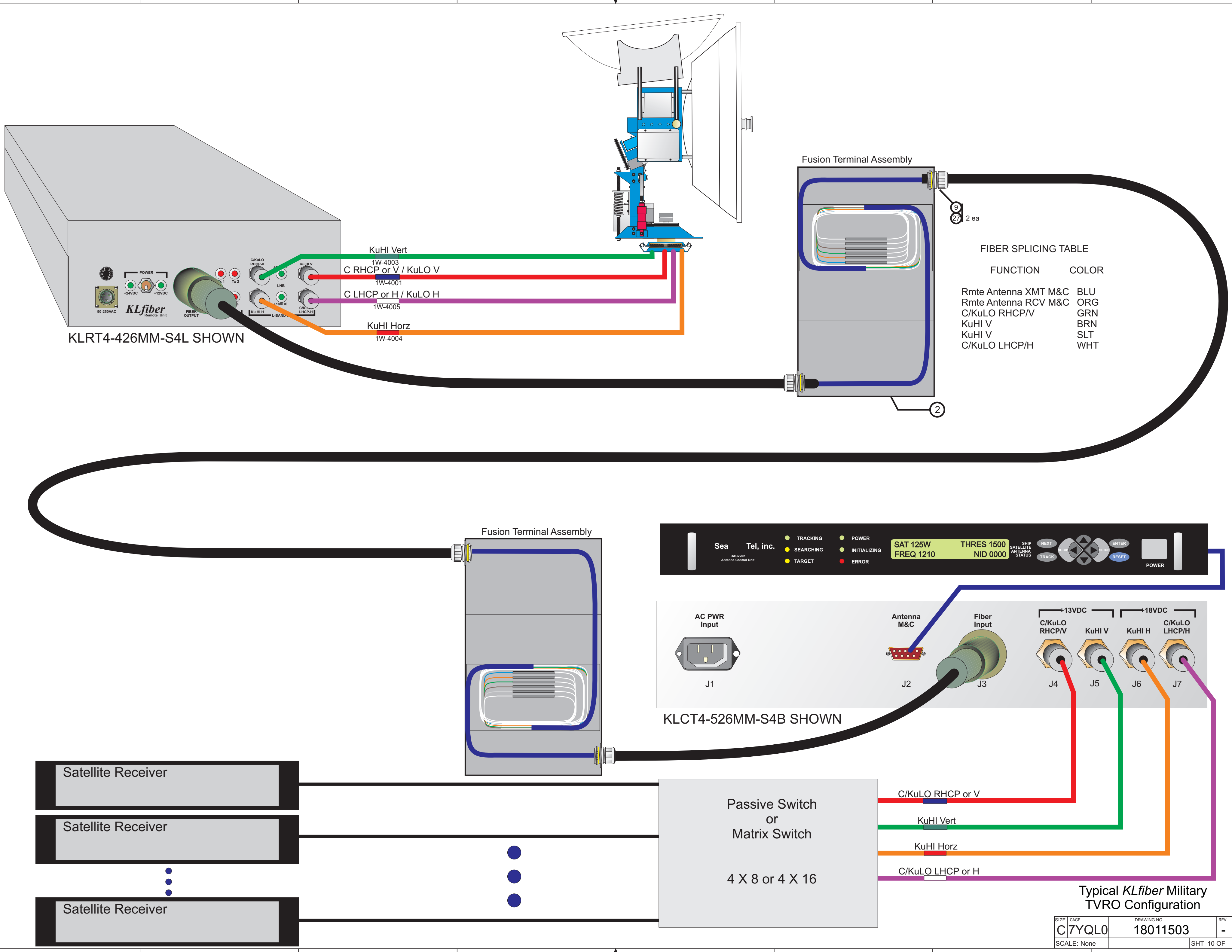
KLRT4-*m26cd*-SyyBz O&M
Fiber Converter Unit

SIZE	FSCM	DRAWING NO.	REV
C	7YQL0	18011503	-
SCALE: N/A		SHEET 8 OF	

VIEW A-A

KLRT4-526cM-Sx2LM Shown





FIBER SPLICING TABLE

FUNCTION	COLOR
Rmte Antenna XMT M&C	BLU
Rmte Antenna RCV M&C	ORG
C/KuLO RHCP/V	GRN
KuHI V	BRN
KuHI V	SLT
C/KuLO LHCP/H	WHT

Sea Tel, inc. BAC2202 Antenna Control Unit

● TRACKING

● SEARCHING

● TARGET

● POWER

● INITIALIZING

● ERROR

SAT 125W
FREQ 1210

THRES 1500
NID 0000

SHIP SATELLITE ANTENNA STATUS

● NEXT
● TRACK
● RETURN
● ENTER
● RESET

POWER

AC PWR Input
J1

Antenna M&C
J2

Fiber Input
J3

+13VDC

C/KuLO RHCP/V
J4

+18VDC

KuHI V
J5

KuHI H
J6

C/KuLO LHCP/H
J7

KLCT4-526MM-S4B SHOWN

Passive Switch
or
Matrix Switch

4 X 8 or 4 X 16

Typical KLfiber Military TVRO Configuration

