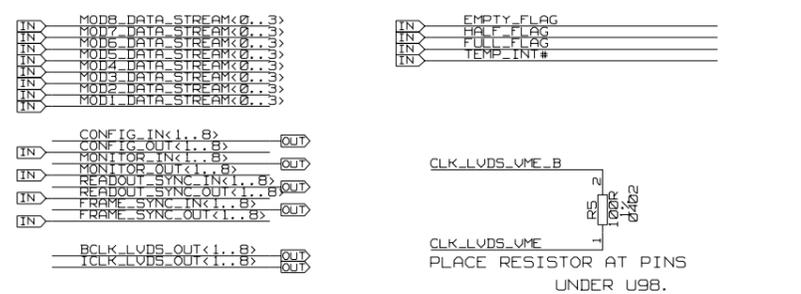
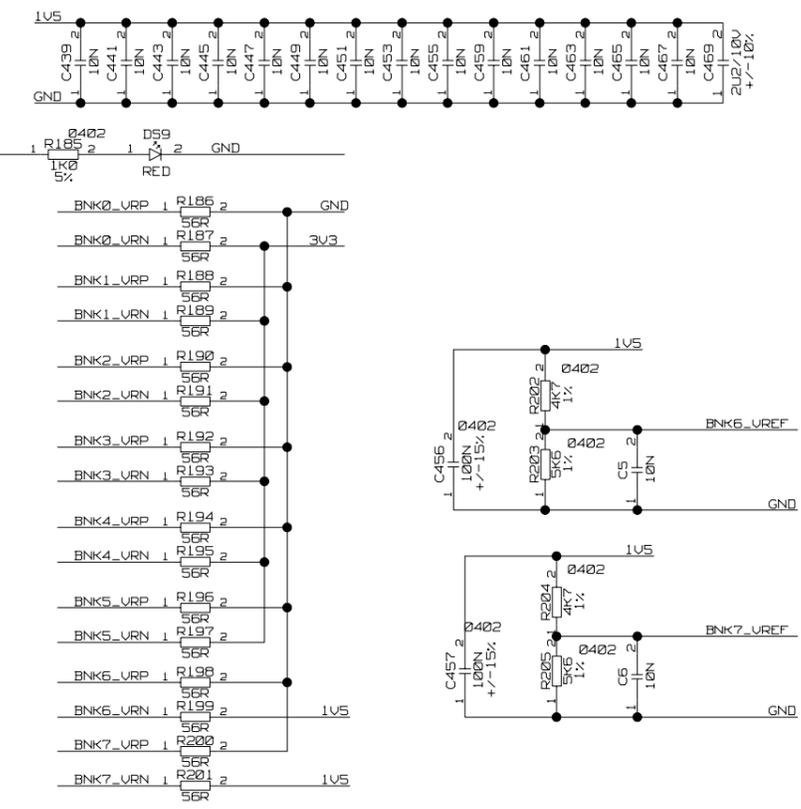
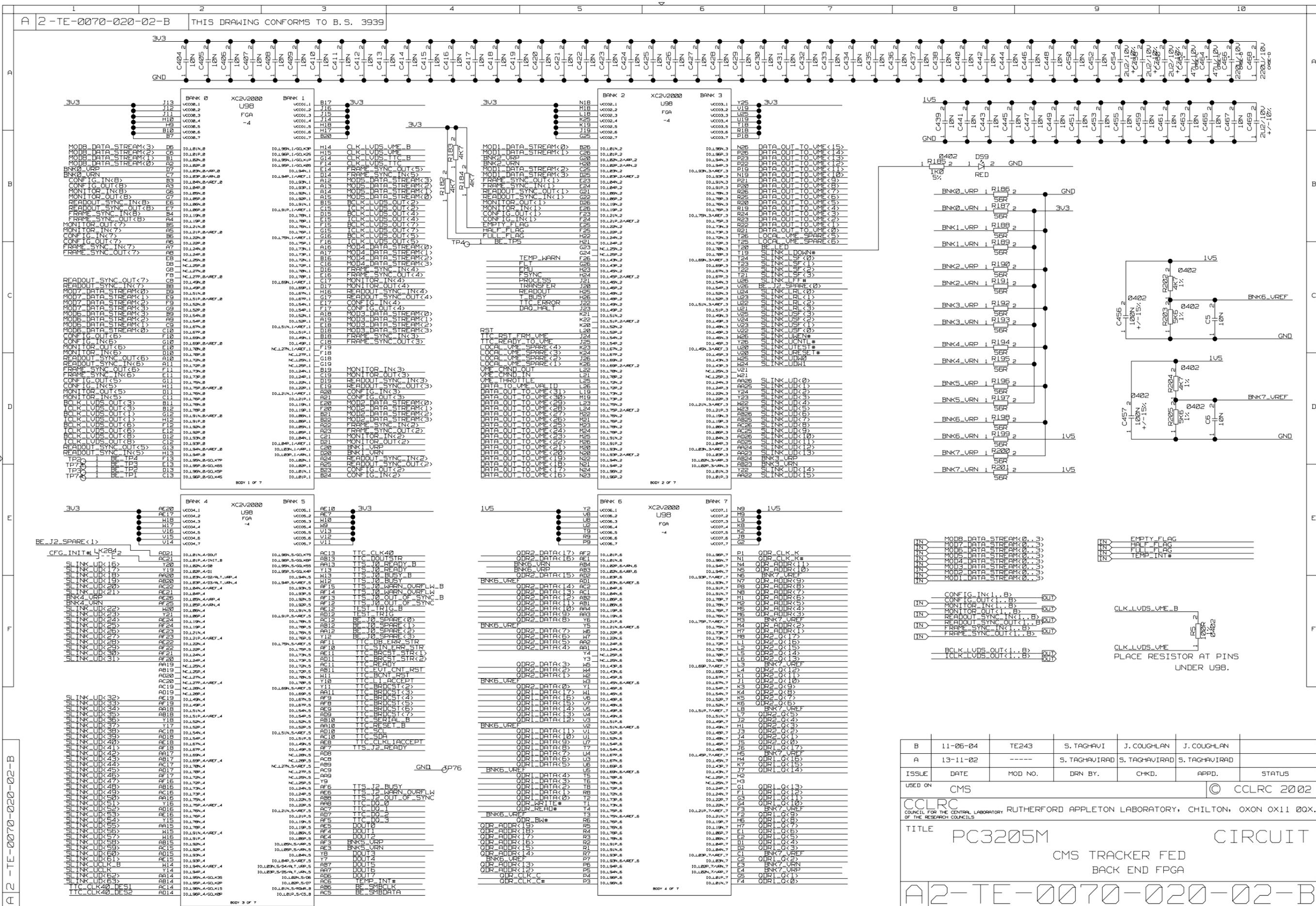


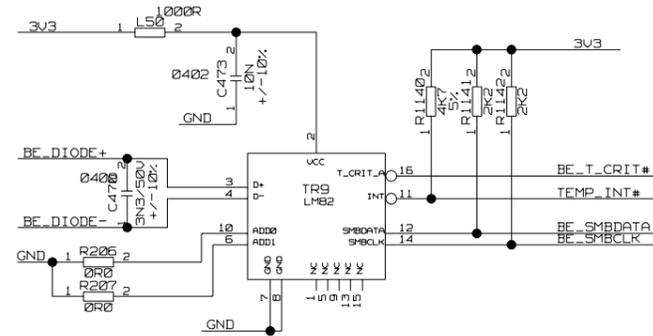
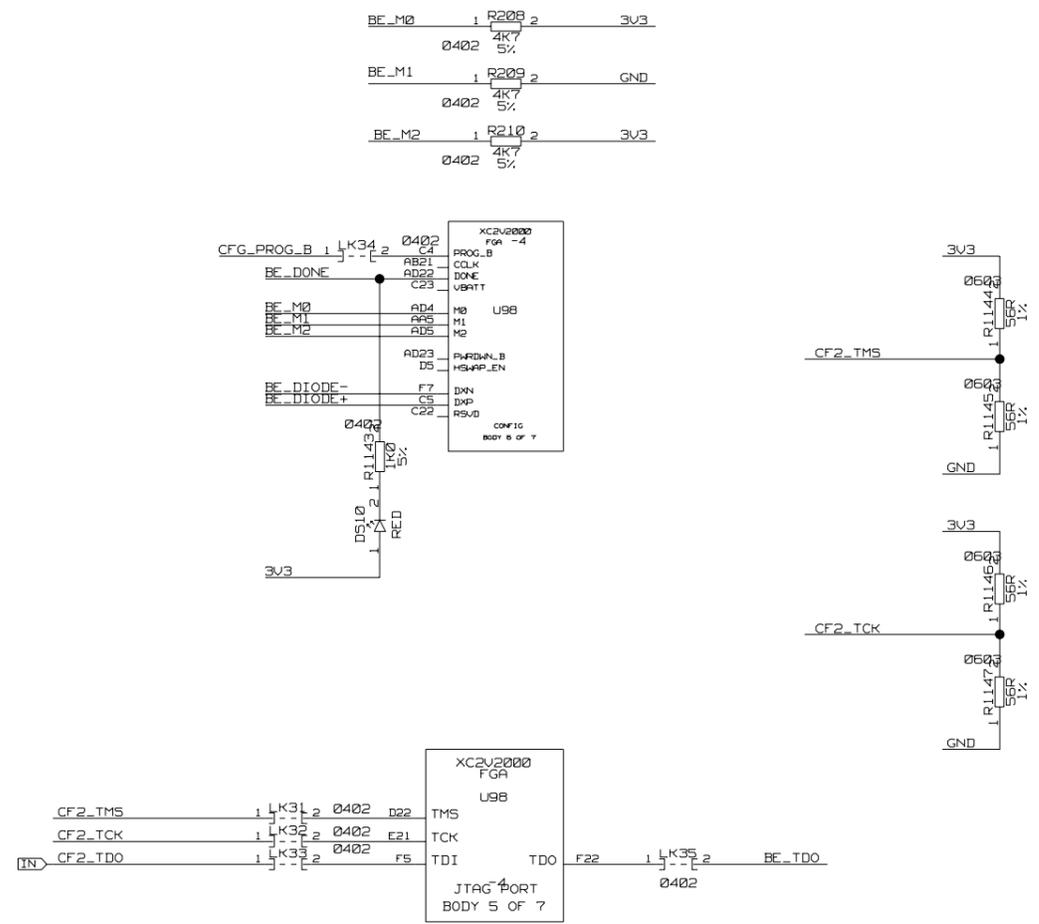
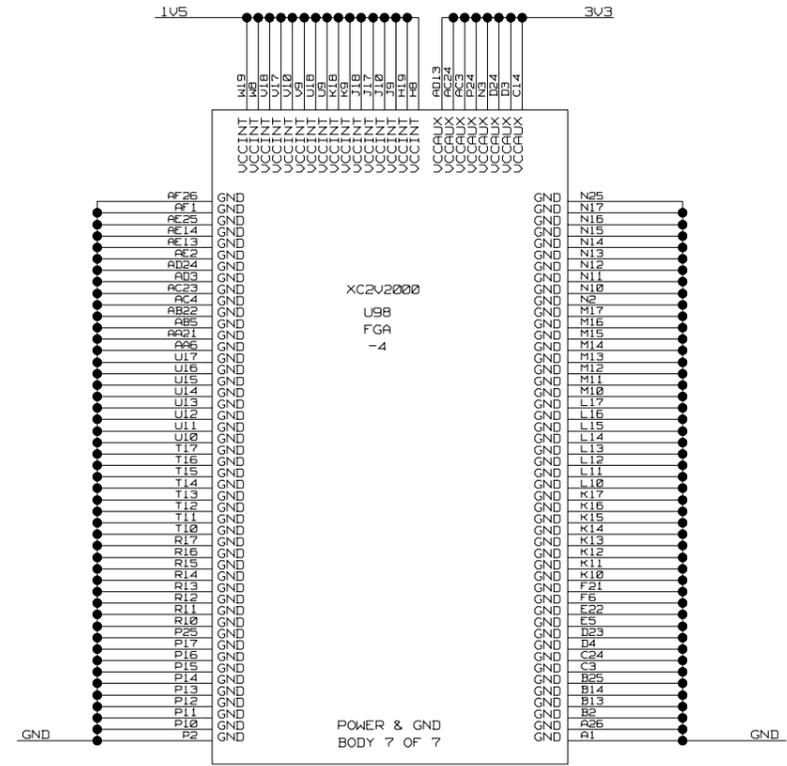
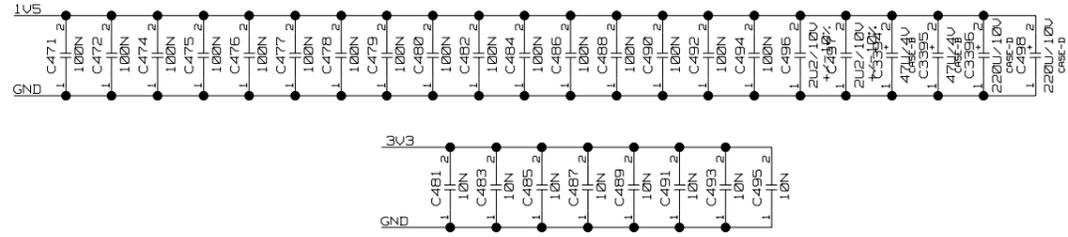


B	11-05-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	S. TAGHAVIRAD	S. TAGHAVIRAD	S. TAGHAVIRAD	
ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS

USED ON CMS © CCLRC 2002
 CCLRC COUNCIL FOR THE CENTRAL LABORATORY OF THE RESEARCH COUNCILS RUTHERFORD APPLETON LABORATORY, CHILTON, OXON OX11 0QX.
 TITLE PC3205M CIRCUIT
 CMS TRACKER FED
 TOP LEVEL

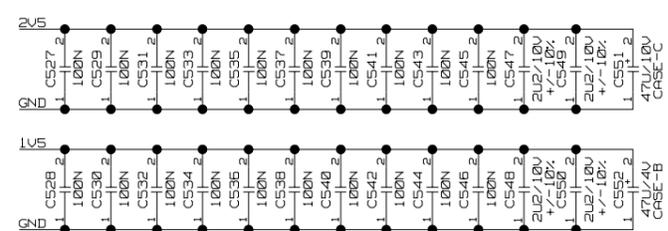
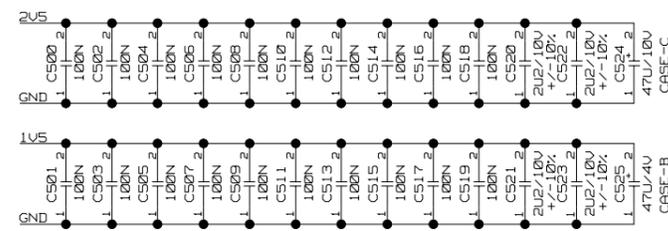
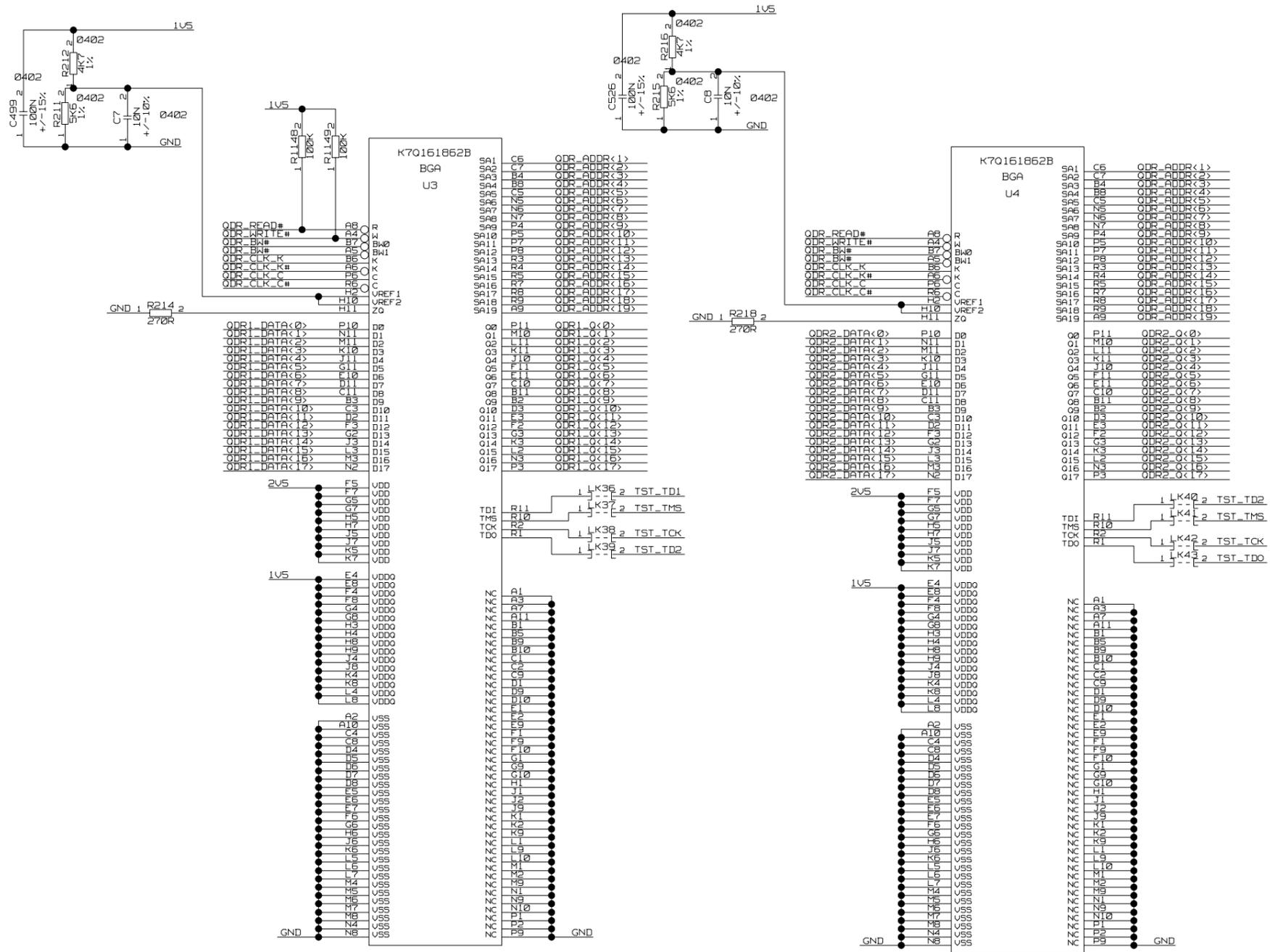


ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS
	11-06-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
	13-11-02	----	S. TAGHAVIRAD	S. TAGHAVIRAD	S. TAGHAVIRAD	
USED ON	CMS		© CCLRC 2002			
TITLE	PC3205M		CIRCUIT			
			CMS TRACKER FED BACK END FPGA			
A2-TE-0070-020-02-B						
TOTAL NO. OF SHEETS 95						



B	11-05-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	S. TAGHAVIRAD	S. TAGHAVIRAD	S. TAGHAVIRAD	
ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS
USED ON	CMS					© CCLRC 2002
CCLRC COUNCIL FOR THE CENTRAL LABORATORY OF THE RESEARCH COUNCILS						
RUTHERFORD APPLETON LABORATORY, CHILTON, OXON OX11 0QX.						
TITLE			PC3205M CIRCUIT			
CMS TRACKER FED BACK END FPGA						
A2-TE-0070-020-03-B						
						TOTAL NO. OF SHEETS 95

A 2-TE-0070-020-03-B

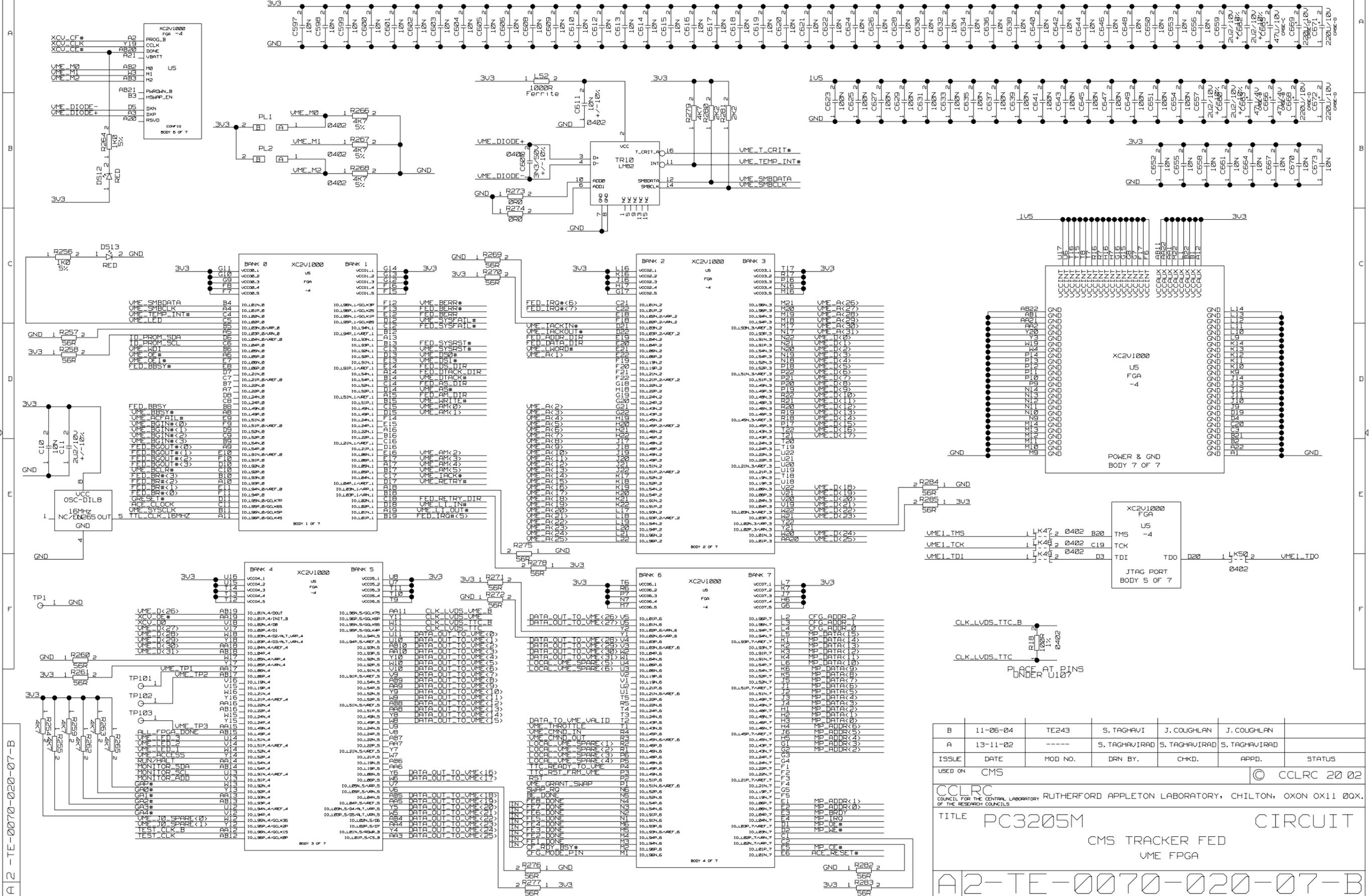


B	11-06-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	S. TAGHAVIRAD	S. TAGHAVIRAD	S. TAGHAVIRAD	
ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS

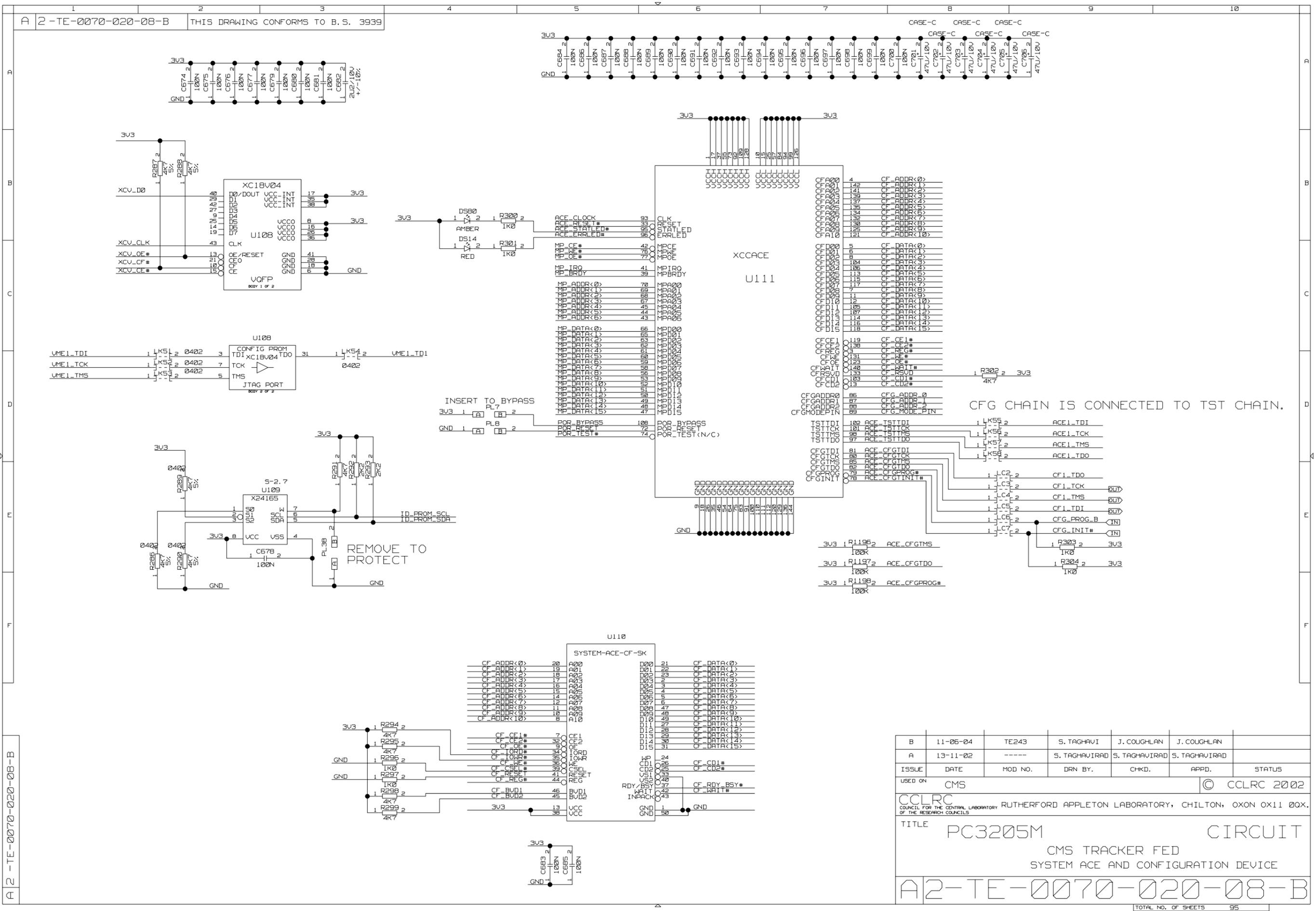
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CCLRC COUNCIL FOR THE CENTRAL LABORATORY RUTHERFORD APPLETON LABORATORY, CHILTON, OXON OX11 0QX. OF THE RESEARCH COUNCILS

TITLE PC3205M CIRCUIT
CMS TRACKER FED QDR MEMORY



ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS
B	11-06-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	S. TAGHAVIRAD	S. TAGHAVIRAD	S. TAGHAVIRAD	
USED ON						CMS
CCLRC						© CCLRC 20 02
COUNCIL FOR THE CENTRAL LABORATORY OF THE RESEARCH COUNCILS						RUTHERFORD APPLETON LABORATORY, CHILTON, OXON OX11 0QX.
TITLE						PC3205M CIRCUIT
						CMS TRACKER FED UME FPGA
A2-TE-0070-020-07-B						

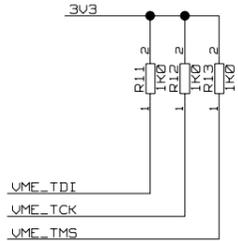
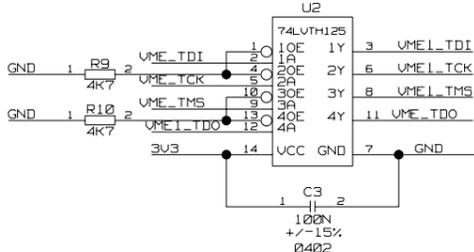
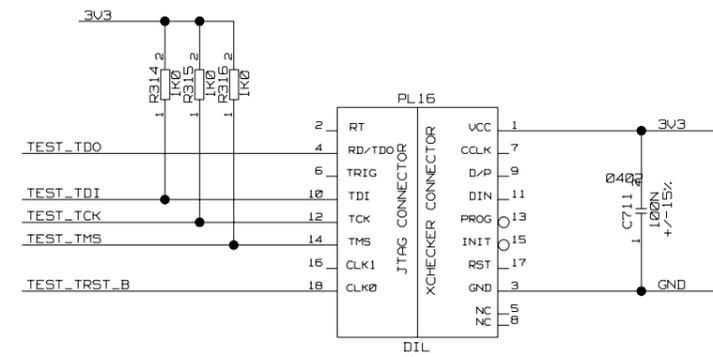
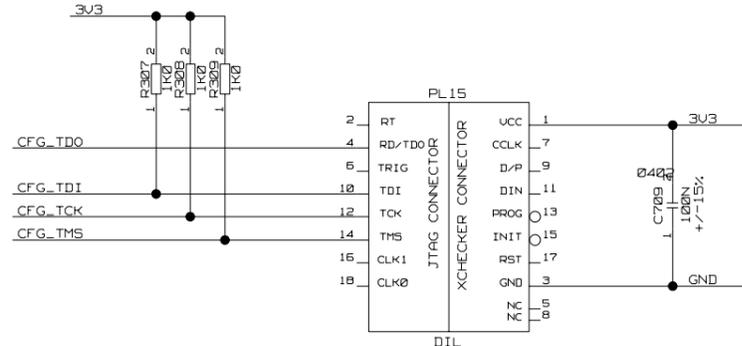
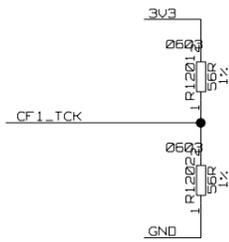
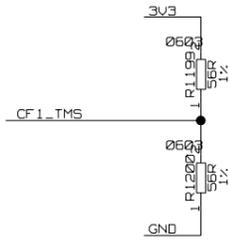
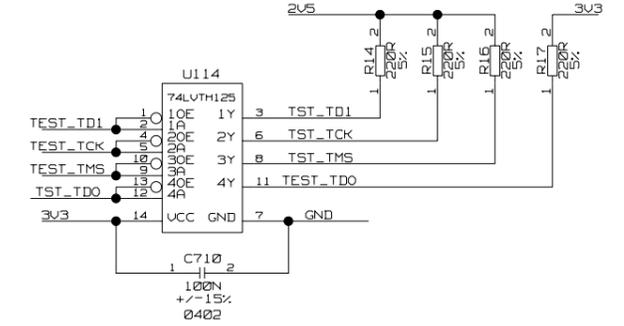
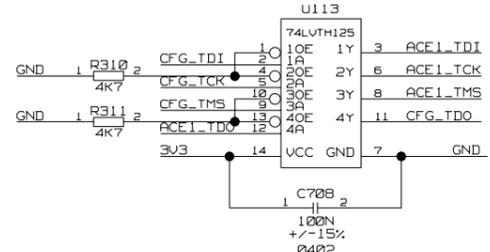
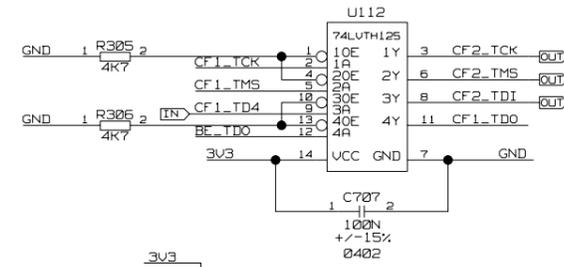


CFG CHAIN IS CONNECTED TO TST CHAIN.

REMOVE TO PROTECT

B	11-05-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	S. TAGHAVIRAD	S. TAGHAVIRAD	S. TAGHAVIRAD	
ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS
USED ON			CMS			© CCLRC 2002
CCLRC COUNCIL FOR THE CENTRAL LABORATORY RUTHERFORD APPLETON LABORATORY, CHILTON, OXON OX11 0QX. OF THE RESEARCH COUNCILS						
TITLE			PC3205M CIRCUIT			
CMS TRACKER FED SYSTEM ACE AND CONFIGURATION DEVICE						
A2-TE-0070-020-08-B						
TOTAL NO. OF SHEETS 95						

A 2-TE-0070-020-08-B

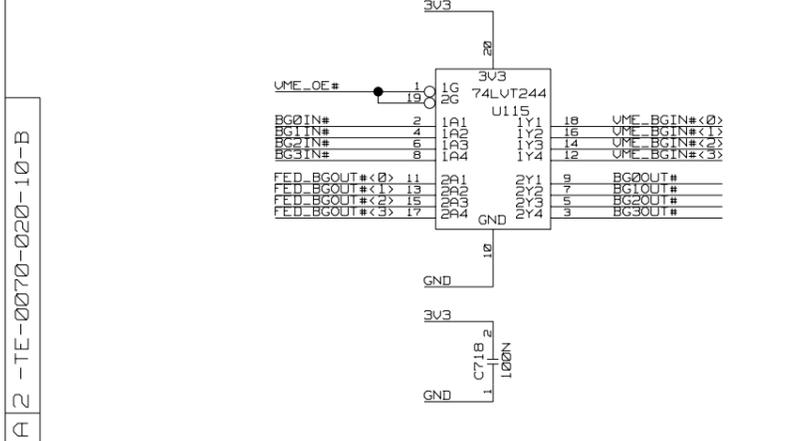
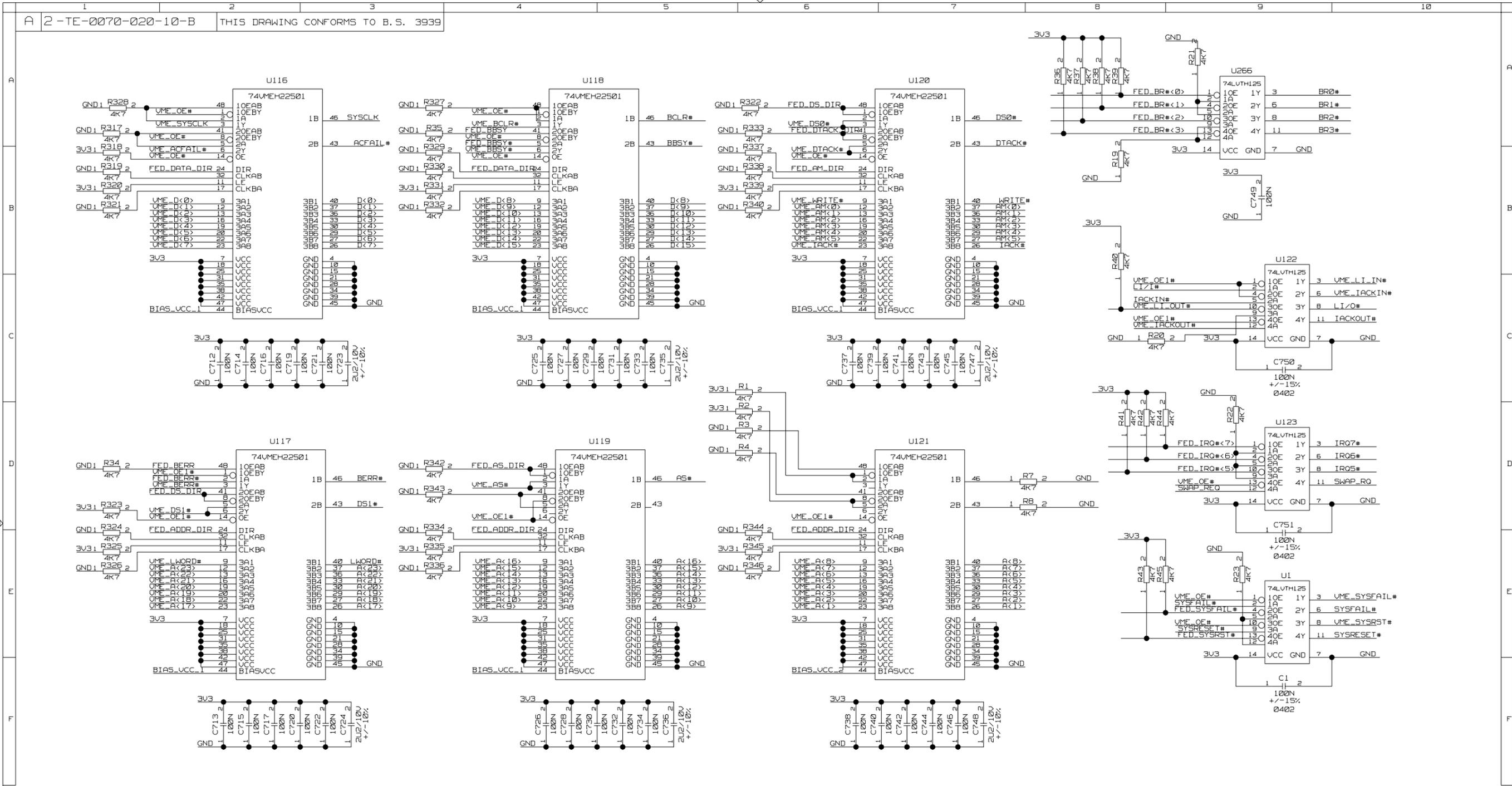


B	11-05-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	S. TAGHAVIRAD	S. TAGHAVIRAD	S. TAGHAVIRAD	
ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS

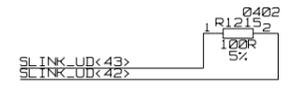
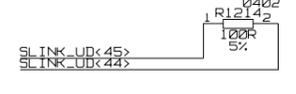
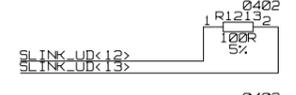
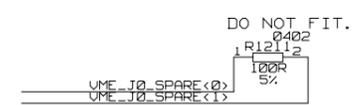
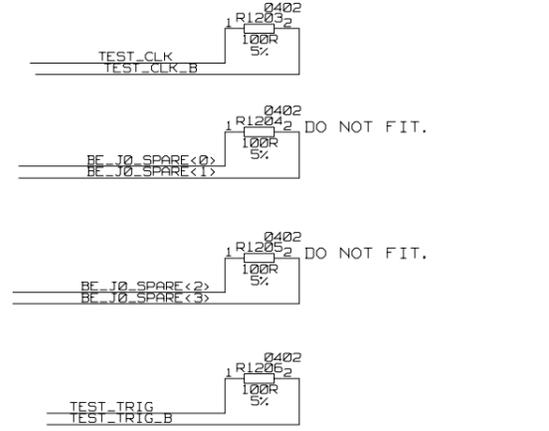
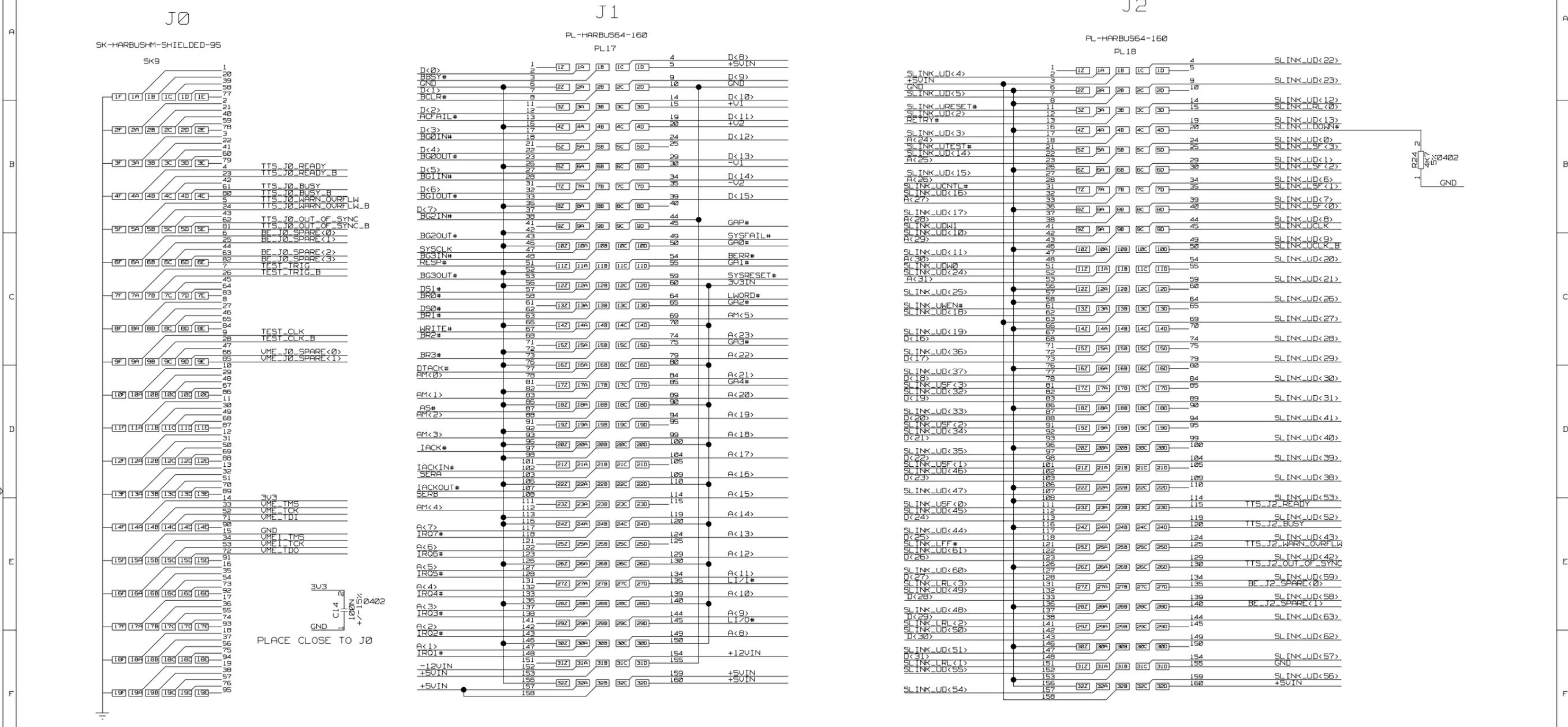
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CCLRC COUNCIL FOR THE CENTRAL LABORATORY OF THE RESEARCH COUNCILS RUTHERFORD APPLETON LABORATORY, CHILTON, OXON OX11 0QX.

TITLE PC3205M CIRCUIT
 CMS TRACKER FED
 JTAG CONNECTORS AND BUFFERS



B	11-05-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	S. TAGHAVIRAD	S. TAGHAVIRAD	S. TAGHAVIRAD	
ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS
USED ON			CMS		© CCLRC 2002	
CCLRC COUNCIL FOR THE CENTRAL LABORATORY RUTHERFORD APPLETON LABORATORY, CHILTON, OXON OX11 0QX. OF THE RESEARCH COUNCILS						
TITLE			PC3205M		CIRCUIT	
CMS TRACKER FED J1 UME INTERFACE						
A2-TE-0070-020-10-B						
TOTAL NO. OF SHEETS 95						



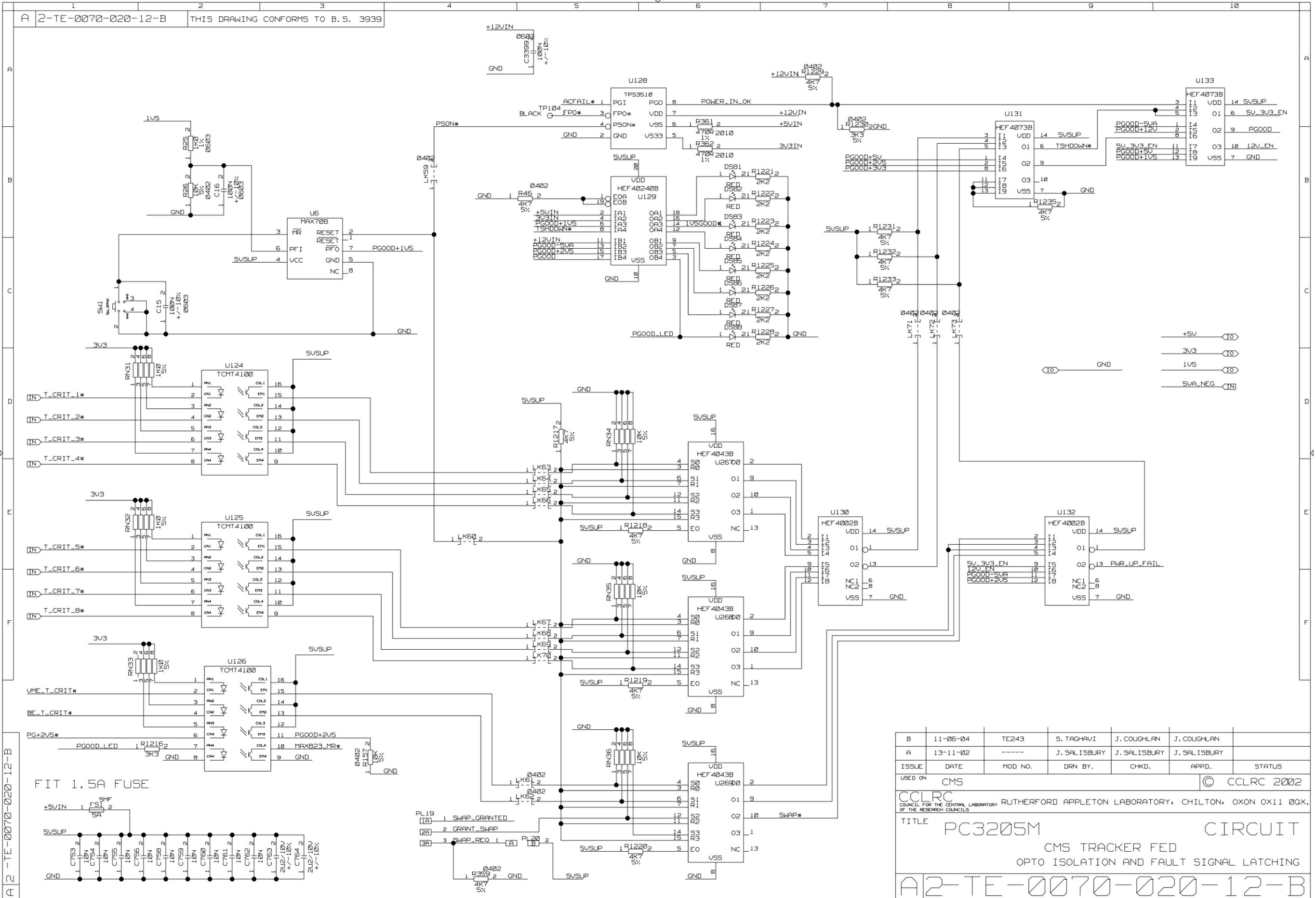
THESE RESISTORS ARE DO NOT FIT.

PLACE RESISTORS AT DESTINATION

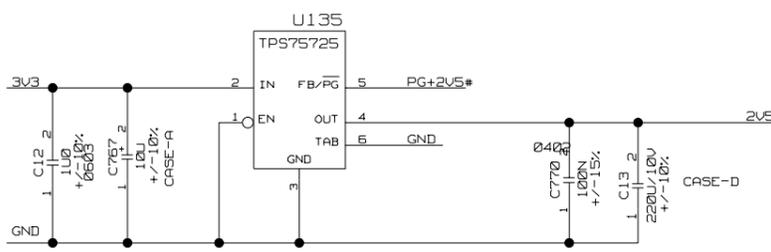
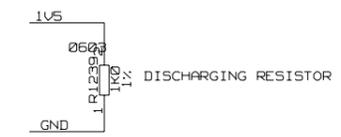
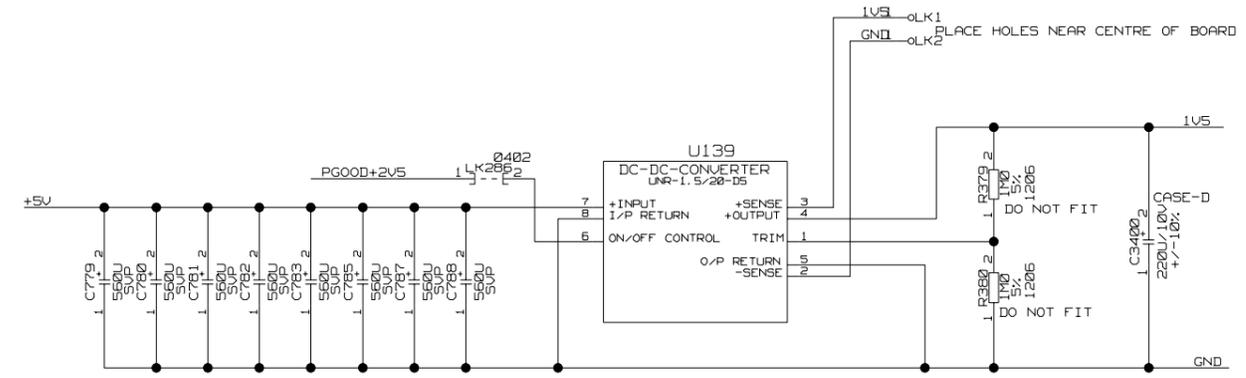
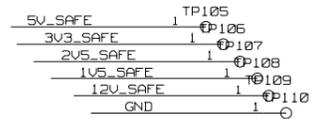
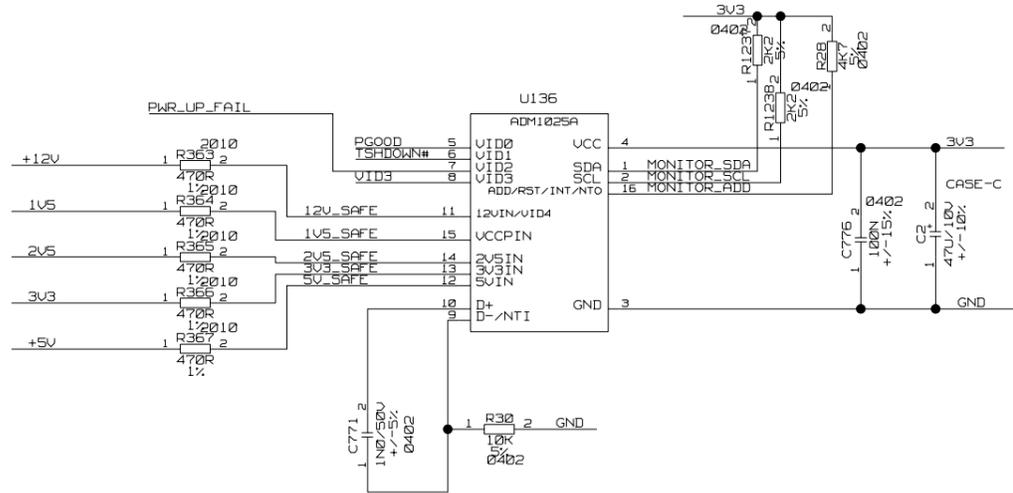
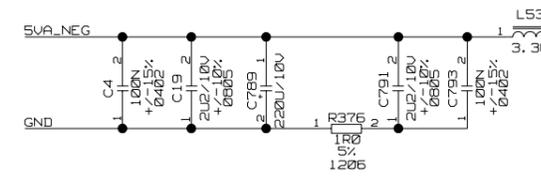
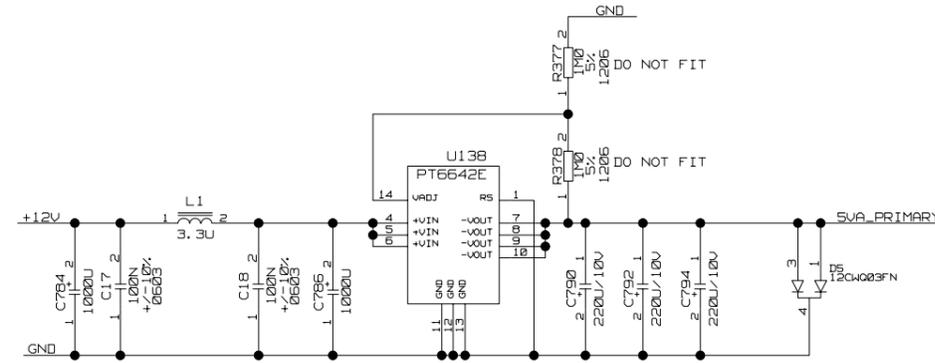
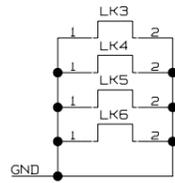
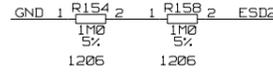
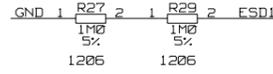
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A	13-11-02	----	S. TAGHAVIRAD	S. TAGHAVIRAD	S. TAGHAVIRAD	
ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS
USED ON			CMS			© CCLRC 2002

CCLRC COUNCIL FOR THE CENTRAL LABORATORY RUTHERFORD APPLETON LABORATORY, CHILTON, OXON OX11 0QX. OF THE RESEARCH COUNCILS

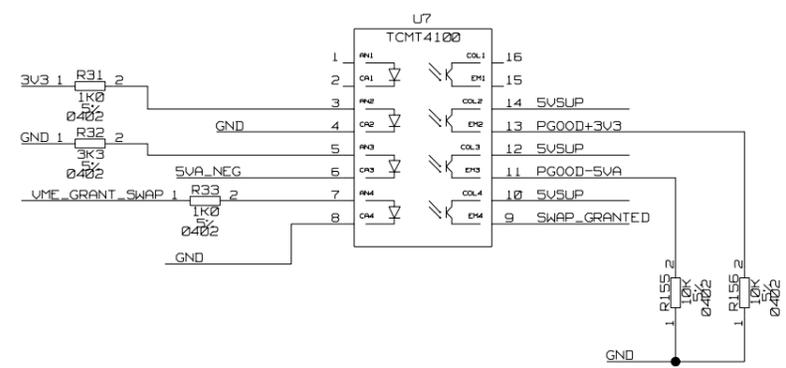
TITLE PC3205M CIRCUI
CMS TRACKER FED CONNECTORS



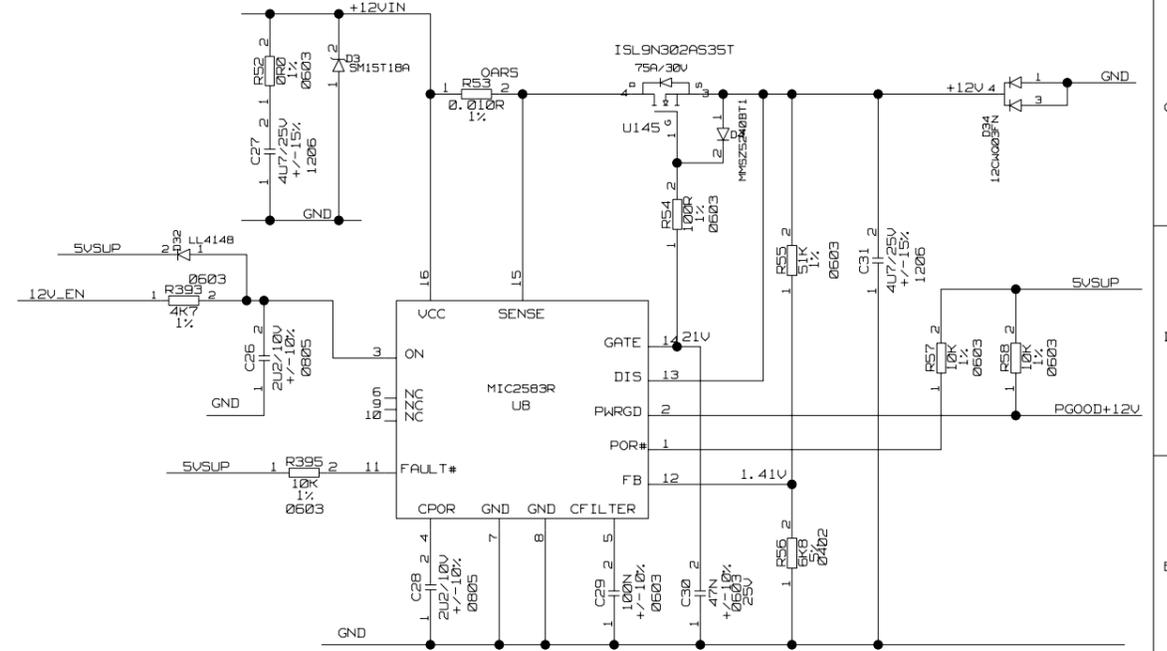
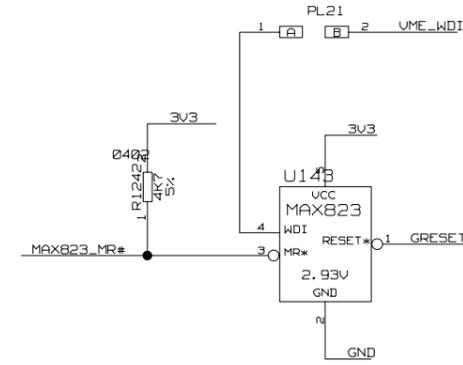
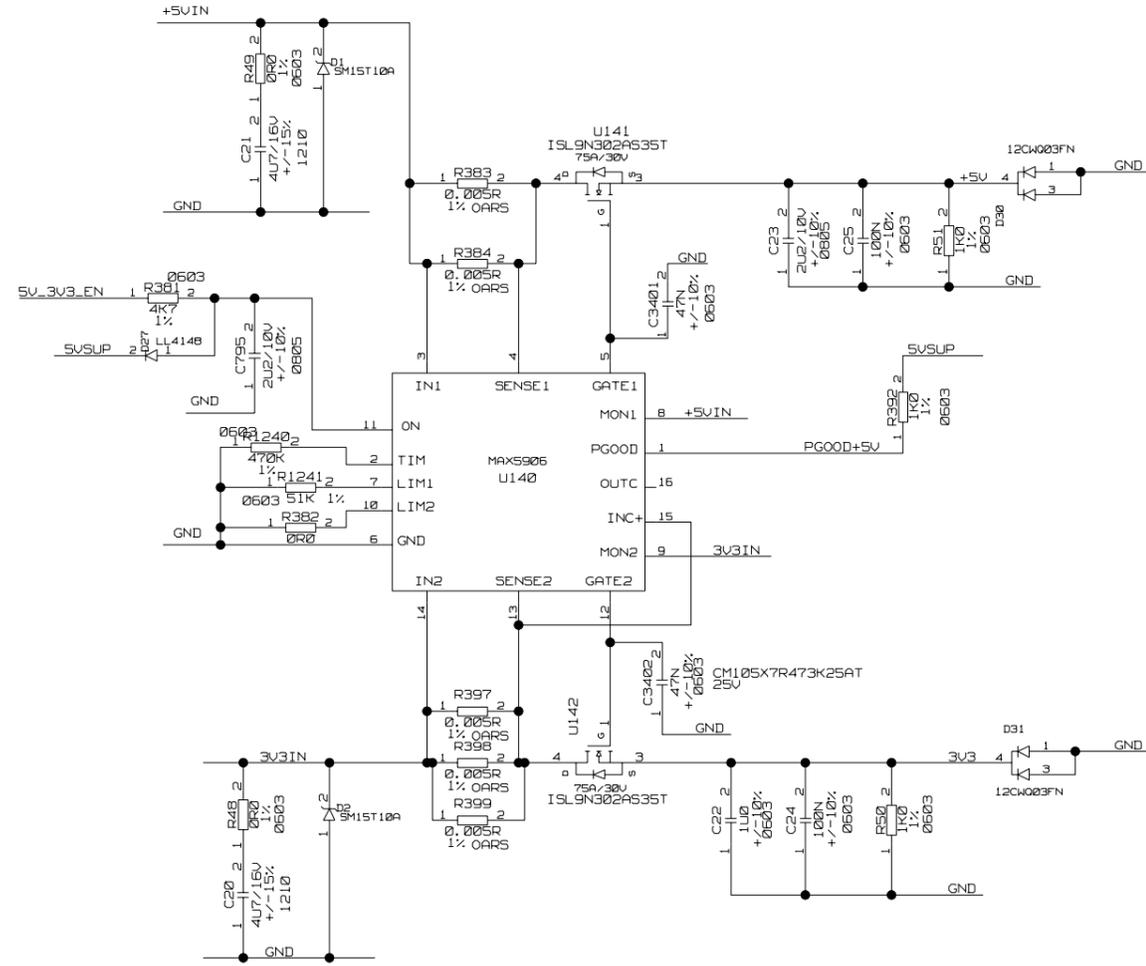
B	11-05-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	J. SALISBURY	J. SALISBURY	J. SALISBURY	
ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS
USED ON			CMS			© CCLRC 2002
CCLRC COUNCIL FOR THE CENTRAL LABORATORY OF THE RESEARCH COUNCILS RUTHERFORD APPLETON LABORATORY, CHILTON, OXON OX11 0QX.						
TITLE			PC3205M			
			CIRCUIT			
			CMS TRACKER FED			
			OPTO ISOLATION AND FAULT SIGNAL LATCHING			
A2-TE-0070-020-12-B						
						TOTAL NO. OF SHEETS 95



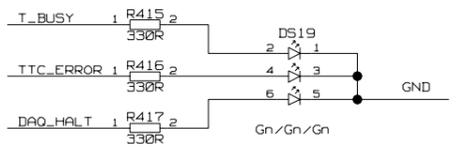
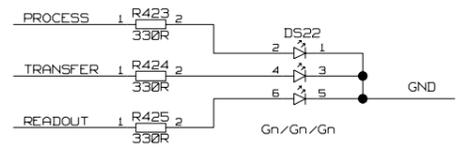
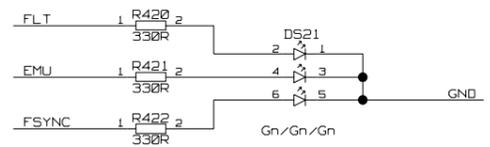
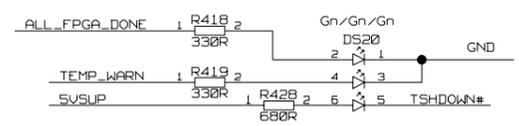
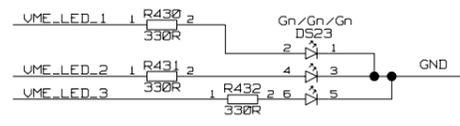
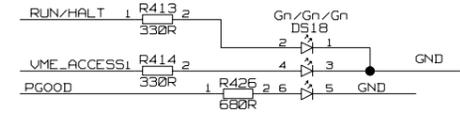
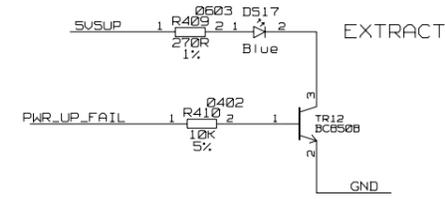
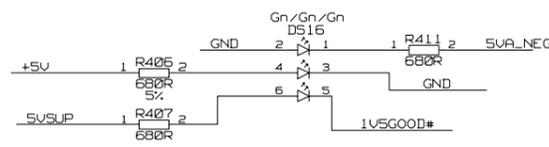
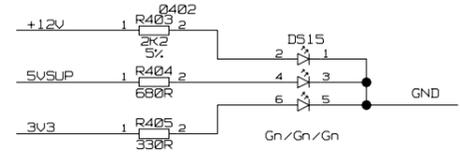
TPS75725 IS CONDITIONALLY STABLE
CONSULT DATA SHEET BEFORE CHANGING CAPACITORS



B	11-05-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	J. SALISBURY	J. SALISBURY	J. SALISBURY	
ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS
USED ON			CMS		© CCLRC 2002	
CCLRC COUNCIL FOR THE CENTRAL LABORATORY RUTHERFORD APPLETON LABORATORY, CHILTON, OXON OX11 0QX. OF THE RESEARCH COUNCILS						
TITLE			PC3205M		CIRCUIT	
CMS TRACKER FED DC-DC CONVERTORS AND MONITORING						
A2-TE-0070-020-13-B						
						TOTAL NO. OF SHEETS
						95



B	11-06-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	J. SALISBURY	J. SALISBURY	J. SALISBURY	
ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS
USED ON					CMS	© CCLRC 2002
CCLRC COUNCIL FOR THE CENTRAL LABORATORY RUTHERFORD APPLETON LABORATORY, CHILTON, OXON OX11 0QX. OF THE RESEARCH COUNCILS						
TITLE			PC3205M	CIRCUIT		
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A 2-TE-0070-020-14-B						
TOTAL NO. OF SHEETS						95

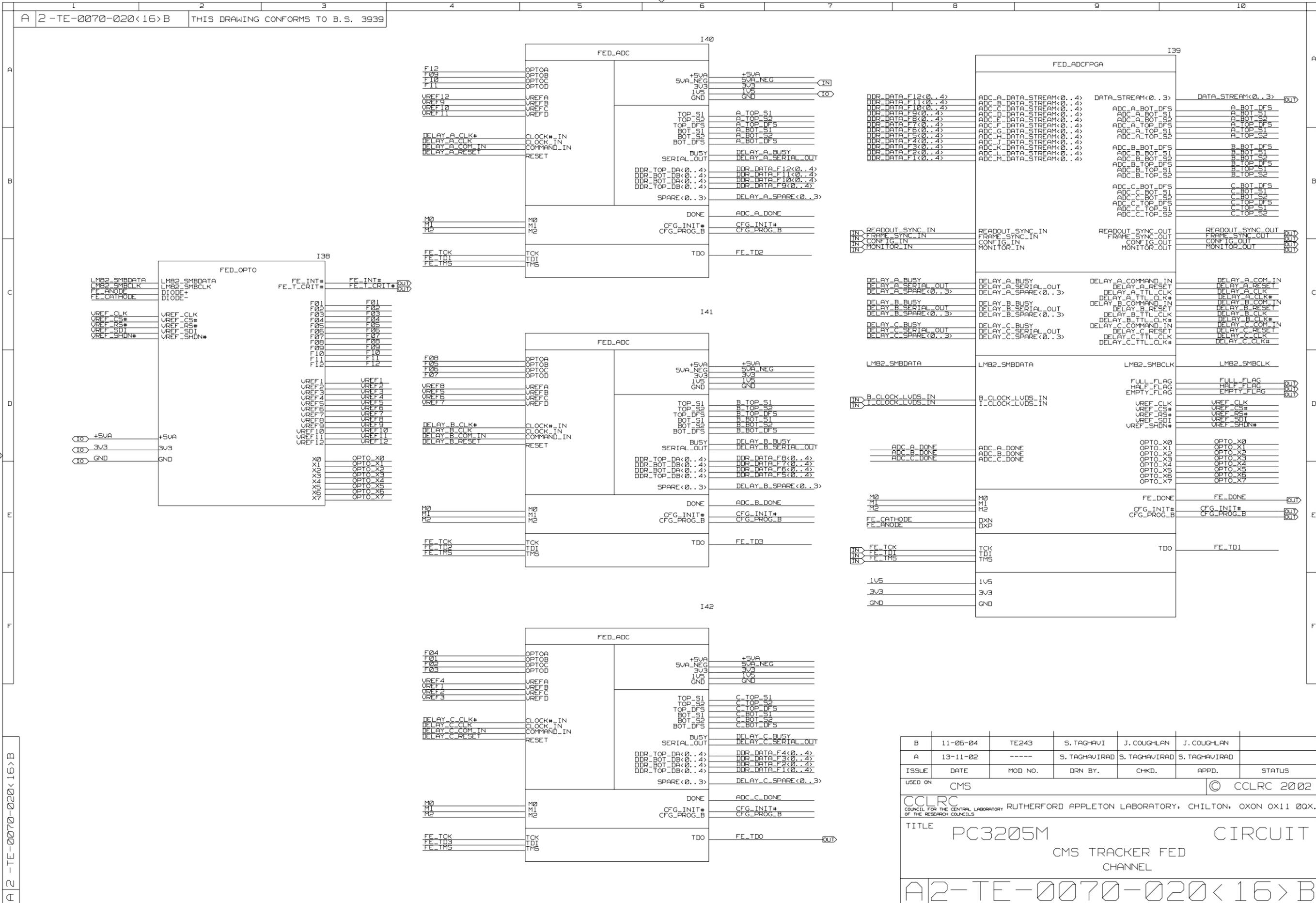


B	11-06-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	-----	J. SALISBURY	J. SALISBURY	J. SALISBURY	
ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS

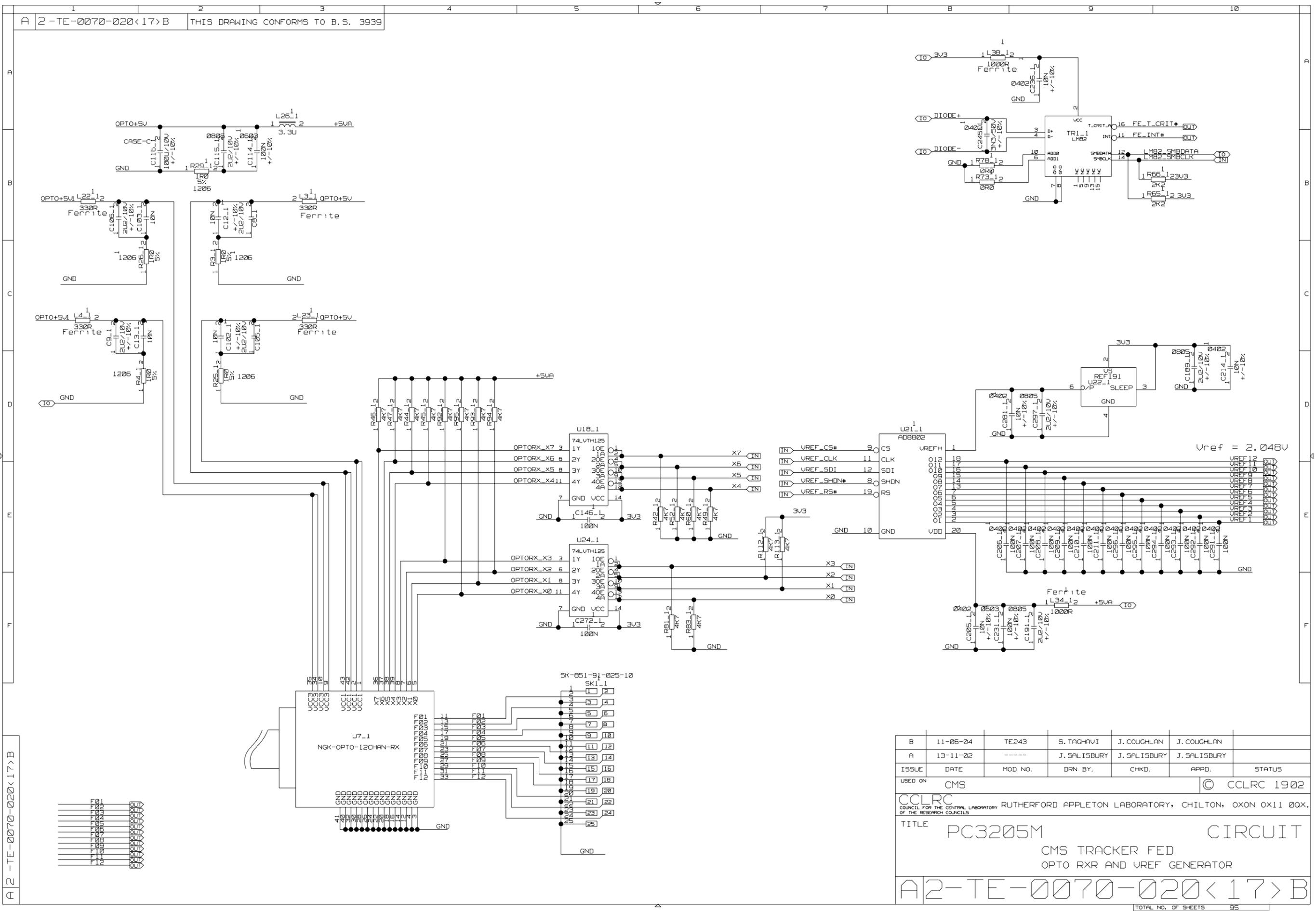
USED ON CMS © CCLRC 20 02

CCLRC COUNCIL FOR THE CENTRAL LABORATORY OF THE RESEARCH COUNCILS RUTHERFORD APPLETON LABORATORY, CHILTON, OXON OX11 0QX.

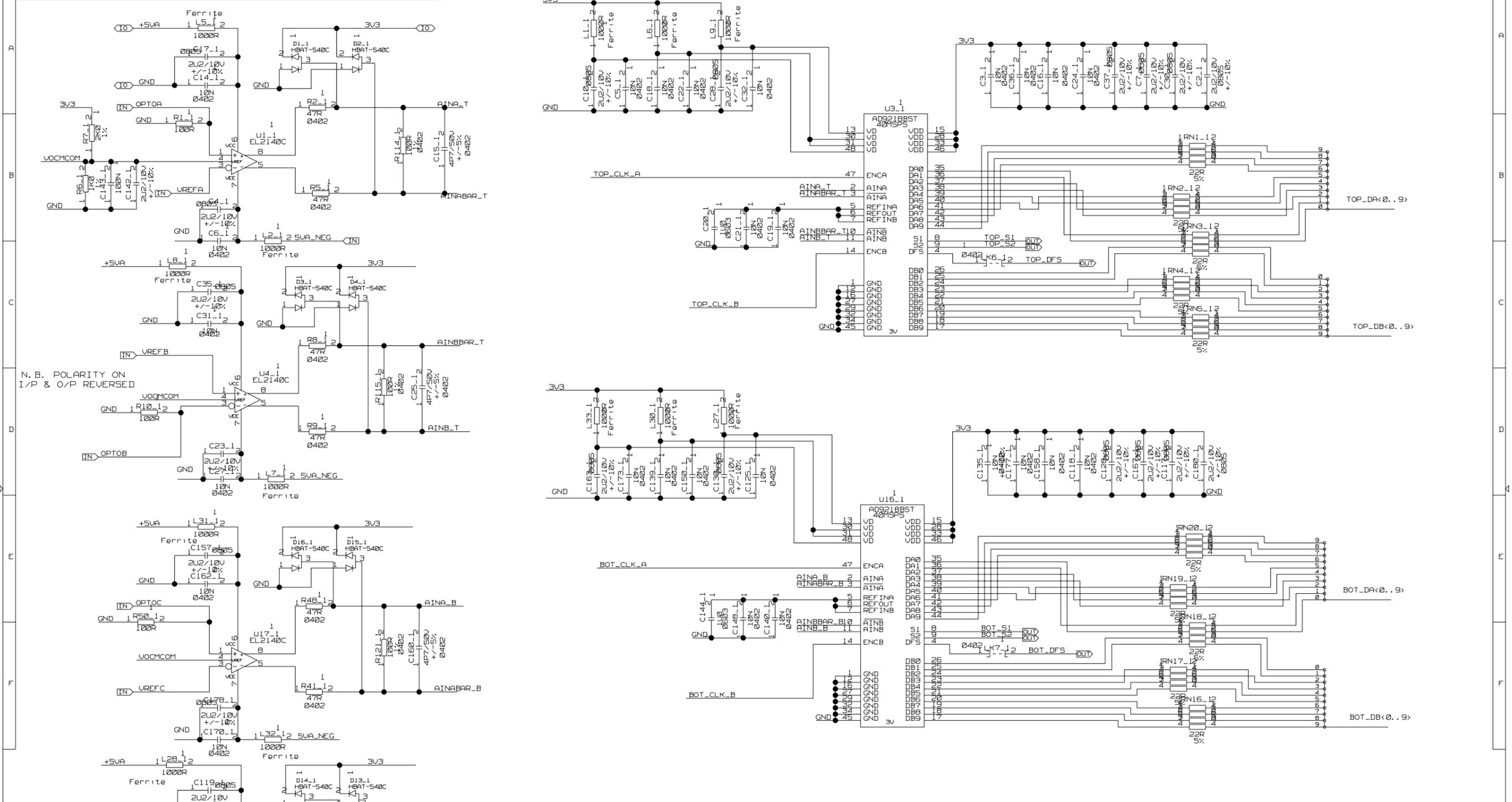
TITLE PC3205M CIRCUIT
CMS TRACKER FED
FRONT PANEL DISPLAY



B	11-05-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	S. TAGHAVIRAD	S. TAGHAVIRAD	S. TAGHAVIRAD	
ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS
USED ON					CMS	© CCLRC 2002
CCLRC COUNCIL FOR THE CENTRAL LABORATORY RUTHERFORD APPLETON LABORATORY, CHILTON, OXON OX11 0QX. OF THE RESEARCH COUNCILS						
TITLE			PC3205M CIRCUIT			
CMS TRACKER FED CHANNEL						
A2-TE-0070-020<16>B						



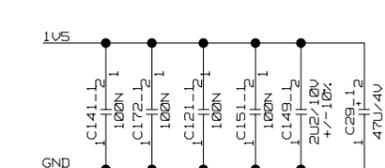
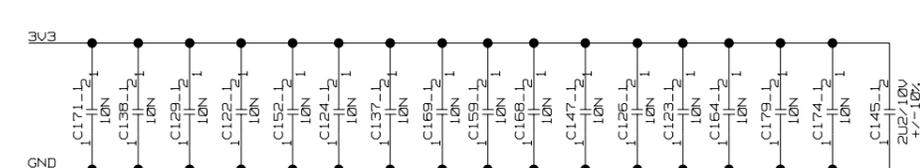
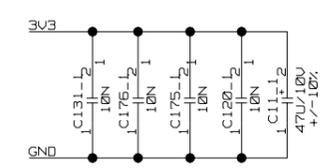
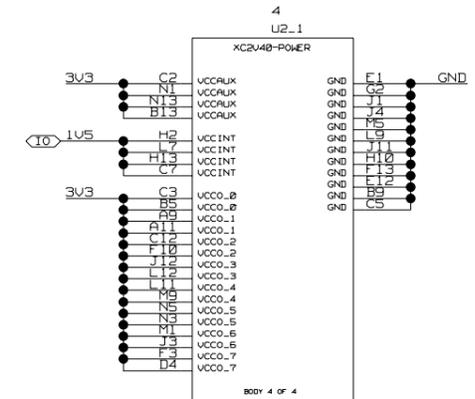
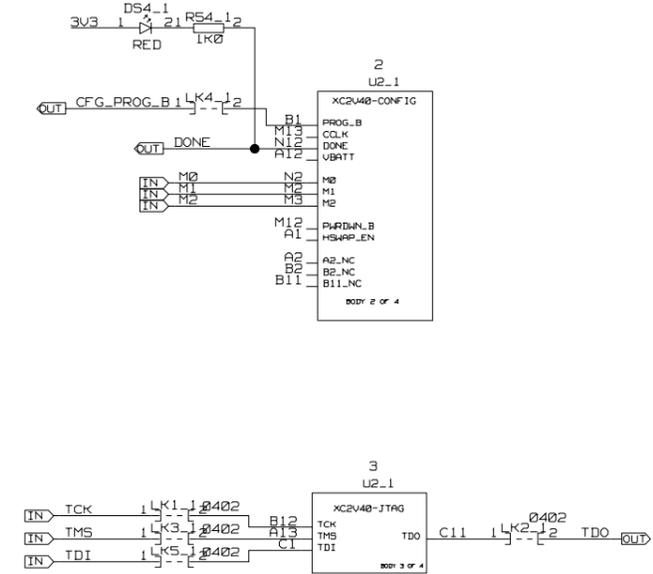
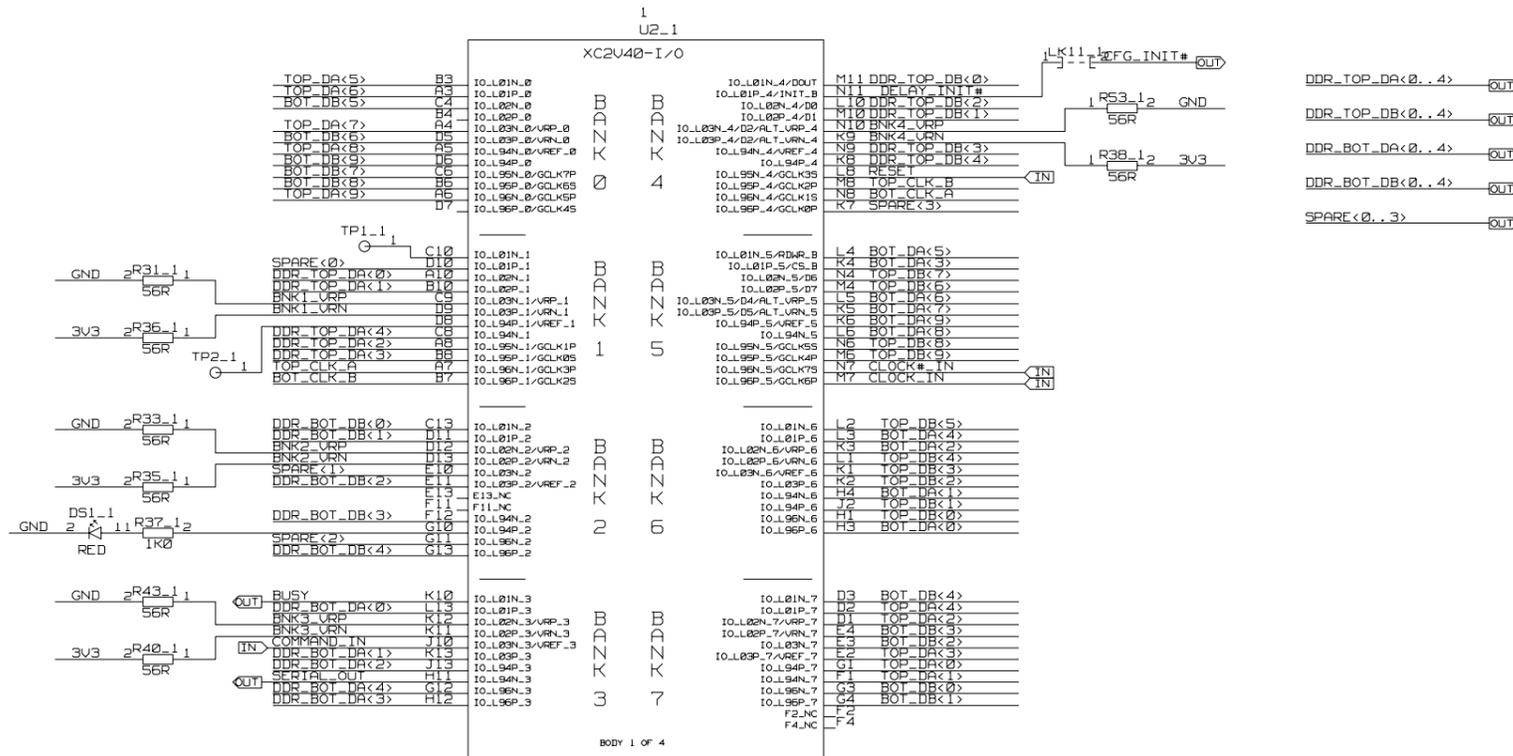
B	11-05-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	J. SALISBURY	J. SALISBURY	J. SALISBURY	
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TITLE			PC3205M		CIRCUIT	
CMS TRACKER FED OPTO RXR AND UREF GENERATOR						
A2-TE-0070-020<17>B						
TOTAL NO. OF SHEETS 95						



N.B. POLARITY ON I/P & O/P REVERSED

N.B. POLARITY ON I/P & O/P REVERSED

B	11-05-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	J. SALISBURY	J. SALISBURY	J. SALISBURY	
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TITLE			PC3205M		CIRCUIT	
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A2-TE-0070-020<18>B						
TOTAL NO. OF SHEETS 95						

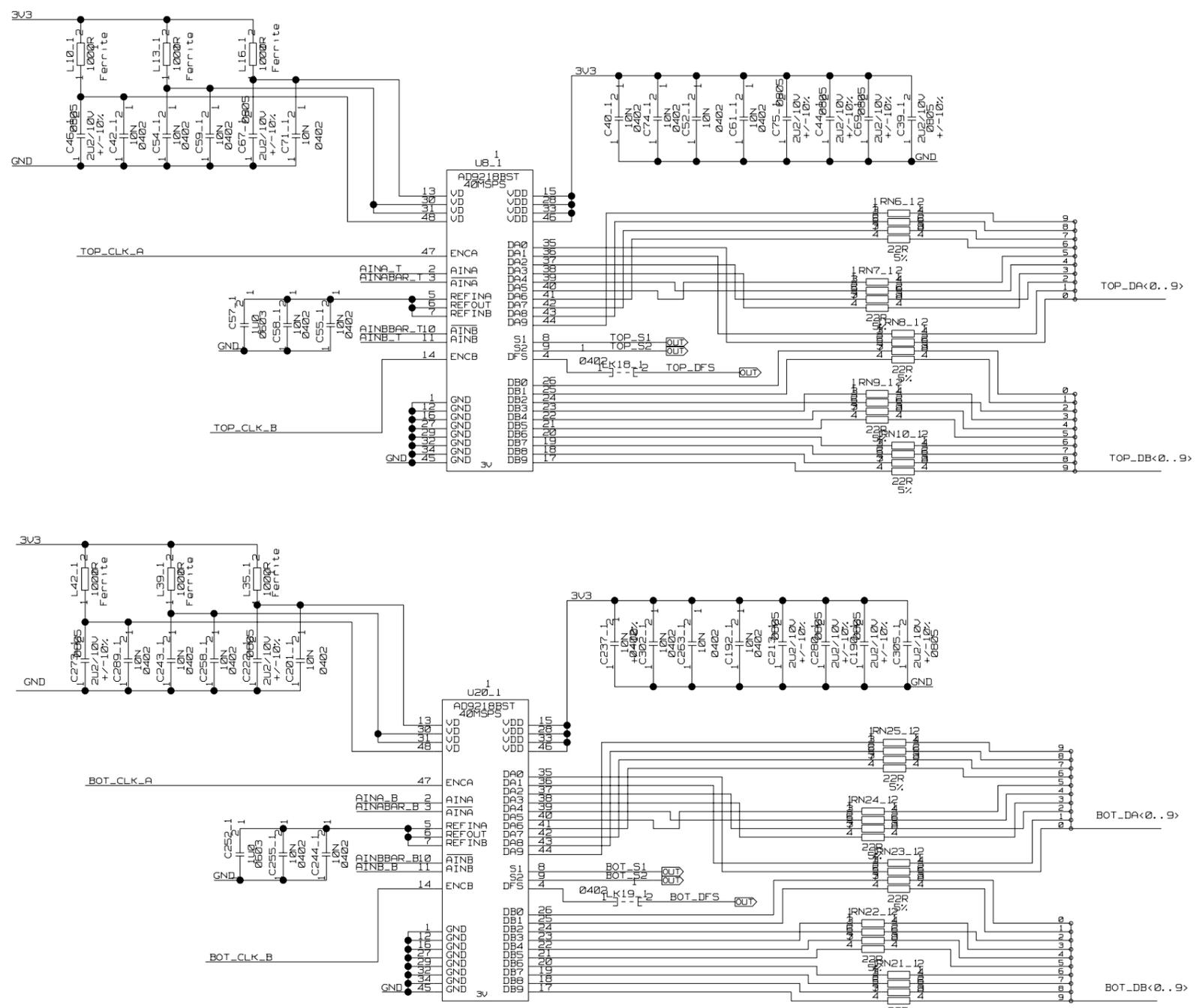
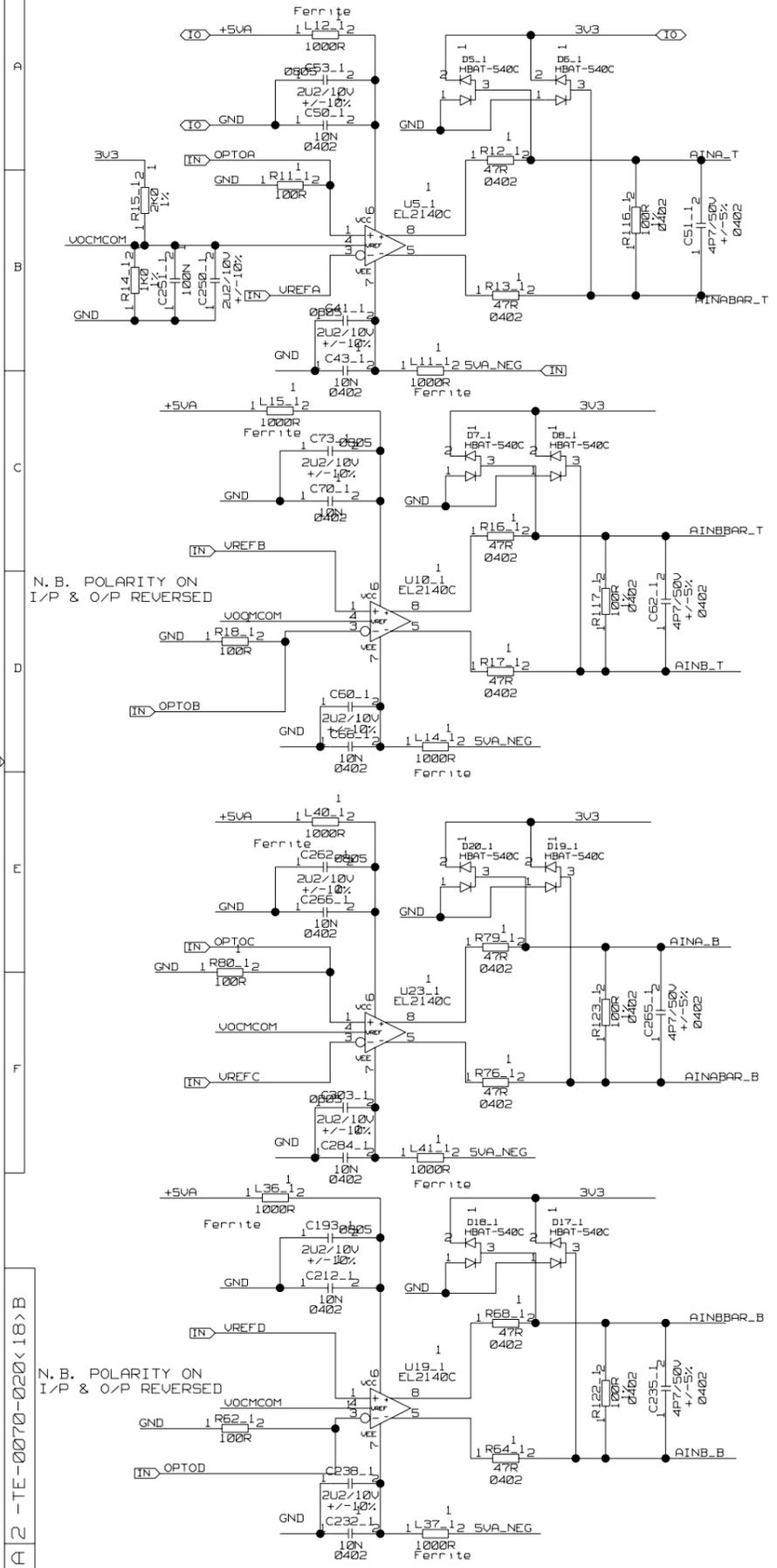


B	11-05-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	S. TAGHAVIRAD	S. TAGHAVIRAD	S. TAGHAVIRAD	
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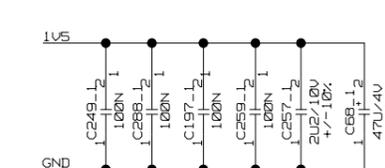
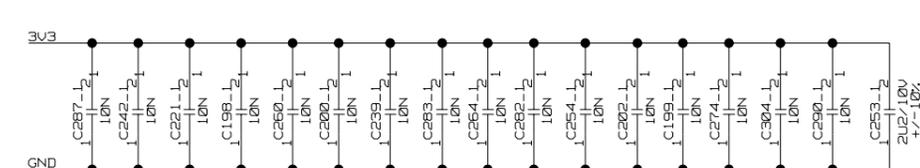
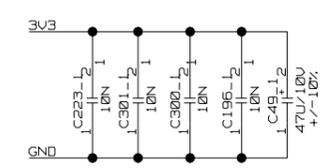
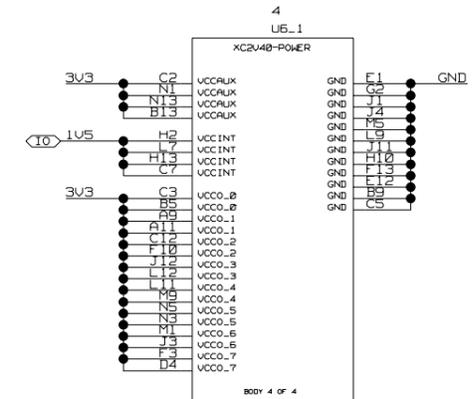
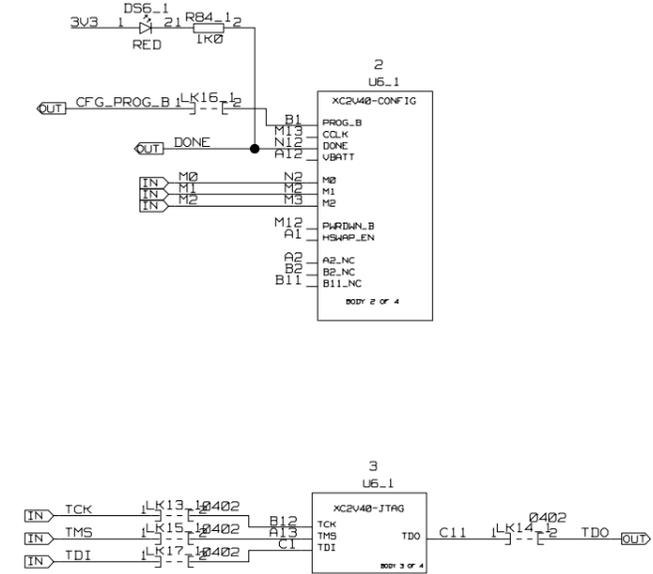
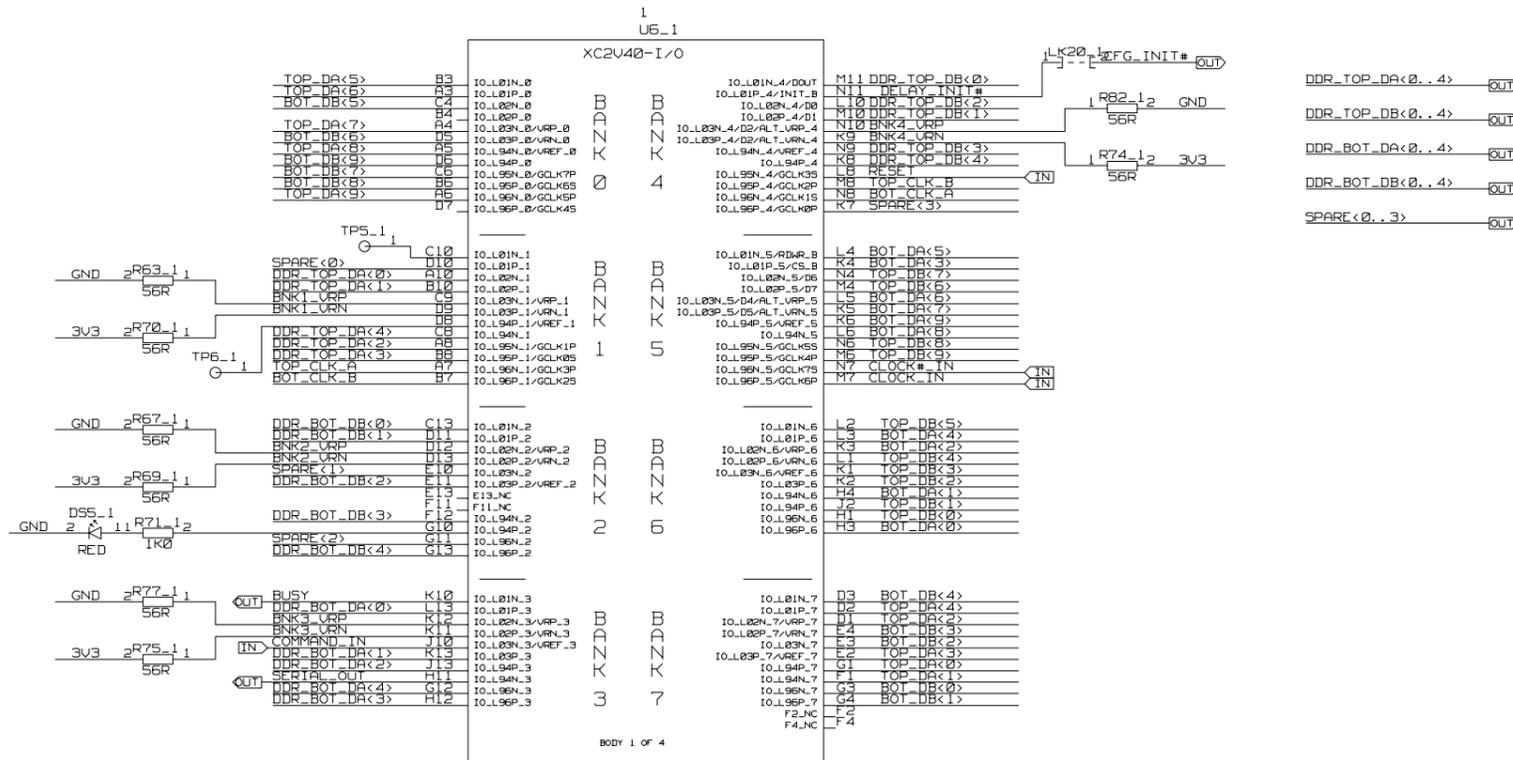
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OF THE RESEARCH COUNCILS

TITLE **PC3205M** CIRCUIT

CMS TRACKER FED
DELAY FPGA



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TITLE			PC3205M CIRCUIT			
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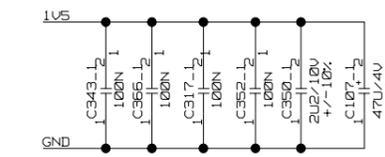
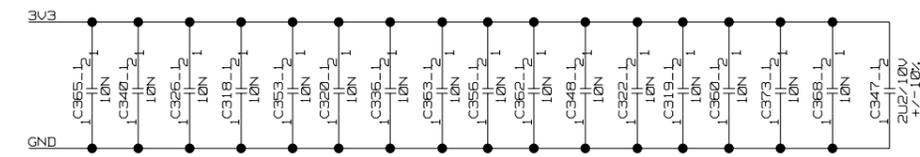
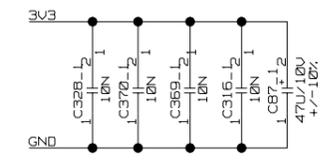
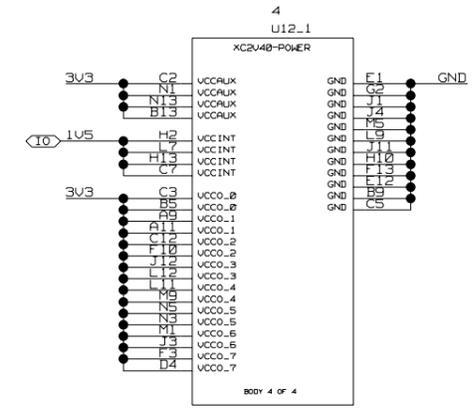
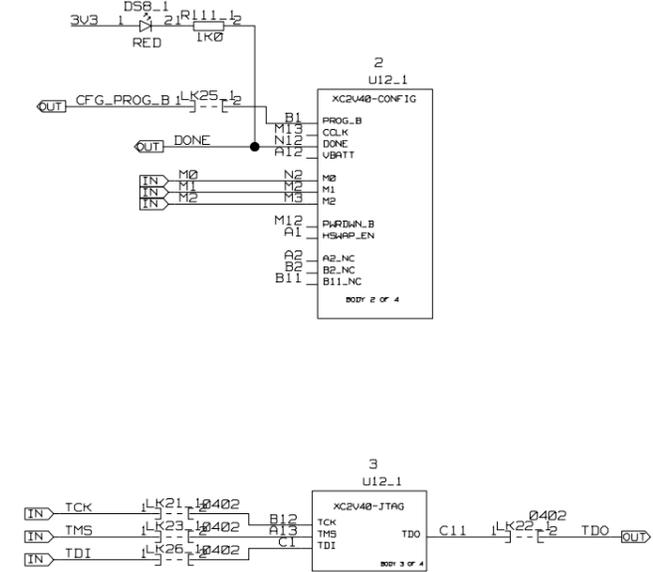
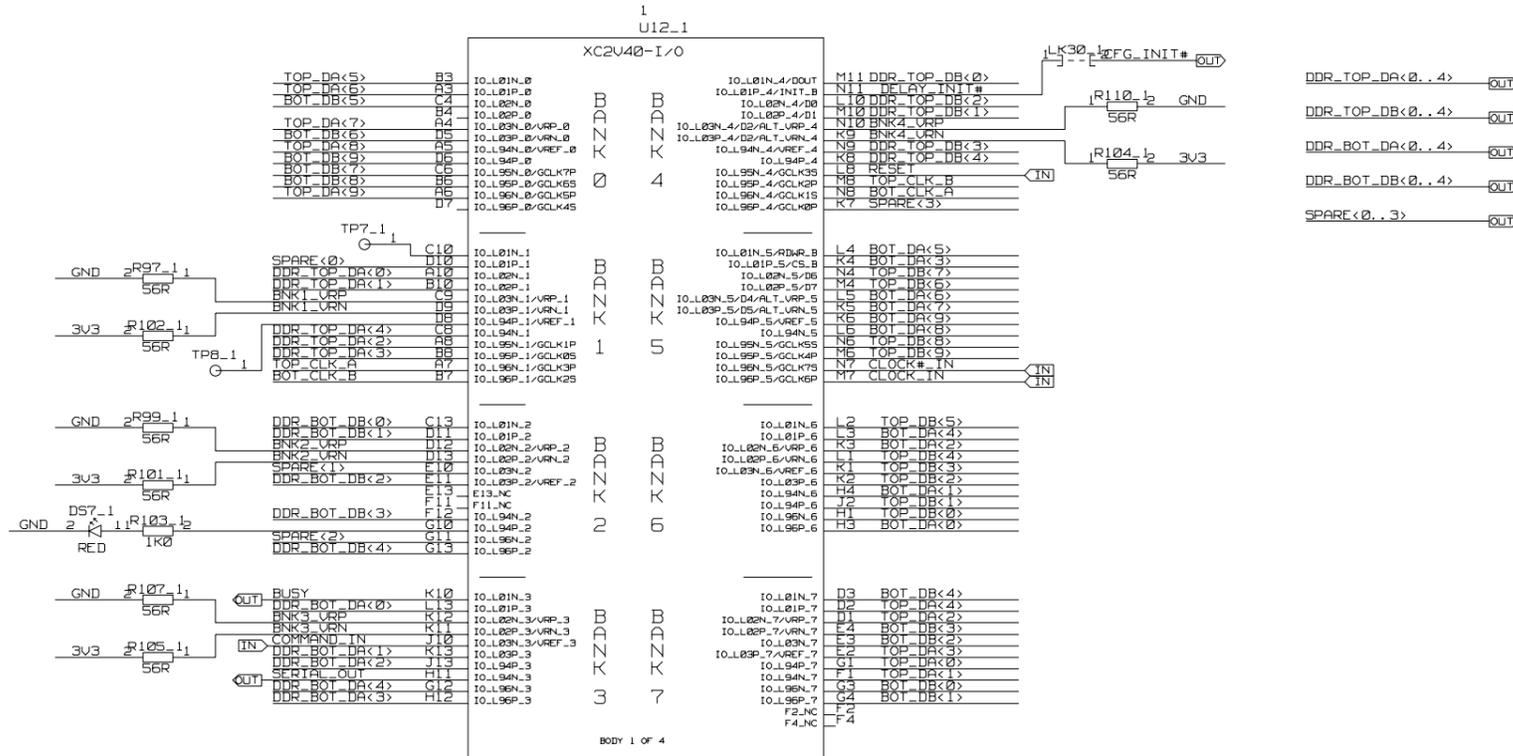


B	11-05-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	S. TAGHAVIRAD	S. TAGHAVIRAD	S. TAGHAVIRAD	
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 OF THE RESEARCH COUNCILS

TITLE PC3205M CIRCUIT

CMS TRACKER FED
 DELAY FPGA

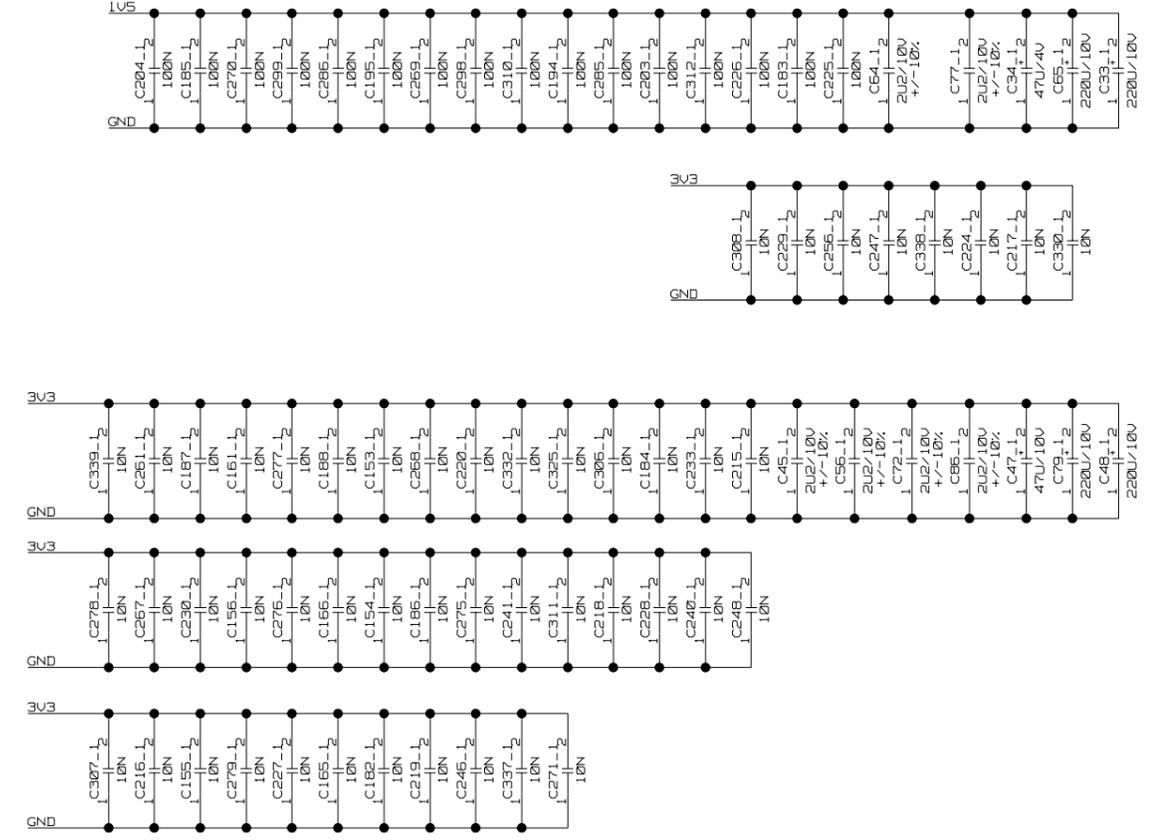
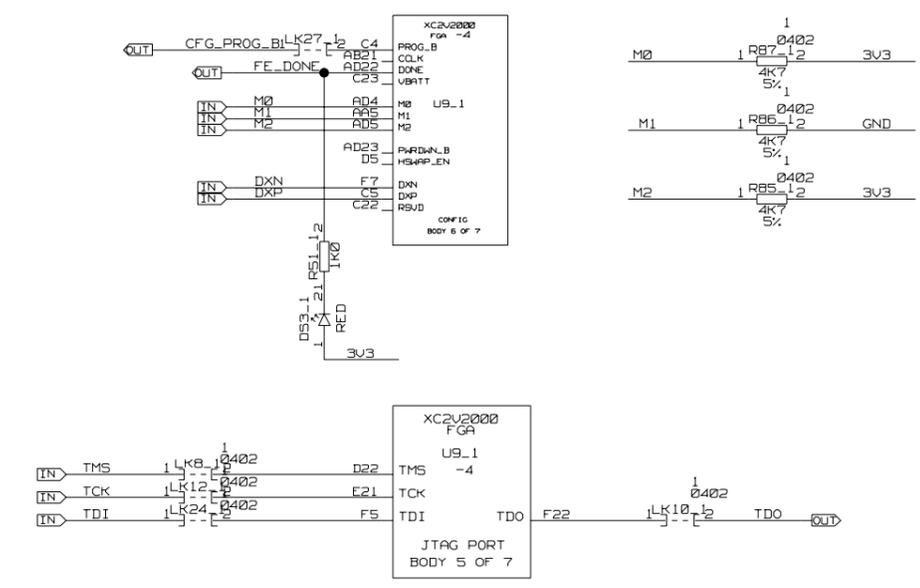
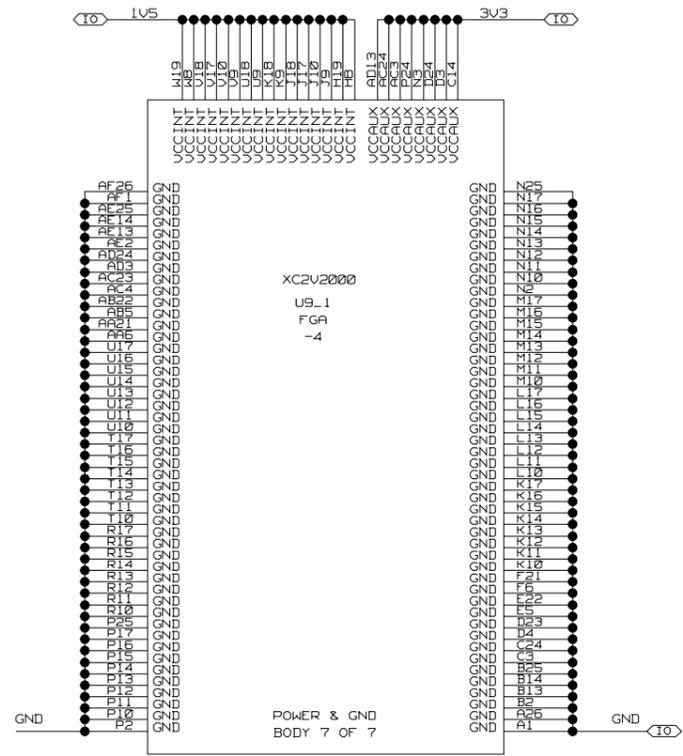


B	11-05-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	S. TAGHAVIRAD	S. TAGHAVIRAD	S. TAGHAVIRAD	
ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS
USED ON					CMS	© CCLRC 2002
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TITLE			PC3205M		CIRCUIT	
CMS TRACKER FED DELAY FPGA						
A2-TE-0070-020<19>B						



- DATA_STREAM<0..3> OUT
- ADC_A_DATA_STREAM<0..4> IN
- ADC_B_DATA_STREAM<0..4> IN
- ADC_C_DATA_STREAM<0..4> IN
- ADC_D_DATA_STREAM<0..4> IN
- ADC_E_DATA_STREAM<0..4> IN
- ADC_F_DATA_STREAM<0..4> IN
- ADC_G_DATA_STREAM<0..4> IN
- ADC_H_DATA_STREAM<0..4> IN
- ADC_I_DATA_STREAM<0..4> IN
- ADC_K_DATA_STREAM<0..4> IN
- ADC_L_DATA_STREAM<0..4> IN
- ADC_M_DATA_STREAM<0..4> IN
- DELAY_A_SPARE<0..3> IN
- DELAY_B_SPARE<0..3> IN
- DELAY_C_SPARE<0..3> IN

B	11-05-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	S. TAGHAVIRAD	S. TAGHAVIRAD	S. TAGHAVIRAD	
ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS
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TITLE			PC3205M		CIRCUIT	
			CMS TRACKER FED		FRONT END FPGA	
A2-TE-0070-020<20>B						
TOTAL NO. OF SHEETS 95						



B	11-05-04	TE243	S. TAGHAVI	J. COUGHLAN	J. COUGHLAN	
A	13-11-02	----	S. TAGHAVIRAD	S. TAGHAVIRAD	S. TAGHAVIRAD	
ISSUE	DATE	MOD NO.	DRN BY.	CHKD.	APPD.	STATUS
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TITLE			PC3205M CIRCUIT			
CMS TRACKER FED FRONT END FPGA						
A2-TE-0070-020<21>B						