

# **TRACE ELLIOT**

## **SERVICE MANUAL NO. SM00011**

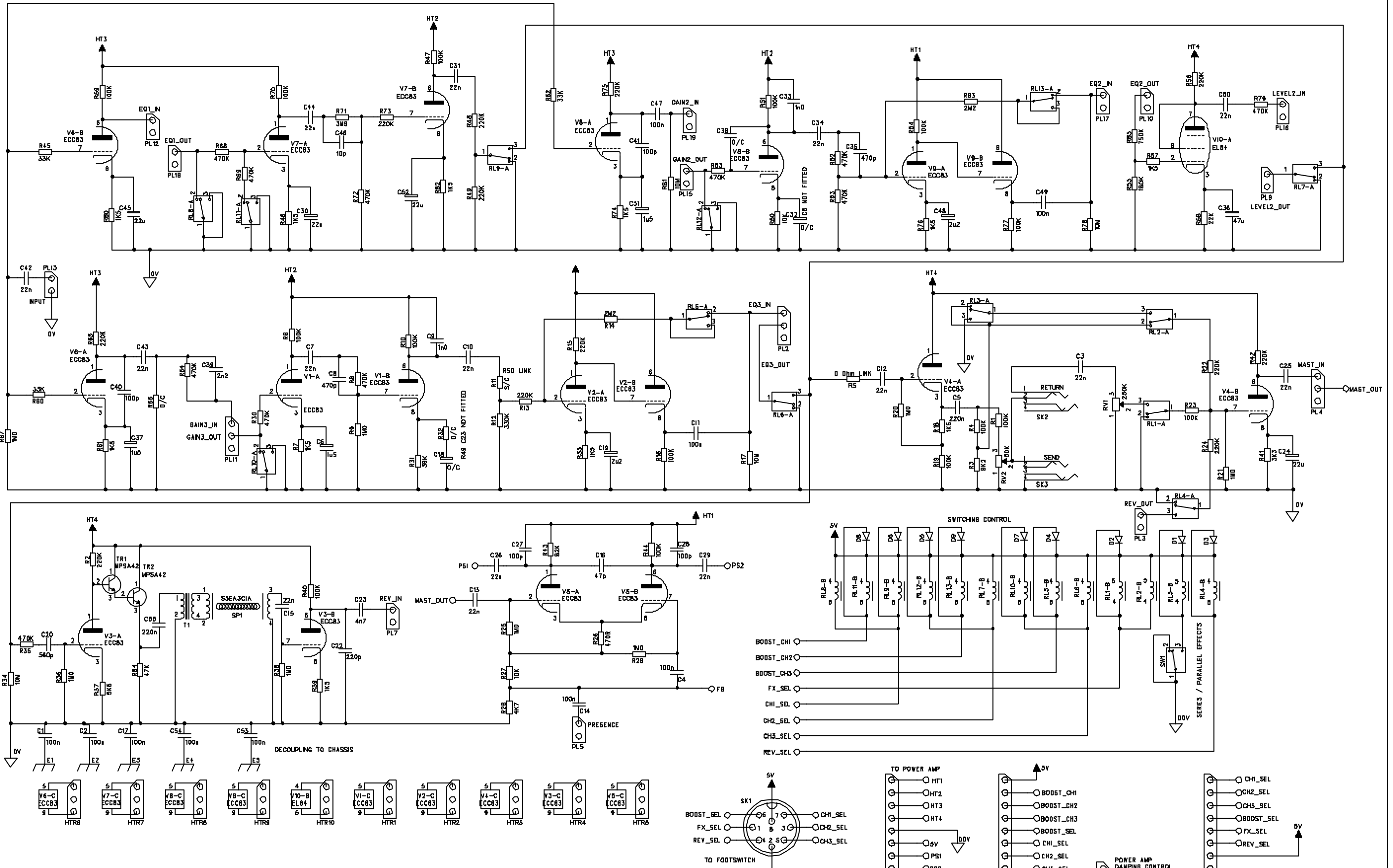
### **ISSUE 1**

**Date:** October 28, 1996  
**Product Code :** T3200 / T3220  
**Model No :** Trident H100 / C100  
**Technical File No :** TE00011

**Issued by:**

**Trace Elliot Limited.  
Blackwater Trading Estate  
The Causeway, Maldon  
Essex CM4 4GG.**

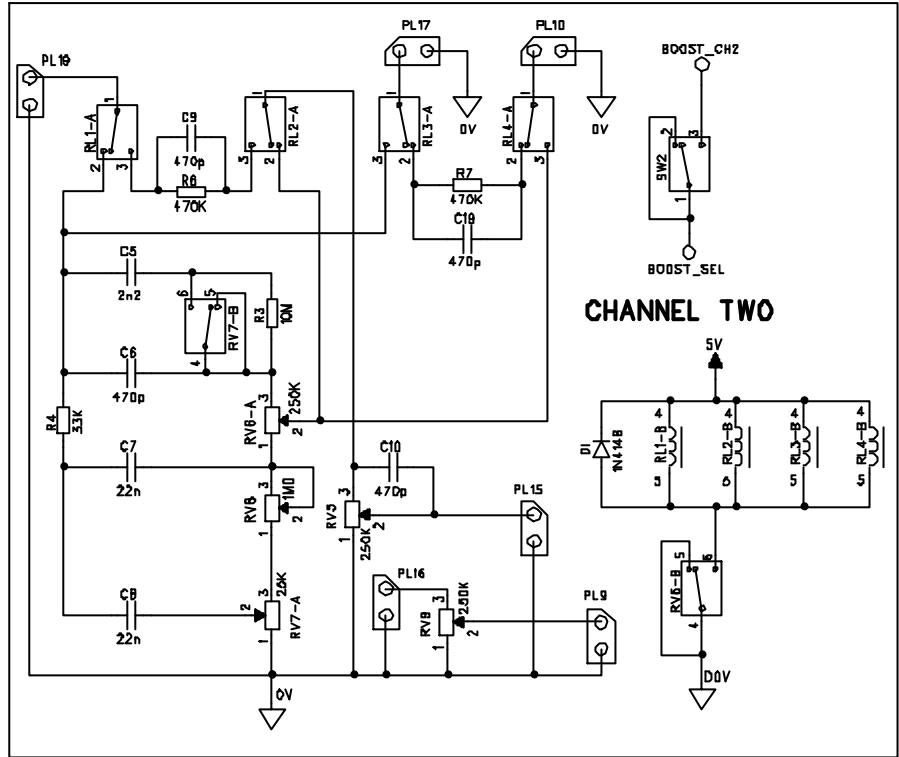
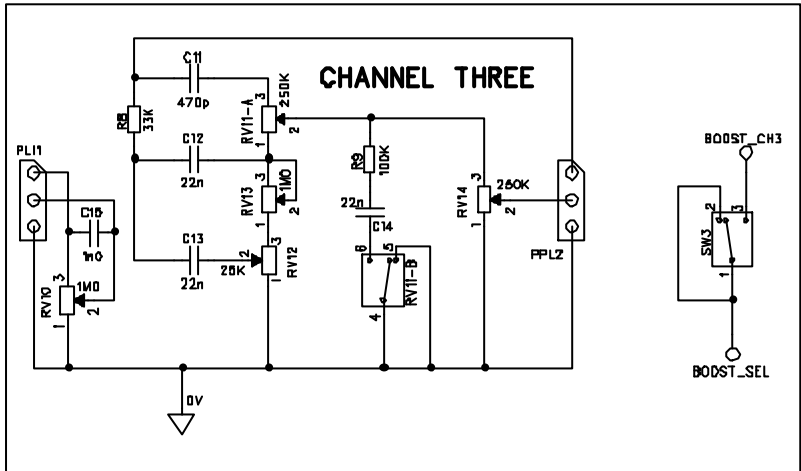
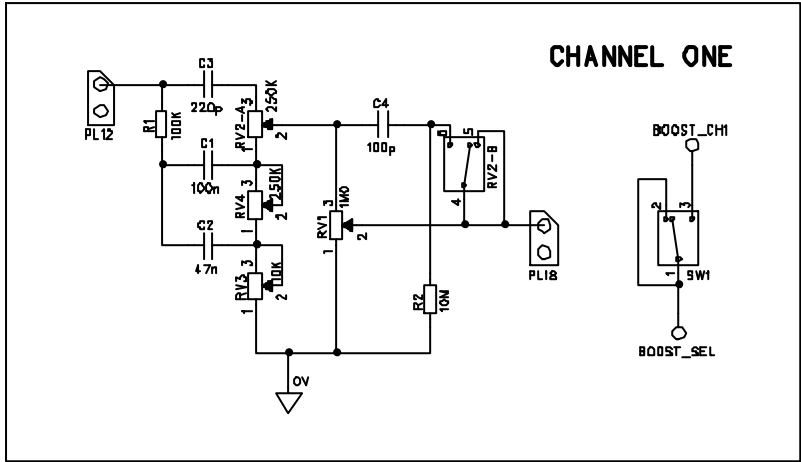
ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE
ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE



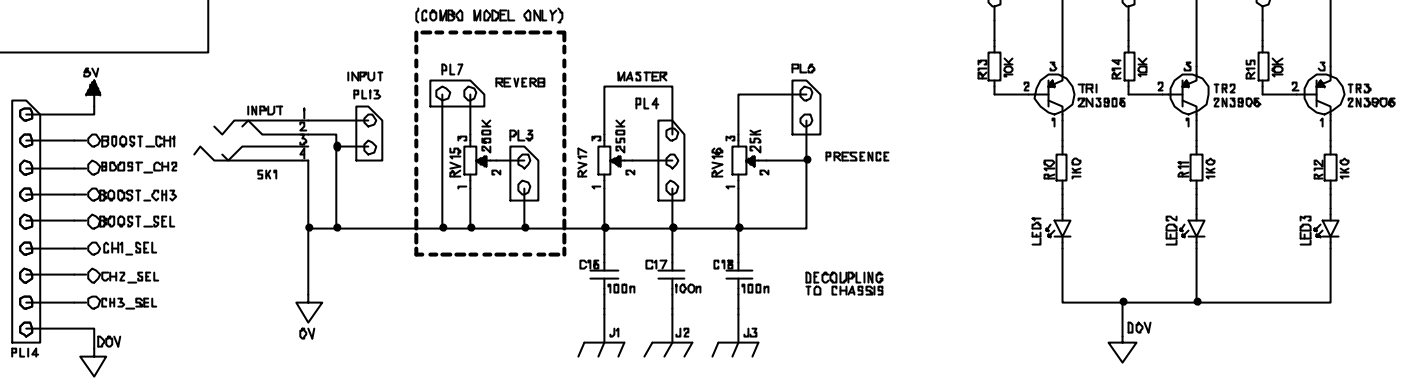
TITLE MAIN PREAMP VALVE CIRCUIT  
 PROJECT TRIDENT GUITAR AMPS  
 DRAWING No C000012  
 ISSUE 3  
 DATE 11/2/1997  
 DRAWN BY PAUL STEVENS

**TRACE ELLIOT LTD**  
 BLACKWATER TRADING ESTATE  
 MALDON ESSEX CM9 4XD  
 GREAT BRITAIN  
 TEL (01823) 801861  
 FAX (01822) 851932

ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE
ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE



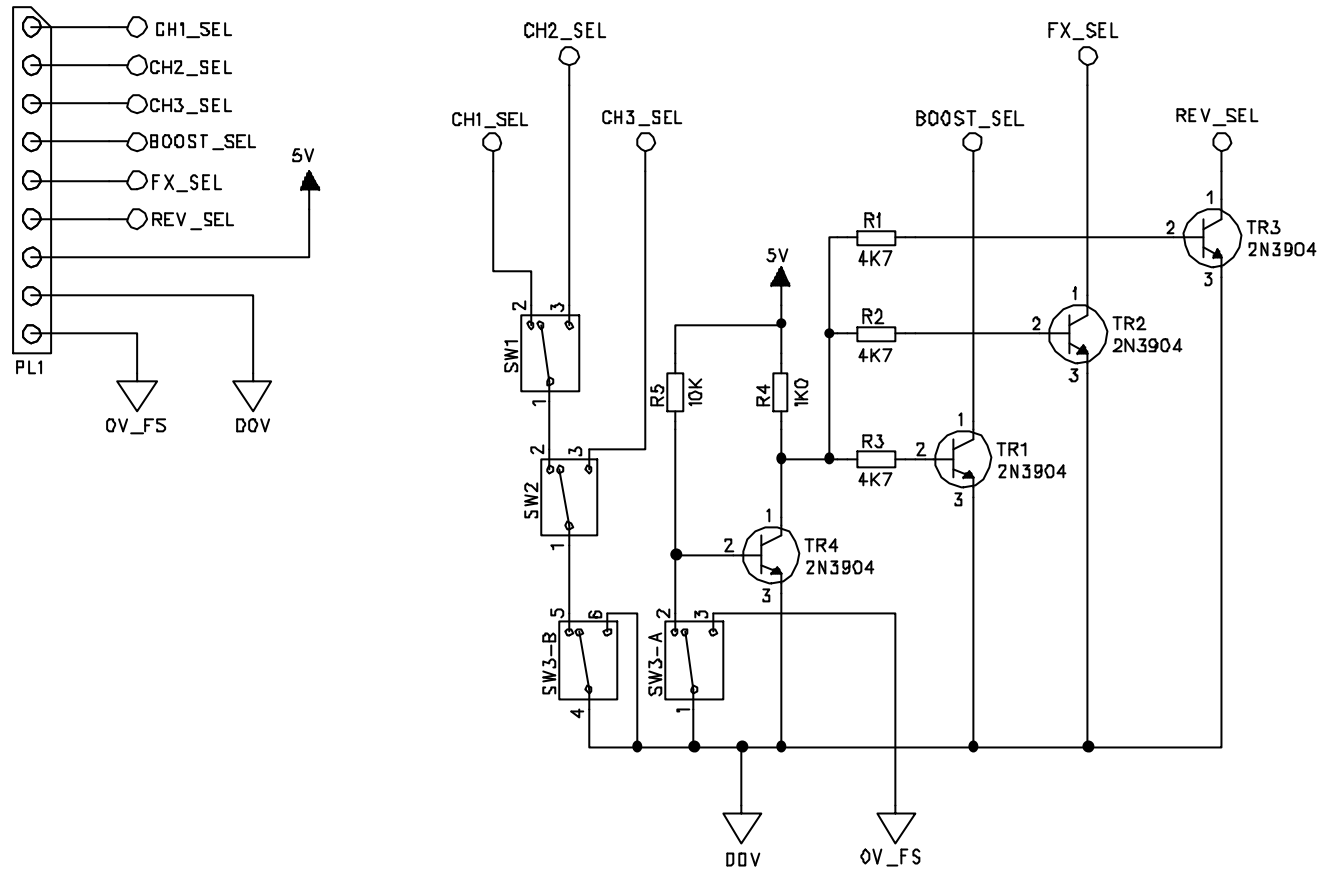
### CHANNEL TWO



TITLE FRONT PANEL CONTROLS TRIDENT GUITAR AMPS  
 PROJECT DRAWING No C000013  
 ISSUE 1  
 DATE 5/7/1996  
 DRAWN BY J B RECKLESS

**TRACE ELLIOT**  
 TRACE ELLIOT LIMITED  
 NALDON ESSEX CM8 7XD  
 ENGLAND  
 TEL (01621) 851851  
 FAX (01621) 881932

ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE
ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE



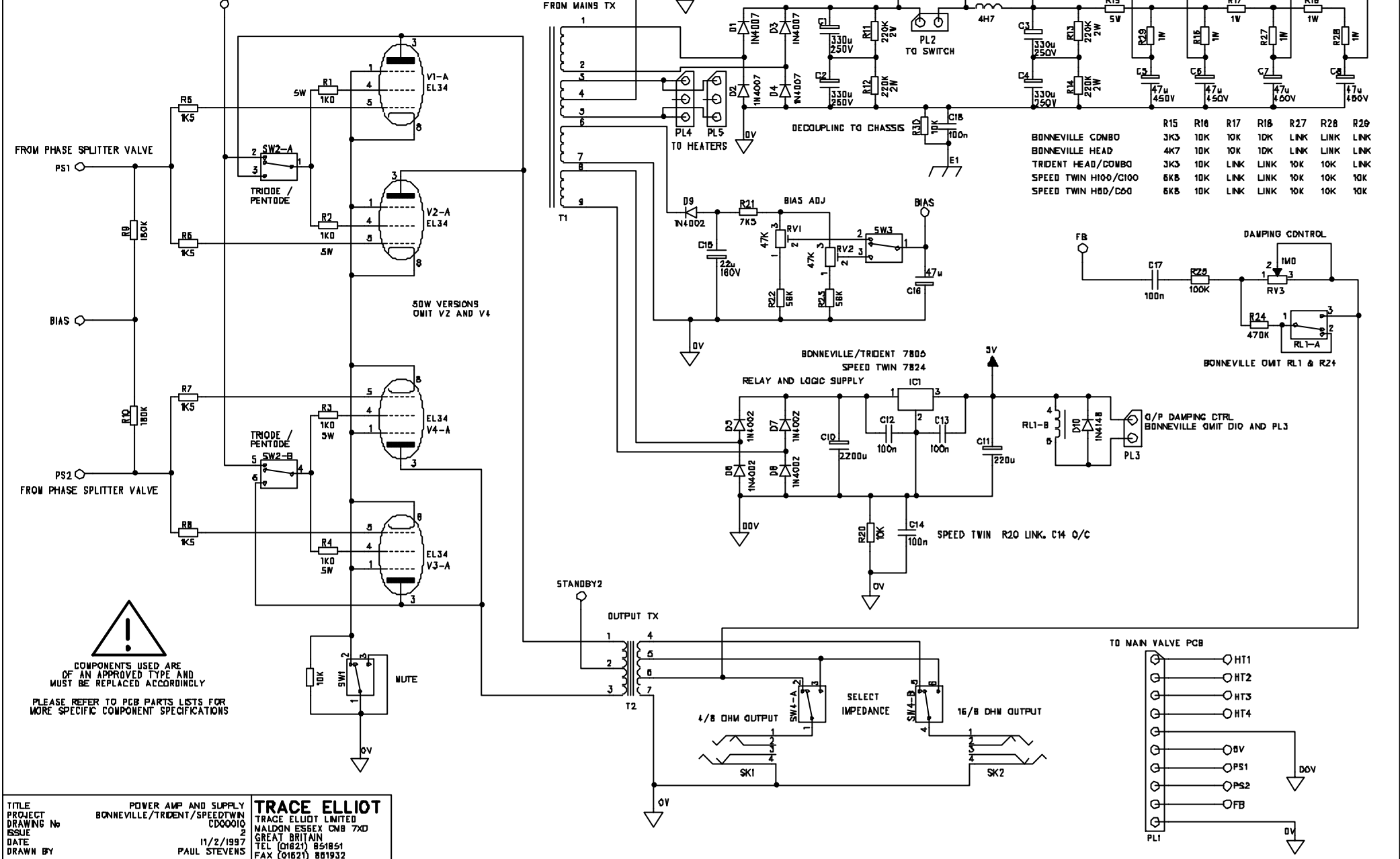
TITLE  
PROJECT  
DRAWING No  
ISSUE  
DATE  
DRAWN BY

REAR PANEL SWITCHING  
TRIDENT GUITAR AMPS  
C000027  
1  
20/9/1995  
J B RECKLESS

**TRACE ELLIOT**  
TRACE ELLIOT LIMITED  
MALDON ESSEX CM9 7GG  
ENGLAND  
TEL (01621) 855266  
FAX (01621) 851975

ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE
ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE

ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE
ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE

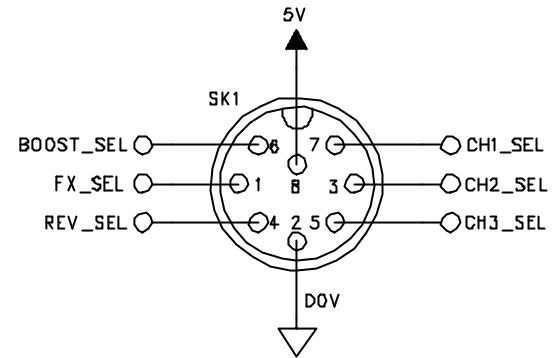
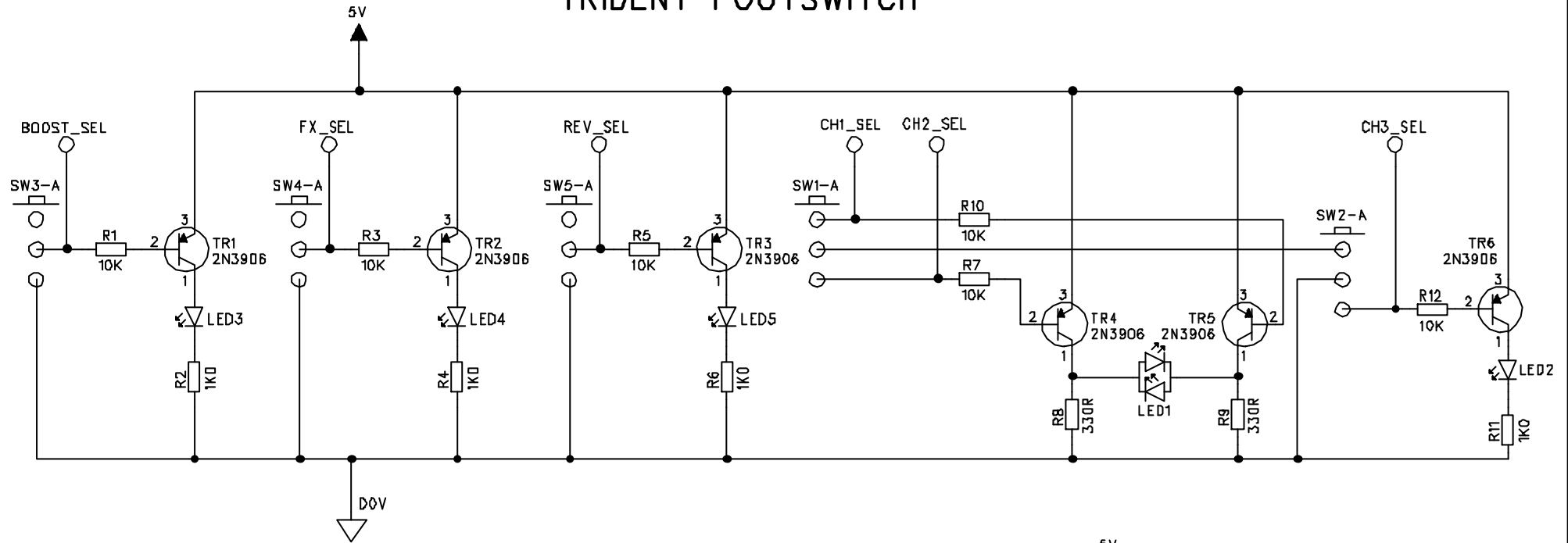


**TITLE** POWER AMP AND SUPPLY  
**PROJECT** BONNEVILLE/TRIDENT/SPEEDTWIN  
**DRAWING No** C000010  
**ISSUE** 2  
**DATE** 11/2/1997  
**DRAWN BY** PAUL STEVENS

**TRACE ELLIOT**  
 TRACE ELLIOT LIMITED  
 WALDON ESSEX CM8 7XD  
 GREAT BRITAIN  
 TEL (01621) 851851  
 FAX (01621) 881932

ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE
ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE	ISSUE CHANGE NOTE DATE

# TRIDENT FOOTSWITCH



TITLE  
PROJECT  
DRAWING No  
ISSUE  
DATE  
DRAWN BY

FOOTSWITCH CIRCUIT  
TRIDENT GUITAR AMPS  
CD00014  
1  
20/9/1995  
PAUL STEVENS

**TRACE ELLIOT LTD**  
BLACKWATER TRADING ESTATE  
MALDON ESSEX CM9 4GG  
GREAT BRITAIN  
TEL (01621) 851851  
FAX (01621) 851932

# PARTS LIST FOR TRIDENT HEAD MAIN PCB

ISSUE 3 11/2/97 PS

Description	Part Code	Qty	Where Used
PCB	PC00015 issue 3	1	
<b>RESISTORS</b>			
0 ohm link	72-RCZERO	2	R5 R11
470R 1/4W	72-RM470R	1	R26
1K5 1/4W	72-RM1K5	10	R7 R18 R33 R46 R57 R61 R74 R76 R80 R82
3K3 1/4W	72-RM3K3	1	R41
4K7 1/4W	72-RM4K7	1	R28
8K2 1/4W	72-RM8K2	1	R3
10K 1/4W	72-RM10K	2	R27 R50
22K 1/4W	72-RM22K	1	R58
33K 1/4W	72-RM33K	3	R45 R60 R62
39K 1/4W	72-RM39K	1	R31
82K 1W	72-RM82K-1WATT	1	R43
100K 1/4W	72-RM100K	3	R1 R4 R23
100K 1W	72-RM100K-1WATT	11	R6 R10 R16 R19 R44 R47 R51 R54 R59 R70 R77
180K 1W	72-RM180K	1	R55
220K 1/4W	72-RM220K	5	R13 R22 R48 R49 R73
220K 1W	72-RM220K-1WATT	5	R15 R42 R56 R65 R75
330K 1/4W	72-RM330K	1	R12
470K 1/4W	72-RM470K	10	R8 R30 R52 R53 R63 R64 R68 R69 R72 R79
750K 1/4W	72-RM750K	1	R85
1M0 1/4W	72-RM1M	6	R9 R20 R21 R25 R29 R67
2M2 1/4W	72-RM2M2	2	R14 R83
3M9 1/4W	72-RM3M9	1	R71
10M 1/4W	72-RM10M	4	R17 R34 R78 R81
<b>DIODES</b>			
IN4148	72-D-IN4148	8	D1 D2 D4 D5 D6 D7 D8 D9
<b>CAPACITORS</b>			
10p 500V ceramic	72-C10P-500VC	1	C46
47p 500V ceramic	72-C47P-500VCD	1	C16

100p	1KV ceramic	72-C100P-1KVCD	4	C27 C28 C40 C41
470p	1KV ceramic	72-C470P-1KVCD	2	C8 C35
1n0	1KV ceramic	72-C1000P-1KVCD	2	C9 C33
2n2	1KV ceramic	72-C2200P-1KVCD	1	C39
1u5	35V tant	72-C1.5-35VT	3	C6 C37 C51
2u2	35V tant	72-C2.2-35VT	2	C19 C48
22u	63V elect rad	72-C22-63VER	4	C24 C30 C45 C52
47u	63V elect rad	72-C47-63VER	1	C36
22n	400V poly box	72-C22N-400VPR	13	C3 C7 C10 C12 C13 C25 C26 C29 C31 C34 C42 C43 C44
100n	250V poly box	72-C100N-250VB	10	C1 C2 C4 C11 C14 C17 C47 C49 C50 C53 C54
220n	250V poly box	72-C220N-250VP	1	C5
<b>RELAYS</b>				
Omron G5V-1 SPCO		73-RELAY-5V-SPCO	12	RL1 RL2 RL3 RL5 RL6 RL7 RL8 RL9 RL10 RL11 PL12 RL13
<b>CONNECTORS</b>				
2 way 0.1"		72-HEAD-2W	11	PL5 PL8 PL9 PL10 PL12 PL13 PL15 PL16 PL17 PL18 PL19
3 way 0.1"		72-HEAD-3W-2	13	HTR1 HTR2 HTR3 HTR4 HTR5 HTR6 HTR7 HTR8 HTR9 HTR10 PL2 PL4 PL11
9 way 0.1"		72-HEAD-9W	2	PL6 PL14
10 way 0.1"		72-HEAD-10W	1	PL1
<b>SOCKETS</b>				
8 pin DIN SKT PCB		73-SKT-DIN-8PIN	1	SK1
1/4" MONO JACK SKT		73-SKT-JCKBNBG	2	SK2 SK3
<b>SWITCHES</b>				
Mini Toggle SPDT vert		73-SWT-M-TGL-PCB	1	SW1
<b>POTENTIOMETERS</b>				
50K		73-POT-B50K	1	RV2
250K		73-POT-A250K	1	RV1



VALVE BASES			
B9A PCB valve base	73-VAL-SOCKET	10	V1-10
COAX WIRE LINKS			
LINK A	45-WIR-SCRE-1R	1	A-A ~120mm
LINK B	45-WIR-SCRE-1R	1	B-B ~120mm
LINK C	45-WIR-SCRE-1R	1	C-C ~220mm

11 FEBRUARY 1997

Paul Stevens

# PARTS LIST FOR TRIDENT HEAD FRONT PCB

Description	Part Code	Qty	Where Used
PCB	PC00016	1	
<b>RESISTORS</b>			
1K0 1/4W	72-RM1K0	3	R10 R11 R12
10K 1/4W	72-RM10K	3	R13 R14 R15
33K 1/4W	72-RM33K	2	R4 R8
100K 1/4W	72-RM100K	2	R1 R9
470K 1/4W	72-RM470K	2	R6 R7
10M 1/4W	72-RM10M	2	R2 R3
<b>DIODES</b>			
IN4148	72-D-IN4148	1	D1
<b>CAPACITORS</b>			
150p 500V ceramic	72-C150P-CER-R	1	C4
220p 1KV ceramic	72-C220P-1KVCD	1	C3
470p 1KV ceramic	72-C470P-1KVCD	5	C6 C9 C10 C11 C19
1n0 1KV ceramic	72-C1000P-1KVCD	1	C15
2n2 1KV ceramic	72-C2200P-1KVCD	1	C5
22n 400V poly box	72-C22N-400VPR	5	C7 C8 C12 C13 C14
47n 400V poly box	72-C47N-400VP	1	C2
100n 250V poly box	72-C100N-250VB	4	C1 C16 C17 C18
<b>TRANSISTORS</b>			
2N3906	72-T2N3906	3	TR1 TR2 TR3
<b>LEDS</b>			
3mm GRN LED	72-LED-GRN-3mm	1	LED1
3mm YEL LED	72-LED-YEL-3mm	1	LED2
3mm RED LED	72-LED-RED-3mm	1	LED3
<b>RELAYS</b>			
Omron G5V-1 SPCO	73-RELAY-5V-SPCO	4	RL1 RL2 RL3 RL4
<b>CONNECTORS</b>			
2 way 0.1"	72-HEAD-2W	10	PL5 PL9 PL10

			PL12	PL13	PL15
			PL16	PL17	PL18
			PL19		
3 way 0.1"	72-HEAD-3W-2	3	PL2	PL4	PL11
9 way 0.1"	72-HEAD-9W	1	PL14		
SOCKETS					
1/4" MONO JACK SKT	73-SKT-JCKBNBG	1	SK1		
POTENTIOMETERS					
10K LOG	73-POT-A10K	1	RV3		
25K LOG	73-POT-A25K	1	RV12		
25K LIN	73-POT-B25K	1	RV16		
25K with Pull Switch	73-POT-A25K-PS	1	RV7		
250K LOG	73-POT-A250K	5	RV4	RV5	RV9
			RV14	RV17	
250K with Pull Switch	73-POT-A250K-PS	3	RV2	RV6	RV11
1M0 LOG	73-POT-A1M	4	RV1	RV8	RV10
			RV13		
SWITCHES					
	(underneath board)				
Mini Toggle SPDT horiz	73-SWT-MIN-TGL-H	3	SW1	SW2	SW3
WIRE LINK					
BLACK 16 or 24/0.2	45-MISC	1	A - A	~40mm	

22 FEBRUARY 1996

Paul Stevens

# PARTS LIST FOR PC00013T TRIDENT HEAD/COMBO POWER BOARD

ISSUE 3(23/9/96) PS

Description	Part Code	Qty	Where Used
PCB	PC00013	1	
RESISTORS			
0 Ohm Link	72-RCZERO	3	R17 R18 R29
1K5 1/4W	72-RM1K5	4	R5 R6 R7 R8
10K 1/4W	72-RM10K	3	R19 R20 R30
12K 1/4W	72-RM12K	1	R21
56K 1/4W	72-RM56K	3	R22 R23 R24
100K 1/4W	72-RM100K	1	R25
180K 1/4W	72-RM180K	2	R9 R10
10K 1W	72-RM10K-1WATT	4	R16 R27 R28 and across SW1
220K 2W	72-RC220K-2W	4	R11 R12 R13 R14
1K 4W	72-RWW1K-6W	4	R1 R2 R3 R4
3K3 4W	72-RWW3K3-4W	1	R15
DIODES			
1N4002	72-D-IN4002	5	D5 D6 D7 D8 D9
1N4007	72-D-IN4007	4	D1 D2 D3 D4
1N4148	72-D-IN4148	1	D10
CAPACITORS			
100n 250V poly box	72-C100N-250VB	6	C9 C12 C13 C14 C17 C18
22u 160V elect radial	72-C22-160VER	1	C15
47u 63V elect radial	72-C47-63VER	1	C16
220u 25V elect radial	72-C220-25VER	1	C11
2200u 16V elect radial	72-C2200-16VER	1	C10
47u 450V elect radial	73-CAP47450V	4	C5 C6 C7 C8
330u 250V elect radial	73-CAP-330250V	4	C1 C2 C3 C4
I.C.S			
7805 5V REGULATOR	72-7805-REG	1	IC1
RELAY			
5V SPCO G5V-1	73-RELAY-5V-SPCO	1	RL1

<b>CONNECTORS</b>			
2 way 0.1"	72-HEAD-2W	2	PL2 PL3
3 way 0.1"	72-HEAD-3W2	2	PL4 PL5
10 way 0.1"	72-HEAD-10W	1	PL1
7 way 0.2"	72-HEAD-7W-2	1	T2
9 way 0.2"	72-HEAD-9W-2	1	T1
<b>SOCKETS</b>			
1/4" MONO JACK PCB	73-SKT-JCKBNBG	2	SK1 SK2
<b>SWITCHES</b>			
Mini Toggle SPDT vertical	73-SWT-M-TGL-PCB	2	SW1 SW3
Large slide DPDT horiz	73-SWT-SLIDER-DP	2	SW2 SW4
<b>POTENTIOMETERS</b>			
47K vertical trimmer	72-PRESET-47K-V	2	RV1 RV2
1M0	73-POT-A1M	1	RV3
<b>VALVE BASES</b>			
Octal PCB valve base	73-VAL-SOCKET-2	4	V1 V2 V3 V4

## PARTS LIST FOR TRIDENT REAR PANEL SWITCHING PCB

Description	Part Code	Qty	Where Used
PCB	PC00027	1	
<b>RESISTORS</b>			
1K0 1/4W	72-RM1K0	1	R4
4K7 1/4W	72-RM4K7	3	R1 R2 R3
10K 1/4W	72-RM10K	1	R5
<b>CONNECTORS</b>			
9 way 0.1"	72-HEAD-9W	1	PL1
<b>TRANSISTORS</b>			
2N3904	72-T2N3904	4	TR1 TR2 TR3 TR4
<b>SWITCHES</b>			
Mini Toggle SPDT vert	73-SWT-M-TGL-PCB	2	SW1 SW2
Mini Toggle DPDT vert	73-SWT-M-TGL-VCO (MORS 5246WWA)	1	SW3
<b>SUPPORT BRACKET</b>			
M3 Right Angle PCB	71-BKT-M3-PCB-RA	2	

6 JUNE 1995  
Paul Stevens

# PARTS LIST FOR TRIDENT FOOTSWITCH PCB

Description	Part Code	Qty	Where Used
PCB	PC00014	1	
<b>RESISTORS</b>			
330R 1/4W	72-RM330R	2	R8 R9
1K0 1/4W	72-RM1K0	4	R2 R4 R6 R11
10K 1/4W	72-RM10K	6	R1 R3 R5 R7 R10 R12
<b>TRANSISTORS</b>			
2N3906	72-T2N3906	6	TR1 TR2 TR3 TR4 TR5 TR6
<b>SOCKET</b>			
8 pin DIN socket	73-SKT-DIN-8PIN	1	SK1
Spacers	71-SPA-16MM	5	
<b>LED's</b>			
BI-COLOUR LED 5mm	72-LED-BICOLOUR	1	LED1
RED LED 5mm	72-LED-RED	2	LED2 LED3
GREEN LED 5mm	72-LED-GREEN	2	LED4 LED5
<b>SWITCHES</b>			
Footswitch	73-SWT-F/S-TVT9	5	SW1 SW2 SW3 SW4 SW5

19 JUNE 1995

Paul Stevens