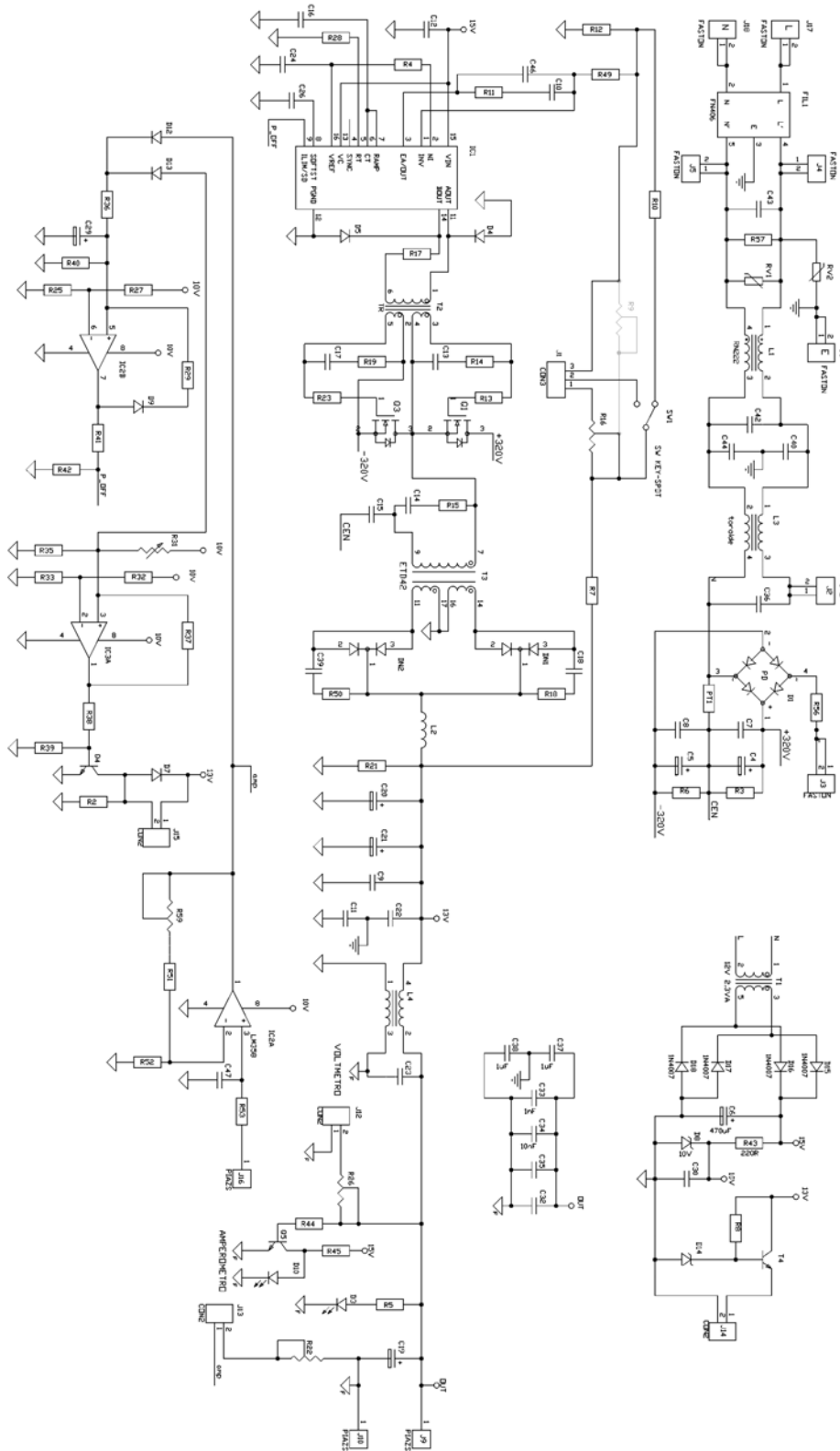
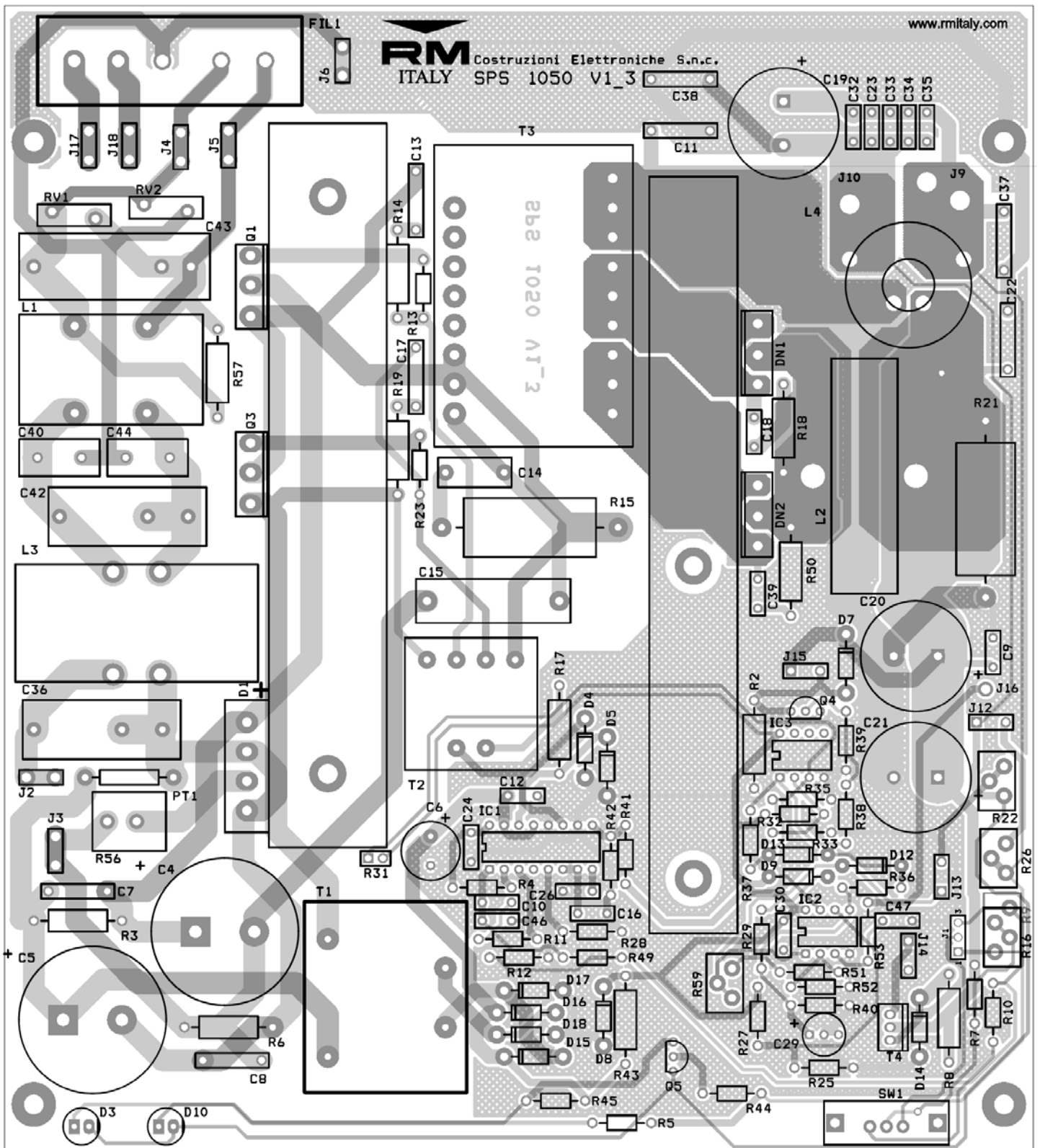


## Mod. SPS 1050 S Power supply

Schematic diagram

Version 3.00





**List of components**

C 4 =	680 $\mu$ F	200 V	
C 5 =	680 $\mu$ F	200 V	
C 6 =	470 $\mu$ F	25 V	
C 7 =	100 nF	250 V	Polyester
C 8 =	100 nF	250 V	Polyester
C 9 =	100 nF	50 V	Polyester
C 10 =	4,7 nF	50 V	Polyester

C 11 =	470 nF	100 V	Polyester
C 12 =	100 nF	50 V	Polyester
C 13 =	2,2 nF	1000 V	Polyester
C 14 =	470 pF	3000V	
C 15 =	2,2 $\mu$ F	250 V	Polyester
C 16 =	2,2 nF	50 V	Polyester
C 17 =	2,2 nF	1000 V	Polyester
C 18 =	2,2 nF	50 V	Polyester

C 19 =	2200 µF	35 V	105 °C	R 32 =	3,3 KΩ	¼ W
C 20 =	2200 µF	35 V	105 °C	R 33 =	2,2 KΩ	¼ W
C 21 =	2200 µF	35 V	105 °C	R 35 =	1,0 KΩ	¼ W
C 22 =	470 nF	100 V	Polyester	R 36 =	1,0 KΩ	¼ W
C 23 =	100 nF	50 V	Polyester	R 37 =	4,7 KΩ	¼ W
C 24 =	100 nF	50 V	Polyester	R 38 =	1,0 KΩ	¼ W
C 26 =	100 nF	50 V	Polyester	R 39 =	1,0 KΩ	¼ W
C 29 =	10 µF	25 V		R 40 =	15 KΩ	¼ W
C 30 =	100 nF	50 V	Polyester	R 41 =	4,7 KΩ	¼ W
C 32 =	470 pF	50 V		R 42 =	1,0 KΩ	¼ W
C 33 =	not present			R 43 =	47 Ω	2 W
C 34 =	10 nF	50 V		R 44 =	2,2 KΩ	¼ W
C 35 =	1,0 nF	50 V		R 45 =	1,0 KΩ	¼ W
C 36 =	470 nF	275 Vac X2		R 49 =	1,0 KΩ	¼ W
C 37 =	1,0 µF	100 V	Polyester	R 50 =	27 Ω	2 W
C 38 =	1,0 µF	100 V	Polyester	R 51 =	47 KΩ	¼ W
C 39 =	2,2 nF	50 V	Polyester	R 52 =	1,0 KΩ	¼ W
C 40 =	4,7 nF	275 Vac Y		R 53 =	4,7 KΩ	¼ W
C 42 =	470 nF	275 Vac X2		R 56 =	0,22 Ω	7 W
C 43 =	680 nF	275 Vac X2		R 57 =	470 KΩ	½ W
C 44 =	4,7 nF	275 Vac Y		R 59 =	Trimmer vert. 22 KΩ	
C 46 =	470 pF	50 V		PT 1 =	not present	
C 47 =	100 nF	50 V	Polyester	RV 1 =	275 Vac	
R 2 =	68 Ω	2 W		RV 2 =	275 Vac	
R 3 =	47 KΩ	2 W		D 1 =	KBU 12K	
R 4 =	2,2 KΩ	¼ W		D 3 =	GreenLed	
R 5 =	1,0 KΩ	¼ W		D 4 =	1N 5819	
R 6 =	47 KΩ	2 W		D 5 =	1N 5819	
R 7 =	1,8 KΩ	¼ W		D 7 =	1N 4007	
R 8 =	220 Ω	2 W		D 8 =	Zener 10V 1W	
R 9 =	not present			D 9 =	1N 4148	
R 10 =	15 KΩ	¼ W		D 10 =	RedLed	
R 11 =	4,7 KΩ	¼ W		D 12 =	1N 4148	
R 12 =	3,3 KΩ	¼ W		D 13 =	1N 4148	
R 13 =	39 Ω	¼ W		D 14 =	Zener 8,2V 1W	
R 14 =	47 Ω	½ W		D 15 =	1N 4007	
R 15 =	56 Ω	5 W		D 16 =	1N 4007	
R 16 =	Trimmer vert. 2,2 KΩ			D 17 =	1N 4007	
R 17 =	47 Ω	½ W		D 18 =	1N 4007	
R 18 =	27 Ω	2 W		DN 1 =	BYW 99P	
R 19 =	47 Ω	½ W		DN 2 =	BYW 99P	
R 21 =	56 Ω	5 W		Q 1 =	IRFP 450	
R 22 =	Trimmer vert. 47 KΩ			Q 3 =	IRFP 450	
R 23 =	39 Ω	¼ W		Q 4 =	BC 337-25	
R 25 =	3,3 KΩ	¼ W		Q 5 =	BC 337-25	
R 26 =	Trimmer vert. 220 KΩ			IC 1 =	UC 3825N	
R 27 =	3,3 KΩ	¼ W		IC 2 =	LM358N	
R 28 =	4,7 KΩ	¼ W		IC 3 =	LM358N	
R 29 =	1,0 KΩ	¼ W		T 1 =	230V-12V 2.3VA	
R 31 =	NTC 4,7 KΩ			T 2 =	TrasfPil 1050	

T<sub>3</sub> = Trsf Pot 1050  
T<sub>4</sub> = BD 179  
L<sub>1</sub> = RN222-4/02  
L<sub>2</sub> = 5,0 mH ANRA 603/1  
L<sub>3</sub> = 2 x 8 μH ANRA 744/V  
L<sub>4</sub> = 2 x 100 μH ANRA 717/1  
FIL<sub>1</sub> = FN406-6-02  
SW<sub>1</sub> = PCB Switch