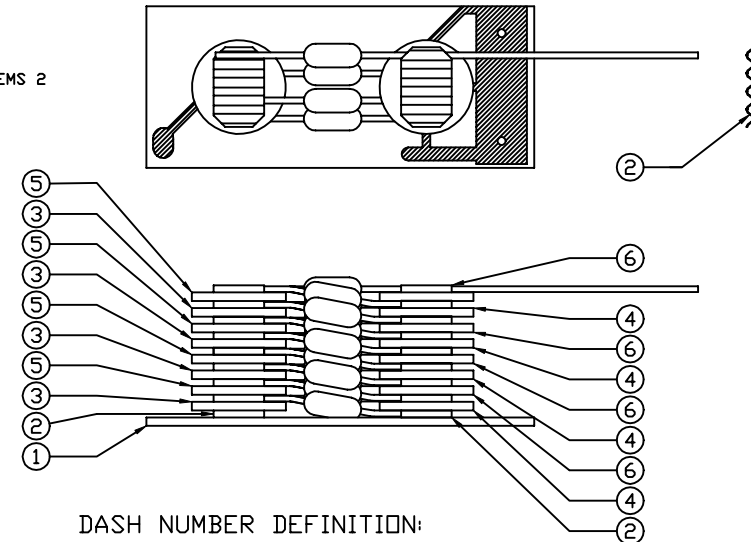


DASH NUMBER TABLE		
DASH NO.	DESCRIPTION	PICTURE OF PART
A	INITIAL RELEASE	
B	NEW CAPACITOR TYPE	

CWM STACK FABRICATION PROCEDURE

- 1) THIS PART IS BUILT ON THE A0145 ASSEMBLY FIXTURE. LOCATE THE FIXTURE SO THAT THE PART NUMBER IS IN THE LOWER RIGHT CORNER. REMOVE TWO ALLEN HEAD SCREWS TO REMOVE THE SPRING ASSEMBLY, AND SET IT ASIDE.
- 2) SET ITEM 1 ON THE FIXTURE WITH THE CONDUCTOR SIDE UPWARD. USE A SHARP AWL TO MAKE APPROX 10 SCRATCHES ABOUT .005 DEEP EVENLY SPACED IN THE SURFACE OF THE INTERIOR OF EACH OF THE TWO RECTANGULAR AREAS OVER WHICH ITEMS 2 WILL BE PLACED.
- 3) LOCATE ITEM 1 IN POSITION ON THE FIXTURE PLATE WITH THE GROUND AREA ON THE RIGHT SIDE AS SHOWN AND INSTALL 6 PLASTIC AND 8 STEEL PINS.
- 4) APPLY A THIN LAYER OF ITEM 8 TO ITEM 1 TO THE INTERIOR AND THE PLATED PORTION OF THE RECTANGULAR AREAS WHERE ITEMS 2 WILL BE PLACED. THEN CAREFULLY FILL THE CORRIGATIONS ON ONE SIDE OF ONE EACH OF ITEM 2 AND POSITION IT ON ITEM 1 WITH THE EPOXIED AREAS FACING EACH OTHER. NOTE THAT ITEM 2 MUST BE ORIENTED WITH THE CORRIGATION ENDING UPWARD ON THE END WHICH FACES TOWARD THE OPERATOR, AS SHOWN IN THE SIDE ELEVATION DETAIL IN THE DRAWING. THEN INSTALL THE OTHER ITEM 2 IN THE SAME MANNER. ENOUGH EPOXY SHOULD BE USED TO ALLOW THE ENTIRE SURFACE OF ITEM 2 TO BE BONDED TO ITEM 1, BUT NOT SO MUCH AS TO ALLOW EPOXY TO GET INTO THE TOP GROOVES WHICH WILL LATER HAVE A DIODE LEAD LAYED IN THEM.
- 5) INSTALL THE SPRING ASSEMBLY WITH 2 SOCKET HEAD SCREWS. THEN PUT THE TWO PLUNGERS IN PLACE SMALL END DOWN, ATTACH THE SPRING BAR OVER THE PLUNGERS, AND BAKE THE ASSEMBLY ONE HOUR AT 100 DEG C. REMOVE FROM THE OVEN AND REMOVE 2 SOCKET HEAD SCREWS TO REMOVE THE SPRING ASSEMBLY.
- 6) INSPECT THE ASSEMBLY FOR SUFFICIENT EPOXY, AND FOR ANY EXCESS EPOXY, PARTICULARLY ON THE CERAMIC PORTION OF THE CAPACITORS.
- 7) INSTALL ITEM 3 BY FILLING THE GROOVES OF THE SPACER ON THE LEFT SIDE OF THE ASSEMBLY FLUSH TO THE TOP AND THEN ADDING AN ADDITIONAL 2 CU MILLI-METERS IN THE CENTER OF THE SPACER. THEN APPLY A THIN LAYER OF ITEM 8 TO THE DIODE LEAD AND THE METALIZED PART OF THE CAPACITOR ON ITEM 3 FILL THE GROOVE IN THE SPACER WHERE THE DIODE LEAD WILL GO, AND LOWER ITEM 3 INTO PLACE. WIPE OFF ANY EXCESS EPOXY IN THE AREA OF THE DIODE LEAD TO INSURE THAT THE NEXT CAPACITOR WILL LIE FLAT ON THE SPACER. NOTE THAT ANY EPOXY ON THE CERAMIC PART OF THE CAPACITOR IS CAUSE FOR REJECTION OF THE ASSEMBLY.
- 8) REPEAT STEPS 5 AND 6
- 9) INSTALL ITEM 4 USING THE PROCEDURE OF STEP 7.
- 10) REPEAT STEPS 5 AND 6.
- 11) INSTALL ITEM 5 USING THE PROCEDURE OF STEP 7.
- 12) REPEAT STEPS 5 AND 6.
- 13) INSTALL ITEM 6 USING THE PROCEDURE OF STEP 7.
- 14) REPEAT STEPS 5 AND 6.
- 15) REPEAT STEPS 7 THRU 14 UNTIL THE STACK HAS BEEN BUILT TO THE HIGHT SPECIFIED BY THE DASH NUMBER.
- 16) TO CLOSE OFF THE TOP OF THE STACK, ADD 2 OF ITEM 7 USING THE PROCEDURE OF STEP 7. THESE ARE NOT SHOWN IN THE FIGURE TO AID CLARITY.

REV	DESCRIPTION	BY	DATE
A	INITIAL RELEASE	HDH	6OCT94
B	NEW CAPACITOR TYPE	PCB	15FEB98



DASH NUMBER DEFINITION:

-P-CCCC-8 [-n1,n1,...]

OPTIONAL SPECIFIER(S) FOR TAP(S) ON OTHER LAYER(S)
(SEE NOTE 2)

THIS SPECIFIES NO. OF LAYERS. DWG SHOWS 8. CAN BE FROM 1 TO 8.

CCCC=1000 FOR 1000 pf CAPS, CCCC=200 FOR 200 pf CAPS

P=POSITIVE (AS SHOWN), N=NEGATIVE (CHANGE DASH NO. OF A0141 FROM -PX-XX- TO -NX-XX- TO MAKE A NEGATIVE STACK.

ITEM NO.	REQ'D	PART NO.	DESCRIPTION	MANUF
20	1	A0145	FIXTURE, CWM STACK ASSEMBLY	
8	A/R	967-1	EPOXY, SILVER LOADED	ABLESTICK
7	2	020C0036038A	CAPACITOR, BARE CERAMIC	CERAMITE
6	A/R	A0141-PO-TS-CCCC	DIODE-CAP ASSY NOTE 1, NOTE 2	
5	A/R	A0141-PI-TB-CCCC	DIODE-CAP ASSY	
4	A/R	A0141-PI-TS-CCCC	DIODE-CAP ASSY NOTE 1, NOTE 2	
3	A/R	A0141-PO-TB-CCCC	DIODE-CAP ASSY	
2	2	A0139-A	CORRIGATED SPACER	
1	1	P0103F-01	STACK BASE PCB	
LIST OF MATERIALS				

NOTES:

- 1) FOR THE TOP LAYER ON THE STACK, A -PX-ES-CCCC (EXTENDED LEAD VERSION) PART IS USED INSTEAD OF THE TRIMMED LEAD VERSION LISTED.
- 2) IF THE DASH NUMBER INDICATES THE PRESENCE OF ANY INTERMEDIATE TAP(S), THEN THIS ITEM IS CHANGED TO THE -PX-ES-CCCC (EXTENDED LEAD VERSION) ON THOSE LAYERS WHICH ARE TAPPED.

TITLE: COCKROFT-WALTON MULTIPLIER STACK			
THIS DWG MADE ON AUTOCAD REV 12		DWG NO.	REV.
FILE NAME: CWMSTACK		8142	B
DRAWN BY: H. HEETDERKS		6 OCTOBER, 1994 SHEET 1 OF 1	