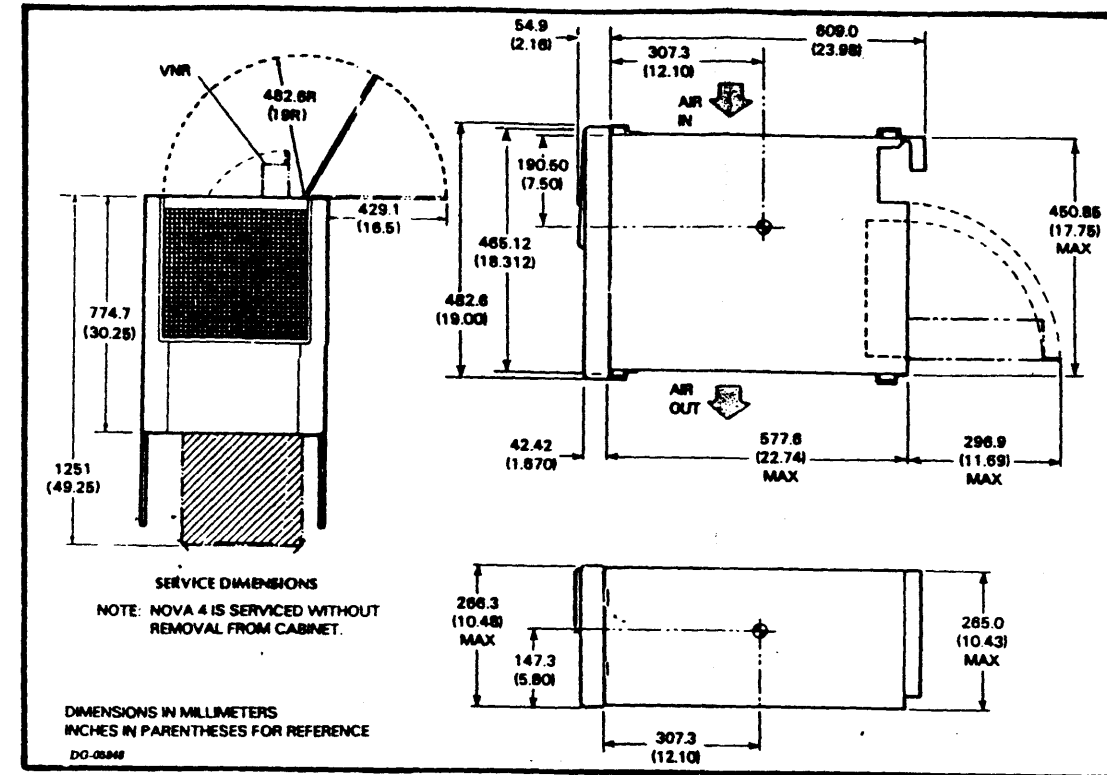
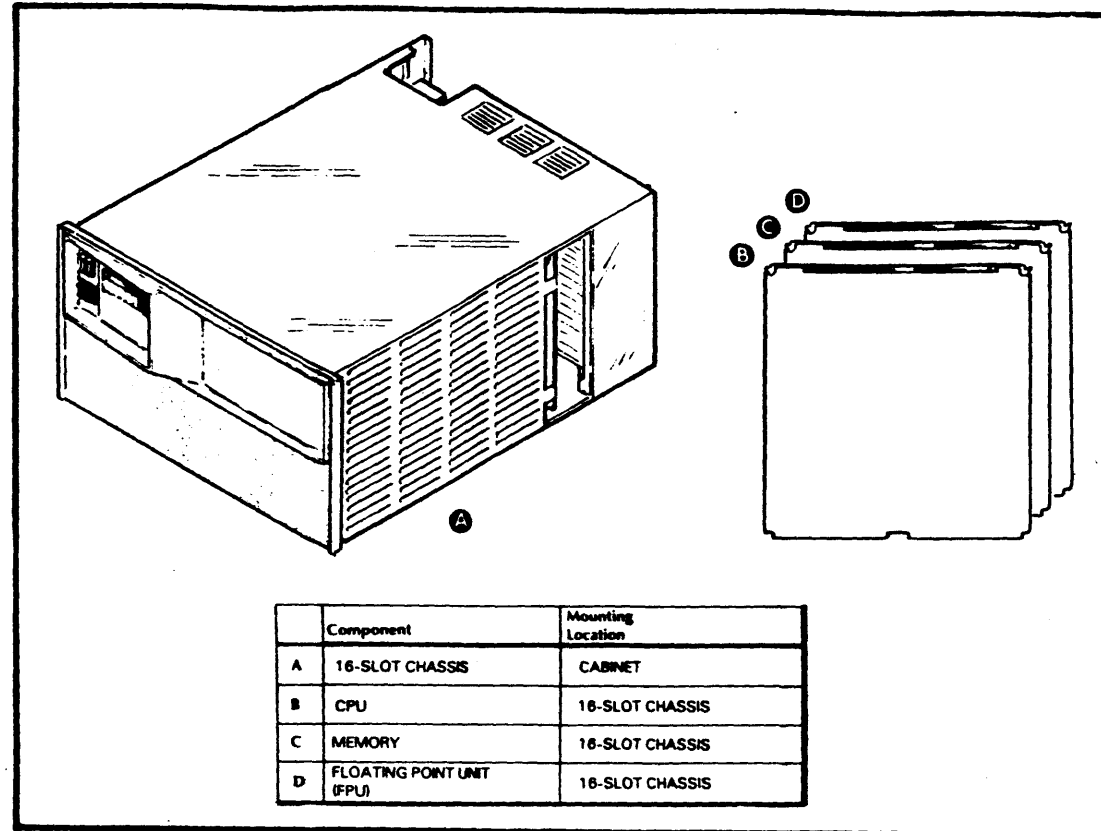


INSTALLATION SPECIFICATIONS



SLOT ASSIGNMENTS

Slot	Allowed (Slot Chart)	Assigned	+5V Current Draw
16	I/O		
15	I/O		
14	I/O		
13	I/O		
12	I/O		
11	MEMORY or I/O		
10	MEMORY or I/O		
9	MEMORY or I/O		
8	MEMORY or I/O		
7	MEMORY or I/O		
6	MEMORY or I/O		
5	MEMORY or I/O		
4	MEMORY or I/O		
3	MEMORY or I/O		
2	MEMORY or FPU	NOTE 2,3	
1	CPU	NOTE 1	
0	POWER SUPPLY		

Total +5V Current draw
Max +5V Current Available
+5V Current Surplus 100A

NOTES:

1. NOVA 4/S and NOVA 4/X
NOVA 4/C 17A
8A
2. MEMORY (NOVA 4/S & 4/X only)
w/BATTERY BACKUP OPTION PRESENT 4.4A
w/o BATTERY BACKUP OPTION PRESENT 5.6A
3. FLOATING POINT UNIT 15A
4. MAXIMUM 4 MEMORY BOARDS PER SYSTEM.
5. MAXIMUM 10 I/O BOARDS CONNECTED TO I/O BUS W/O
A BUS REPEATER.
6. PUSH-ON TERMINATORS ON TOP MEMORY SLOT FOR
NOVA 4/S & 4/X.
7. PUSH ON TERMINATORS ON SLOT 2 FOR NOVA 4/C
8. SEE PAGE 10 FOR +12V LOAD RESTRICTIONS.

SPECIFICATIONS	NOVA 4 16-slot		
DIMENSIONS:	Width	Depth	Height
	Millimeters	663.9	286.3
	Inches	26.14	10.48
SERVICE CLEARANCES:	Front	Rear	
	Millimeters	269.9	
	Inches	11.89	
WEIGHT:	Empty	Fully Loaded	
	Kilograms	49.9	
	Pounds	110.0	
OPERATING ENVIRONMENT:	Temperature (max)	55°C (131°F) 60Hz, 45°C (113°F) 50Hz	
	Relative Humidity (max)	90%	
	Altitude (max)	3084m (10,000')	
CABLES:	Length	Conn	Mating Conn
Primary Power			
Domestic	1.8m(6')	5-15P	5-15R
Export	1.8m(6')	6-15P	6-15R
External I/O Bus Cable	15.3m(50') max		
HEAT OUTPUT:	1100 watts (3750 BTU/hr)		
POWER REQUIREMENTS:			
	(Domestic)		
	Voltage	102-132	
	Hz	47-63	
	Max Amp per Phase	12.0	
	Phase	1	
	Startup Surge per Phase	20A (max) for 0.25 seconds	
	(Export)		
	Voltage	187-264	
	Hz	47-63	
	Max Amp per Phase	7.0	
	Phase	1	
	Startup Surge per Phase	40A (max) for 0.12 seconds	
LINE CORDS:	Supply	Part No.	
	120V	109 000455	
	220/240	109 000456	

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REV	ECO	APP	DATE
00 01 02	F802 F820 G748		2-6-79

DRAWN *288*
CHECKED
ENGINEER

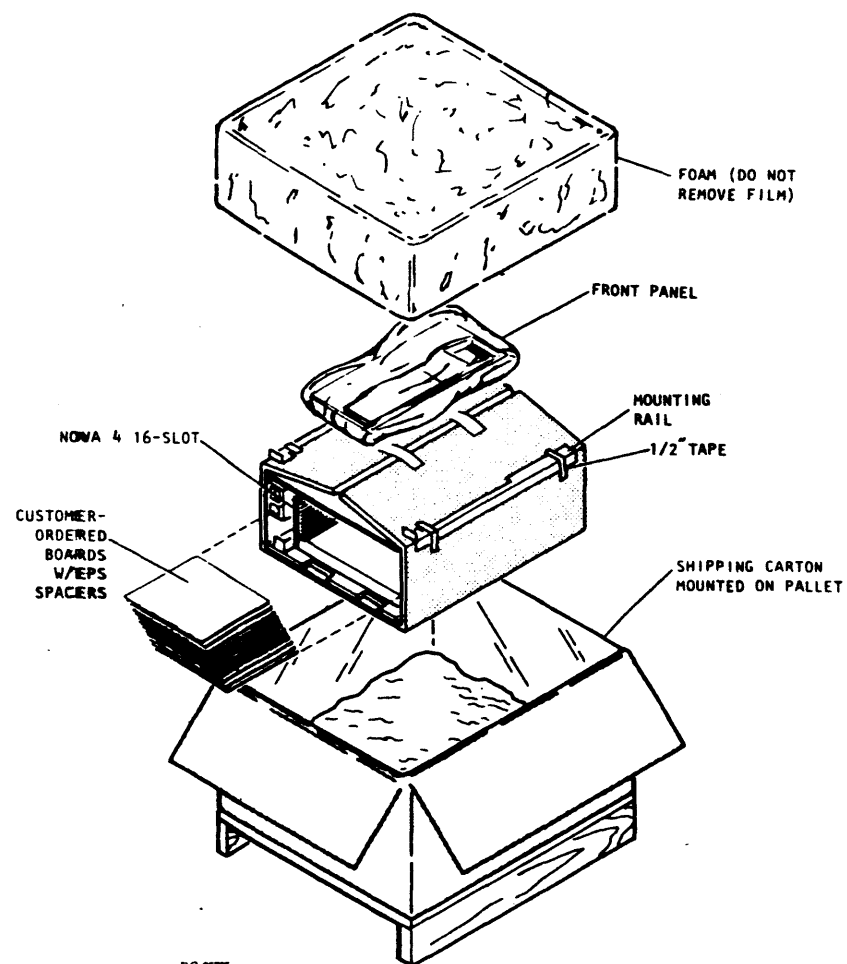
APPROVED *216/79*
FIRST USED ON
CODE IDENT 34984

TITLE
INSTALLATION DATA SHEET
NOVA 4 16-SLOT

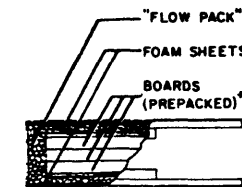
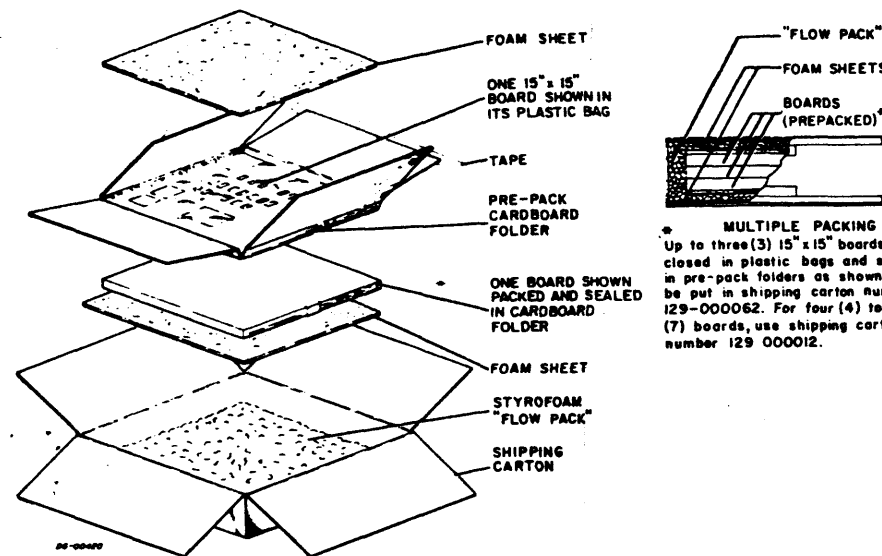
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WESTBORO, MASSACHUSETTS 01581

SIZE	CODE	DRAWING NUMBER	REV
C	010	000213	02

SHIPPING



DG-0575



*** MULTIPLE PACKING**
Up to three(3) 15" x 15" boards, enclosed in plastic bags and sealed in pre-pack folders as shown, can be put in shipping carton number 129-000062. For four (4) to seven (7) boards, use shipping carton number 129 000012.

SHIPPING AND PACKAGE DATA					
Outside Dimensions			Weight (Gross)	Volume	Density
Length	Width	Depth			
in.	in.	in.	lbs.	cu ft	lbs/cu ft
cm	cm	cm	kg	cu m	kg/cu m
36	28	24.5	135	14.25	
91.4	71.12	62.2	61.22	.4287	
SHIPPING SPECIFICATIONS			STORAGE SPECIFICATIONS		
Temperature Range	Relative Humidity	Maximum Altitude	Temperature Range	Relative Humidity	Maximum Period
$^{\circ}\text{F}$	(Non-condensing)		$^{\circ}\text{F}$	(Non-condensing)	
$^{\circ}\text{C}$			$^{\circ}\text{C}$		
-40to+160	0%/90%	50,000ft. 15,200m	-40to+160	0%/90%	90 days
-40to+71			-40to+71		

DG-03224

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REV	DATE	APP	ENGINEER	DRAWN	ENGINEER
ECO					

DRAWN	APPROVED
CHECKED	FIRST USED ON
ENGINEER	CODE IDENT 34984

TITLE
INSTALLATION DATASHEET
NOVA 4 16-SLOT

DATA GENERAL CORPORATION
WESTBORO, MASSACHUSETTS 01581

SIZE	CODE	DRAWING NUMBER	REV
C	010	000213	02

TAILORING CPU JUMPERING NOVA 4/C

DEVICE CODE JUMPERS FOR FRONT PANEL AUTOMATIC PROGRAM LOAD
SELECT THE PROGRAM LOAD DEVICE CODE BY INSTALLING JUMPERS
W11, W8, W6, W7, W9, W10, AS FOLLOWS:

JUMPER OUT = 1 JUMPER IN = 0

EXAMPLE JUMPERING FOR DEVICE CODE 27g:

W11	W8	W6	W7	W9	W10
IN	OUT	IN	OUT	OUT	OUT

W4 IS NOT INSERTED IF THE PROGRAM LOAD DEVICE IS A HIGH SPEED DEVICE, OTHERWISE IT IS INSERTED.

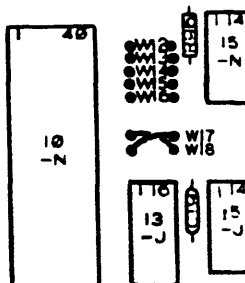
TYPE OF TRANSMISSION JUMPERS

TYPE OF TRANSMISSION	JUMPERS INSERTED*
20MA CURRENT LOOP	W1, W3
EIA RS232-C	W2

* JUMPER 25 IS INSERTED IF THE SYSTEM TERMINAL IS A TELETYPE, OTHERWISE IT IS NOT INSERTED.

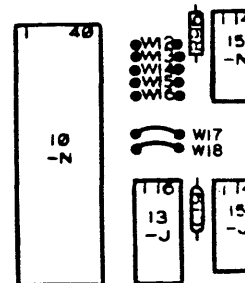
* JUMPERS W17 AND W18 MUST ALSO BE INSERTED AS SHOWN BELOW.

20MA CURRENT LOOP

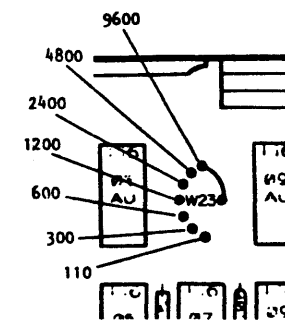


JUMPERS W17 AND W18 MUST NOT TOUCH!

EIA RS232-C



W23 IS INSERTED TO DETERMINE THE BAUD RATE AS SHOWN BELOW: (9600 SHOWN)



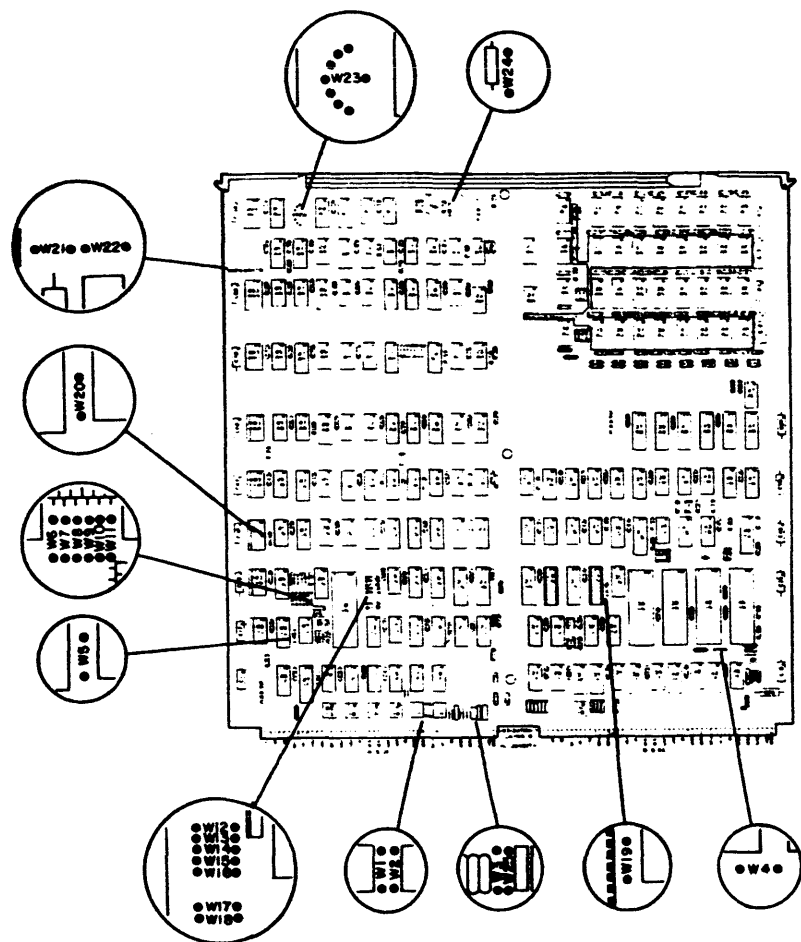
W22 IS NEVER INSERTED.

THE FOLLOWING JUMPERS ARE ALWAYS INSERTED:

W5
W19
W20
W21
W24

CPU/MEMORY LOADS

VOLTAGE	DESCRIPTION	CURRENT DRAW
+5V	SYSTEM WITHOUT BATTERY BACKUP	8.0A
+5V	SYSTEM WITH BATTERY BACKUP	7.5A
+5V MEM		0.5A
+12V MEM		0.7A
+15V		0.04A



STOP BIT JUMPERS

NUMBER OF STOP BITS	W15 JUMPER POSITION
1	IN
2	OUT

PARITY JUMPERS

TYPE OF PARITY	JUMPER POSITION	
	W12	W16
EVEN	OUT	IN
ODD	IN	IN
NONE	OUT	OUT

CHARACTER LENGTH JUMPERS

CHARACTER LENGTH	JUMPER POSITION	
	W13	W14
5 BITS	IN	IN
6 BITS	OUT	IN
7 BITS	IN	OUT
8 BITS	OUT	OUT

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REV	DATE	ECO	APP	ENGINEER	CHECKED	APPROVED	FIRST USED ON	CODE IDENT

DRAWN	APPROVED
CHECKED	FIRST USED ON
ENGINEER	CODE IDENT 34984

TITLE
INSTALLATION DATA SHEET
NOVA 4 16-SLOT

DATA GENERAL CORPORATION
WESTBORO, MASSACHUSETTS 01581

SIZE	CODE	DRAWING NUMBER	REV.
C	OIO	000213	02

TAILORING (CONT)

CPU JUMPERING

NOVA 4/S OR 4/X

BAUD RATE JUMPERS

BAUD RATE	JUMPER POSITION				
	W17	W18	W19	W20	W27
50	IN	IN	OUT	IN	OUT
75	IN	IN	OUT	OUT	OUT
110	OUT	OUT	OUT	OUT	IN
134.5	IN	OUT	IN	IN	OUT
150	OUT	OUT	OUT	IN	OUT
200	IN	OUT	IN	OUT	OUT
300	OUT	OUT	IN	OUT	OUT
600	IN	OUT	OUT	IN	OUT
1200	OUT	IN	OUT	OUT	OUT
1600	OUT	IN	OUT	IN	OUT
2400	OUT	OUT	IN	IN	OUT
4800	OUT	IN	IN	OUT	OUT
9600	OUT	IN	IN	IN	OUT
19200	IN	IN	IN	OUT	OUT

PARITY JUMPERS

TYPE OF PARITY	JUMPER POSITION	
	W22	W21
EVEN	OUT	IN
ODD	IN	IN
NONE	OUT	OUT

CHARACTER LENGTH JUMPERS

CHARACTER LENGTH	JUMPER POSITION	
	W25	W24
5 BITS	IN	IN
6 BITS	OUT	IN
7 BITS	IN	OUT
8 BITS	OUT	OUT

TYPE OF TRANSMISSION JUMPERS

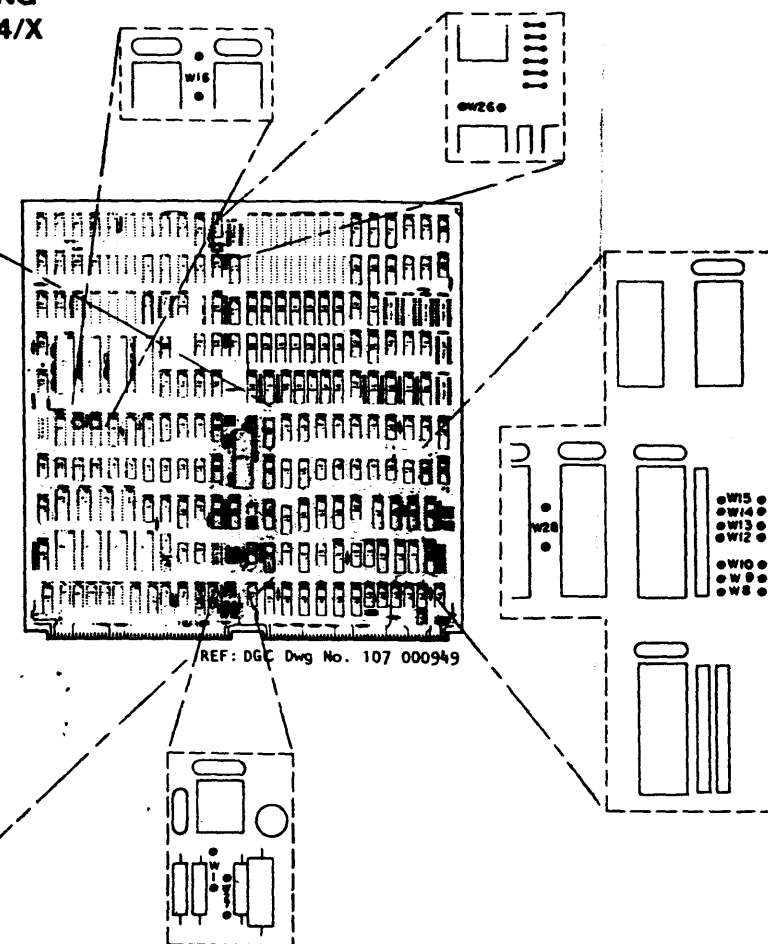
TYPE OF TRANSMISSION	JUMPERS INSERTED
ZOMA CURRENT LOOP	W4, W7, W2, W1
EIA RS232-C	W6, W3

STOP BIT JUMPERS

NUMBER OF STOP BITS	W23 JUMPER POSITION
1	IN
2	OUT

REAL TIME CLOCK JUMPER

RTC ENABLED	W23
RTC ENABLED	IN
RTC DISABLED	OUT



DEVICE CODE JUMPERS FOR FRONT PANEL AUTOMATIC PROGRAM LOAD

SELECT THE PROGRAM LOAD DEVICE CODE BY INSTALLING JUMPERS W13, W15, W14, W12, W10, W8 AS FOLLOWS:

JUMPER IN = 1 JUMPER OUT = 0

EXAMPLE JUMPERING FOR DEVICE CODE 27 :

W13	W15	W14	W12	W10	W8
OUT	IN	OUT	IN	IN	IN

W9 IS INSERTED IF THE PROGRAM LOAD DEVICE IS A HIGH SPEED DEVICE, OTHERWISE, IT IS REMOVED.

NOTE: JUMPERS W16 AND W26 ARE ALWAYS INSERTED. JUMPERS W5 AND W11 DO NOT EXIST.

+5V CURRENT DRAW = 17A

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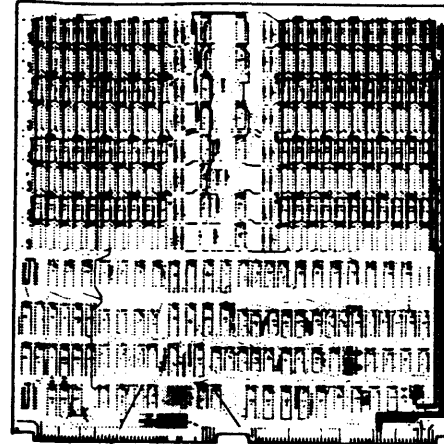
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TITLE
INSTALLATION DATA SHEET
NOVA 4 16-SLOT

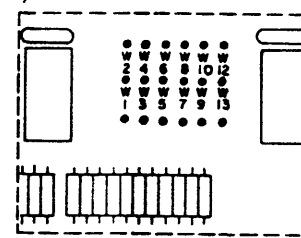
DATA GENERAL CORPORATION WESTBORO, MASSACHUSETTS 01581			
SIZE C	CODE 010	DRAWING NUMBER 000213	REV 02

TAILORING (CONT)

MEMORY JUMPERING NOVA 4/S AND 4/X



REF: DGC, Dwg No. 107 000813



NOVA 4/X MEMORY BOARD SELECT JUMPERS

ADDRESS RANGE	JUMPERS INSERTED*		
	BOARD SIZE		
	256KBYTES	128KBYTES	64KBYTES
0377777-	NONE	W8	W8 W10
0300000-			W8 W9
0277777-		W7	W7 W10
0200000-	W7 W9		
0177777-			W7 W9
0100000-			
0077777-			
0000000-			

*NOTE: JUMPERS W1, W3, AND W5 ARE ALWAYS INSERTED.
JUMPERS W2, W4, AND W6 ARE NEVER INSERTED.

NOVA 4/S MEMORY BOARD SELECT JUMPERS

ADDRESS RANGE	JUMPERS INSERTED*	
	BOARD SIZE	
	64 KBYTES	32KBYTES
0077777-	W7 W9	W7 W9 W12
0040000-		W7 W9 W11
0037777-		
0000000-		

NOTE: JUMPERS W1, W3, AND W5 ARE ALWAYS INSERTED;
JUMPERS W2, W4, AND W6 ARE NEVER INSERTED.

SYSTEMS SHOULD BE CONFIGURED WITH THE LARGER BOARDS OCCUPYING THE LOWER MEMORY ADDRESS RANGES.

MEMORY LOADS

VOLTAGE	DESCRIPTION	CURRENT DRAW
+5V	SYSTEM WITH BATTERY BACKUP	4.4 A
+5V	SYSTEM WITHOUT BATTERY BACKUP	5.6 A
+5V MEM		1.2 A
+12V MEM	FIRST BOARD IN CHASSIS	2.3 A
+12V MEM	EACH ADDITIONAL BOARD	0.3 A

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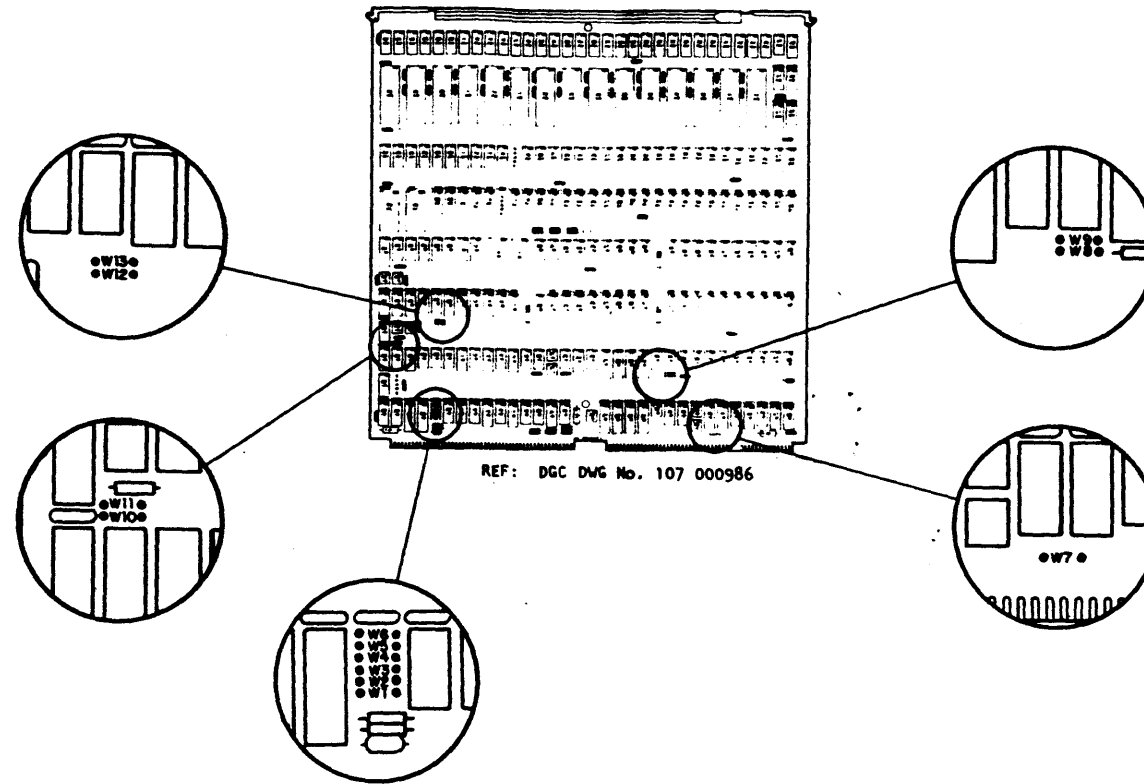
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									34984

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INSTALLATION DATA SHEET
NOVA 4 16-SLOT

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SIZE C CODE 010 DRAWING NUMBER 000213 REV 02

TAILORING (CONT)
FLOATING POINT UNIT JUMPERING



REF: DGC DWG No. 107 000986

THE JUMPERS MUST BE POSITIONED ON THE FLOATING POINT UNIT PRINTED CIRCUIT BOARD AS INDICATED IN THE TABLE BELOW.

JUMPER	POSITION
W1	IN
W2	OUT
W3	OUT
W4	IN
W5	OUT
W6	IN
W7	IN
W8	OUT
W9	IN
W10	OUT
W11	IN
W12	OUT
W13	IN

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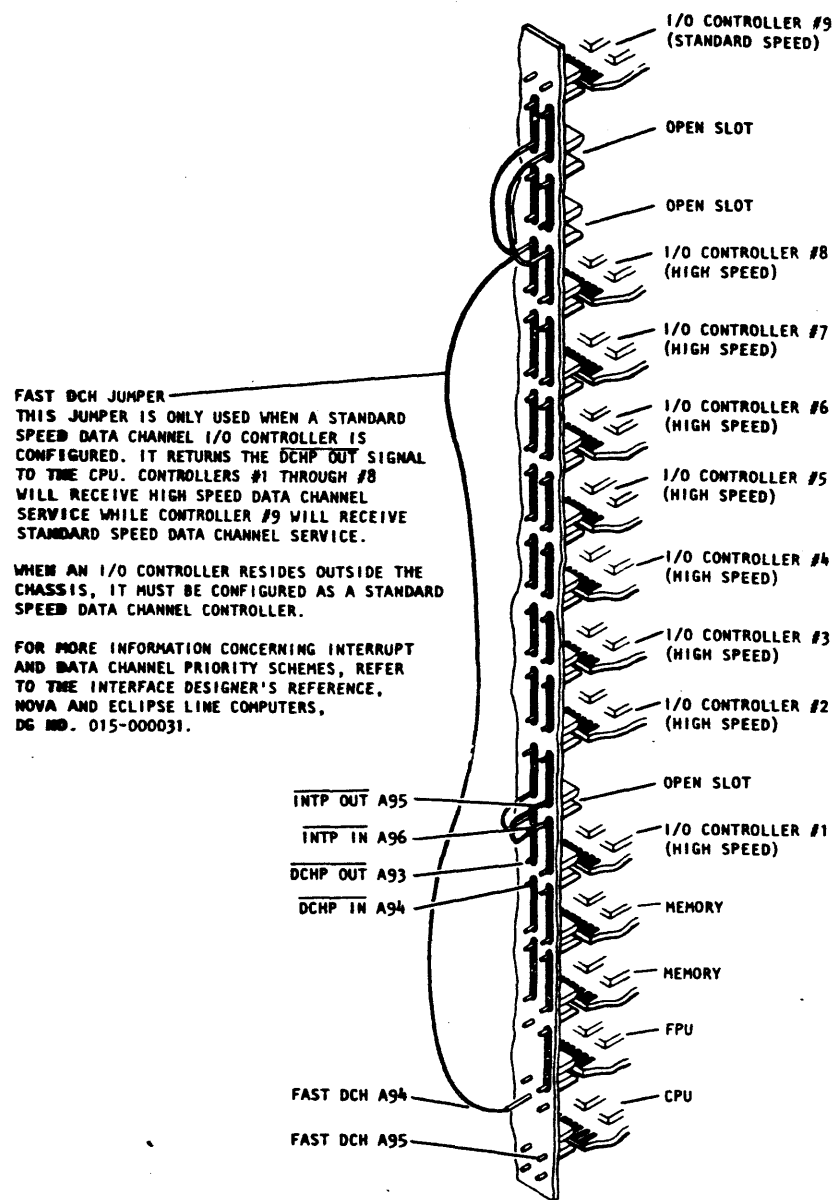
ENGINEER: [Signature]

TITLE
INSTALLATION DATA SHEET
NOVA 4 16-SLOT

DATA GENERAL CORPORATION
WESTBORO, MASSACHUSETTS 01581

SIZE	CODE	DRAWING NUMBER	REV
C	010	000213	02

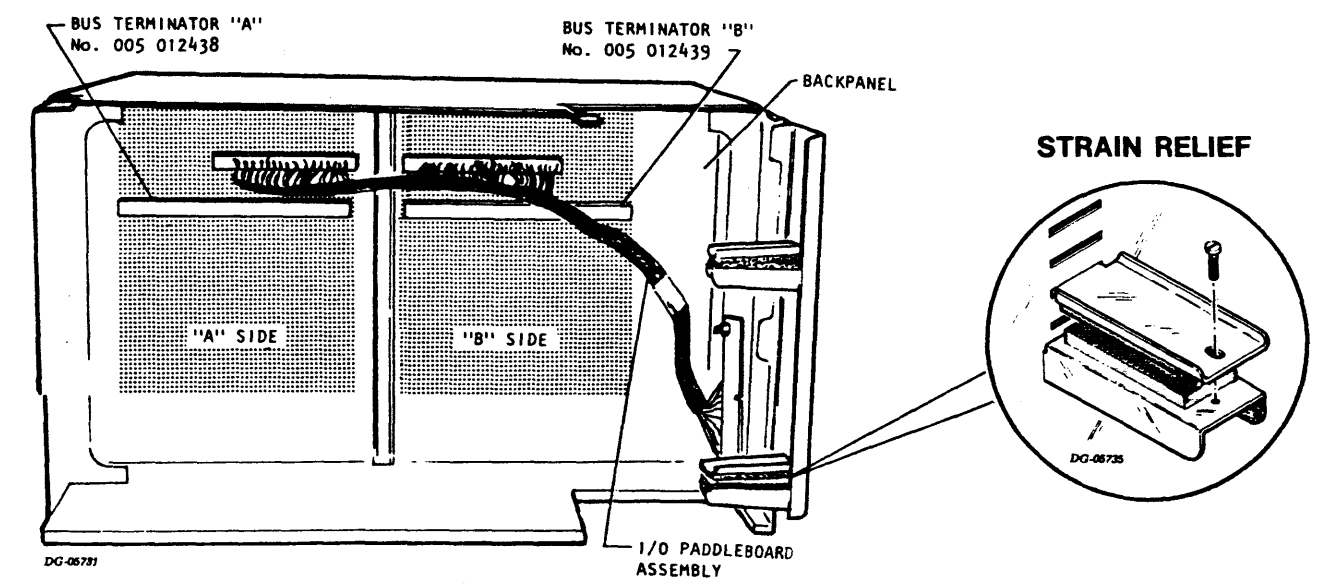
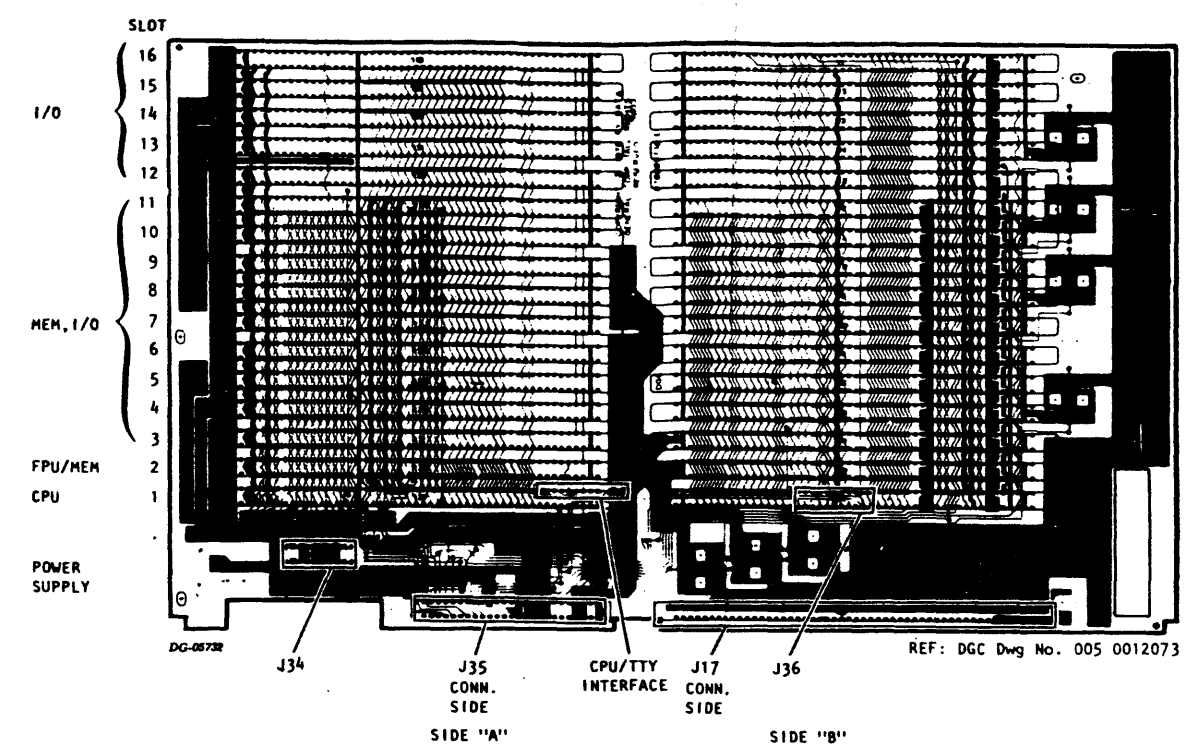
TAILORING (CONT) BACKPANEL JUMPERING



DG-0572E
NO JUMPERS NEEDED EXCEPT FOR OPEN SLOTS AND STANDARD SPEED DATA CHANNEL I/O CONTROLLERS.

WHEN A 4C PROCESSOR IS USED IN THIS CHASSIS, THE END OF THE INTYP PRIORITY NETWORK CLOSEST TO THE PROCESSOR (HIGHEST PRIORITY) MUST BE CONNECTED TO THE NEAREST GROUND (PIN A99 OR A100).

INTERNAL CABLING BACKPANEL CONNECTORS

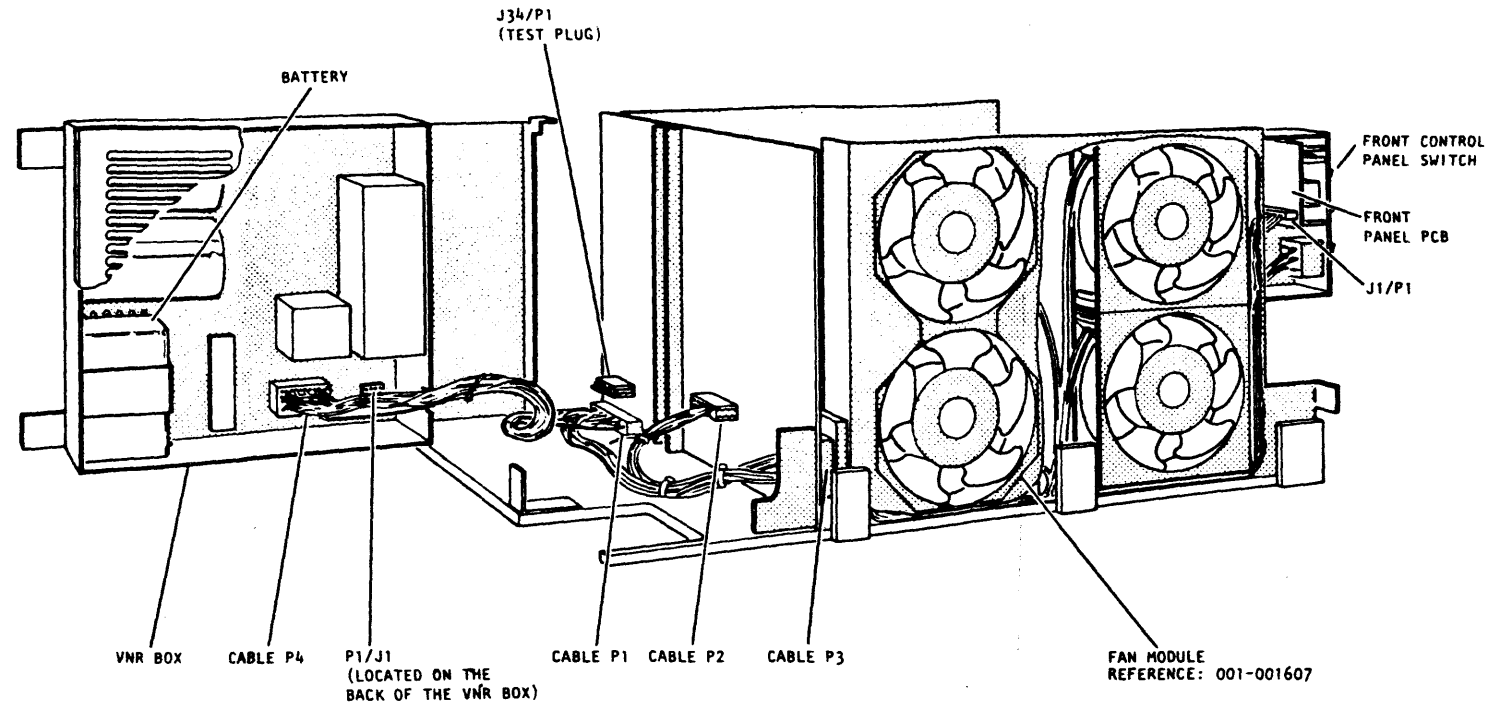
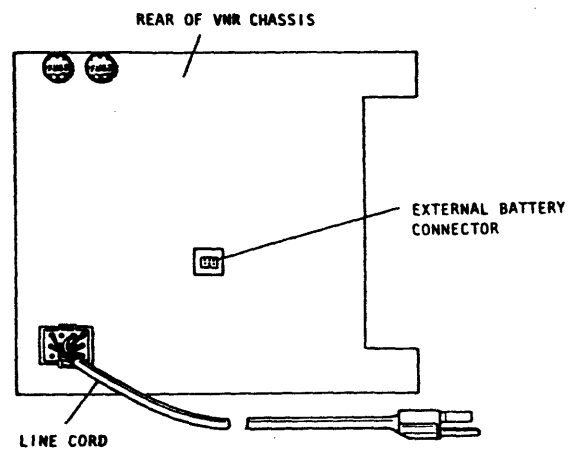


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REV															DRAWN	APPROVED	TITLE	DATA GENERAL CORPORATION			
ECO															CHECKED	FIRST USED ON	INSTALLATION DATA SHEET	WESTBORO, MASSACHUSETTS 01581			
APP															ENGINEER	CODE IDENT 34984	NOVA 4 16-SLOT	SIZE	CODE	DRAWING NUMBER	REV
DATE																		C	O10	000213	02

INTERNAL CABLING (CONT)



WARNING
 FOR SERVICING DISCONNECT POWER, WAIT 5 MINUTES REASSEMBLE UNIT BEFORE APPLYING POWER

PADDLEBOARD MOUNTING

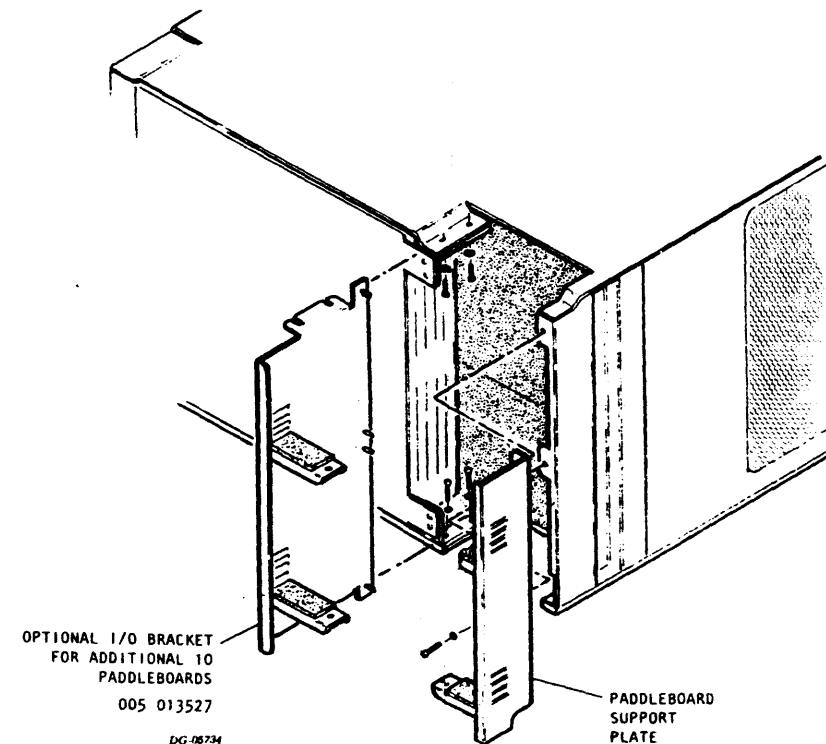
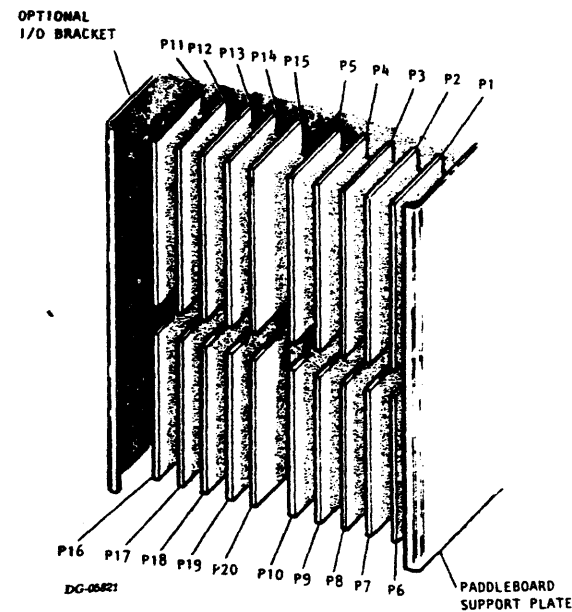
NOVA 4 I/O PADDLEBOARDS

ASSEMBLY NO.	TYPE
005 012472	GENERAL PURPOSE I/O
005 012751	EXTERNAL I/O BUS**
005 012765	UNIVERSAL LINE MUX MODEL 4241, 4241A, 4242, 4243***
005 012476	I/O BUS REPEATER MODELS 8315
005 012590	DCU-50 MODELS 4250, 4254
005 012473*	ASYNCHRONOUS INTERFACE MODELS 4007, 4010, 4023, 4075, 4077, 4078
005 012585	MCA MODEL 4206

* THIS PADDLEBOARD MUST BE PLACED IN THE OUTSIDE POSITION: i.e. THE FURTHEST AWAY FROM THE PADDLEBOARD SUPPORT PLATE.

** EXTERNAL I/O BUS MUST BE TERMINATED AT THE END AWAY FROM THE COMPUTER BY TERMINATOR NO. 005-9067, OR EQUIVALENT.

*** REQUIRES TWO PADDLEBOARD LOCATIONS.



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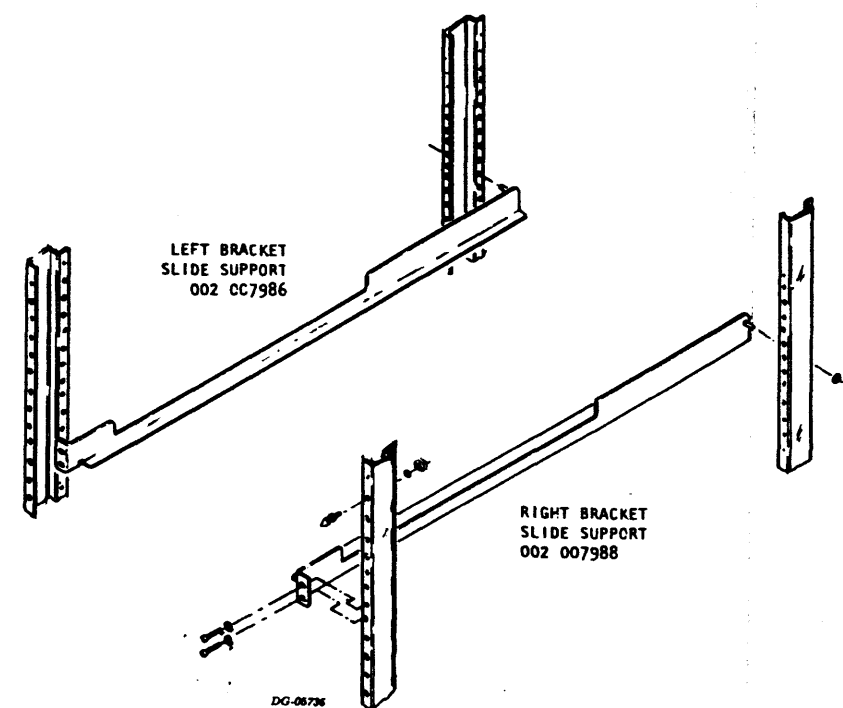
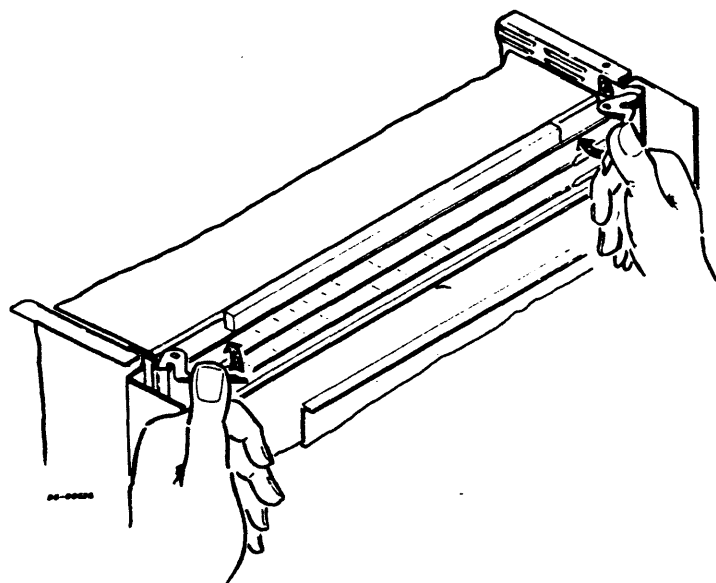
REV	DATE	APP	CHECKED	ENGINEER	DRAWN	APPROVED

TITLE
 INSTALLATION DATA SHEET
 NOVA 4 16-SLOT

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WESTBORO, MASSACHUSETTS 01581			
SIZE	CODE	DRAWING NUMBER	REV
C	010	000213	02

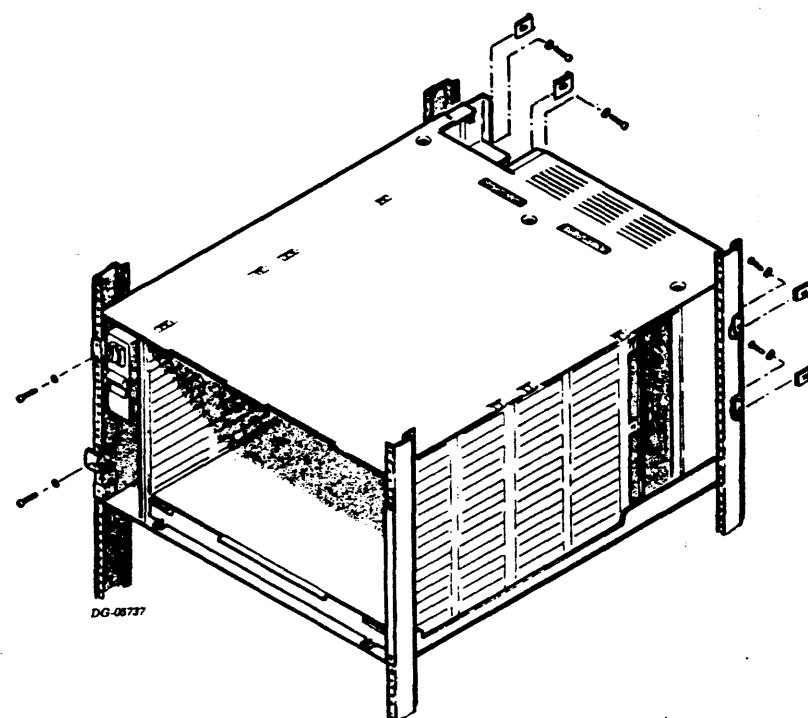
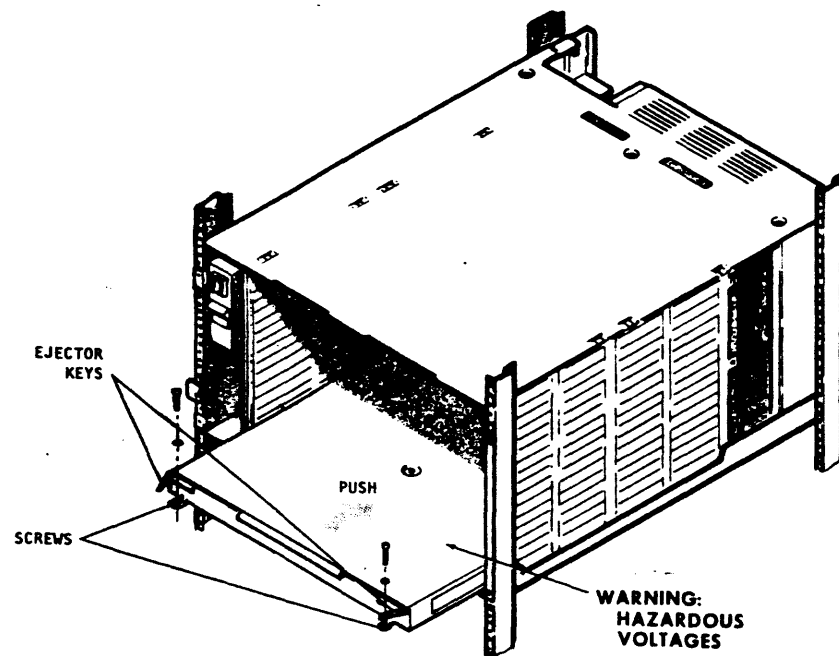
CABINET MOUNTING

INSERTING PC BOARD



HARDWARE MOUNTING KIT
005 012068

INSERTING POWER SUPPLY PCB



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REV	ECO	APP	DATE

DRAWN	APPROVED
CHECKED	FIRST USED ON
ENGINEER	CODE IDENT 34984

TITLE
INSTALLATION DATA SHEET
NOVA 4 16-SLOT

DATA GENERAL CORPORATION			
WESTBORO, MASSACHUSETTS 01581			
SIZE	CODE	DRAWING NUMBER	REV
C	010	000213	02

