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- (1) Program Number (if new program, will be filled in by SPLA) TRACE REPLAY GM FONTS
- (2) Title of Program STANDARD LIB
- (3) System Type(s) (Machine) none
- (4) Search Keys -
- (5) Programming Systems/Languages n/a
- (6) Primary Subject Codes n/a
- (7) Minimum System Requirements n/a
- (8) New (N) or Revision (R) N
- (9) Date of Submittal DEC 14 1990
- (10) Documentation (number of pages of hardcopy submitted) 267 pages
- (11) Author's Name and Address MICHELLE LEWIS
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- (12) Name and Address of Contact for Technical .. GEORGE RADMILLER
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BURBANK, CA 91504
- (13) Submitter's Installation Membership Code ..
- (14) Abstract (use reverse side of this form)

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SHARE PROGRAM LIBRARY SUBMITTAL FORM

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- a. Purpose of Program
- b. Programming Language Used
- c. Version and Modification level or Release Number
- d. Field of Application
- e. Type of routine (main program, subroutine, etc.)
- f. Specific description of machine requirements.

The tape submitted is in the operating form of VM.
This tape contains the GM Fonts, Trace and Replay, and the Standard library.

GM Fonts consist of 21 font tables and 1 font display page that make an enhancement to the CADAM interactive system.
The GM Fonts can be used on CADAM's Release 21 and Version 3

Trace and Replay is a tool that records and replays a sequence of events call a scenario. During an interactive session scope attentions are captured, recorded, and stored in an external file. The recorded scenario can then be called from storage and replayed on the scope. The Trace and Replay program can be used on CADAM's Release 21 and Version 3.

The Standard Library consists of 84 CADAM models representing standard features which were primarily extracted from manufacturing applications. This library can be used on CADAM's Release 21 and Version 3.

An "Acknowledgement of Assistance" statement must be attached to this Submittal Form.

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15) Signature of Submitter and Date

 12/14/90

16) Signature of Installation Addressee (if SHARE Member)

December 14, 1990

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1365 Memorial Drive
Coral Gables, Florida 33124

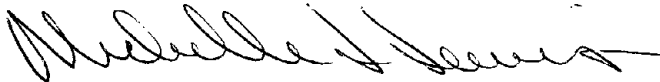
Subject: Program Submittal

Dear Mr. Robinson:

To the best of my knowledge, my program entitled "GM Fonts" "Standard Library" and "Trace and Replay" is free of any proprietary, secret, or confidential information belonging to any person or organization.

Where I have used the work, plans, procedures, systems, programs or names of companies or individuals, I have obtained their permission to do so.

Sincerely,

A handwritten signature in cursive script, appearing to read "Michelle L. Lewis".

Michelle L. Lewis
CADAM INC

MLL:ml

1CREATE TAPE LABEL

R21.0

0 STDL

** LABEL COMPLETED **

1 THE FOLLOWING DRAWINGS HAVE BEEN UNLOADED ON TAPE STDL

R21.0

OCOUNT	PN	FN	USER ID
--------	----	----	---------

0	1	RATCHET WHEEL ,MSTR	STDLB1
	2	RATCHET WHEEL ,RPLY	STDLB1
	3	2D RTCH WHEEL ,MSTR	STDLB1
	4	2D RTCH WHEEL ,RPLY	STDLB1
	5	AIR ,1	STDLB1
	6	ANG ,1	STDLB1
	7	ANG ,2	STDLB1
	8	ANG ,3	STDLB1
	9	ARCH DETAILS ,1	STDLB1
	10	ARCH DETAILS ,2	STDLB1
	11	B ,111	STDLB1
	12	BLT ,1	STDLB1
	13	BLT ,2	STDLB1
	14	BOX ,1	STDLB1
	15	BUS ,1	STDLB1
	16	BUS ,2	STDLB1
	17	BUS ,3	STDLB1
	18	CAB ,1	STDLB1
	19	CD ,1	STDLB1
	20	CD ,2	STDLB1
	21	CD ,3	STDLB1
	22	CD ,4	STDLB1
	23	CD ,5	STDLB1
	24	CD ,6	STDLB1
	25	CD ,7	STDLB1
	26	CD ,8	STDLB1
	27	CLEVER 630-F-116,.3	STDLB1
	28	CLEVER 630-F-116,D	STDLB1
	29	CLEVER 630-F-116,MOD1	STDLB1
	30	CLEVER 630-F-116,MOD2	STDLB1
	31	CLEVER 630-F-116,REL	STDLB1
	32	CLEVER 630-F-116,TXT1	STDLB1
	33	CLEVER 630-F-116,X	STDLB1
	34	CLEVER 630-F-116,1	STDLB1
	35	CLEVER 630-F-116,2	STDLB1
	36	CLEVER 630-F-116,20K	STDLB1
	37	CLP ,1	STDLB1
	38	CLP ,2	STDLB1
	39	CLP ,3	STDLB1
	40	CLP ,4	STDLB1
	41	CLP ,5	STDLB1
	42	COMPUTER DETAILS,1A	STDLB1
	43	COMPUTER DETAILS,2A	STDLB1
	44	COMPUTER DETAILS,2B	STDLB1
	45	CUB ,1	STDLB1
	46	CUT ,1	STDLB1
	47	CUT ,2	STDLB1
	48	D ,111	STDLB1
	49	DEC ,1	STDLB1
	50	DEC ,2	STDLB1

1 THE FOLLOWING DRAWINGS HAVE BEEN UNLOADED ON TAPE STDL

R21.0

OCOUNT	PN	FN	USER ID
-----	-----	-----	-----
0	51 DET	,1	STDLB1
	52 DP	,111	STDLB1
	53 DWG	,1	STDLB1
	54 DWG	,2	STDLB1
	55 DWG	,3	STDLB1
	56 DWG	,4	STDLB1
	57 EH72311-TUBE1	,1	STDLB1
	58 EH72311-TUBE1	,2	STDLB1
	59 ELEC DETAILS	,1	STDLB1
	60 ELEC DETAILS	,2	STDLB1
	61 ELEC DETAILS	,3	STDLB1
	62 ELEC DETAILS	,4	STDLB1
	63 EQU	,1	STDLB1
	64 EXHAUST GAGE	,1	STDLB1
	65 EXHAUST HOODS	,1	STDLB1
	66 EXHAUST SCHED	,1	STDLB1
	67 FAC CHURCH	,1	STDLB1
	68 FLO	,1	STDLB1
	69 FUR	,1	STDLB1
	70 FUR	,2	STDLB1
	71 FUR	,3	STDLB1
	72 FURNITURE	,1	STDLB1
	73 FURNITURE	,2	STDLB1
	74 FURNITURE	,3	STDLB1
	75 FURNITURE	,4	STDLB1
	76 FURNITURE	,5	STDLB1
	77 GRK	,1	STDLB1
	78 LFT	,1	STDLB1
	79 LOC	,1	STDLB1
	80 LOC	,2	STDLB1
	81 LOC	,3	STDLB1
	82 LOC	,4	STDLB1
	83 MECH DETAILS	,1	STDLB1
	84 MIL	,1	STDLB1
	85 MIS	,1	STDLB1
	86 MIS	,2	STDLB1
	87 NORTH ARROW	,0A01	STDLB1
	88 NUT	,1	STDLB1
	89 NUT	,2	STDLB1
	90 OFF	,1	STDLB1
	91 OFF	,2	STDLB1
	92 PAD	,1	STDLB1
	93 PAR	,1	STDLB1
	94 PIN	,1	STDLB1
	95 PIN	,2	STDLB1
	96 PIN	,3	STDLB1
	97 PIP	,1	STDLB1
	98 PLG	,1	STDLB1
	99 PLG	,2	STDLB1
	100 PLG	,3	STDLB1

1 THE FOLLOWING DRAWINGS HAVE BEEN UNLOADED ON TAPE STDL

R21.0

OCOUNT	PN	FN	USER ID
-----	-----	-----	-----
0	101 PLG	,4	STDLB1
	102 PUN	,1	STDLB1

103	REC	,1	STDLB1
104	REC	,2	STDLB1
105	REL	,1	STDLB1
106	S	,111	STDLB1
107	SCR	,1	STDLB1
108	SCR	,2	STDLB1
109	SOC	,1	STDLB1
110	STR	,1	STDLB1
111	STR	,2	STDLB1
112	STR	,3	STDLB1
113	STR	,4	STDLB1
114	STR	,5	STDLB1
115	STR	,6	STDLB1
116	STR	,7	STDLB1
117	STR	,8	STDLB1
118	STR	,9	STDLB1
119	SWT	,1	STDLB1
120	SY	,111	STDLB1
121	SYM	,1	STDLB1
122	SYM	,2	STDLB1
123	SYM	,3	STDLB1
124	SYM	,4	STDLB1
125	SYM	,5	STDLB1
126	SYM	,6	STDLB1
127	SYM	,7	STDLB1
128	TAB	,1	STDLB1
129	TXT	,1	STDLB1
130	TXT	,2	STDLB1
131	TXT	,3	STDLB1
132	W	,111	STDLB1
133	X	,111	STDLB1
134	F-BLOCK COND	11,0 UC	STDLB1
135	F-BLOCK COND	11,0NUM	STDLB1
136	F-BLOCK COND	11,1 LC	STDLB1
137	F-BRUSH	10,8 UC	STDLB1
138	F-BRUSH	10,8NUM	STDLB1
139	F-BRUSH	10,9 LC	STDLB1
140	F-CASLON	11,8 UC	STDLB1
141	F-CASLON	11,8NUM	STDLB1
142	F-CASLON	11,9 LC	STDLB1
143	F-DATA	10,3 UC	STDLB1
144	F-DATA	10,3NUM	STDLB1
145	F-DATA	10,4 LC	STDLB1
146	F-GM MICRO	10,7 UC	STDLB1
147	F-GM MICRO	10,7NUM	STDLB1
148	F-GOTHIC	11,4 UC	STDLB1
149	F-GOTHIC	11,4NUM	STDLB1
150	F-GOTHIC	11,5 LC	STDLB1

1 THE FOLLOWING DRAWINGS HAVE BEEN UNLOADED ON TAPE STDL

R21.0

OCOUNT	PN	FN	USER ID
0	151	F-GREEK 11,6 UC	STDLB1
	152	F-GREEK 11,7 LC	STDLB1
	153	F-HLVITICA MED 12,8 UC	STDLB1
	154	F-LEROY 1 10,0 UC	STDLB1
	155	F-LEROY 1 10,0NUM	STDLB1
	156	F-OLD ENGLISH 11,2 UC	STDLB1

157	F-OLD ENGLISH 11,2NUM	STDLB1
158	F-OLD ENGLISH 11,3 LC	STDLB1
159	F-PEIGNOT MED 10,1 UC	STDLB1
160	F-PEIGNOT MED 10,1NUM	STDLB1
161	F-PEIGNOT MED 10,2 LC	STDLB1
162	F-PLAYBILL 10,5 UC	STDLB1
163	F-PLAYBILL 10,5NUM	STDLB1
164	F-PLAYBILL 10,6 LC	STDLB1
165	FONTPAGE ,	STDLB1

0

END OF JOB

165 DRAWINGS UNLOADED FOR STDLB1

Ready; T=0.01/0.01 12:55:23

q disk

LABEL	CUU	M	STAT	CYL	TYPE	BLKSIZE	FILES	BLKS USED-(%)	BLKS LEFT	BLK TOTAL
AAA	191	A	R/W	120	3380	4096	1	7-00	17993	18000
MNT190	190	S	R/O	33	3380	4096	229	3093-62	1857	4950
MNT19E	19E	Y/S	R/O	50	3380	4096	657	6143-82	1357	7500

Ready; T=0.01/0.01 12:55:27

PUN FILE 0016 FROM S246659 COPY 001 NOHOLD

id

TCAD4 AT CADAM3 VIA RSCS 12/13/90 13:01:42 PST THURSDAY

Ready; T=0.01/0.01 13:01:42

file1

Ready; T=0.07/0.09 13:02:03

sp cons start to *

Ready; T=0.01/0.01 13:02:23

TAPE 181 ATTACHED

tape rew

Ready; T=0.01/0.01 13:13:30

fsf 1

Unknown CP/CMS command

tape fsf 1

Ready; T=0.01/0.01 13:13:47

vmfplc2 load * * a

LOADING.....

CHKCHAR EXEC A1

FTAPEBLD EXEC A1

FONTBULD EXEC A1

FONTINST EXEC A1

FONTMAIN EXEC A1

GTCADSYM DATA A1

GTCADSYM EXEC A1

END-OF-FILE OR END-OF-TAPE

Ready; T=0.02/0.06 13:14:02

tape rew

Ready; T=0.01/0.01 13:15:36

vmfplc2 load * * a

LOADING.....

TRACE DRAWINGS A1

CADTRACE EXEC A1

TRACEIM LOADLIB A1

TRACELM LOADLIB A1

TRACE MACLIB A4

TRACE SPTPARMS A1

SAMPLE TRACELIB A1

END-OF-FILE OR END-OF-TAPE

Ready; T=0.03/0.14 13:16:29

rl

13:17:06

WNG FROM OPERATOR: TAPE IS MOUNTED...

Ready; T=0.79/2.02 13:17:17

listfile (la

FILENAME	FILETYPE	FM	FORMAT	LRECL	RECS	BLOCKS	DATE	TIME	LABEL
CHKCHAR	EXEC	A1	V	72	71	1	1/09/86	11:50:03	AAA

FTAPEBLD EXEC	A1 V	72	332	4	1/09/86 12:09:28	AAA
FONTBULD EXEC	A1 V	72	60	1	1/09/86 11:59:42	AAA
FONTINST EXEC	A1 V	73	481	5	1/09/86 11:54:49	AAA
FONTMAIN EXEC	A1 V	72	520	6	1/09/86 12:03:03	AAA
GTCADSYM DATA	A1 F	80	9	1	1/09/86 12:05:56	AAA
GTCADSYM EXEC	A1 V	72	90	1	1/09/86 12:10:10	AAA
TRACE DRAWINGS	A1 V	796	60	11	11/16/90 13:32:54	AAA
CADTRACE EXEC	A1 V	72	161	2	9/17/90 16:10:29	AAA
TRACEIM LOADLIB	A1 V	6000	30	33	11/16/90 14:33:02	AAA
TRACELM LOADLIB	A1 V	6150	58	7	11/16/90 14:32:58	AAA
TRACE MACLIB	A4 F	80	131	3	9/12/90 13:50:37	AAA
TRACE SPTPARMS	A1 F	80	2	1	9/12/90 13:37:27	AAA
SAMPLE TRACELIB	A1 F	80	2580	51	11/16/90 9:36:54	AAA
STDLD DRAWINGS	A1 V	796	3214	583	12/13/90 12:59:11	AAA
TCAD4 NETLOG	A0 V	102	1	1	12/13/90 13:17:13	AAA

Ready; T=0.01/0.01 13:17:36
erase tcad4 netlog
Ready; T=0.01/0.01 13:19:18
13:19:46

WNG FROM OPERATOR: TAPE IS MOUNTED...

tape rew
Ready; T=0.01/0.01 13:20:11
vmfplc2 dump * * a
DUMPING.....
CHKCHAR EXEC A1
FTAPEBLD EXEC A1
FONTBULD EXEC A1
FONTINST EXEC A1
FONTMAIN EXEC A1
GTCADSYM DATA A1
GTCADSYM EXEC A1
TRACE DRAWINGS A1
CADTRACE EXEC A1
TRACEIM LOADLIB A1
TRACELM LOADLIB A1
TRACE MACLIB A4
TRACE SPTPARMS A1
SAMPLE TRACELIB A1
STDLD DRAWINGS A1
Ready; T=0.13/0.60 13:21:10

Installation Instructions CADAM Tape

Step 1

Logon to the "CODE" machine and attach a tape drive as 181.

Step 2

Offload the tape.

Type:

```
TAPE REW
VMFPLC2 LOAD * * A
```

Step 3

Identify the group you wish to use to hold the drawings.

Identify the user you wish to use to hold the drawings.

Step 4

Add the drawings to the drawfile by typing:

```
NURESTOR GR xxxx DW DISK STDL DRAWINGS A
(where xxxx is the name of the group)
```

In response to the VM READ, type:

```
VTL STDL
```

```
RESTORE Uyyyyyy ALL (where yyyyyy is the user to restore to)
```

After all the drawings have been unloaded type:

```
END
```

Step 5

Follow the instructions for building the font libraries.

Follow the instructions from the trace installation manual.

CADAM® Trace and Replay Facility Installation Guide for VM

Document Number VM1060-030100-IG

November 1990

REL. 21
AND
Version 3
Release 1.0

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Preface

What This Guide Contains

This guide contains instructions for installing the CADAM® Trace and Replay facility in a VM operating system environment.

Who Should Use This Guide

This guide is intended for use by CADAM system installers and programmers responsible for installing, customizing, and maintaining the CADAM system. This guide assumes that installers have a working knowledge of the VM operating system and VM commands and have access to VM system manuals.

Where To Look For More Help

- *CADAM Interactive Design System: Interactive Design Installation Guide for VM*
- *CADAM Interactive Design System: Interactive Design User's Reference*
- *CADAM Trace and Replay Facility User's Guide*

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Figure 1. SUPPORT Function Key 2

Chapter 1. Before You Begin

What You Should Know About Trace and Replay

The Trace and Replay facility is a tool that records and replays a sequence of events called a *scenario*. During an interactive session, scope attentions are captured, recorded, and stored in an external file. The recorded scenario can then be called from storage and replayed on the scope.

Trace and Replay has a variety of uses. With it you can:

- detect and recreate problems.
- validate the consistency of CADAM in different environments.
- track and inspect CADAM's performance under various conditions.
- perform regression testing.
- prepare visual presentations of CADAM functions and capabilities for marketing and training uses.

Note: Stored Trace and Replay scenarios are not compatible across releases.

The SUPPORT Function Key

One function key, SUPPORT, is provided with Trace and Replay. See Figure 1 on page 2.

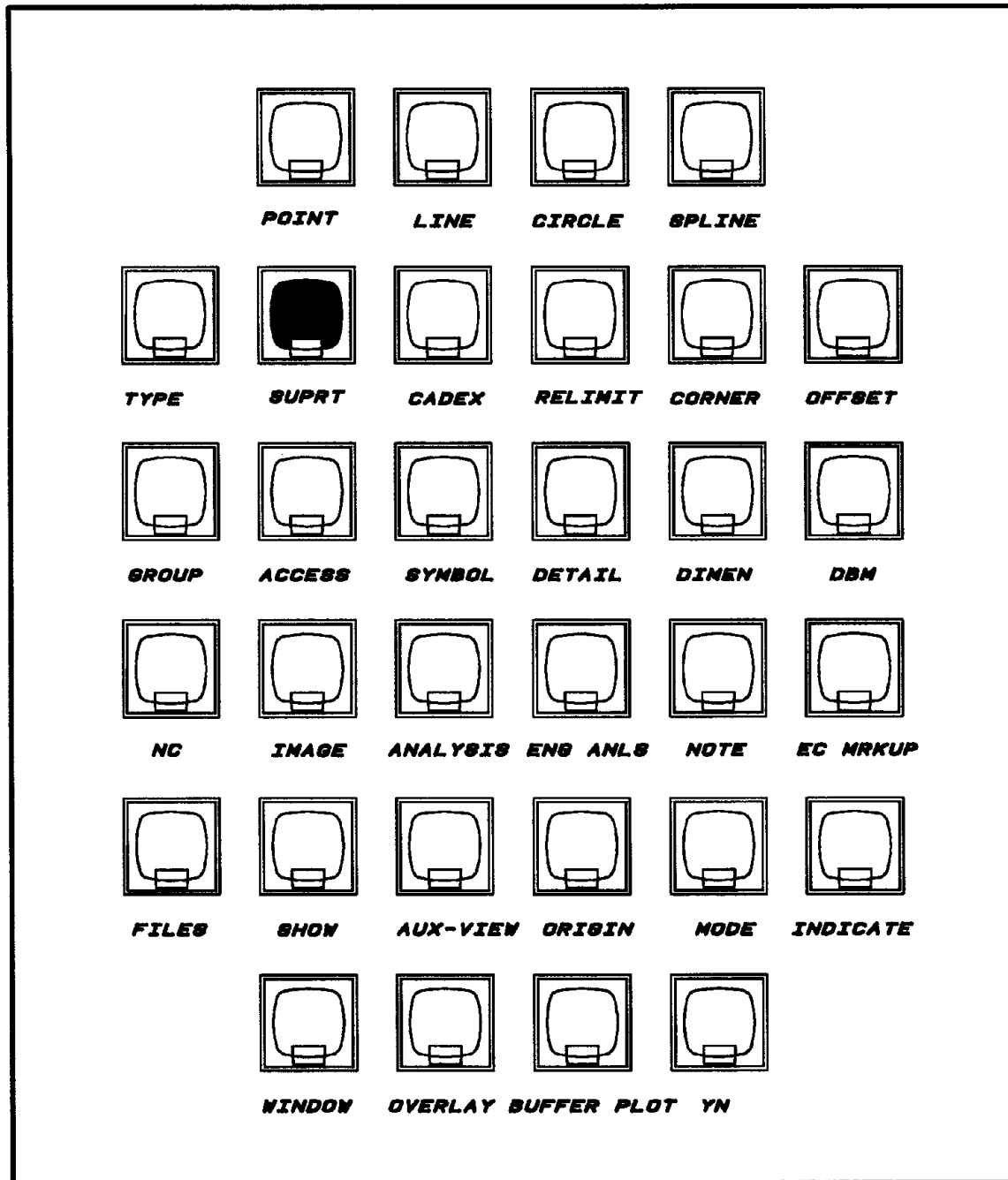


Figure 1. SUPPORT Function Key

Prerequisites to Installing Trace and Replay

To install Trace and Replay, ensure that you have installed the CADAM Interactive Design System.

Contents of the Trace and Replay Facility Tape

Following are the EXECs, load and image modules, source routines, data, and sample drawings that make up the Trace and Replay Facility:

EXECs

CADTRACE EXEC

Load Modules in TRACELM LOADLIB

FKS2	FKS3	FKSM	FKSP
FKS2U	FKS3U	FKSMU	FKSPU

Image Modules in TRACEIM LOADLIB

SPRT
SPRTU

TRACE MACLIB

SAMPLE TRACELIB

TRACE SPTPARMS

Drawings in CAD DRAWINGS

RATCHET WHEELMSTR
RATCHET WHEELRPLY
2D RTCH WHEELMSTR
2D RTCH WHEELRPLY

Chapter 2. Installation Steps

WARNING

CADAM products are not backward compatible. This release may not be compatible with previous CADAM releases. If CADAM models created or processed in this release are then processed in a previous release, bad models may be generated.

If your site migrates from this release of any CADAM product to a previous release, back up your CADAM system drawing files using the NURESTOR program supplied with the CADAM Interactive Design System. Refer to the *CADAM Data Management Program Reference Guide for VM* for complete information about the NURESTOR program.

This chapter contains steps for installing Trace and Replay.

Summary of Steps

Steps for installing Trace and Replay are summarized below.

Step 1: Load the VM1060 Tape to Disk	6
Step 2: Copy the Sample Drawings	7
Step 3: Set Up TRACE CPCPARMS	8
Step 4: Verify the Installation	9
Step 5: Create a Scope Environment for Trace and Replay	10

The following sections provide detailed instructions for each of these steps. Carefully review the results of each step before moving on to the next.

Step 1: Load the VM1060 Tape to Disk

This step loads the contents of the VM1060 tape to disk.

1. Log on to your CODE machine.
2. Attach a tape drive to your CODE machine and mount the VM1060 tape.
3. Access the CODE disk as filemode A.
4. Enter the following commands to load the tape contents.

```
TAPE REW
VMFPLC2 LOAD * * A
```

The following files are loaded:

```
TRACE    DRAWINGS
CADTRACE EXEC
TRACELM  LOADLIB
TRACEIM  LOADLIB
TRACE    MACLIB
TRACE    SPTPARMS
SAMPLE   TRACELIB
```

5. Enter the following command to rewind the tape:

```
TAPE REW
```

6. Detach the tape drive. For example, if the tape address is 181, enter the following command:

```
DET 181
```

Step 2: Copy the Sample Drawings

This step copies the sample drawings to drawing group CAD, subgroup INSTAL.

Note: Be sure that DMMON is running on the data manager virtual machine that contains drawing group CAD.

1. Enter the following command:

```
SAMPDWGS DRAWINGS TRACE
```

2. Enter YES to copy the drawings to CAD,INSTAL.

The following drawings are loaded:

```
RATCHET WHEELMSTR  
RATCHET WHEELRPLY  
2D RTCH WHEELMSTR  
2D RTCH WHEELRPLY
```

3. Press **ENTER** to exit the EXEC.

Step 3: Set Up TRACE CPCPARMS

This step sets up a CPCPARMS file to allow access to the SUPPORT function key.

Eight function key table modules, each containing the SUPPORT function key, are contained in TRACELM LOADLIB. These tables, which are equivalent to those delivered with CADAM products, are listed in "Trace and Replay Function Key Tables" on page 12. To enable Trace and Replay, you must create a new CPCPARMS file and substitute the appropriate function key table in it.

1. Copy your interactive CPCPARMS file into TRACE CPCPARMS.
For example:

```
COPYFILE CONFIG01 CPCPARMS A TRACE CPCPARMS A
```

2. Xedit TRACE.CPCPARMS.
3. Locate the FKEYTABLE parameter.
4. Change FKT in the name to FKS.
For example:

```
FKEYTABLE=FKS2
```

5. Save the file.

Step 4: Verify the Installation

This step verifies that you performed the installation procedures correctly and that Trace and Replay is ready for implementation.

Start an Interactive Scope Session

1. Log on to your SCOPEX machine and attach a CADAM scope.
2. Start the scope by invoking the CADTRACE EXEC as follows:

CADTRACE SAMPLE

3. Enter NO to use the sample Trace library.

Start a Model and Initiate the Sample Trace and Replay Scenario

1. Press function key FILES.
2. Select menu option /START/.
3. Press **ENTER** to enter a blank drawing name.
4. Press function key SUPPORT (SUPRT), located directly below function key POINT (see Figure 1 on page 2).
5. Select menu option /TRACE/ and press YN.
6. Select menu option /REPLAY/ and press YN.
7. Press YN to access the scenario selection panel.
8. Select the scenario which is appropriate for your installed CADAM features:

2D__SAMPLE__TRACE (For sites with only 2D installed)

3D__SAMPLE__TRACE (For sites with 3D installed)

Depending on your selection, the scenario will now execute and file either 2D RTCH WHEEL,RPLY (2D only), or RATCHET WHEEL,RPLY (3D) in group CAD, subgroup INSTAL.

This concludes the installation of Trace and Replay.

9. Log off the scope and continue with the next step.

Step 5: Create a Scope Environment for Trace and Replay

This step discusses the scope environment as it relates to Trace and Replay and recording scenarios. How you configure your system to run Trace and Replay is up to you.

After you have installed and validated Trace and Replay, consider how you want scope users to create and store scenarios. To record a scenario, a scope user must have read/write (R/W) access to the disk containing the scenario library which limits recording to one scope user at a time. Also, Trace scenarios can consist of a large number of records, so the disk containing the scenarios must have adequate space.

Depending on the operating conditions at your site (available disk space, security considerations, etc.), you may wish to configure Trace and Replay on your system to either expand or limit recording privileges.

For example:

- You may wish to set up Trace and Replay on a single SCOPE machine with increased disk space and limit recording to that SCOPE machine. This also keeps all scenarios in one place.
- You may wish to install Trace and Replay on several machines. Accordingly, each machine must have increased disk space to accommodate the scenarios.

Once you have set up a satisfactory scope environment, you may create a TRACELIB for recording as follows:

1. Log on to a SCOPE machine set up to run Trace and Replay.
2. Start the scope by invoking the CADTRACE EXEC with the name of a new scenario library.

For example:

```
CADTRACE MYLIB
```

3. Answer the remaining prompts accordingly.
4. Follow the instructions in the *Trace and Replay Facility User's Guide* to start a recording session.

Chapter 3. Program Descriptions

This chapter describes the load and image modules supplied with the Trace and Replay Facility.

Image Modules

SPRT	The image module (overlaid) which supports the SUPPORT function key.
SPRTU	The image module (unoverlaid) which supports the SUPPORT function key.

Load Modules

FKS2	The 2D function key table (overlaid).
FKS2U	The 2D function key table (unoverlaid).
FKS3	The 3D function key table (overlaid).
FKS3U	The 3D function key table (unoverlaid).
FKSM	The 3D Mesh Geometry function key table (overlaid).
FKSMU	The 3D Mesh Geometry function key table (unoverlaid).
FKSP	The AEC Design Base function key table (overlaid).
FKSPU	The AEC Design Base function key table (unoverlaid).

Trace and Replay Function Key Tables

Eight function key table modules, each containing the SUPPORT function key, are contained in CADDISK.TRACE.LM. The TRACE function key tables matched with their CADAM equivalents are listed below.

CADAM Table	TRACE Table
--------------------	--------------------

FKT2	FKS2
FKT2U	FKS2U
FKT3	FKS3
FKT3U	FKS3U
FKTM	FKSM
FKTMU	FKSMU
FKTP	FKSP
FKTPU	FKSPU

Glossary

attention: An interactive event captured by Trace and Replay during the recording process for later replay. A sequence of attentions comprises a scenario.

auto mode: The system-controlled, automatic, non-stop replay of a scenario.

auto/step switch: The ability to change from auto to step mode in the middle of a replay by pressing YN to instantly freeze the display. Also known as: *on fly control*

Control: A replay option allowing the user to choose between the auto and step modes.

delay factor: The seconds of wait between consecutive attentions during replay.

hard pause: The suspension of a replay caused by a pause inserted during the recording.

Initial State: A user option that ensures that certain CADAM conditions are identical for scenario recording and replay.

Menu/Messages: An option that facilitates the capture of all menu options and messages displayed during the recording of a scenario and their validation and update during replay.

on fly control: See **auto/step switch**.

Parameters: A replay option allowing the user to specify the step size and the delay factor.

pause: See **hard pause** and **soft pause**.

pause label: An alphanumeric, 70-character, unique label used to identify a hard pause.

Performance: A replay option enabling the user to monitor CADAM's response.

If this option is enabled, performance data is placed in file for later access.

recording: The capturing and storing of the attentions processed during an interactive CADAM session.

recording options: The parameters controlling the recording environment.

replaying: A process of simulating the series of attentions captured in a scenario so they can be viewed and analyzed.

scenario: A sequence of CADAM interactive events captured during a recording session for later analysis during replay.

scenario name: An alphanumeric, 70-character, unique label used to identify a scenario.

scenario file: A file that stores all of the scenarios at a particular site.

step: A scenario subset consisting of a user-specified number of attentions.

step mode: The user-controlled mode of scenario replay that stops after each step is replayed.

step size: The number of attentions in each step of the scenario. The user defines this quantity while setting the recording options.

stop: The termination of a recording. A stop is generated by the user to inform Trace and Replay that a scenario is finished.

stop label: An alphanumeric, 70-character, unique label used by Trace and Replay to identify the end of a scenario.

SUPPORT: The function key under which the Trace and Replay Facility runs.

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CADAM® Trace and Replay Facility User's Guide

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About This Guide

Purpose of This Guide

The *CADAM® Trace and Replay Facility User's Guide* describes Trace and Replay and explains how to use this tool to record and replay a sequence of interactive CADAM events.

Who Should Use This Guide

This guide is designed for CADAM users. It assumes you are familiar with CADAM applications and have at least a moderate level of experience using the basic procedures and terminology associated with CADAM products.

How This Guide is Organized

This guide describes the actions of Trace and Replay in chronological order as follows:

- **Chapter 1** provides a general description of the functions and capabilities of the facility.
- **Chapter 2** explains how to record a sequence of events and provides step-by-step instructions for setting up a recording session, inserting pauses, and finishing the recording.
- **Chapter 3** describes techniques for modifying a recorded scenario.
- **Chapter 4** describes how to replay a recording session and provides instructions for starting a replay, modifying a replay in progress, and switching between replay modes.
- The **glossary** defines terms used in Trace and Replay functions.
- The **index** provides page references for the topics discussed in this guide.

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Chapter 1. Introduction

Trace and Replay is a CADAM tool that records and then replays a sequence of events called a "scenario." CADAM users create and modify geometry using the normal scope attentions which are captured and built into a scenario in a process called "recording." The facility then "replays" the recorded scenario which it accesses from an external scenario file.

Applications

Trace and Replay has a variety of uses. With it you can:

- detect and recreate problems.
- validate the consistency of CADAM in different environments.
- track and inspect CADAM's performance under various conditions.
- perform regression testing.
- prepare visual presentations of CADAM functions and capabilities for marketing and training uses.

Be aware, however, that Trace and Replay is not intended for use as a parametric design tool.

Scenario Compatibility

Trace and Replay scenarios are not compatible across different releases. This results from the extensive changes made to CADAM functions between releases.

Ending a Recording Session

Overview

Once you begin a recording session, it will run until you interrupt it or end it. To interrupt a recording, see page 7.

When your recording is finished, you need to tell Trace and Replay to stop recording. At the end, you insert a stop that turns off the recording mechanism and returns you to the main menu. Later, during replay, this stop will terminate the replay and return you to the main menu.

Stop Labels

After you stop the recording, you key in a stop label. Any string of up to 70 characters, including blanks, is accepted without validation. Many users choose something like "Drawing is Complete."

Procedure

To end your recording, you suspend the recording and key in a stop label. Follow the procedure below.

Before you begin: Be sure you are recording a scenario. If not, see page 4 to start a recording.

1. Press function key **SUPPORT**.

The recording stops, and menu options /STOP/, /PAUSE/, and /CONTINUE/ are displayed.

2. Select /STOP/.

The message KEY STOP LABEL is displayed.

3. Key in a stop label.

The main menu and the message RECORDING COMPLETED are displayed. The procedure is complete.

Chapter 2. Recording a Scenario

This chapter explains what you need to know to record scenarios, including information on recording options and step-by-step instructions for performing the recording procedures. For explanations of system errors that can occur during a recording, see the *CADAM Trace and Replay Facility Installation Guide* for your operating system (VM or MVS).

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Starting a Recording Session

Overview

To use Trace and Replay, you first capture the attentions executed during a scope session. This capture (recording) preserves all events in the order they occurred, allowing them to be reconstructed (replayed) at a later time. Avoid long scenarios; you should limit each scenario to no more than 500 – 750 attentions.

Before you record a scenario, you need to establish the recording environment. This involves selecting options related to two recording conditions. These options are described below. Step-by-step instructions for starting a recording begin on page 5.

Recording Options

After you access Trace and Replay, the system asks you to set options for two conditions. Your screen will appear as shown below.

INITIAL STATE

- * reset
- ignore

MENU/MESSAGES

- capture
- * ignore

INITIAL STATE: This option enables you to set the conditions under which CADAM will operate during the recording. Selecting *reset* (the default) reinitializes CADAM as though you were logging on, except that accounting and group information is retained.

You must select *reset* if you are recording a new scenario. Since Trace and Replay uses the same reinitialization prior to replaying a scenario, selecting *reset* results in identical initial states for recording and replay. This enhances the reliability of your scenarios.

If you select *ignore*, CADAM is not changed, and the recording will start from the current state. Use *ignore* only to record a scenario that is a continuation of a previously-recorded scenario. For more information, see "Adding to a Recorded Scenario" on page 12.

MENU/MESSAGES: With this option, you can capture all of the menu and message items produced by the attentions in your recording. If you select *capture*, you can later use the replay function to automatically compare the menu options and messages currently displayed with those on your recording. This traps any discrepancies.

Though helpful, this option increases the size of your scenario by 200 percent and should be used sparingly. *Ignore* is the default.

Scenario Names

After you finish selecting your recording options, the system will ask you to key in a name for your scenario. This allows you and the system to find the scenario in the external file. Any name up to 70 characters in length, including blanks, is accepted without validation. Choosing a descriptive name will help you identify your scenario.

Procedure

To begin recording, you need to set the recording environment, choose from available recording options, and select a name for the scenario. Follow the procedure below.

Before you begin: Be sure function key SUPPORT is enabled. If not, see your system administrator.

1. Press function key SUPPORT.

Menu option /TRACE/ is displayed.

2. Select /TRACE/.

The screen is cleared, and the messages FILE CURRENT DRAWING AS NEEDED PRIOR TO USING SELECTED OPTION and YN CONTINUE are displayed.

CAUTION: If you do not perform Steps 3 and 4, you will lose the drawing you are currently creating.

3. Press YN.

4. Press function key FILE and file your drawing.

5. Press function key SUPPORT.

The main menu is displayed. Its options include /REPLAY RE-
CORD/, and /RETURN/. Select /RETURN/ at any point to abort this
procedure and reaccess the /TRACE/ menu option.

6. Select /RECORD/.

The two recording options, Initial State and Menu/Messages, are
displayed with asterisks to the left of the defaults.

The messages SEL RECORDING OPTION and YN CONTINUE also
are displayed.

7. Select the desired recording options.

These options are explained on pages 4 and 5.

8. Press YN.

The message KEY SCENARIO NAME is displayed.

9. Key in a scenario name.

The message PRESS FUNCTION KEY TO START RECORDING is
displayed.

10. Press any function key to start recording.

The recording process begins. The procedure is complete.

NOTE: *The following is very important to remember:* When per-
forming attentions during the recording session, always key data in
rather than selecting it if you have a choice.

You can file the drawing in your scenario prior to ending the record-
ing session. Be sure to press Y/N twice to overfile. The procedure
is complete.

Inserting a Pause

Overview

Once you begin a recording session, it will run until you interrupt it or end it. To end a recording, see page 9.

Sometimes, you may want to interrupt a recording to insert a pause. During subsequent replay, this pause temporarily suspends the scenario, allowing you to do any of the following:

- stop the replay.
- start the replay over again from the beginning.
- skip to another place in the scenario and continue the replay from that point.
- change your replay options.

You cause the scenario to suspend replay at a specified point by interrupting the recording and inserting a hard pause at that point. Remember that you insert the pause during the *recording* in order to affect the *replay*.

Pause Labels

When you insert the pause, you key in a pause label. Any string of up to 70 characters, including blanks, is accepted without validation. Choosing a descriptive label will help you remember why you wanted to pause at that point in the replay.

Procedure

To insert a pause, you suspend the recording, key in a pause label, and then continue recording. Follow the procedure below.

Before you begin: Be sure you have started recording your scenario. If not, see "Starting a Recording Session" on page 4.

1. Press function key **SUPPORT**.

The recording stops, and menu options /STOP/, /PAUSE/, and /CONTINUE/ are displayed.

- 2. Optional. To continue the recording without inserting a pause, select /CONTINUE/.**

If you decide not to insert the pause, you can select /CONTINUE/ any time during this procedure.

- 3. Select /PAUSE/.**

The message KEY PAUSE LABEL is displayed.

- 4. Key in a pause label.**

The message PRESS FUNCTION KEY TO CONTINUE RECORDING is displayed.

- 5. Press any function key to continue recording.**

The recording resumes.

- 6. Optional. Repeat steps 1, 3 and 4 to insert another pause.**

You may insert any number of pauses into a scenario. The procedure is complete.

Chapter 3. Modifying a Scenario

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Adding to a Recorded Scenario

Even after you insert a stop to end a recording, you can still add on to it by recording a new scenario as a continuation of the old one. You can add only to the end of a scenario; you cannot insert events into the middle of a recorded scenario.

To add to a scenario, you do the following:

- First, you replay it with the Initial State option set to *reset* (the default). See Chapter 4 “Replaying a Recording” for replay instructions.
- Then, you record your continuation with the Initial State option set to *ignore*. See “Starting a Recording Session” on page 4.

When you finish, you will have a newly-recorded scenario that is logically contiguous to the one you just replayed. Then, you can use any file editing facility to physically combine the two scenarios into one. While combining the scenarios, you should avoid modifying the scenario’s contents.

Editing a Scenario

The Trace and Replay scenarios reside in a file which you can access and update using any available edit facility. However, since the scenario data is directly used to “drive” CADAM, you must exercise extreme caution during the editing session. Do not attempt to edit a scenario until you are very familiar with Trace and Replay and with scenario data. Often, changes which seem insignificant can corrupt data or jeopardize the logical continuity of your scenario, damaging it beyond recovery and wasting your recording time.

Normally, the need for editing arises only when you want to merge logically contiguous scenarios into one. (See “Adding to a Recorded Scenario” on page 12.) Whatever your purpose, you should follow the few important editing rules below.

- Always begin by making a working copy of the scenario file you want to edit. *Never edit the original scenario file.* After a successful replay of the edited copy, you can delete the original.
- When modifying an attention (a very dangerous procedure), be sure the new data conforms to the layout for the record type.
- Be careful not to misplace or delete record control characters. Never insert information into the record; instead, key over existing data.
- When you delete a portion of a scenario or add new data, be sure not to jeopardize the logical continuity of your scenario. Try to “replay” the scenario in your mind to confirm its validity.
- If you key in new data to replace a string of characters, be sure to adjust the length of the field; otherwise, some characters may be cut off when the system extracts this data for replay.

For more information on scenario file layout, see the *CADAM Trace and Replay Facility Installation Guide* for your operating system (VM or MVS).

Chapter 4. Replaying a Scenario

This chapter explains what you need to know to replay scenarios, including information on replay options and step-by-step procedures.

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Starting a Replay

Overview

After you record a scenario, you can replay it at any time. First, you need to set the replay environment. This involves selecting options for six replay conditions, most of which remain in effect during the entire replay. These options are described below. Step-by-step instructions for starting a replay begin on page 18.

Replay Options

After you access Trace and Replay, the system asks you to set options for six conditions. Your screen will appear as shown below.

CONTROL

- * auto
- step

PARAMETERS

delay (sec/atn) = 0.25
step size = 1

PAUSES

- * use
- ignore

PERFORMANCE

- update
- * ignore

INITIAL STATE

- * reset
- ignore

MENU/MESSAGES

- update
- validate
- * ignore

CONTROL:

Auto (the default) causes the replay to continue without stopping until it reaches a pause or the end of the scenario.

If you select *step*, the replay is performed in steps, each containing an equal number of attentions. After each step, the replay stops, and the system waits for a command to play the next step. This pattern continues until the replay reaches a pause or the end of the scenario. For more information, see "Using the Step Mode" on page 26.

PARAMETERS:

The *delay factor* affects the speed of the replay. The default is .25 seconds between attentions, but you can enter any value. The load on the system during the replay also affects the delay. Entering a larger value for the delay factor will more closely approximate the real delay.

The *step size* specifies the number of attentions in each step. The default is one, but you can enter any number.

PAUSES:

Use (the default) causes the replay to stop at all pauses inserted during the recording of the scenario. If you select *ignore*, the replay will not stop at any of the pauses.

PERFORMANCE:

Selecting *update* allows you to monitor CADAM's performance during the replay. Two characteristics are tracked: attention time and the roll time. You can then use the external scenario file to extract this data. If you select *ignore* (the default), replay performance is not monitored.

INITIAL STATE:

Always select *reset* (the default) to ensure that the state of CADAM is the same at the start of the replay as it was during the recording. For an explanation of this condition, see INITIAL STATE under Recording Options on page 4.

MENU/MESSAGES:

You can select *validate* to verify the content of menus and messages captured during the recording. They are matched with the current menus and messages, and the differences are placed in the "Trace Menu and Messages Status File," identified as TRMMSTAT.

Update allows you to add and change menus and messages. The most current menus and messages are inserted after each attention during replay. Then, you can delete the old scenario from the file

Ignore (the default) disables the validation and update options.

Procedure

To replay a scenario, you first need to establish the replay environment. Follow the procedure below.

Before you begin: Be sure function key SUPPORT is enabled. If not, see your system administrator.

1. Press function key **SUPPORT**.

The menu option **/TRACE/** is displayed.

2. Select **/TRACE/**.

The screen is cleared, and the messages **FILE CURRENT DRAWING AS NEEDED PRIOR TO USING SELECTED OPTION** and **YN CONTINUE** are displayed.

CAUTION: If you do not perform Steps 3 and 4, you will lose the drawing you are currently creating.

3. Press **YN**.

4. Press function key **FILE** and file your drawing.

5. Press function key **SUPPORT**.

The main menu is displayed. Its options include **/REPLAY/**, **/RECORD/**, and **/RETURN/**. Select **/RETURN/** at any point to abort this procedure and reaccess menu option **/TRACE/**.

6. Select **/REPLAY/**.

The six replay options, **Control**, **Parameters**, **Pauses**, **Performance**, **Initial State** and **Menu/Messages**, are displayed with asterisks to the left of the defaults.

The messages **SEL REPLAYING OPTION** and **YN CONTINUE** also

are displayed.

7. Select the desired replay options.

These options are explained on pages 16 and 17.

NOTE: If you receive the error message DATA SET NOT FOUND after attempting to select *validate* and *update* in the Menu/Messages option, it means that the files collecting the menus and messages have not been correctly named or are missing. See the *CADAM Trace and Replay Facility Installation Guide* for your operating system (VM or MVS) for more information.

8. Press YN.

The messages KEY SCENARIO NAME and YN LIST are displayed.

9. Do one of the following:

- If you know the exact name of the scenario you want to replay, key in this name.

The replay begins when you enter the name. If the name is not valid, the error message SCENARIO NOT FOUND is displayed.

- If you do not know the name of your scenario, do the following:

1. Press YN.

The system displays a list of all scenarios currently available for replay.

The messages KEY PAGE and SEL SCENARIO also are displayed.

The menu options /START/, /SCHEDULE/, /FWD/, /BACK/, and /WILDCARDS/ also are displayed.

- ### **2. Optional. To review the list and find your scenario, do one of the following:**

- a. Select /FWD/ and /BACK/.

The list display changes a page at a time.

- b. Key in a page number.

The requested page is displayed.

- c. Do the following:

- Select /WILDCARDS/.

The message KEY WILDCARDS is displayed.

- Key in a wildcard pattern.

All names that follow the requested wildcard pattern are displayed.

If the pattern is not valid, the error message INVALID WILDCARD is displayed. For an explanation of wildcards, see page 22.

3. Select /START/ when the desired scenario is displayed.

4. Select the desired scenario.

The selected scenario is highlighted, and the message YN START is displayed.

5. Press YN.

The replay begins. To modify the replay while it is running, see page 23.

If the replay stops in the middle and you see the message **WARNING – MENU ITEM NOT FOUND = (menu item), see “Resolving an Unmatched Menu Item” on page 28 for instructions.

If the replay aborts because of other problems, see your system administrator or the *CADAM Trace and Replay Facil-*

ity Installation Guide for your operating system (VM or MVS).

When the replay is finished, the system redisplay the main menu. The procedure is complete.

Wildcards

With the /WILDCARDS/ menu option, you can limit the display of scenario names to those that follow a specific pattern. After you select the menu option, you key in a string of characters containing an asterisk (*). Trace and Replay recognizes the patterns listed below.

PATTERN	DESCRIPTION	EXPLANATION
*(string)	Asterisk followed by character string	Restricts the list of names to those ending with the string

Examples: If the pattern is *210, possible names include 'TEST REL210', '210', 'DEMO 5.210', etc.

PATTERN	DESCRIPTION	EXPLANATION
(string)*	Asterisk preceded by character string	Restricts the list of names to those starting with the string

Examples: If the pattern is 210*, possible names include '210 DETAILS', '210', '2101', '2102', etc.

PATTERN	DESCRIPTION	EXPLANATION
(string)	Asterisk preceding and following a character string	Restricts the list of names to those containing the string anywhere within them

Examples: If the pattern is *210*, possible names include 'R210 TEST', 'DEMO-2101', '210', '2101', '2102', '3210', etc.

Entering only an asterisk produces an unrestricted list of all names.

Modifying a Replay

Overview

Once you start a replay, it continues to the end of the scenario, unless you inserted pauses during the recording process. If the system encounters a pause, it stops the replay and returns control to you.

While the replay is suspended, you can make changes to it. These modifications include:

- restarting the replay from the beginning
- skipping ahead to another pause
- changing the replay options
- quitting the replay
- continuing the replay

You can also perform window operations using function key WINDOW. All function keys other than SUPPORT and WINDOW are disabled.

NOTE: You can also freeze the replay while it is playing by pressing YN. This operation is unrelated to the suspended replay described in this section and cannot be used to make the modifications in the above list. For more information, See "Using the Step Mode" on page 26.

Procedure

When the replay stops at a pause, the message REPLAYING SUSPENDED, LABEL = (pause label) is displayed.

The suspended replay menu options /CONTINUE/, /RESTART/, /SKIP/, /QUIT/, /PROFILE/, and FK WINDOW also are displayed.

Do any of the following:

- **Select /RESTART/.**

The replay starts over again from the beginning.

- **Select /CONTINUE/.**

The replay resumes from the current pause.

- **Change the replay options by doing the following:**

1. Select /PROFILE/.

The replay options screen is displayed, and the messages SEL REPLAYING OPTION and YN CONTINUE also are displayed.

2. Select or key in changes to any of the options.
3. After you finish changing the replay options, press YN to continue the replay.

- **Select /QUIT/.**

The replay terminates. The message REPLAYING COMPLETED is displayed.

The main menu options /REPLAY/, /RECORD/, and /RETURN/ are displayed.

- **Skip to another pause by doing the following:**

1. Select /SKIP/.

The messages KEY PAUSE LABEL and YN NEXT are displayed.

2. Do one of the following:

- a. Key in the label of the pause to which you want skip.

You can skip to any pause in the scenario. If identical pauses exist for the label you keyed in, the system will move to the pause nearest the beginning of the scenario. If the label is not valid, the error message NOT FOUND is displayed.

The message REPLAYING SUSPENDED, LABEL = (pause label) changes to display the label of the pause to which the sys-

tem has skipped.

- b. Press YN to skip to the next pause.

The message REPLAYING SUSPENDED, LABEL = (pause label) changes to display the label of the next pause.

You can press YN repeatedly to move to successive pauses in the scenario.

3. At the desired pause, select another menu option from the suspended replay menu.

NOTE: Often, a scenario will not replay well with the /SKIP/ option, because each of the scenario's sections is logically dependent on those preceding it. Only those scenarios you record with the intent to use the /SKIP/ option will benefit from it. This type of scenario contains sets of logically independent subscenarios between pauses.

- **Perform window operations by doing the following:**

1. Press function key WINDOW.
2. Perform window operations as desired.
3. After you have finished the window operations, press any function key to restore the original window parameters.

The suspended replay menu is redisplayed.

4. Select another option from the suspended replay menu.
The procedure is complete.

Using the Step Mode

Overview

Most replays run in the auto mode which you select when you choose your replay options. In auto mode, once a replay begins, it continues until it reaches either a previously inserted pause or the end of the scenario.

Step mode, in contrast, allows you to move through the display by steps. Each step contains an equal number of attentions (the step size). After each step, the replay stops, and the system waits for a command to play the next step. At this stop, you can change the step size (the number of attentions in each step), disable the replay, and switch to auto mode.

Step mode can be accessed in two ways. Before starting your replay, you can select step mode and key in the step size on the replay options screen as described in "Starting a Replay" on page 16. You also can switch to step mode during a replay by pressing YN. This feature, the auto/step switch, gives you what is known as *on fly control*. With it, you can freeze the display, creating a soft pause at any point in the scenario for as long as desired. You then can view and analyze the scenario's events at a convenient rate.

Procedure

Use the step mode to gain more control over the pace of the replay. Follow the procedure below.

Before you begin: Either the replay options screen must be displayed, or a replay must already be underway. See "Starting a Replay" on page 16.

NOTE: You need to perform step 1 if you are currently running a replay in auto mode.

- 1. Optional. Press YN to access the step mode.**

The system changes to step mode, and the display freezes at the exact point in the replay where you pressed YN.

NOTE: Since the screen freezes instantly, no messages are displayed to prompt you to perform the actions described in step 2 below. You need to remember them or use this book.

2. Do one of the following at the end of each step:

- Key in an integer between 1 and 9999.

The step size changes to the number you entered, and the system proceeds to replay the next step.

- Key in the word STOP.

The replay is disabled (terminated). The current module remains active, and control is returned to you without affecting CADAM. (When a replay ends normally, the system abandons the last active module and reactivates the SUPPORT module.)

- Press YN to replay the next step.
- Key in the word AUTO.

The system exits step mode and continues the replay in auto mode. The procedure is complete.

Resolving an Unmatched Menu Item

Overview

Under normal conditions, a replay continues to the end of the scenario unless you inserted pauses during the recording process. Certain error conditions also will cause the replay to stop in the middle. If an error message is displayed, you should consult either the *CADAM Trace and Replay Facility Installation Guide* for your operating system (MVS or VM) or your system administrator.

However, you can resolve one particular error interactively. When you are recording a scenario and you select a menu option, its content is recorded as part of that attention's data. During replay, the system verifies the current existence of each recorded menu option. If an exact match is found, the replay continues normally. However, if the system fails to find a menu option in the current CADAM release, the replay is aborted, and an error message is displayed. To resolve this problem, follow the procedure below.

Procedure

If your replay aborts due to an unmatched menu option, the message ****WARNING - MENU ITEM NOT FOUND = /menu item/** is displayed, where /menu item/ = the unfound menu option.

The messages **SELECT CORRECT MENU ITEM** and **YN QUIT** also are displayed.

1. Do one of the following:

- Press YN to quit the replay.

The replay is terminated, the scenario remains unchanged, and the messages **SCENARIO FILE NOT UPDATED** and **REPLAY COMPLETED** are displayed.

The main menu is displayed. The procedure is complete.

- Select a suitable option from the current menu as a substitute.

CAUTION: Be very sure that the menu option you select as a substitute functions in the exact same manner as the un-

matched (old) item. The most common cause of an unmatched menu option is a change in the spelling of that item. However, if the entire function of the unmatched menu item has been eliminated, no substitution is possible, and your scenario cannot be replayed.

The message CHANGING FROM = /menu item/ TO = /new menu item/ is displayed.

The messages RE--SELECT MENU ITEM and YN UPDATE also are displayed.

2. Optional. Select another menu item.

This menu option is displayed in the message line as the option to be substituted for the unmatched menu item.

3. Press YN.

The system replaces the unfound menu item with the selected menu option. This replacement affects *every occurrence* of the unmatched option in *all the scenarios*. The message SCENARIO FILE UPDATED is displayed.

The menu options /RESTART/ and /QUIT/ are displayed.

4. Do one of the following to complete the procedure:

- Select /RESTART/.

The replay restarts from the beginning of the scenario.

- Select /QUIT/.

The replay is terminated, and the message REPLAY COMPLETED is displayed. The main menu also is displayed.

Glossary

attention: An interactive event at a CADAM scope captured by Trace and Replay during the recording process for later replay. A sequence of attentions comprises a scenario.

auto mode: The system-controlled, automatic, non-stop replay of a scenario.

auto/step switch: The ability to change from auto to step mode in the middle of a replay by pressing YN to instantly freeze the display. Also known as: *on fly control*.

Control: A replay option allowing the user to choose between the auto and step modes.

delay factor: The seconds of wait between consecutive attentions during replay.

hard pause: The suspension of a replay caused by a pause inserted during the recording.

Initial State: A user option that ensures that certain CADAM conditions are identical for scenario recording and replay.

Menu/Messages: An option that facilitates the capture of all menu options and messages displayed during the recording of a scenario and their validation and update during replay.

on fly control: See: **auto/step switch**.

Parameters: A replay option allowing the user to specify the step size and the delay factor.

pause: See: **hard pause** and **soft pause**.

pause label: An alphanumeric, 70-character, unique label used to identify a hard pause.

Performance: A replay option enabling the user to monitor CADAM's response. If this option is enabled, performance data is placed in a file for later access.

recording: The capturing and storing of the attentions processed during an interactive CADAM session.

recording options: The parameters controlling the recording environment.

replay options: The parameters controlling the replaying environment.

replaying: A process of simulating the series of attentions captured in a scenario so they can be viewed and analyzed.

scenario: A sequence of CADAM interactive events captured during a recording session for later analysis during replay.

scenario name: An alphanumeric, 70-character, unique label used to identify a scenario.

scenario file: A file that stores all of the scenarios at a particular site.

step: A scenario subset consisting of a user-specified number of attentions.

step mode: The user-controlled mode of scenario replay that stops after each step is replayed.

step size: The number of attentions in each step of the scenario. The user defines this quantity while setting the recording options.

stop: The termination of a recording. A stop is generated by the user to inform Trace and Replay that a scenario is finished.

stop label: An alphanumeric, 70-character, unique label used by Trace and Replay to identify the end of a scenario.

SUPPORT: The function key under which the Trace and Replay Facility runs.

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CUE/GM
FONT
TAPE INSTALLATION
AND
TABLE GENERATION
PROCEDURES
FOR
VM/CMS

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Acknowledgments

The CADAM Users Exchange membership and CUE board of directors would like to take this opportunity to express their thanks to General Motors Corporation for their generous contribution of the 21 font tables and 1 font display page that make this enhancement to the CADAM* interactive system.

* CADAM is a registered trade mark of the Engineering Drafting System written and distributed by CADAM INC.

Preparation for Tape Installation

We recommend the font data be loaded onto its own VM/CMS user. In this way all the data can be easily differentiated from what is normally supplied on the CADAM product tapes. This will allow the font enhancement data to be added to new releases of CADAM as quickly and with a minimum of confusion.

The VM/CMS user on which we tested this installation system was called "GMFONTS". The DASD space required to hold the full tape contents was approximately (25) 3330 cylinders. If you intend to rebuild the fonts from scratch you will need to increase the size of this user by about 25 percent. This increase is needed to accommodate the work data sets created by the "CADSYMTB" exec. This much space is sufficient to contain the following:

- 1) All the GM supplied source decks.
- 2) The assembly source files created by the "CADSYMTB" exec.
- 3) The VM/370 text decks.
- 4) A loadlib called "GMFONTS" containing the finished font tables and font display page in load module format.

This new VM/CMS user must have available 2M of storage for the purpose of executing the CADAM symbol table batch software. The software must be made available to the user by linking to the current CADAM code disk. This link should not be set up as an extension of the A disk. All file accesses made to the CADAM code disk use "*" as their file mode.

The VM user need only have class 8 system privileges and have access to a 1600 bpi, 9-track tape drive.

The CADAM symbol table generation system uses as input a number of CADAM drawings. These drawings are restored into a CADAM drawing file by the "FONTINST" installation exec. We recommend that the drawings supplied with the font tape be given their own user in a selected drawing file. This user may be created using the CADAM supply "DMMON" exec.

NOTE: Do not password protect the new drawing file user. The installation exec was not set up to restore the font source drawings into a drawing file that has group or add password on it.

It should be noted that if you intend to create this new drawing file user from the new VM/CMS user the CADAM "REQUEST IDS" data set must be modified to include an entry for the new VM user. If this is not done, the drawing file will not honor any I/O requests and the installation will not be successful.

Installation Procedures for VM/CMS

The installation process for the CUE/GM font data is performed in a number of steps. The first step is to mount the distribution tape on a 1600 bpi tape drive and attach the tape drive to the VM user as virtual device 181. The installation and production execs can be unloaded from the tape by issuing the following commands:

```
TAPE REW
TAPE FSF 1
VMFPLC2 LOAD * * A
```

After VMFPLC2 finishes, the following execs should be present on the user's 191 disk:

```
CHKCHAR EXEC
FTAPEBLD EXEC
FONTBULD EXEC
FONTINST EXEC
FONTMAIN EXEC
GTCADSYM DATA
GTCADSYM EXEC
```

Of these six execs, only "FONTINST" and "CHKCHAR" are used during the installation process and "CHKCHAR" is used as a support exec for "FONTINST". Any and all optional parameters to the above execs are documented within each exec.

The actual installation of the tape continues by invoking the "FONTINST" exec. This exec is responsible for unloading the CADAM source drawings and font source data. You may also at this time opt to unload a pre-generated font system consisting of assembly source routines, text decks, and a load module library.

Upon invoking the "FONTINST" exec, you will be asked a series of questions pertinent to your installation. The first question ascertains at which step in the installation process you wish to start. The installation process is subdivided into the following five steps or procedures:

- 1) Restore the CADAM drawings.
- 2) Unload the font source data. This data is used by the "CADSYMTB" exec and defines the relationship of each font character to one another.
- 3) Unload the assembly source routines created during our test of the installation.
- 4) Unload the text decks assembled from the source obtained in step 3.
- 5) Unload a sample loadlib containing symbol tables created by linking the text decks into load module form.

Of the above 5 steps only the first 2 are required. If steps 3, 4, and 5 are not done, all font tables must be created from scratch using either the "CADSYMTB" exec or the "FONTMAIN" exec. The "FONTMAIN" exec is supplied on the distribution tape and the "CADSYMTB" must be obtained from the CADAM code machine. The decision of whether all symbol tables are built from scratch or unloaded from tape is left to the system programmer.

Installation Procedures for VM/CMS

The first question that will be asked is as follows:

DO YOU WISH TO INSTALL THE TAPE OF CHARACTER FONTS DONATED TO
CUE BY GENERAL MOTORS INC?

(NO / N / YES / Y / RESTART AT PROCEDURE 1-5)

NOTE: If the <enter> key is pressed the underlined item will be assumed.

At this point you may respond "NO" or "N" and you will leave the installation exec. If the response is "YES", "Y" or <ENTER> procedure 1 is assumed. Procedure 1 uses "NURESTOR" to copy the the source drawings from the distribution tape to a CADAM drawing file. This drawing file is indicated in the answers of the next two questions.

The first question is as follows and ascertains the name of the drawing file group:

PROCEDURE 1.A

WHAT DRAWING FILE >>>> GROUP <<<< DO YOU WANT TO RESTORE THE
FONT SOURCE DRAWINGS TO?

(GROUP NAME / <ENTER> FOR DEFAULT / RETURN / R) DEFAULT = CAD

A response of "RETURN" or "R" will cycle the exec back to the main procedure of the installation exec.

The next question is the same as above except it asks for the drawing file user within the indicated group. This prompt is as follows:

PROCEDURE 1.8

WHAT DRAWING FILE >>>> USER <<<< DO YOU WANT TO RESTORE THE
FONT SOURCE DRAWINGS TO?

(USER NAME / <ENTER> FOR DEFAULT / RETURN / R) DEFAULT = CAD

The tape will now be rewound and "NURESTOR" will attempt to restore the source drawings to the group and user defined in procedures 1.A and 1.B. If NURESTOR does not return with a zero return code the following message will be displayed and you can choose to abort the rest of the installation or continue:

))))))))) W A R N I N G (((((((((((((((((((((((((((((((((((((((

NURESTOR DID NOT RETURN WITH A ZERO RETURN CODE!!!!

(CONTINUE / C / EXIT / E)

Installation Procedures for VM/CMS

NOTE: Selecting "EXIT / E" will return you to the first question in the exec where you were asked if you want to "Install the Font Tape"; you can then respond "NO / N" to exit the installation exec.

The prompt for procedure 2 will be displayed if the restore of the font source drawings is successful or a response of "CONTINUE" is given to the above warning. The prompt for procedure 2 is as follows:

PROCEDURE 2.0

DO YOU WANT TO UNLOAD THE FONT SOURCE DATA? THIS DATA IS USED AS INPUT TO THE CADAM SUPPLIED "CADSYMTB EXEC" AND IS REQUIRED IF YOU INTEND TO REBUILD THE GM FONTS!

(YES / Y / NO / N / RETURN / R)

If a "YES" response is given to the above prompt the VM/CMS utility "VMFPLC2" will be called to unload 39 symbol input data sets. This constitutes the MINIMUM amount of data that should be unloaded from the distribution tape. With the source drawings and input data sets for the "CADSYMTB" exec, the rest of the data on the installation tape can be skipped. If it is skipped you must now go to the section in the installation documentation on "Re-building the Font Tables and Font Display Page" and execute option 0 and 22.

The remaining 3 data sections on the distribution tape contain the output from options 0 and 22 of the "FONTMAIN" exec and were placed on the tape for the smaller installations that do not wish to use the resources necessary to recreate all 21 font (symbol) tables and the font display page. The pre-generated symbol tables were tested to as far back as Release 18.4 of CADAM.

If you wish to unload the assembly output created by "CADSYMTB" simply respond "YES" to the following prompt of procedure 3:

PROCEDURE 3.0

DO YOU WANT TO UNLOAD THE FONT ASSEMBLY SOURCE? THIS DATA WAS GENERATED BY THE CADAM SUPPLIED (CADSYMTB EXEC) AND USED THE SOURCE DRAWINGS FROM PROCEDURE 1.0 AND THE SOURCE DATA FROM PROCEDURE 2.0 AS INPUT.

(YES / Y / NO / N / RETURN / R)

A "YES" response will again call VMFPLC2 to unload 21 assembly data sets. (See APPENDIX A: For a list of the data sets) If you look at the assembly source that has just been unloaded from tape you will see that a number of the data sets are quite large. It is for that reason we elected to put this source on the distribution tape. Some companies having smaller computers will find that the generation of this data is an expensive and time consuming task.

Installation Procedures for VM/CMS

The next section on the distribution tape contains the text decks that the VM/SP Release 3 system assembler produced from the assembly data sets from procedure 3. It is not necessary to unload this data from the distribution tape because it is not as inconvenient to build your own text. However, if you intend to use the loadlib in the next section of the tape, it would be advisable to have all the data that went into the creation of the loadlib available. A "YES" to the following prompt of procedure 4.0 will produce 21 text decks:

PROCEDURE 4.0

DO YOU WANT TO UNLOAD THE FONT TEXT DECKS? THE TEXT DECKS WERE
GENERATED USING THE VM/SP RELEASE 3 SYSTEM ASSEMBLER AND USED AS
INPUT THE SOURCE ASSEMBLY ROUTINES FROM STEP 3.0!

(YES / Y / NO / N / RETURN / R)

The final item on the distribution tape is a fully functional symbol table library containing all 21 symbol tables and 1 font display page. As outlined above the use of the load module library is optional if you intend to rebuild all the fonts. If you replay "YES" to the following prompt a CMS loadlib by the name of "GMFONTS" will be unloaded by VMFPLC2:

PROCEDURE 5.0

DO YOU WANT TO UNLOAD THE "GMFONTS LOADLIB"? THIS LOADLIB
CONTAINS ALL OF THE CADAM SYMBOL TABLES IN THEIR FINAL FORM AND
WAS CREATED USING THE VM/SP RELEASE 3 LINKAGE EDITOR!

(YES / Y / NO / N / RETURN / R)

At this point the unloading of the distribution tape is complete and the installation exec will stop with the following of message:

>>>> THIS CONCLUDES THE INSTALLATION OF THE CUE/GM FONT TAPE <<<<
PLEASE CONSULT THE INSTALLATION DOCUMENTATION
FOR DETAILS ON THE FOLLOWING TWO PROCEDURES:

- 1) GENERATING THE FONT PAGE AND TABLES.
- 2) MAKING CADAM AWARE OF THE NEW FONTS.

Rebuilding the Font Tables and Font Display Page

The 21 font tables and 1 display page can be built using the "CADSYMTB" exec which was supplied on the CADAM distribution tape. To make the process as simple as possible, we have put on the distribution tape an exec called "FONTMAIN". This exec is just a menu driven approach to the process of generating the fonts.

This exec has two optional parameters. The first is the drawing file group to which the source drawings were restored. If it is not supplied, "CAD" will be assumed. The second parameter is the name of the user within the above mentioned group. If this parameter, is not supplied a user of "GMFONT" will be assumed.

NOTE: The second parameter may not be supplied by itself because the exec would assume you were defining the group, not the user. Therefore to define a new user to the exec you MUST supply the group token first.

The main menu of the "FONTMAIN" exec will look as follows:

```
*****
*   BUILD THE FONT TABLES DONATED TO CUE BY GENERAL MOTORS INC   *
*****
          0) REBUILD ALL FONT TABLES
```

1) BLOCK CONDENSED (UPPER CASE)	12) GREEK (UPPER CASE)
2) BLOCK CONDENSED (LOWER CASE)	13) GREEK (LOWER CASE)
3) BRUSH (UPPER CASE)	14) HELVETICA REG. (UPPER CASE)
4) BRUSH (LOWER CASE)	15) LEROY (UPPER CASE)
5) CASLON (UPPER CASE)	16) OLD ENGLISH (UPPER CASE)
6) CASLON (LOWER CASE)	17) OLD ENGLISH (LOWER CASE)
7) DATA (UPPER CASE)	18) PEIGNOT MEDIUM (UPPER CASE)
8) DATA (LOWER CASE)	19) PEIGNOT MEDIUM (LOWER CASE)
9) GM MICRO (UPPER CASE)	20) PLAYBILL (UPPER CASE)
10) GOTHIC (UPPER CASE)	21) PLAYBILL (LOWER CASE)
11) GOTHIC (LOWER CASE)	22) REBUILD FONT DISPLAY PAGE

C) CHANGE THE DEFAULT LOAD MODULE LIBRARY NAME. (GMFONTS LOADLIB)
E) EXIT THE FONT GENERATION SYSTEM.

PLEASE SELECT THE DESIRED OPTION:

As shown above this facility allows you to build any or all of the font tables, the font display page, and select the loadlib where the output is to be placed. This system does not run any special programs or do anything out of the ordinary except call the "CADSYMTB" exec and change the "SYSMOD" statement to redirect the output of the load modules.

NOTE: It does not modify the original "CADSYMTB" exec. The modifications are done in a copy of this exec called "GMFSYMTB".

The paragraphs that follow will outline the manual way in which you can do the work of the "FONTMAIN" exec.

Rebuilding the Font Tables and Font Display Page

To build the symbol tables as outlined in the CADAM installation manual you would execute the "CADSYMTB" exec as follows:

```
CADSYMTB CAD GMFONT SYMTB100 3 SYMTB100 INPUTA SUMTB100 INPUTB
```

In the above example symbol table number 100, the upper case "LEROY THIN" symbol table would be created from the source geometry in the CAD drawing file, user GMFONT. It would use as input data the "SYMTB100 INPUTA" and the "SYMTB100 INPUTB" data sets.

This process must be repeated 20 more times with symbol tables 101 thru 119.

To build the font display page you must call the "CADSYMTB" exec again this time using option 2 insted of 3. Also the input data sets are of a different name:

```
CADSYMTB CAD GMFONT FONTABLS 2 FONTABLS INPUT
```

In this example the font source geometry is also in the "CAD" drawing file, user "GMFONT"

If you wish to change the output load module library, name the "CADSYMTB" exec will have to be modified to point to the desired name.

Making Fonts Available to the CADAM System

As outlined in the CADAM documentation, the new fonts are made available by adding the following file definition to the "CAD" exec for interactive CADAM and the PLOT exec for plotting. The best place for this filedef is just after the filedef(s) for the CADAM steplib.

FILEDEF SYMTABLE DISK GMFONTS LOADLIB *

For a more detailed description of the CADAM font and symbol system refer to the CADAM supplied "CAD/CAM" or "CAD ONLY" installation manuals. The chapters on "CADAM SYMBOLS AND FONTS".

Performance Considerations

For a long time it has been known that the more symbols being used in a CADAM drawing, the longer it takes to display the drawing when it is first being brought in from the CADAM drawing file or a window function is being performed. The reason for this performance loss is due to the fact that CADAM symbols and fonts are stored in the CADAM model in the order in which they were created. At first this would not appear to pose a problem; however, since a limited number of these tables is kept in memory at any given time, when a new table must be called from the system load library, one of the existing tables must be replaced. When all three of the above conditions are in effect the amount of I/O going on against the symbol load module library will slow the CADAM system down considerably.

In newer releases of CADAM an attempt has been made to minimize the effect of this condition, by changing the way in which fonts and symbols are handled. The new mechanism is to keep a dynamic table of symbols in memory and when a new symbol or font is encountered add it to this table. By doing this the amount of I/O to DASD is reduced. I do not know how big this table can be but I would assume that it has an upper boundary. When this limit is reached the system must react the same way as described above.

It is for this reason we recommend that the symbol library be placed under the fixed head of a DASD device that is so equipped and that the process of concatenating load module libraries be kept to a minimum. If performance is still a problem, restrict the number of different symbol tables or fonts that a user can put in any one drawing.

What to do if one of the 21 symbol tables is already in use

If you currently have in use any one of the symbol tables starting with 100 and proceeding to 119, you must renumber the symbol table supplied on the distribution tape. This can be done in a number of ways. One way is by using LOADLIB COPY to copy and rename the conflicting table or tables to a number that is not in use at your installation. Another way is to rename the input data sets and run CADSYMTB on the renamed data. If you change a table number and still want to use the "FONTMAIN" exec, a global change in "XEDIT" can be done to put the new table number in effect. An example of this would be to change symbol table 100 to 200:

C/100/200/* *

After all the symbol tables that are in conflict with existing tables have been renumbered and rebuilt, the "FONTABLE" source drawing must be changed to reflect the new numbers. When you call up the source drawing, the first noticeable difference is that the bold lettering will be either undefined or not a character font. These incorrect symbol fonts should be erased at this point. The next step is to change the attribute number attached to the CADAM notes beside the character font to the new number. This is done in the GROUP function key menu option / ATTRIBUTE / -> / EDIT /. When all the attributes numbers have been changed rebuild the "FONTABLE". This will put the right numbers on the text strings so that function key SYMBOL menu option / FONTS / -> / SET FONTS / can be used to add the correct font shapes back onto the display page. When this is accomplished the "FONTABLE" must be rebuilt one more time.

The figure on the following page shows the correct format for the "FONTABLE".

		SELECT NOTE	
1)	BLOCK CONDENSED	(UPPER CASE)	↓
2)		(LOWER CASE)	
3)	BRUSH	(UPPER CASE)	
4)		(LOWER CASE)	
5)	CASLON	(UPPER CASE)	
6)		(LOWER CASE)	
7)	DATA	(UPPER CASE)	
8)		(LOWER CASE)	
9)	GM MICRO	(UPPER CASE)	
10)	GOTHIC	(UPPER CASE)	
11)		(LOWER CASE)	
12)	GREEK	(UPPER CASE)	
13)		(LOWER CASE)	
14)	HELVETICA REG	(UPPER CASE)	
15)	LEROY THIN	(UPPER CASE)	
16)	OLD ENGLISH	(UPPER CASE)	
17)		(LOWER CASE)	
18)	PEIGNOT MED	(UPPER CASE)	
19)		(LOWER CASE)	
20)	PLAYBILL	(UPPER CASE)	
21)		(LOWER CASE)	↑

SELECT NOTE

Appendix A: Tape Contents

File 1: CADAM Source Drawings.

F-BLOCK COND	110 UC
F-BLOCK COND	110NUM
F-BLOCK COND	111 LC
F-BRUSH	108 UC
F-BRUSH	108NUM
F-BRUSH	109 LC
F-CASLON	118 UC
F-CASLON	118NUM
F-CASLON	119 LC
F-DATA	103 UC
F-DATA	103NUM
F-DATA	104 LC
F-GM MICRO	107 UC
F-GM MICRO	107NUM
F-GOTHIC	114 UC
F-GOTHIC	114NUM
F-GOTHIC	115 LC
F-GREEK	116 UC
F-GREEK	117 LC
F-HLVtica MED	128 UC
F-LEROY 1	100 UC
F-LEROY 1	100NUM
F-OLD ENGLISH	112 UC
F-OLD ENGLISH	112NUM
F-OLD ENGLISH	113 LC
F-PEIGNOT MED	101 UC
F-PEIGNOT MED	101NUM
F-PEIGNOT MED	102 LC
F-PLAYBILL	105 UC
F-PLAYBILL	105NUM
F-PLAYBILL	106 LC
FONTPAGE	

File 2: Installation and Production Execs

CHKCHAR	EXEC
FTAPEBLD	EXEC
FONTBULD	EXEC
FONTINST	EXEC
FONTMAIN	EXEC
GTCADSYM	DATA
GTCADSYM	EXEC

File 3: Font Source Data

```
FONTABLS INPUT
SYMTB100 INPUTA
SYMTB100 INPUTB
SYMTB101 INPUTA
SYMTB101 INPUTB
SYMTB102 INPUTA
SYMTB102 INPUTB
SYMTB103 INPUTA
SYMTB103 INPUTB
SYMTB104 INPUTA
SYMTB104 INPUTB
SYMTB105 INPUTA
SYMTB105 INPUTB
SYMTB106 INPUTA
SYMTB106 INPUTB
SYMTB107 INPUTA
SYMTB107 INPUTB
SYMTB108 INPUTA
SYMTB108 INPUTB
SYMTB109 INPUTA
SYMTB109 INPUTB
SYMTB110 INPUTA
SYMTB110 INPUTB
SYMTB111 INPUTA
SYMTB111 INPUTB
SYMTB112 INPUTA
SYMTB112 INPUTB
SYMTB113 INPUTA
SYMTB113 INPUTB
SYMTB114 INPUTA
SYMTB114 INPUTB
SYMTB115 INPUTA
SYMTB115 INPUTB
SYMTB116 INPUTA
SYMTB116 INPUTB
SYMTB117 INPUTA
SYMTB117 INPUTB
SYMTB118 INPUTA
SYMTB118 INPUTB
SYMTB119 INPUTA
SYMTB119 INPUTB
```

File 3: Font Assembly Source Routines

```
FONTABLS ASSEMBLE
SYMTB100 ASSEMBLE
SYMTB101 ASSEMBLE
SYMTB102 ASSEMBLE
SYMTB103 ASSEMBLE
SYMTB104 ASSEMBLE
SYMTB105 ASSEMBLE
SYMTB106 ASSEMBLE
SYMTB107 ASSEMBLE
SYMTB108 ASSEMBLE
SYMTB109 ASSEMBLE
```

File 3: Font Assembly Source Routines (Continued)

SYMTB110 ASSEMBLE
SYMTB111 ASSEMBLE
SYMTB112 ASSEMBLE
SYMTB113 ASSEMBLE
SYMTB114 ASSEMBLE
SYMTB115 ASSEMBLE
SYMTB116 ASSEMBLE
SYMTB117 ASSEMBLE
SYMTB118 ASSEMBLE
SYMTB119 ASSEMBLE

File 4: Pre-assembled Font Text Decks

FONTABLS TEXT
SYMTB100 TEXT
SYMTB101 TEXT
SYMTB102 TEXT
SYMTB103 TEXT
SYMTB104 TEXT
SYMTB105 TEXT
SYMTB106 TEXT
SYMTB107 TEXT
SYMTB108 TEXT
SYMTB109 TEXT
SYMTB110 TEXT
SYMTB111 TEXT
SYMTB112 TEXT
SYMTB113 TEXT
SYMTB114 TEXT
SYMTB115 TEXT
SYMTB116 TEXT
SYMTB117 TEXT
SYMTB118 TEXT
SYMTB119 TEXT

File 5: Complete Font Load Module Library

GMFONTS LOADLIB

APPENDIX B

SYSTEM

EXECS

LCNTRCL OFF NCMSG

THIS EXEC IS USED TO BUILD THE GM FONT TAPE FOR CUE NORTH AMERICA.
THE FORMAT OF THE TAPE IS AS FOLLOWS:

CADAM SOURCE DRAWINGS.

TAPE MARK 1 (ADDED BY NUKESTOR)

INSTALLATION EXECS.
(VMFPLC2 DUMP) FORMAT

TAPE MARK 2

CAUSYMTB SOURCE DATA
(VMFPLC2 DUMP) FORMAT

TAPE MARK 3

CADSYMTB ASSEMBLY ROUTINE
(VMFPLC2 DUMP) FORMAT

TAPE MARK 4

CAOSYMTB TEXT DECKS
(VMFPLC2 DUMP) FORMAT

TAPE MARK 5

GMFONTS LOADLIB A
(VMFPLC2 DUMP) FORMAT

TAPE MARK 6

TAPE MARK 7

TAPE MARK 6

ONLY ONE TOKEN IS OPTIONLY USED BY THIS EXEC

TCKEN 1 = CHK

* IF TOKEN 1 IS "CHK" THE TAPE CONTENT WILL SCANNED FOR VALID *
 * DATA. THIS IS A VISUAL SCAN ONLY. *
 * ----- *

 * THESE EXECS WERE CUSTOM WRITTEN FOR CUE BY: *
 * *
 * MARK A. WELLS *
 * *
 * THE CASSMAN GROUP *
 * CUE ADMINISTRATIVE OFFICES *
 * P .O. 3684 *
 * TORRANCE, CA 90510 *
 * OFFICE PHONE: (213) 534-4250 HOME PHONE: (213) 254-5478 *
 * *
 * IF YOU HAVE ANY QUESTIONS OR PROBLEMS WITH THESE EXECS PLEASE *
 * CONTACT ME AT EITHER OF THE ABOVE TWO NUMBERS. *
 * *
 * THANK YOU *
 * *
 * ***** *

* LOCAL VARIABLES. *

 * ETAPBL = GMFONT *
 * EFONTGRP = CAD *
 * EFONTUSR = GMFONT *
 * CP SP CONS STOP CLOSE *
 * CP SP CONS START *

 * MAKE SURE A TAPE DRIVE IS AVAILABLE. *
 * *****
 * -CHKTAPE &CONTINUE *
 * VMFCLEAR *
 * CP QUERY VIRTUAL 181 *
 * &IF &RETCODE EQ 0 &GOTO -TAPEOK *
 * &BEGTYPE *

VIRTUAL TAPE DRIVE 181 DOES NOT EXIST.
 PLEASE ATTACH THE TAPE DRIVE AND SELECT ONE OF THE FOLLOWING OPTIONS:

(CONTINUE / C / EXIT / E)

&END
 &READ VARS &OPTION
 &IF .&OPTION EQ .E &EXIT 16
 &IF .&OPTION EQ .EXIT &EXIT 16
 &GOTO -CHKTAPE

 * READY THE TAPE. *
 * *****
 * -TAPECK &CONTINUE *
 * TAPE REW *
 * &IF &RETCODE NE 0 &EXIT &RETCODE *
 * TAPE WTP *

```

&IF &RETCCODE NE 0 &EXIT &RETCCODE
TAPE REW
&IF &RETCCODE NE 0 &EXIT &RETCCODE
*****
*   BUILD CONTROL DECK FOR NURESTOR.   *
*****
VMFCLEAR
&BEGTYPE

```

>>>> LOADING TO TAPE THE CUE/GM FONT SOURCE DRAWINGS. <<<<

```

&END
&STACK CTL &TAPELBL
&STACK VTL &TAPELBL
&STACK UUSR &FONTUSR
&STACK LIST TAPE &TAPELBL
&STACK SURTLIST TAPE &TAPELBL
&STACK END
EXEC NURESTOR GR CAD PRINT DISK &TAPELBL LISTING A (NOWTOR
STATE &TAPELBL LISTING A
&IF &RETCCODE NE 0 &EXIT 16
PRINT &TAPELBL LISTING A
*****
*   POSITION THE TAPE FOR THE INSTAL- *
*   LATION EXECS.                     *
*****
TAPE REW
TAPE FSF 1
*****
*   ADD THE INSTALLATION EXEC TO THE *
*   TAPE.                             *
*****
VMFCLEAR
&BEGTYPE

```

>>>> LOADING TO TAPE THE INSTALLATION AND PRODUCTION EXECS. <<<<

```

&END
VMFPLC2 DUMP CHKCHAR EXEC A
VMFPLC2 DUMP FTAPEBLD EXEC A
VMFPLC2 DUMP FONTBULD EXEC A
VMFPLC2 DUMP FONTINST EXEC A
VMFPLC2 DUMP FONTMAIN EXEC A
VMFPLC2 DUMP GTCADSYM DATA A
VMFPLC2 DUMP GTCADSYM EXEC A
*****
*   ADD TAPE MARK 2 AFTER THE INSTAL- *
*   LATION EXECS.                     *
*****
TAPE >TH
*****
*   ADD THE INSTALLATION EXEC TO THE *
*   TAPE.                             *
*****
VMFCLEAR

```

LBEGTYPE

>>>> LOADING TO TAPE THE CUE/GM FONT SOURCE FILES. <<<<

END

VMFPLC2 DUMP * INPUT A

VMFPLC2 DUMP * INPUTA A

VMFCLEAR

VMFPLC2 DUMP * INPUTB A

* ADD TAPE MARK 3 AFTER THE FONT *

* SOURCE DECKS. *

TAPE WTM

* ACC ASSEMBLE SOURCE FROM CADSYMTB. *

VMFCLEAR

LBEGTYPE

>>>> LOADING TO TAPE THE CUE/GM FONT ASSEMBLY SOURCE FILES. <<<<

END

VMFPLC2 DUMP * ASSEMBLE A

* ADD TAPE MARK 4 AFTER THE ASSEMBLY *

* SOURCE DECKS. *

TAPE WTM

* ADD THE PRE ASSEMBLED TEXT DECKS. *

VMFCLEAR

LBEGTYPE

>>>> LOADING TO TAPE THE CUE/GM FONT TEXT DECKS. <<<<

END

VMFPLC2 DUMP * TEXT A

* ADD TAPE MARK 5 AFTER THE PRE- *

* ASSEMBLED SOURCE DECKS. *

TAPE WTM

* ADD THE COMPLETED LOADLIB TO THE *

* FONT TAPE. *

VMFCLEAR

LBEGTYPE

>>>> LOADING TO TAPE THE CUE/GM FONT LOADLIB. <<<<

END

VMFPLC2 DUMP GMFONTS LOADLIB A

```
*****
*   ADD TAPE MARK 6-8 TO MARK THE END   *
*           OF THE TAPE.                 *
*****
```

```
VMFCLEAR
&BEGTYPE
```

>>>> MARKING THE END OF THE CUE/GM FONT TAPE. <<<<

```
&END
TAPE WTM
TAPE WTP
TAPE WTM
TAPE REN
```

```
*****
*
*   CHECK THE CREATION OF THE TAPE IF THE "CHK" PARM WAS SUPPLIED.
*
*****
&IF &INDEX EC 0 &GOTO -ALLDONE
&IF &1 NE CHK &GOTO -ALLDONE
VMFCLEAR
&BEGTYPE
```

>>>> SCANNING THE TAPE FOR THE CUE/GM FONT SOURCE DRAWINGS. <<<<

```
&END
&STACK VTL &TAPELBL
&STACK LIST TAPE &TAPELBL
&STACK END
EXEC NURESTOR GR CAD INO&TOR
```

```
*****
*   POSITION THE TAPE AT THE INSTAL-    *
*           LATION EXECS.              *
*****
VMFCLEAR
&BEGTYPE
```

>>>> FAST FORWARDING THE TAPE TO THE EXECS. <<<<

```
&END
TAPE FSF 1
&BEGTYPE
```

>>>> SCANNING THE TAPE FOR THE INSTALLATION AND PRODUCTION EXECS. <<<<

```
&END
VMFPLC2 SCAN
*****
*   SCAN THE TAPE FOR THE FONT SOURCE
*****
VMFCLEAR
&BEGTYPE
```

>>>> SCANNING THE TAPE FOR THE FONT SOURCE FILES. <<<<

```

&END
VMFPLC2 SCAN
*****
*   SCAN THE TAPE FOR THE ASSEMBLY   *
*   SOURCE FILES.                   *
*****
VMFCLEAR
&BEGTYPE

```

>>>> SCANNING THE TAPE FOR THE FONT ASSEMBLY SOURCE FILES. <<<<

```

&END
VMFPLC2 SCAN
*****
* SCAN THE TAPE FOR THE ASSEMBLED TEXT *
*   DECKS.                           *
*****
VMFCLEAR
&BEGTYPE

```

>>>> SCANNING THE TAPE FOR THE FONT TEXT DECKS. <<<<

```

&END
VMFPLC2 SCAN
*****
* SCAN THE TAPE FOR THE FONT LOADLIB. *
*****
VMFCLEAR
&BEGTYPE

```

>>>> SCANNING THE TAPE FOR THE FONT LOADLIB. <<<<

```

&END
VMFPLC2 SCAN
*****
* SCAN THE TAPE FOR THE ENDING TAPE   *
*   MARK.                           *
*****
VMFCLEAR
&BEGTYPE

```

>>>> SCANNING THE TAPE FOR THE LAST TAPE MARK. <<<<

```

&END
VMFPLC2 SCAN
*****
*                                     *
*   CLEANUP AND EXIT THE TAPE BUILD EXEC.   *
*                                     *
*****
-ALLDCNE &CONTINUE
CP SP CONS STOP CLOSE
CP SP CONS START
*****

```

FILE: FTAPEBLC EXFC

A1

VM/SP CONVERSATIONAL MONITOR SYSTEM

*
END OF THE FONT TAPE BUILD EXEC.*

 &CONTROL CFF NOMSG

* THIS EXEC IS USED BY THE GM FONT TAPE INSTALL EXEC. *

* THIS EXEC CHECKS TO SEE THE GROUP AND USER PRESENTED TO THE *
 * INSTALLATION EXEC DOES NOT EXCEED THE MAXIMUM NUMBER OF CHARACTERS *
 * ALLOWED AND THAT THE FIRST CHARACTER IS NOT NUMERIC. *

* TOKEN &1 = THE STRING TO BE CHECKED. *

* TOKEN &2 = THE MAXIMUM NUMBER OF CHARACTERS FOR TOKEN 1 *

 * THESE EXECS WERE CUSTOM WRITTEN FOR CUE BY: *

* MARK A. WELLS. *

* THE CASSMAN GROUP
 * CUE ADMINISTRATIVE OFFICES

* P.O. 3684

* TORRANCE, CA 90510

* OFFICE PHONE: (213) 534-4250 HOME PHONE: (213) 254-5478 *

* IF YOU HAVE ANY QUESTIONS OR PROBLEMS WITH THESE EXECS PLEASE *
 * CONTACT ME AT EITHER OF THE ABOVE TWO NUMBERS. *

* THANK YOU *

 * LOCAL VARIABLES. *

 &LEN = &LENGTH &1
 &IF &LEN GT &2 &GOTO -BADIN1
 &CHAR1 = &SUBSTR &1 1 1
 &CHART = &DATATYPE &CHAR1
 &IF &CHART NE CHAR &GOTO -BADIN2
 &EXIT 0

 * ERROR MESSAGE FOR TOOMANY CHARS. *

 -BADIN1 &CONTINUE

VMFCLEAR

&SPACE 6

&BEGTYPE

THE DATA YOU SUPPLIED CONTAINED TOO MANY CHARACTERS. PLEASE TRY AGAIN:

(PRESS <ENTER> TO CONTINUE)

&END

&SPACE 3

&READ VARS &XXX

&EXIT 10

* ERROR MESSAGE FOR THE FIRST *

FILE: CHKCHAR EXEC A1

VM/SP CONVERSATIONAL MONITOR SYSTEM

* CHARACTER A NUMERIC ERROR. *

-BADINZ ECUNTIME

VMFCLEAR

ESPACE 6

EBEGTYPE

THE FIRST CHARACTER OF THE STRING WAS A NUMERIC, PLEASE TRY AGAIN:

(PRESS <ENTER> TO CONTINUE)

END

ESPACE 3

EREAD VARS EXXX

EXIT 1c

* END OF THE CHKCHAR EXEC. *

CONTROL OFF ACMSG

THIS EXEC IS USED TO INSTALL THE CUE/GM FONT TAPE...

THE FORMAT OF THE TAPE IS AS FOLLOWS:

CADAM SOURCE DRAWINGS.

TAPE MARK 1 (ADDED BY NURESTOR)

INSTALLATION EXECS.
(VMFPLC2 DUMP) FORMAT

TAPE MARK 2

CADSYMTB SOURCE DATA
(VMFPLC2 DUMP) FORMAT

TAPE MARK 3

CADSYMTB ASSEMBLY ROUTINE
(VMFPLC2 DUMP) FORMAT

TAPE MARK 4

CADSYMTB TEXT DECKS
(VMFPLC2 DUMP) FORMAT

TAPE MARK 5

GMFCNTS LOADLIB A
(VMFPLC2 DUMP) FORMAT

TAPE MARK 6

TAPE MARK 7

TAPE MARK 8

THIS EXEC USES NO INPUT TOKENS:

THIS EXEC MAKES THE FOLLOWING ASSUMPTIONS DURING THE INSTALLATION
PROCESS:

- 1) A CADAM DRAWING FILE EXISTS WHERE THE SOURCE DRAWINGS WILL BE RESTORED TO.
- 2) THE CADAM DRAWING FILE HAS AT MINIMUM 1 USER IN IT.
- 3) THERE IS ENOUGH ROOM IN THAT USER FOR 32 MORE DRAWINGS.
- 4) THE REQUEST IDS TABLE HAS AN ENTRY FOR THE VM USER SO THAT THE DRAWING FILE DATA MANAGER WILL HONOR I/O REQUESTS.
- 5) THE VM USER THAT THE INSTALLATION IS TO TAKE PLACE ON IS R/O LINKED TO THE CADAM CODE DISK.
- 6) THERE IS 45 3330 CYL OF DISK SPACE AVAILABLE ON THE VM USER.

I RECOMMEND THAT A NEW VM USER BE CREATED FOR THIS INSTALLATION. IN THIS WAY ALL THE FONT INFORMATION WILL BE LOCATED IN ONE PLACE. IF THIS IS DONE, INSTALLATION OF THE FONT SYSTEM ON FUTURE RELEASES OF CADAM WILL BE AS SIMPLE AS POSSIBLE AND WILL NOT REQUIRE THE ORIGINAL FONT TAPE.

THESE EXECS WERE CUSTOM WRITTEN FOR CUE BY:

MARK A. WELLS

THE CASSMAN GROUP
CUE ADMINISTRATIVE OFFICES
P.O. 3684

TORRANCE, CA 90510

OFFICE PHONE: (213) 534-4250 HOME PHONE: (213) 254-5478

IF YOU HAVE ANY QUESTIONS OR PROBLEMS WITH THESE EXECS PLEASE CONTACT ME AT EITHER OF THE ABOVE TWO NUMBERS.

THANK YOU

LOCAL VARIABLES.

```
&PRONLY = 0
&TAPELBL = GMFONT
&FONTGRP = CAD
&FONTUSR = GMFONT
CP SP CONS STOP CLOSE
CP SP CONS START
```

```
* MAKE SURE A TAPE DRIVE IS AVAILABLE. *
-CHKTAPE &CONTINUE
CP QUERY VIRTUAL 181
&IF &RETCODE EQ 0 &GOTO -TAPEOK
VMFCLEAR
&SPACE 2
&BEGETYPE
```

VIRTUAL TAPE DRIVE 181 DOES NOT EXIST.

PLEASE ATTACH THE TAPE DRIVE AND SELECT ONE OF THE FOLLOWING OPTIONS:

(CONTINUE / C / EXIT / E)

&END

&SPACE 2

&REAL VARS &OPTION

&IF .&OPTION EQ .E &EXIT 16

&IF .&OPTION EQ .EXIT &EXIT 16

&GOTO -CHKTAPE

* * * * *

ASK FOR THE STARTING PROCEDURE NUMBER.

* * * * *

-TAPECK &CONTINUE

VMFCLEAR

&SPACE 2

&BEGTYPE

DO YOU WISH TO INSTALL THE TAPE OF CHARACTER FONTS DONATED TO
CUE BY GENERAL MOTORS INC?(NO / N / YES / Y / RESTART AT PROCEDURE NUMBER 1-5)
--- --

&END

&SPACE 2

&REAL VARS &PRONUM

&IF .&PRONUM EQ .N &GOTO -ALLDONE

&IF .&PRONUM EQ .NO &GOTO -ALLDONE

&IF .&PRONUM EQ .Y &GOTO -UNLDWG1

&IF .&PRONUM EQ .YES &GOTO -UNLDWG1

&IF .&PRONUM EQ . &GOTO -UNLDWG1

&IF .&PRONUM EQ .1 &GOTO -UNLDWG1

&IF .&PRONUM EQ .1.0 &GOTO -UNLDWG1

&IF .&PRONUM EQ .2 &GOTO -PROCED2

&IF .&PRONUM EQ .2.0 &GOTO -PROCED2

&IF .&PRONUM EQ .3 &GOTO -PROCED3

&IF .&PRONUM EQ .3.0 &GOTO -PROCED3

&IF .&PRONUM EQ .4 &GOTO -PROCED4

&IF .&PRONUM EQ .4.0 &GOTO -PROCED4

&IF .&PRONUM EQ .5 &GOTO -PROCED5

&IF .&PRONUM EQ .5.0 &GOTO -PROCED5

&GOTO -TAPECK

* * * * *

PROCEDURE 1.

* * * * *

* OBTAIN FROM THE SYSTEM PROGRAMMER THE DRAWING FILE GROUP AND USER. *

* * * * *

* * * * *

PROCEDURE 1.A

* QUERY THE DRAWING FILE GROUP. *

-UNLDWG1 &CONTINUE

VMFCLEAR

&SPACE 2

&BEGTYPE

PROCEDURE 1.0

WHAT DRAWING FILE >>>> GROUP <<<< DO YOU WANT TO RESTORE THE
FONT SOURCE DRAWINGS TO?

```
( GROUP NAME / <ENTER> FOR DEFAULT / RETURN / R ) DEFAULT = CAD
&END
&SPACE 2
&READ VARS &ANS
&IF .&ANS EQ .R      &GOTO -TAPEOK
&IF .&ANS EQ .RETURN &GOTO -TAPEOK
&IF .&ANS EQ .      &GOTO -UNLDWG2
EXEC CHKCHAR &ANS 4
&IF &RETCCDE NE 0 &GOTO -UNLDWG1
&FONTGRP = &ANS
*****
*          PROCEDURE 1.8          *
*  QUERY THE DRAWING FILE USER ID.  *
*****
-UNLDWG2 &CONTINUE
VMFCLEAR
&SPACE 2
&BEGTYPE
```

PROCEDURE 1.A

WHAT DRAWING FILE >>>> USER <<<< DO YOU WANT TO RESTORE THE
FONT SOURCE DRAWINGS TO?

```
( GROUP NAME / <ENTER> FOR DEFAULT / RETURN / R ) DEFAULT = GMFONT
&END
&SPACE 2
&READ VARS &ANS
&IF .&ANS EQ .R      &GOTO -TAPEOK
&IF .&ANS EQ .RETURN &GOTO -TAPEOK
&IF .&ANS EQ .      &GOTO -CCUNLOD
EXEC CHKCHAR &ANS 6
&IF &RETCCDE NE 0 &GOTO -UNLDWG1
&FONTUSR = &ANS
*****
*  PERFORM THE UNLOAD OF THE FONT  *
*  SOURCE DRAWINGS.                *
*****
-CCUNLOD &CONTINUE
VMFCLEAR
&BEGTYPE
```

>>>> NOW RESTORING THE GM FONT SOURCE DRAWINGS. <<<<

```
&END
TAPE REW
&STACK VTL &TAPELBL
&TEMPV = &CONCAT U &FONTUSR
&STACK RESTORE &TEMPV ALL
&STACK END
EXEC NURESTORE GR &FONTGRP INCTOR
```

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VM/SP CONVERSATIONAL MONITOR SYSTEM

[illegible]

```
-UNLLAD2 &CONTINUE
VMFCLEAR
&BEGTYPE
```

```
>>>> REWINDING THE CUE/GM FONT TAPE. <<<<
&END
TAPE REW
&BEGTYPE
```

```
>>>> FAST FORWARDING THE CUE/GM FONT TAPE TO THE CORRECT LOCATION. <<<<
&END
TAPE FSF 2
&PRONLY = 0
&BEGTYPE
```

```
>>>> NOW UNLOADING THE CUE/GM FONT SOURCE DECKS. <<<<
```

```
&END
VMFPLC2 LOAD * * A
*****
*
*                               PROCEDURE 3.0
*
*                               UNLOAD THE PRE-GENERATED ASSEMBLY DECKS.
*
*****
-PROCED3 &CONTINUE
VMFCLEAR
&SPACE 2
&BEGTYPE
```

PROCEDURE 3.0

DO YOU WANT TO UNLOAD THE FONT ASSEMBLY SOURCE? THIS DATA WAS GENERATED
BY THE CADAM SUPPLIED (CADSYMTB EXEC) AND USED THE SOURCE DRAWINGS
FROM PROCEDURE 1.0 AND THE SOURCE DECKS FROM PROCEDURE 2.0 AS INPUT.

(YES / Y / NO / N / RETURN / R)

```
&END
&SPACE 2
&READ VARS &ANS
&IF .&ANS EQ .R      &GOTO -TAPEOK
&IF .&ANS EQ .RETURN &GOTO -TAPEOK
&IF .&ANS EQ .Y      &GOTO -UNLOAD3
&IF .&ANS EQ .YES    &GOTO -UNLOAD3
&IF .&ANS EQ .N      &GOTO -PROCED4
&IF .&ANS EQ .NO     &GOTO -PROCED4
&IF .&ANS EQ .      &GOTO -UNLOAD3
&GOTO -PROCED3
*****
*   POSITION THE TAPE IF NEEDED AND
*   UNLOAD THE ASSEMBLY DECKS.
*****
-UNLOAD3 &CONTINUE
VMFCLEAR
```

```

&IF &PRNUM EQ 0 &GOTO -SKPREW3
&BEGTYPE

```

```

>>>> REWINDING THE CUE/GM FONT TAPE. <<<<
&END
TAPE REW
&BEGTYPE

```

```

>>>> FAST FORWARDING THE CUE/GM FONT TAPE TO THE CORRECT LOCATION. <<<<
&END
TAPE FSF 3
&PRNUM = 0
-SKPREW3 &CONTINUE
&BEGTYPE

```

```

>>>> NOW UNLOADING THE CUE/GM FONT ASSEMBLY SOURCE FILES. <<<<

```

```

&END

```

```

VMFPLCZ LOAD * * A

```

```

*****
*
*                               PROCEDURE 4.0
*
*                               UNLOAD THE PRE-GENERATED ASSEMBLY DECKS.
*
*****
-PROCED4 &CONTINUE
VMFCLEAR
&SPACE 2
&BEGTYPE

```

PROCEDURE 4.0

DO YOU WANT TO UNLOAD THE FONT TEXT DECKS? THE TEXT DECKS WERE GENERATED
USING THE VM/SP RELEASE 3 SYSTEM ASSEMBLE AND USED THE SOURCE ASSEMBLY
ROUTINES FROM STEP 3.0 AS INPUT.

(YES / Y / NO / N / RETURN / R)

--- -

```

&END

```

```

&SPACE 2

```

```

&READ VARS &ANS

```

```

&IF .&ANS EQ .R      &GOTO -TAPEOK
&IF .&ANS EQ .RETURN  &GOTO -TAPEOK
&IF .&ANS EQ .Y      &GOTO -UNLOAD4
&IF .&ANS EQ .YES    &GOTO -UNLOAD4
&IF .&ANS EQ .N      &GOTO -PROCED5
&IF .&ANS EQ .NO     &GOTO -PROCED5
&IF .&ANS EQ .      &GOTO -UNLOAD4
&GOTO -PROCED4

```

```

*****
*   POSITION THE TAPE IF NEEDED AND
*   UNLOAD THE TEXT DECKS.
*****
-UNLOAD4 &CONTINUE
VMFCLEAR

```



```
&IF &PRENUM EQ 0 &GOTO -SKPREW4
&BEGTYPE
```

```
>>>> REWINDING THE CUE/GM FONT TAPE. <<<<
&END
TAPE REW
&BEGTYPE
```

```
>>>> FAST FORWARDING THE CUE/GM FONT TAPE TO THE CORRECT LOCATION. <<<<
&END
TAPE FSF 5
&PROMLP = 0
-SKPREW4 &CONTINUE
&BEGTYPE
```

```
>>>> NOW UNLOADING THE PRE-ASSEMBLED CUE/GM FONT DECKS. <<<<
```

```
&END
VMFPLC2 LOAD * * A
*****
*
*                               PROCEDURE 5.0
*
*                               UNLOAD THE PRE-LINKED "GMFONT LOADLIB".
*
*****
-PROCEED5 &CONTINUE
VMFCLEAR
&SPACE 2
&BEGTYPE
```

PROCEDURE 5.0

DO YOU WANT TO UNLOAD THE "GMFONT LOADLIB"? THIS LOADLIB CONTAINS ALL
OF THE CADAM SYMBOL TABLES IN THERE FINAL FORM AND WAS CREATED USING
THE VM/SP RELEASE 3 LINKAGE EDITOR.

(YES / Y / NO / N / RETURN / R)

```
&END
&SPACE 2
&READ VARS &ANS
&IF .&ANS EQ .R      &GOTO -TAPEOK
&IF .&ANS EQ .RETURN &GOTO -TAPEOK
&IF .&ANS EQ .Y      &GOTO -UNLOAD5
&IF .&ANS EQ .YES    &GOTO -UNLOAD5
&IF .&ANS EQ .N      &GOTO -TAPEOK
&IF .&ANS EQ .NO     &GOTO -TAPEOK
&IF .&ANS EQ .      &GOTO -UNLOAD5
&GOTO -PROCEED5
*****
* POSITION THE TAPE IF NEEDED AND
* UNLOAD THE TEXT DECKS.
*****
-UNLOAD5 &CONTINUE
VMFCLEAR
```

FILE: FONTINST EXEC A1

VM/SP CONVERSATIONAL MONITOR SYSTEM

IF &PRONUM EQ 0 EGUTU -SKPREW4
&BEGTYPE

>>>> REWINDING THE CUE/GM FONT TAPE. <<<<
&END
TAPE REW
&BEGTYPE

>>>> FAST FORWARDING THE CUE/GM FONT TAPE TO THE CORRECT LOCATION. <<<<
&END
TAPE FSF 5
&PRONUM = 0
-SKPREW4 &CONTINUE
&BEGTYPE

>>>> NOW UNLOADING THE CUE/GM FONT LOADLIB. <<<<

&END

VMFPLC2 LOAD * * A

* CLEANUP PRIOR TO THE EXITING OF THE EXEC. *

-ALLDONE &CONTINUE

VMFCLEAR

&SPACE 6

&BEGTYPE

>>>>> THIS CONCLUDES THE INSTALLATION OF THE CUE/GM FONT TAPE <<<<<<
 PLEASE CONSULT THE INSTALLATION DOCUMENTATION
 FOR DETAILS ON THE FOLLOWING TWO PROCEDURES:

- 1) GENERATING THE FONT PAGE AND TABLES.
- 2) MAKING CADAM AWARE OF THE NEW FONTS.

THANK YOU

&END

&SPACE 5

CP SPCLL CONSOLE STOP CLOSE

CP SP CONS START

* END OF THE FCNT TAPE INSTALL EXEC. *

 &CCNTNCL CFF NCMMSG

* THIS EXEC IS USED TO CALL THE "GMFSYMTB EXEC" TO DO THE SYMBOL/FONT
 * BUILD.
 *

 * THIS HAS ONE (3) INPUT TOKENS
 * -----
 *

- * 1) THE SYMBOL TABLE NUMBER TO BE GENERATED.
 * 2) THE DRAWING FILE GROUP WHERE THE SOURCE DRAWINGS ARE.
 * 3) THE DRAWING FILE USER WHERE THE SOURCE DRAWINGS ARE.
 *

 * THESE EXECS WERE CUSTOM WRITTEN FOR CUE BY:
 *

* MARK A. WELLS
 *

* THE CASSMAN GROUP
 * CUE ADMINISTRATIVE OFFICES
 *

* P .O. 3684
 *

* TORRANCE, CA 90510
 *

* OFFICE PHONE: (213) 534-4250 HOME PHONE: (213) 254-5478
 *

* IF YOU HAVE ANY QUESTIONS OR PROBLEMS WITH THESE EXECS PLEASE
 * CONTACT ME AT EITHER OF THE ABOVE TWO NUMBERS.
 *

* THANK YOU
 *

 * CHECK THE CALLING SEQUENCE. *

&IF &INDEX NE 3 &EXIT 16

* INITIALIZE INTERNAL VARIABLES. *

&CC = 0

* START THE BUILD PROCESS. *

VMFCLEAR

&FONTNAM = &CONCAT SYMTB &1

&SPACE 1

&TYPE BUILDING SYMBOL TABLE (&FONTNAM)

&SPACE 1

&TYPE THE SOURCE DRAWINGS WILL BE OBTAINED FROM: GROUP= &2 ,USER= &3

&SPACE 1

EXEC GMFSYMTB &2 &3 &FONTNAM 3 &FONTNAM INPUTA &FONTNAM INPUTB

&CC = &RETCODE

&SPACE 1

&TYPE ALL DONE WITH SYMBOL TABLE (&FONTNAM)

FILE: FONTBULD EXEC A1

VM/SP CONVERSATIONAL MONITOR SYSTEM

```

SPACE 1
EXIT ECC

```

```
*****
*                                     *
*                               END OF THE FONT BUILD EXEC.                               *
*                                     *
*****
```

&CONTROL CFF NOMSG

* THIS EXEC IS USED TO BUILD ANY ONE OR ALL OF THE CUE/GM FONT SYMBOL TABLES.

* THE EXEC MAY BE INVOKED WITH TWO OPTIONAL TOKENS. THESE TOKEN WOULD BE USED TO REDEFINE THE DRAWING FILE THE SOURCE DRAWINGS WILL BE PULLED FROM.

* TOKEN 1: THE CADAM DRAWING FILE GROUP THE SOURCE DRAWING CURRENTLY ARE LOCATED IN. THIS TOKEN MUST BE THE FIRST USED. IF NOT SUPPLIED THE EXEC WILL ASSUME THAT THE DRAWINGS ARE IN THE "CAD" DRAWING FILE.

* TOKEN 2: THE CADAM DRAWING FILE USER THE SOURCE DRAWING CURRENTLY ARE LOCATED IN. IF THIS TOKEN IS NEEDED THEN TOKEN 1 MUST BE SUPPLIED FIRST. IF NOT SUPPLIED THE EXEC WILL ASSUME THAT THE DRAWINGS ARE IN THE "GMFONT" USER.

THESE EXECS WERE CUSTOM WRITTEN FOR CUE BY:

MARK A. WELLS

THE CASSMAN GROUP
CUE ADMINISTRATIVE OFFICES

P.O. 3684

TORRANCE, CA 90510

OFFICE PHONE: (213) 534-4250 HOME PHONE: (213) 254-5478

IF YOU HAVE ANY QUESTIONS OR PROBLEMS WITH THESE EXECS PLEASE CONTACT ME AT EITHER OF THE ABOVE TWO NUMBERS.

THANK YOU

LOCAL VARIABLES.

&CC = 0

&FONTGRP = CAD

&FONTUSR = GMFONT

&DEFLP = GMFONTS

* CHECK FOR OPTIONAL INPUT TOKENS.

&IF &INDEX EQ 0 &GOTO -DIRECTSP

&IF &INDEX GT 2 &GOTO -DIRECTSP

&IF &INDEX GE 1 &FONTGRP = &1

&IF &INDEX EC 2 &FONTUSR = &2

* REDIRECT CONSOL AND PRINT FILES.

-DIRECTSP &CONTINUE

```

CP SP CONS STOP CLOSE
CP SP CONS START
CP SP PRT SYSTEM HOLD
*****
* GET THE CADSYMTB EXEC AND REDIRECT THE OUTPUT TO "GMFONTS LOADLIB" *
*****
EXEC GTCADSYM EDEFLM
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
*****
* DISPLAY AND PROCESS THE MAIN MENU SYOPTS. *
*****
-MAINMENU &CONTINUE
*****
* CLEAR ANYTHING THAT MAY BE LEFT IN *
* STACK. *
*****
&LOOP -STKCLR &READFLAG NE STACK
&READ VARS &XX
-STKCLR &CONTINUE
*****
* DISPLAY THE MAIN MENU. *
*****
VMFCLEAR
&BEGTYPE
*****
* BUILD THE FONT TABLES DGNATED TO CUE BY GENERAL MOTCRS INC. *
*****
O) REBUILD ALL FONT TABLES

1 ) BLUCK CONDENSED (UPPER CASE)    12 ) GREEK (UPPER CASE)
2 ) BLGCK CONDENSED (LOWER CASE)   13 ) GREEK (LOWER CASE)
3 ) BRUSH (UPPER CASE)             14 ) HELVETICA REG. (UPPER CASE)
4 ) BRUSH (LOWER CASE)             15 ) LEROY THIN (UPPER CASE)
5 ) CASLUN (UPPER CASE)            16 ) OLD ENGLISH (UPPER CASE)
6 ) CASLON (LOWER CASE)            17 ) OLD ENGLISH (LOWER CASE)
7 ) GATA (UPPER CASE)              18 ) PEIGNOT MEDIUM (UPPER CASE)
8 ) GATA (LOWER CASE)              19 ) PEIGNOT MEDIUM (LOWER CASE)
9 ) GM MICRO (UPPER CASE)          20 ) PLAYBILL (UPPER CASE)
10 ) GOTHIC (UPPER CASE)           21 ) PLAYBILL (LOWER CASE)
11 ) GCTHIC (LOWER CASE)          22 ) REBUILD THE FONT DISPLAY PAGE

&END
&SPACE 1
&TYPE C) CHANGE THE DEFAULT LOAD MODULE LIBRARY NAME. (&DEFLM LOADLIB)
&BEGTYPE
E ) EXIT THE FONT GENERATION SYSTEM.

PLEASE SELECT THE DESIRED OPTION:
&END
&READ VARS &IOPT
&IF .&IOPT EQ .0 &GOTO -SYOPT0
&IF .&IOPT EQ .1 &GOTO -SYOPT1
&IF .&IOPT EQ .2 &GOTO -SYOPT2
&IF .&IOPT EQ .3 &GOTO -SYOPT3
&IF .&IOPT EQ .4 &GOTO -SYOPT4

```

```

EIF .&ICPT EQ .5 EGOTO -SYOPT5
EIF .&ICPT EQ .6 EGOTO -SYOPT6
EIF .&ICPT EQ .7 EGOTO -SYOPT7
EIF .&ICPT EQ .8 EGOTO -SYOPT8
EIF .&ICPT EQ .9 EGOTO -SYOPT9
EIF .&ICPT EQ .10 EGOTO -SYOPT10
EIF .&ICPT EQ .11 EGOTO -SYOPT11
EIF .&ICPT EQ .12 EGOTO -SYOPT12
EIF .&ICPT EQ .13 EGOTO -SYOPT13
EIF .&ICPT EQ .14 EGOTO -SYOPT14
EIF .&ICPT EQ .15 EGOTO -SYOPT15
EIF .&ICPT EQ .16 EGOTO -SYOPT16
EIF .&ICPT EQ .17 EGOTO -SYOPT17
EIF .&ICPT EQ .18 EGOTO -SYOPT18
EIF .&ICPT EQ .19 EGOTO -SYOPT19
EIF .&ICPT EQ .20 EGOTO -SYOPT20
EIF .&ICPT EQ .21 EGOTO -SYOPT21
EIF .&ICPT EQ .22 EGOTO -SYOPT22
EIF .&ICPT EQ .C EGOTO -CHNGLM
EIF .&ICPT EQ .E EGOTO -ALLDONE
EGOTC -MAINMENU

```

```

*****
*                                     OPTION 0                                     *

```

```

* REBUILD ALL 19 OF THE FONT TABLES AND THE FONT PAGE. *

```

```

*****

```

```

-SYOPTO &CONTINUE

```

```

*****

```

```

* REBUILD "LEROY THIN" ( UPPER CASE ) "SYMTB100" *

```

```

*****

```

```

EXEC FONTBULD 100 &FONTGRP &FONTUSR

```

```

&IF &RETCCDE NE 0 &CC = &RETCCDE

```

```

&IF &CC NE 0 EGOTO -ERREXIT

```

```

*****

```

```

* REBUILD "PEIGNOT MEDIUM" ( UPPER CASE ) "SYMTB101" *

```

```

*****

```

```

EXEC FONTBULD 101 &FONTGRP &FONTUSR

```

```

&IF &RETCCDE NE 0 &CC = &RETCCDE

```

```

&IF &CC NE 0 EGOTO -ERREXIT

```

```

*****

```

```

* REBUILD "PEIGNOT MEDIUM" ( LOWER CASE ) "SYMTB102" *

```

```

*****

```

```

EXEC FONTBULD 102 &FONTGRP &FONTUSR

```

```

&IF &RETCCDE NE 0 &CC = &RETCCDE

```

```

&IF &CC NE 0 EGOTO -ERREXIT

```

```

*****

```

```

* REBUILD "DATA" ( UPPER CASE ) "SYMTB103" *

```

```

*****

```

```

EXEC FONTBULD 103 &FONTGRP &FONTUSR

```

```

&IF &RETCCDE NE 0 &CC = &RETCCDE

```

```

&IF &CC NE 0 EGOTO -ERREXIT

```

```

*****

```

```

* REBUILD "DATA" ( LOWER CASE ) "SYMTB104" *

```

```

*****

```

```

EXEC FONTBULD 104 &FONTGRP &FONTUSR

```

```

&IF &RETCCDE NE 0 &CC = &RETCCDE

```

```

&IF &CC NE 0 &GOTO -ERREXIT
*****
*      REBUILD "PLAYBILL" ( UPPER CASE ) "SYMTB105"      *
*****
EXEC FONTBULD 105 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
*****
*      REBUILD "PLAYBILL" ( LOWER CASE ) "SYMTB106"      *
*****
EXEC FONTBULD 106 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
*****
*      REBUILD "GM MICRO" ( UPPER CASE ) "SYMTB107"      *
*****
EXEC FONTBULD 107 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
*****
*      REBUILD "BRUSH" ( UPPER CASE ) "SYMTB108"        *
*****
EXEC FONTBULD 108 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
*****
*      REBUILD "BRUSH" ( LOWER CASE ) "SYMTB109"        *
*****
EXEC FONTBULD 109 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
*****
* REBUILD "BLOCK CONDENSED" ( UPPER CASE ) "SYMTB110" *
*****
EXEC FONTBULD 110 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
*****
* REBUILD "BLOCK CONDENSED" ( LOWER CASE ) "SYMTB111" *
*****
EXEC FONTBULD 111 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
*****
* REBUILD "OLD ENGLISH" ( UPPER CASE ) "SYMTB112"      *
*****
EXEC FONTBULD 112 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
*****
* REBUILD "OLD ENGLISH" ( LOWER CASE ) "SYMTB113"      *
*****
EXEC FONTBULD 113 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT

```



```

*****
*      REBUILD "GOTHIC" ( UPPER CASE ) "SYMTB114"      *
*****
EXEC FONTBULD 114 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
*****
*      REBUILD "GOTHIC" ( LOWER CASE ) "SYMTB115"      *
*****
EXEC FONTBULD 115 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
*****
*      REBUILD "GREEK" ( UPPER CASE ) "SYMTB116"      *
*****
EXEC FONTBULD 116 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
*****
*      REBUILD "GREEK" ( LOWER CASE ) "SYMTB117"      *
*****
EXEC FONTBULD 117 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
*****
*      REBUILD "CASLON" ( UPPER CASE ) "SYMTB118"      *
*****
EXEC FONTBULD 118 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
*****
*      REBUILD "CASLON" ( LOWER CASE ) "SYMTB119"      *
*****
EXEC FONTBULD 119 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
*****
* REBUILD "HELVETICA REG." ( UPPER CASE ) "SYMTB128" *
*****
EXEC FONTBULD 128 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&IF &CC NE 0 &GOTO -ERREXIT
&GOTO -MAINMNU
*****
*
*              OPTION 1
*
*      REBUILD "BLOCK CONDENSED" ( UPPER CASE ) "SYMTB110"
*****
-SYUPT1 &CONTINUE
EXEC FONTBULD 110 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTO -MAINMNU
*****
*
*              OPTION 2
*
*      REBUILD "BLOCK CONDENSED" ( LOWER CASE ) "SYMTB111"
*****

```

```
-SYOPT2 &CONTINUE
EXEC FONTBULD 111 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTO -MAINMNU
*****
*                               OPTION 3                               *
*       REBUILD "BRUSH" ( UPPER CASE ) "SYMTB108"                       *
*****
-SYOPT3 &CONTINUE
EXEC FONTBULD 108 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTO -MAINMNU
*****
*                               OPTION 4                               *
*       REBUILD "BRUSH" ( LOWER CASE ) "SYMTB109"                       *
*****
-SYOPT4 &CONTINUE
EXEC FONTBULD 109 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTO -MAINMNU
*****
*                               OPTION 5                               *
*       REBUILD "CASLON" ( UPPER CASE ) "SYMTB118"                      *
*****
-SYOPT5 &CONTINUE
EXEC FONTBULD 118 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTO -MAINMNU
*****
*                               OPTION 6                               *
*       REBUILD "CASLON" ( LOWER CASE ) "SYMTB119"                      *
*****
-SYOPT6 &CONTINUE
EXEC FONTBULD 119 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTO -MAINMNU
*****
*                               OPTION 7                               *
*       REBUILD "DATA" ( UPPER CASE ) "SYMTB103"                        *
*****
-SYOPT7 &CONTINUE
EXEC FONTBULD 103 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTO -MAINMNU
*****
*                               OPTION 8                               *
*       REBUILD "DATA" ( LOWER CASE ) "SYMTB104"                        *
*****
-SYOPT8 &CONTINUE
EXEC FONTBULD 104 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTO -MAINMNU
*****
*                               OPTION 9                               *
*       REBUILD "GM MICRO" ( UPPER CASE ) "SYMTB107"                    *
```

```

*****
-SYOPT9 &CONTINUE
EXEC FCNTBULD 107 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTC -MAINMNU
*****
*
*               OPTION 10
*
*       REBUILD "GOTHIC" ( UPPER CASE ) "SYMTB114"
*
*****
-SYOPT10 &CONTINUE
EXEC FCNTBULD 114 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTC -MAINMNU
*****
*
*               OPTION 11
*
*       REBUILD "GOTHIC" ( LOWER CASE ) "SYMTB115"
*
*****
-SYOPT11 &CONTINUE
EXEC FCNTBULD 115 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTC -MAINMNU
*****
*
*               OPTION 12
*
*       REBUILD "GREEK" ( UPPER CASE ) "SYMTB116"
*
*****
-SYOPT12 &CONTINUE
EXEC FCNTBULD 116 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTC -MAINMNU
*****
*
*               OPTION 13
*
*       REBUILD "GREEK" ( LOWER CASE ) "SYMTB117"
*
*****
-SYOPT13 &CONTINUE
EXEC FCNTBULD 117 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTC -MAINMNU
*****
*
*               OPTION 14
*
*       REBUILD "HELVETICA REG." ( UPPER CASE ) "SYMTB128"
*
*****
-SYOPT14 &CONTINUE
EXEC FCNTBULD 128 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTC -MAINMNU
*****
*
*               OPTION 15
*
*       REBUILD "LEROY THIN" ( UPPER CASE ) "SYMTB100"
*
*****
-SYOPT15 &CONTINUE
EXEC FONTBULD 100 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTC -MAINMNU
*****
*
*               OPTION 16
*

```

```

*          REBUILD "OLD ENGLISH" ( UPPER CASE ) "SYMTB112"
*****
-SYOPT16 &CONTINUE
EXEC FONTBULD 112 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTO -MAINMAU
*****
*
*          OPTION 17
*          REBUILD "OLD ENGLISH" ( LOWER CASE ) "SYMTB113"
*****
-SYOPT17 &CONTINUE
EXEC FONTBULD 113 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTO -MAINMNU
*****
*
*          OPTION 18
*          REBUILD "PEIGNOT MEDIUM" ( UPPER CASE ) "SYMTB101"
*****
-SYOPT18 &CONTINUE
EXEC FONTBULD 101 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTO -MAINMNU
*****
*
*          OPTION 19
*          REBUILD "PEIGNOT MEDIUM" ( LOWER CASE ) "SYMTB102"
*****
-SYOPT19 &CONTINUE
EXEC FONTBULD 102 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTO -MAINMNU
*****
*
*          OPTION 20
*          REBUILD "PLAYBILL" ( UPPER CASE ) "SYMTB105"
*****
-SYOPT20 &CONTINUE
EXEC FONTBULD 105 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTO -MAINMNU
*****
*
*          OPTION 21
*          REBUILD "PLAYBILL" ( LOWER CASE ) "SYMTB106"
*****
-SYOPT21 &CONTINUE
EXEC FONTBULD 106 &FONTGRP &FONTUSR
&IF &RETCCDE NE 0 &CC = &RETCCDE
&GOTO -MAINMNU
*****
*
*          OPTION 22
*          REBUILD FONT DISPLAY PAGE.
*****
-SYOPT22 &CONTINUE
VMFCLEAR
&SPACE 1
&TYPE BUILDING FONT DISPLAY PAGE.
&SPACE 1

```

&TYPE SOURCE DRAWINGS OBTAINED FROM: GROUP= &FONTGRP ,USER= &FONTUSR
 &SPACE 1

EXEC GMFSYMTB &FONTGRP &FONTUSR FONTABLS 2 FONTABLS INPUT

&CC = &RETCODE

&SPACE 1

&TYPE ALL DONE WITH FONT DISPLAY PAGE.

&SPACE 1

&GOTO -MAINMNU

 * CHANGE THE DEFAULT LOAD MODULE LIBRARY NAME FROM "GMFONTS LOADLIB" *
 * TO THE NAME SUPPLIED TO BY THE INSTALLATION PROGRAMMER. *

-CHNGLM &CONTINUE

VMFCLEAR

&SPACE 1

&BEGTYPE

PLEASE ENTER THE FILE NAME OF THE LOAD MODULE LIBRARY THE FONTS ARE
 TO BE PLACED IN?

(FILE NAME / CANCEL / EXIT)

&END

&SPACE 1

&READ VARS &D

&IF .&D EQ .C &GOTO -MAINMNU

&IF .&D EQ .CANCEL &GOTO -MAINMNU

&IF .&D EQ .E &GOTO -ALLDONE

&IF .&D EQ .EXIT &GOTO -ALLDONE

&DEFLM = &D

EXEC GTCADSYM &DEFLM

&IF &RETCODE NE 0 &CC = &RETCODE

&IF &CC NE 0 &GOTO -ERREXIT

&GOTO -MAINMNU

*

* CLEAN UP AND EXIT THE FONT BUILD EXEC. *

*

-ALLDONE &CONTINUE

&IF &CC NE 0 &GOTO -ERREXIT

VMFCLEAR

&SPACE 4

&BEGTYPE

END OF FONT GENERATION SYSTEM.

THANK YOU.....

&END

&SPACE 4

&XX = &CCNCAT R (&CC) ;

&TYPE &XX

STATE GMFSYMTB EXEC A

&IF &RETCODE EQ 0 ERASE GMFSYMTB EXEC A

CP SP CONS STOP CLOSE

CP SP CONS START

&EXIT &CC

```
*****
*          CLEAN UP AND EXIT THE FONT BUILD EXEC WITH ANN ERRGR.          *
*****
-ERREXIT &CONTINUE
VMFCLEAR
&SPACE 4
&BEGTYPE
```

EXITING THE FONT GENERATION SYSTEM WITH AN ERROR.

THANK YOU.....

```
&END
&SPACE 4
&XX = &CUNCAT R ( &CC ) ;
&TYPE &XX
STATE GMFSYMTB EXEC A
&IF &RETCODE EQ 0 ERASE GMFSYMTB EXEC A
CP SP CONS STCP CLOSE
CP SP CONS START
&EXIT &CC
```

```
*****
*
*          END OF THE MAIN FONT BUILD EXEC.          *
*
*****
```

6CENTRCL CFF NOMSG

THIS EXEC IS USED TO CHANGE THE "SYSLMOD" STATEMENT IN THE CADAM
SUPPLIED "CAOSYMTB EXEC".

THESE EXECS WERE CUSTOM WRITTEN FOR CUE BY:

MARK A. WELLS

THE CASSMAN GROUP
CUE ADMINISTRATIVE OFFICES
P.O. 3684

OFFICE PHONE: (213) 534-4250 HOME PHONE: (213) 254-5478

IF YOU HAVE ANY QUESTIONS OR PROBLEMS WITH THESE EXECS PLEASE
CONTACT ME AT EITHER OF THE ABOVE TWO NUMBERS.

THANK YOU

YMF CLEAR

EBEGTYPE

[illegible]

PLEASE WAIT.

ΞΕΝΟ

IS A GMFSYMT8 EXEC AVAILABLE.
IF SO ERASE IT!

-CHKSYNEX &CONTINUE

STATE GMFSYMTB EXEC A

```

EIF ERETCODE EQ 0 ERASE GMFSYMTB EXEC A

```

IS A CADSYMTB EXEC AVAILABLE.

-CHKSYNEX ECGNTINUE

STATE CADSYMTB EXEC *

```
&IF &RETCODE EQ 0 &GOTO -COPYIT
```

REPORT THAT A "CADSYMTB EXEC" WAS
NOT FOUND:

-CDSYMERR & CONTINUE

CP SLEEP 5 SEC

VMFCLEAR

6 SPACES

6 DECTYPE

[illegible]

FILE: GTCADSYM EXEC A1

VM/SP CONVERSATIONAL MONITOR SYSTEM

A "CAOSYMTB EXEC" WAS NOT FOUND.

PLEASE LINK TO THE CADAM CODE MACHINE THAT CONTAINS THE ABOVE EXEC.

(PRESS <ENTER> TO EXIT)

```
&END
&SPACE 5
&READ VARS &XX
&IF .&XX EQ . &EXIT 16
&GOTO -COSYMERR
*****
*      DO THE COPY AND RENAME THE.      *
*****
-COPYIT &CONTINUE
COPY CAOSYMTB EXEC * GMFSYMTB EXEC A
*****
*      CALL XEDIT IN THE BACKGROUND THE REDIRECT THE FONT OUTPUT.      *
*****
&BEGSTACK
SET EMSG OFF
/SYSLMCO
DEL
DEL
U 1
GET GTCADSYM DATA A
TOP
&END
&STACK C/ XXXX / &1 /* *
&STACK SET EMSG ON
&STACK FFILE
XEDIT GMFSYMTB EXEC A
&EXIT C
*****
*      END OF THE GTCADSYM EXEC.      *
*****
```


FILE: GTCADSYM DATA

A1

VM/SP CONVERSATIONAL MONITOR SYSTEM

```
*****0002950
*
* THE FOLLOWING CARDS WERE ADDED TO THE CADSYMTB EXEC TO CHANGE 0002950
* LOADLIB THE LINKAGE EDITOR WILL USE AS OUTPUT FOR FINISHED FONT 0002950
* TABLES. 0002950
* 0002950
*****0002950
FILEDEF SYSLMOD DISK XXXX LOADLIB A ( RECFM U EBL 6150 0002950
LKED E3 ( LIST LET MAP PRINT NCAL NAME E3 LIBE XXXX 0002960
```

APPENDIX C

CONSOLE LISTING
FOR THE
TAPE BUILD

DEV 101 UGES NOT EXIST

VIRTUAL TAPE DRIVE 101 DOES NOT EXIST.
PLEASE ATTACH THE TAPE DRIVE AND SELECT ONE OF THE FOLLOWING OPTIONS:

(CONTINUE / C / EXIT / E)

TAPE 101 ATTACHED
CONTINUE
TAPE 101 ON TAPE 200

>>>> LOADING TO TAPE THE CUE/CM FONT SOURCE DRAWINGS. <<<<

EXECUTION BEGINS...

CADSEC SEGMENT BOUNDARIES-00020000 00021FFF.

CADAM SEGMENT NOW LOADED.

INVALID CLEAR REQUEST.

EXECUTION BEGINS...

PLEASE MOUNT VOL UNKNOWN ON 200

EXECUTION BEGINS...

>>>> LOADING TO TAPE THE INSTALLATION AND PRODUCTION EXECs. <<<<

DUMPING.....

CHKCHAR EXEC A1

DUMPING.....

FIAPBLD EXEC A1

DUMPING.....

FONTBULD EXEC A1

DUMPING.....

FONTPAST EXEC A1

DUMPING.....

FONTPAIN EXEC A1

DUMPING.....

GTCAOSYM DATA A1

DUMPING.....

GTCAOSYM EXEC A1

>>>> LOADING TO TAPE THE CUE/CM FONT SOURCE FILES. <<<<

DUMPING.....

FONTPAOLS INPUT A1

DUMPING.....

SYN10100 INPUTA A2

SYN10101 INPUTA A2

SYN10102 INPUTA A2

SYN10103 INPUTA A2

SYN10104 INPUTA A2

SYN10105 INPUTA A2

SYN10106 INPUTA A2

SYN10107 INPUTA A2

SYN10108 INPUTA A2

SYN10109 INPUTA A2

SYN10110 INPUTA A2

SYN10111 INPUTA A2

SYN10112 INPUTA A2

SYN10113 INPUTA A2

SYN10114 INPUTA A2

SYN10115 INPUTA A2

SYN10116 INPUTA A2

SYMB117 INPUTA A2
SYMB118 INPUTA A2
SYMB119 INPUTA A2
DUMPING.....
SYMB100 INPUTB A2
SYMB101 INPUTB A2
SYMB102 INPUTB A2
SYMB103 INPUTB A2
SYMB104 INPUTB A2
SYMB105 INPUTB A2
SYMB106 INPUTB A2
SYMB107 INPUTB A2
SYMB108 INPUTB A2
SYMB109 INPUTB A2
SYMB110 INPUTB A2
SYMB111 INPUTB A2
SYMB112 INPUTB A2
SYMB113 INPUTB A2
SYMB114 INPUTB A2
SYMB115 INPUTB A2
SYMB116 INPUTB A2
SYMB117 INPUTB A2
SYMB118 INPUTB A2
SYMB119 INPUTB A2

>>>> LOADING TO TAPE THE CUE/GN FONT ASSEMBLY SOURCE FILES. <<<<

DUMPING.....
FONTABLS ASSEMBLE A1
SYMB100 ASSEMBLE A1
SYMB101 ASSEMBLE A1
SYMB102 ASSEMBLE A1
SYMB103 ASSEMBLE A1
SYMB104 ASSEMBLE A1
SYMB105 ASSEMBLE A1
SYMB106 ASSEMBLE A1
SYMB107 ASSEMBLE A1
SYMB108 ASSEMBLE A1
SYMB109 ASSEMBLE A1
SYMB110 ASSEMBLE A1
SYMB111 ASSEMBLE A1
SYMB112 ASSEMBLE A1
SYMB113 ASSEMBLE A1
SYMB114 ASSEMBLE A1
SYMB115 ASSEMBLE A1
SYMB116 ASSEMBLE A1
SYMB117 ASSEMBLE A1
SYMB118 ASSEMBLE A1
SYMB119 ASSEMBLE A1

>>>> LOADING TO TAPE THE CUE/GN FONT TEXT DECKS. <<<<

DUMPING.....
FONTABLS TEXT A1
SYMB119 TEXT A1
SYMB100 TEXT A1
SYMB101 TEXT A1
SYMB102 TEXT A1
SYMB103 TEXT A1
SYMB104 TEXT A1


```

23 F-OLD ENGLISH 112 UC 05254 GNFONT FONT - "OLD ENGLISH" UPPER CASE
24 F-OLD ENGLISH 112NUM 05254 GNFONT FONT - "OLD ENGLISH" UPPER CASE
25 F-OLD ENGLISH 113 LC 05254 GNFONT FONT - "OLD ENGLISH" LOWER CASE
26 F-PEIGNOT MED 101 UC 05254 GNFONT FONT - "PEIGNOT MEDIUM" UPPER CASE
27 F-PEIGNOT MED 101NUM 05254 GNFONT FONT - "PEIGNOT MEDIUM" NUMBERS
28 F-PEIGNOT MED 102 LC 05254 GNFONT FONT - "PEIGNOT MEDIUM" LOWER CASE
29 F-PLAYBILL 105 UC 05254 GNFONT FONT - "PLAYBILL" UPPER CASE
30 F-PLAYBILL 105NUM 05254 GNFONT FONT - "PLAYBILL" NUMBERS
31 F-PLAYBILL 106 LC 05254 GNFONT FONT - "PLAYBILL" LOWER CASE
32 FONTPAGE 03343 GNFONT FONT TABLE PAGE

END OF LIST
END OF JOB

```

>>>> FAST FORWARDING THE TAPE TO THE EXECS. <<<<

>>>> SCANNING THE TAPE FOR THE INSTALLATION AND PRODUCTION EXECS. <<<<

```

SCANNING.....
CHKCHAR EXEC A1
FTAPEBLD EXEC A1
FONTBLD EXEC A1
FONTINST EXEC A1
FONTAIRM EXEC A1
GICADSYN DATA A1
GICADSYN EXEC A1
END-OF-FILE OR END-OF-TAPE

```

>>>> SCANNING THE TAPE FOR THE FONT SOURCE FILES. <<<<

```

SCANNING.....
FONTBLS INPUT A1
SYN1000 INPUT A2
SYN1010 INPUT A2
SYN1011 INPUT A2
SYN1012 INPUT A2
SYN1013 INPUT A2
SYN1014 INPUT A2
SYN1015 INPUT A2
SYN1016 INPUT A2
SYN1017 INPUT A2
SYN1018 INPUT A2
SYN1019 INPUT A2
SYN1020 INPUT A2
SYN1021 INPUT A2
SYN1022 INPUT A2
SYN1023 INPUT A2
SYN1024 INPUT A2
SYN1025 INPUT A2
SYN1026 INPUT A2
SYN1027 INPUT A2
SYN1028 INPUT A2
SYN1029 INPUT A2
SYN1030 INPUT A2
SYN1031 INPUT A2
SYN1032 INPUT A2
SYN1033 INPUT A2
SYN1034 INPUT A2
SYN1035 INPUT A2
SYN1036 INPUT A2
SYN1037 INPUT A2
SYN1038 INPUT A2
SYN1039 INPUT A2
SYN1040 INPUT A2
SYN1041 INPUT A2
SYN1042 INPUT A2
SYN1043 INPUT A2
SYN1044 INPUT A2
SYN1045 INPUT A2
SYN1046 INPUT A2
SYN1047 INPUT A2

```

```

ECC450937
ECC450937
ECC450937
ECC450938
ECC450938
ECC450938
ECC450939
ECC450939
ECC450940
DVECC450949

```

SYMBOL09 INPUT# A2
SYMBOL09 INPUT# A2
SYMBOL10 INPUT# A2
SYMBOL11 INPUT# A2
SYMBOL12 INPUT# A2
SYMBOL13 INPUT# A2
SYMBOL14 INPUT# A2
SYMBOL15 INPUT# A2
SYMBOL16 INPUT# A2
SYMBOL17 INPUT# A2
SYMBOL18 INPUT# A2
SYMBOL19 INPUT# A2
END-OF-FILE OR END-OF-TAPE

>>>> SCANNING THE TAPE FOR THE FONT ASSEMBLY SOURCE FILES. <<<<

SCANNING.....
FONTABLES ASSEMBLE A1:
SYMBOL00 ASSEMBLE A1
SYMBOL01 ASSEMBLE A1
SYMBOL02 ASSEMBLE A1
SYMBOL03 ASSEMBLE A1
SYMBOL04 ASSEMBLE A1
SYMBOL05 ASSEMBLE A1
SYMBOL06 ASSEMBLE A1
SYMBOL07 ASSEMBLE A1
SYMBOL08 ASSEMBLE A1
SYMBOL09 ASSEMBLE A1
SYMBOL10 ASSEMBLE A1
SYMBOL11 ASSEMBLE A1
SYMBOL12 ASSEMBLE A1
SYMBOL13 ASSEMBLE A1
SYMBOL14 ASSEMBLE A1
SYMBOL15 ASSEMBLE A1
SYMBOL16 ASSEMBLE A1
SYMBOL17 ASSEMBLE A1
SYMBOL18 ASSEMBLE A1
SYMBOL19 ASSEMBLE A1
END-OF-FILE OR END-OF-TAPE

>>>> SCANNING THE TAPE FOR THE FONT TEXT DECKS. <<<<

SCANNING.....
FONTABLES TEXT A1
SYMBOL19 TEXT A1
SYMBOL00 TEXT A1
SYMBOL01 TEXT A1
SYMBOL02 TEXT A1
SYMBOL03 TEXT A1
SYMBOL04 TEXT A1
SYMBOL05 TEXT A1
SYMBOL06 TEXT A1
SYMBOL07 TEXT A1
SYMBOL08 TEXT A1
SYMBOL09 TEXT A1
SYMBOL10 TEXT A1
SYMBOL11 TEXT A1
SYMBOL12 TEXT A1
SYMBOL13 TEXT A1
SYMBOL14 TEXT A1

SYMBOL15 TEXT AI
SYMBOL16 TEXT AI
SYMBOL17 TEXT AI
SYMBOL18 TEXT AI
END-OF-FILE OR END-OF-TAPE

>>>> SCANNING THE TAPE FOR THE FONT LOADLIB. <<<<

SCANNING.....
CMFONT5 LOADLIB AI
END-OF-FILE OR END-OF-TAPE

>>>> SCANNING THE TAPE FOR THE LAST TAPE MARK. <<<<

SCANNING.....
END-OF-FILE OR END-OF-TAPE

CREATE TAPE LABEL

CMFONT

** LABEL COMPLETED **

REL19.20 THURSDAY 1/09/86 12.40.34 PAGE 1

THE FOLLOWING DRAWINGS HAVE BEEN UNLOADED ON TAPE CNFONT

REL19.20 THURSDAY 1/09/86 12.40.50 PAGE 1

*** USER ID CNFONT CUE FONTS *** GROUP CAD ***

1 F-BLOCK COND 110 UC
2 F-BLOCK COND 110NUM
3 F-BLOCK COND 111 LC
4 F-BRUSH 100 UC
5 F-BRUSH 100NUM
6 F-BRUSH 109 LC
7 F-CASLON 110 UC
8 F-CASLON 110NUM
9 F-CASLON 119 LC
10 F-DATA 103 UC
11 F-DATA 103NUM
12 F-DATA 104 LC
13 F-GA MICRO 107 UC
14 F-GA MICRO 107NUM
15 F-GOTHIC 114 UC
16 F-GOTHIC 114NUM
17 F-GOTHIC 115 LC
18 F-GREEK 116 UC
19 F-GREEK 117 LC
20 F-HLVITICA MED 120 UC
21 F-LEUTY 1 100 UC
22 F-LEUTY 1 100NUM
23 F-OLD ENGLISH 112 UC
24 F-OLD ENGLISH 112NUM
25 F-OLD ENGLISH 113 LC
26 F-PEIGNOT MED 101 UC
27 F-PEIGNOT MED 101NUM
28 F-PEIGNOT MED 102 LC
29 F-PLAYBILL 105 UC
30 F-PLAYBILL 105NUM
31 F-PLAYBILL 106 LC
32 FONTPAGE

32 DRAWINGS UNLOADED FOR CNFONT CUE FONTS

SORTLIST

REL19-20 THURSDAY 1/09/86 12.42.43 PAGE 1

TAPE PCS	DRAWING ID	DATE	TAPEID	USER	TEXT	
XXXXX	XXXXXXXXXXXXXXXXXXXX	XXXX	XXXXX	XXXXX	XX	XXXXXXXXXXXXXXXXXXXX
1	F-BLOCK COND 110 UC	8254	GMFONT	GMFONT	FONT - "BLUCK CONDENSED" (UPPER CASE)	EC450924
2	F-BLOCK COND 110NUN	8254	GMFONT	GMFONT	FONT - "BLUCK CONDENSED" (NUMBERS)	EC450924
3	F-BLOCK COND 111 LC	8254	GMFONT	GMFONT	FONT - "BLUCK CONDENSED" (LOWER CASE)	EC450925
4	F-BRUSH 108 UC	8254	GMFONT	GMFONT	FONT - "BRUSH" UPPER CASE	EC450925
5	F-BRUSH 108NUN	8254	GMFONT	GMFONT	FONT - "BRUSH" NUMBERS	EC450926
6	F-BRUSH 109 LC	8254	GMFONT	GMFONT	FONT - "BRUSH" LOWER CASE	EC450926
7	F-CASLON 118 UC	8254	GMFONT	GMFONT	FONT - "SERIF" UPPER CASE	EC450927
8	F-CASLON 118NUN	8254	GMFONT	GMFONT	FONT - "SERIF" NUMBERS	EC450927
9	F-CASLON 119 LC	8254	GMFONT	GMFONT	FONT - "SERIF" LOWER CASE	EC450927
10	F-DATA 103 UC	8254	GMFONT	GMFONT	FONT - "DATA" UPPER CASE	EC450927
11	F-DATA 103NUN	8254	GMFONT	GMFONT	FONT - "DATA" NUMBERS	EC450928
12	F-DATA 104 LC	8254	GMFONT	GMFONT	FONT - "DATA" LOWER CASE	EC450928
13	F-GA MICRO 107 UC	8254	GMFONT	GMFONT	FONT - "GA MICRO" UPPER CASE	EC450928
14	F-GA MICRO 107NUN	8254	GMFONT	GMFONT	FONT - "GA MICRO" NUMBERS	EC450928
15	F-GOTHIC 114 UC	8254	GMFONT	GMFONT	FONT - "GOTHIC" - UPPER CASE	EC450932
16	F-GOTHIC 114NUN	8254	GMFONT	GMFONT	FONT - "GOTHIC" - NUMBERS	EC450932
17	F-GOTHIC 115 LC	8254	GMFONT	GMFONT	FONT - "GOTHIC" LOWER CASE	EC450933
18	F-GREEK 116 UC	8254	GMFONT	GMFONT	FONT - "GREEK" - UPPER CASE	EC450934
19	F-GREEK 117 LC	8254	GMFONT	GMFONT	FONT - "GREEK" LOWER CASE	EC450935
20	F-HELVEICA MED 124 UC	8254	GMFONT	GMFONT	FONT - "HELVEICA MEDIUM" UPPER CASE	EC450935
21	F-LEROY 1 100 UC	8254	GMFONT	GMFONT	FONT - "LEROY THIN" UPPER CASE	EC450936
22	F-LEROY 1 100NUN	8254	GMFONT	GMFONT	FONT - "LEROY THIN" NUMBERS	EC450936
23	F-OLD ENGLISH 112 UC	8254	GMFONT	GMFONT	FONT - "OLD ENGLISH" UPPER CASE	EC450937
24	F-OLD ENGLISH 112NUN	8254	GMFONT	GMFONT	FONT - "OLD ENGLISH" LOWER CASE	EC450937
25	F-OLD ENGLISH 113 LC	8254	GMFONT	GMFONT	FONT - "OLD ENGLISH" UPPER CASE	EC450937
26	F-PEIGNOT MED 101 UC	8254	GMFONT	GMFONT	FONT - "PEIGNOT MEDIUM" UPPER CASE	EC450938
27	F-PEIGNOT MED 101NUN	8254	GMFONT	GMFONT	FONT - "PEIGNOT MEDIUM" NUMBERS	EC450938
28	F-PEIGNOT MED 102 LC	8254	GMFONT	GMFONT	FONT - "PEIGNOT MEDIUM" LOWER CASE	EC450939
29	F-PLAYBILL 105 UC	8254	GMFONT	GMFONT	FONT - "PLAYBILL" UPPER CASE	EC450939
30	F-PLAYBILL 105NUN	8254	GMFONT	GMFONT	FONT - "PLAYBILL" NUMBERS	EC450940
31	F-PLAYBILL 106 LC	8254	GMFONT	GMFONT	FONT - "PLAYBILL" LOWER CASE	EC450940
32	FONTPAGE	8254	GMFONT	GMFONT	FONT TABLE PAGE	OV450949

32 DRAWINGS HAVE BEEN LISTED

END OF LIST

END OF JOB

APPENDIX D

CONSOLE LISTING
FOR A
SAMPLE EXEC UNLOAD

```

R; T=C.01/0.01 13:04:22
R; T=C.01/0.01 13:04:43
*
*
*
*   SAMPLE UNLOAD OF THE INSTALLATION AND PRODUCTION EXECS
*   CONTAINED ON THE G*FCNT DISTRIBUTION TAPE.
*
*
TAPE 181 ATTACHED
*
TAPE REW
R; T=C.02/0.05 13:06:34
*
TAPE FSF 1
R; T=C.01/0.02 13:07:12
*
VMEPLC2 LOAD * * A
LOADING.....
CHKCHAR EXEC      A1
FTAPEBLD EXEC     A1
FONTBULD EXEC     A1
FONTINST EXEC     A1
FONTMAIN EXEC     A1
GTCAOSYM DATA    A1
GTCAOSYM EXEC     A1
END-OF-FILE OR END-OF-TAPE
R; T=C.29/0.91 13:08:08
*
*
*   INVOKE THE INSTALLATION EXEC
*
*
FCNTINST

```

APPENDIX E

Console Listing

from a

Sample Install

TAPE 101 ON TAPE 200

DO YOU WISH TO INSTALL THE TAPE OF CHARACTER FONTS DONATED TO
CUE BY GENERAL MOTORS INC?

(N / N / YES / Y / RESTART AT PROCEDURE NUMBER 1-5)

YES

PROCEDURE 1.0

WHAT DRAWING FILE >>>> GROUP <<<< DO YOU WANT TO RESTORE THE
FONT SOURCE DRAWINGS TO?

(GROUP NAME / <ENTER> FOR DEFAULT / RETURN / R) DEFAULT = CAD

CAD

PROCEDURE 1.1

WHAT DRAWING FILE >>>> USER <<<< DO YOU WANT TO RESTORE THE
FONT SOURCE DRAWINGS TO?

(GROUP NAME / <ENTER> FOR DEFAULT / RETURN / R) DEFAULT = GNFONT

TEST

>>>> NOW RESTORING THE GR FONT SOURCE DRAWINGS. <<<<

EXECUTION BEGINS...

CADSEC SEGMENT BOUNDARIES-C0020000 00021FFF.

CADAR SEGMENT NOW LOADED.

INVALID CLEAN REQUEST.

EXECUTION BEGINS...

PLEASE MOUNT VOL UNKNOWN ON 200

EXECUTION BEGINS...

*** GROUP CAD ***

REL19.20 THURSDAY 1/09/86 13.09.52 PAGE 1

THE FOLLOWING DRAWINGS HAVE BEEN ADDED TO THE DRAWING FILE FROM TAPE GNFONT

POSTI	DRAWING ID	USER	FILE DATE
XXXX	XXXXXXXXXXXXXXXXXXXX	XXXXX	XXXXX

1	F-BLOCK COND	110 UC TEST	05254
2	F-BLOCK COND	110MUM TEST	05254
3	F-BLOCK COND	111 LC TEST	05254
4	F-BRUSH	108 UC TEST	05254
5	F-BRUSH	109MUM TEST	05254
6	F-BRUSH	109 LC TEST	05254
7	F-CASLOW	110 UC TEST	05254
8	F-CASLOW	110MUM TEST	05254
9	F-CASLOW	111 LC TEST	05254


```

10 F-DATA      103 UC TEST      05254
11 F-DATA      103MUM TEST      05254
12 F-DATA      104 LC TEST      05000
13 F-CM MICRO   107 UC TEST      05254
14 F-CM MICRO   107MUM TEST      05254
15 F-GUIMIC     114 UC TEST      05254
16 F-GUIMIC     114MUM TEST      05254
17 F-GUIMIC     115 LC TEST      05254
18 F-GUIMIC     115 UC TEST      05254
19 F-GUIMIC     116 LC TEST      05254
20 F-GUIMIC     116 UC TEST      05254
21 F-GUIMIC     117 LC TEST      05254
22 F-GUIMIC     117 UC TEST      05254
23 F-GUIMIC     118 LC TEST      05254
24 F-GUIMIC     118 UC TEST      05254
25 F-GUIMIC     119 LC TEST      05254
26 F-GUIMIC     119 UC TEST      05254
27 F-GUIMIC     120 LC TEST      05254
28 F-GUIMIC     120 UC TEST      05254
29 F-GUIMIC     121 LC TEST      05254
30 F-GUIMIC     121 UC TEST      05254
31 F-GUIMIC     122 LC TEST      05254
32 F-GUIMIC     122 UC TEST      05254
33 FONTAGE

```

32 DRAWINGS HAVE BEEN ADDED TO THE DRAWING FILE FROM TAPE CMFONT
END OF JOB

PROCEDURE 2.0

DO YOU WANT TO UNLOAD THE FONT SOURCE DATA? THIS DATA IS USED AS
INPUT TO THE CADAM SUPPLIED "CADSYMB EXEC" AND IS REQUIRED
IF YOU INTEND TO REBUILD THE CM FONTS!

(YES / Y / NO / N / RETURN / R)

YES

>>>> REMINDING THE CUE/CM FONT TAPE. <<<<

>>>> FAST FORWARDING THE CUE/CM FONT TAPE TO THE CORRECT LOCATION. <<<<

>>>> NOW UNLOADING THE CUE/CM FONT SOURCE DECKS. <<<<

```

LOADING-----
FONTABLES INPUT  A1
SYMB100 INPUTA  A2
SYMB101 INPUTA  A2
SYMB102 INPUTA  A2
SYMB103 INPUTA  A2
SYMB104 INPUTA  A2
SYMB105 INPUTA  A2
SYMB106 INPUTA  A2
SYMB107 INPUTA  A2
SYMB108 INPUTA  A2
SYMB109 INPUTA  A2
SYMB110 INPUTA  A2
SYMB111 INPUTA  A2

```

```

SYMB112 INPUTA A2
SYMB113 INPUTA A2
SYMB114 INPUTA A2
SYMB115 INPUTA A2
SYMB116 INPUTA A2
SYMB117 INPUTA A2
SYMB118 INPUTA A2
SYMB119 INPUTA A2
SYMB120 INPUTA A2
SYMB121 INPUTA A2
SYMB122 INPUTA A2
SYMB123 INPUTA A2
SYMB124 INPUTA A2
SYMB125 INPUTA A2
SYMB126 INPUTA A2
SYMB127 INPUTA A2
SYMB128 INPUTA A2
SYMB129 INPUTA A2
SYMB130 INPUTA A2
SYMB131 INPUTA A2
SYMB132 INPUTA A2
SYMB133 INPUTA A2
SYMB134 INPUTA A2
SYMB135 INPUTA A2
SYMB136 INPUTA A2
SYMB137 INPUTA A2
SYMB138 INPUTA A2
SYMB139 INPUTA A2
SYMB140 INPUTA A2
END-OF-FILE OR END-OF-TAPE

```

PROCEDURE 3.0

DO YOU WANT TO UNLOAD THE FONT ASSEMBLY SOURCES? THIS DATA WAS GENERATED
 BY THE CADAM SUPPLIED I CADSYNTO EXEC 3 AND USED THE SOURCE DRAWINGS
 FROM PROCEDURE 1.0 AND THE SOURCE DECKS FROM PROCEDURE 2.0 AS INPUT.

I YES / Y / NO / N / RETURN / R I

YES

>>>> NOW UNLOADING THE CUE/GM FONT ASSEMBLY SOURCE FILES. <<<<

```

LOADING.....
FONTABLES ASSEMBLE A1
SYMB100 ASSEMBLE A1
SYMB101 ASSEMBLE A1
SYMB102 ASSEMBLE A1
SYMB103 ASSEMBLE A1
SYMB104 ASSEMBLE A1
SYMB105 ASSEMBLE A1
SYMB106 ASSEMBLE A1
SYMB107 ASSEMBLE A1
SYMB108 ASSEMBLE A1
SYMB109 ASSEMBLE A1
SYMB110 ASSEMBLE A1
SYMB111 ASSEMBLE A1
SYMB112 ASSEMBLE A1

```

SYMB113 ASSEMBLE AI
SYMB114 ASSEMBLE AI
SYMB115 ASSEMBLE AI
SYMB116 ASSEMBLE AI
SYMB117 ASSEMBLE AI
SYMB118 ASSEMBLE AI
SYMB119 ASSEMBLE AI
END-OF-FILE OR END-OF-TAPE

PROCEDURE 4.0

DO YOU WANT TO UNLOAD THE FONT TEXT DECKS? THE TEXT DECKS WERE GENERATED
USING THE VN/SP RELEASE 3 SYSTEM ASSEMBLE AND USED THE SOURCE ASSEMBLY
ROUTINES FROM STEP 3.0 AS INPUT.

1 YES / Y / NO / N / RETURN / R 1

YES

>>>> NOW UNLOADING THE PRE-ASSEMBLED CUE/GM FONT DECKS. <<<<

LOADING.....
FONTABLES TEXT AI
SYMB119 TEXT AI
SYMB120 TEXT AI
SYMB121 TEXT AI
SYMB122 TEXT AI
SYMB123 TEXT AI
SYMB124 TEXT AI
SYMB125 TEXT AI
SYMB126 TEXT AI
SYMB127 TEXT AI
SYMB128 TEXT AI
SYMB129 TEXT AI
SYMB130 TEXT AI
SYMB131 TEXT AI
SYMB132 TEXT AI
SYMB133 TEXT AI
SYMB134 TEXT AI
SYMB135 TEXT AI
SYMB136 TEXT AI
SYMB137 TEXT AI
SYMB138 TEXT AI
END-OF-FILE OR END-OF-TAPE

PROCEDURE 5.0

DO YOU WANT TO UNLOAD THE "CRAFT LOADLIB"? THIS LOADLIB CONTAINS ALL
OF THE CADAM SYMBOL TABLES IN THERE FINAL FORM AND WAS CREATED USING
THE VN/SP RELEASE 3 LINKAGE EDITOR.

1 YES / Y / NO / N / RETURN / R 1

YES

>>>> NOW UNLOADING THE CUE/GM FONT LOADLIB. <<<<

LOADING.....
CMFORATS LOADLIB A1
END-OF-FILE ON END-OF-TAPE

>>>>> THIS CONCLUDES THE INSTALLATION OF THE CUE/GM FONT TAPE <<<<<<
PLEASE CONSULT THE INSTALLATION DOCUMENTATION
FOR DETAILS ON THE FOLLOWING TWO PROCEDURES:

- 1) GENERATING THE FONT PAGE AND TABLES.
- 2) MAKING CADAM AWARE OF THE NEW FONTS.

THANK YOU

APPENDIX F

Console Listing
from a
Sample Rebuild
of a Font
Display Page
and Font Table

```
>>>>>>>> COPYING THE "CAOSYMT8 EXEC" TO "GMFSYMT8 EXEC " AND <<<<<<<<<
>>>>>>>>>>>> CHANGING THE OUTPUT LGADLIB FOR THE FONTS. <<<<<<<<<<<<
```

PLEASE WAIT.

* BUILD THE FONT TABLES DONATED TO CUE BY GENERAL MOTORS INC. *

01 REBUILD ALL FONT TABLES

1)	BLOCK CONDENSED	(UPPER CASE)	12)	GREEK	(UPPER CASE)
2)	BLOCK CONDENSED	(LOWER CASE)	13)	GREEK	(LOWER CASE)
3)	BRUSH	(UPPER CASE)	14)	HELVETICA REG.	(UPPER CASE)
4)	BRUSH	(LOWER CASE)	15)	LEROY THIN	(UPPER CASE)
5)	CASLON	(UPPER CASE)	16)	OLD ENGLISH	(UPPER CASE)
6)	CASLON	(LOWER CASE)	17)	OLD ENGLISH	(LOWER CASE)
7)	DATA	(UPPER CASE)	18)	PEIGNOT MEDIUM	(UPPER CASE)
8)	DATA	(LOWER CASE)	19)	PEIGNOT MEDIUM	(LOWER CASE)
9)	GM MICRO	(UPPER CASE)	20)	PLAYBILL	(UPPER CASE)
10)	GOTHIC	(UPPER CASE)	21)	PLAYBILL	(LOWER CASE)
11)	GOTHIC	(LOWER CASE)	22)	REBUILD THE FONT	DISPLAY PAGE

C) CHANGE THE DEFAULT LOAD MODULE LIBRARY NAME. (GMFONTS LOADLIB)
E) EXIT THE FONT GENERATION SYSTEM.

PLEASE SELECT THE DESIRED OPTION:
C

PLEASE ENTER THE FILE NAME OF THE LOAD MODULE LIBRARY THE FONTS ARE
TO BE PLACED IN?

(FILE NAME / CANCEL / EXIT)

TEST

```

>>>>>>> COPYING THE "CAOSYMTB EXEC" TO "GMFSYMTB EXEC " AND <<<<<<<<
>>>>>>>>>>> CHANGING THE OUTPUT LOADLIB FOR THE FGNTS. <<<<<<<<<<<<<<<

```

PLEASE WAIT.

 * BUILD THE FONT TABLES DONATED TO CUE BY GENERAL MOTORS INC. *

0) REBUILD ALL FONT TABLES

1) BLOCK CONDENSED (UPPER CASE)	12) GREEK (UPPER CASE)
2) BLOCK CONDENSED (LOWER CASE)	13) GREEK (LOWER CASE)
3) BRUSH (UPPER CASE)	14) HELVETICA REG. (UPPER CASE)
4) BRUSH (LOWER CASE)	15) LEROY THIN (UPPER CASE)
5) CASLON (UPPER CASE)	16) OLD ENGLISH (UPPER CASE)
6) CASLON (LOWER CASE)	17) OLD ENGLISH (LOWER CASE)
7) DATA (UPPER CASE)	18) PEIGNOT MEDIUM (UPPER CASE)
8) DATA (LOWER CASE)	19) PEIGNOT MEDIUM (LOWER CASE)
9) GM MICRO (UPPER CASE)	20) PLAYBILL (UPPER CASE)
10) GOTHIC (UPPER CASE)	21) PLAYBILL (LOWER CASE)
11) GOTHIC (LOWER CASE)	22) REBUILD THE FONT DISPLAY PAGE

```

C ) CHANGE THE DEFAULT LOAD MODULE LIBRARY NAME. ( TEST LOADLIB )
E ) EXIT THE FONT GENERATION SYSTEM.

```

PLEASE SELECT THE DESIRED OPTION:
22

BUILDING FONT DISPLAY PAGE.

SOURCE DRAWINGS OBTAINED FROM: GROUP= CAD ,USER= GMFONT

DMSLIC740I EXECUTION BEGINS...
CADSEG SEGMENT BOUNDARIES-C0820000 00821FFF.
CADAP SEGMENT NOW LOADED.
DMSLIC740I EXECUTION BEGINS...
DMSLIC740I EXECUTION BEGINS...

PRT FILE 0178 FOR GMFONTS COPY 001 HOLD

ALL DONE WITH FONT DISPLAY PAGE.

* BUILD THE FONT TABLES DONATED TO CUE BY GENERAL MOTORS INC. *

0) REBUILD ALL FONT TABLES

1) BLOCK CONDENSED (UPPER CASE)	12) GREEK (UPPER CASE)
2) BLOCK CONDENSED (LOWER CASE)	13) GREEK (LOWER CASE)
3) BRUSH (UPPER CASE)	14) HELVETICA REG. (UPPER CASE)
4) BRUSH (LOWER CASE)	15) LEROY THIN (UPPER CASE)
5) CASLON (UPPER CASE)	16) OLD ENGLISH (UPPER CASE)
6) CASLON (LOWER CASE)	17) OLD ENGLISH (LOWER CASE)
7) DATA (UPPER CASE)	18) PEIGNOT MEDIUM (UPPER CASE)
8) DATA (LOWER CASE)	19) PEIGNOT MEDIUM (LOWER CASE)
9) GM MICRO (UPPER CASE)	20) PLAYBILL (UPPER CASE)
10) GOTHIC (UPPER CASE)	21) PLAYBILL (LOWER CASE)
11) GOTHIC (LOWER CASE)	22) REBUILD THE FONT DISPLAY PAGE

C) CHANGE THE DEFAULT LOAD MODULE LIBRARY NAME. (TEST LOADLIB)
E) EXIT THE FONT GENERATION SYSTEM.

PLEASE SELECT THE DESIRED OPTION:
1

BUILDING SYMBOL TABLE (SYMTB110)

THE SOURCE DRAWINGS WILL BE OBTAINED FROM: GROUP= CAD ,USER= GMFONT

DMSLIC740I EXECUTION BEGINS...
CADSEG SEGMENT BOUNDARIES-C0820000 00821FFF.
CADAP SEGMENT NOW LOADED.
DMSLIC740I EXECUTION BEGINS...
DMSLIC740I EXECUTION BEGINS...

PRT FILE 0179 FOR GMFONTS COPY 001 HOLD

ALL DONE WITH SYMBOL TABLE (SYMTB110)

* BUILD THE FONT TABLES DONATED TO CUE BY GENERAL MOTORS INC. *

0) REBUILD ALL FONT TABLES

1) BLOCK CONDENSED (UPPER CASE)	12) GREEK (UPPER CASE)
2) BLOCK CONDENSED (LOWER CASE)	13) GREEK (LOWER CASE)
3) BRUSH (UPPER CASE)	14) HELVETICA REG. (UPPER CASE)
4) BRUSH (LOWER CASE)	15) LEROY THIN (UPPER CASE)

5) CASLON	(UPPER CASE)	16) OLD ENGLISH	(UPPER CASE)
6) CASLON	(LOWER CASE)	17) OLD ENGLISH	(LOWER CASE)
7) DATA	(UPPER CASE)	18) PEIGNOT MEDIUM	(UPPER CASE)
8) DATA	(LOWER CASE)	19) PEIGNOT MEDIUM	(LOWER CASE)
9) GM MICRO	(UPPER CASE)	20) PLAYBILL	(UPPER CASE)
10) GOTHIC	(UPPER CASE)	21) PLAYBILL	(LOWER CASE)
11) GOTHIC	(LOWER CASE)	22) REBUILD THE FONT DISPLAY PAGE	

C) CHANGE THE DEFAULT LOAD MODULE LIBRARY NAME. (TEST LOADLIB)
 E) EXIT THE FONT GENERATION SYSTEM.

PLEASE SELECT THE DESIRED OPTION:
E

END OF FONT GENERATION SYSTEM.

THANK YOU.....

R(0);

End of Volume