

Fig. 4.9-4 CDM Tear-off

4.9.2.4. Operation Command and Usage.

All commands are available in the pop-up menu with mouse as followed and also available by inputting command manually on the INPUT WINDOW depending upon command grammar like using shell command in UNIX.

4.9.2.4.1. Command Input Method using POP-UP MENU



Fig. 4.9-5 POP-UP window

4.9.3. Batch Job

It is the function to make commands operate depending on the set value by reserving the MMC at the user's definition for the user's convenience.

4.9.3.1. Batch Job Window Configuration

The window is divided into the following three parts by the characteristics of the work: batch job set part, batch job list and command list, menu part.



Fig. 4.9-6 Batch Job Screen

4.9.3.2. Run Batch Job

The batch job menu is included in the IO sub-menu, and just one batch job can be executed in one workstation. If the batch job is authorized, the menu is displayed in the executable status; if the batch job is already under execution the system prevents the overlapping of the work by making the menu 'Disable'. That is, the menu can be run on the interm run with bim; the menu always is 'Disable' upon remote access using telnet or rlogin; the menu can be run upon client access using the pcsnet because it uses local DB.

4.9.3.3. Batch Processing Set Area

Job Name

It is the name of the work to be set and added into the Job Group when storing. The maximum length of the name is restricted into 40 letters.

Run Type

Set if the work to be operated with a cycle, or at the specific time. (ONCE, CYCLE)

Start Time

It is the starting time of the work and the present time of the system is filled in the data field as a basic value.

End Time

It is the ending time of the work and the next date for the present time of the system is filled in the data field as a basic value. If the ending time has passed the present time it takes the Run Flag off.

Cycle Time

It designates the hour and minute to execute the next command when the Run Type is set as Cycle.

<u>Interval</u>

It is the time between each command represented in seconds $(1 \sim 6000)$ when several commands are input in single work name. Interval over 5sec is recommended.

<u>Run Flag</u>

It represents whether the set batch processing is executed. (ON, OFF)

List Area

Job Group

It is the list of registered works and the key value, which controls DB.

Command List

It is the list of commands for single work. Maximum four commands can be input.

Command Input Text Field

It is the field on which the command is input.

4.9.3.4. Menu Field

<u>Test</u>

It is the menu to test if the command for the presently selected work or the work for which the input is performed is input without error.

<u>Insert</u>



It is the menu to input new work.



<u>Modify</u>

It is the menu to modify the previously input work.

<u>Delete</u>

It is the menu to delete the input work or the command in the command list.

<u>Clear</u>

It is the menu to remove the values left in the data field.

Schedule List/Setup Screen

It shows the schedule list presently on the execution standby status.

Exit/Close

It is the menu to close the batch job window.

4.9.3.5. Message Display Area

Error message on operation and messages for alarm and status change are displayed.



4.9.3.6. Batch Job Operation

4.9.3.6.1. Open Window

Select IO menu of "INTERM", which is command I/O window, and click Batch Job then the window is opened.

4.9.3.6.2. Job Input

Job name is the key value that controls DB so it should be the one and only value. When selecting insert menu it would not be stored unless the job name is input. The data field restricts the number of letters when inputting the data; emits alarm sound when it is exceeded. The figure input part is configured with the field in which the figure can be input manually and the buttons that change the figures. The maximum and minimum value is designated so if the figure exceeds this scope, it is set as a minimum value; if a letter is input the system emits alarm sound. After one command is input in the command input field, press 'Enter' key then it added into the command list. If a wrong command is added, select the list and press 'Delete' menu then it will be deleted.

	ell_popup
Job Name	Job Group
Run Type Once Cycle	
Start Time 11 A Mon 21 A Day 11 A Hour 10 A Min	
End Time 12 A Mon 30 A Day 0 A Hour 0 A Min	<u>حا</u>
Cycle Time 14 Albur 0 Albur	Command List
Interval 10 A Sec	
Run Flag © 0N 🗇 0FF	DIS-CMD-HIS]
Test Insert Modify Del	ete Clear Schedule Close
Message :	

Fig. 4.9-7 Batch Job Input

After the input is completed, check if it is set with correct values and choose 'Insert' menu.

4.9.3.6.3. Job Modifying

The job modification takes the same method with the input but the job name operates the key of DB cannot be modified.

- BatchSł	nell_popup
Job Name	Job Group
User Information	User Information
Run Type 💭 Once 🔎 Cycle	
Start Time 11 v Mon 21 v Day 11 v Hour 10 v Min	
End Time 12 Mon 30 A Day 0 A Hour 0 Min	
Cycle Time 12 🖌 Hour Q 🗼 Hin	Command List DIS-USR-INF0;
Interval 10 sec	DIS-CMD-HIS;
Run Flag @ ON 💭 OFF	DIS-CMD-HIS Å
Test Insert Modify Del	ete Clear Schedule Close
Message :	

Fig. 4.9-8 Batch Job Modification

After modifying, input 'Modify' menu by all means, so as that the modification is completed.

4.9.3.6.4. Job Deletion

Use 'Delete' menu with great care because it has two functions: deleting job group and deleting command list. Choose 'Delete' menu after selecting job group list then the chosen job will be deleted; press 'Delete' menu after selecting command group then the command will be deleted. Choose 'Modify' once more when deleting command so as to delete the command completely and store the content into the DB.





Fig. 4.9-9 Batch Job Deletion

4.9.3.6.5. Job Status Display

This menu shows the set jobs with their schedule. This menu shows setup window and schedule list by converting them with toggle method.

-		BatchShell_popup	
026. 11.28 11:10:10 027. 11.28 11:10:10 028. 11.28 23:10:10 028. 11.28 23:10:10 030. 11.29 11:10:10 030. 11.29 11:10:10 031. 11.29 11:10:10 032. 11.29 23:10:10 033. 11.29 23:10:10 034. 11.30 11:10:10 035. 11.30 23:10:10 036. 11.30 23:10:10 037. 11.30 23:10:10 038. 12.01 11:10:10 039. 12.01 11:10:00 039. 12.01 11:10:00 040. 12.02 21:10:10 041. 12.02 23:10:00 043. 12.02 23:10:10 044. 12.02 23:10:10 044. 12.03 23:10:10 044. 12.03 23:10:10 044. 12.03 <t< th=""><th>User Information User Information</th><th>[DIS-USR-INF0;] [DIS-USR-INF0;] [DIS-USR-INF0;] [DIS-CMD-HIS;] [DIS-CMD-HIS;] [DIS-CMD-HIS;] [DIS-CMD-HIS;] [DIS-USR-INF0;] [DIS-USR-INF0;] [DIS-USR-INF0;] [DIS-CMD-HIS;] [DIS-CMD-HIS;] [DIS-CMD-HIS;] [DIS-CMD-HIS;] [DIS-USR-INF0;] [</th><th></th></t<>	User Information User Information	[DIS-USR-INF0;] [DIS-USR-INF0;] [DIS-USR-INF0;] [DIS-CMD-HIS;] [DIS-CMD-HIS;] [DIS-CMD-HIS;] [DIS-CMD-HIS;] [DIS-USR-INF0;] [DIS-USR-INF0;] [DIS-USR-INF0;] [DIS-CMD-HIS;] [DIS-CMD-HIS;] [DIS-CMD-HIS;] [DIS-CMD-HIS;] [DIS-USR-INF0;] [
Test Ins	ert Modify	Delete Clear	Setup Screen Close
Message :			





4.9.4. Console Window

4.9.4.1. Overview

It is the window displaying event list of processor and also displays status change alarm and alarm information.

XOUTERM	×
Console Window	
COMPLETED	
MSC(0x00) 2001-06-15 11:38:02 S3012 BPP STATUS CHANGE LOCATION = BSC01/BTS00/BPP PREVIOUS : ABNM CURRENT : NORM COMPLETED	
MSC(0x00) 2001-06-15 11:38:26 *** A8501 CAN CNPA DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF01/CNPA_A INFORM : FUNCTION_FAIL, SOURCE12007 COMPLETED	
MSC(0x00) 2001-06-15 11:38:26 A8501 CAN CNPA DUAL ABNORMAL CLEARED LOCATE : CAN/CANRO/SHELF01/CNPA_A INFORM : FUNCTION_FAIL, SOURCE12007 COMPLETED	
MSC(0x00) 2001-06-15 11:38:26 S3005 CCP STATUS CHANGE LOCATION = BSC00/CCP ACT_SIDE A_STS B_STS PREVIOUS A NORM ABNM CURRENT A NORM NORM	
COMPLETED MSC(0x00) 2001-06-15 11:38:50 ** A5710 BSC SCPA SINGLE ABNORMAL LOCATE : BSC00/BNCR0/SHELF01/SCPA_B INFORM : FUNCTION_FAIL, SOURCE23004 COMPLETED	
MSC(0x00) 2001-06-15 11:38:50 A5710 BSC SCPA SINGLE ABNORMAL CLEARED LOCATE : BSC00/BNCR0/SHELF01/SCPA_B INFORM : FUNCTION_FAIL, SOURCE23004 COMPLETED	
MSC(0x00) 2001-06-15 11:39:02 S3005 CCP STATUS CHANGE LOCATION = BSC00/CCP ACT_SIDE A_STS B_STS PREVIOUS A NORM NORM CURRENT A NORM ABNM COMPLETED	
	17

Fig. 4.9-11 Console Window

4.9.4.2. Operation

The console window displays system message, supports pop-up menu and its display environment is adjustable. It is divided into background color, text color, text font, text size and close; press mouse button 3 to operate this function then the operating menu pops up. The number of message to be displayed is uncertain depending upon system load but roughly 400 through 800 messages can be displayed per second.

4.9.5. Controller

4.9.5.1. Overview

As the GUI gets complicated and varied the control for GUI is needed. Therefore, place a controller to control the entire GUI with close relation to their connection. Furthermore, due to the supply of network environment the user can access to a system more easily; the control is more complicated; monitor equipment to monitor and control them is needed; so the equipment to control the network and message display is developed.

The controller manages the host accessing to BMS Server; controls the display message of BSC, BTS, and Message Type; is in charge of process management.

4.9.5.2. Operation

Press ctrl among the buttons in Manager to start operation.



Fig. 4.9-12 ctrl Start Icon

Then the following screen is displayed.

The controller is divided into two parts of network control and message control.

Exit	Change Remove				
lost	IP_Address	User	Class		-Opened Windows-
osm0	150.150.53.96	LGICBSM	1		
moda	150.150.62.216		-		
ultra60	150.150.53.64	LGICBSM	1	BTS_ID 0 64	
hgkim	150.150.62.11	LGICBSM	1		and the second second second
PDM	192.168.53.71	LGICBSM	1		Manager Window
jileea	150.150.62.92	LGICBSM	1		Console Window
bsm1	150.150.53.32	LGICBSM	1	· · · · · · · · · · · · · · · · · · ·	Controller Window
bsm	150.150.53.82	LGICBSM	1	Message Type	
venus	150.150.62.89	LGICBSM	1	ALARM	
				FAILT	
				E STATUS	
				L STATUS	
				ETC	
				ALL 📃	

Fig. 4.9-13 Controller Window

4.9.5.3. Message Filtering

The message control function is only supplied to the host, and it can filter and display the message of particular BTS or specific part. The message type is sorted into ALARM, FAULT, STATUS, and ETC. If the message type is not defined display the 'all message display'.

GUICtrl								
Exit	Change Remove							
Host	IP_Address	User	Class	PSC TD	d L	16		Opened Windows
bsm0	150.150.53.96	LGICBSM	1	1030_10	<u> </u>			
moda	150.150.62.216		-		d L			
ultra60	150.150.53.64	LGICBSM	1	BIS_ID	ų į	64	V	
hgkim	150.150.62.11	LGICBSM	XAsk_Char	nge_popup	×	1978 - P.K.	T. Sector	Managar Window
PUM	192.168.53.71	LGICBSM			_			Command Window
jileea	150.150.62.92	LGICBSM	Do you want	to change ?				Console_Window
DSMI	150.150.53.32	LEICBEN			Ty)e —		Controller Window
LIODUS	150 150 62 89	LETCESM	I I I					
venus	130+130+02+03	Lorobon	Yes	No Help	RKA	1		
			1		PL	E.		
					тнТυ	S		
					ETC			
					ALL			
								ļ
	Host: Server	[bsm0] Lo	cal[venus]				Path:	/home/vxWorks/T5.1/exe

Fig. 4.9-14 Message Filtering of Controller

4.9.5.4. Network Management

The network control is the function provided by the BMS server and supplies the following functions: checking the host name of presently accessed client, address, user,

user's grade, and message display information and compulsory expulsion of them. The client can display the hosts presently in operation but cannot control the other users except its host.

ƘGUICtrl						
Exit	Change Remove					
Host	IP_Address	User	Class	PSC TD		Opened Windows
bsm0	150.150.53.96	LGICBSM	1	030_10		
moda	150.150.62.21	6				
hgk im	150.150.55.64	LGICBSM		010_10		100 000 N
PDM	192.168.53.71	LGICBSM	X Ask_Chan	ge_popup 🕨	1	Manager Window
jileea	150.150.62.92	LGICBSM	Do you want t	to remove ?		Console Window
bsm1	150.150.53.32	LGICBSM			Type	Controller Window
Venus	150.150.62.89	LGICBSM		ent finant	ARM	
			res P	10	ПТ	
					TUS	
					ETC	
					ALL	
ļ.				-		
	Host: Serv	er[bsm0] Lo	cal[venus]		Path:	/home/vxWorks/T5.1/exec

Fig. 4.9-15 Network Management of Controller

4.9.5.5. Suggestions

This program refers to the /etc/hosts file, so IP_Address, Domain_name, and Alais_name should be correctly recorded fit for the network configuration information.

4.9.6. Status Window (stmGUI)

4.9.6.1. Overview

The user can use the MMC (DIS-*-STS, DIS-*-ALM, DIS-*-FLT) to investigate the status of processor, board and alarm occurrence in each BSC/BTS. However, the user should keep on inputting commands with keyboard or mouse to check it on real-time; moreover, it is hard for the user to grasp the whole situation at one sight; therefore, the system takes advantage of the GUI(Graphic User Interface) to help the user in operation and for the more efficient system management.

4.9.6.2. Environment Setup

Solaris 2.7 and CDE library are used to develop the BMS as the OS and Graphic library. Moreover the Window Manager is set to be performed under CDE (Common Desktop Environment). Therefore, the user would be in a good operational environment if he operates the system on the environmental ground above (refer to the set and

environment set).

4.9.6.2.1. Suggestions

LD_LIBRARY_PATH is one of the most important environment variables. The stmGUI could be down during the operation unless the user let the stmGUI search /usr/X11R5/lib first of all.

e.g.) setenv LD_LIBRARY_PATH /usr/dt/lib/:usr/openwin/lib/:/usr/lib

4.9.6.2.2. Data Files

If the stmGUI is unable to be run, the needed data files could be non-existed. Therefore, check if the following files are in the DATA/GUI Directory.

RACK.DAT : file contains the shape of RACK .
SHELF.DAT : file contains the shape of SHELF.
PROCESS.DAT: definition file of the processors.
*.xpm : drawing files needed in screen processing.
bts_name.info : files contain BTS name.



4.9.6.3. Directions for Use

The direction is configured with full of drawings. Refer to the STMX, TRMX Block for detailed operation. Press stmGUI among the buttons of Manager.



Fig. 4.9-16 stmGUI Start Icon

Then the following screen is displayed.

<mark>≻</mark> stmGUI
Status Viewer
BSC1 BSC2 BSC3 BSC4 BSC5 BSC6 BSC7 BSC8 BSC9 BSC10 BSC11
BSC 0
32 33 34 35 36 37 38 39 40 41 42 43 44 45 46 47
Alarm Color CBITICAL MAJOB MINOB NOBMAL NotFouin Hide Update Exit
Processor Status
Normal CCP SCP NCP ALP VMP00 SMP00
Abnormal A A A A

Fig. 4.9-17 stmGUI Main Screen



The figure above shows the status that the highest-grade alarm of the BSC0 is the critical alarm and the highest alarm of the BTS0, major alarm, is generated.

4.9.6.3.1. BTS Name Display.



Fig. 4.9-18 Display Screen of BTS Name.

e.g.) On the figure above, ghjeong is the real name of the BTS and BTS 0 is the BTS ID.

4.9.6.3.2. Main Menu

Hide	Update	Exit
And the second sec	And the second s	

Fig. 4.9-19 Main Menu

Hide : It is used when hiding RACK and SHELF simultaneously from the screen.

Update : It is used in compulsory loading of initial value upon deletion and extension by MMC.

Exit : It ends the program.

4.9.6.3.3. Color by the Alarm Grade

ARGIN CORR CONTRACT MIAGON MONTAL PROC	Alarm Color	CRITICAL	MAJOR	MINOR	NORMAL	NotEquip
--	-------------	----------	-------	-------	--------	----------

Fig. 4.9-20 Alarm Color

Red : Critical

Orange : Major

Green : Minor

Azure : Normal



Gray :BTS Is Not Equipped

4.9.6.3.4. Status Color.

🗙 Status C	¥Status Color _□×							
NORMAL	IDLE	NORM(OLD)	NORM(NEW)	AB_OB				
ABNORMAL	ABNM_N	ABN_M	ABN_R	005				
DCPY	LDNG	INIT	READY	AB_HW				
ABN_C	ABN_R	ABN_CL	AB_AG	ABNM_K				
ABN_D	N_EQP	BUSY	UNKNOWN	ABN_B				
ABN_F	CLK_F	AB_LF	SWT_F	QAT_F				
VQT_F	QAT0_F	QAT1_F	QAT2_F	QAT3_F				
VPLB_F	VMLB_F	VLLB_F	ABN_T	N0_7				
AB_AT	AB_MT	NOR_PB	REDNCY					

Fig. 4.9-21 Status Color Tone

4.9.6.3.5. Processor Status



Fig. 4.9-22 Processor Status (CAN)



Fig. 4.9-23 Processor Status (BSC)



Fig. 4.9-24 Processor Status (BTS)

4.9.6.3.6. Rack View

To see the shape of $\ensuremath{\mathsf{BSC/BTS}}$ one should press the corresponding button.

Select a BSC.



Fig. 4.9-25 BSC Selection

Select a BTS.



Fig. 4.9-26 BTS Selection



4.9.6.3.7. Rack Shape Diagram.

The following shape appears if CAN, BSC or BTS is chosen.

4.9.6.3.7.1. CAN Rack



Fig. 4.9-27 CAN Rack Shape.

The color of each slot manifests the alarm information of equipped cards. For example, the yellow color of BCRA, PIPA and FERA in the 4th shelf of the left side shows that the alarm is generating at Major status.

4.9.6.3.7.2. BSC Rack



Fig. 4.9-28 BSC Rack



4.9.6.3.7.3. BTS Rack



Fig. 4.9-29 BTS Rack



4.9.6.3.7.4. Slot Shape Diagram.

The corresponding dialog box is displayed upon clicking slot in the rack shape diagram.





The following dialog box appears upon clicking SLPA card above.



Fig. 4.9-31 e.g.)Dialog box- card Information

Memo: Stores the edited results temporarily.

Edit: Edit button

Cancel: End button

Save: Stores the edited.

1,2,3,4,5 button: The memo is stored in numerical order.

Click numbers in right side(1,2,3,4,5) to see the memo.

XChann	🗙 Channel View 📃 🔲							
Vocoder Element Status								
BSC 0 Rack 0 VMP00 VCPA00								
SLV 0 SLV 1								
DSP	VCE	DSP	VCE					
00		00						
01		01						
02		02						
03		03						
VCE	VCE Status Color							
IDLE	8K_0	Qcelp	8K_EVRC					
13K_Qcel	p 13_E	VRC	ABN_M					
			Close					

Fig. 4.9-32 e.g.)Dialog box-Vocoder Element Status

For example, the SK_Qcelp type call in the VCE0 of DSP1 is in busy status.

atus RCP00 DBPA01 Chin 1
RCP00 DBPA01
Chip 1
Camp 1
NORMAL(00)

Fig. 4.9-33 e.g.)Dialog box-DBPA Chip Status

4.9.6.3.7.5. Status Display



Fig 4.9-34 Display Status by Board

4.9.6.3.7.6. Alarm Display



Fig. 4.9-35 Alarm Display by Board.

4.9.6.4. Suggestions on Operation.

4.9.6.4.1. Status Management

The status and alarm are displayed in turn at 2-minute intervals in managing each board.

If there is no Alarm it displays the status color.

4.9.6.4.2. The Order of Priority

The stmGUI receives the process results of the status block (STMX) and fault block (TRMX) to reprocess them. Therefore, both of the two blocks should be normally operated for the normal operation. If the initial data setup of STMX has not been done while BSM is running, stmGUI may display undefined values. In this case, press update

button to initialize the value again.



4.9.6.4.3. End

Use Exit button in the main screen to end the program. It is undesirable using command kill or xkill. Proper procedure is recommended.

4.9.7. Neighbor Control Window (neighbor)

4.9.7.1. Overview.

Graphic neighbor is a tool that helps addition and deletion of the information related to the BTS neighbor. User can view, add and delete the information related to neighbor using the existing MMC but it requires the user to input lots of data. Therefore, graphic neighbor minimize the input amount of user for user's convenience.

4.9.7.2. Environment Setup.

Refer to the environment setup of stmGUI.

4.9.7.3. Directions for Use

Most of the directions are constituted of drawings and refer to the CDMX for detailed operation.

Press neighbor among the buttons of Manager to start.



Fig. 4.9-36 Neighbor Start Icon

The following initial screen appears.



🗙 neighbor									×
Neighbor List									
									Full Map
<u> </u>								_	Action
									♦ Select Delete Add NewAdd
									Select BSC D
								\neg	
									Exit OK
									DIS-BTS-DATA DIS-SECT-DATA
									DIS-CHAN-DATA
0120	1 2 0 1 2 -1 1-0	1-1							
Name	IDX CNF	SID NID	MSC	BSC BTS S	ECT PN	BID MSCTYP	E BSCTYPE BCO	N PRI	INCL BAND
M									<u>د ا</u> ل

Fig. 4.9-36 Neighbor Initial Screen

4.9.7.3.1. Main Menu



Fig. 4.9-37 Main Menu Screen

User can select a function in this screen.

- Select : select or change the BTS or sector. For selection, select a BTS first and then select a sector in the BTS.
- Delete : delete the neighbor in the presently selected sector. Press sector to be deleted after selection.
- Add : add neighbor into the presently selected sector. Press a sector to be added after selection.
- NewAdd : add a neighbor of other MSC into the presently selected sector. Input information into the window field appeared after selection. (There is no default value)

4.9.7.3.2. BTS Selection

There are two methods for selecting BTS.

Surely, the BTS subjected to the MSC of the presently operating system can be selected.

4.9.7.3.2.1. Method using Map.



Fig. 4.9-38 Full Map

Dragging mouse can search the desired location here. Click BTS (label : x-y) in the



desired location with this method and press the sector of the BTS to select.

4.9.7.3.2.2. Selection Method by BTS ID.

Select
BSC \land 🐌 🕨 🕨
BTS 🖣 🙍 🕨

Fig. 4.9-39 Random BTS Selection

BSC: It is the BSC to which the BTS belongs.

BTS: It is the BTS ID of the BTS.

Press OK button to complete the selection.

4.9.7.3.2.3. Selection Example.



Fig.4.9-40 Initial Screen (Before selecting BTS)



Fig. 4.9-41 After selecting BTS.



Fig. 4.9-42 After selecting Sector(Green: neighbor).



() *SMD-011-PMA210*



4.9.7.3.3. Neighbor Information

Fig. 4.9-43 Neighbor Information Screen

The own neighbor list checking is possible through the information in the lower part or the green tinted sector.

4.9.7.3.4. Neighbor Addition

The following window appears after selecting neighbor to be added.

🗙 Neighbor list information change					
Neighbor Information					
Config	۹.	Insert Index	Ĭ		
PN offset	284	MSC type	LG_MSC		
System ID	2222	BSC type	LG_BSC		
Network ID	15	Beacon PN	SOFT		
Base ID	55	Search Priority	LOW		
MSC ID	Ĩ	Frequency INCL]NO		
BSC ID	1Ľ	Bandwidth	Ĭ		
BTS ID	1Ľ	Frequency	Ĭ		
Sector ID	ALPHA				
0~3		OK Cancel			

Fig. 4.9-44 Inputting neighbor belongs to mother MSC

Adding neighbor belongs to the mother MSC requires the user to input just 4~6 fields.

XNeighbor list information change							
Neighbor Information							
Config		Insert Index	Y				
PN offset	Ĭ	MSC type	V				
System ID	Ĭ	BSC type	ž.				
Network ID	Ĭ	Beacon PN	ž.				
Base ID	Ĭ	Search Priority	Ĭ				
MSC ID	, where the second seco	Frequency INCL	Ĭ				
BSC ID	, where the second seco	Bandwidth	Ĭ				
BTS ID		Frequency	Ĭ				
Sector ID							
0 ~ 3		OK Cancel					
r		r					

Fig. 4.9-45 Inputting neighbor belongs to other MSC

Adding neighbor belongs to other MSC requires the user to input all the information.

0 ~ 3	
LOW	
MEDIUM	
HIGH	
VERY_HIGH	

Fig. 4.9-46 Default Value upon Input

Select a field to be input then the system shows the default values. To select a value input the value onto the corresponding input space or select one among the values in the lower part with mouse. Press OK after the input is done or press Cancel to return to the Main screen.

4.9.7.3.5. Neighbor Deletion

Deletion can be completed with two kinds of method. Press the corresponding line in the lower part or press the BTS sector button.

4.9.7.4. Suggestions in Operation

4.9.7.4.1. The order of priority

Graphic Neighbor is a tool for adding/deleting neighbors. Therefore, performing extension or deletion with MMC can bring out a wrong result while the Graphic Neighbor is being used. And if it is performed the user should run the Graphic Neighbor once again. The neighbor intercommunicates with the configuration block (CDMX) through MMI block. Consequently, the two blocks should be in normal operation.



4.9.8. Call Trace Window

4.9.8.1. Overview.

Call Trace Window is a tool that shows all kinds of call trace information for a specific for a specific MS onto the GUI (Graphic User Interface) screen of the user's terminal. Call trace command can be executed and the results can be checked through the existing MMC or dedicated window for call trace. The user can set time as long as he want with Timer for the maximum of two MS to trace calls.

4.9.8.2. Environment Setup

Refer to the environment setup of stmGUI

4.9.8.3. Directions for Use.

Most of the directions are constituted of drawings and refer to the TSMX Block for detailed operation.

Press call among the buttons of Manager to start.



Fig. 4.9-47 Call Trace Start Icon

Then the following screen appears.

Xcall				
0.00.00	2020	Call Tra	ce Panel 🖤 👘 👘	0 0 0 0 0
	System Information		Har	adOff Activity
BSC BTS	SMP	SIP		
SLP S Selector	VMP	VCP	MSC BSC BIS SECTOR PN	KID BASE WALSH QUF
VCP S DSP	Vocoder	CIC		
PCP PIPB	PIP	PDSN		
MS BTS NCB	ice Call Setup / Origination	VCP MSC		Call Quality
mob org	SEF COF	VCF MISC	100.0	
	MobOrg_B2C	CM_Ser ice_Req	51.2	f_fer
	ATM_C(m_Rsp 4	Asgn <u>Req</u>	6.4	r_fer
	AsgnReq_C2B		0.8	r_tot
· · · · · · · · · · · · · · · · · · ·	AsgnRsp_B2C			_Ct _Ct _7t _9t _9t
	ATM_C(nn_Rsp	elVocLink C21	F-FER Total	R-FER Total
Abis_Con Abis_Con	ectAck		TC Gain Threshold	Eb/No(dB) FPC
Null_Traffic	Abis_ECAM			
Abis_CE	Data 💦		Cal	I Information
Preamble Abis_P	MR		IMSI ESN	Srv. Opt
AS/BS_Ack_Order SO_Negotiation			FA Sector	FO
		VecLinkAct_V	UZID PZID	RTD
	Conversation	Asgir_Cilipi	Called Walsh code	FRC
			Release	
			SCI SCI	H Information
			PILOT PN_OFFSE1	MSC BSC
			BTS Sector	Base F-SCH
			F-Walsh F-QOF	R-SCH R-Walsh
			Packet	Data Information
			Data FWD Data REV	TOT FWD
			TOT REV PKT State	
W 200 W 200 W	1200012000	Comman	d Window" Contact of Contact	W W W W
IMSI	BSC	BTS	ТІМЕ	INTEV
Go Trace		Stop Operation	Exit Program	Expand Flow

Fig. 4.9-48 Call Trace Initial Screen
4.9.8.3.1. Sub Menu.



Fig. 4.9-49 Call Information.



Fig. 4.9-50 Call Quality



STAREX-IS BSM Manual

• PILOT	PN OFFSET	MSC	BSC
BTS	Sector	Base	F-SCH
• F-Walsh	F-QOF	R-SCH	R-Walsh •
기지국 정보	Forward Quais Orgonal Function	Reverse Supplemer CHannel	nt
Forward Walsh			Forward Supplement CHannel
			Davida Malak

Fig. 4.9-51 SCH Information



Fig. 4.9-52 Packet Data Information

IMSI 0162907023 Go Trace	BSC Stop Operal	Command Window	<mark>● TIME</mark> 10] xit Program	INTEV
→ 단말번호	BSC ID	BTS ID	► Trace Time	FER Report

Fig. 4.9-53 Command Window

Input MS number (IMSI), BSC ID, BTS ID, Trace Time and FER Report Interval Time into the command window of [Fig. 4.8–53], and press Go Trace button below, then the call trace starts. Press Stop Operation beside Go Trace button to stop the process during the operation and press Exit Program to end call trace program. The Expand Flow shows the flow to the PDSN upon clicking it.

🗙 call			
	20 . 20 . 20	Call Tra	ce Panel 🖉 👘 🖓 👘 🖓
0200	System Information	020020	HandOff Activity
BSC	BTS SMP	- SLP	MSC BSC BTS SECTOR PN RTD BASE WALSH OOF
3LP 3	Selector VMP	- VCP	1 0 0 Alpha 4 0x0086 0 36 0
NCP S	DSP		1 1 1 Alpha 224 0x0086 49 56 0
PCP	PIPB PIP	- PDSN	
State of the local division of the	Backet Data Call Setur		Call Quality
MS P	TS MCP	ALB CCB	Can duality
maharr			100.0
i	MebOrg_B2C		51.2
		Conn_Req	21.6 f_tot
		SelTcl ink_C2S	
	AsgnReg_C2B		
	Abis Connect	>	
	Abis ConnectAck		
Null_Traffic	Abia ECAM	LINKACT_S2C	r-ren 0.00 // 101al 0.00 // K-rek 0.00 // Total 0.15 //
	Abis_CEData		TC_Gain 0 Threshold 186 Eb/No(dB) 1.00 FPC 1
Preamble			
	Abia_PDMB MS/BS Ack Order	•	Call Information
	SO_Negotiation		IMSI 0162907023 ESN Srv. Opt
		UmselLinkAct_S2C	FA Sector FO
			VZID PZID BTD
			Called Walsh code EDC
			RRC Release
		-1 ms	SCH Information
		PPP Setu //MIP Regis	
	SCH As: ignment		PILOT I PN OFFSET 0X000000 MSC I BSC 0
			BTS 0 Sector Alpha Base 0 F-SCH 3
			F-Walsh 6 F-QOF 0 R-SCH 0 R-Walsh 152
			Packet Data Information
			Data EVD 72444 hrs Data REV 3324 hrs TOT EVD 62934 hre
		1 I I	
			TOT REV 7799 Hps PKT State
The second second second		Common	
		Comman	
IMSI 01629	07023 DSC	DTS	
Go	Trace	Stop Operation	Exit Program Expand Flow 📍
L			
(2개로 분	할된 window		

Fig. 4.9-54 Example of Expand Flow Button

If the user wants to see the expand flow hidden by the window at the right side after call test, click Expand Flow button to see the expand flow.

STAREX-IS BSM Manual

🗙 call								_ 🗆 ×
0.00	2000	9		Call Trace Par	rel 💔 👘 🦿	1.20	1. C. W	
	Syste	m Information			* G 7	HandOff	Activity	
BSC	BTS	SMP	SIP		PSC PTS SECT	OP DN PTD	PASE MALSH DOF	
3LP 3	3elector	VMP	VCP	1	0 0 Alp	ha 4 0x0086	0 36 0	
VCP S	DSP	Vocoder	CIC	1	1 1 Alp	ha 224 0x008a	49 55 0	
PCP	PIPB	PIP	PDSN					
MS	Packet	Data Call Setup	P CC		ICP M	SC P	CF PN	IP PDSN
mob org								r PUSN
	→	MobOrg_B2C	nn_Req	CM_Se	n ice_Req			
		-1 ms ATM_C	nn_Rsp SelTcLink_C2S		n red			
	<u></u>	AsgnReq_C2B						
	Abia	AsgnRsp_B2C						
	Abis Co	n nectAck	-1 msLinkAct 52C					
Null_Traffic	-	Abis_ECAM						
ext_ch_asgn	Abis_	CEData						
Preamble	Abis	PDMB						
	MS/BS_ACK_Order SO_Negotiation							
			Umsjeilinkact_S2C		A9_Setup	ļ	Conn_Req	
		4		Conn_I	Reg_PN2N		Conn Bon	
				Conn_I	Rap_N2PN		4	
							Rey Beg	Req 🕒
				-1 ms -1 ms Asq	A9_Connect		-	
	60U A		PPP Setu	MIP Registration/Acti	re Pkt Data			
I	SCH AS	is ignment						
		•						
		MT MT		Command Minda				ALC: NOT THE OWNER WATER
				Command Windo				
	2907023			8	TIML	10	INILV	
	Go Trace		Stop Operation		Exit Program		Shirin	
								+
아나도 콩	합된 WINDOW	v)				(Clic	ok !!

Fig. 4.9-55 Example of Shrink Flow Button

To see the hidden window (Call Information, Call Quality, Handoff Activity at the right) click Shrink Flow button.



4.9.8.3.2. Voice Call

Xcall		
a	Call Tra	ce Panel 🖉 👘 🎯 👘 🎯 👘 🎯
System Inf	formation	HandOff Activity
BSC 1 BTS 0	SMP 0 SLP 3	MSC BSC BTS SECTOR PN RTD BASE WALSH QOF
3LP_3 0 Selector 7	VMP 0 VCP 0	
VCP_S 0 DSP 1	Vocoder 0 CIC 4	
PCP 0 PIPB 0	PIP 0 PDSN	
Voice Call Setur	p / Origination	Call Quality
mob_org MabOrg B3C		
	nn_Req CM_Service_Req	21.6 f_tot
	selTcl ink_C2S	6.4 r fer
AsgnReq_C2B		
	nn_Req	0t -1t -2t -3t -4t -5t -6t -7t -8t -9t
Alm C	elVocLink_G21	F-FER 0.00 % Tutal 0.00 % R-FER 0.00 % Tutal 1.33 %
Abis_ConnectAck	20mskAct_S/	TC_Gain 0 Threshold 186 Eb/No(dB) 1.00 FPC 0
Abis_ECAM Abis_CData		Call Information
Preamble Abis UDMD		IMSI 0162908004 ESN 0x65b47c68 Srv. Opt SOR_VARI_VO
0 ms //S/BS_Ack_Order		FA 25 Sector Beta FO 0
4 SO_Negotiation	SelLinkAct_S:	UZID 0 PZID 230 RTD 244
Conver	sation	Called 2900010 Walsh code FRC 3
		RRC 3 Release 16
		SCH Information
		PILOT 1 PN OFFSET 0x000000 MSC 1 BSC 1
		BTS 0 Sector Beta Base 48 F-SCH 4
		F-Walsh 2 F-QOF 0 R-SCH 0 R-Walsh 80
		Packet Data Information
		Data FWD 0 bps Data REV 0 bps TOT FWD 424 bps
		TOT RFV 510 bps PKT State 0
Water Water Water	Comman	d Window
IMSI 0162908004 DSC		
Go Trace	Stop Operation	Exit Program Shirink Flow

4.9.8.3.2.1. Origination Call (Voice Call Setup / Origination)

Fig. 4.9-56 Voice Call Setup / Origination

It is FLOW that shows voice originating call process procedure and System Information, Call Information and Call Quality Information are represented on it. The handoff information is also represented when the handoff is generated.



4.9.8.3.2.2. Termination Call.(Voice Call Setup / Termination)

Fig. 4.9-57 Voice Call Setup / Termination

It is FLOW that shows the voice originating call process procedure, and System Information, Call Information and Call Quality Information are represented on it. The handoff information is also represented when the handoff is generated.

4.9.8.3.3. Data Call

4.9.8.3.3.1. Packet Data Call Setup



Fig 4.9-58 Packet Data Call Setup

It is FLOW that shows packet data call processing procedure and the System Information, Call Information, Call Quality, Supplemental Channel Information and Packet Data Information are represented on it. The handoff information is also represented on it when the handoff is generated.



4.9.8.3.3.2. Packet Data Call Reactivation / Network Initiated

Fig. 4.9-59 Packet Data Call Reactivation / Network Initiated

It is FLOW that shows processing procedure of the packet data call which fell into the dormant status and then be reactivated by the network side. The System Information, Call Information, Call Quality, Supplemental Channel Information and Packet Data Information are represented. The handoff information is also represented on it when the handoff is generated.





4.9.8.3.3.3. Packet Data Call Reactivation / MS Initiated

Fig. 4.9-60 Packet Data Call Reactivation / MS Initiated

It is FLOW that shows the process procedure of packet data call which fell into the dormant status and then reactivated by the MS; the System Information, Call Information, Call Quality, Supplemental Channel Information and Packet Data Information are represented on it. The handoff information is also represented on it when the handoff is generated.

4.9.9. BTS Address Search Window. 4.9.9.1. Overview.

The BTS address search program provides the following functions: 1) it can search the corresponding BTS name and address with BSC and BTS number. 2) it can search BSC and BTS number and address with BTS name. 3) it can search BSC and BTS number and name with BTS address.

4.9.9.2. Environment Setup.

It use Solaris 2.7 and Informix 7.3.1 as OS.

4.9.9.2.1. Data Files

bts_name.info : the file contains BTS name and address

4.9.9.3. Directions for Use.

The initial condition is scheduled to configure in the future.



STAREX-IS BSM Manual



Fig. 4.9-61 BTS Address Search Window Initial Screen

4.9.9.3.1. File Information Display

X SEARCH GUI				
QUERY			RESULT	
BSC_ID	BSC BTS 00 00 00 01 00 02	Name dongjack sangdong guwo1dong	Address seoul dongjack gu seoul sangdong Inchon guwoldong	
Search	00 03	nogedong	Anang S1 nogedong	X
Ent	er !!			



Press Enter key on any place of the input field to display the file information on the result window.

1	QUERY				RESULT	
BSC_ID	2	BSC	BTS	Name	Address	
BTS_ID	Ĭ	02	00	dongjack2	seoul dongjack2 gu	
Name	I	02	01	sangdong2	seoul sangdong2	
Address	I	02	02	guwo1dong2 hogedong2	Inchon guwoldong2 Anang si hogedong2	
			T			
	iearch					

4.9.9.3.2. Searching with BSC ID.

Fig. 4.9-63 Searching with BSC

Input desired BSC number and press Enter key to display the result on the result window when searching with BSC_ID.

4.9.9.3.3. Searching by BTS ID.





STAREX-IS BSM Manual

Input desired BTS number and press Enter key to display the result on the result window when searching with BTS_ID.

	QUERY					RES	VLT	
BSC_ID	2	В	SC E	BTS	Name	Add	Iress	
BTS_ID	I)0 10	01	sangdong	seoul	sangdong sadangdong	
Name	sa k)1	01	-sangdong1	seoul	sangdong1	
Address	Ť)1	11	sadang1	seoul	sadangdong1	ľ
5	Search							

4.9.9.3.4. Searching with BTS name.



K SEARCH	GUI	in particular N		8				
	QUERY					RES	ULT	
BSC_ID	I		BSC	BTS	Name	Add	ress	
BTS_ID	I		00	11	sadang	seoul	sadangdong	
Name	sad	ĸ	01	11	sadang1	seoul	sadangdong22323	
Address	l				<u> </u>			
5	Search							
					×.			
				$\left(\right)$	접두어(Prefix)검색.		

Fig. 4.9-66 Searching with BTS name-2

If the user input name into the name input field when searching with BTS name, the searching is performed with real-time prefix. For example, the names start with "s" are displayed upon inputting "s", the names start with "sad" are displayed upon inputting "sad".

4.9.9.3.5. Searching with BTS address.

	QUERY				RESULT	
BSC_ID	2	BSC	BTS	Name	Address	
BTS_ID	Ĩ.	00	00	dongjack	seoul dongjack gu	
Name	¥	00	02	sanguong guwoldong	Inchon guwoldong	
Address	dong	00	03	hogedong	Anang si hogedong	
S	earch					

Fig. 4.9-67 Searching with BTS Address-1

SEARCH	GUI					
	QUERY				RESULT	
BSC_ID	*****	BSC	BTS	Name	Address	
BTS_ID	Ĩ	00	00	dongjack	seoul dongjæck gu	
Name	Ĭ	02	00	dongjacki dongjack2	seoul dongjacki gu	
Address	dongí 📐					
S	iearch					
					단어로 검색.	

Fig. 4.9-68 Searching with BTS Address-2

The BTS addresses are searched with real-time words upon inputting address into the address input field when searching with BTS address. For example, the addresses start with "dong" are displayed upon inputting "dong", and the addresses start with

STAREX-IS BSM Manual

"dongj" are displayed upon inputting "dongj".



SEARCH	GUI			3		_ _ X
	QUERY				RESULT	0
BSC_ID	Ž	BSC	BTS	Name	Address	
BTS_ID	4	02	04	huksuk2	seoul huksukdong2	
Name	Ĭ					
Address	¥.					
S	iearch 💦					
Searc	ch Button Click !					

4.9.9.3.6. Searching with Search Button.

Fig. 4.9-69 Searching with Search Button.

Search Button provides the following functions: 1) simultaneous searching for BSC_ID and BTS_ID 2) single searching for BSC_ID or BTS_ID

4.9.9.4. Suggestions for Operation.

4.9.9.4.1. The Order of Priority.

BTS address searching program is a graphic tool that provides the following function: 1) searching BTS name and address with BSC ID and BTS ID, 2) searching BSC ID, BTS ID, and address with name, 3) searching BSC ID, BTS ID, and name with address. The address search program should be rerun when inserting, deleting or modifying the data of the bts_name.info file that includes BTS information.

The Informix should be normally run because the Informix db is used for searching.



5. BSM On-Line Message

5.1. Fault/Alarm Message

5.1.1. Alarm Message

5.1.1.1. CAN Occurrence Alarm Message

5.1.1.1.1. CAMB

5.1.1.1.1.1. CNP Processor

1) When A-Side of the duplicated CNP is normal and functional problems occur on the B- side board

X OUTERM	
Console Window	
MSC(0x00) 2001-06-14 16:55:04 ** A8500 CAN CNPA SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF01/CNPA_B INFORM : FUNCTION_FAIL, SOURCE12009 COMPLETED	

Fig. 5.1-1 CNP Single Function Fail

 When functional problems occur on the B-Side after functional problems occur on the A-Side of the duplicated CNP,

XOUTERM	- D ×
Console Window	
MSC(0x00) 2001-06-14 16:58:44 *** A8501 CAN CNPA DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF01/CNPA_B INFORM : FUNCTION_FAIL, SOURCE12009 COMPLETED	

Fig. 5.1-2 CNP Dual Function Fail

3) When A-Side of the duplicated CNP is normal and the B-Side board is removed

X OUTERM	
Console Window	
MSC(0x00) 2001-06-14 17:03:02 ** A8500 CAN CNPA SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF01/CNPA_B INFORM : BOARD_OPEN, SOURCE12008 COMPLETED	

Fig. 5.1-3 CNP Single Board Open Fail

4) When B-Side is removed after A-Side of the duplicated CNP is removed

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 17:04:47 *** A8501 CAN CNPA DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF01/CNPA_B INFORM : BOARD_OPEN, SOURCE12008 COMPLETED	
4	

Fig. 5.1-4 CNP Dual Board Open Fail

5.1.1.1.1.2. ASCA Board

1) When A-Side of the duplicated ASCA is normal and functional problems occur on the B-Side board



Fig. 5.1-5 CAN ASCA Single Function Fail

2) When functional problems occur on the B-Side after functional problems occur on the A-Side of the duplicated ASCA

X OUTERM	
Console Window	
MSC(0x00) 2001-06-14 17:21:52 *** A8551 CAN ASCA DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF01/ASCA_B INFORM : FUNCTION_FAIL, SOURCE11004 COMPLETED	

Fig. 5.1-6 CAN ASCA Dual Function Fail

3) When A-Side of the duplicated ASCA is normal and B-Side board is removed

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 17:22:45 ** A8550 CAN ASCA SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF01/ASCA_B INFORM : BOARD_OPEN, SOURCE11003 COMPLETED	
۲ ۲	

Fig. 5.1-7 CAN ASCA Single Board Open Fail

4) When B-Side is removed after A-Side of the duplicated ASCA is removed

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 17:23:52 *** A8551 CAN ASCA DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF01/ASCA_B INFORM : BOARD_OPEN, SOURCE11003 COMPLETED	T T
<u>م</u>	

Fig. 5.1-8 CAN ASCA Dual Open Fail

5.1.1.1.3. ASIA Board

 When A-Side of the duplicated ASIA is normal and functional problems occur on the B-Side board



Console Window	
MSC(0x00) 2001-06-14 17:41:25 ** A9220 CAN ASIA SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF01/ASIA00_B INFORM : FUNCTION_FAIL, SOURCE11104 COMPLETED	



2) When functional problems occur on the B-Side board after functional problems occur on the A-Side of the duplicated ASIA

XOUTERM	<u> </u>
Console Window	
MSC(0x00) 2001-06-14 17:42:49 *** A9221 CAN ASIA DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF01/ASIA00_B INFORM : FUNCTION_FAIL, SOURCE11104 COMPLETED	

Fig. 5.1-10 CAN ASIA Dual Function Fail

3) When A-Side of the duplicated ASIA is normal and B-Side board is removed



Fig. 5.1-11 CAN ASIA Single Board Open Fail

4) When B-Side board is removed after A-Side of the duplicated ASIA is removed



XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 17:45:02 *** A9221 CAN ASIA DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF01/ASIA00_B INFORM : BOARD_OPEN, SOURCE11103 COMPLETED	
<u>م</u>	

Fig. 5.1-12 CAN ASIA Single Board Open Fail

5.1.1.1.4. AOTA Board

1) When functional faults occur on AOTA board

XOUTERM	_ _ _ _ _
Console Window	
MSC(0x00) 2001-06-14 17:48:49 ** A9250 CAN AOTA FUNCTION FAIL LOCATE : CAN/CANRO/SHELF01/AOTAOO INFORM : CNP, SOURCE11202 COMPLETED	
4	

Fig. 5.1-13 CAN AOTA Function Fail

2) When AOTA board is removed

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 17:50:39 ** A9240 CAN AOTA BOARD DELETION LOCATE : CAN/CANRO/SHELF01/AOTAOO INFORM : CNP, SOURCE11201 COMPLETED	

Fig. 5.1-14 CAN AOTA Board Open Fail

5.1.1.1.5. ATSA Board

1) When functional faults occur on ATSA board

Console Window	
MSC(0x00) 2001-06-14 17:52:09 ** A9270 CAN ATSA(CAMU) FUNCTION FAIL LOCATE : CAN/CANRO/SHELF01/ATSA00 INFORM : CNP, SOURCE11302 COMPLETED	



2) When ATSA board is removed

	ككك
Console Window	
MSC(0x00) 2001-06-14 17:52:54 ** A9260 CAN ATSA(CAMU) BOARD DELETION LOCATE : CAN/CANRO/SHELF01/ATSA00 INFORM : CNP, SOURCE11301 COMPLETED	⊼

Fig. 5.1-16 CAN ATSA Board Open Fail

5.1.1.1.1.6. PRI Board

 When A-Side of the duplicated PRI is normal and functional problems occur on the B-Side board



Fig. 5.1-17 CAMB PRI Single Power Fail

2) When functional problems occur on the A-Side after functional problems occur on the B-Side of the duplicated PRI

Console Window	
MSC(0x00) 2001-06-14 17:56:42 *** A9001 CAN CAMU DUAL POWER FAIL LOCATE : CAN/CANRO/SHELF01/PSU_A INFORM : POWER_FAIL, SOURCE12003 COMPLETED	

Fig. 5.1-18 CAMB PRI Dual Power Fail

3) When A-Side of the duplicated PRI is normal and B-Side board is removed

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 17:57:19 ** A9000 CAN CAMU SINGLE POWER FAIL LOCATE : CAN/CANRO/SHELF01/PSU_B INFORM : POWER_OPEN, SOURCE12004 COMPLETED	⊼
4	

Fig. 5.1-19 CAMB PRI Single Power Open Fail

4) When A-Side is removed after B-Side of the duplicated PRI is removed

XOUTERM	- O ×
Console Window	
MSC(0x00) 2001-06-14 17:58:03 *** A9001 CAN CAMU DUAL POWER FAIL LOCATE : CAN/CANRO/SHELF01/PSU_A INFORM : POWER_OPEN, SOURCE12002 COMPLETED	

Fig. 5.1-20 CAMB PRI Dual Power Open Fail

5.1.1.1.7. Others

1) When CAMB Alarm Cable is removed



X OUTERM	
Console Window	
MSC(0x00) 2001-06-14 17:59:44 * A7600 CAN ALARM CABLE OPEN LOCATE : CAN/CANRO/SHELF01/CNP INFORM : AMPO, SOURCE12001 COMPLETED	

Fig. 5.1-21 CAN Alarm Cable Open

5.1.1.1.2. CPNB

5.1.1.1.2.1. PNP Processor

 When A-Side of the duplicated PNP is normal and functional problems occur on the B-Side board

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 19:49:32 ** A8600 CAN PNPA SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF02/PNPA_B INFORM : FUNCTION_FAIL, SOURCE12018 COMPLETED	
⊴	

Fig. 5.1-22 CAN PNP Single Function Fail

2) When functional problems occur on the A-Side after B-Side of the duplicated PNP has a functional problem



Fig. 5.1-23 CAN PNP Dual Function Fail

3) When A-Side of the duplicated PNP is normal and B-Side board is removed

	_ 🗆 🗵
Console Window	
MSC(0x00) 2001-06-14 19:51:00 ** A8600 CAN PNPA SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF02/PNPA_B INFORM : BOARD_OPEN, SOURCE12017 COMPLETED	

Fig. 5.1-24 CAN PNP Single Board Open Fail

4) When A-Side is removed after B-Side of the duplicated PNP is removed

XOUTERM	<u>- 🗆 ×</u>
Console Window	
MSC(0x00) 2001-06-14 19:51:40 *** A8601 CAN PNPA DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF02/PNPA_A INFORM : BOARD_OPEN, SOURCE12015 COMPLETED	2 2 2
4	

Fig. 5.1-25 CAN PNP Dual Board Open Fail

5.1.1.1.2.2. ASCA Board

1) When A-Side of the duplicated ASCA is normal and functional problems occur on the B-Side board



Fig. 5.1-26 CPNB ASCA Single Function Fail

2) When functional problems occur on the A-Side after B-Side of the duplicated ASCA has a functional problem

X OUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:19:48 *** A8571 CAN ASCA(CPNU) DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF02/ASCA_A INFORM : FUNCTION_FAIL, SOURCE11502 COMPLETED	



3) When A-Side of the duplicated ASCA is normal and B-Side board is removed

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:20:27 ** A8570 CAN ASCA(CPNU) SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF02/ASCA_B INFORM : BOARD_OPEN, SOURCE11503 COMPLETED	
<u>م</u>	

Fig. 5.1-28 CPNB ASCA Single Board Open Fail

4) When A-Side is removed after B-Side of the duplicated ASCA is removed

X OUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:21:00 *** A8571 CAN ASCA(CPNU) DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF02/ASCA_A INFORM : BOARD_OPEN, SOURCE11501 COMPLETED	

Fig. 5.1-29 CPNB ASCA Dual Board Open Fail

5.1.1.1.2.3. ASIA Board

 When A-Side of the duplicated ASIA is normal and functional problems occur on the B-Side board



Console Window	
MSC(0x00) 2001-06-14 20:21:32 ** A9230 CAN ASIA(CPNU) SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF02/ASIA00_B INFORM : FUNCTION_FAIL, SOURCE11604 COMPLETED	



2) When functional problems occur on the A-Side after B-Side of the duplicated ASIA has a functional problem

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:22:03 *** A9231 CAN ASIA(CPNU) DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF02/ASIA00_A INFORM : FUNCTION_FAIL, SOURCE11602 COMPLETED	

Fig. 5.1-31 CPNB ASIA Dual Function Fail

3) When A-Side of the duplicated ASIA is normal and B-Side board is removed



Fig. 5.1-32 CPNB ASIA Single Board Open Fail

4) When A-Side is removed after B-Side of the duplicated ASIA is removed



XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:23:11 *** A9231 CAN ASIA(CPNU) DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF02/ASIA00_A INFORM : BOARD_OPEN, SOURCE11601 COMPLETED	
	(>

Fig. 5.1-33 CPNB ASIA Dual Board Open Fail

5.1.1.1.2.4. PRI Board

1) When A-Side of the duplicated PRI is normal and functional problems occur on the B-Side board

X OUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:25:00 ** A9040 CAN CPNU SINGLE POWER FAIL LOCATE : CAN/CANRO/SHELF02/PSU_B INFORM : POWER_FAIL, SOURCE12014 COMPLETED	T T

Fig. 5.1-34 CPNB PRI Single Power Fail

2) When functional problems occur on the A-Side after B-Side of the duplicated PRI has a functional problem

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:25:38 *** A9041 CAN CPNU DUAL POWER FAIL LOCATE : CAN/CANRO/SHELF02/PSU_A INFORM : POWER_FAIL, SOURCE12012	

Fig. 5.1-35 CPNB PRI Dual Power Fail

3) When A-Side of the duplicated PRI is normal and B-Side board is removed

X OUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:26:14 ** A9040 CAN CPNU SINGLE POWER FAIL LOCATE : CAN/CANRO/SHELF02/PSU_B INFORM : POWER_OPEN, SOURCE12013 COMPLETED	



4) When A-Side is removed after B-Side of the duplicated PRI is removed

Cons	ole Window
MSC(0x00) 2001-06-14 20:26:40 *** A9041 CAN CPNU DUAL POWEL LOCATE : CAN/CANRO/SHEL INFORM : POWER_OPEN, SO COMPLETED	A FAIL F02/PSU_A DURCE12011
<u>حا</u>	

Fig. 5.1-37 CPNB PRI Dual Power Open Fail

5.1.1.1.2.5. Others

1) CPNB Alarm Cable is removed

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:28:50 * A7600 CAN ALARM CABLE OPEN LOCATE : CAN/CANRO/SHELF02/PNP INFORM : AMPO, SOURCE12010 COMPLETED	

Fig. 5.1-38 CPNB Alarm Cable Open

5.1.1.1.3. PCFB(PCP)

5.1.1.1.3.1. PCP Processor

 When A-Side of the duplicated PCP is normal and functional problems occur on the B-Side board



XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:30:05 ** A8710 CAN PCPA SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF03/PCPA_B INFORM : FUNCTION_FAIL, SOURCE17009 COMPLETED	



2) When functional problems occur on the A-Side after B-Side of the duplicated PCP has a functional problem

X OUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:30:54 *** A8711 CAN PCPA DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF03/PCPA_A INFORM : FUNCTION_FAIL, SOURCE17007 COMPLETED	
4	

Fig. 5.1-40 PCFB PCP Dual Function Fail

3) When A-Side of the duplicated PCP is normal and B-Side board is removed

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:31:23 ** A8710 CAN PCPA SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF03/PCPA_B INFORM : BOARD_OPEN, SOURCE17008 COMPLETED	
4	

Fig. 5.1-41 PCFB PCP Single Board Open Fail

4) When A-Side is removed after B-Side of the duplicated PCP is removed

Console Window	
MSC(0x00) 2001-06-14 20:31:49 *** A8711 CAN PCPA DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF03/PCPA_A INFORM : BOARD_OPEN, SOURCE17006 COMPLETED	

Fig. 5.1-42 PCFB PCP Dual Board Open Fail

5.1.1.1.3.2. BCRA Board

1) When A-Side of the duplicated BCRA is normal and functional problems occur

on the B-Side board

XOUTERM	- 🗆 ×
Console Window	
MSC(0x00) 2001-06-14 20:37:36 ** A8740 CAN BCRA SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF03/BCRA_B INFORM : FUNCTION_FAIL, SOURCE17204 COMPLETED	7
<u>م</u>	

Fig. 5.1-43 CPNB(PCP) BCRA Single Function Fail

2) When functional problems occur on the A-Side after B-Side of the duplicated BCRA has a functional problem



Fig. 5.1-44 CPNB(PCP) BCRA Dual Function Fail

3) When A-Side of the duplicated BCRA is normal and B-Side board is removed

X OUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:38:42 ** A8740 CAN BCRA SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF03/BCRA_B INFORM : BOARD_OPEN, SOURCE17203 COMPLETED	



4) When A-Side is removed after B-Side of the duplicated BCRA is removed

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:39:11 *** A8741 CAN BCRA DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF03/BCRA_A INFORM : BOARD_OPEN, SOURCE17201 COMPLETED	
4	

Fig. 5.1-46 CPNB(PCP) BCRA Dual Board Open Fail

5.1.1.1.3.3. UCPA(PIP) Board

1) When functional faults occur on UCPA(PIP) board

X OUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:39:53 ** A9310 CAN PIPA FUNCTION FAIL LOCATE : CAN/CANRO/SHELF03/PIPA00 INFORM : PCP00, SOURCE17206 COMPLETED	<u>д</u>
⊲	



2) When UPCA(PIP) board is removed



Console Window	
MSC(0x00) 2001-06-14 20:40:25 ** A9300 CAN PIPA BOARD DELETION LOCATE : CAN/CANRO/SHELF03/PIPA00 INFORM : PCP00, SOURCE17205 COMPLETED	

Fig. 5.1-48 CPNB(PCP) PIP Board Open Fail

5.1.1.1.3.4. FERA Board

1) When A-Side of the duplicated FERA is normal and functional problems occur

on the B-Side board

XOUTERM	_ D ×
Console Window	
MSC(0x00) 2001-06-14 20:41:14 ** A8560 CAN FERA SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF03/FERA_B INFORM : FUNCTION_FAIL, SOURCE17230 COMPLETED	N N N N N N N N N N N N N N N N N N N

Fig. 5.1-49 CPNB(PCP) FERA Single Function Fail

2) When functional problems occur on the A-Side after B-Side of the duplicated FERA has a functional problem



Fig. 5.1-50 CPNB(PCP) FERA Dual Function Fail

3) When A-Side of the duplicated FERA is normal and B-Side board is removed

Console Window	
MSC(0x00) 2001-06-14 20:42:27 ** A8560 CAN FERA SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF03/FERA_B INFORM : BOARD_OPEN, SOURCE17229 COMPLETED	



4) When A-Side is removed after B-Side of the duplicated FERA is removed

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:42:58 *** A8561 CAN FERA DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF03/FERA_A INFORM : BOARD_OPEN, SOURCE17227 COMPLETED	⊼
4	

Fig. 5.1-52 CPNB(PCP) FERA Dual Board Open Fail

5.1.1.1.3.5. FETA Board

1) When functional faults occur on FETA board

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:44:52 ** A9330 CAN FETA FUNCTION FAIL LOCATE : CAN/CANRO/SHELF03/FETA INFORM : PCP00, SOURCE17232 COMPLETED	

Fig. 5.1-53 CPNB(PCP) FETA Function Fail

2) When FETA board is removed



Console Window	
MSC(0x00) 2001-06-14 20:45:27 ** A9320 CAN FETA BOARD DELETION LOCATE : CAN/CANRO/SHELF03/FETA INFORM : PCP00, SOURCE17231 COMPLETED	
<u>۲</u>	



5.1.1.1.3.6. PRI Board

1) When A-Side of the duplicated PRI is normal and functional problems occur on

the B-Side board

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:46:28 ** A9010 CAN PCFU(PCP) SINGLE POWER FAIL LOCATE : CAN/CANRO/SHELF03/PSU_B INFORM : POWER_FAIL, SOURCE17005 COMPLETED	
A	

Fig. 5.1-55 CPNB(PCP) PRI Single Power Fail

2) When functional problems occur on the A-Side after B-Side of the duplicated PRI has a functional problem

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:47:06 *** A9011 CAN PCFU(PCP) DUAL POWER FAIL LOCATE : CAN/CANRO/SHELF03/PSU_A INFORM : POWER_FAIL, SOURCE17003 COMPLETED	
ব্ <u></u>	

Fig. 5.1-56 CPNB(PCP) PRI Dual Power Fail

3) When A-Side of the duplicated PRI is normal and B-Side board is removed

Console Window	
MSC(0x00) 2001-06-14 20:47:33 ** A9010 CAN PCFU(PCP) SINGLE POWER FAIL LOCATE : CAN/CANRO/SHELF03/PSU_B INFORM : POWER_OPEN, SOURCE17004 COMPLETED	
⊴	



4) When A-Side is removed after B-Side of the duplicated PRI is removed

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:48:00 *** A9011 CAN PCFU(PCP) DUAL POWER FAIL LOCATE : CAN/CANRO/SHELF03/PSU_A INFORM : POWER_OPEN, SOURCE17002 COMPLETED	

Fig. 5.1-58 CPNB(PCP) PRI Dual Power Open Fail

5.1.1.1.3.7. Others

1) When PCFU(PCP) Alarm Cable is removed

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 20:54:19 * A7600 CAN ALARM CABLE OPEN LOCATE : CAN/CANRO/SHELF03/PCP_00 INFORM : AMPO, SOURCE17001 COMPLETED	
4	

Fig. 5.1-59 CPNB(PCP) Alarm Cable Open

2) When faults occur in the link between FERA B-Side and FETA after the link between FERA A-Side and FETA operates normally (maximum 3 links exist)
| Console Window | |
|---|--|
| MSC(0x00) 2001-06-14 20:56:44
** A8820 CAN FERA/FETA LINK FAIL
LOCATE : CAN/CANRO/SHELF03/FERA_B/LINKOO
INFORM : PCPOO, SOURCE17242
COMPLETED | |
| 4 | |



3) When faults occur in the link between FERA A-Side and FETA after faults occur

in the link between FERA B-Side and FETA(maximum 3 links exist)

XOUTERM	<u>- 0 ×</u>
Console Window	
MSC(0x00) 2001-06-14 20:59:04 ** A8820 CAN FERA/FETA LINK FAIL LOCATE : CAN/CANRO/SHELF03/FERA_A/LINK00 INFORM : PCP00, SOURCE17241 COMPLETED	
4	

Fig. 5.1-61 LINK Fail between CPNB(PCP) FERA and FETA

4) When faults occur in the link between FETA and PDSN(maximum3 links exist)

XOUTERM	<u>- 0 ×</u>
Console Window	
MSC(0x00) 2001-06-14 21:00:29 ** A8840 CAN FETA/PDSN LINK FAIL LOCATE : CAN/CANRO/SHELF03/FETA<->PDSN/LINK00 INFORM : PCP00, SOURCE17243 COMPLETED	

Fig. 5.1-62 LINK Fail between CPNB(PCP) FETA and PDSN

5) When 1pps Clock is not provided for PCP normally

	-OX
Console Window	
MSC(0x00) 2001-06-14 21:01:11 ** A8800 CAN PCPA 1PPS CLOCK FAIL LOCATE : CAN/CANRO/SHELF03/PCP INFORM : PCP00, SOURCE17251 COMPLETED	



6) When 10MHz Clock is not provided for PCP normally

XOUTERM	<u>- 0 ×</u>
Console Window	
MSC(0x00) 2001-06-14 21:01:43 ** A8810 CAN PCPA 10MHz CLOCK FAIL LOCATE : CAN/CANRO/SHELF03/PCP INFORM : PCP00, SOURCE17252 COMPLETED	
ব্ <u></u>	

Fig. 5.1-64 PCFB PCP 10MHz Clock Fail

5.1.1.1.4. PCFB(PMP)

5.1.1.1.4.1. PMP Processor

 When A-Side of the duplicated PMP is normal and functional problems occur on the B-Side board



Fig. 5.1-65 PCFB(PMP) PMP Single Function Fail

2) When functional problems occur on the A-Side after B-Side of the duplicated PMP has a functional problem

Console Window	
MSC(0x00) 2001-06-14 21:04:31 *** A8721 CAN PMPA DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF04/PMPA_A INFORM : FUNCTION_FAIL, SOURCE17016 COMPLETED	

Fig. 5.1-66 PCFB(PMP) PMP Dual Function Fail

3) When A-Side of the duplicated PMP is normal and B-Side board is removed

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 21:04:59 ** A8720 CAN PMPA SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF04/PMPA_B INFORM : BOARD_OPEN, SOURCE17017 COMPLETED	

Fig. 5.1-67 PCFB(PMP) PMP Single Board Open Fail

4) When A-Side is removed after B-Side board of the duplicated PMP is removed

XOUTERM	- D ×
Console Window	
MSC(0x00) 2001-06-14 21:05:26 *** A8721 CAN PMPA DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF04/PMPA_A INFORM : BOARD_OPEN, SOURCE17015 COMPLETED	
<u>4</u>	

Fig. 5.1-68 PCFB(PMP) PMP Dual Board Open Fail

5.1.1.1.4.2. BCRA Board

See BCRA of PCFU(PCP).

5.1.1.1.4.3. UCPA(PIP) Board

See UCPA(PIP) of PCFU(PCP).

5.1.1.1.4.4. FERA Board

See FERA of PCFU(PCP).



5.1.1.1.4.5. FETA Board

See FETA of PCFU(PCP).

5.1.1.1.4.6. PRI Board

See PRI of PCFU(PCP).

5.1.1.1.4.7. Others

See others of PCFU(PCP).

5.1.1.1.5. TGDB

5.1.1.1.5.1. GPSR Board

1) When A-Side of the duplicated GPSR is normal and functional problems occur on the B-Side board

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 21:17:09 ** A8000 CAN GPSR SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF07/GPSR00_B INFORM : FUNCTION_FAIL, SOURCE13007 COMPLETED	

Fig. 5.1-69 TGDB GPSR Single Function Fail

2) When functional problems occur on the A-Side after B-Side of the duplicated GPSR has a functional problem

X OUTERM	<u> </u>
Console Window	
MSC(0x00) 2001-06-14 21:17:38 *** A8001 CAN GPSR DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF07/GPSR00_A INFORM : FUNCTION_FAIL, SOURCE13004 COMPLETED	A V
<u>حا</u>	

Fig. 5.1-70 TGDB GPSR Dual Function Fail

 When A-Side of the duplicated GPSR is normal and faults occur on the B-Side power

X OUTERM	_ 🗆 🗵
Console Window	
MSC(0x00) 2001-06-14 21:18:19 ** A8000 CAN GPSR SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF07/GPSR00_B INFORM : POWER_FAIL, SOURCE13005 COMPLETED	



4) When a problem occurs on the A-Side power after B-Side power of the duplicated GPSR has a problem

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 21:19:02 *** A8001 CAN GPSR DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF07/GPSR00_A INFORM : POWER_FAIL, SOURCE13002 COMPLETED	T T T T T T T T T T T T T T T T T T T
4	

Fig. 5.1-72 TGDB GPSR Dual Power Fail

5) When A-Side of the duplicated GPSR is normal and B-Side board is removed

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 21:19:35 ** A8000 CAN GPSR SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF07/GPSR00_B INFORM : BOARD_OPEN, SOURCE13006 COMPLETED	A A
4	

Fig. 5.1-73 TGDB GPSR Single Board Open Fail

6) When A-Side is removed after B-Side of the duplicated GPSR is removed



Console Window	
MSC(0x00) 2001-06-14 21:20:04 *** A8001 CAN GPSR DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF07/GPSR00_A INFORM : BOARD_OPEN, SOURCE13003 COMPLETED	
<u>a</u>	

Fig. 5.1-74 TGDB GPSR Dual Board Open Fail

5.1.1.1.5.2. GPSD Board

1) When A-Side of the duplicated GPSD is normal and functional problems occur on the B-Side board

XOUTERM	- O ×
Console Window	
MSC(0x00) 2001-06-14 21:40:08 ** A8050 CAN GPSD SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF07/GPSD00_B INFORM : FUNCTION_FAIL, SOURCE13020 COMPLETED	7
4	

Fig. 5.1-75 TGDB GPSD Single Function Fail

2) When functional problems occur on the A-Side after B-Side of the duplicated GPSD has a functional problem

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 21:42:13 *** A8051 CAN GPSD DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF07/GPSD00_A INFORM : FUNCTION_FAIL, SOURCE13016 COMPLETED	

Fig. 5.1-76 TGDB GPSD Dual Function Fail

 When A-Side of the duplicated GPSD is normal and faults occur on the B-Side power

Console Window	
MSC(0x00) 2001-06-14 21:42:42 ** A8050 CAN GPSD SINGLE ABNORMAL LOCATE : CAN/CANRO/SHELF07/GPSD00_B INFORM : POWER_FAIL, SOURCE13021 COMPLETED	



4) When faults occur on the A-Side power after faults occur on the B-Side power of the duplicated GPSD

XOUTERM	
Console Window	
MSC(0x00) 2001-06-14 21:45:26 *** A8051 CAN GPSD DUAL ABNORMAL LOCATE : CAN/CANRO/SHELF07/GPSD00_A INFORM : POWER_FAIL, SOURCE13017 COMPLETED	

Fig. 5.1-78 TGDB GPSD Dual Power Fail

5.1.1.1.5.3. AMP Processor

1) When faults occur in AMP Processor or a problem occurs in TCP/IP link between BSM and AMP

XOUTERM	<u>- 0 ×</u>
Console Window	
MSC(0x00) 2001-06-14 22:28:38 *** A8700 CAN AMPA ABNORMAL LOCATE : CAN/AMPAO INFORM : TRM COMPLETED	
ATT 200	KI.

Fig. 5.1-79 TGDB AMP Abnormal

5.1.1.1.5.4. Others

1) When a problem occurs in GPSR Alarm Cable

Console Window	
MSC(0x00) 2001-06-14 21:55:03 * A7600 CAN ALARM CABLE OPEN LOCATE : CAN/CANRO/SHELF07/GPSR_00 INFORM : AMPO, SOURCE13001 COMPLETED	



2) When a problem occurs in GPSD Alarm Cable

XOUTERM	_ 🗆 🗵
Console Window	
MSC(0x00) 2001-06-14 21:54:17 * A7600 CAN ALARM CABLE OPEN LOCATE : CAN/CANRO/SHELF07/GPSD_02 INFORM : AMPO, SOURCE13015 COMPLETED	

Fig. 5.1-81 TGDB GPSD Alarm Cable Open

3) When a problem occurs in GPSR Control Cable

XOUTERM	<u> – D ×</u>
Console Window	
MSC(0x00) 2001-06-14 21:50:38 ** A7500 CAN GPSR CONTROL CABLE OPEN LOCATE : CAN/CANRO/SHELF07/GPSR00 INFORM : AMPO, SOURCE18011 COMPLETED	

Fig. 5.1-82 TGDB GPSR Control Cable Open

5.1.1.1.6. FAN and Others

1) When a problem occurs in CAN FAN

Console Window	
MSC(0x00) 2001-06-14 21:57:44 ** A7800 CAN RACK FAN FAIL LOCATE : CAN/CANRO/SHELF00 INFORM : AMPO, SOURCE18001 COMPLETED	A
<u>حا</u>	



5.1.1.2. BSC Occurrence Alarm Message

5.1.1.2.1. CCSB

5.1.1.2.1.1. CCP Processor

 When A-Side of the duplicated CCP is normal and functional problems occur on the B-Side board

X OUTERM	
Console Window	
MSC(0x00) 2001-06-14 22:43:24 ** A5700 BSC CCPA SINGLE ABNORMAL LOCATE : BSC00/BNCR0/SHELF01/CCPA_B INFORM : FUNCTION_FAIL, SOURCE14009 COMPLETED	
<u>م</u>	

Fig. 5.1-84 CCSB CCP Single Function Fail

2) When functional problems occur on the A-Side after B-Side of the duplicated CCP has a functional problem

X OUTERM	
Console Window	
MSC(0x00) 2001-06-14 22:44:03 *** A5701 BSC CCPA DUAL ABNORMAL LOCATE : BSC00/BNCR0/SHELF01/CCPA_A INFORM : FUNCTION_FAIL, SOURCE14007 COMPLETED	A A
4	K



3) When A-Side of the duplicated CCP is normal and B-Side board is removed