

Field Feature Bill of Material (FFBM)

PN 05F2769 RPQ 7L1221

**CONVERT an ALC (Air Line Control) scanner (RPQ 7L1148)
in a LSS (Low Speed Scanner) (FC 4721)**

in IBM 3745 Models 170 or 17A

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Before Installation (steps 1-8)

Net Priced Feature

All parts removed from this machine are IBM property and must be returned to IBM.

1.0 Machines Affected

3745 Models 170 and 17A.

2.0 Related BMs and ECs

None.

3.0 BM(s) to be Installed

3.1 Install the following BMs

- FFBM 05F2769 - Installation Instructions
- FFBM 05F2769 - Convert an ALC scanner (RPQ 7L1148) in a LSS (FC 4721)

4.0 Preparation

1. Familiarize yourself with the purpose and details of the installation instruction before negotiating machine time with the customer.
2. Check all items listed on the BM(s) to determine that all parts have been received.
3. Based on the *Hone Configurator sheet* and the following table, determine the adapter(s) card position(s) to be installed.

Adapter Number	12	11	10	9	4	3
ALC Position	M2	N2	P2	Q2	R2	T2

5.0 Programming

5.1 Diagnostic Programs

To reflect this change, the CDF will be performed in Step 11.0. This is essential to allow internal diagnostics to be run properly.

5.2 System Programs

The customer has to update the control program to implement this change.

6.0 Purpose and Description

6.1 Purpose

Convert an ALC feature (RPQ 7L1148) in a Low Speed Scanner (FC 4721).

6.2 Description

Exchange the SALC card by a CSC card.

7.0 Installation Time

FFBM	Machine Hrs.	System Hrs.
05F2769	1.0	00.0
Test Time	0.5	00.0
Total Time	1.5	00.0

8.0 Tools/Materials Required

None.

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Installation (steps 9-11)

9.0 Safety

- The adapter installation must be performed offline.
- Review the **Safety Notices** and the **Safety Inspection Procedures** located at the beginning of the *3745 Maintenance Information Procedures (MIP)* manual (SY33-2070).

10.0 Details of Installation

Before the installation, ask the customer:

- To set all the lines and channel addresses offline for this controller.
- To deactivate all resources of the 3746 Model 900, if attached.
- For the maintenance password.
- To logoff the console (3745-170) or the Service Processor (SP) (3745-17A), if not already done.

10.1 Checking, Diagnostics, Power OFF

10.1.1 Checking

10.1.1.1 From the 3745 Control Panel

- 1. Check that **Power Control** displays 3.
- 2. If it does not, record the value ____.
Set the **Power Control** value to 3.
Press the **Validate** key.

- If you are installing this RPQ in a 3745-17A, go to Step 10.1.1.3, "From the Service Processor."
- Otherwise, continue.

10.1.1.2 From the 3745-170 Console

- 1. From the **CA INTERFACE DISPLAY** screen, record **Enabled channel adapters**. Then, **disable** all channel adapters.
- 2. Wait for **Interface Status Disabled** for all CAs. Press **F4**.
- 3. Enter the maintenance password, press **Send**.
- 4. If the CCU is running, enter **RST** to reset the CCU.
The MOSS goes in **MOSS ALONE** state.

- Go to Step 10.1.1.4, "Display the CDF" on page 5.

10.1.1.3 From the Service Processor

- 1. On the **MOSS-E View** window, click on **Program**.
- 2. Click on **LOG ON MOSS-E**.
- 3. Enter the maintenance password, press **Enter**.
- 4. On the **MOSS-E View** window, double click on the icon of the identified 3745.
- 5. On the **3745 Menu** window, double click on **MOSS Console**.
- 6. When **MOSS Console** screen is displayed, enter **CID**, press **Enter**.
- 7. From the **CA INTERF DISPLAY** screen, record **Enabled channel adapters**. Then, **disable** all channel adapters.
- 8. When all CAs are **DISABLED**, press **F1**.
- 9. If CCU running, enter **RST** to reset the CCU.
The MOSS goes in **MOSS ALONE** state.

10.1.1.4 Display the CDF

Note: From this point, the **Send** key is used only for a local console. For a Service Processor, press the **Enter** key.

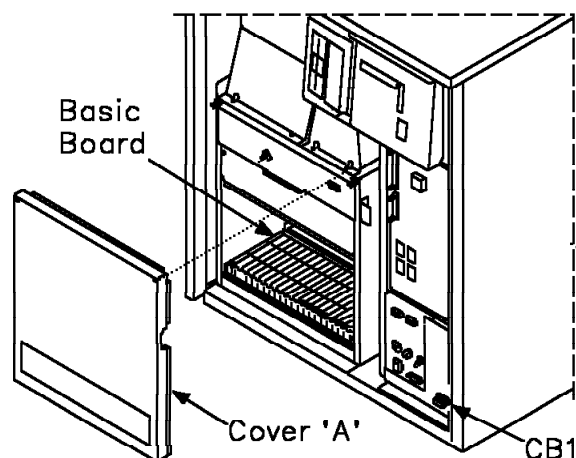
- ___ 1. Enter **CDF**, press **Send/Enter**.
- ___ 2. Enter **1** (DISPLAY/UPDATE), press **Send/Enter**.
- ___ 3. Enter **10** (LINE ADAPTERS (LA)), press **Send/Enter**.
Check for the presence of a **Y** for the LA position to be converted according to the *HONE configurator sheet*. Check also that the **LA type=4(ALC)**. Press **F1**.

10.1.2 Diagnostics

- ___ 1. Enter **ODG**, press **Send/Enter**.
- ___ 2. Enter **3** (IOCB), press **Send/Enter**.
 - If **NO ERROR FOUND** is displayed, press **F1**.
 - Otherwise, see the *MIP*, Chapter 1.

10.1.3 Power OFF

- ___ 1. From the control panel, press the **Power off** key.
- ___ 2. Open the system cover and switch off **CB1**.



Front View

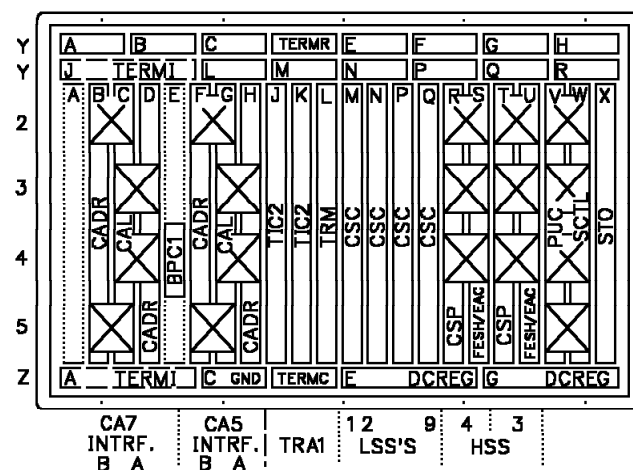
10.2 Hardware Installation

Warning: Follow existing ESD procedures when handling logic parts.

10.2.1 Card Exchange

From the front of the 3745:

- ___ 1. Remove the cover 'A' and its two screws. Save for reinstallation.
- ___ 2. Identify the card adapter position to be exchanged (see the table in Step 4.0, "Preparation" on page 3).
- ___ 3. Disconnect the MUX cable from the card connector and unplug the SALC card.
- ___ 4. In the same position, install the CSC card provided with the FFB/M. Check that the holder is installed on the card.
- ___ 5. Plug the card, and connect the MUX cable in the card.
- ___ 6. Reinstall the cover 'A' with its two screws.



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10.3 Power ON

Switch **CB1** ON, and close system covers.

10.3.1 From the 3745 Control Panel

- ___ 1. set the **Function** indicator to 1.
Press the **Validate** key.
- ___ 2. Press the **Power ON Reset** key.

The MOSS IML is completed when **F0E** is displayed on the 3745 control panel.

- If you have installed this RPQ in a 3745-17A, go to Step 10.3.3, "From the Service Processor."
- Otherwise, continue.

10.3.2 From the 3745-170 Console

- ___ 1. When the **CA INTERFACE DISPLAY** screen is displayed, press **F4**.
- ___ 2. Enter the maintenance password, press **Send**.

- Go to Step 11.1, "Update the CDF."

10.3.3 From the Service Processor

- ___ 1. Double click on the 3745 icon when it becomes **PURPLE**.
- ___ 2. On the **3745 Menu** window, double click on **MOSS console**.

Wait for the **Function Selection Rules** screen.

11.0 Test Procedures

11.1 Update the CDF

- ___ 1. Enter **CDF**, press **Send/Enter**.
- ___ 2. Enter **4** (VERIFY), press **Send/Enter**.
The values from the **CDF DATA** and the **MACHINE DATA** should be identical, except for the adapter you have just replaced.
- ___ 3. To update the CDF with machine values, enter **2**, press **Send/Enter**.
 - If **CDF VERIFY COMPLETED** is displayed, press **F6**.
 - Otherwise, see the *MIP*,

11.2 Display the CDF

- ___ 1. Enter **CDF**, press **Send/Enter**.
- ___ 2. Enter **1** (DISPLAY/UPDATE), press **Send/Enter**.
- ___ 3. Enter **10** (LINE ADAPTERS (LA)), press **Send/Enter**.
A **Y** should appear under the LA number you have just converted.
Check the **LA TYPE** value: 1 for TSS.
Press **F1**.

11.3 Diagnostics

- ___ 1. Enter **ODG**, press **Send/Enter**.
- ___ 2. Enter **5** (TSS). Enter the **Adapter Number**, press **Send/Enter**.
 - If **NO ERROR FOUND** is displayed, press **F1**.
 - Otherwise, see the *MIP*, Chapter 1.

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11.4 Save Hard Disk Contents Onto the Backup set of Diskettes

- ___ 1. Select **DIF**, press **Send/Enter**.
- ___ 2. Select **2**. Enter the date and save-ID, press **Send/Enter**.
Follow the prompts on the console.
- ___ 3. When function is completed, press **F1**.

- If you have installed this RPQ in a 3745-17A, go to Step 11.6, "From the Service Processor."
- Otherwise, continue.

11.5 From the 3745-170 Console

Re-enable the channel adapters disabled in Step 10.1.1.2, "From the 3745-170 Console" on page 4.

- Go to Step 11.7, "General IPL."

11.6 From the Service Processor

- ___ 1. On the **3745 Menu** window, double click on **MOSS Console**,
- ___ 2. Enter **CID**, press **Enter**.
- ___ 3. Enable the channel adapter recorded in Step 10.1.1.3, "From the Service Processor" on page 4.
Wait until all channels are **E** in the E/D REQUEST column.
Press **F1**.
- ___ 4. Enter **OFF**, press **Enter**.
- ___ 5. On the **3745 Menu** window, click on **Function**. Then, click on **Exit**.
- ___ 6. On the **MOSS-E View** window, click on **Program**.
- ___ 7. Click on **LOG OFF MOSS-E**.

11.7 General IPL

11.7.1 From the 3745 Control Panel

- ___ 1. Set the **Power Control** indicator to its original value recorded in Step 10.1.1.1, "From the 3745 Control Panel" on page 4.
- ___ 2. Set the **Function** indicator value to **0** (general IPL).
Press the **Validate** key.

The general IPL starts.

- If **FF4** is displayed on the control panel, ask the customer to load the control program.
- If the control program is loaded from the hard disk, **000** will be displayed when **IPL** is successful.

Note: The control program load can fail if a mismatch exists between the control program and the hardware configuration.

- If you have installed an adapter in a 3745-17A, go to Step 11.7.3, "From the Service Processor."
- Otherwise, continue.

11.7.2 From the 3745-170 Console

Ask the customer to activate the resources on the new adapter if the NCP is configured.

- Go to Step "After Installation (steps 12-15)" on page 8.

11.7.3 From the Service Processor

- ___ 1. Enter **MON**, press **Enter**.
- ___ 2. Enter **OFF**, press **Enter**.
- ___ 3. On the **MOSS-E View** window, click on **Program**.
- ___ 4. Click on **LOG OFF MOSS-E**.

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After Installation (steps 12-15)

12.0 Field Updating

None.

13.0 Publications Update

None.

14.0 Parts Disposition

All replaced/removed parts become the property of IBM. You **MUST RETURN** these parts following the instructions given on the Returned Material Equipment Report (RMER) provided with this FFBM.

15.0 Machine Records

- Install the new **MACHINE HISTORY** supplied.
- Report installation and quality to existing procedures.

End of instructions.

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Processing Options

Runtime values:

Document fileid	P05F2769 SCRIPT
Document type	PNCDOC
Document style	FBII
Profile	EDFPRF30
Service Level	21Jun90
SCRIPT/VS Release	3.2.1
Date	94.09.14
Time	16:03:16
Device	3820A
Number of Passes	2
Index	YES
SYSVAR G	INLINE
SYSVAR P	3820
SYSVAR R	XREF
SYSVAR U	FNT382SS
SYSVAR W	XREF

Formatting values used:

Annotation	NO
Cross reference listing	YES
Cross reference head prefix only	NO
Dialog	LABEL
Duplex	SB
DVCF conditions file	(none)
DVCF value 1	(none)
DVCF value 2	(none)
DVCF value 3	(none)
DVCF value 4	(none)
DVCF value 5	(none)
DVCF value 6	(none)
DVCF value 7	(none)
DVCF value 8	(none)
DVCF value 9	(none)
Explode	NO
Figure list on new page	YES
Figure/table number separation	YES
Folio-by-chapter	NO
Head 0 body text	(none)

Head 1 body text	(none)
Hyphenation	YES
Justification	NO
Language	ENGL
Layout	2
Leader dots	YES
Master index	(none)
Partial TOC (maximum level)	4
Partial TOC (new page after)	INLINE
Print example id's	NO
Print cross reference page numbers	YES
Process value	3820
Punctuation move characters	”
Read cross-reference file	XREF
Running heading/footing rule	NONE
Show index entries	NO
Table of Contents (maximum level)	3
Table list on new page	YES
Title page (draft) alignment	CENTER
Write cross-reference file	XREF

<div>Imbed Trace</div>

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