

Worldwide Response Center

## HP 3000 APPLICATION NOTE #46



# SETTING UP AN HPDESK/HPTELEX INTERFACE FOR THE FIRST TIME

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## RESPONSE CENTER APPLICATION NOTES

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## INTRODUCTION

This article describes the fundamentals of setting up a simple interface between HP Desk and HP Telex, and then goes on to discuss some of the features that can be used to add further functionality to the interface to suit individual requirements. You will probably find it helpful to read the article either whilst at a terminal so that you can see the relevant configuration screens, or with the HP DeskManager Administration Reference and Administrator's Guide to HP Telex II manuals handy, for the same reason. Please note that all the information refers to HP Desk IV (version B.xx.xx) and to HP Telex II (version A.02.xx).

### Setting Up The HP Desk/HP Telex Interface For The First Time

Let us assume that we want to set up HP Desk and HP Telex so that all HP Desk users on this machine can send outgoing telexes, and all incoming telexes are to be routed into HP Desk. This gives us the potential ability to route them to the intended recipient's In Tray. For simplicity, let us also assume that we have a single telex line (and therefore just one telex number).

Configuration changes must be made for both HP Telex and HP Desk. To receive Telexes into HP Desk you must configure an HP Desk location to be used by HP Telex and configure HP Telex to route incoming telexes to HP Desk. To send telexes from HP Desk you must configure a location for HP Desk users to send to, an FSC Gateway to HP Telex and a route between the two; in HP Telex you must configure a department or departments to be used for telexes coming from HP Desk. As the HP Telex configuration is the most straightforward, we will start with that.

In TELEXCONFIG you must configure a department called HPDESK in the normal way. In addition, there is an HP Desk Configuration section. Look at this part of the configuration either on your system or in the Administrator's Guide to HP Telex II. Here you should specify you want to route incoming telexes to HP Desk and that HP Desk users can send telexes. Leave the routing sequence as the default "HPHP" (Beginning) and "." (End). We will discuss the use of routing sequences later. You can choose whether you require confirmation about whether a telex was successfully sent or not by answering "Y" or "N" to "Confirmation in HPDESK INTRAY required?". If you specify "N", confirmation will only be received if the user specifies ACK 2 (Acknowledge receipt - in this case by HP Telex) before mailing the telex. Finally, you should choose a location name to be used as the source of incoming telexes (and the destination for outgoing ones). "TELEX" is usually a sensible choice. Note that people sending telexes from HP Desk are considered to be Level 1 HP Telex users.

Now the HP Desk configuration, which is a little more complicated. Again, either use MAILCONFIG or look at the HP DeskManager Administration Reference manual to look at the format or the various configuration screens.

First of all, add the location you specified in HP Telex as the HP Desk location to be used, that is; TELEX. This is the location that will be shown as the sender's location on incoming telexes. Then, make the location hierarchical. As there should not be any remote sublocations or users on this location, it should be Node Resolving, that is this computer knows about all users configured under this location.

Next, you have to set up a Foreign Service Connection Gateway for HP Desk to use to transfer messages from the HP Desk system to the HP Telex system. (See the "Beginner's Guide to FSC" in Application Note 35 for general information on the Foreign Service Connection). As far as HP Desk is concerned, HP Telex is a "Foreign" Service. A sensible name for the HP Telex gateway would be "HPTELEX". The connecting IPC file name must be TELRCV.HPTELEX.HPOFFICE. The format of messages is usually "4" - ARPA format (compressed), but may also be "2" - ARPA format. Format 4 strips out all the "extra" text ("Part

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1", "Part 2" and the Distribution List), whereas format 2 leaves it all in. Formats 1 and 3 must not be used, as HP Telex will not be able to interpret the files produced by HP Desk. The Foreign Service Gateway reference name must be left blank. You may choose whether you want messages marked as PRIVATE to be transmitted. For the HP Telex gateway this would normally be "N", as all telexes are printed, and privacy would be lost. Messages must not be stored in PRIVILEGED files as HP Telex will be unable to read them. Most people choose HPTELEX.HPOFFICE as the group name to store messages (E-files). However, see other considerations later in this article. Gateway availability should reflect the times when HP Telex is running.

Having set up an HP Desk location TELEX and an HPTELEX gateway, you must connect the two together using a Route. In the Route Menu, leave both the sublocation and the Route Priority blank.

Finally, ensure that you have a Default User for messages from Foreign Systems in the Local Control Data screen in the System section of MAILCONFIG. This can be any local user. Some people use General Delivery for the TELEX location, but it is often easier when trouble shooting and more descriptive to HP Desk users if you call it something like TELEX ADMINISTRATOR if HP Telex is your only Foreign Service, or FSC ADMINISTRATOR if you use others.

This completes the configuration for both HP Desk and HP Telex to get a simple HP Desk/HP Telex interface to work. However, there are 2 more things which you may have to do.

Firstly, if you have not purchased DS or NS software, when the Mail Truck job runs a program called DSMTRUCK, you will see a list of unresolved externals in the job listing for MTRUCK0, which look like this:

```
:RUN DSMTRUCK.HPMAIL.SYS;LIB=G;PARAM=0
UNRESOLVED PROGEXTERNAL PWRITE
UNRESOLVED PROGEXTERNAL PCLOSE
UNRESOLVED PROGEXTERNAL PCONTROL
UNRESOLVED PROGEXTERNAL POPEN
UNRESOLVED PROGEXTERNAL PCHECK
SL BINDING ERROR (LOAD ERR 27)
UNABLE TO LOAD PROGRAM TO RUN. (CIERR 625)
```

This is because the HP Desk transport system is used to transfer mail between HP Desk systems on different HP3000's as well as to Foreign Services, and it uses DS or NS software to perform the actual transfer. MPE attempts to resolve references to external routines when a program is first loaded, and if they do not exist the program will not run. As we do not need DS or NS to transfer messages through an FSC gateway, we can remedy this by adding dummy segments into SL.HPMAIL.SYS - again, refer to Application Note 35 for information on how to do this.

Secondly, you must ensure that MPE security allows the user MAILTRCK.HPOFFICE,HPMAIL to have WRITE access to TELRECV.HPTELEX.HPOFFICE and SAVE access to the group in which the messages are to be stored - HPTELEX.HPOFFICE in the above example. You can check this using LISTDIR5.PUB.SYS. The default security is

```
LISTDIR5 G.02.B0 (C) HEWLETT-PACKARD CO., 1983
TYPE 'HELP' FOR AID
```

```
>listgroup hptelex.hpoffice
```

```
*****
```

```
GROUP: HPTELEX.HPOFFICE
```

```
DISC SPACE: 14228(S)
```

```
CPU TIME: 164158(SEC)
```

```
CONNECT TIME: 16879(MIN)
```

```
DISC LIMIT: UNLIMITED
```

```
CPU LIMIT: UNLIMITED
```

```
CONNECT LIMIT: UNLIMITED
```

```
FILE INX PTR: %1627
```

```
MVTABX: %0
```

```
MOUNT REF CNT: 0
```

```
HOME VOL SET:
```

```
CAP: IA,BA
```

```
>
```

```
PASSWORD: **
```

```
SECURITY--READ: ANY
```

```
WRITE: ANY
```

```
APPEND: ANY
```

```
LOCK: ANY
```

```
EXECUTE: ANY
```

```
SAVE:
```

```
PRIV VOL: NO
```

Note that SAVE access is blank. This should be changed using the ALTGROUP command

```
:ALTGROUP HPTELEX;ACCESS=(R,W,L,A,X,S:ANY)
```

If you want to have a long Sent, Deferred or Deferred Print Queue Durations configured in HP Telex, or if you use HP Telex very heavily, it may be advisable to create a new group in the HPOFFICE account and to store the E-files there instead of in the HPTELEX group. This will help to prevent "PERMANENT FILE DIRECTORY OVERFLOW (FSERR 103)" which can sometimes occur due to large numbers of files in a group.

:MAILON will start up the transport system to enable messages to be sent out through the FSC gateway. For incoming telexes to be passed into HP Desk, you must use an extra command, :MAILFSCARPAON.

### Sending a telex from HP Desk

There are 2 ways to send a telex from HP Desk to Fred Bloggs whose telex number is 123456, answerback ANSBKA and Joe Soap whose telex number is 456789, answerback ANSBKB.

```
HPDesk > send
```

```
Subject: A telex from HP Desk
```

```
To: Fred BLOGGS (123456:ANSBKA)/TELEX
```

```
Name not found, but location OK, name accepted.
```

```
Joe SOAP /TELEX (456789:ANSBKB)
```

```
Name not found, but location OK, name accepted.
```

```
//
```

```
Text: This is a test telex to see if everything works OK.
```

```
//
```

The message is now ready to be mailed.  
MESSAGE > Mail

Mailed on 06/06/88 at 1024.

HPDesk >

## **Routing A Telex Into The Receiver's HP Desk In Tray**

If you are sending a telex to someone who is using the HP Desk/HP Telex interface on another system and is routing incoming telexes into HP Desk, you can add a Routing sequence to your text so that the message will be sent to their In Tray rather than the Default User's In Tray.

To do this you need to know the characters they have configured for routing sequences in the HP Desk part of TELEXCONFIG. By default, these are "HPHP" to start and "." to end. The format of a routing sequence (assuming the default characters) is:

```
HPHP [Subject]
name of recipient(s)
.[Sender's name]
```

The subject and the sender's name are what will be seen in the recipient's In Tray. If the subject is blank, you will see "Incoming Telex" as the subject; if the sender's name is blank, you will see "Sender, Unknown" as the sender. So, if John Doe sends a telex to Fred and Joe, and wants the message to go into their In Trays he should include the following somewhere in the text of the message:

```
HPHP Test of routing sequence
Joe Soap
Fred Bloggs
.John Doe
```

NB: If Joe Soap's and Fred Bloggs' mailnodes cannot be determined on the machine running the HP Desk/HP Telex interface, then mailnode information must also be included for automatic routing to occur, eg:

```
HPHP Test of routing sequence
Joe Soap/ACCTS/01
Fred Bloggs/PERSNL/00
.John Doe
```

## **HP Desk/HP Telex Interface As Part Of An HP Desk Network**

If you have a network of HP3000's running HP Desk you may decide only one machine or several machines should have a direct interface to HP Telex. Either way, you can control which users in the whole network can send telexes.

If you only have one system running HP Telex, then on the rest of the HP Desk network the TELEX location should simply be configured as a normal, remote, hierarchically addressed, non-node-resolving location, routed to the HP Telex machine in the same way as the other mailnodes on that machine.

If you want to have HP Telex interfacing directly with HP Desk on more than one machine, then there are two ways to configure the network. One is to allow your users to choose which machine they want to send through by setting up a different location for each of the machines. For example you could have a location TELEXA on machine A and TELEXB on machine B, and users can send to either Firstname LASTNAME / TELEXA or Firstname LASTNAME / TELEXB. With this configuration, the rest of the machines in the HP Desk network should have routes configured for each of the two locations.

Alternatively, the location TELEX may be routed differently on different machines, so that users on a given machine always send telexes through the same HP Telex system. e.g. on SystemC the location TELEX could be routed to SystemA, and on SystemD it could be routed to SystemB. All users will send to Firstname LASTNAME / TELEX.

In the end, the choice of which method to use will probably depend on ease of configuration and administration.

### **Multiple HP Telex Lines and Printers**

Each HP Telex system allows up to 8 Incoming and 8 Outgoing lines and up to 8 printers (or printer device classes), and you may have as many HP Telex departments as you like. In addition, for incoming telexes (remember each telex line has its own telex number) each line is associated with a printer, i.e. a telex sent to a particular telex number will always be printed on one particular printer (or device class). For outgoing telexes, printers and telex lines are associated with departments. This means that, say, the Accounts department could have its own HP Telex department name(s) and telex line, with a printer in an appropriate area which is used to print all incoming and outgoing telexes for the department.

This can be extended to HP Desk users too: any HP Desk mailnode can be configured as an HP Telex department, with department HPDESK used as a default if the sender's HP Desk mailnode has not been configured as an HP Telex department. Note that this means that you can restrict access to HP Telex to only those users on a particular set of mailnodes by omitting the department HPDESK altogether. So, in the Accounts example, you could configure HPDESK, ACCTS/00, ACCTS/01 and ACCTS/02 as HP Telex departments, and associate the HPDESK department with the default HP Telex line and printer, and associate the ACCTS/00, ACCTS/01 and ACCTS/02 departments with a different line. The printer for this line could then be in a secure area. This idea could be applied to other departments just as well.

### **References**

HP DeskManager : 2 Administration Reference. Part number 36570-90052. Administrator's Guide to HP Telex II. Part number 36572-90013.







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2	10/15/85	<i>Terminal types for HP 3000 HPIB Computers (superseded by note #13)</i>
3	4/01/86	<i>Plotter Configuration Guide</i>
4	4/15/86	<i>Printer Configuration Guide - Revised</i>
5	5/01/86	<i>MPE System Logfile Record Formats</i>
6	5/15/86	<i>Stack Operation</i>
7	6/01/86	<i>COBOL II/3000 Programs: Tracing Illegal Data</i>
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34	10/01/87	<i>Process Handling (Using COBOLII Examples) (B)</i>
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