

Management Overview of Bulk Input Services (BIS) Utility for Unix ... & NT

Management Summary

BIS was originally developed as part of a joint project in support of the XPSM initiative with Xerox Corporation in El Segundo, California, USA it was then known as TTP the developers have now extended the scope and capabilities of BIS much further.

Emerging Unix (and Windows NT ??) print servers will have to accept data from "legacy" systems and they will be faced with the problem of dealing with (bulk) print data originating from these conventional/legacy (mainframe) systems on open reel and or cartridges.

This is an inevitable issue for those corporates and bureaux where their clients/subscribers still run conventional mainframe systems and spool/offload print data to magnetic media for whatever reason.

ROLO driven Unix/NT server solutions will happily support all manner of print jobs on a file-by-file basis but the **alien** data format coming from these "legacy" systems will create serious problems.

BIS addresses these problems BIS V1R1 provides comprehensive input support for a large range of IBM industry standard format open reel and (3480/3490) cartridges and outputs "normal" mode Unix files in a variety of user selectable formats.

BIS currently runs on AIX platforms plans are in place to provide support on non-AIX platforms and support for POWER format tapes.

The very nature of BIS is that is portable to other host Unix systems, and could rapidly support other tape/cartridge formats.

BIS also has been designed for rapid adoption of any other special input or output formats required hence rapid and effective support for any "new" requirements without destabilising the main BIS framework.

Bulk Input Services

Input Devices Supported

Any device which can be connected to a UNIX system with the necessary device driver support may be used by BIS. Input processing is handled by invoking UNIX file system calls rather than managing the input device directly. In BIS V1R1, the following types of devices have been validated;

3420 Tape (round tape), 3480/3490 Cartridge (square tape) and QIC-150.

Input Tape Formats Supported

A range of industry standard tape formats are supported as follows;

- IBM Standard Labelled Format
- ANSI Standard Labelled Format
- Unlabelled Format

Input Record Layouts Supported

Within the above tape formats, a wide range of block and record formats are supported;

- Fixed length blocked records
- Fixed length unblocked records
- Variable length blocked records
- Variable length unblocked records

All of these may contain, in addition, either ANSI or machine type PCC bytes.

Both ANSI and EBCDIC character sets are supported and there are built-in Translation Tables within BIS to allow conversion and a further BIS feature that allows use of a user supplied Translation Table.

Output Record Layouts Supported

The same layouts as for input are supported but output is always to a disc file which may then be selected for further processing or printing.

Conversion between PCC type and unlike record formats between input and output are supported within certain limitations for example;

- The input file is from an IBM standard labelled tape in EBCDIC with variable format blocked records with ANSI PCC bytes
- If desired, BIS may be invoked to read this file and create an output file on disc with fixed length unblocked records in ASCII with machine type PCC bytes