

Appendix J: MapInfo® Data Interchange Format (MIF/MID)

Overview

This appendix explains the structure and technical specification of the MapInfo® Data Interchange Format used by MapInfo Professional®. The format consists of two coordinated files: a .MIF file containing graphical object definitions and a .MID file containing attribute data. Because the format is ASCII-based, it is human-readable, platform-independent, and easy to generate or modify using text editors or automated systems.

MIF and MID File Structure

MapInfo stores spatial and attribute information separately. The .MIF file defines geometry and structural metadata, while the .MID file stores tabular attribute values. Each MID record corresponds to a graphical object in the MIF file and is delimited text, with line endings defined as CR, CRLF, or LF depending on the operating environment.

MIF Header Structure

The MIF file is divided into two major parts: a header section and a DATA section. The header defines table creation parameters and structural metadata. Optional elements are enclosed in brackets.

```
VERSION n
Charset "characterSetName"
[ DELIMITER "" ]
[ UNIQUE n,n.. ]
[ INDEX n,n.. ]
[ COORDSYS ... ]
[ TRANSFORM ... ]
COLUMNS n
```

```
DATA
```

Versioning Rules

TAB files are typically saved as version 300 unless specific features require otherwise. Workspace (WOR) files are commonly stored as version 400. If a table is upgraded to a newer version due to advanced functionality, MapInfo Professional does not automatically downgrade it. However, workspace files are rewritten at each save and may revert to a lower version if no advanced features are present.

Pen and Brush Encoding Rules

Line widths expressed in points are encoded in the Pen clause using the formula: (encoded width) = (line width × 10) + 10. For example, 0.2 pt becomes 12 and 1.0 pt becomes 20. Certain legacy values such as Pen(0,0,0) and Brush(0,0,0) valid in version 4.1 are not supported in version 4.5 and later. Interleaved line styles are encoded by adding 128 to the line style value.