



White Paper on Software Technical Requirements

Overview

CAPIX publishes a portfolio of related software packages for the Capital Markets sector. This *White Paper* has been written to outline the technical requirements and specification for installing and running various CAPIX software packages.

A matrix of the various CAPIX software packages and their operating environments is detailed below.



All CAPIX software packages have been engineered using familiar Microsoft® technology and integrate seamlessly with Microsoft Office® products such as Excel® and Word®. This means deploying CAPIX software is quick and easy in modern corporate environments.

Software Package	Desktop	Network	Client/Server	Web Server
CAPIX Treasury Manager (CTM)™	✓	✓		
CAPIX Treasury Centre (CTC)™	✓		✓	
CAPIX Investment Manager (CIM)™	✓	✓		
CAPIX Investment Centre (CIC)™	✓		✓	
CAPIX Financial Modelling (CFM)™	✓		✓	
CAPIX Broking System (CBS)™	✓		✓	✓
CAPIX Analytics Library (CAL)™	✓		✓	
CAPIX Internet Exchange (CiX)™			✓	✓

Desktop Software Technical Requirements

CAPIX desktop-based software runs on common 32-bit PC platforms, using Microsoft® operating systems such as Windows 95™, 98™, 2000™, NT™ and XP™. Windows XP™ is the preferred platform, although not mandatory.

The technical requirements for operating CAPIX software are similar to other common MS Windows applications, such as Microsoft Office.

The CAPIX desktop software should only be installed using the installation program supplied (SETUP.EXE). Installation scripts are created using InstallShield™ and an ".MSI" file is provided for network or automated software installs.

At least 128 Mbytes of Random Access Memory (RAM) and 100 Mbytes of free disk space are required for desktop PC installations.

CAPIX desktop-based software has been designed and tested to comply with the Microsoft® *Office Compatible Logo* requirements. Integration with MS Office packages such as Excel and Word is simple and seamless.

As corporate desktop software standards are commonly based on these Microsoft guidelines, installing and supporting CAPIX desktop software is straight-forward.

Data can be imported and exported in all common formats, including Excel (*.XLS), Word (*.DOC), HTML, XML, Text files (*.CSV) etc.



Network Software Technical Requirements

CAPIX software is designed as a multi-user system, to operate in common corporate network environments.

It is fully compatible with Networks such as Microsoft® NT™, Novell® Netware™, Linux and Unix. There is no dependency on any network type or protocol. Microsoft NT networks using the TCP/IP protocols are popular.

CAPIX assumes that the Network Administrator has established the proper network permissions for a shared database folder. Typically this is done by creating, or using an existing, network user group that has read/write/create permissions for this shared folder.

It is the responsibility of the Network Administrator to ensure that backup/restore procedures are in place.

Client/Server Database Software Technical Requirements

Microsoft SQL Server 2000 is the default Database product used. CAPIX is adding support for Sybase SQL Server and Oracle database systems, although this support is not complete at the time of writing.

The CAPIX SQL Server physical database should have at least 200 Mbytes of initial storage allocated for the actual database and around the same amount of storage for the transaction log files. The "Automatically Grow" database size option must be enabled.

Typically the CAPIX database stores around 500 transactions per Mbytes of disk storage.

An ODBC connection using the standard Microsoft SQL Server driver is used to access data.

It is assumed that the Network Administrator will include any CAPIX databases in the standard "Maintenance Plans" used for backups and updating database statistics.

Web Server Software Technical Requirements

The CiX Internet-based Securities trading platform was designed to operate in a high-performance and high-availability environment using standard Microsoft technology.

Microsoft Internet Information Server (IIS) 5 or later must be available to run CiX on a web server.

If the IIS Web Server and MS SQL Server software are operating on the same PC Server machine, then the "Named Pipes" protocol should be specified in the ODBC Data Source Name (DSN) configuration.

When the IIS Web Server and MS SQL Server software are operating on different PC Server machines, then the "TCP/IP" protocol should be specified in the ODBC Data Source Name (DSN) configuration.



Version 1.1 or later of the dot NET Framework must be installed on the server hosting CiX. CiX uses the Common Language Runtime (CLR) as managed code.

An IIS "Virtual Directory" must be created to run the CiX web site. This Virtual Directory must have "Anonymous Login" enabled with "Execute" permissions so that users can log into the web site and run the code stored in the CiX ISAPI and dot NET libraries.

HTML Browser Thin Client

CiX outputs generic HTML and will run in conjunction with any contemporary browser. CAPIX recommends using either MS Internet Explorer version 6 or greater, or Netscape Navigator version 5 or greater.

Web sites running CiX output HTML that is optimised for Microsoft Internet Explorer Ver. 6.



The HTML generated by CiX uses Java Script, HTML "Frames" and a single "Cookie" to manage state. Any browser used must support "Frames" and "Cookies".