OpenAmeos

Installing Ameos for Windows Platforms

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1   Basic Installation Instructions

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This section gives a brief overview of the steps to install Ameos on Windows platforms. If you need additional information, refer to <u>Appendix A, "Supplemental Information" on page 9</u>

System Requirements

Processor speed	Minimum: 700 MHz Recommended: 1.3 GHz
Operating system	Windows 2000: Service Pack 4 recommended Windows 2003 Windows XP: Service Pack 2
RAM	Minimum: 256 MB Recommended: 512 MB
Free disk space	Minimum: 150 MB Recommended: 720 MB [Note 1]

[Note 1] Disk space needed for a full installation with Sybase is about 720 MB and without Sybase is about 110.

Step 1. Install Ameos

Evaluation Installation

Client/Server Installation

Step 3. Verify Installation: Start Ameos

Follow the steps below to verify that Ameos is installed correctly:

1. Open the Ameos desktop.
   - Click **Start**, then choose **Programs > OpenAmeos** *<version>*.
   - Choose **Ameos Modeler, Ameos Analyst**, or **Ameos Developer** (depending on which Ameos options you've purchased). The **Open System** dialog appears.
   - **Cancel** the dialog, since we will be creating a new system.

2. Create a new system.
   - From the Ameos desktop, choose **File > New System**.
   - Enter a system name. In a multiuser environment, set **Repository Server** to **Sybase**. Click **OK**. A new system is created.

3. Open an editor.

   From the Ameos desktop, choose **File > New** and then select an item from the list (for example, **Use Case Diagram**). Click **OK**. The appropriate editor opens.

Problems and Solutions

1. If Ameos does not start, verify that:
   - The message router has started on the server. To check, double-click the **Services** icon in the control panel and look for **Ameos Message Router** in the list. If the message router service is not running, select **Ameos Message Router** from the list and click **Start**. See "Understanding the Ameos Message Router" on page 11 if you need more information.
   - The Ameos FLEXlm has started on the license server.
   - The Sybase server is started. See "Starting Sybase ASE" on page 10 for more information.

2. If, as you are attempting to start Ameos or an Ameos editor, you get a "Could not find Message Router process" message, it is likely that the message router service is not set up properly. For a quick workaround, add the line "`msgd_host=`*<hostname>*" to the *ToolInfo.W32NTX86* file located at the top level of your Ameos installation (*<hostname>* is the Ameos server machine for multiple workstations or the local workstation name for a a standalone workstation).

3. When you try to open any of the example systems, and get an "Unable to open repository" message, you may have to rebuild the repository.

4. If you were *not* able to open an editor, it is likely that the Ameos message router was not set up properly. Then restart Ameos. This causes Ameos tools to connect to the message router on *<hostname>*.

If you have trouble starting Ameos, don't hesitate to contact your local Aonix Support representative.

Step 4. Download SVG Browser Plug-In

To view the graphics in the HTML reports generated by Ameos, you need an SVG plug-in for your browser. This can be downloaded for free from the Internet for various browsers like Internet Explorer, Netscape, and Mozilla.

A   Supplemental Information

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This section provides additional Ameos installation information. It includes information on:

- Removing older versions of Ameos and Sybase (below)
- Connecting to an existing Sybase server and starting Sybase ASE (page 10)
- Understanding the Ameos message router and its default behavior, and designating a message router server (page 11)
- Files and directories in the Ameos distribution (page 16)
- Ameos and personal firewalls (page 12)

Check the table of contents to see a full list of what is covered here.

For information on starting Sybase SQL Server 12.5, refer to your Sybase documentation.

Removing Older Versions of Ameos

Note: Do not remove Ameos components before you uninstall. This may interfere with the process.

To add/remove software components from Ameos:

1. Make sure that you are not running Ameos or any of its components.
2. Make sure the Ameos message router service is not running.

   To check, double-click the **Services** icon in the control panel and look for **Ameos Message Router** in the list. If the message router service is running, select **Ameos Message Router** from the **Services** list and click **Stop**.
3. Remove the license server service.

   To do this, go to the **Start** menu, select **Programs > Aonix Ameos** *<version>* **> License > Remove Ameos License Service**.
4. Begin removing Ameos components. To do this, go to the control panel, then:
   - Double-click the **Add/Remove Programs** icon.
   - Select **Aonix Ameos** *<version>* from the list. The InstallShield wizard appears, followed by a welcome screen.
   - From the welcome screen, choose **Remove** to remove all installed Ameos software components. Click **Next**. A confirmation dialog appears. Click **OK** to continue or **Cancel** to exit the setup.

     Note: You can also select **Modify** from the setup program menu. This allows you to add/remove Ameos software components selectively.
5. Wait for the deletion process to complete. When it is, click **Finish**.
6. Remove any Ameos directories (including Sybase directories) that were left behind.

   The uninstall program removes only those files or directories created during the Ameos installation process. Any files created after Ameos was originally installed will not be removed and may cause directories to be left behind.

   Warning: If you are removing and reinstalling Sybase, manually remove all remaining Sybase directories before you attempt to reinstall. If you do not, the Sybase installation will fail.
7. Reboot your machine.

Connecting to an Existing Sybase Server

If you installed Sybase Open Client and are connecting to an existing remote database Sybase server, you need to add the Sybase server information to your local *sql.ini* file.

To add the Sybase server information, copy the *sql.ini* file from the Sybase server machine to your Sybase installation directory.   The default path on your local machine running Ameos is *<Ameos_root_dir>\Sybase\ini\sql.ini.*

Alternatively, create entries using the `DSEDIT` dialog.

If you are using Sybase Open Client:

1. From the **Start** menu, select **Programs > Aonix Ameos > Sybase Repository**.
2. Select **Edit Server Definitions**.
3. In the `DSEDIT` dialog, enter details about your existing Sybase Server.

If you are using Sybase ASE:

1. From the **Start** menu, select **Programs > Aonix Ameos > Sybase Repository**.
2. Select **Sybase Central**.
3. Open the Utilities folder in Sybase Central and double-click **Directory Services Editor**.
4. In the **DSEDIT** dialog, enter details about your existing Sybase server.

Starting Sybase ASE

If your repository is stored on Sybase ASE, you must start the Sybase server before creating or opening an Ameos system from the desktop.

Starting Sybase ASE Automatically

(This is the recommended procedure) To configure Sybase ASE to start automatically on machine start-up:

1. Double-click the **Services** icon in the control panel.
2. Select your Sybase Adaptive Server from the **Services** list.
   The Sybase Adaptive Server name appears as:
   Sybase SQLServer_*<server>.*
3. Click **Startup**.
4. Under **Startup Type** in the **Service** dialog, select **Automatic**.
5. Click **OK.**

Note: This service is not available until you restart the machine, or you start the service manually.

Starting Sybase ASE Manually

If Sybase ASE is not currently running and you've installed Sybase in the default Ameos location:

1. From the **Start** menu, select **Programs** > **Aonix Ameos** *<version>* **> Sybase Repository > Sybase Central**.
1. Double-click the Sybase server name icon (the light on the icon should be red). A log-on screen appears.

2. If prompted, enter your password (the default password on a new Ameos Sybase server installation is "welcome").

   After the server is started, the light on the icon turns green.

3. Close the Sybase Central screen.

Additional Sybase-Installation Steps

Setting Up Sybase Users

When Ameos is installed in a multiuser environment, users must be set up before they can use Ameos.

1. Set up Sybase users:
   - From the Ameos desktop, choose **Admin > Manage Users > Add User(s)**. A dialog appears.
   - Enter the names of the users in **User Name** field. Click **OK**.

   Important!   Enter the exact name the user uses when he/she logs in to the system. Sybase distinguishes between small and capital letters. Special characters, umlauts, and names starting with numbers may not work. To check the exact log-on name, open a DOS window and type "set" followed by a return. The log-on name is shown as USERNAME=*<log-on_name>*.

2. Set up Sybase user privileges to allow users to create new systems:
   - From the Ameos desktop, choose **Admin > Manage Users > Grant User(s) Sybase System Creation Privileges**. A dialog appears.
   - Enter the names of the appropriate users. The names must be exactly the same as those of the Sybase users.

   Note: In both of these dialogs, you can enter multiple users; separate the user names by spaces.

Releasing a Project for Sybase Users

Users need the appropriate privileges in order to look at or change a project. There are "writers" and "readers." Writers have read/write privileges; readers may only read the project.

To add users to the project, choose **System > System Users > Add User(s)**. Then add the names and click **OK**.

Understanding the Ameos Message Router

The Ameos message router is the internal communication system of Ameos. When an Ameos application starts, it registers within an Ameos message router.   The Ameos message router transfers messages between the Ameos desktop, Ameos editors, and other Ameos utilities.   In a multiuser environment it is used for synchronization and notifications.

The first-opened Ameos application broadcasts on a default port number and waits for a reply from the Ameos message router. If Ameos does not receive a reply, it assumes that no message router is running and starts one on the local machine.

If Ameos starts a local copy because it did not receive a message router reply due to a temporary network condition, the running message routers will communicate when normal conditions are restored. Since only one message router can exist in the network, the running message routers will determine which one(s) should terminate activity.

Note: Check <u>"Ameos and Personal Firewalls" on page 12</u> for information relating to Ameos message router issues in firewall environments. Also check the "Product Limitations" section of the Release Notes

for possible limitations regarding other message router issues.

Message Router Defaults

By default, the message router is installed with the current machine designated as the default host by setting the value of the `msgd_host` ToolInfo variable. The value of the `msgd_port` ToolInfo variable is assumed to be the default port, and the *msgd* start mode is set to `AUTOSTART`.

If you do not choose the default settings, the following prompt will appear concerning the Ameos message router during installation:

```
Only answer "Yes" if this system is the Ameos Message Router or if installing
Ameos as stand-alone. Only one machine on your local network can act as the
nominated Ameos Message Router.
```

Answer "Yes" if you are installing Ameos on a stand-alone machine or on the machine designated as the message router host. Otherwise, answer "No."

You may have to set the `msgd_host` variable yourself. Add the line "`msgd_host=<hostname>`" to the *ToolInfo.W32NTX86* file to have Ameos connect the message router to your local machine; leave it undefined to specify broadcast mode.

Make sure that you have only one message router machine and that all clients are connected to the same message router.

For additional information on *msgd*, refer to the *Ameos Administration Guide.*

Designating a Message Router Server

Unless special measures are taken to ensure that broadcast requests are propagated, the UCP broadcast mechanism does not function over certain network topologies. Such topologies include those involving Ameos client machines separated by gateways, subnets, routers, firewalls, bridges and other such devices.

If any of these conditions exist, you should designate a machine to run the Ameos message router. The machine should have high availability in terms of connectivity, response, and uptime. A machine that runs an Ameos message router does not listen for, or respond to, message router broadcast requests. If broadcasting is disabled, all Ameos clients will attempt to connect to this machine. You can specify a dedicated message router during the Ameos installation (refer to "Step 1. Install Ameos" on page 5).

If none of the specialized conditions described above apply to you, accept the installation defaults to install the message router service in its default mode. The default mode gives the best results in the majority of installations.

Ameos and Personal Firewalls

Due to the fact that Ameos uses TCP/IP to communicate between different editor sessions as well as with the FLEXlm license manager, personal firewalls can "interfere" with an Ameos installation. If not correctly configured, personal firewalls can even prevent Ameos from working at all. All communication to and from Ameos applications is local; there are no connections to any server on the internet, except connections to a DNS server (which could be your ISP's DNS server in case you are on a dial-up network connection).

Windows XP Firewall

At this time, there are no known problems in conjunction with the built-in Windows XP firewall.

Norton Personal Firewall 2004

The Norton Personal Firewall[1] seems to be one of the most restrictive personal firewalls.   However, the guidelines to configure the Norton firewall will generally apply to other personal firewalls as well.

In order to allow Ameos to run properly with Norton Personal Firewall 2004, a few adjustments need to be made to the firewall's rules. (The same kind of rules might apply for other personal firewalls.) The guidelines listed below cover an evaluation installation. Although networks used might differ for a multiuser installation in a corporate network, the same principles apply.

Initial Firewall Configuration

Before starting the Ameos installation, perform the following steps. First open the firewall, then:

1. Add "127.0.0.0" and "255.0.0.0" as the network address values for a trusted network (see the figure below):
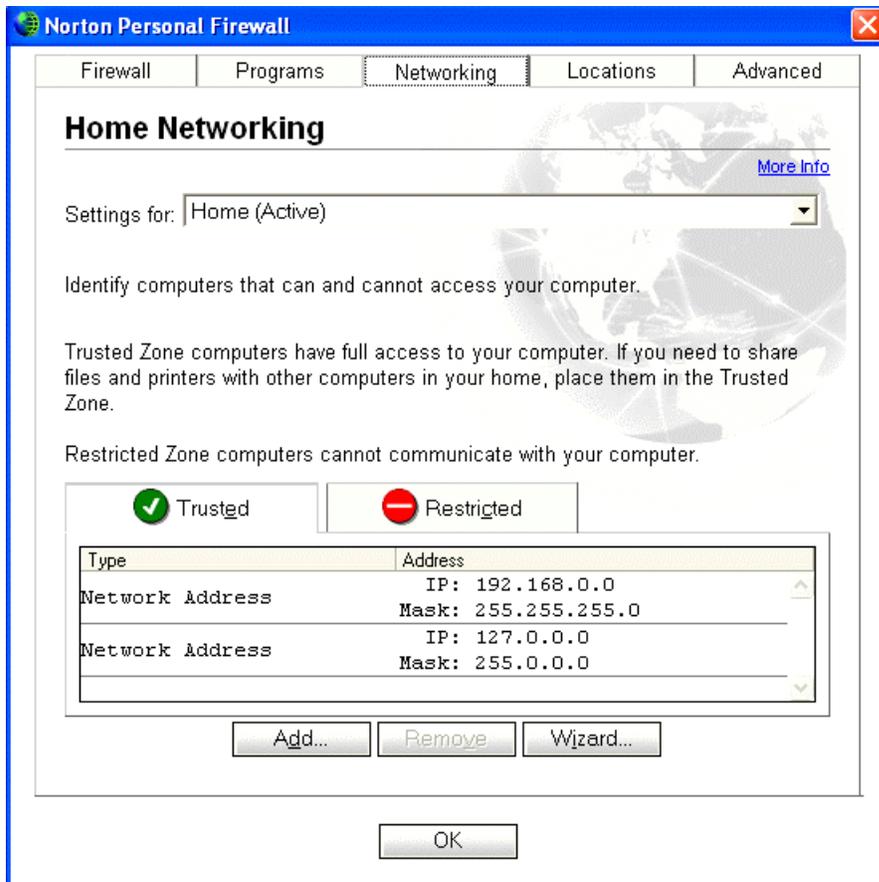
> **Note:**   "127.0.0.0" is the "loopback" network and should normally be a trusted network. In evaluation installations, the ToolInfo variable `msgd_host` is set to `localhost`, which corresponds to 127.0.0.1. This permits communication between the Ameos message router and the Ameos desktop and editors regardless of the network configuration.

2. Click the **Advanced** tab then change the direction of permitted DNS requests to **Default Outbound DNS** on the **General Rules** dialog as shown below.

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1. Norton Personal Firewall is a trademark of Symantec Corporation.
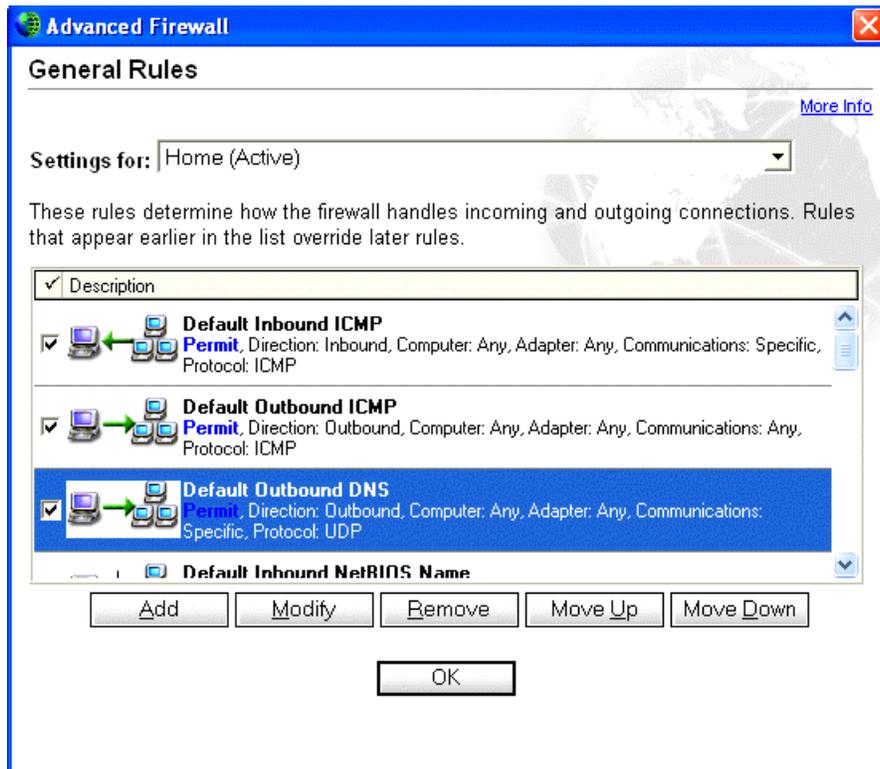
Note: The direction of DNS requests should be set to outbound in any case. This is because although a workstation does not normally have a DNS server running, it needs a DNS server to resolve host names. (Norton's default rule is to initially permit inbound DNS requests.)

Security Alerts During Ameos Installation

After you've configured the firewall, start the Ameos installation. During the installation process, after you've installed and started the message router service, a dialog like the following will appear, allowing incoming connections to *msgd.exe*:

Note: This rule can be further specified by only allowing defined clients to connect to *msgd* in a corporate LAN installation (choose "Manually configure internet access" instead of "Always allow …").

In case you are installing a product license (which requires a FLEXlm service to be running), the following two rules for the *lmgrd.exe* and *aonix.exe* applications need to be created during installation:


Note: Port 1700 corresponds to the port used in the license file. It might be different for your installation. Only TCP connections to this port need to be permitted.
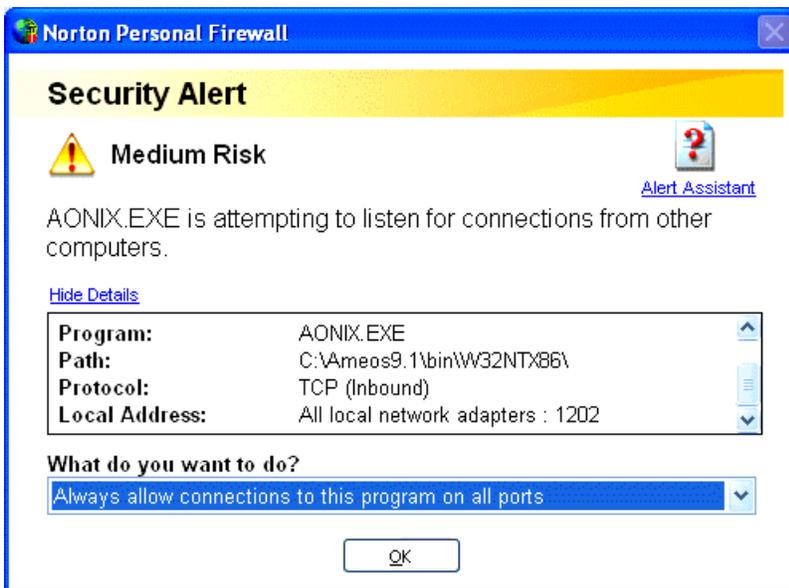
In case you also install Sybase, there will be similar alerts for Sybase applications. Permit connections in the same fashion as shown above.

ZoneAlarm

ZoneAlarm will present the following alerts during an installation:
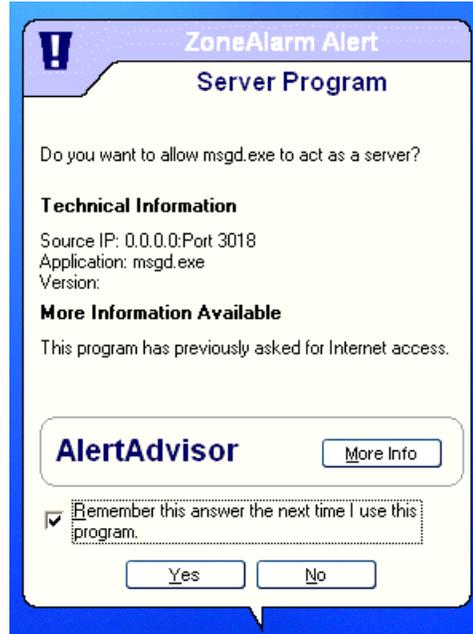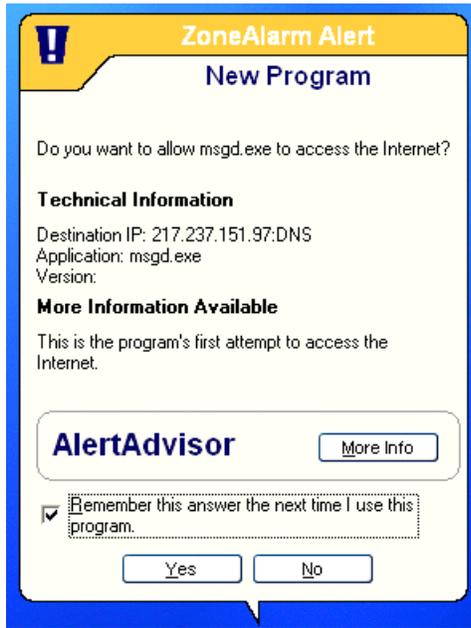
The Ameos message router may try to connect a DNS server (which should be permitted) and it needs to be able to act as server. If you install a product license, the same kind of alerts will pop up for FLEXlm (*lmgrd.exe* and *aonix.exe*); they should be permitted as well.

When starting Ameos or an editor for the first time, ZoneAlarm might alert you that *ameos.exe*, *gde.exe* or *qrp.exe* will try to access a DNS server. These requests are host name lookups and should be permitted.

Files and Directories

There are many files and subdirectories on the Ameos distribution. The following is a subset of the files and directories found relative to the *<Ameos_root_dir>* folder. The default folder is *c:\Ameos<version>*.

Table 1:   Ameos Files and Directories

Name/Location in *<Ameos_root_dir>*	Description
bin\	Ameos binaries folder
<arch>\	Ameos binaries folder for platform *<arch>*
<arch>\msg_file	File containing messages used by Ameos
documentation\	Online versions of Ameos documentation
examples\	Folder of sample systems that highlight the use of Ameos (optional)
lib\	Folder of Ameos libraries and support files
<arch>\	Folder of libraries for platform *<arch>*
Sybase\	Sybase installation and database folder (optional)
ASE_*<version>*\	Sybase ASE *<version>* folder
OCS_*<version>*	Sybase Open Client *<version>* folder
templates\	Folder of templates used by Ameos
ct\	Core technology templates folder

Table 1:   Ameos Files and Directories (Continued)

Name/Location in *<Ameos_root_dir>*	Description
ToolInfo.*<arch>*	Configuration file for platform *<arch>*