

Introduction

AccessMyLan addresses the challenge of iPhone integration by providing a hosted service that simplifies the integration of iPhone with Exchange ActiveSync, file servers and company web applications without any additional equipment and without opening firewall ports.

With the introduction of firmware version 2.0, Apple iPhone devices support mobile access to Exchange ActiveSync servers for mobile email, calendar and contacts. Supporting ActiveSync on iPhone presents many challenges particularly where organizations do not have compatible infrastructure or do not have the resources to configure and manage iPhone integration. AccessMyLan makes it easy to securely provide access to Exchange from iPhone without requiring expertise and without having to reconfigure the network infrastructure.

The iPhone can also access company file shares and web applications via the AccessMyLan portal removing the need to deploy VPN and synchronisation solutions. The portal provides iPhone optimised file browsing allowing files to be opened directly from the server and enables access to any web application such as Intranet or CRM hosted inside the company network.

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About AccessMyLan

AccessMyLan is a hosted remote access service that provide secure connectivity to office networks and resources from Laptop, Desktop, mobile handsets and Web browsers. The service is completely deployed from the web and requires no additional hardware.

Connectivity from the office network to AccessMyLan is provided by a VPN Agent installed on any Windows host in the office network. The VPN Agent establishes and maintains an open SSL connection to the AccessMyLan service cloud over which remote user traffic is routed to hosts on the local network. As the SSL connection is initiated from within the local network, there is no requirement to open inbound ports on the corporate firewall.

Remote users connect to the AccessMyLan service cloud using any of the supported access methods and once authenticated, can access resources on the local network subject to access controls defined by their administrator.

Visit www.accessmylan.com for more information on the service architecture, and features.

Exchange ActiveSync Integration

ActiveSync is a Microsoft protocol that enables mobile devices to connect directly with corporate Exchange servers. The protocol establishes a persistent connection between the mobile device and the Exchange server and upon receipt of a new message or a folder update the server notifies the mobile device which then initiates a synchronization of the folder and alerts the user of new mail. As the mobile handset is outside the corporate network, the communications link should be secured using SSL encryption and an inbound port must be opened on the corporate firewall to permit the device to connect to the Exchange infrastructure.

The iPhone ActiveSync Challenge

The Apple document 'iPhone and Microsoft Exchange Server' from July 2008 lists the following network configuration tasks as part of the process to integrate iPhone with Microsoft Exchange:

- Ensure port 443 is open on the Internet firewall for inbound access
- Install a certificate on the Front-End Exchange server and enable SSL
- Install a certificate on the ISA server
- Update the Internet DNS
- Create a Web Listener and a publishing rule on the ISA server
- Set the idle session timeout to 30 minutes on all firewalls and network appliances

Implementing the network configurations suggested is a significant amount of work and may require additional investment in servers and certificates. This approach may prove impractical where the number of iPhone users is small, where security policies prevent the opening of inbound ports to servers or where IT staff are not comfortable implementing the configuration suggested.

AccessMyLan ActiveSync Solution

AccessMyLan removes the complexity of iPhone integration with a hosted service that provides security, connectivity and performance without any network reconfiguration and without purchasing additional hardware or security certificates.

The following diagram illustrates how the AccessMyLan approach to iPhone integration compares with the approach recommended by Apple.

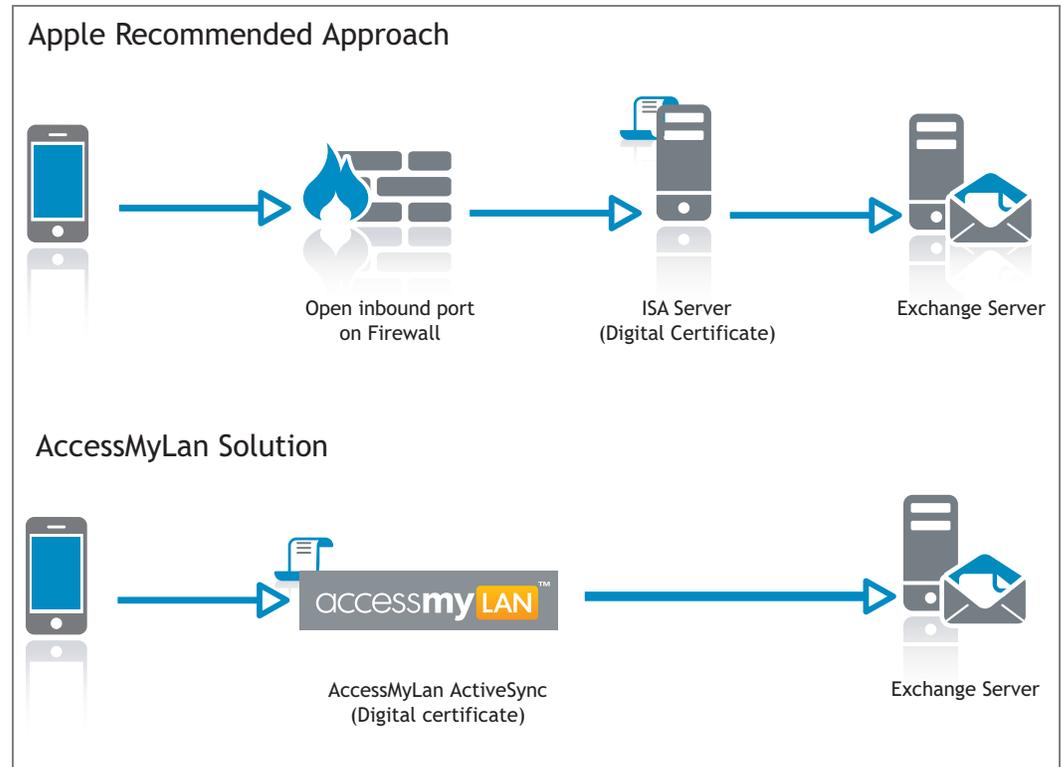


Figure 1 - Solution Comparison

As can be seen from the diagram above, the AccessMyLan approach removes the requirements to open inbound ports on your firewalls, removes the need for an ISA server and does not require the purchase of digital certificates. While AccessMyLan simplifies deployment, there is no loss of features or reduction in security as the service performs the following functions that would be the responsibility of an ISA server deployed between the firewall and the Exchange server:

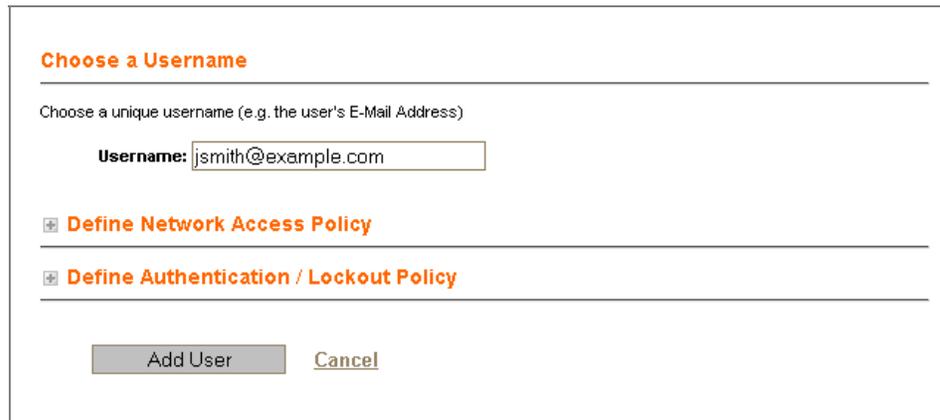
- Enforcement of SSL on ActiveSync communications from iPhone
- Provides a Verisign® digital certificate
- Inspects ActiveSync protocol to protect the Exchange server environment
- Offloads encryption processing overhead from the Exchange server
- Sets ActiveSync idle session timeout to optimal values regardless of firewall settings

In addition, the service binds the iPhone IMSI to a specific user preventing the user credentials being used on an alternative device and permits all Exchange features such as remote-wipe to function as normal.

iPhone ActiveSync Configuration

Step 1 - Adding the user

Add the user to AccessMyLan (if not already added). There is no limit to the number of users that can be added to AccessMyLan.



Choose a Username

Choose a unique username (e.g. the user's E-Mail Address)

Username:

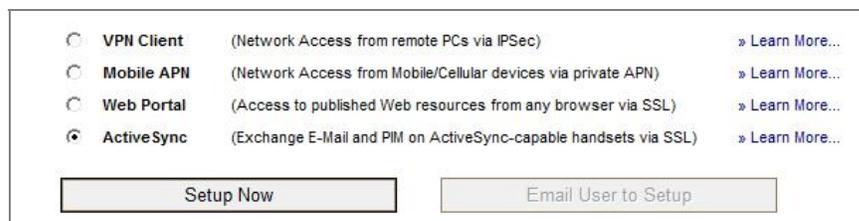
Define Network Access Policy

Define Authentication / Lockout Policy

Figure 2 - Adding a user to AccessMyLan

Step 2 - Select ActiveSync as the Access Method

AccessMyLan supports multiple Access Methods as shown. A user may have all methods configured allowing them to concurrently use their iPhone, login from their laptop and access applications using a browser.



VPN Client (Network Access from remote PCs via IPSec) [» Learn More...](#)

Mobile APN (Network Access from Mobile/Cellular devices via private APN) [» Learn More...](#)

Web Portal (Access to published Web resources from any browser via SSL) [» Learn More...](#)

ActiveSync (Exchange E-Mail and PIM on ActiveSync-capable handsets via SSL) [» Learn More...](#)

Figure 3 - Selecting an Access Method for a user

Step 3 - Select iPhone as the device type

Select Device Type:

Manufacturer: Other
Apple
HP
HTC

Model: iPhone
iPhone 3G

> My Device is not listed ?

Enter the Device Mobile/Cell Number or Description:

Number / Description: John's Phone

Figure 4 - Select iPhone from list of supported devices

Step 3 - Specify Exchange Server

This configuration defines the Exchange server hosting the user's mailbox. AccessMyLan transparently supports environments with multiple Exchange servers in different Windows Domains.

Enter Exchange Email Details:

Enter and confirm the Exchange Email account details for this user below.
Note that each user can connect to only one Exchange mailbox at a time.

Edit Server Settings:

Exchange Server: exsrv.example.com [» Learn More...](#)

Server requires SSL

Edit User Settings:

Windows Username: jsmith [» Learn More...](#)

Windows Domain: example

Figure 5 - Configure the settings for the user's mailbox

Step 4 - Configure the iPhone

Once the user and server details are entered, a personalized set of configuration instructions is produced to guide the end-user through the iPhone configuration process. The important part to note is that the server name entered on the iPhone is an AccessMyLan server (e.g. *nnn.accessmylan.com*), not the name of the corporate Exchange server.



Apple iPhone / iPhone 3G Configuration

User: jsmith@example.com

This configuration assumes the following:

Phone Details:

- User:** jsmith@example.com
- Model:** Apple iPhone 3G
- Description:** John's Phone

The ActiveSync configuration settings below must be entered exactly as shown.

Microsoft Exchange Email Configuration:

Note: The iPhone must be running 2.0 Software or later.

1. Touch **Mail** and then **Microsoft Exchange**.
2. Fill in these details:
 - Email:** *Users normal Exchange Email address*
 - Username:** EXAMPLE \jsmith
 - Password:** *Users normal Windows password*

Note: For backslash (\), touch [.?123] and then [#+=]
3. Touch **Next**. The Server field will appear below the Email field.
4. Enter the following name for the server (**NOT your Exchange server name !!!**)
 - Server:** a.accessmylan.com
5. Touch **Next**.
Confirm the details you wish to synchronise with your Exchange Server.
 - Mail, Contacts, Calendar**
6. Touch **Save**. The iPhone should start synchronising your Email

Figure 6 - AccessMyLan personalized iPhone setup guide



Figure 7 - ActiveSync Settings on iPhone

Accessing File Shares

Providing iPhone users with secure access to the latest versions documents, presentations and files presents a number of challenges. The use of 3rd party synchronization services may provide an answer but they may not scale to support multiple users accessing the same files. The use of 3rd party synchronization services means that copies of company information are located outside the organization which may be in breach of regulations and policies. Creating and securing an in-house solution for file access requires significant technical knowledge and may require additional equipment. With AccessMyLan, there is no requirement to deploy new hardware for file access and because we are a network pipe, no copies of company information are stored on the service. AccessMyLan provides access to file servers on the corporate network using the WebDAV protocol over SSL. WebDAV is an industry standard for file access and is supported on Windows, Linux and Apple servers.

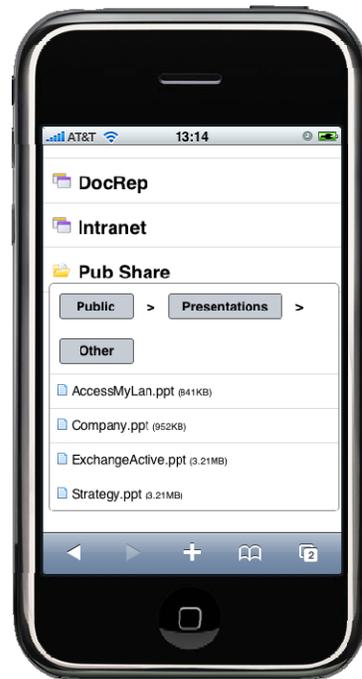


Figure 8 - Accessing file shares

Using the iPhone Safari browser, AccessMyLan provides an optimised view of the files shares published by the administrator.

Configuring File Access

File access is configured by firstly enabling web publishing from the Network configuration page on the AccessMyLan VPN Administration site. The procedure for defining a file share is as follows:

- Enable WebDAV file sharing on the File Server
- Define the server on AccessMyLan
- Publish the share as a Web Folder via AccessMyLan

Enabling WebDAV on the File Server

You should consult your server documentation as the process for configuring WebDAV publishing varies by operating system type and version. In a standard Windows server environment, the server must be running IIS as a web server and the WebDAV Publishing extension must be enabled via IIS Manager. To publish a directory via WebDAV, select the Web Sharing tab in the properties of the directory and tick Share this folder. In the IIS manager application, you need to change the authentication for the share from Windows Integrated to either anonymous or basic.

You can verify that WebDAV is working from a browser by entering the url *http://servername/sharename*.

Defining the Server on AccessMyLan

From the Administration site on AccessMyLan, select 'Configure Network Servers' from the drop down menu in the Web Publishing page. Enter the fully qualified name of the server (e.g. fileserv.example.com). Once defined, any WebDav shares on this server can be published to iPhone users.

Publishing the Web Folder

From the Web Publishing page, create a new web folder and enter a friendly name for the folder. This friendly name (e.g. Company Reports) is what the iPhone user will see when they connect. Select the server hosting the WebDAV share from the drop down list and optionally configure other options such as authentication and policy.

Providing Access to Web Applications

The service provides access to any web application hosted on the company network such as an Intranet or a CRM system. To publish a web application, Web Publishing must be enabled from the Network configuration page on the AccessMyLan VPN Administration site. The procedure for publishing an application via the portal is as follows:

- Define the server on AccessMyLan
- Publish the application via AccessMyLan

Defining the Server on AccessMyLan

From the Administration site on AccessMyLan, select 'Configure Network Servers' from the drop down menu in the Web Publishing page. The fully qualified name (FQDN) of the server needs to be specified; i.e. *srv01.example.com* rather than just *srv01*.

Publishing the Application

Once the server is defined, the web application is published by defining a new web application from the Web Publishing page. The service provides optimized publishing profiles for well known applications and a generic profile that supports most web based applications. The service can support applications that require SSL, that are on non-standard ports and that require varying authentication schemes.