



DIRECTORY MANAGER V2.2 Quick Start Guide

Directory Manager is an easy-to-use, customizable, Web-based utility that allows the administrator to delegate the ability to update user's information in the Active Directory to non-admin users such as the HR department or a receptionist.

This document is intended to provide you with a quick reference for getting started Directory Manager.

Tips

Here are some tips and information that will make your work with Directory Manager easier and more trouble-free.

- All updates to the Active Directory are done using a service / proxy account, not via the currently logged on user's credentials.
 - Create a service/proxy account that has the permissions necessary to update all users.
 - The service/proxy account's password should not expire.
 - Members of Account Operators cannot update other operator or administrative users. This is a Windows security feature.
- Users are given permission to use Directory Manager by creating a **Directory Update Managers** group in Active Directory and putting the end users in this group. No permissions need to be assigned to this group.
- Almost all customization and configuration is performed in one of three XML files found in the c:\inetpub\wwwroot\directory
- Most all customization and configuration is performed in one of these XML files found in the c:\inetpub\wwwroot\DirectoryUpdate\Settings
 - DirectorySettings.XML contains the field/attribute configuration such as which fields show up on the Edit interface, which fields are hidden, drop-down list values, etc..
 - AppSettings.XML allows you to customize the search options, window labels, error/help messages, and narrow the scope of a search to a single OU.
 - AddressSettings.XML allows you to specify an attribute such as Office name that, when selected, will automatically read the office address (street, city, state, postal/zip code, and country) and populate that for the user.
 - Subsettings.XML allows you to specify a "parent" attribute and a child attribute. If a specific parent attribute value is selected,



the child drop-down list is populated with values dependent on the parent.

- PasswordSettings.XML allows you to define password strength/complexity rules if the users are allowed to change their passwords via Directory Manager.
- Get yourself a good XML editor; that will make editing the XML files much more painless. We recommend Notepad++; a very good and free text editor. <http://notepad-plus.sourceforge.net>
- Always make backup copies of your XML files.
- Photo support requires that the NETWORK SERVICE be given "Modify" permissions to the c:\inetpub\wwwroot\directorymanager\photos folder. The installer should do this automatically but it does not hurt to check.
- You can install the evaluation version and later run the Configuration utility to add a license key so that it no longer expires.
- Browsers supported are Internet Explorer 8-11, Firefox 15.x and later, and Google Chrome.
- Changes / customizations to the ASPX and web.config files may not be supported so tread lightly and *make backups* of your original files.

Prerequisites

Make sure that your server meets all of the prerequisites and your installation will go much more smoothly.

- Windows Server 2003 requirements – **Manual installation required.**
 - Windows Server 2003 with SP1 or later
 - IIS Web service installed
 - Microsoft .NET Framework v4.0 installed
 - Server must be a member of the domain/forest
 - In IIS Manager under Web Service Extensions, make sure that ASP.NET v4. is visible and Allowed
 - Apply all Microsoft critical and recommended updates
- Windows Server 2008 requirements
 - Windows Server 2008 / Windows Server 2008 R2
 - IIS 7 / IIS 7.5 web service enabled
 - IIS 6 compatibility components of IIS 7 enabled
 - ASP.NET enabled and .NET Application support enabled
 - .NET Framework 4.0 installed
 - Apply all Microsoft critical and recommended updates
 - Basic and Windows Authentication services must be enabled
- Windows Server 2012 requirements
 - Windows Server 2012/ Windows Server 2012 R2
 - IIS 8 / IIS 8.5 web service enabled
 - IIS 6 compatibility components of IIS 8 enabled
 - ASP.NET enabled and .NET Application support enabled



- .NET Framework 4.0 components enabled
 - Basic and Windows Authentication services must be enabled
- Apply all Microsoft critical and recommended updates
- Create a service/proxy account that has permissions to update user accounts.
- Have a domain user account that is also a member of the IIS Server's local Administrators group to do the installation
- If User Access Control (UAC) is enabled, you may need to run the installer from the command prompt, such as this:
 - `msiexec.exe /i c:\directoryupdate.msi`
- Download the latest version of the Directory Manager software from our Web site.

We strongly recommend that you run Microsoft Update on the server prior to installing Directory Manager to ensure that all updates and fixes available from Microsoft have installed.

Using Secure Sockets Layer (SSL)

We recommend that you implement Secure Sockets Layer (SSL) for any web site on which end users will enter private/personal data or on which a username / password may be passed over the network. All web-based Ithicos Solutions products will work on SSL-enabled web sites.

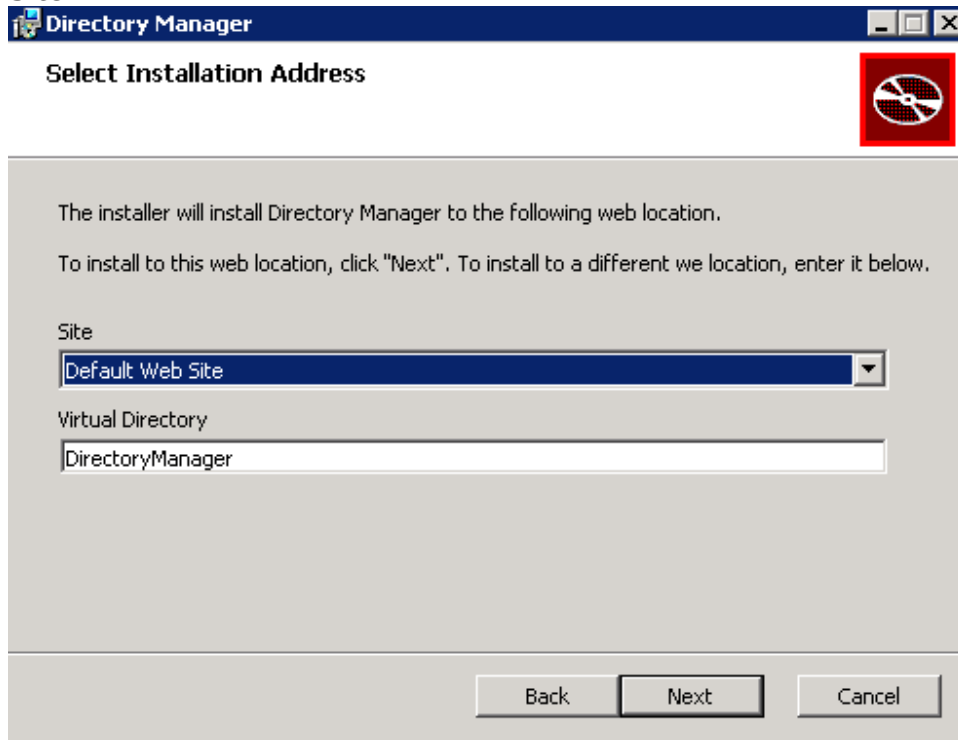
There is nothing you need to do to our products to enable SSL. This is done in Internet Information Server (IIS).

We recommend using a certificate authority that will be trusted by the browsers of all users. It is a very bad practice to get users in the habit of ignoring SSL security warnings.

Installation

Installation is usually simple and quick though the software will be installed with the default XML templates and you will need to customize these for your organization.

1. Run the **DirectoryUpdate.MSI** installer
 - a. Alternately, copy the installer to a folder, such as C:\temp
 - b. Open a command prompt using "Run As Administrator"
 - c. Run **msiexec.exe /i c:\temp\DirectoryManager.msi**
2. On the welcome screen click "Next" and then on the License Agreement screen, agree to the license and click "Next."
3. On the Select Installation Address, You can take most of the defaults for the installer including the default virtual directory name (**/DirectoryManager**) and putting the site on to the Default Web Site.



The installer will install Directory Manager to the following web location.

To install to this web location, click "Next". To install to a different web location, enter it below.

Site
Default Web Site

Virtual Directory
DirectoryManager

Back Next Cancel

4. On the Destination Folder screen, click Next if you want the default path or specify a new path for the software. The default is c:\inetpub\wwwroot\DirectoryUpdate which works for most installations.
5. On the Active Directory Information screen, enter the domain controller name, the domain name, the service account information, and the service account password. Make sure you use the host (or



short name) of the domain controller.

Active Directory Information

Please enter the Active Directory information. All fields are required.

Domain Controller / Global Catalog Server
fnldc01

Active Directory DNS Domain Name
volcanosurfboards.com

Service Account (<domain>\<user>)
volcanosurfb\administrator

Service Account Password
●●●●●●●●

Back Next Cancel

6. Enter the organization name and the license key (or check evaluation version) and then click Next. (Hint: You can run the Configuration wizard later and add a license key.)

License Information

Please enter your organization name and license key or check the Evaluation Version checkbox.

Organization Name
volcano Surfboards

License Key
F3D79581CD2548750B552EE0DF45D8E6073DFA4

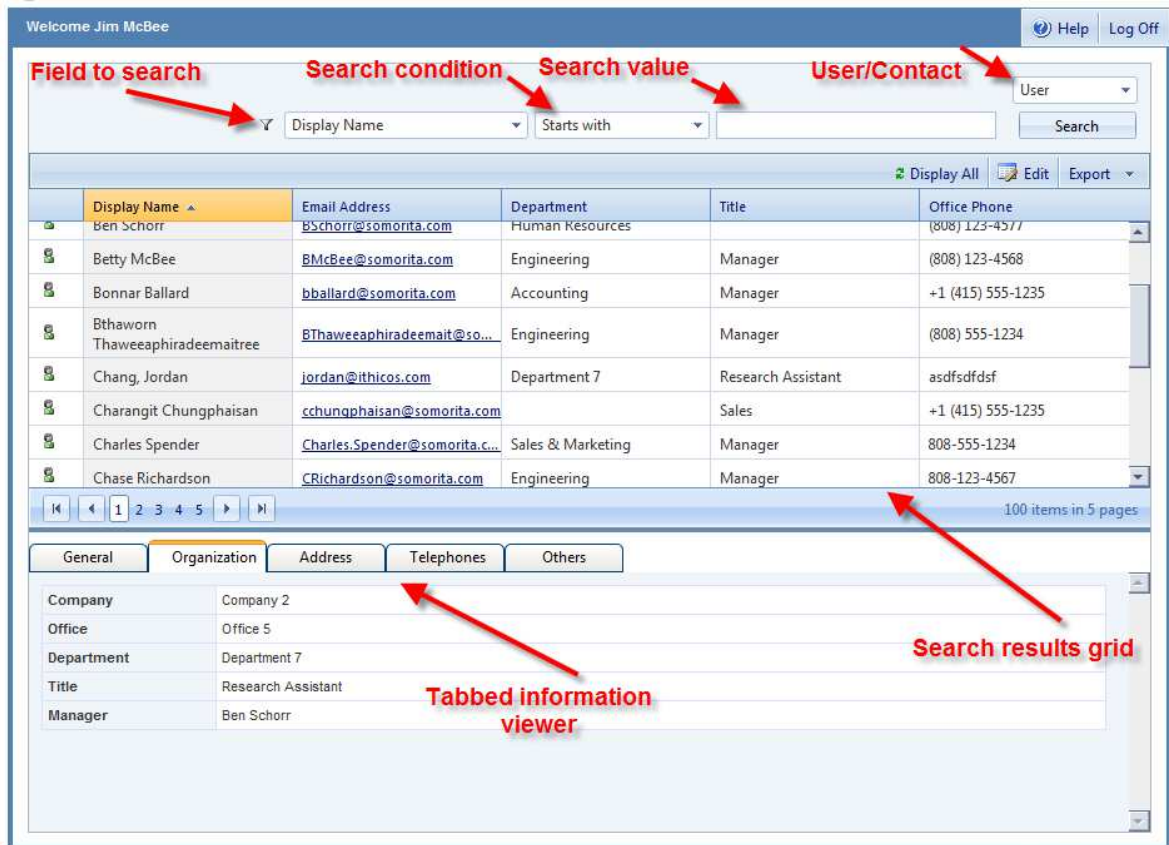
Evaluation Version

Back Next Cancel

7. On the Ready To Install Directory Manager screen, click Install.
8. The installer will run for 20 to 30 seconds. When the installer completes, click Finish.
9. After the installation completes, immediately test the installation with the default settings. From the server's console, you can open up the web browser and type <http://localhost/DirectoryUpdate>
10. Now that the install is completely, customize the XML files to suit your organization. Always make a good backup of your XML files before customizing.

Directory Manager Interface Overview

Directory Manager's user interface consists of two distinct components. The first is the search screen:



Welcome Jim McBee Help Log Off

Field to search **Search condition** **Search value** **User/Contact**

Display Name Starts with User Search

Display Name	Email Address	Department	Title	Office Phone
Ben Schorr	BSchorr@somorita.com	Human Resources		(808) 123-4577
Betty McBee	BMcBee@somorita.com	Engineering	Manager	(808) 123-4568
Bonnar Ballard	bballard@somorita.com	Accounting	Manager	+1 (415) 555-1235
Bthaworn Thaweaphiradeemaitree	BThaweaphiradeemaitree@somorita.com	Engineering	Manager	(808) 555-1234
Chang, Jordan	jordan@ithicos.com	Department 7	Research Assistant	asdfsdfsf
Charangit Chungphaisan	cchungphaisan@somorita.com		Sales	+1 (415) 555-1235
Charles Spender	Charles.Spender@somorita.com	Sales & Marketing	Manager	808-555-1234
Chase Richardson	CRichardson@somorita.com	Engineering	Manager	808-123-4567

100 items in 5 pages

General **Organization** Address Telephones Others

Company: Company 2
 Office: Office 5
 Department: Department 7
 Title: Research Assistant
 Manager: Ben Schorr

Evaluation Version 1.6
10 day(s) remaining



While there are many configurable elements on the search screen, the ones of importance include:

- The search options which includes the fields available to search, the search conditions (Starts With, Ends With, Equals...), and the actual value to search.
- The user/contact drop-down box displays the types of objects to show in the search list: users, contacts, or both
- The search results grid including the columns configured to display in the search grid.
- The tabbed viewer that displays properties of the currently selected object in the search grid. Note that the tabbed viewer does NOT permit editing of the selected object. You must double-click on the object or select the object and click Edit.

Note that most of the search screen is controlled and customized through the AppSettings.XML file.

The second part of the user interface that is noteworthy is the edit screen. The edit screen is mostly customized in the DirectorySettings.XML file.



Directory Manager

Save Reset Print Close

General

First Name	Jordan	Middle Initials	
Last Name	Chang	Display Name	Chang, Jordan
User Name	JChang	Email Address	jordan@ithicos.com

Please contact the help desk at 555-1234 to modify uneditable fields.

Organization

Company	Company 2	Office	Office 2
Department	Engineering	Title	Research Assistant
Manager	Ben Schorr		

To search for a manager, type the first few characters of the person's first name and select the correct name from the list.

Address

Street Address	1411 Peel Street, Suite 505	City	City 2
Zip/Postal Code	H3A 1S5	State/Province	Connecticut
		Country	United States

Adding a note message for the address section here.

Telephones

Office Phone	(808) 555-1234	Office Fax	(808) 555-4321
Mobile Phone	(808) 555-4444		

Example: (808) 123 4567 or 808-123-4567 x4321

Others

Description	Jordan's account was created on March 1, 2009
Web Page	http://www.ithicos.com
Notes	Notes

Adding a note message for the additional info section here.

Annotations:

- Read only field (points to First Name)
- Dropdown list (points to Company)
- Section note (points to Address section)
- Text field (points to Mobile Phone)
- Double-wide and multiline field (points to Notes)



Customization Quick Reference

Customizing the Directory Manager interface for your specific requirements is reasonably simple once you have taken a look at the XML files that store the configuration and if you get yourself a good XML editor. The XML files are all found in the following folder:

C:\inetpub\wwwroot\DirectoryUpdate\Settings

There are five primary configuration files available to you for Directory Manager:

DirectorySettings.XML – Controls the user interface, which fields are visible, which fields are editable, field labels, validation rules, dropdown lists, etc...

AddressSettings.XML – Allows a user to populate multiple values, such as street address, city, state, country, postal code, by selecting a single value such as an office name.

Subsettings.XML – Allows the creation of a parent-child relationship between two fields, such as division to department. If a user selects a certain division name, then only the departments associated with that particular division are selected.

AppSettings.XML – Controls settings in the user interface such as button labels, search fields, export fields, and which fields are visible in the search results columns.

Password.XML – Allows you to define complexity rules for the Change Password functionality.

Each attribute / field on the user interface has some of the same basic options:

- Each field label can be changed
 - Label="MyFieldName"
- Each field type can be text, dropdown, or combo
 - type="dropdown" type="text" or type="combo"
- Each field can be hidden / unhidden
 - visible="yes" or visible="no"
- Each field can be made read only or editable
 - editable="yes" or editable="no"
- Each field can have a default value
 - defaultValue="My Company Name"
- Each field can have a validation format assigned to it
 - validationFormat="US-Phone"
- Each field can have example text
 - example="Type your official title"
- Each field can be required



- o required="yes"

Below is an example of the Organization section and two fields (company and office.) This will give you an idea of some of the types of customization that can be done.

```
44 <!-- ORGANIZATION SECTION -->
45 <organization label="Organization" visible="yes">
46 <company label="Company" type="dropdown" visible="no" editable="yes" required="no"
validationFormat="" defaultValue="" example="">
47 <value>Ithicos Solutions</value>
48 <value>Somorita Surfboards</value>
49 <value>Volcano Surfboards & Smoothies Shop</value>
50 <value>Bob's Boogie Boards</value>
51 </company>
52 <office label="Office" type="text" visible="no" editable="yes" required="no" validationFormat=""
defaultValue="" example=""></office>
```

The DirectorySettings.XML and AddressSettings.XML files CAN be interchanged with **Directory Update**. The AppSettings.XML file cannot be used with our other programs.

The following are the attribute/field options and possible values:

Option	Description and possible values
label	Allows you to change the text label on the interface
type	Sets the field type. Options are "text", "dropdown", and "combo"
visible	Sets the attribute to visible or hidden. Options are "yes" or "no"
editable	Allows the user to either edit the field or have it appear read-only. Options are "yes" or "no".
required	Sets the field so that a value must be entered or selected. Options are "yes" or "no".
validationFormat	Allows you to specify a validation format name (defined at the bottom of the XML file) that controls the required format/structure.
defaultValue	Allows you to specify a default value for the field. If using a dropdown list, the default value must be in the dropdown list also. The default value will only be used if the Active Directory attribute is empty.
example	Allows you to specify sample text that will show directly below the field. As long as it



	is set to example="", the sample text will not show up.
--	---

Here is the company name tag that has been configured as a drop-down list. Notice that for company, within the "open" and "close" tags there are tags for each option in the drop-down list.

```
<company label="Company" type="dropdown" visible="no"
editable="yes" required="no" validationFormat="" defaultValue=""
example="" >
    <value>Ithicos Solutions</value>
    <value>Somorita Surfboards</value>
    <value>Volcano Surfboards & Smoothies Shop</value>
    <value>Bob's Boogie Boards</value>
</company>
```

Logging and Auditing

Directory Manager offers two forms of logging. The first is to log the last date/time of each update to an attribute in Active Directory. The second is to log each individual change to a tab-separated value (TSV) file. These are enabled in the auditing section of the AppSettings.XML file in the section shown here in **Error! Reference source not found..**

```
<!-- Auditing - Directory Update will log the date in yyyy-mm-ddThh:mm:ss format format, username, and IP address each time
<!-- For attribute audit, you can specify extensionAttribute1 through extensionAttribute15. In order to use the extensionAt
<!-- your Active Directory must have been prepped for Exchange 2000/2003/2007. -->
<!-- For log file audit, the default log folder is the "Logs" folder in the DirectoryUpdate folder. You can change this to
<!-- Ensure that the "Application Pool" account (usually NETWORK SERVICE) has "Modify" permissions to the Logs folder. -->
<auditing>
  <auditingAttribute enabled="no" attribute="extensionAttribute1" showUserLastUpdate="yes" text="Your last update was" />
  <auditingLogFile enabled="no" logFileFolder="c:\inetpub\wwwroot\directoryupdate\logs">
    <headers>
      <dateTime text="Date/Time" />
      <userName text="User Name" />
      <sourceIp text="Source IP" />
      <fieldName text="Field Name" />
      <oldValue text="Old Value" />
      <newValue text="New Value" />
    </headers>
  </auditingLogFile>
</auditing>
```

Figure 1: Auditing section of AppSettings.XML file

Note that the default log file folder is c:\inetpub\wwwroot\directoryupdate\logs. The user account under which the application pool is running (usually NETWORK SERVICE) must have Modify permissions to this folder.

E-mail Notifications

Directory Manger v2.x introduces e-mail notifications as a new feature. All e-mail notification settings are configured in the AppSettings.XML file. The first thing that must be configured is the e-mail server; we recommend you use the fully qualified domain name of an e-mail server that will accept mail anonymously.

The e-mail server settings are found in the <emailSettings...> tag near the bottom of the AppSettings.XML file. An example is shown in Figure 2.

```
<!-- SMTP server is used for e-mail notifications. If e-mail a
<emailSettings>
  <smtp server=mailserver.volcanosurfboards.com" port="25" />
</emailSettings>
</appSettings>
```

Figure 2: Configuring the SMTP e-mail server

The SMTP e-mail server that you specify must accept mail from the Directory Manager server. If you are sending to e-mail addresses outside of your organization, then that server must allow relay for the recipients to which you are sending.

There are three types of events for which you can send e-mail notifications. These are:

- Directory information updates (such as phone, address, title, etc...)
- End user changes their own password
- User updates/changes their security questions (if Directory Password is installed.)

Figure 3 shows the e-mail notification settings that are used if a user changes their own personal information in the Active Directory.



```
<emailNotification enabled="no">
  <sender address="support@ithicos.com" name="Ithicos Solution support" />
  <!-- List E-mail addresses seperated by semi-colon (;). -->
  <recipientTo user="yes" manager="no" addresses="" />
  <recipientCc user="no" manager="yes" addresses="" />
  <recipientBcc user="no" manager="no" addresses="help.desk@ithicos.com" />
  <subject>User Information Update Notification</subject>
  <messageBody>
    <greeting>Dear</greeting>
    <message>
      You have sucessfully set up your information using the Directory Update appli
      If you are not the person who made the changes. Please notify the help desk.
    </message>
    <closing>Thank you</closing>
  </messageBody>
</emailNotification>
```

Figure 3: E-mail notification settings

You must customize the sender's SMTP address and display name since the default/example values will not be valid for your company. You can send the notification to the user, the user's manager, or a predefined SMTP address (such as the help desk's SMTP address).

Note that if you select the option to send the notification to the person's manager, the person's Manager field must be filled out and the manager must have an e-mail address.

Authorized Users of Directory Manager

By default, members of the domain's Account Operators, Administrators, and Domain Admins groups can login to Directory Manager and update users. The intention of Directory Manager is to allow non-administrators to be able to edit users (or contacts) in the Active Directory without giving them the keys to the kingdom.

In Active Directory, create a group called **Directory Update Managers** and put the users that should be authorized to use Directory Manager in that group. They need no additional permissions. Actual updates to the Active Directory are performed using the security credentials of the service/proxy account, not the user's account. Membership in the **Directory Update Managers** group merely authorizes the user to use Directory Manager.

Customizing the Search Options and Search Results Grid

The attributes on which we allow searching and the columns shown in the search results grid are the defaults that we have found work best for most of our customers but they



may not be ideal for your organization. This can be changed via the AppSettings.XML file. Locate the **userList** section of that file; within that section is a tag called **<columns>**. Under the **<columns>** section, there is a tag for each attribute on the interface. This section is shown in the screen capture below.

```
<userList maxResults="100" pageSize="20" sortBy="displayName" showOnlyExchangeEnabledUsers="no"
showDisabledUsers="no" showInitialResults="yes" showDetailPanel="yes">
  <columns>
    <personalTitle headerText="Personal Title" visible="no" filter="no" export="no" />
    <firstName headerText="First Name" visible="no" filter="no" export="no" />
    <initials headerText="Middle Initials" visible="no" filter="no" export="no" />
    <middleName headerText="Middle Name" visible="no" filter="no" export="no" />
    <lastName headerText="Last Name" visible="no" filter="no" export="no" />
    <nameSuffix headerText="Name Suffix" visible="no" filter="no" export="no" />
    <displayName headerText="Display Name" visible="yes" filter="yes" export="yes" />
    <email headerText="Email Address" visible="yes" filter="yes" export="yes" />
    <userName headerText="User Name" visible="no" filter="yes" export="no" />
    <company headerText="Company" visible="no" filter="no" export="no" />
    <office headerText="Office" visible="no" filter="no" export="no" />
    <division headerText="Division" visible="no" filter="no" export="no" />
    <department headerText="Department" visible="yes" filter="yes" export="yes" />
    <departmentNumber headerText="Department #" visible="no" filter="no" export="no" />
    <title headerText="Title" visible="yes" filter="yes" export="yes" />
    <employeeId headerText="Employee ID" visible="no" filter="no" export="no" />
    <employeeNumber headerText="Employee #" visible="no" filter="no" export="no" />
    <employeeType headerText="Employee Type" visible="no" filter="no" export="no" />
    <manager headerText="Manager" visible="no" filter="yes" export="no" />
    <assistant headerText="Assistant" visible="no" filter="no" export="no" />
    <secretary headerText="Secretary" visible="no" filter="no" export="no" />
    <officePhone headerText="Office Phone" visible="yes" filter="yes" export="yes" />
    <otherOfficePhone headerText="Other Office Phone" visible="no" filter="no" export="no" />
    <fax headerText="Office Fax" visible="no" filter="no" export="no" />
  </columns>
</userList>
```

Let's take as an example the department field/attribute:
`<department headerText="Department" visible="yes" filter="yes" export="yes" />`

- The headerText option sets the label for the column.
- *Visible="yes"* shows the field in the columns listing
- *Filter="yes"* allows to you search by the attribute
- *Export = "yes"* allows this attribute to be exported to a Excel spreadsheet or text file.

Maximum Users Returned

Directory Manager's search interface was designed specifically to 'search' for users rather than to allow someone to browse through hundreds or thousands of user accounts. You may have noticed that the default search as well as any other search you do in Directory Manager returns a maximum of 100 search results. This is by design so that we don't overwhelm a domain controller with too many LDAP search requests. This filtering feature as well as several other filter features is configurable in the **userList** tag found in the



AppSettings.XML file. Simply change the **maxResults** option found in the **userList** tag.

```
<userList maxResults="100" pageSize="20"  
sortBy="displayName" showOnlyExchangeEnabledUsers="no"  
showDisabledUsers="no" showInitialResults="yes"  
showDetailPanel="yes">
```

The **userList** tag also allows you to filter out users that are not “mail-enabled” (if you use Exchange, and to filter out disabled users.

The Directory Manager interface was designed to “search” for users more than it was designed to “browse” through hundreds or thousands of user accounts. This is partially because of the protocol we use to query Active Directory (LDAP). If you want to display more than 1,000 users in a single search, you will need to also update the maximum search result size that Active Directory will return to an LDAP client. This is done by using the NTDSUTIL.EXE command. See this link for more information:

<http://support.microsoft.com/kb/315071>

Password Resets

Directory Manager v2.1 introduced the ability to allow an authorized user of Directory Manager to reset a user’s password. This can help distribute the load of password resets. A trusted person using Directory Manager can reset user’s passwords rather than having them have to call the Help Desk.

To reset a user’s password, open up the edit page for the user and select the Password Management tab. You can either type in a new password for the user or you can click the “Generate Password” and have a randomly generated.



Aili Heatley (HNL)

User Information | Password Management | Account Management

Save | Save and Close | Close

Password Management

Password policies:

- Password must be at least 8 characters long.
- Password must contain at least 1 lowercase characters.
- Password must contain at least 1 uppercase characters.
- Password must contain at least 1 numbers.
- Password must contain at least 1 special characters.
- Password cannot be one of your 3 previous passwords.
- Password cannot be changed within 1 days.

.....

Password must meet the password policies.

Password:

Confirm Password:

User must change password at next logon

The password supplied must meet either the Windows password complexity requirements or the possibly stronger password complexity defined in the *PasswordSettings.XML* file. The *PasswordSettings.XML* file also allows you to customize the password policy text that the user sees on the screen.

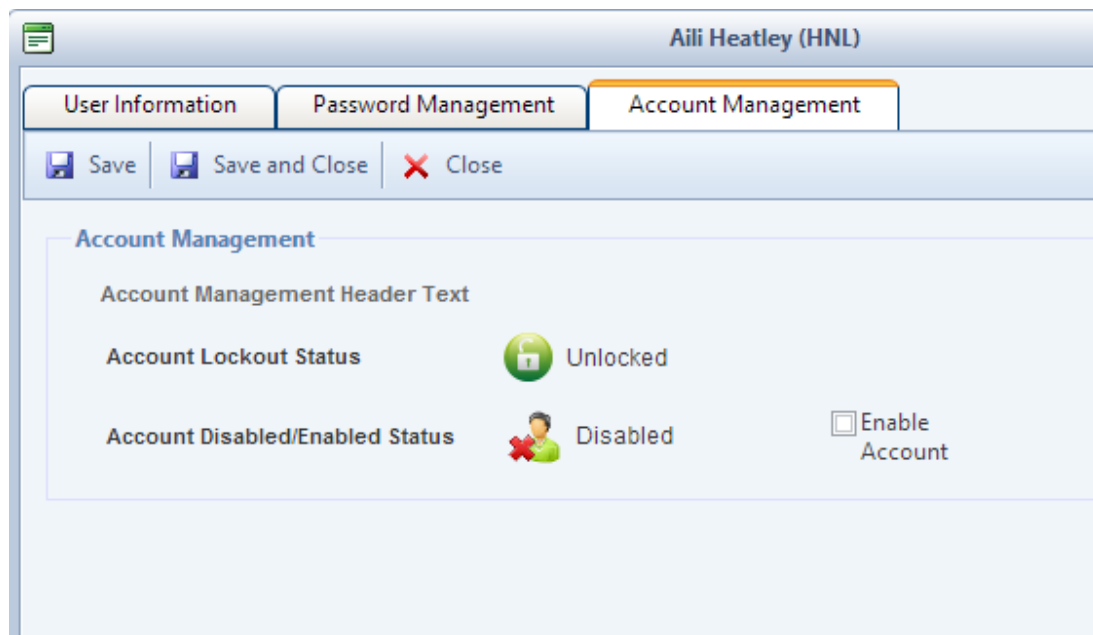
To enable the Password Management feature, you must locate the `<passwordManagementTab...` section in the *AppSettings.XML* file and set `enabled="yes"`. In this section, you can also define some of the error message text and you can also specify which authorized groups can see this tab.



```
<passwordManagementTab
  title="Password Management"
  enabled="yes"
  passwordSettingFile="C:\Inetpub\wwwroot\DirectoryPassword\Settings\PasswordSettings.xml"
  headerText="Password must meet the password policies."
  passwordLabel="Password"
  confirmPasswordLabel="Confirm Password"
  userMustChangePassword="yes"
  userMustChangePasswordText="User must change password at next logon"
  generateRandomPassword="yes"
  generateRandomPasswordButtonText="Generate Password"
  clearPasswordButtonText="Clear"
  confirmationMessage="Password has been successfully reset."
  invalidPasswordErrorMessage="Password does not meet the password policies!"
  unmatchedPasswordsErrorMessage="Password and confirm password do not match!" >
  <authorizedUserGroups>
    <group name="Domain Admins" />
    <group name="Account Operators" />
    <group name="Administrators" />
    <group name="Directory Update Managers" />
  </authorizedUserGroups>
</passwordManagementTab>
```

Account Management / Unlocks / Enable / Disable

Directory Manager v2.1 and later allows and authorized user to perform some basic account management tasks including enabling, disabling, or unlocking an account. This is visible on the Account Management tab; this feature allows for better delegation of simple account management tasks to a trusted agent.





The Account Management tab is enabled in the `<accountManagementTab...>` section of the `AppSettings.XML` file. Locate and set `enabled="yes"`.

```
<!-- ACCOUNT MANAGEMENT TAB -->
<accountManagementTab
  title="Account Management"
  enabled="yes"
  headerText="Account Management Header Text"
  lockoutStatusLabel="Account Lockout Status"
  lockedStatusText="Locked"
  unlockedStatusText="Unlocked"
  unlockAccountText="Unlock Account"
  enabledDisabledStatusLabel="Account Disabled/Enabled Status"
  enabledStatusText="Enabled"
  disabledStatusText="Disabled"
  enableAccountText="Enable Account"
  disableAccountText="Disable Account"
  lockoutInfoText="Locked until"
  indefiniteLockoutText="Locked until administrator unlocks"
  confirmationMessage="Account status has been successfully updated."
  <authorizedUserGroups>
    <group name="Domain Admins" />
    <group name="Account Operators" />
    <group name="Administrators" />
    <group name="Directory Update Managers" />
  </authorizedUserGroups>
</accountManagementTab>
```

Integrated Windows Authentication / Single Sign On

Internet Information Server (IIS), Windows, and Internet Explorer support a feature called Integrated Windows Authentication. Essentially this means that when a user connects to a web site that supports this feature (and if the Web browser supports it), then the user will automatically be signed on.

The default logon interface for Directory Manager is the logon form also known as Forms Based Authentication. Forms Based Authentication (FBA) should work with any browser, from any Windows, Unix, or Apple desktop computer and for users that are not on a computer that is a member of a domain.



Please enter your credentials

User Name

Password

Domain VOLCANOSURFB

© 2011 - Ithicos Solutions. All rights reserved.
Version: 1.6

You can use Integrated Windows Authentication (IWA) with Directory Manager to eliminate the logon for the user. All the user needs to do is to visit the URL for Directory Manager and they are automatically logged on. Note that there is no such thing as a "log off" when using IWA since the user did not really logon.

To enable IWA for Directory Manager, edit the **web.config** file (found in **c:\inetpub\wwwroot\directorymanager** by default). Locate the authentication section and change *mode="Forms"* to *mode="Windows"*

```
<customErrors mode="RemoteOnly"/>
<!-- AUTHENTICATION
This section sets the authentication policies of the application. Possible modes are "Windows",
and "Forms".

"Windows" IIS performs authentication (Basic, Digest, or Integrated Windows) according to
its settings for the application.
"Forms" You provide a custom form (Web page) for users to enter their credentials, and then
you authenticate them in your application. A user credential token is stored in a cookie.
-->
<!--
The <authentication> section enables configuration
of the security authentication mode used by
ASP.NET to identify an incoming user.
-->
<authentication mode="Forms">
  <forms name="AppNameAuth" path="/" loginUrl="Login.aspx" protection="All" timeout="60"/>
</authentication>
```

Integrated Windows Authentication works provided the following is true:

- The user is using a browser that supports IWA such as Internet Explorer
- The computer on which the user is logged in is a member of the Active Directory forest in which the Directory Manager IIS Server is located
- The user logs on to that computer with a domain account



Directory **Manager**

- There are no security settings that prevent IWA
- The browser's local security zone permits IWA (such as Internet Explorer's "Local Intranet" zone).

If you are interested in learning more about IWA, see this link:

http://en.wikipedia.org/wiki/Integrated_Windows_Authentication