



Tsunami Deployer Exchange Exporter Guide

**Migrating Exchange contents to Microsoft SharePoint using Tsunami
Deployer**

**Version 4.0
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PREFACE

This guide provides installation procedures for Tsunami Exchange Exporter and detail steps to extract contents from Exchange using Tsunami Exchange Exporter. The guide also describes how to extract contents non-interactive way using command-line instructions and best practice.

This preface contains the following topics.

- Intended Audience
- Conventions
- Technical Support
- Comments and Suggestions

INTENDED AUDIENCE

Tsunami Exchange Exporter Guide is intended for:

- System Administrators who are responsible for exporting Exchange contents and setting migration environment using Tsunami Deployer.
- Project Managers and IT Managers who create and regulate usage of Tsunami Deployer and Tsunami Exchange Exporter.

CONVENTIONS

The following text conventions are used in this document:

- Commands and keywords are given in **boldface**
- Terminal sessions, console screens, or system file names are displayed in fixed width fonts



Caution indicates that the described action might result in program malfunction or data loss.



Notes contain helpful suggestions about or references to materials not contained in this manual.



Tips provide information that might help you solve a problem.

TECHNICAL SUPPORT

Before contacting Tsunami Support team, ensure that you are referencing the latest copy of this user guide (Ctrl+Click to follow link) [Tsunami Deployer Exchange Exporter Guide](#).

For additional information, please contact Tsunami Support Team at support@tsunami.com

COMMENTS AND SUGGESTIONS

Your feedback is important to us and will help us to provide the most accurate and high quality information possible in our documentation. Send us comments or suggestions by email to support@tsunami.com. Be sure to include as much of the following as possible:

- The document title.
- The location that the document was accessed from (either downloaded from Tsunami web site or the Tsunami Deployer User Guide and Tsunami Exchange Exporter Guide available in Tsunami Deployer).
- The section or chapter number and the original text found in the document.



When you send information to Tsunami Deployer, you grant Tsunami a non-exclusive right to use or distribute the information in any way it believes appropriate without incurring any obligation to you.

1 INSTALLING TZUNAMI EXCHANGE EXPORTER

This chapter contains information about installing Tzunami Exchange Exporter. It contains the following topics:

- *System Requirements*
- *Installing Tzunami Exchange Exporter*
- *Uninstall Tzunami Exchange Exporter*

1.1 SYSTEM REQUIREMENTS

The following requirements must be met in order to use Tzunami Exchange Exporter:

Table 1-1: System Requirements

Components	Minimum Requirements
Computer and processor	2GHz Pentium processor or equivalent
Memory	2 GB (Minimum); 4GB (Recommended)
Hard disk	50Mb (additional space will be required for the Tzunami Deployer projects, which may vary from 10 Mb to 4 GB).
Supported Operating System	Windows Server 2000/2003/2008/2012, Windows XP, Windows Vista, Windows 7 & Windows 8 & Windows 10.
Supported Architectures	x86 and x64
Network	Intranet/Internet access depending on connectivity requirements
Display	800 x 600, 256 colors (minimum); 1024 x 768 high color, 32-bit (recommended)
Microsoft .NET Framework	Microsoft .NET Framework 4.0 (including lower versions 2.0, 3.0 and 3.5)
Others	Exchange server configured and running. Microsoft Outlook configured and running.

1.2 INSTALLING TZUNAMI EXCHANGE EXPORTER

Tsunami Exchange Exporter requires that Microsoft Outlook has been installed and configured for the source Exchange Server.

To install Tsunami Exchange Exporter:

1. Unzip the zip file, and run TsunamiExchangeExporter.msi. The Tsunami Exchange Exporter setup wizard (Welcome window) will launch. To advance through the install wizard, click **Next** on the bottom of the window.

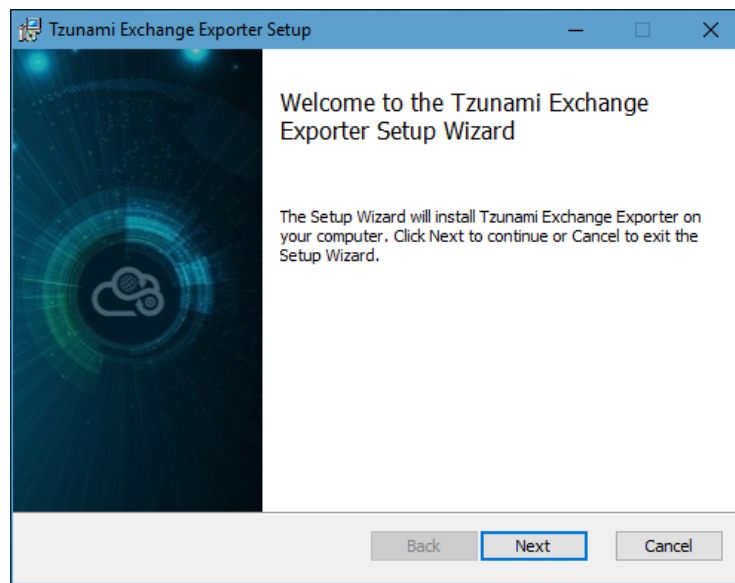


Figure 1-1: Welcome Window

2. In the End-User Licensing Agreement panel, click "**I accept the terms in the License Agreement**" and click **Next** to continue installation.

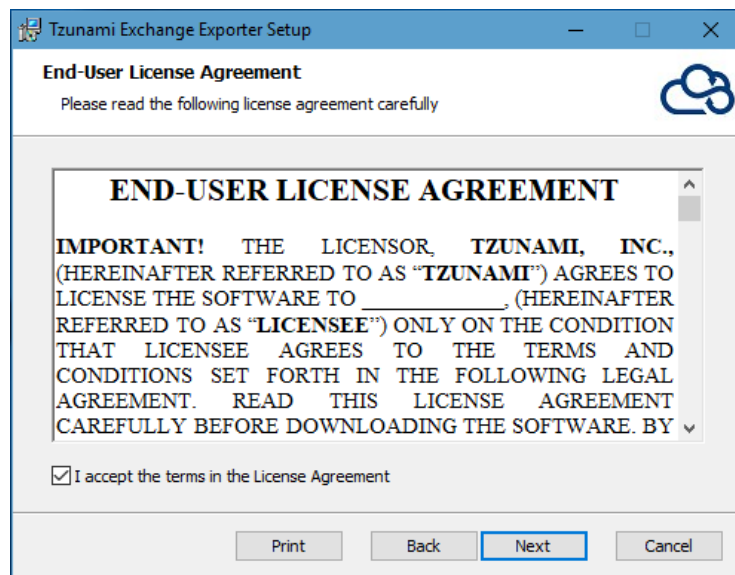


Figure 1-2: End-User License Agreement



You are advised to read the terms of the license carefully before proceeding with the installation. If you decline the license terms, the installation cannot proceed.

3. In the Custom Setup panel, do one of the following:
 - To accept the default Destination Folder, click **Next**.
 - Click **Browse**, locate and select a destination folder, click **OK**, and then click **Next**.

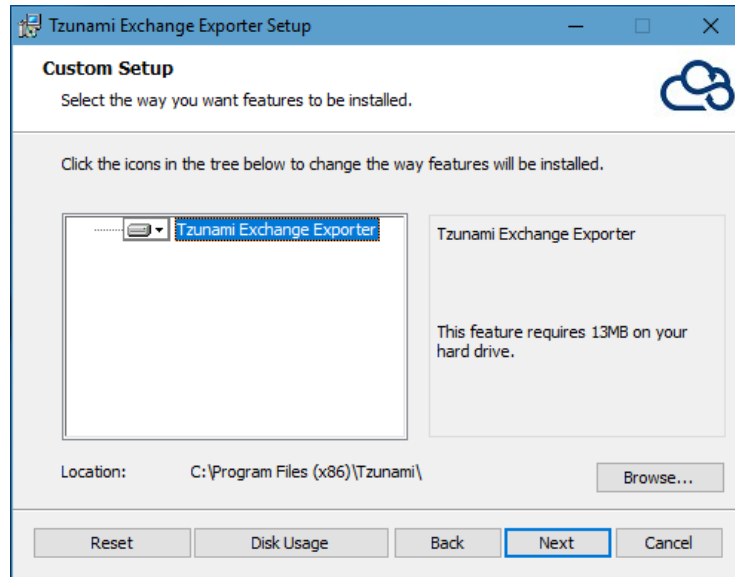


Figure 1-3: Custom Setup Window

4. In the Ready to install Tzunami Exchange Exporter panel, click **Install**.

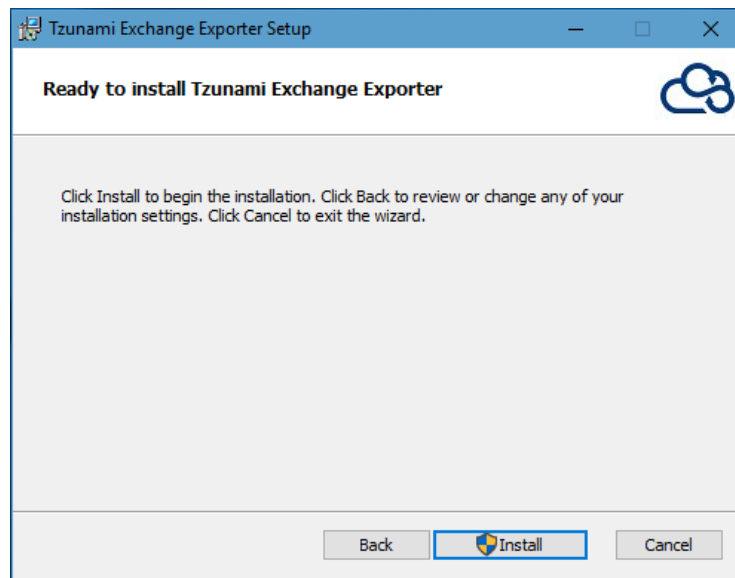


Figure 1-4: Installing Tzunami Exchange Export Window

5. In the Completed Tsunami Exchange Exporter Setup Wizard, click **Finish**.

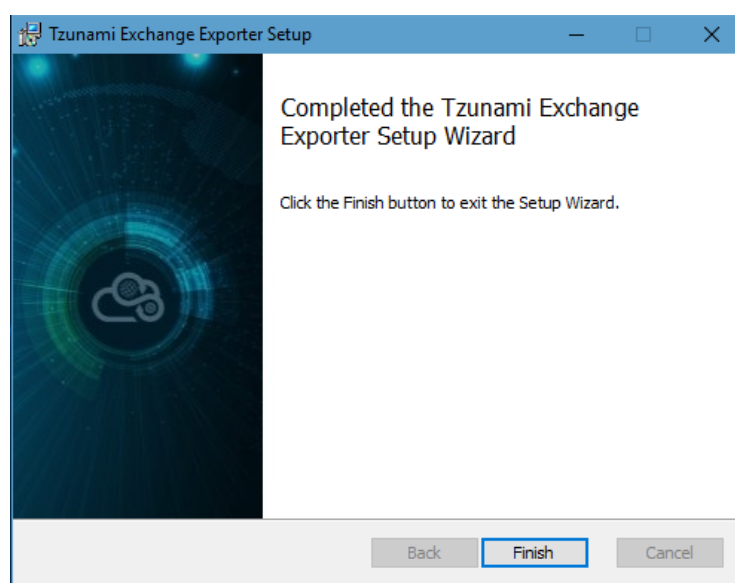


Figure 1-5: Installation Complete Window



When Tsunami Exchange Exporter is installed, it comes with a default license that can be used for evaluation purpose only. This license is limited in time and number of operations.

In order to access and export content from the Exchange Public Folders, you must configure Microsoft Office Outlook with an account that has access to the Exchange Public Folders.

For the exporter to run properly, you must configure your Microsoft Office Outlook to work in Cached Exchange Mode, and set to *Download Full Items*.

1.3 CONFIGURATION OF TZUNAMI SERVICE SETTINGS

1. When installing **Tsunami Deployer/Exporter/Remote Service** for the first time, a **Tsunami Service Settings** dialog is displayed. In **Tsunami Service Settings**, the Licensing Service, Link Resolver Service and O365 AD Service are pointed to localhost (same machine).

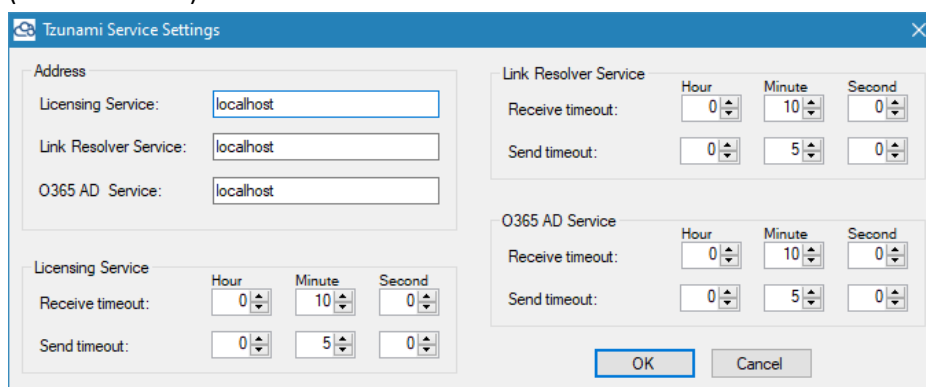


Figure 1-6 Deployer Settings Manager



User can run the **Settings Manager.exe** application from the installation directory to display this service settings dialog at any time and updated the settings to point the Tsunami services as required.

In case of Remote Service installation, restart the Tsunami Remote Service after

updating the Tsunami Service Settings.

If these services are installed in other machine, point to that machine with machine name or IP Address.

2. Click on **OK**.

1.4 UNINSTALL TZUNAMI EXCHANGE EXPORTER

This section of the guide illustrates different ways to remove or uninstall Tsunami Exchange Exporter from your Exchange Server. Here are the two different ways to uninstall Tsunami Exchange Exporters:

- Uninstallation using Installer
- Uninstallation using Control Panel

To uninstall Tsunami Exchange Exporter, user needs to be a Local Administrator in the Exchange Exporter installed machine. Uninstalling Tsunami Exchange Exporter is simple and easy. You can remove or uninstall it in no time. You don't need to reboot your computer once the uninstalling process is complete.



Log files, licensing information files etc. will remain after uninstalling Tsunami Exchange Exporter. You can manually delete those files from your computer if needed. By default logs are located at the "C:\Program Files\Tsunami\Deployer 4.0\Exporter\Logs", or where Tsunami Exchange Exporter is installed. Tsunami Exchange Exporter Options information will be available in "C:\Documents and Settings\All users\Application Data\Local\Tsunami" location.

1.4.1 Uninstallation using Installer

To uninstall Tsunami Exchange Exporter using Installer

1. Close **Tsunami Exchange Exporter**.
2. Unzip the zip file, and run TsunamiExchangeExporter.msi. The Tsunami Exchange setup wizard (Welcome window) will launch. To advance through the remove installation wizard, click "**Next**" at the bottom of the screen.
3. In the Change, repair or remove installation panel, click "**Remove**" button to proceed to remove Tsunami Exchange Exporter from your computer.
4. In the Ready to remove Tsunami Exchange Exporter panel, click "**Remove**" to remove Tsunami Exchange Exporter from your computer.
5. Click **Finish** to exit the setup wizard.



You can right-click Tsunami Exchange Exporter setup (TsunamiExchangeExporter.msi) file and select **Uninstall** to remove or uninstall Tsunami Exchange Exporter from your computer.

1.4.2 Uninstallation using Control Panel

To uninstall Tzunami Exchange Exporter using Control Panel

1. Close **Tzunami Exchange Exporter**.
2. Click **Start > Control Panel > Add or Remove Programs**.
3. In Add or Remove Programs window, right-click the Tzunami Exchange Exporter application you want to remove, and then click **Uninstall**.

2 TZUNAMI EXCHANGE EXPORTER

This chapter contains information about installing Tzunami Exchange Exporter. It contains the following topics:

- *Overview*
- *Exporting from Exchange*
- *Command-line Export*
- *Logging settings*
- *Best Practice*

2.1 OVERVIEW

Exchange Exporter enables migrating Exchange content into SharePoint 2007, SharePoint 2010, SharePoint 2013, SharePoint 2016 and SharePoint Online using Tsunami Deployer.

To load Exchange content into Tsunami Deployer, you must first extract the content, using Exchange Exporter, into TDX (Tsunami Deployer Export) and STDX (Separate Tsunami Deployer Export) files. You can then load this TDX file into a Deployer project.



When working with Deployer on several machines, you can run an export on one machine and load the exported data on another.

Exchange Exporter is an extension module of Tsunami Deployer. You can work with this module independently of Tsunami Deployer.

2.1.1 Supported Types

The following items are exported from Exchange:

- Appointments (Events in calendars)
- Contacts
- Distribution lists
- Posts
- Tasks
- Notes
- Documents
- Mail items
- RSS Feed items
- Discussion
- Report Items



Events in calendars are exported with their recurrence information. If migrated into a Calendar list in SharePoint, the SharePoint events will have the same recurrence information. This information is not visible in the Tsunami Deployer user interface.

Attachments of mail items are exported as a part of the mail's MSG file. This allows you migrating mail items into either a Document Library or a Generic List.



When you export message files as MHTML file, your email attachment may be removed.

2.1.2 Security

In addition to the structure and items, Tsunami Exchange Exporter extracts security information. The following permissions are used in the exporter:

- None
- Read Items
- Create Items
- Create Sub Folders
- Edit Own
- Edit All
- Delete Own
- Delete All
- Owner
- Contact
- Visible

Each item is assigned an ACL defining the permissions of the various members according to the roles they were assigned.



The exporter automatically creates default roles that are used during the deployment process. The roles include None, Owner (Visible, Owner, Create Sub Folders, Delete All, Edit All, Create Items, and Read Items), Publish Editor (Visible, Create Sub Folders, Delete All, Edit All, Create Items, and Read Items), Editor (Visible, Delete All, Edit All, Create Items, and Read Items), Publish Author (Visible, Create Sub Folders, Delete Own, Edit Own, Create Items, and Read Items), Author (Visible, Delete Own, Edit Own, Create Items, and Read Items), Non Editing Author (Visible, Delete Own, Create Items, and Read Items), Reviewer (Visible and Read Items), and Contributor (Visible and Create Items).

2.2 EXPORTING FROM EXCHANGE

The Tsunami Exchange Exporter enables you to export Exchange document contents to a TDX file.



When exporting, keep the following in mind:

Export in small chunks: When exporting from your source system, perform the export in small chunks of about 40K-50K files each that have a common business logic or some other logic.

Ensure consistency: Make sure that the content of the different exports does not overlap and that, while exporting, no changes are made to the source data.

To export to a TDX file:

1. In Tsunami Deployer, right-click in the Exchange tab source store area and **select Export Exchange to TDX**.

Or

Click **Start > All Programs > Tsunami > Tsunami Exchange Exporter**.

The Welcome screen of the Export Wizard appears.

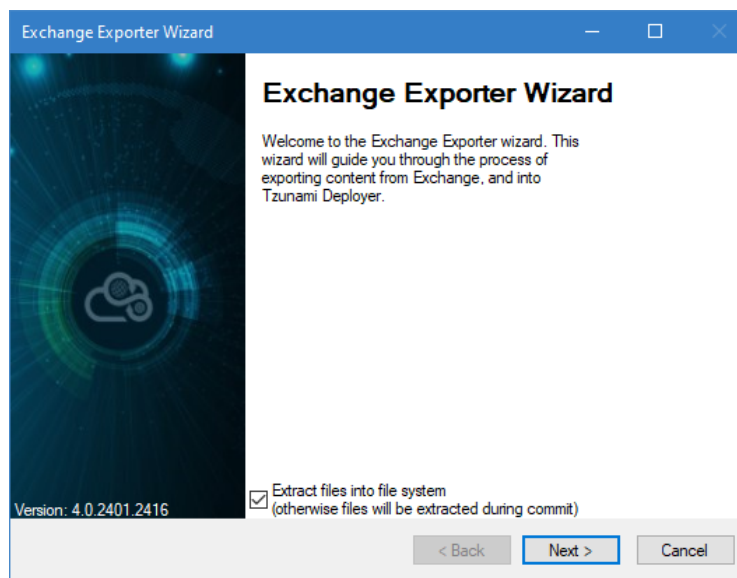



Figure 2-1: Exchange Exporter Wizard – Welcome screen

Table 2-1: Exchange Exporter, Welcome screen - Description of fields

Fields	Description
Extract files into file system (otherwise files will be extracted during commit)	<p>Check this option if you wish to download the binary files from Exchange server to the file system and store them in the FileStore folder, in the same location as the TDX file.</p> <p>If this option is unchecked, no files are downloaded at the export stage. The files are only downloaded when they are needed, in the commit stage.</p> <p> To download files from Exchange server during commit stage, you must install Tsunami Exchange Exporter on the Tsunami Deployer installed machine.</p>

2. Click **Next**. The Exchange Configurations screen appears with two tabs: Items and Advanced.

a. Items Tab

The **Items** tab allows you can select the type of items you want to export from Exchange server. The tab allows you to specify the export general information such as security, custom properties and hidden items.

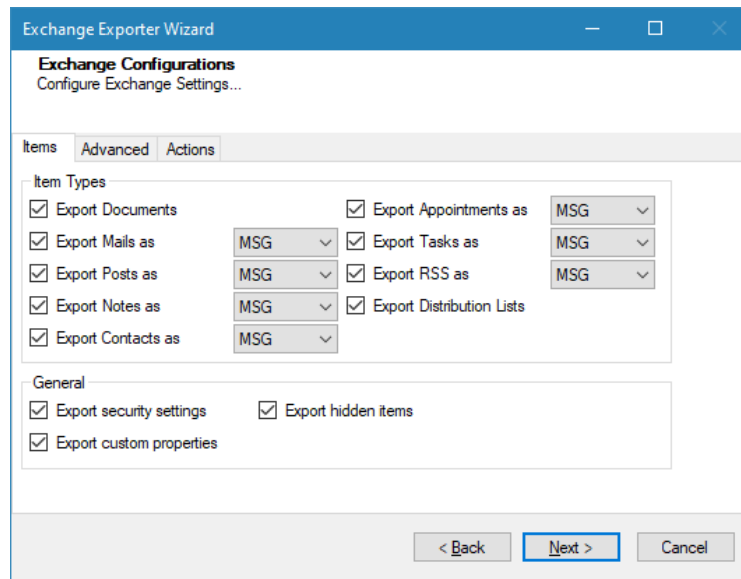


Figure 2-2: Exchange Configurations - Items Screen

Table 2-2: Exchange Configurations Screen, Items Tab – Description of Fields

Field	Description
Item Types	
Export Documents	Check this option if you wish to export Documents from Exchange server.
Export Mail as	Check this option if you wish to export mails as Data Item, Message or MHTML from Exchange server.
Export Post as	Check this option if you wish to export posts as Data Item, Message or MHTML from Exchange server.
Export Notes as	Check this option if you wish to export Notes as Data Item, Message or MHTML from Exchange server.
Export Contact as	Check this option if you wish to export contacts as Data Item, Message, MHTML or VCard from Exchange server.
Export Appointments as	Check this option if you wish to export mails as Data Item, Message, MHTML, iCal or VCal from Exchange server.
Export Tasks as	Check this option if you wish to export Tasks as Data Item, Message or MHTML from Exchange server.
Export RSS as	Check this option if you wish to export RSS as Data Item, Message or MHTML from Exchange server.
Export Distribution Lists	Check this option if you wish to export Distribution Lists from Exchange server.
General	
Export security settings	Check this option if you wish to export the permissions (ACLs) of the exported items.
Export custom properties	Check this option if you wish to export custom properties of the exported items.
Export hidden items	Check this option if you wish to export hidden items from Exchange server.

b. Advanced Tab

The Advance tab allows you to select export option such as mail message metadata, mail properties etc. from Exchange server.

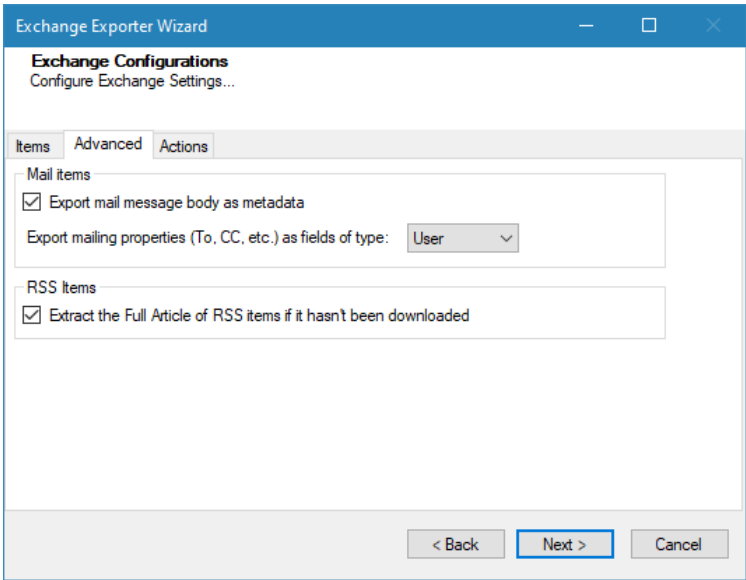



Figure 2-3: Exchange Configurations - Advanced Screen

Table 2-3 Exchange Configurations Screen, Advance Tab – Description of Fields

Field	Description
Export mail message body as metadata	Select this option if you wish to export mail message body as metadata.
Export mailing properties (To, CC, etc.) as fields of type:	Select this option to export mailing properties fields (such as To, Cc. etc.) as a User or Text.
Extract the Full Article of RSS items if it hasn't been downloaded	<p>The option will download the Full Article of the RSS item, if it hasn't been already downloaded. This Full Article will be saved as an attachment (Full article.htm) to the RSS item.</p> <p>This option requires active internet connection. If no active internet connection is found, then you will get a warning message.</p> <div> The successful download of the Full Article depends on its content. If the Full Article contains multimedia contents (like flash, video etc.) and cannot be downloaded, then you will get the warning “The Full Article contains content that cannot be downloaded”.</div>

c. Actions Tab

The **Actions** tab allows you to use different actions that can be taken in the exporter.

- **Auto Pause:** The export process is paused and resumed using this functionality at a set time each day. The feature can be turned on or off using the **Use Auto Pause** check box. The feature can be checked by the user, who can also select the pause and resume times. The user can deselect it to turn off the feature.

The screenshot shows the 'Exchange Exporter Wizard' window with the 'Exchange Configurations' subtitle. The 'Actions' tab is selected. Under the 'Auto Pause' heading, the 'Use Auto Pause' checkbox is checked. Below this, there are two time selection fields: 'Pause export everyday at : 09:00 (24 Hour Time Format)' and 'Resume export everyday at : 18:00 (24 Hour Time Format)'. At the bottom right, there are three buttons: '< Back', 'Next >', and 'Cancel'.

Figure 2-4: Exchange Configurations Screen – Actions Tab

Table 2-4: Exchange Configurations, Actions Tab - Description of fields

Field	Description
Auto Pause	
Use Auto Pause	To use the auto-pause and resume feature, select this option. To turn off this function, uncheck this box.
Pause export every day at	Set the daily time that the export process should pause.
Resume export every day at	Set the daily time for restarting the interrupted export operation.

The settings for actions are only applied to this exporter instance that is currently executing when the user clicks the **Next** button.

3. Click **Next**. The Folders screen appears.

Tsunami Exporter provides quick analysis option before exporting to know the size, count of contents inside selected folder.

If you want to analyze the content: Check on the Folder(s) in tree view, then **Analyze** button is enabled. Click **Analyze**.

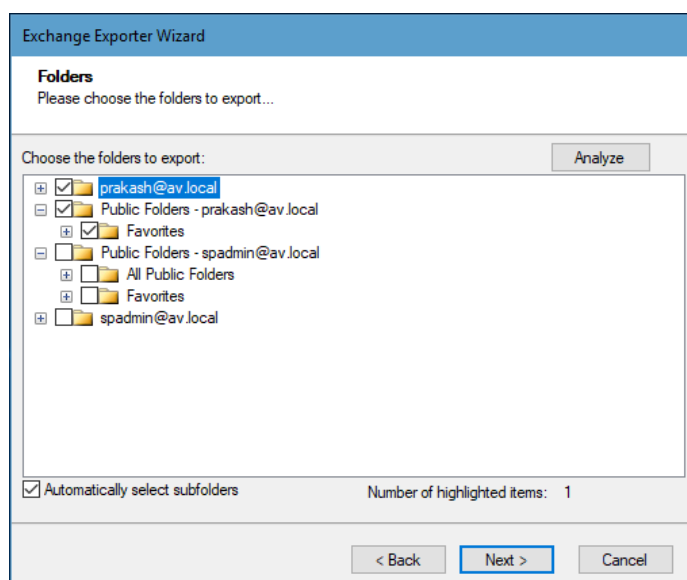


Figure 2-5 Analyze Option

Analyzer screen appears. Analyzer screen provides the detail information that helps to plan for the export (chunk size) based on File size and number of items.

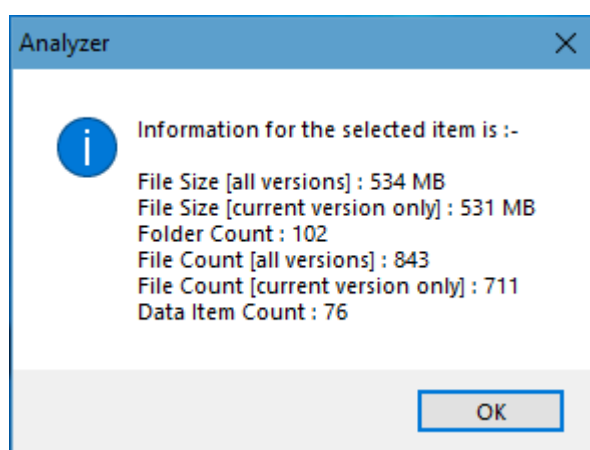


Figure 2-6 Analyzer Information

Table 2-5 Analyzer Information Description

Field	Description
File Size [all versions]	Provides the total size of files for all versions of documents.
File Size [current version only]	Provides the total size of files for current version of documents.

Field	Description
Folder Count	Provides the number of folders.
File Count [all versions]	Provides the total number of files for all versions of documents.
File Count [current version only]	Provides the total number of files for current versions of documents.
Data Item Count	Provides the total number of data item.

4. Select the folders to export.

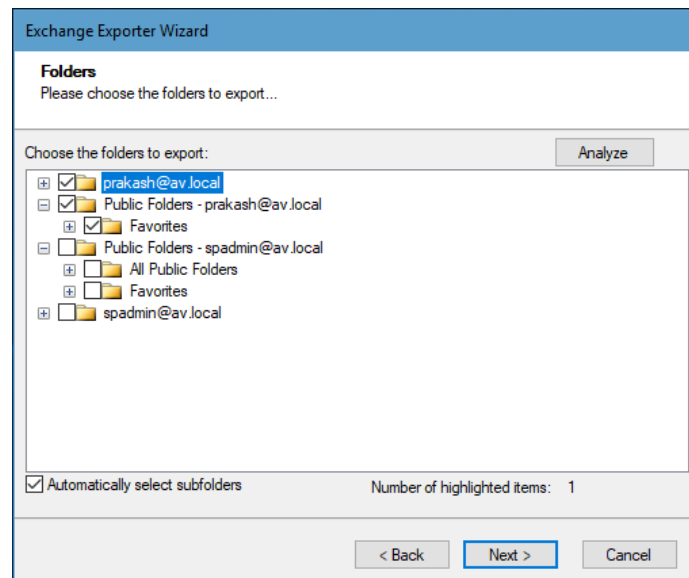


Figure 2-7: Folders Selection Screen



- You can select all subfolders of a selected folder by checking '**Automatically select subfolders**'.
- If Microsoft Outlook 32-bit is installed in other than default location (i.e. "C:\Program Files (x86)\..") in a machine having 64-bit Windows Operating System, Tsunami Exchange Exporter may not connect to Outlook. In this case, follow the steps as below.

1. Close the Tsunami Exchange Exporter's running instance.
2. Run the **Support x86 platform.bat** file with elevated privilege. The file is located at Exporter's installation directory (e.g. C:\Program Files (x86)\Tsunami\Deployer 4.0\Exporters\Exchange).

Make sure that the user, who is running Tsunami Exchange Exporter, has at least **Modify** permission for **Tsunami Exporter.exe** file located at the Exporter's installation directory.

3. Run the Tsunami Exchange Exporter.

If user need to revert this change, user can follow same steps mentioned above by running the **Support AnyCPU platform.bat** file located at Exporter's installation directory.

5. Click **Next**. The Filter screen appears.

Figure 2-8 : Filter Screen

6. Set up filtering as follows:
 - a. In the Properties field, select a property.
 - b. In the Condition field, select a condition from the dropdown list and enter or select values in the corresponding field.
 - c. Click **Add Condition**. The condition is added to the Filter area, displaying the full filter expression.



You can only add one condition per property.

You can edit a condition for a property by selecting the property and modifying the condition type or values that are currently assigned to it.

You can remove a condition from a property or all the conditions from all the properties by clicking **Clear Condition** or **Clear All**, respectively.

This option works only for Data Items.

If multiple conditions are applied, only items that match all conditions are exported.

7. Click **Next**. The Destination Folder screen appears.

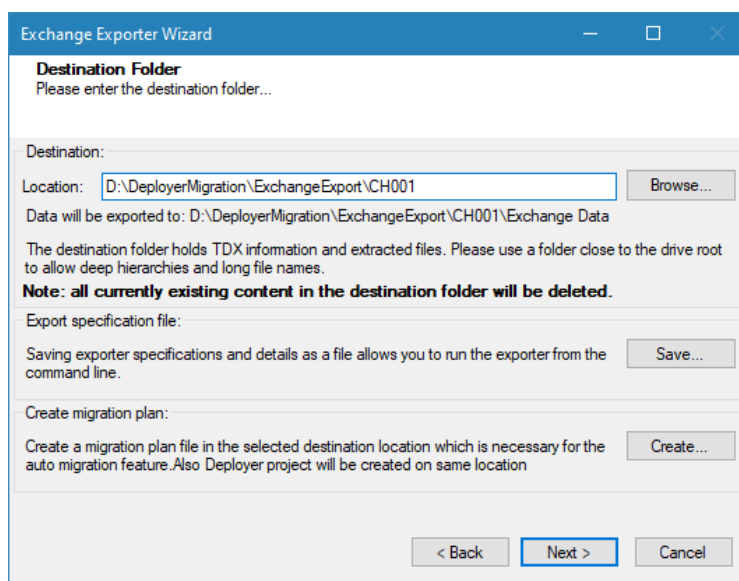


Figure 2-9: Destination Folder Screen

Specify where to export the files and generated TDX information. Make sure you are saving to a folder with a descriptive name and under a well-organized file system hierarchy. It is recommended to export to a folder that is as close to the root as possible.



When exporting deep hierarchy, the property which store the path for exported folder/files may exceed the maximum character supported by the property (typically 260 characters defined in the Windows API). To overcome such condition, it is recommended to export to a folder that is as close to the root as possible.

Starting in Windows 10, version 1607, MAX_PATH limitations have been removed from common Win32 file and directory functions. Please, refer information published by Microsoft from following link and consult with your system administrator to remove the limitation whenever possible.

<https://docs.microsoft.com/en-us/windows/win32/fileio/maximum-file-path-limitation?tabs=registry>

Click **Save** under **Export specification file** for saving export specification details as an XML file which can be used to run the exporter in command-line mode. See the section '**Command-line Export**' below for more details.

8. Click **Next**.



If the export folder already exists, a warning appears, informing you that the destination folder already exists and if you continue all existing information will be deleted.

Clicking **OK** confirms overwrite and clicking **Cancel** returns you to the Destination Folder screen to change the destination folder.

An Exporting screen appears with a progress bar and execution report, and the export process begins. During the export process, a **Pause** button is displayed. Users can manually pause and resume the export process (despite of scheduled pause/resume time) by clicking on **Pause/Resume** button.

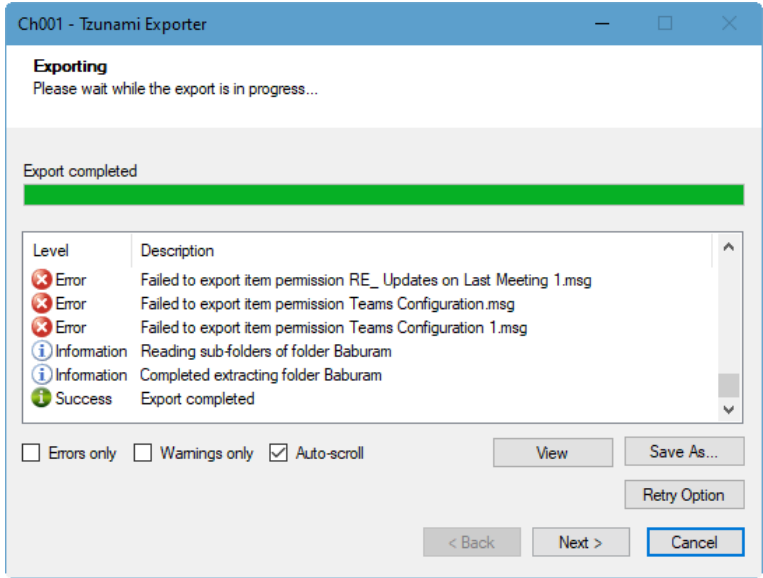


Figure 2-10: Exporter Progress Screen



You can save the export report by clicking **Save As...** after the export is complete.

You can check **Auto-scroll** to display the latest progress messages, as they appear.

You can display only export errors by checking **Errors only**.

You can display only export warnings by checking **Warnings only**.

9. Click **Retry Option**, if there are failed item(s).
10. Click **Next**. The Export Complete screen appears.
11. Click **Done**. The Tzunami Exchange Exporter wizard is closed.

After the extraction process completes successfully, you are prompted to load the exported data into the current Tzunami Deployer project. Clicking '**Yes**' begins the process of loading the content from the previously exported TDX file into the project. For more information about loading sources, refer to the [Tzunami Deployer User Guide](#).

2.3 COMMAND-LINE EXPORT

Tzunami Exporter for Exchange provides ability to run export sessions non-interactively using command line instructions. This allows administrators to plan and schedule long running migration jobs through scripts, batch files and schedulers according to needs and organizational timetables. To run the exporter in batch mode you will need exporter specification file explained in the 'Choose Destination Folder' step of the export wizard. The file contains all the export option details including:

- Source ECM connectivity information (Server Address, User Name, Password etc.)
- Items to export
- Destination and Log Folder
- Filter
- Exporter specific options

This file can be edited to suit your needs however the XML schema of the file should not be altered. It is recommended that you generate a sample specifications file in the Destination Folder Screen selection step of the export wizard and use it as a template to create your own specification file.

Once the specification file is ready, you can run the exporter from command line using command:

TsunamiExporter.exe [-r <ResultFile>] -s <ExportSpecificationsFile>

Usage

Field	Description
-r	Outputs export results into an XML file [Optional]
-s	XML file containing export specifications

For example:

```
C:\User\Administrator> "C:\Program Files (x86)\Tsunami\Deployer 4.0\Exporters\Exchange \TsunamiExporter.exe" -s "D:\Spec Files\specs1.xml"
```

```
C:\Program Files (x86)\Tsunami\Deployer 4.0\Exporters\Exchange> TsunamiExporter.exe -s "D:\Spec Files\specs1.xml"
```

Based on your needs you can create number of specification files and use them to run multiple export sessions as batch commands.



You will need to provide absolute path for **TsunamiExporter.exe** and **ExportSpecificationsFile** in the command if you are not running from the exporter installation directory.

For Example

In Microsoft Windows 10, Windows 8, Windows 7, Windows Vista, Windows Server 2003 and Windows Server 2008/2012 environment, if USG (Universal Security Group) is enabled, Users with low privileges sometimes cannot export ECM contents. To export contents using command line, User must run with elevated or administrative privileges.

To export contents with elevated or administrative privileges, you can run the exporter from command line using command:

```
RUNAS /trustlevel:"Unrestricted" "<ExporterInstallationDirectory>\TsunamiExporter.exe" -s "<Spec file path>\Specfilename.xml "
```

For example:

```
RUNAS /trustlevel:"Unrestricted" "C:\Program Files (x86)\Tsunami\Deployer  
4.0\Exporters\Exchange\TsunamiExporter.exe" -s "D:\Spec Files\specs1.xml" "
```

2.4 LOGGING SETTINGS

In Tsunami Exporter, log is written in a persistent medium having as much information as possible about events that occur while the software runs. That information plays a vital role while diagnosing if any issue occurs during the export process. Hence, it is worth mentioning that logger writes each and every details during.

Tsunami Inc provides the settings for writing logs. There are the following log levels that the user can change before running the tool.

1. Go to installation directory of the exporter and open **TsunamiExporter.exe.config** file in an editor.
2. Locate the key and set corresponding values as mentioned below:
 - **LogLevel:** Set the esteem to "Debug" or "High" or "Normal" or "low" or "none".

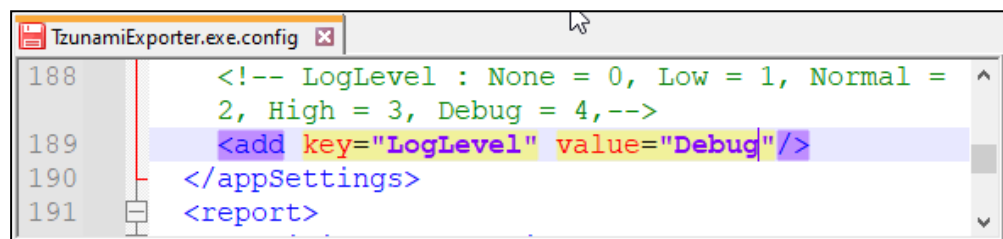


Figure 2-11 Log level Settings

- **Debug:** Writes logs as much as possible. So, this setting includes the maximum level of verbosity. By default, the tool is packaged with this setting.
 - **High:** Writes logs as much as possible for warnings and errors. However, it will not log possible diagnostic information.
 - **Normal:** Writes logs for anticipated errors and warnings.
 - **Low:** Critical errors are logged. There will be as low as possible information logged.
 - **None:** No such logs are written.
3. Save the file. Then run the exporter.

2.5 BEST PRACTICE

Due to the technological differences between Exchange and SharePoint, the following best practices should be taken into consideration:

- Migrate folders to their relative list types, based on the items in those folders.

Table 2-6: Target Structure Guidelines

Exchange Folder Containing	Relevant SharePoint List Types
Mails	<ul style="list-style-type: none"> Document Library (MSG files) Generic (Custom) List (data-items with attachments)
Contact	Contact List
Calendar	Calendar List
Tasks	Tasks List.
Notes	Generic (Custom) List
Documents	Document/Picture Library
RSS items	<ul style="list-style-type: none"> Document Library Generic (Custom) List (data-items with attachments)

- Profile properties/columns can be added to the items as part of the deployment. For more information about adding attributes, refer to the **Tsunami Deployer User Guide**.
- Mail items can be migrated as
 - MSG files into a Documents Library. Microsoft Office Outlook or similar software is required to open these documents.
 - Data-items in a Generic List. The attachments of the mail item become attachments of the data-item. The body of the mail is migrated as a property of the items. Note that some reformatting may occur due to SharePoint limitations. Note that, embedded images and drawings are not migrated.
- RSS items can be migrated as
 - MSG/MHTML files in Document Library. Supported software if required to open these documents. In this case, the Full Article attachment of the RSS items will not be migrated.
 - Data-items in a Generic List. The Full Article of the RSS item becomes the attachment of the data-item.
- It is often useful to add properties that exist for items in Exchange (but are not part of the default lists in SharePoint) to ease working with the content. For example, when migrating mail items, it might be useful to add TO, FROM, and RECEIVED properties to the list. This enables users to sort, group, and filter the items based on these columns. The Tsunami Deployer Rule Engine provides a similar default behavior, out-of-the-box. For more information about adding properties or using the Rule Engine, refer to the **Tsunami Deployer User Guide**.

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