



SEO Toolbox

Administrator's Manual

TABLE OF CONTENTS

INTRODUCTION	3
INSTALL SEO TOOLBOX FOR EPISERVER	4
What will be installed?	4
Add-on store installation	4
Manual installation - Install nuget package	4
Continuous integration – Auto deploy	5
SEO Toolbox (required) files and folders	5
Uninstalling SEO Toolbox.....	6
Re-installing SEO Toolbox	6
Steps if something goes wrong with UI installation	6
GETTING STARTED WITH SEO TOOLBOX	7
Getting started with admin pages.....	7
Review settings	7
Additional explanation	8
<i>Ignored URLs.....</i>	<i>8</i>
<i>Ignored patterns</i>	<i>8</i>
<i>Use alternate language URLs</i>	<i>8</i>
<i>File not found.....</i>	<i>8</i>
<i>File Gone.....</i>	<i>8</i>
<i>Regex URL pattern cache timeout (in seconds).....</i>	<i>8</i>
<i>Allow overriding of URLs.</i>	<i>8</i>
<i>Other important configuration</i>	<i>9</i>
<i>SEO Toolbox sitemap.....</i>	<i>9</i>
SEO Toolbox data layer.....	9
<i>Browse DDS content.....</i>	<i>9</i>
Problem with structure map versions	9
EXCLUDE PAGES FROM SITMAP	10
REFERENCE SITMAP IN ROBOTS.TXT.....	11
SET UP CUSTOM 404 AND 410 PAGES.....	12
Static 404/410.....	12
Dynamic 404/410	13

Introduction

SEO Toolbox was formerly known as *Mogul SEO Manager*. That's why there are so many references in code and configurations to *Mogul SEO Manager*.

When the company *Mogul* merged with its sister company *Decerno* in the Spring of 2018 it was decided to change the product name to *SEO Toolbox*, because the product name *SEO Manager* might mean a person or a job position to some people.

Install SEO Toolbox for Episerver

Here you find a text version of the installation guide to SEO Toolbox for Episerver along with some advice on how to get started using SEO Toolbox.

Please backup! It is highly recommended to make a backup of the database before installing the package.

What will be installed?

Administration pages where administrators can maintain some of the URL data. The files will be added to /modules/_protected folder of the website root folder, if the package is installed via Nuget through Visual Studio.

Visual studio installation is the only way of doing it if `<episerver.packaging installationMode="Code" />` has Code as value in web.config file, which is default. It also possible to install from the add-on store. See below.

InitializationModule: The module will listen to events every time an Episerver page is published, deleted, language deleted or moved and regenerate the URL for the changed page/pages.

Add-on store installation

Go to edit mode of your web application. Go to Add-Ons. The URL should look like this *http://App_URL/secret/ui/AddOns#ThirdPartyAddOns*. Click on install button for SEO Toolbox and follow the installation steps.

You will need to wait 2 or 3 seconds for Episerver to install. After that, click on the "Restart site" button in order to complete the installation.

Congratulations! You have now installed SEO Toolbox, and all you need to do is order a trial license or full License at <https://www.seotoolbox.net/>.

Manual installation - Install nuget package

Go to edit mode of your web application. Go to Add-Ons. The URL should look like this *http://App_URL/secret/ui/AddOns#installed*. Choose Manual upload and select nuget package from your hard-drive.

- Browse your disc and select the "Mogul.SEO.Manager.Package.x.y.zzzz.qqqqq.nuget".
- Press Install.
- Remember to restart the site after installation.
- You will need to wait 2 or 3 seconds for Episerver to complete the installation.
- Congratulations! You have now installed SEO Toolbox.

After installation, please go to the admin interface, review the settings in License and settings section of the admin interface.

If something goes wrong after the site is restarted, please visit Steps if something goes wrong with installation.

Continuous integration – Auto deploy

Once you install SEO Toolbox, the automatic deploy of your website can continue almost as usual. When SEO Toolbox is installed, it is placed inside Modules and ModulesRepository folders in the appData folder. Apart from that, Mogul.SeoManager.dll and a couple of more dll:s are placed inside modulesbin folder. These dll:s, along with files required by SEO Toolbox are listed in SEO Toolbox (required) files and folders.

Note that if you deploy your site with a build server, that deletes all files and folders in your site folder and are not using a copy paste deployment; you need to make sure that all files placed inside your web application's folder are still there after the build.

Therefore, modulesbin folder should be excluded from automatic build deletion or skipped when doing a manual deploy. The files that also should be excluded are MogulSeoManagerPageGone.aspx, MogulSeoManagerPageNotFound.aspx and MogulSEOLicense.config.

SEO Toolbox (required) files and folders

The files in modulesbin are the following:

- modulesbin\EPiServer.Cms.Shell.UI.dll
- modulesbin\EPiServer.Packaging.dll
- modulesbin\EPiServer.Packaging.UI.dll
- modulesbin\EPiServer.Shell.UI.dll
- modulesbin\NuGet.Core.dll
- modulesbin\Mogul.FileHelpers.dll
- modulesbin\log4net.dll
- modulesbin\Mogul.SeoManager.dll
- modulesbin\StructureMap.dll
- modulesbin\System.Web.Mvc.dll

Other files placed in the root of your project project:

- MogulSeoManagerPageGone.aspx
- MogulSeoManagerPageNotFound.aspx
- MogulSeoManagerSitemap.aspx
- MogulSEOLicense.config

The files in yourVPPpath\Modules\Mogul.SEO.Manager.Package

- bin\net40*.dll
- Modules\MogulSeoUrl*.*

- Logic\PackageInitializer\mogulSections.xml
- MogulSeoManagerPageNotFound.aspx
- MogulSeoManagerPageGone.aspx
- MogulSeoManagerSitemap.aspx
- web.config

If SEO Toolbox does not work, check VPP\Modules\Packages.config file. This file should contain the following line: The version should match with the version displayed in the Add-Ons.

Uninstalling SEO Toolbox

NOTE! If you uninstall SEO Toolbox all URL data will be deleted. A backup file with the existing URLs will be created (read section “Reinstall SEO Toolbox”). Please only uninstall if you know that it will not harm your sites ranking on search engines. Make sure to use the upgrade function if you want to add the newest version of SEO Toolbox.

To uninstall SEO Toolbox, use the same Add-On interface.

Click on SEO Toolbox in the installed Add-ons section. The popup will appear with SEO Toolbox information. To uninstall, press the Uninstall button.

Remember to restart the website after uninstallation.

Re-installing SEO Toolbox

When SEO Toolbox is uninstalled all URL data is stored into a backup file with the name “SEOManagerUrlDataBackup.xml”. This file is placed in the ModulesRepository folder.

When an administrator is installing SEO Toolbox and this file exists, all data in that file will be imported during the installation. If the backup file contains a lot of data this operation will take some time when you restart the site after the add-on is installed.

This feature can be used for developers when they want to import URLs for an old website at the same time as they install SEO Toolbox.

Steps if something goes wrong with UI installation

If something goes wrong with the installation, the website might not work. This is not a common scenario, but we must make sure what the exit plan is.

In this case, follow the steps:

Go to modulesbin folder in your site root. Delete Mogul.SeoManager.dll from this folder. Go to VPPofyoursite\Modules. *Delete Mogul.SEO.Manager.Package.* Go to VPPofyoursite\ModuleRepositories. Delete Mogul.SEO.Manager.Package. Go to VPPofyoursite\Modules\Packages.config. Delete Mogul.SEO.Manager.Package.

Getting started with SEO Toolbox

This section describes how to use SEO manager.

Getting started with admin pages

To view SEO manager admin pages, go to in Admin mode -> Admin -> Tools -> SEO manager.

You will be presented with the SEO manager start page. To get started, click License and settings. Review the configuration, by clicking on the Settings tab.

Review settings

This section describes the settings available for changing in SEO Toolbox.

Use Alternate Language Urls. Specified whether to use alternate language URLs when rendering the page True

Not found (404) page address. The address of 404 page
/MogulSeoManagerPageNotFound.aspx

Gone (410) page address. The address of 410 page /MogulSeoManagerPageGone.aspx Url
Friendly Name Property URLSegment or PageName URLSegment

Ignored Urls. The list of URLs to be ignored by URL rewriter /mogulseo managersitemap.aspx

Ignored Patterns. The list of key/value pairs containing a regular expression to be ignored by URL rewriter lco, axd, css, png, jpg, gif, js, swf files and all files inside modules/MogulSeoUrl/
RegEx URL patterns cache timeout (in seconds). Sets how long RegEx patterns will be cached

Invalid Characters Regex. Regular expression used to determine which set of characters should be replaced with Replacement character [\]

Invalid Characters to Remove. Regex Regular expression used to determine which set of characters should be removed [\?&#:*"<>|, .+?]

Replacement Character. The character used to replace Invalid Characters Regex –

Allow overriding of URLs. This setting allows SEO Toolbox to look first in SEO Toolbox DDS tables for incoming URLs and then eventually pass URL to .

Use Simple URL as Master URL. If set to “True”, simple URL:s handled in links as default URL:s.

Enable redirects for fallback languages. If set to “True”, SEO Toolbox will also perform redirects for the pages' fallback language.

Disable events handlers. If set to “True”, SEO Toolbox will not attach event handlers on published, moved and deleted page events.

Additional explanation

This part contains additional explanation for the settings listed in the table above, if any.

Ignored URLs

You can specify specific URL-s that the SEO manager should ignore to handle. To add a ignore URL you just create a 'add' node with the attribute 'url' and specify the path to file that you want to ignore.

Example: If you want the URL manager to ignore the robot.txt file you can add the following node.

Ignored patterns

You can specify ignore RegExp patterns that the SEO manager should ignore to handle. To add a ignore RegExp pattern you just create a 'add' node with the attributes 'name' and 'pattern' then specify a name and the RegExp pattern that you want to ignore.

Example: If you want the URL manager to ignore all files with the extension ico in all site folders you can add the following node.

Use alternate language URLs

Tells SEO Toolbox true/false if the plugin should inject alternate language reference to the page header (when exist page translations). If this setting is set to false the SEO Toolbox will not even check for alternate translations for pages.

Example: You have a page "Products"/"Produkter". The page exists in English and in Swedish translation. When site visitor visit the English "Products" page the system will know that there is a Swedish translation for the page and add an alternate language link to the Swedish version of the page.

File not found

Specify the path to the page that should handle 404 requests.

File Gone

Specify the path to the page that should handle 410 requests.

Regex URL pattern cache timeout (in seconds)

Specify number of seconds that the cache will hold the RegEx patterns in memory. Otherwise this information will be request a lot (almost every page request).

Allow overriding of URLs.

This setting allows SEO Toolbox to look first in SEO Toolbox DDS tables for incoming URLs and then eventually pass URL to. However, this also allows editors to create an URL for a page that is identical to an URL of another existing page. In that way the latter page can become unreachable, so this needs to be used **with caution**. It can also hurt performance

because, for almost every request, SEO Toolbox will try to find that URL in its database tables.

Other important configuration

Culture. The default culture for the website (found in “Manage websites” in admin mode) tells SEO manager what the default language is for the website.

SEO Toolbox sitemap

SEO Toolbox sitemap is generated and added to the root of the web site.

SEO Toolbox data layer

SEO Toolbox uses DDS – Dynamic Data Store to store its data. If you want to view the content of these tables, see: Browse DDS content below.

After installation, the DDS stores SEO Toolbox is using for storing data will be empty. The configuration changes are an exception to this rule, they are set during installation.

Browse DDS content

If you want to view the content of DDS stores after generating the site tree, use the following query:

```
SELECT * FROM tblBigTable WHERE StoreName = 'UrlDatas'
```

If you want to view the settings in DDS, use the following queries:

```
SELECT * FROM tblBigTable WHERE StoreName = 'UrlRewriterSettings'
```

```
SELECT * FROM tblBigTable WHERE StoreName = 'GlobalSettings'
```

```
SELECT * FROM tblBigTable WHERE StoreName = 'EpiSettings'
```

Problem with structure map versions

For Episerver 11 there are at this writing two versions of SEO Toolbox, depending on which version of structure map your installation of Episerver is using. Please contact ServiceDesk@mogul.com if you experience problems with Episerver 11 and SEO Toolbox.

Exclude pages from sitemap

In some cases you'd want to exclude pages from the site map, as we might need to prevent crawlers from indexing the content of a specific page.

The pages that needs to be excluded from sitemap by an editor should declare a property `bool? ExcludeFromSitemap`. By default, if `ExcludeFromSitemap` is not set or a new page is created, the value is set to `false` – the page is included in the site map by default.

Note: When a new property is added to a `PageType`, no matter what its default value is, the value of the page property will be null. Therefore, a nullable Boolean value has to be used and in case we want to exclude a page from a sitemap, we cannot rely on the default value for the existing pages.

Reference sitemap in robots.txt

SEO Toolbox creates sitemap for the current website. However, crawlers need to be told about the path to the sitemap.

Here is an example of how you should reference SEO manager sitemap in your robots.txt:

Sitemap: <https://your-website/MogulSeoManagerSitemap.aspx>

User-agent: *

Disallow: /directory-x

Disallow: /directory-y

Please note that the blank line between the Sitemap tag and the User-agent tag is essential, if not present this can cause problems for some crawlers!

Set up custom 404 and 410 pages

SEO Toolbox handles custom 404/410 pages. In order for those to work, different configurations need to be set. This is based on whether a redirection to an MVC controller/WebForms static page/WebForms dynamic page is performed. It should work for any IIS version as well. Here is how.

Static 404/410

In case you have a static aspx page to redirect to, the simple web.config setup should do the trick:

```
<httpErrors>
  <remove statusCode="404" subStatusCode="-1"/>
  <error statusCode="404" path="/MogulSeoManagerPageNotFound.aspx" responseMode="ExecuteURL"/>
  <remove statusCode="410" subStatusCode="-1"/>
  <error statusCode="410" path="/MogulSeoManagerPageGone.aspx" responseMode="ExecuteURL"/>
</httpErrors>
```

In this case, the aspx files need to include the Response HTTP status code:

```
<script runat="server">
    protected NameValueCollection MetaData = new NameValueCollection();

    protected void Page_Load(object sender, EventArgs e)
    {
        Response.Status = "404 Not Found";
        Response.StatusCode = 404;
        Response.TrySkipIisCustomErrors = true;

        foreach (var key in Request.QueryString.AllKeys)
        {
            MetaData.Add(key, Request.QueryString[key]);
        }
    }
</script>
```

Dynamic 404/410

On the other hand, if you need a dynamic 404/410 page, web.config is slightly different:

```
<httpErrors errorMode="Custom" existingResponse="Replace">
  <remove statusCode="404" subStatusCode="-1"/>
  <error statusCode="404" path="/administration/404" responseMode="ExecuteURL"/>
  <remove statusCode="410" subStatusCode="-1"/>
  <error statusCode="410" path="/administration/410" responseMode="ExecuteURL"/>
</httpErrors>
```

Now, we need to create the controller for the page (given that we set the page reference for 404/410 pages as properties on start page):

```
if (!PageEditing.PageIsInEditMode)
{
    ControllerContext.RouteData.DataTokens[RoutingConstants.NodeKey] = startPage.NotFoundPage;
    Response.StatusCode = 404;
}
```

Similarly, 410 controller or 410 aspx static page should be created.