Virtual host setup

This section describes how to set up a virtual host for eZ Publish using the Apache web-server. A virtual host setup is only needed if eZ Publish has been configured to use the host access method, which is the recommended, most secure method.

For an introduction and thorough description of the concept of virtual hosts, you can refer to the Apache documentation.

Do not forget to restart the web server after any change of the configuration files.

Generic virtual host setup

Virtual hosts are usually defined at the bottom of "`httpd.conf`", which is the main configuration file for Apache, or in a separate configuration file included from `httpd.conf`.

Adding a virtual host for eZ Publish can be done by copying the following lines and replacing the text encapsulated by the square brackets with actual values. Please refer to the next section for a real life example of using virtual hosts.

> ✅ **New in eZ Publish 5.2 / 2013.07**
> The front controller can now be altered with environment variables, without the need to modify `index.php`.

```
NameVirtualHost [IP_ADDRESS]

<VirtualHost [IP_ADDRESS]:[PORT]>
    <Directory [PATH_TO_EZPUBLISH]/web>
        Options FollowSymLinks
        AllowOverride None
        # depending on your global Apache settings, you may need to
uncomment and adapt
        # for Apache 2.2 and earlier:
        #Allow from all
        # for Apache 2.4:
        #Require all granted
    </Directory>

    # Environment.
    # Possible values: "prod" and "dev" out-of-the-box, other values
possible with proper configuration
    # Defaults to "prod" if omitted
    SetEnv ENVIRONMENT "prod"

    # Whether to use Symfony's ApcClassLoader.
    # Possible values: 0 or 1
    # Defaults to 0 if omitted
    #SetEnv USE_APC_CLASSLOADER 0

    # Prefix used when USE_APC_CLASSLOADER is set to 1.
    # Use a unique prefix in order to prevent cache key conflicts
    # with other applications also using APC.
    # Defaults to "ezpublish" if omitted
    #SetEnv APC_CLASSLOADER_PREFIX "ezpublish"

    # Whether to use debugging.
    # Possible values: 0 or 1
```

```
    # Defaults to 0 if omitted, unless ENVIRONMENT is set to: "dev"
    #SetEnv USE_DEBUGGING 0

    # Whether to use Symfony's HTTP Caching.
    # Disable it if you are using an external reverse proxy (e.g. Varnish)
    # Possible values: 0 or 1
    # Defaults to 1 if omitted, unless ENVIRONMENT is set to: "dev"
    #SetEnv USE_HTTP_CACHE 1

    # Defines the proxies to trust.
    # Separate entries by a comma
    # Example: "proxy1.example.com,proxy2.example.org"
    # By default, no trusted proxies are set
    #SetEnv TRUSTED_PROXIES "127.0.0.1"

    <IfModule mod_php5.c>
        php_admin_flag safe_mode Off
        php_admin_value register_globals 0
        php_value magic_quotes_gpc 0
        php_value magic_quotes_runtime 0
        php_value allow_call_time_pass_reference 0
    </IfModule>

    DirectoryIndex index.php

    <IfModule mod_rewrite.c>
        RewriteEngine On

        # Uncomment in FastCGI mode or when using PHP-FPM, to get basic
auth working.
        #RewriteRule .* - [E=HTTP_AUTHORIZATION:%{HTTP:Authorization}]

        # v1 rest API is on Legacy
        RewriteRule ^/api/[^/]+/v1/ /index_rest.php [L]

        # If using cluster, uncomment the following two lines:
        #RewriteRule ^/var/([^/]+/)?storage/images(-versioned)?/.*
/index_cluster.php [L]
        #RewriteRule ^/var/([^/]+/)?cache/(texttoimage|public)/.*
/index_cluster.php [L]

        RewriteRule ^/var/([^/]+/)?storage/images(-versioned)?/.* - [L]
        RewriteRule ^/var/([^/]+/)?cache/(texttoimage|public)/.* - [L]
        RewriteRule ^/design/[^/]+/(stylesheets|images|javascript|fonts)/.*
- [L]
        RewriteRule ^/share/icons/.* - [L]
        RewriteRule
^/extension/[^/]+/design/[^/]+/(stylesheets|flash|images|lib|javascripts?)
/.* - [L]
        RewriteRule
^/packages/styles/.+/(stylesheets|images|javascript)/[^/]+/.* - [L]
        RewriteRule ^/packages/styles/.+/thumbnail/.* - [L]
        RewriteRule ^/var/storage/packages/.* - [L]
```

```apache
        # Makes it possible to place your favicon at the root of your
        # eZ Publish instance. It will then be served directly.
        RewriteRule ^/favicon\.ico - [L]
        # Uncomment the line below if you want you favicon be served
        # from the standard design. You can customize the path to
        # favicon.ico by changing /design/standard/images/favicon\.ico
        #RewriteRule ^/favicon\.ico /design/standard/images/favicon.ico [L]
        RewriteRule ^/design/standard/images/favicon\.ico - [L]

        # Give direct access to robots.txt for use by crawlers (Google,
        # Bing, Spammers..)
        RewriteRule ^/robots\.txt - [L]

        # Platform for Privacy Preferences Project ( P3P ) related files
        # for Internet Explorer
        # More info here : http://en.wikipedia.org/wiki/P3p
        RewriteRule ^/w3c/p3p\.xml - [L]

        # Uncomment the following lines when using popup style debug in
legacy
        #RewriteRule ^/var/([^/]+/)?cache/debug\.html.* - [L]

        # Following rule is needed to correctly display assets from eZ
Publish5 / Symfony bundles
        RewriteRule ^/bundles/ - [L]

        # Additional Assetic rules for eZ Publish 5.1 / 2013.4 and higher.
        ## Don't forget to run php ezpublish/console assetic:dump
--env=prod
        ## and make sure to comment these out in DEV environment.
        RewriteRule ^/css/.*\.css - [L]
        RewriteRule ^/js/.*\.js - [L]

        RewriteRule .* /index.php
    </IfModule>

    DocumentRoot [PATH_TO_EZPUBLISH]/web/
    ServerName [SERVER_NAME]
```

```
        ServerAlias [SERVER_ALIAS]


    </VirtualHost>
```

> (i) **Pure legacy stack**
> You may point the DocumentRoot to `[PATH_TO_EZPUBLISH]/ezpublish_legacy/` if you want to use *"pure legacy stack"*.
>
> In that case, eZ Publish will act exactly like in 4.x version, without Symfony. Environment variables presented in the example above won't have any effect.

> ⚠ For instructions on how to set custom environments please refer to the Installing eZ Publish on a Linux-UNIX based system documentat ion page, under "Defining the desired environment".

Reference	Description
[IP_ADDRESS]	The IP address of the virtual host, for example "`128.39.140.28`". Apache allows the usage of a wildcards here ("*").
[PORT]	The port on which the web server listens for incoming requests. This is an optional setting, the default port is 80. The combination of an IP address and a port is often referred to as a socket. Apache allows the usage of a wildcards here ("*").
[PATH_TO_EZPUBLISH]	Path to the directory that contains eZ Publish. This must be the full path, for example "`/var/www/ezpublish-3.6.0`".
[SERVER_NAME]	The host or the IP address that Apache should look for. If a match is found, the virtual host settings will be used.
[SERVER_ALIAS]	Additional hosts/IP addresses that Apache should look for. If a match is found, the virtual host settings will be used.

> ⚠ Please note that the "`mod_rewrite`" module must be enabled in "`httpd.conf`" in order to use the Rewrite Rules.

NameVirtualHost

The "`NameVirtualHost`" setting might already exist in the default configuration. Defining a new one will result in a conflict. If Apache reports errors such as "`NameVirtualHost [IP_ADDRESS] has no VirtualHosts`" or "`Mixing * ports and non-* ports with a NameVirtualHost address is not supported`", try skipping the `NameVirtualHost` line. For more info about the `NameVirtualHost` dir ective, see http://httpd.apache.org/docs/2.2/mod/core.html#namevirtualhost.

SOAP and WebDAV

If you would like to use the SOAP and/or the WebDAV features of eZ Publish, you'll have to add the following lines in the virtual host configuration (replace appropriately the host names used):

```
    RewriteCond %{HTTP_HOST} ^webdav\..*
    RewriteRule ^(.*) /webdav.php [L]

    RewriteCond %{HTTP_HOST} ^soap\..*
    RewriteRule ^(.*) /soap.php [L]

    ServerAlias soap.example.com
    ServerAlias webdav.example.com
```

Optional re-write rules to improve performance

Using the Apache module `mod_expires` is recommended to improve site performance, by preventing users from downloading too frequently static assets. The following lines can added to the virtualhost configuration to take advantage of it:

```
# Everything below is optional to improve performance by forcing
    # clients to cache image and design files, change the expires time
    # to suite project needs.
    <IfModule mod_expires.c>
        <LocationMatch "^/var/[^/]+/storage/images/.*">
            # eZ Publish appends the version number to image URL (ezimage
            # datatype) so when an image is updated, its URL changes to
            ExpiresActive on
            ExpiresDefault "now plus 10 years"
        </LocationMatch>

        <LocationMatch
"^/extension/[^/]+/design/[^/]+/(stylesheets|images|javascripts?|flash)/.*
">
            # A good optimization if you don't change your design often
            ExpiresActive on
            ExpiresDefault "now plus 5 days"
        </LocationMatch>

        <LocationMatch "^/extension/[^/]+/design/[^/]+/lib/.*">
            # Libraries get a new url (version number) on updates
            ExpiresActive on
            ExpiresDefault "now plus 90 days"
        </LocationMatch>

        <LocationMatch
"^/design/[^/]+/(stylesheets|images|javascripts?|lib|flash)/.*">
            # Same as above for bundled eZ Publish designs
            ExpiresActive on
            ExpiresDefault "now plus 7 days"
        </LocationMatch>

        <LocationMatch "^/share/icons/.*">
            # Icons as used by admin interface, barly change
            ExpiresActive on
            ExpiresDefault "now plus 7 days"
        </LocationMatch>

        # When ezjscore.ini/[Packer]/AppendLastModifiedTime=enabled
        # so that file names change when source files are modified
        #<LocationMatch "^/var/[^/]+/cache/public/.*">
            # Force ezjscore packer js/css files to be cached 30 days
            # at client side
            #ExpiresActive on
            #ExpiresDefault "now plus 30 days"
        #</LocationMatch>
        </IfModule>
```