

Apache Configuration File

(!) Using `.htaccess` files slows down Apache, therefore, if you have access to the main server config file (usually called `httpd.conf`), you should add this logic there: <http://httpd.apache.org/docs/current/howto/htaccess.html>.

```
# #####  
# # CROSS-ORIGIN RESOURCE SHARING (CORS) #  
# #####
```

```
# -----  
# | Cross-domain AJAX requests |  
# -----
```

Enable cross-origin AJAX requests.
<http://code.google.com/p/html5security/wiki/CrossOriginRequestSecurity>
<http://enable-cors.org/>

```
# <IfModule mod_headers.c>  
#   Header set Access-Control-Allow-Origin "*"   
# </IfModule>
```

```
# -----  
# | CORS-enabled images |  
# -----
```

Send the CORS header for images when browsers request it.
https://developer.mozilla.org/en/CORS_Enabled_Image
<http://blog.chromium.org/2011/07/using-cross-domain-images-in-webgl-and.html>
<http://hacks.mozilla.org/2011/11/using-cors-to-load-webgl-textures-from-cross-domain-images/>

```
<IfModule mod_setenvif.c>  
  <IfModule mod_headers.c>  
    <FilesMatch "\.(gif|ico|jpe?g|png|svg|svgz|webp)$">  
      SetEnvIf Origin ":" IS_CORS  
      Header set Access-Control-Allow-Origin "*" env=IS_CORS  
    </FilesMatch>  
  </IfModule>  
</IfModule>
```

```

# -----
# | Web fonts access |
# -----

# Allow access from all domains for web fonts

<IfModule mod_headers.c>
    <FilesMatch "\.(eot|font\.css|otf|ttf|ttfl|woff)$">
        Header set Access-Control-Allow-Origin "*"
    </FilesMatch>
</IfModule>

# #####
# # ERRORS #
# #####

# -----
# | 404 error prevention for non-existing redirected folders |
# -----

# Prevent Apache from returning a 404 error for a rewrite if a directory
# with the same name does not exist.
# http://httpd.apache.org/docs/current/content-negotiation.html#multiviews
# http://www.webmasterworld.com/apache/3808792.htm

Options -MultiViews

# -----
# | Custom error messages / pages |
# -----

# You can customize what Apache returns to the client in case of an error (see
# http://httpd.apache.org/docs/current/mod/core.html#errordocument), e.g.:
```

ErrorDocument 404 /404.html

```

# #####
# # INTERNET EXPLORER #
# #####

# -----
# | Internet Explorer 6 compatibility mode |
# -----

```

```

# | Better website experience |
# -----

# Force IE to render pages in the highest available mode in the various
# cases when it may not: http://hsivonen.iki.fi/doctype/ie-mode.pdf.

<IfModule mod_headers.c>
  Header set X-UA-Compatible "IE=edge"
  # `mod_headers` can't match based on the content-type, however, we only
  # want to send this header for HTML pages and not for the other resources
  <FilesMatch "\.(appcache|crx|css|eot|gif|html|ico|jpe?
gl|jsl|m4a|m4v|manifest|mp4|oex|ogal|oggl|ogv|otf|pdf|png|safariextz|svg|svgz|tfl|vcl|webapp|wet
  Header unset X-UA-Compatible
</FilesMatch>
</IfModule>

# -----

# | Cookie setting from iframes |
# -----

# Allow cookies to be set from iframes in IE.

# <IfModule mod_headers.c>
#   Header set P3P "policyref=\"/w3c/p3p.xml\", CP=\"IDC DSP COR ADM DEVI TAIi PSA PSD IVAi
CNTV\""
# </IfModule>

# -----

# | Screen flicker |
# -----

# Stop screen flicker in IE on CSS rollovers (this only works in
# combination with the `ExpiresByType` directives for images from below).

# BrowserMatch "MSIE" brokenvary=1
# BrowserMatch "Mozilla/4.[0-9]{2}" brokenvary=1
# BrowserMatch "Opera" !brokenvary
# SetEnvIf brokenvary 1 force-no-vary

# #####
# # MIME TYPES AND ENCODING #

```

```

# #####

# -----
# | Proper MIME types for all files |
# -----

<IfModule mod_mime.c>

# Audio
AddType audio/mp4          m4a f4a f4b
AddType audio/ogg          oga ogg

# JavaScript
# Normalize to standard type (it's sniffed in IE anyways):
# http://tools.ietf.org/html/rfc4329#section-7.2
AddType application/javascript    js jsonp
AddType application/json          json

# Video
AddType video/mp4          mp4 m4v f4v f4p
AddType video/ogg          ogv
AddType video/webm         webm
AddType video/x-flv        flv

# Web fonts
AddType application/font-woff   woff
AddType application/vnd.ms-fontobject  eot

# Browsers usually ignore the font MIME types and sniff the content,
# however, Chrome shows a warning if other MIME types are used for the
# following fonts.
AddType application/x-font-ttf   ttc ttf
AddType font/opentype            otf

# Make SVGZ fonts work on iPad:
# https://twitter.com/FontSquirrel/status/14855840545
AddType image/svg+xml          svg svgz
AddEncoding gzip                svgz

# Other
AddType application/octet-stream safariextz

```

```
AddType application/x-chrome-extension crx
AddType application/x-opera-extension oex
AddType application/x-shockwave-flash swf
AddType application/x-web-app-manifest+json webapp
AddType application/x-xpinstall xpi
AddType application/xml atom rdf rss xml
AddType image/webp webp
AddType image/x-icon ico
AddType text/cache-manifest appcache manifest
AddType text/vtt vtt
AddType text/x-component htc
AddType text/x-vcard vcf
```

```
</IfModule>
```

```
# -----
# | UTF-8 encoding |
# -----
```

```
# Use UTF-8 encoding for anything served as `text/html` or `text/plain`.
```

```
AddDefaultCharset utf-8
```

```
# Force UTF-8 for certain file formats.
```

```
<IfModule mod_mime.c>
```

```
    AddCharset utf-8 .atom .css .js .json .rss .vtt .webapp .xml
```

```
</IfModule>
```

```
# #####
# # URL REWRITES #
# #####
```

```
# -----
# | Rewrite engine |
# -----
```

```
# Turning on the rewrite engine and enabling the `FollowSymLinks` option is
# necessary for the following directives to work.
```

```
# If your web host doesn't allow the `FollowSymLinks` option, you may need to
# comment it out and use `Options +SymLinksIfOwnerMatch` but, be aware of the
# performance impact: http://httpd.apache.org/docs/current/misc/perf-tuning.html#symlinks
```

```

# Also, some cloud hosting services require `RewriteBase` to be set:
# http://www.rackspace.com/knowledge_center/frequently-asked-question/why-is-mod-rewrite-not-working

<IfModule mod_rewrite.c>
    Options +FollowSymlinks
    # Options +SymLinksIfOwnerMatch
    RewriteEngine On
    # RewriteBase /
</IfModule>

# -----
# | Suppressing / Forcing the "www." at the beginning of URLs |
# -----

# The same content should never be available under two different URLs especially
# not with and without "www." at the beginning. This can cause SEO problems
# (duplicate content), therefore, you should choose one of the alternatives and
# redirect the other one.

# By default option 1 (no "www.") is activated:
# http://no-www.org/faq.php?q=class_b

# If you'd prefer to use option 2, just comment out all the lines from option 1
# and uncomment the ones from option 2.

# IMPORTANT: NEVER USE BOTH RULES AT THE SAME TIME!

# -----

# Option 1: rewrite www.example.com → example.com

<IfModule mod_rewrite.c>
    RewriteCond %{HTTPS} !=on
    RewriteCond %{HTTP_HOST} ^www\.(.+$) [NC]
    RewriteRule ^ http://%1%{REQUEST_URI} [R=301,L]
</IfModule>

# -----

# Option 2: rewrite example.com → www.example.com

```

```

# Be aware that the following might not be a good idea if you use "real"
# subdomains for certain parts of your website.

# <IfModule mod_rewrite.c>
#   RewriteCond %{HTTPS} !=on
#   RewriteCond %{HTTP_HOST} !^www\..+ [NC]
#   RewriteRule ^ http://www.%{HTTP_HOST}%{REQUEST_URI} [R=301,L]
# </IfModule>

# -----
# | Supporting HTML 5 routing (i.e. getting rid of hashbang urls for SPAs)
# -----

# HTML 5 allows SPAs to route requests more elegantly, which means we can do
# away with the hashbang kludge, but...then direct access to client-side routed
# assets result in 404 errors on the server. This has to be corrected for by
# redirecting requests to the index.html page as a fallback.
#
# I sourced this config from:
# https://ngmilk.rocks/2015/03/09/angularjs-html5-mode-or-pretty-urls-on-apache-using-htacc

<IfModule mod_rewrite.c>
    # If an existing asset or directory is requested go to it as it is
    RewriteCond %{DOCUMENT_ROOT}%{REQUEST_URI} -f [OR]
    RewriteCond %{DOCUMENT_ROOT}%{REQUEST_URI} -d
    RewriteRule ^ - [L]

    # If the requested resource doesn't exist, use index.html
    RewriteRule ^ /index.html
</IfModule>

# #####
# # SECURITY #
# #####

# -----
# | Content Security Policy (CSP) |
# -----

# You can mitigate the risk of cross-site scripting and other content-injection

```

```

# attacks by setting a Content Security Policy which whitelists trusted sources
# of content for your site.

# The example header below allows ONLY scripts that are loaded from the current
# site's origin (no inline scripts, no CDN, etc). This almost certainly won't
# work as-is for your site!

# To get all the details you'll need to craft a reasonable policy for your site,
# read: http://html5rocks.com/en/tutorials/security/content-security-policy (or
# see the specification: http://w3.org/TR/CSP).

<IfModule mod_headers.c>
#   Header set Content-Security-Policy "script-src 'self'; object-src 'self'"
#   <FilesMatch "\.(appcache|crx|css|eot|gif|htc|ico|jpe?
gl|jst|m4a|m4v|manifest|mp4|oex|ogal|oggl|ogv|otf|pdf|png|safariextz|svg|svgz|ttf|vcf|webapp|we
#       Header unset Content-Security-Policy
#   </FilesMatch>
# </IfModule>

# -----
# | File access |
# -----

# Block access to directories without a default document.
# Usually you should leave this uncommented because you shouldn't allow anyone
# to surf through every directory on your server (which may includes rather
# private places like the CMS's directories).

<IfModule mod_autoindex.c>
    Options -Indexes
</IfModule>

# -----

# Block access to hidden files and directories.
# This includes directories used by version control systems such as Git and SVN.

<IfModule mod_rewrite.c>
    RewriteCond %{SCRIPT_FILENAME} -d [OR]
    RewriteCond %{SCRIPT_FILENAME} -f
    RewriteRule "(^/)\." - [F]

```



```
</IfModule>
```

```
# -----
```

```
# Block access to backup and source files.  
# These files may be left by some text editors and can pose a great security  
# danger when anyone has access to them.
```

```
<FilesMatch "(^#.#|\. (bak|config|dist|fla|incl|ini|log|psd|sh|sql|sw[op])| (^)$)">
```

```
    Order allow,deny
```

```
    Deny from all
```

```
    Satisfy All
```

```
</FilesMatch>
```

```
# -----
```

```
# | Secure Sockets Layer (SSL) |
```

```
# -----
```

```
# Rewrite secure requests properly to prevent SSL certificate warnings, e.g. :  
# prevent `https://www.example.com` when your certificate only allows  
# `https://secure.example.com`.
```

```
# <IfModule mod_rewrite.c>
```

```
#     RewriteCond %{SERVER_PORT} !^443
```

```
#     RewriteRule ^ https://example-domain-please-change-me.com%{REQUEST_URI} [R=301,L]
```

```
# </IfModule>
```

```
# -----
```

```
# Force client-side SSL redirection.
```

```
# If a user types "example.com" in his browser, the above rule will redirect him  
# to the secure version of the site. That still leaves a window of opportunity  
# (the initial HTTP connection) for an attacker to downgrade or redirect the  
# request. The following header ensures that browser will ONLY connect to your  
# server via HTTPS, regardless of what the users type in the address bar.  
# http://www.html5rocks.com/en/tutorials/security/transport-layer-security/
```

```
# <IfModule mod_headers.c>
```

```
#     Header set Strict-Transport-Security max-age=16070400;
```

```
# </IfModule>
```



```
application/rss+xml \
application/vnd.ms-fontobject \
application/x-font-ttf \
application/x-web-app-manifest+json \
application/xhtml+xml \
application/xml \
font/opentype \
image/svg+xml \
image/x-icon \
text/css \
text/html \
text/plain \
text/x-component \
text/xml
```

```
</IfModule>
```

```
</IfModule>
```

```
# -----
# | Content transformations |
# -----
```

```
# Prevent some of the mobile network providers from modifying the content of
# your site: http://www.w3.org/Protocols/rfc2616/rfc2616-sec14.html#sec14.9.5.
```

```
# <IfModule mod_headers.c>
#   Header set Cache-Control "no-transform"
# </IfModule>
```

```
# -----
# | ETag removal |
# -----
```

```
# Since we're sending far-future expires headers (see below), ETags can
# be removed: http://developer.yahoo.com/performance/rules.html#etags.
```

```
# `FileETag None` is not enough for every server.
```

```
<IfModule mod_headers.c>
    Header unset ETag
</IfModule>
```

FileETag None

```
# -----  
# | Expires headers (for better cache control) |  
# -----  
  
# The following expires headers are set pretty far in the future. If you don't  
# control versioning with filename-based cache busting, consider lowering the  
# cache time for resources like CSS and JS to something like 1 week.  
  
<IfModule mod_expires.c>  
  
    ExpiresActive on  
    ExpiresDefault      "access plus 1 month"  
  
    # CSS  
    ExpiresByType text/css      "access plus 1 year"  
  
    # Data interchange  
    ExpiresByType application/json    "access plus 0 seconds"  
    ExpiresByType application/xml     "access plus 0 seconds"  
    ExpiresByType text/xml           "access plus 0 seconds"  
  
    # Favicon (cannot be renamed!)  
    ExpiresByType image/x-icon       "access plus 1 week"  
  
    # HTML components (HTCs)  
    ExpiresByType text/x-component   "access plus 1 month"  
  
    # HTML  
    ExpiresByType text/html          "access plus 0 seconds"  
  
    # JavaScript  
    ExpiresByType application/javascript    "access plus 1 year"  
  
    # Manifest files  
    ExpiresByType application/x-web-app-manifest+json    "access plus 0 seconds"  
    ExpiresByType text/cache-manifest    "access plus 0 seconds"  
  
    # Media  
    ExpiresByType audio/ogg           "access plus 1 month"  
    ..  
    ..
```

```
ExpiresByType image/gif "access plus 1 month"
ExpiresByType image/jpeg "access plus 1 month"
ExpiresByType image/png "access plus 1 month"
ExpiresByType video/mp4 "access plus 1 month"
ExpiresByType video/ogg "access plus 1 month"
ExpiresByType video/webm "access plus 1 month"
```

Web feeds

```
ExpiresByType application/atom+xml "access plus 1 hour"
ExpiresByType application/rss+xml "access plus 1 hour"
```

Web fonts

```
ExpiresByType application/font-woff "access plus 1 month"
ExpiresByType application/vnd.ms-fontobject "access plus 1 month"
ExpiresByType application/x-font-ttf "access plus 1 month"
ExpiresByType font/opentype "access plus 1 month"
ExpiresByType image/svg+xml "access plus 1 month"
```

</IfModule>

```
# -----
# | Filename-based cache busting |
# -----
```

*# If you're not using a build process to manage your filename version revving,
you might want to consider enabling the following directives to route all
requests such as `/css/style.12345.css` to `/css/style.css`.*

To understand why this is important and a better idea than `.css?v231`, read:
<http://stevesouders.com/blog/2008/08/23/revving-filenames-dont-use-querystring>*

```
# <IfModule mod_rewrite.c>
#   RewriteCond %{REQUEST_FILENAME} !-f
#   RewriteCond %{REQUEST_FILENAME} !-d
#   RewriteRule ^(.+)?\.(?d+)\.(j?sl?css?png?jpg?gif)?$ $1.$3 [L]
# </IfModule>
```

```
# -----
# | File concatenation |
# -----
```

```
# Allow concatenation from within specific CSS and JS files, e.g.:
# Inside of `script.combined.js` you could have
# <!--#include file="libs/jquery.js" -->
# <!--#include file="plugins/jquery.idletimer.js" -->
# and they would be included into this single file.

# <IfModule mod_include.c>
#   <FilesMatch "\.combined\.js$">
#     Options +Includes
#     AddOutputFilterByType INCLUDES application/javascript application/json
#     SetOutputFilter INCLUDES
#   </FilesMatch>
#   <FilesMatch "\.combined\.css$">
#     Options +Includes
#     AddOutputFilterByType INCLUDES text/css
#     SetOutputFilter INCLUDES
#   </FilesMatch>
# </IfModule>

# -----
# | Persistent connections |
# -----

# Allow multiple requests to be sent over the same TCP connection:
# http://httpd.apache.org/docs/current/en/mod/core.html#keepalive.

# Enable if you serve a lot of static content but, be aware of the
# possible disadvantages!

# <IfModule mod_headers.c>
#   Header set Connection Keep-Alive
# </IfModule>
```