PAGESPEED INSIGHTS - BEST PRACTICES

Implementation
in
Outsource2india

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Outsource2india
Outsourcing solutions
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Managing your entire outsourcing venture

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Minify – HTML, CSS, and JavaScript

Remove unnecessary or redundant data without affecting how the resource is processed by the browser - e.g. **code comments and formatting**, **removing unused code**, **using shorter variable and function names**


```
<html>
<title>HTML</title>
<body>
This is HTML!
</body>
</html>
```



```
String.prototype.trim =
  function ()
  {
    return this
      .replace (/^\s+/, "")
      .replace (/\s+$/, "");
  }
```
.js

CSS Optimization

- **Minify the CSS:** Remove the last semicolon, make the line breaks compact, reduce the unnecessary code. Compacting CSS code can save many bytes of data and speed up download and parse times.

- **Call CSS files from CDN:** Call the external CSS files from CDN :

```
<link rel="stylesheet" type="text/css" href="<?php echo $cdn_path;?>/css/inner-style.css" />
```

- **Call the CSS files in the page:** Reference the external Style Sheet for appropriate pages only where it is required. This will reduce file size and http request.

- **Avoid Inline CSS styles:** Don't inline the styles in page, as it will slow down the page render time and also lead to code duplication.

JavaScript Optimization

- **Minify the JavaScript Libraries:** Compacting JS code can save many bytes of data and speed up download and parse times.

- **Call JavaScript files from CDN:** Call the external .JS from CDN path:

```
<script src="<?php echo $cdn_path;?>/js/jquery.colorbox-min.js"></script>
```

- **Call the JS files in the page**: Calling the external JavaScript file for appropriate pages, only when required

- Compact the inline JS code
- Reduce calling the JS libraries file from other websites
- Remove duplicate scripts
- Put Scripts at the bottom of the page to avoid the block parallel downloads

Eliminate Render-blocking CSS

□ Use Asynchronous JavaScript to call the external CSS file in the page

```
<script>
  var cb = function() {
    var l = document.createElement('link'); l.rel = 'stylesheet';
    l.href = '<?php echo $cdn_path;?>/css/inner-style.css';
    var h = document.getElementsByTagName('head')[0]; h.parentNode.insertBefore(l,
h);
  };
  var raf = requestAnimationFrame || mozRequestAnimationFrame ||
    webkitRequestAnimationFrame || msRequestAnimationFrame;
  if (raf) raf(cb);
  else window.addEventListener('load', cb);
</script>
```

Improve the HTTP Request

Call the external JavaScript file for appropriate pages only where it is required

Call the external Style Sheet for appropriate pages only where it is required

Create Sprite images and call from CSS file

Enable Compression

Add the **GZIP** compression code in .htaccess file which automatically compresses the HTML, JavaScript/JQuery, CSS and other Media files.

Benefits of GZIP Compression

- Reduce the file size up to 70 percentage
- Website speed is increased
- Saves your bandwidth

Leverage Browser Caching

Set an expiry date or a maximum age in the HTTP headers for JavaScript, CSS, and Media files in .htaccess file

Image Optimization

- Call the images from CDN

- Use images through CSS Class

- Experiment the optimal quality settings in Photoshop to reduce the file size of .png, .jpg or .gif

- Use image sprites to reduce the http requests

Important: Don't use bigger image, and scale the image in HTML/CSS rather than resizing it in Photoshop and using it.

```
▶ <p>…</p>
▼ <div>
    <img src="awesome-photo.jpg" width="245">
  </div>
</body>
</html>
```

WHO'S AWESOME?
You're Awesome!

245 × 212 pixels (Natural: 300 × 260 pixels)

Follow these steps to ensure that your website loads faster, much to the delight of your customers!

If you are looking for a specialized partner who can improve your website, we would love to assist you. <u>Get in touch with us</u> today!

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