

week::six

SVG Artwork & Icon Fonts

SVG Images

Description

- An open-source 2-dimensional vector-graphic file format
- It took 15 years (SVG was first proposed in 1999), but it is now the best-supported vector image format for the web.
- File format is text-based, using XML as its structure



Features

- **Infinitely Scalable**
 - SVGs will look good regardless of presented size or screen resolution since they are always rendered on the viewing device.
- **Support for Transparency, Opacity, Interactivity, and Animations**
 - Supports subset of features common to print vector graphics.
- **Small File Size**
 - Similar to vectors for print work, SVG files of simple artwork are significantly smaller than if they were rendered as a raster graphic.
- **Editability**
 - All modern vector editing software supports SVG, including Adobe Illustrator.
 - Since SVGs use a plain-text format, they can be edited using text editors or using Web programming languages like JavaScript, Python, or PHP, as well as be indexed by search engine.

Optimizing Tips

- Illustrator offers three ways (at least) to save/export SVG image.
- In general, us **File > Save As...** works fine for most images.
 - Use the default setting for SVG > SVG 1.1
 - Don't use the Compressed option (though there may be some instances where this is preferred)
- You can also use File > Export > Export for Screens... or File > Export > Export As...
- For complex vector artwork it's best to rasterize those images and save to PNG instead.

Sizing Tips

- Sizing of SVG images is notoriously confusing.
- Since they are XML-based (which is the basis for HTML) and they have their own “canvas”, they have elements that become part of the Document-Object Model (DOM) and are addressable using CSS.
- It is best to apply **CSS sizing properties** to an **SVG's parent element** — not the `` tag.

Good for:





- Simple vector artwork
- Logos, logos, logos!
- Icons, icons, icons!
- Any artwork that would benefit from being infinitely scalable

Bad for:

- Complex vector artwork — images with shading/blur/textures/raster effects
- Vector artwork that contains raster images
- Complex artwork can take a very long time to render on a user's computer

Examples

- Note how the SVG image is not only perfect in appearance but is actually smaller in file size as well.

 <p>Illustrator Native AI File 356 KB</p>	 <p>Standard-Res PNG-24 32 colors 72px wide 8 KB</p>	 <p>High-Res PNG-24 32 quality 600px wide 33 KB</p>	 <p>SVG Full-quality vector 8 KB</p>
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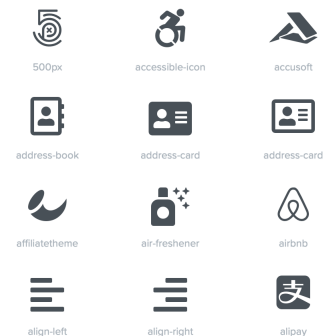
Icon Fonts

Description

- Icon fonts are a popular way of creating, distributing, and implementing complete icon set for use on web pages.
- They take advantage of the fact that fonts are just collections of vector images, albeit commonly focused on storing words and numbers.
- With web browsers now supporting embedded fonts, icon fonts are compatible with all modern browsers.

Features

- **Rich Selection of Common Iconography**
 - Odds are that you need an icon that has already been created thousands of times.
 - Ready-made icon fonts provide quick access to the web's most common icons.
- **Compatibility**
 - Since they are just fonts, all modern web browsers support them.
- **Convenience**

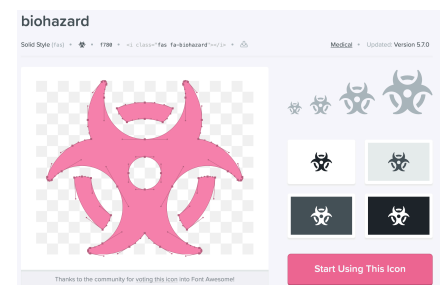


Font Awesome

- One of the most popular icon font services is Font Awesome, which provides hundreds of free icons, plus more if you subscribe to the Pro version.
- Icons can be used as a font, or downloaded and modified to suit your needs.
- *Note: Font Awesome these days is not super awesome due to subscriptions demands, random limitations and convoluted embedding process. Use with caution.*
- Font Awesome icon HTML syntax:

```
<i class="fas fa-biohazard"></i>
```

- <https://fontawesome.com>



Good for:

- Quickly adding common iconography to your website
- Use as a quick reference guide to common solutions to iconography problems in user interface design.

Bad for:

- Differentiating your site from others on the Internet