

Image Performance Matters



Think about the way people browse the web.

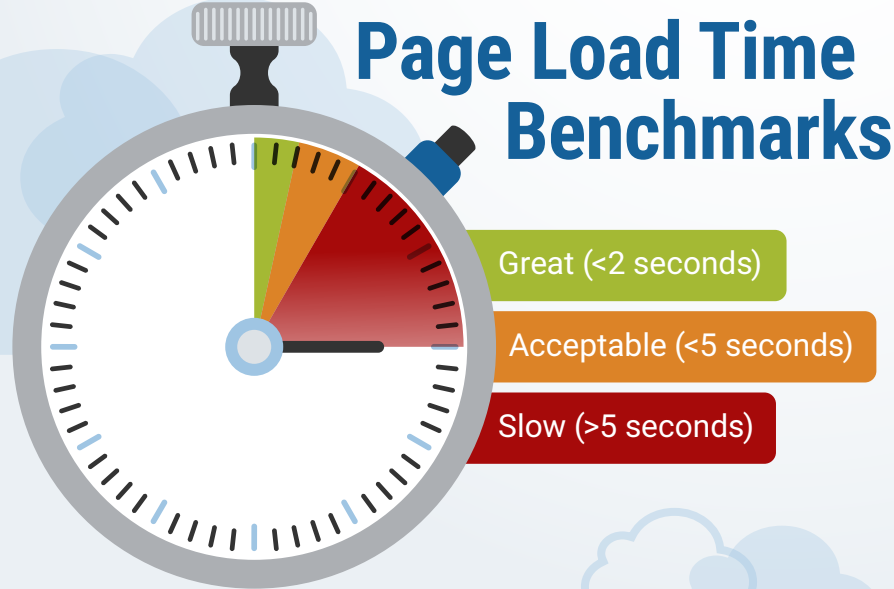
- 1 Click on a link
- 2 Wait for it to load
- 3 If the page takes too long to load
- 4 Try another website

And doing that on a mobile phone – smaller screen – comes with high expectations for a site to load quickly.

According to companies like

Google & YAHOO!

Page load time is an important performance indicator for a web page.



Load Time affects **the Bottom Line**

Bing
A page that is 2 seconds slower can result in a **4.3%** drop in revenue per user.

Google
A 400 millisecond delay can cause a **0.59%** drop in searches per user.

YAHOO!
A 400 millisecond slowdown can result in a **5-9%** drop in full-page traffic.

Images account for **63%** of downloaded bytes on a web page.

Optimizing images can often yield crucial byte savings and performance improvements.

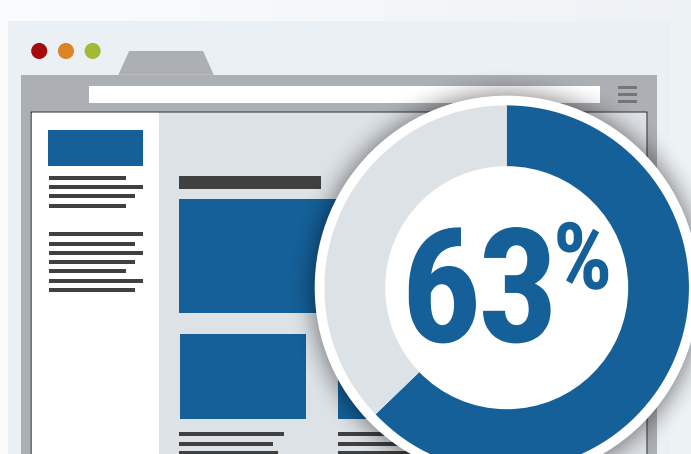
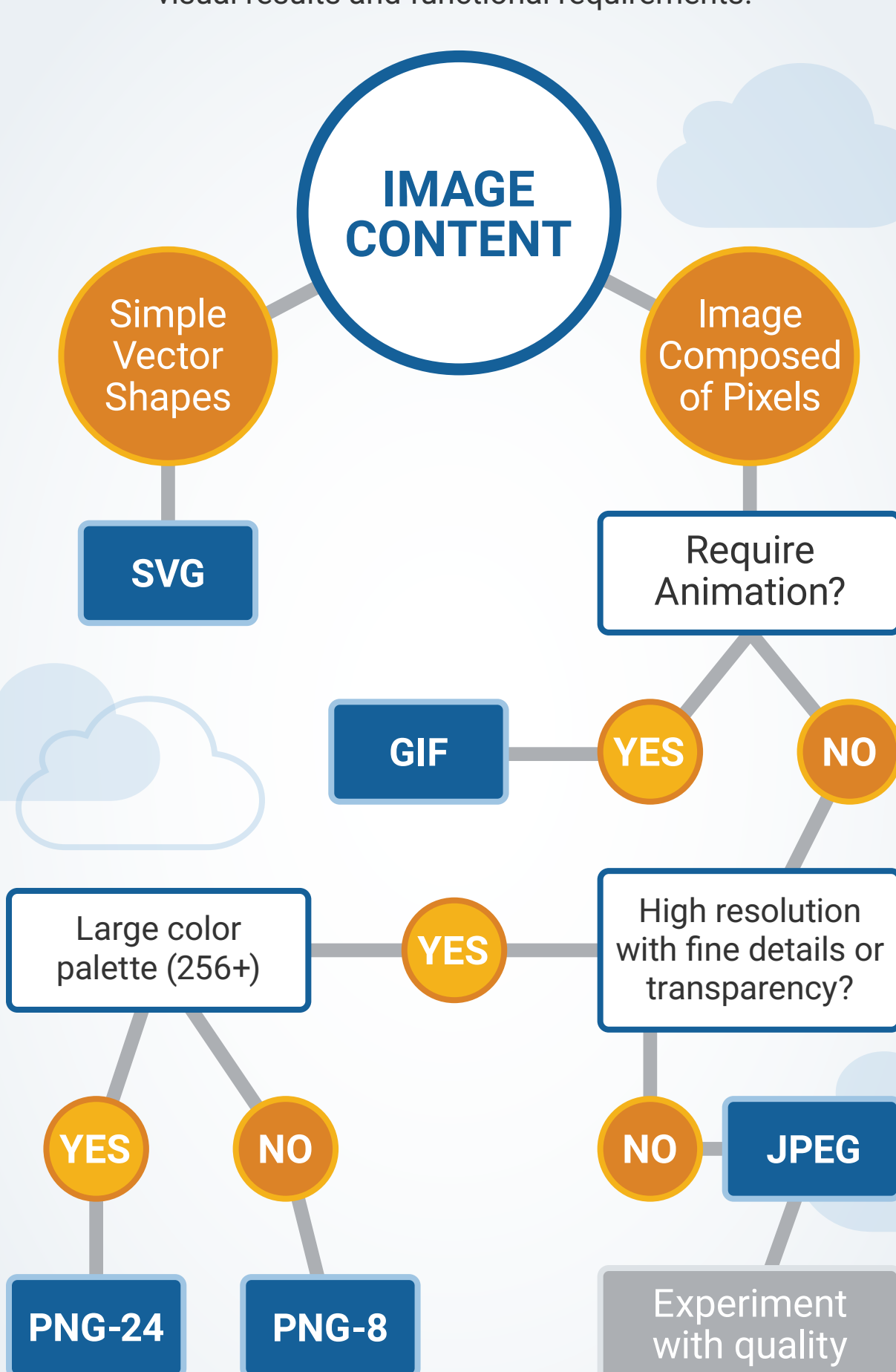


Image Optimization is both an art and science:

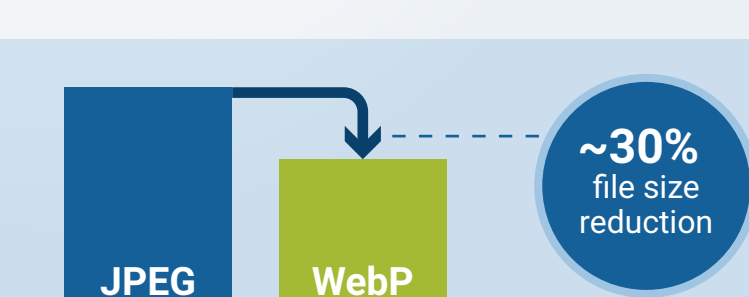
- Pick the right image format
- Experiment with optimal quality settings
- Serve scaled images
- Automate!

Image Format Conundrum:

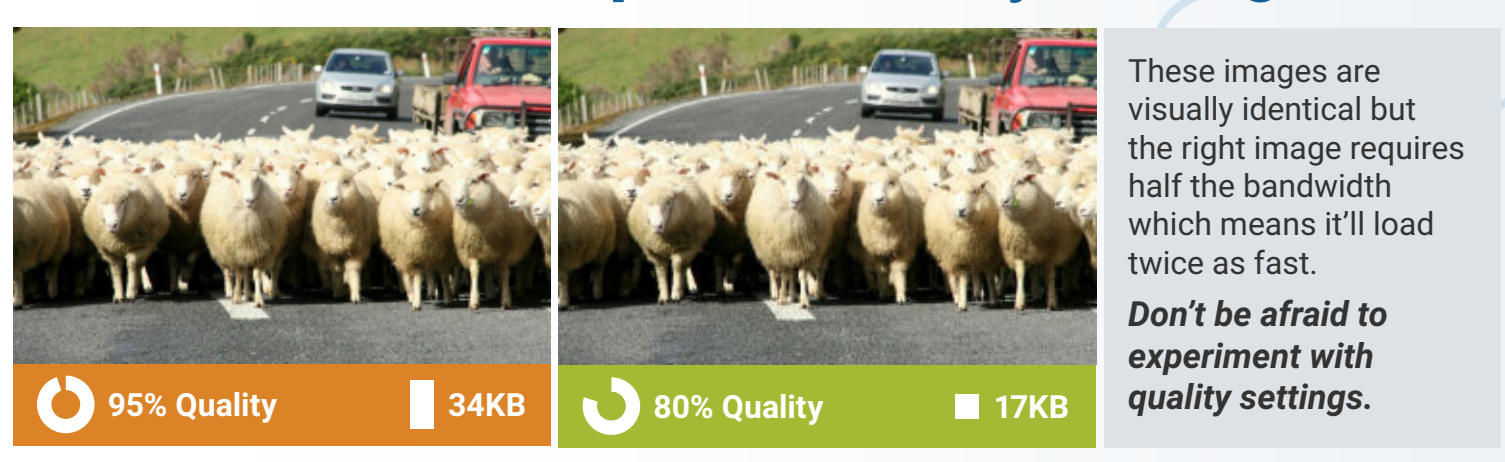
The “right format” for an image depends on the desired visual results and functional requirements.



For adopting modern formats, consider adding an additional logic for WebP and JPEG XR.

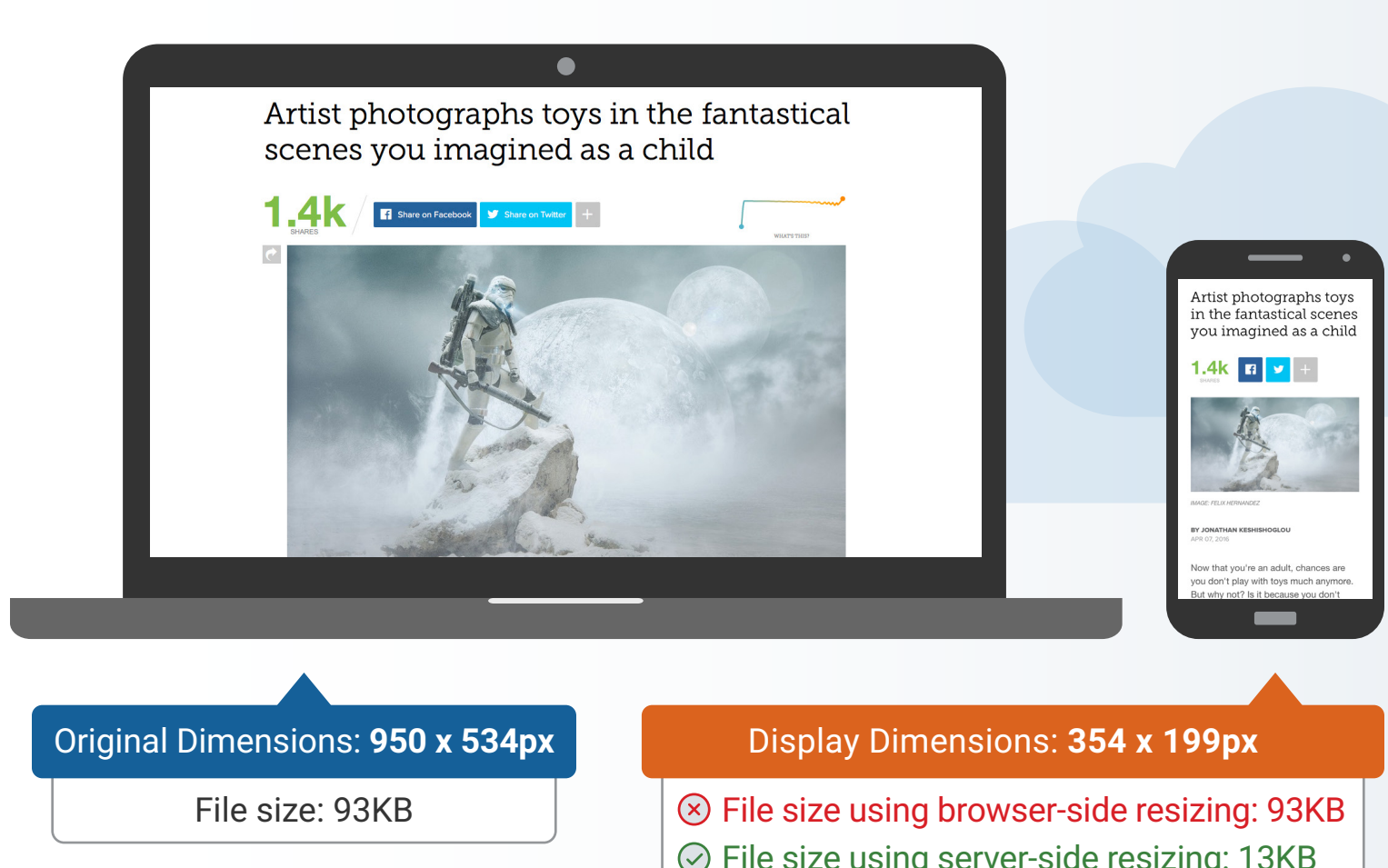


Select the Optimal Quality Setting



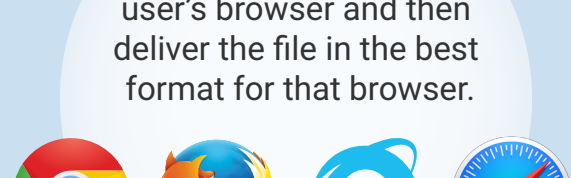
The Overhead of Delivering Unnecessary Pixels

The following example of browser-side resizing on Mashable leads to significant bandwidth wastage.



Automate Image Optimization

Automatically detect a user's browser and then deliver the file in the best format for that browser.



Automatically create art-directed Responsive Images.

Deliver the correct resolution image based on the Device Pixel Ratio (DPR).



Control the compression level of images with the quality parameter.

Use lossy compression when delivering animated GIF files.