

Performance improvements for images

JIRA ticket

CFORD-248 - Performance improvements for images CLOSED

AMP Reference: CFDRMD-96 Performance improvements for images *Ready for Review*

Business Needs

Business Need		AC	Comments
BN-1	As capacity4dev , we would like to improve the performance of the site by optimising the images on the platform so that the site loads faster .	<ul style="list-style-type: none">Images on the platform should be loading faster	Can we use a module optimize images on upload? Can Image Optimize be helpful? What is the impact of reducing the image quality for JPEG to 50% in Drupal? Will this help in having smaller files and keep a good enough resolution?
BN-1.1	As capacity4dev , we would like to have the Lazyloader module installed on capacity4dev so that we can decrease the load time .	<ul style="list-style-type: none">All images should be compressed losslesslyImages should be saved for websites when being uploaded by users. The image saved for web will be used throughout the platformLazy loading should be implemented on images so that they are rendered faster.	
BN-2	As capacity4dev, we would like to compress document files when they are uploaded so that requests are processed faster.	<ul style="list-style-type: none">A lightweight version of document files with lossless compression can be uploaded on the site for all files heavier than 3MB	GZIP already does this for all document formats.

4 Comments

1. Kevin Van Ransbeeck

Remarks:

- Drupal already optimises imagesize based on resolution: it loads image styles for defined sizes so it does not have to load 5 MB images for only a small avatar
- ImageOptim can be useful, but this is adding a binary to the platform infrastructure, and we know how strict/hard this can be
- General remark for optimising for file size: the performance impact will be rather small because we already use image styles. Going to 50% can help, but should be tested carefully for image quality! JPG becomes pixelated very fast.
- The biggest performance hit is requesting the images (tens of images per page - all with permission checks), not actually serving them.

[Nov 30, 2017](#)

1. Daniel Ilunga

Thanks a lot Kevin for the remarks. It would be nice to know if we can get some more performance improvement from optimising the Image quality settings in Drupal.

[Nov 30, 2017](#)

1. Kevin Van Ransbeeck

You sure can, but you need to make the trade-off between file size and quality. And that's a business decision in my opinion.

Below are a few banners (top is 50% quality, middle is 75% - which is the current production value, bottom is 100%). If you look closely, you'll see some artefacts.







Filesize comparison:

File	50%	75%	100%
action aid	34KB	50KB	217KB
middle banner	42KB	62KB	282KB
waste	22KB	33KB	203KB

As you can see, dropping from 100 to 75% is already a huge size impact. Going further to 50% does not gain that much more space compared to the artefacts that start appearing. I'd advise to keep the 75% setting, but please confirm.
[Nov 30, 2017](#)

1. **Daniel Ilunga**

Thanks a lot Kevin Van Ransbeeck for the findings. I think we can keep it at 75%.
[Nov 30, 2017](#)