

Supplementary material: Joint demosaicing and denoising by overfitting to bursts of raw images

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1. Additional results on the HDR+ [2] dataset

We present additional result on the HDR+ dataset in Figures 1, 2, 3. In these figures we show the result from the HDR+ pipeline [2], a bilinear interpolation, the result of Gharbi *et al.* [1], and the result of Gharbi *et al.* [1] with our fine-tuning.

References

- [1] M. Gharbi, G. Chaurasia, S. Paris, and F. Durand. Deep joint demosaicking and denoising. *ACM Transactions on Graphics (TOG)*, 35(6):191, 2016. 1, 2, 3, 4
- [2] S. W. Hasinoff, D. Sharlet, R. Geiss, A. Adams, J. T. Barron, F. Kainz, J. Chen, and M. Levoy. Burst photography for high dynamic range and low-light imaging on mobile cameras. *ACM Transactions on Graphics*, 35(6):1–12, nov 2016. 1, 2, 3, 4

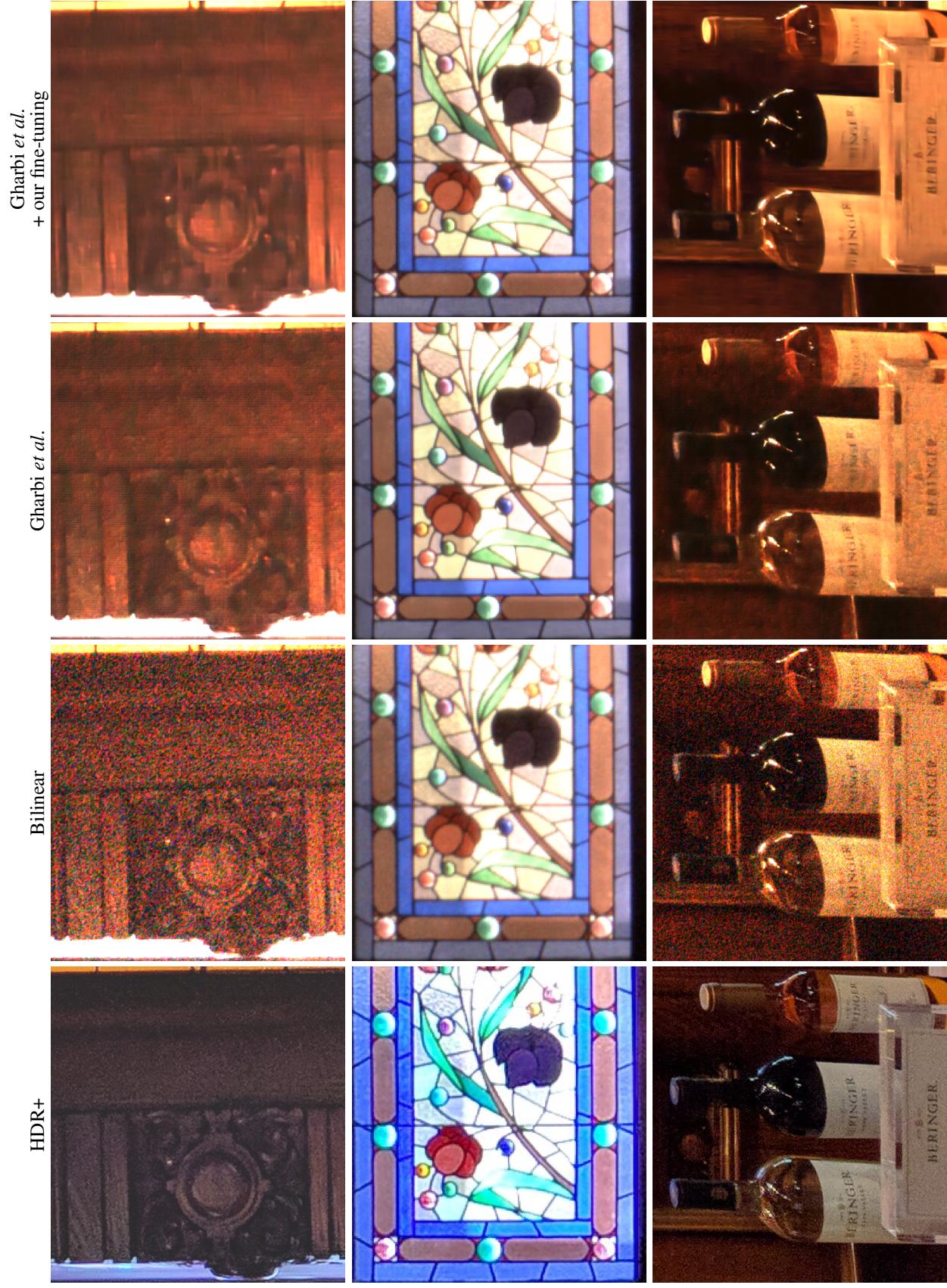


Figure 1: Experiment on a real burst. Left to right: The result of the HDR+ pipeline [2], bilinear interpolation, Gharbi *et al.* [1], and Gharbi *et al.* [1] with our fine-tuning. Contrast in dark regions was enhanced for all methods. Note that the HDR+ pipeline includes color balance as well as sharpening. It also uses all the images of the burst to produce the result (all other methods use only the reference frame). Figure best visualized zoomed in on a computer.

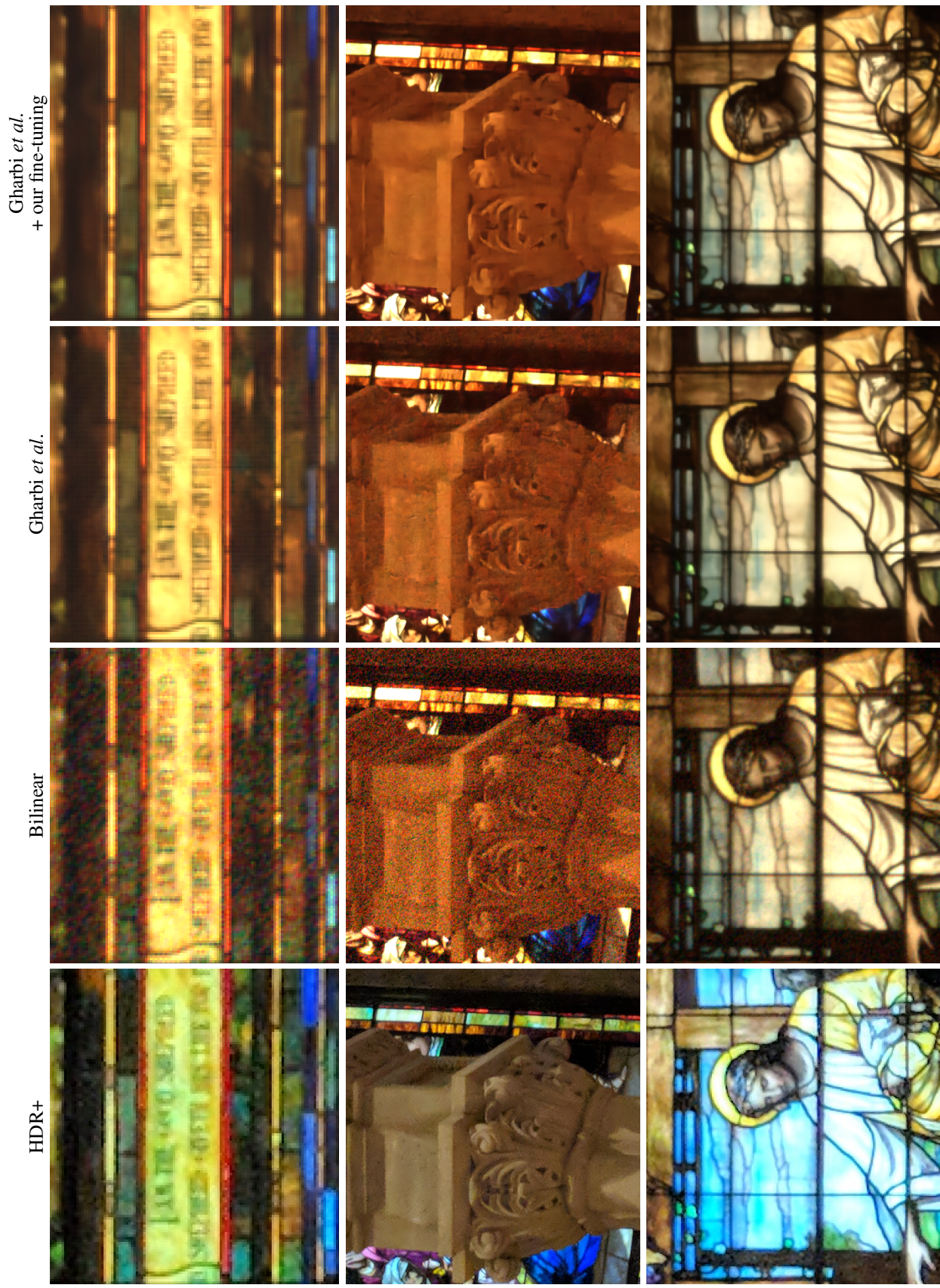


Figure 2: Experiment on a real burst. Left to right: The result of the HDR+ pipeline [2], bilinear interpolation, Gharbi *et al.* [1], and Gharbi *et al.* [1] with our fine-tuning. Contrast was enhanced for all methods except HDR+. Note that the HDR+ pipeline includes color balance as well as sharpening. It also uses all the images of the burst to produce the result (all other methods use only the reference frame). Figure best visualized zoomed in on a computer.

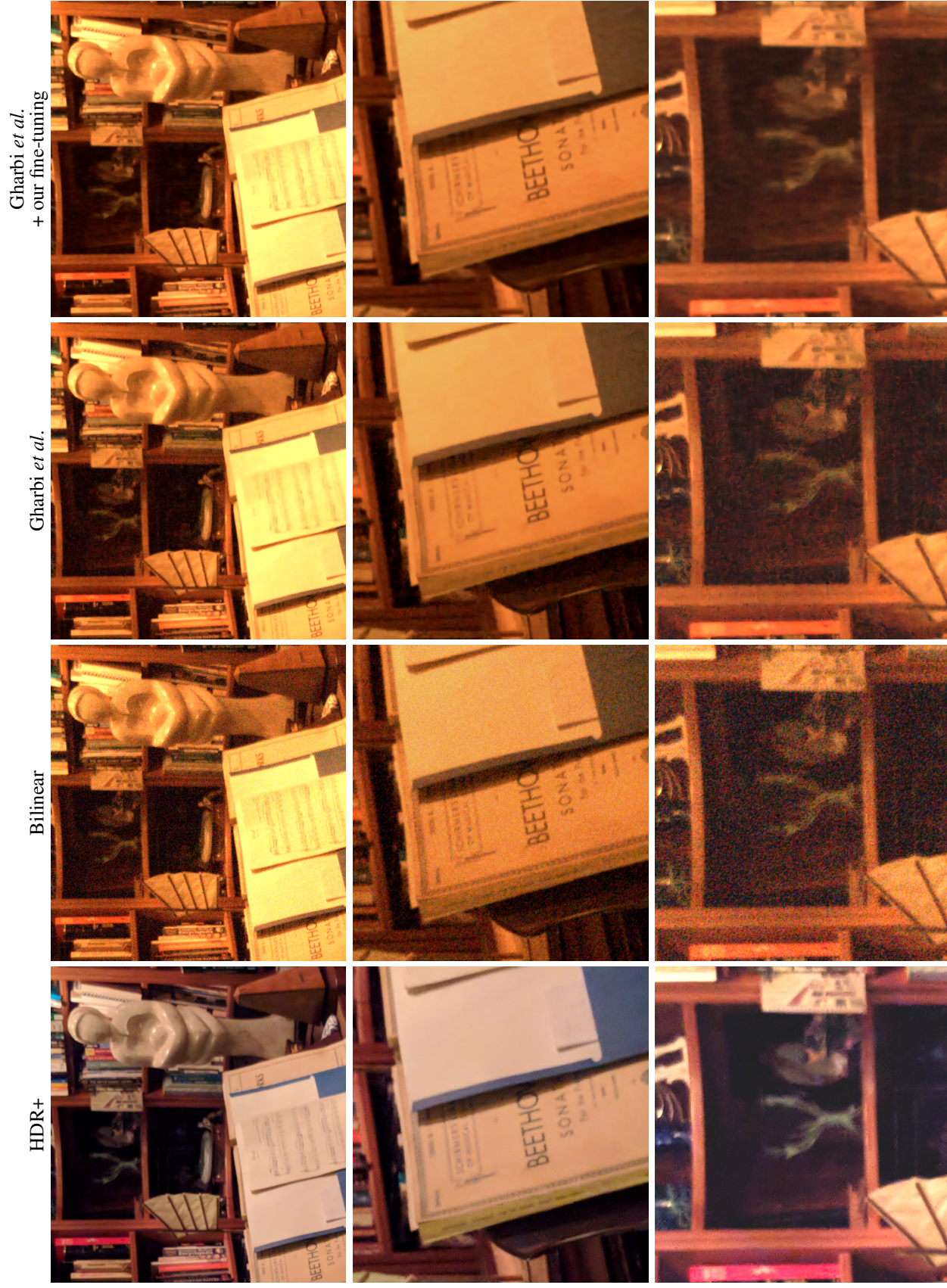


Figure 3: Experiment on a real burst. Left to right: The result of the HDR+ pipeline [2], bilinear interpolation, Gharbi *et al.* [1], and Gharbi *et al.* [1] with our fine-tuning. Contrast in dark regions was enhanced for all methods. Note that the HDR+ pipeline includes color balance as well as sharpening. It also uses all the images of the burst to produce the result (all other methods use only the reference frame). Figure best visualized zoomed in on a computer.