

Towards Learning-based Inverse Subsurface Scattering: Supplementary Material

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1 INTRODUCTION

In this supplementary material, we first show in, Figure 1, additional examples of images and their derivatives with respect to scattering parameters, produced using the differentiable renderer discussed in the main paper. We then show, in Figure 2, additional examples of images rendered with parameters predicted by the five networks discussed in the main paper. In all cases, we observe that the ITN with similarity-aware reparameterization and weight map reproduces the groundtruth appearance the best.

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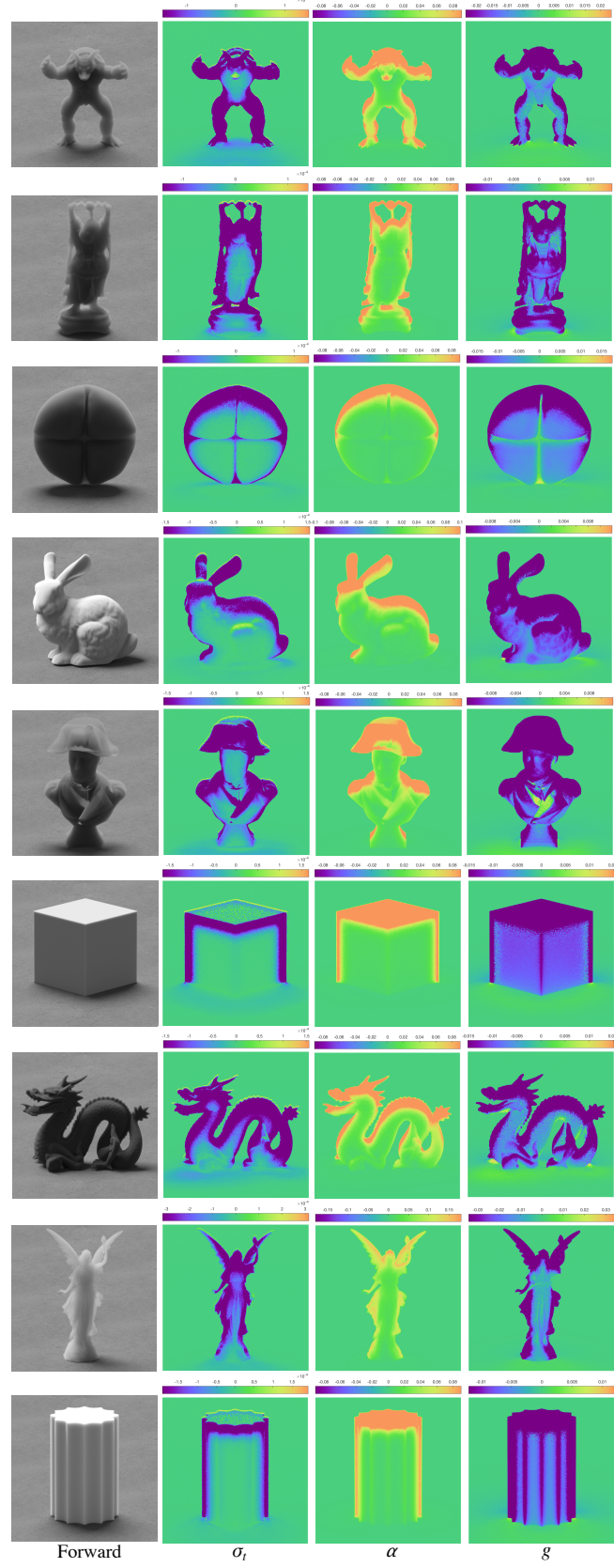


Fig. 1: Example forward and differentiable renderings with respect to σ_t , α and $\bar{c}$.

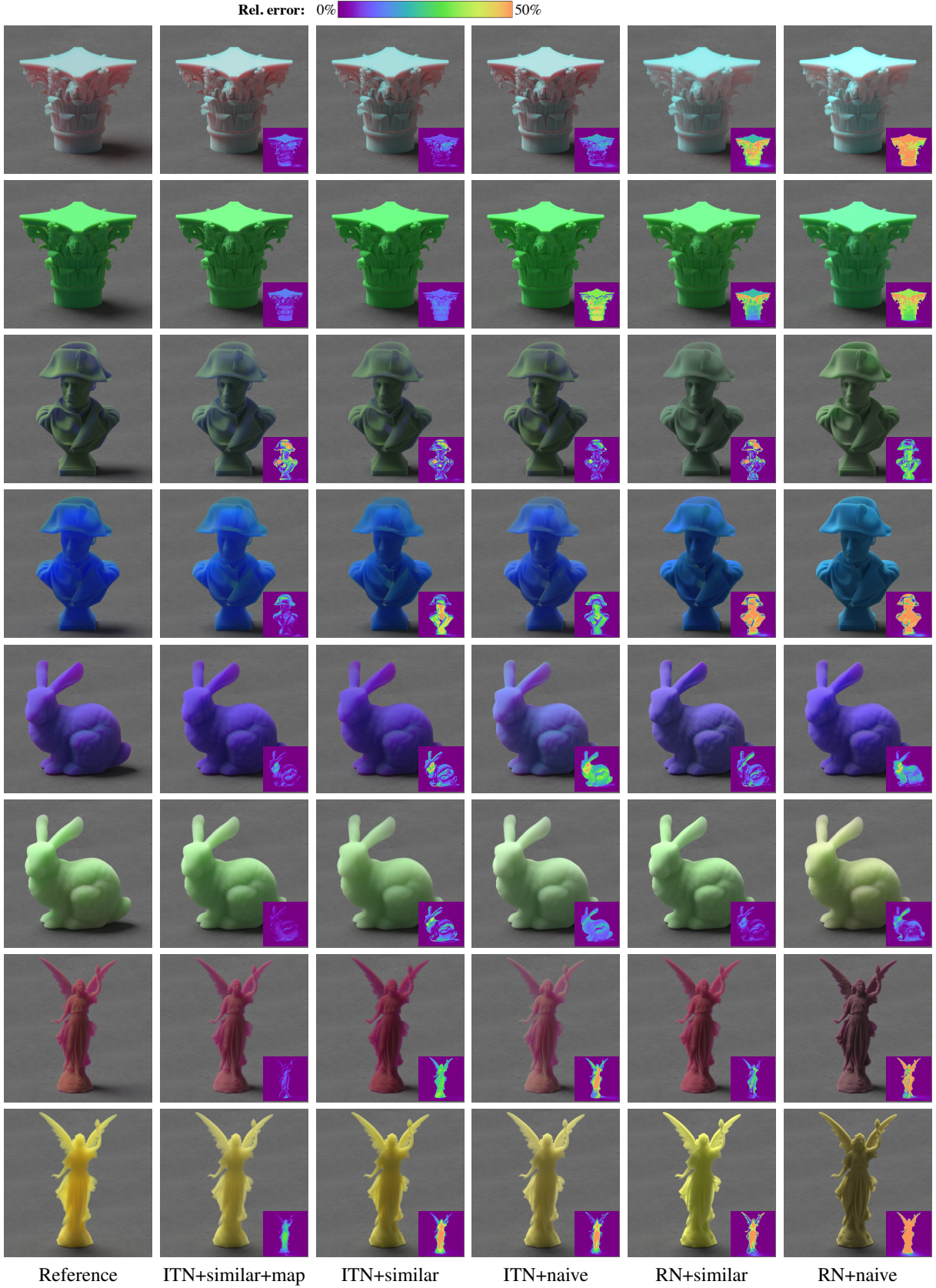


Fig. 2: **Images rendered with predicted material parameters:** Each row corresponds to a different input image drawn from our synthetic testing set. For each image, different columns compare the groundtruth (column 1) to images rendered using the parameters predicted by the five networks we evaluate (columns 2-6).