Shapenet Illuminants
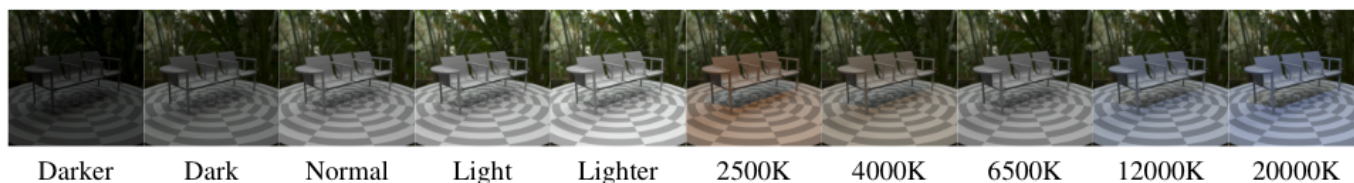
Shapenet Illuminants is a synthetic classification dataset published in [Zero-Shot Domain Adaptation with a Physics Prior](#).

About

The images are rendered from a subset of the [ShapeNet](#) dataset using the physically based renderer [Mitsuba](#). The scene is illuminated by a point light modeled as a black-body radiator with temperatures ranging between *[1900, 20000] K* and an ambient light source. The training set contains 1,000 samples for each of the 10 object classes recorded under "normal" lighting conditions (*T = 6500 K*). Multiple test sets with 300 samples per class are rendered for a variety of light source intensities and colors.

Darker   Dark   Normal   Light   Lighter   2500K   4000K   6500K   12000K   20000K

Getting started

1. Download and unpack the dataset.
2. For PyTorch a dataset class file is available [here](#). See also [here](#) for the reference code of the synthetic classification experiment from the paper.