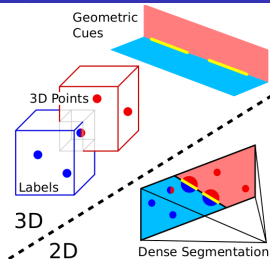
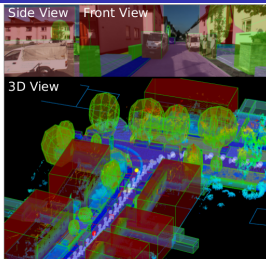


Semantic Instance Annotation of Street Scenes by 3D to 2D Label Transfer

J. Xie, M. Kiefel, M. Sun, A. Geiger (CVPR 2016)



- ▶ Motivation for 3D to 2D Label Transfer:
 - ▶ Objects often project into several images of the video sequence, thus lowering annotation efforts considerably.
 - ▶ 2D instance annotations are temporally coherent as they are associated with a single object in 3D
 - ▶ 3D annotations might be useful by themselves for reasoning in 3D or to enrich 2D annotations with approximate 3D geometry
- ▶ Contributions:
 - ▶ Present a novel geo-registered dataset of suburban scenes recorded by a moving platform
 - ▶ Provides semantic 3D annotations for all static scene element
 - ▶ Proposes a method transfer these labels from 3D into 2D, yielding pixelwise semantic instance annotations
 - ▶ The dataset comprises over 400k images and over 100k laser scans