Supplemental material to 'Ensemble Learning for Confidence Measures in Stereo Vision'

Ralf Haeusler
Computer Science Department
The University of Auckland
r.haeusler@aucklanduni.ac.nz

Rahul Nair, and Daniel Kondermann
Heidelberg Collaboratory for Image Processing
University of Heidelberg
http://hci.iwr.uni-heidelberg.de

Abstract

In this supplemental material, we include sparsification plots for all 194 *frames of the KITTI stereo dataset. For preserving clarity of plots we include only the following confidence features computed at full resolution in addition to results of bad pixel class posterior probabilities using randoms forests: Perturbation, Left-Right difference, disparity variance, peak ratio, semi global matching energy.*

In contrast to previous evaluation with equal stereo result and confidence feature computation [1], in this study the evaluation domain differs slightly:

First, here we do not exclude locations which were found to be occluded based on Left-Right consistency check. This is due to us observing rather poor accuracy of the standard occlusion check [2] on recorded data. It would be of interest to run the same evalution with ground truth based occlusions excluded. These are not part of published KITTI data.

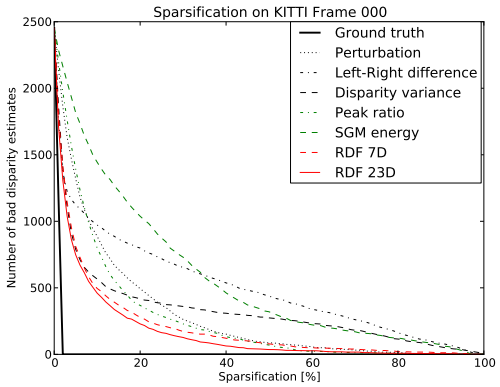
Second, in this study we exclude a broader rim of 12 *pixels (instead of* 3*) along image borders for evaluation, the reason being that each computed disparity result should be based on dataterm values. Due to adding scale-space features in this study, the adaptation is necessary.*

Frames $43, 71, 82, 87, 94, 120, 122$ *and* 180 *are not representative for quality of random forest based results, as these frames are part of the training set.*

References

[1] R. Haeusler and R. Klette. Analysis of KITTI Data for Stereo Analysis with Stereo Confidence Measures. In A. Fusiello, V. Murino, and R. Cucchiara, editors, *ECCV Workshops (2)*, volume 7584 of *Lecture Notes in Computer Science*, pages 158–167. Springer, 2012. 1

[2] H. Hirschmüller. Stereo processing by semiglobal matching and mutual information. *IEEE Trans. Pattern Anal. Mach. Intell.*, 30(2):328–341, 2008. 1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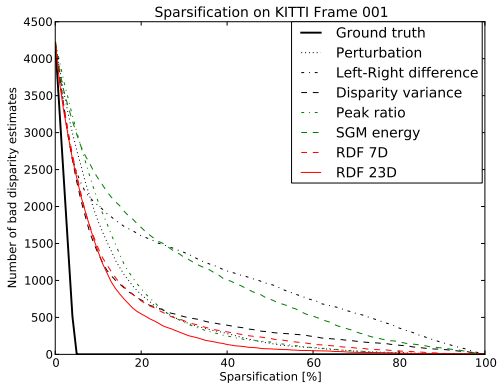
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D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Disparity variance
Peak ratio
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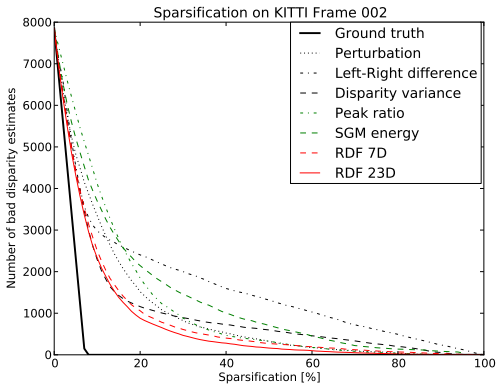
RDF 7D
RDF 23D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Peak ratio
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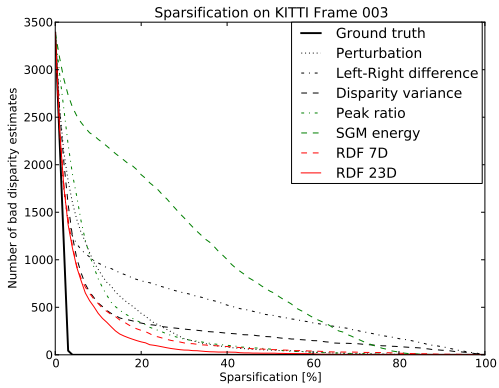
RDF 7D
RDF 23D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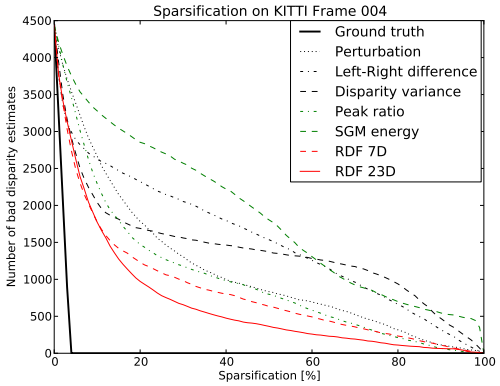
RDF 23D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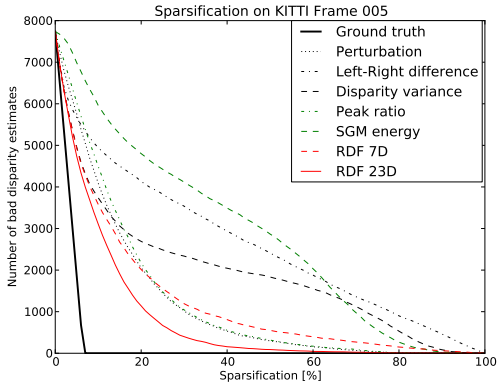
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D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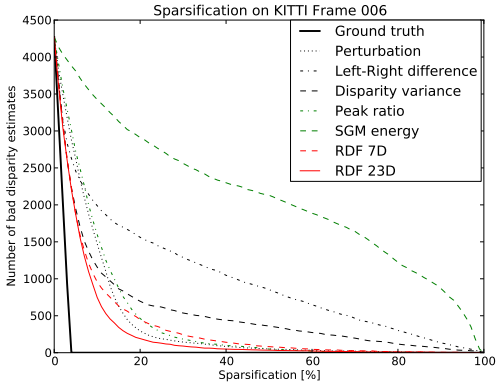
RDF 23D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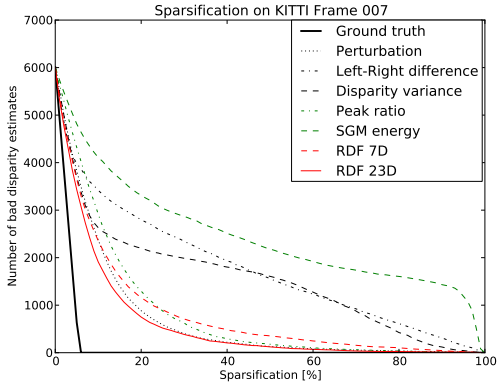
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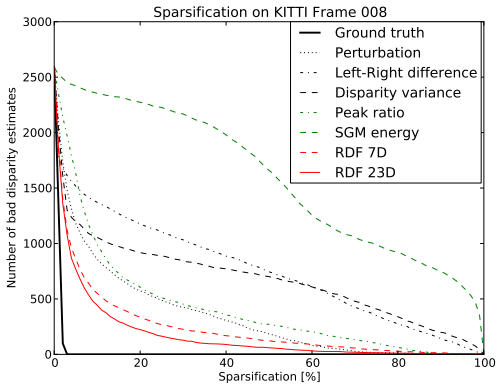
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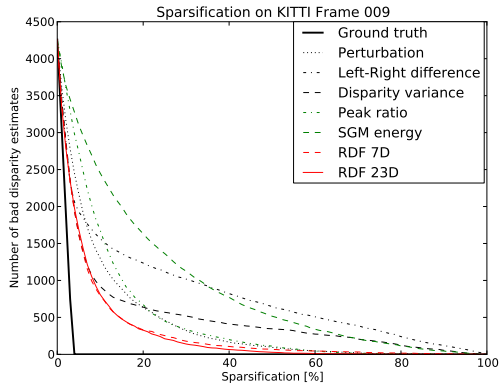
RDF 23D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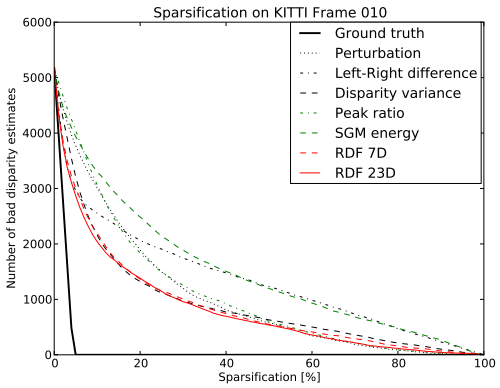
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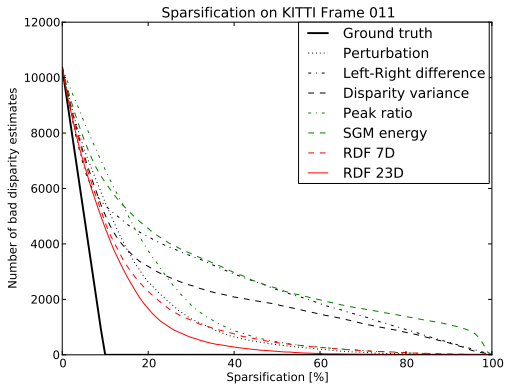
RDF 23D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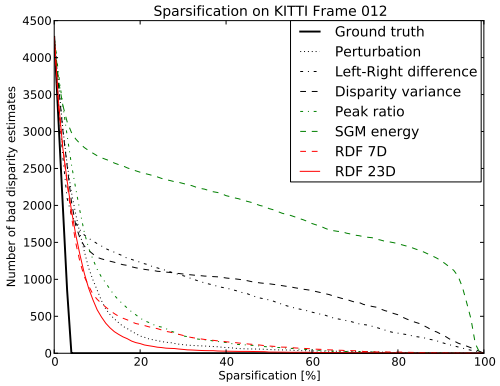
RDF 23D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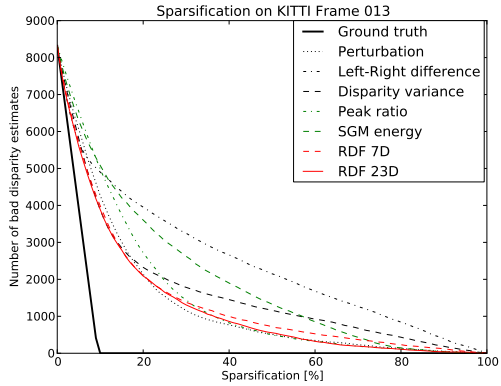
Peak ratio
SGM energy
RDF 7D
RDF 23D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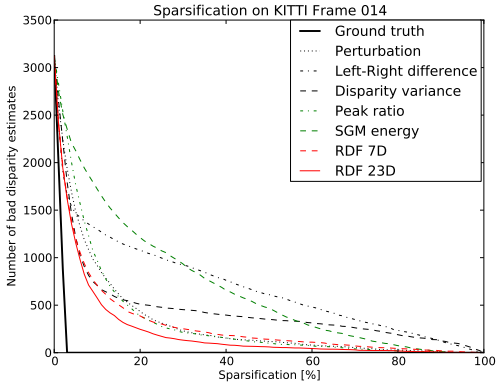
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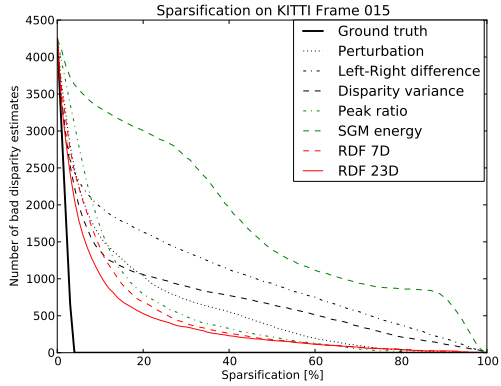
RDF 23D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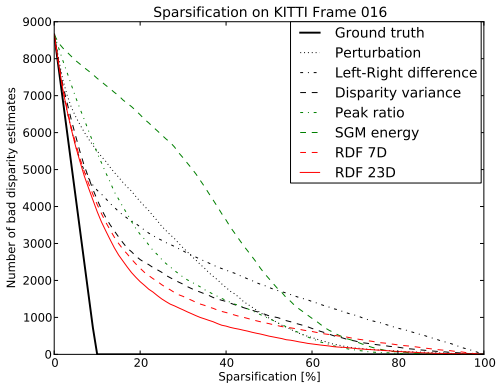
RDF 23D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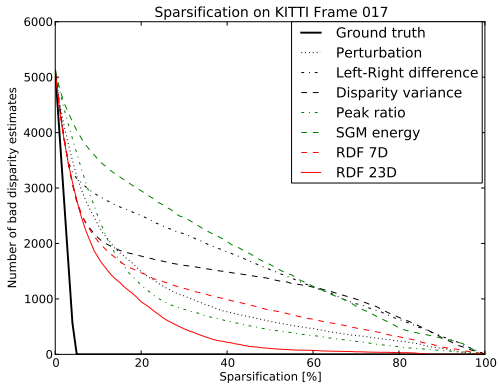
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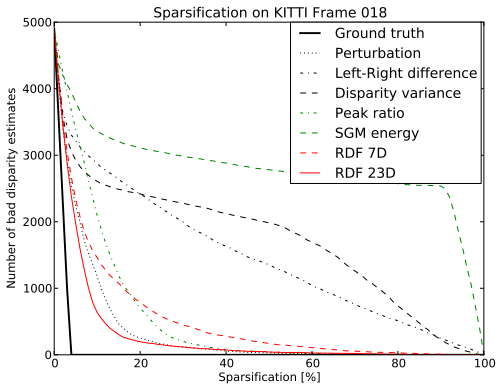
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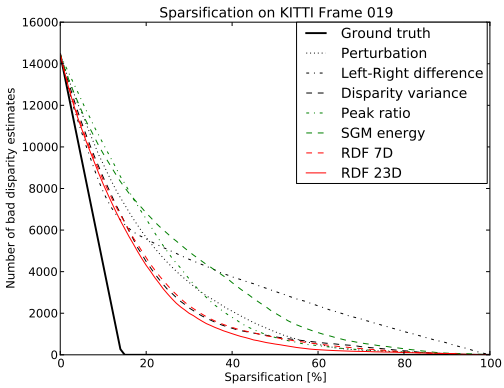
RDF 23D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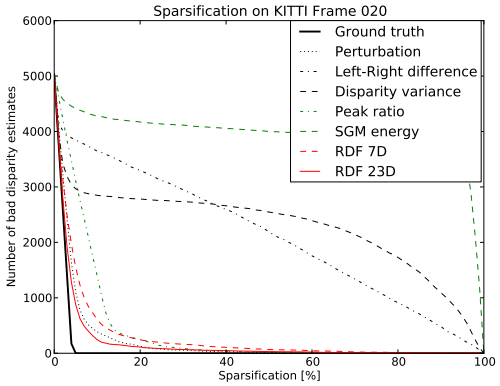
RDF 23D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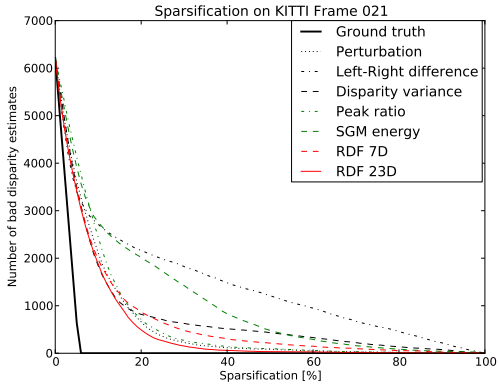
RDF 23D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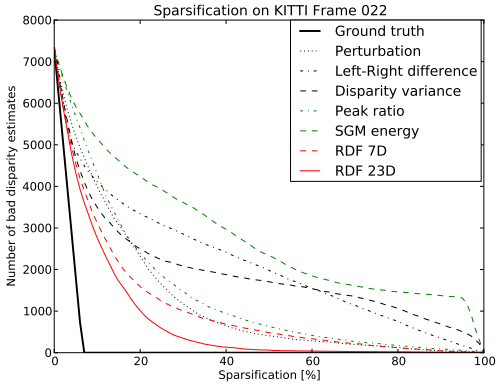
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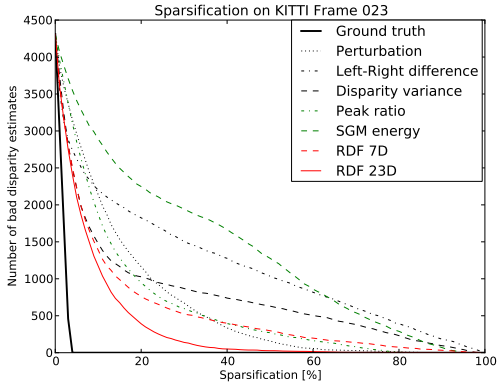
RDF 23D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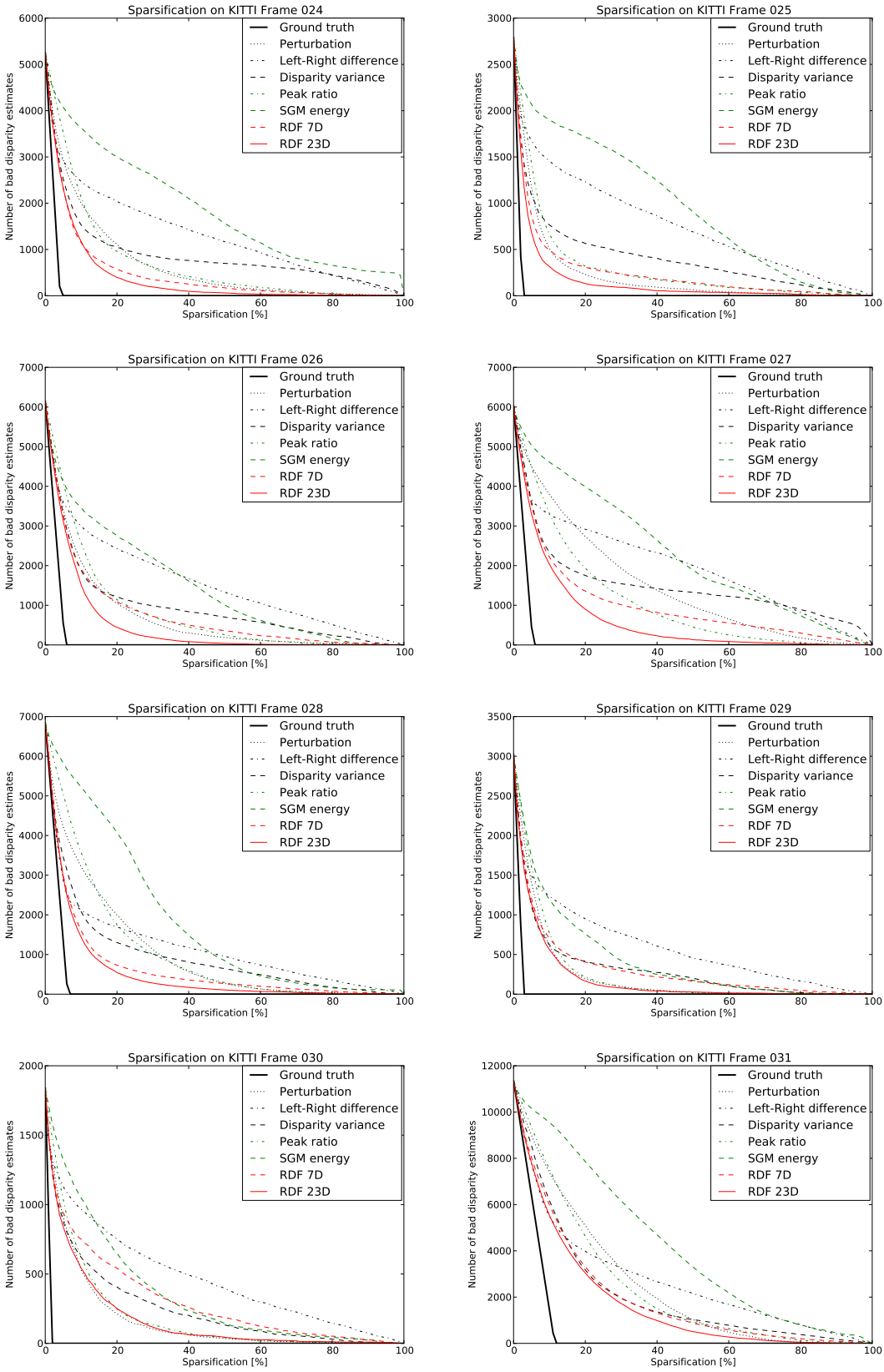
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Left-Right difference
Disparity variance
Peak ratio
SGM energy
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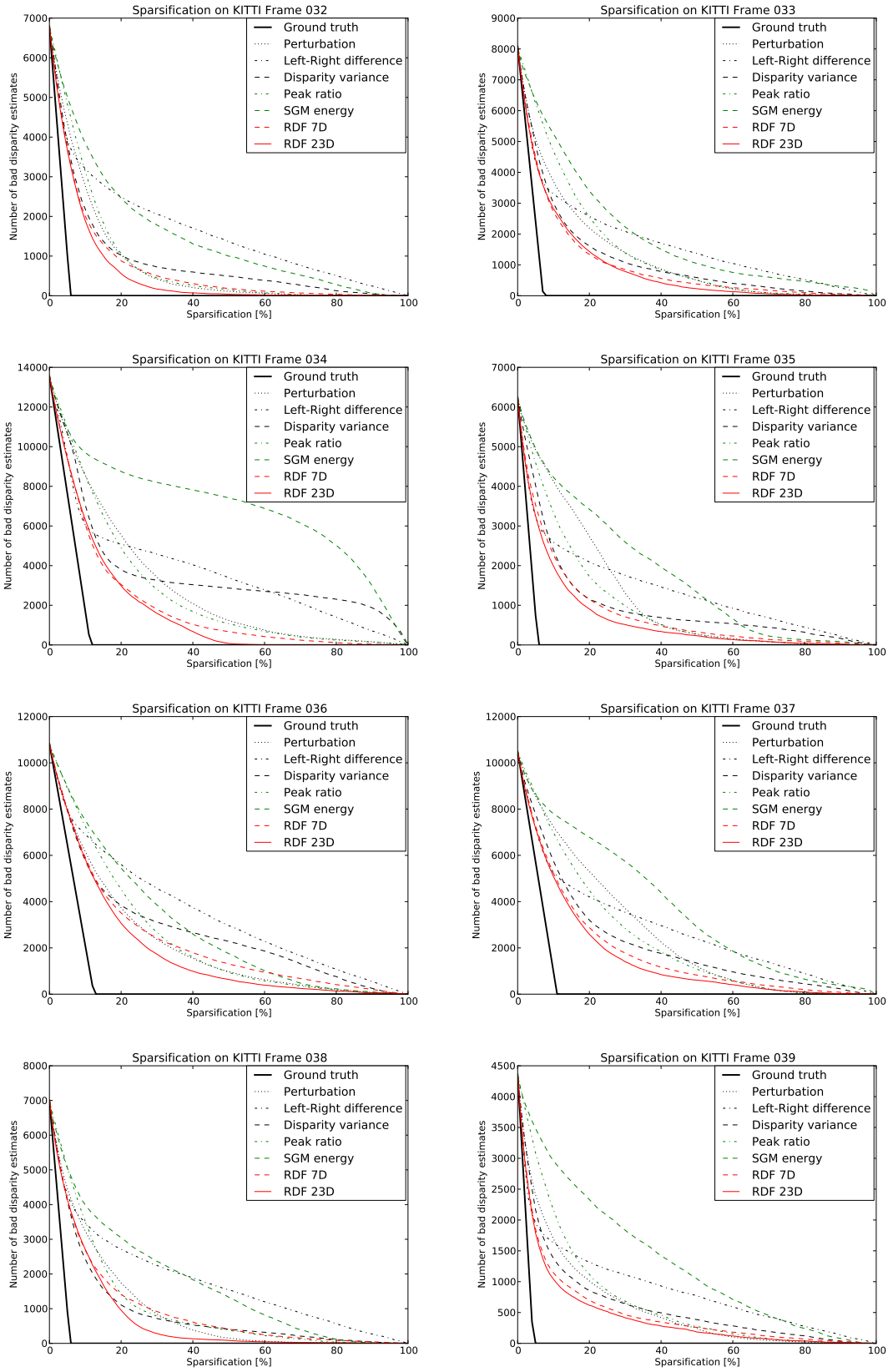
Number of bad disparity estimates
Sparsification [%]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Sparsification on KITTI Frame 039
Ground truth
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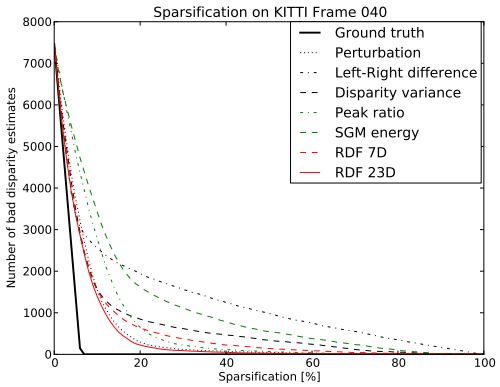
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D
Number of bad disparity estimates
Sparsification [%]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Ground truth
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Peak ratio
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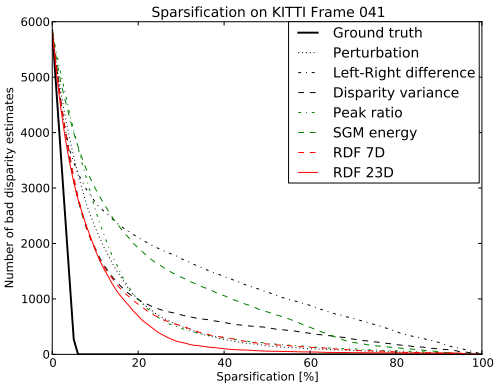
RDF 23D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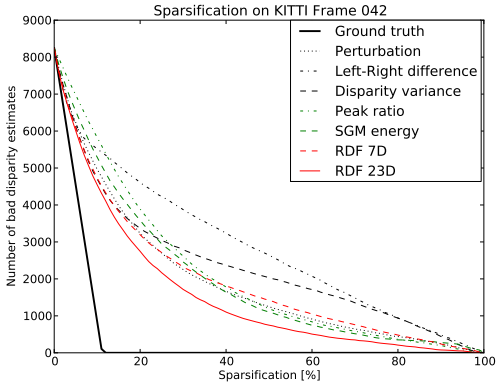
RDF 23D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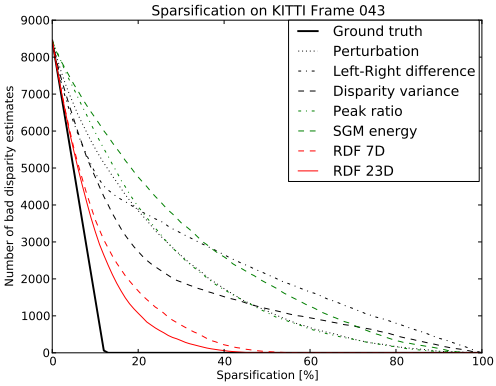
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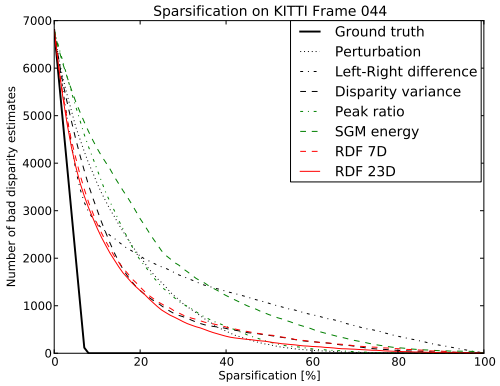
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Ground truth
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Peak ratio
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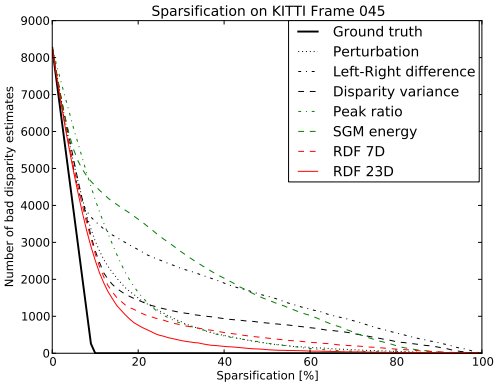
RDF 23D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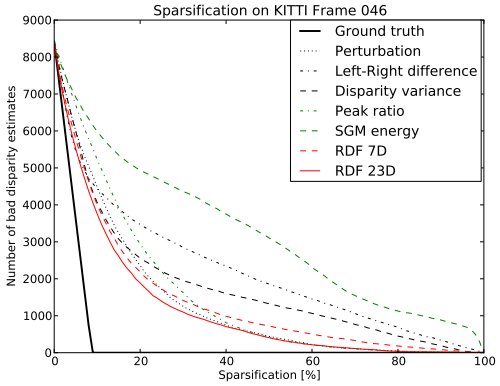
RDF 23D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Perturbation
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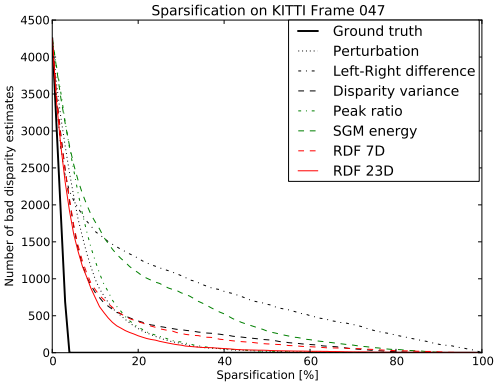
RDF 23D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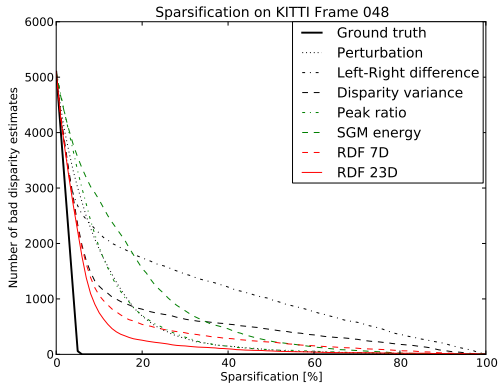
RDF 23D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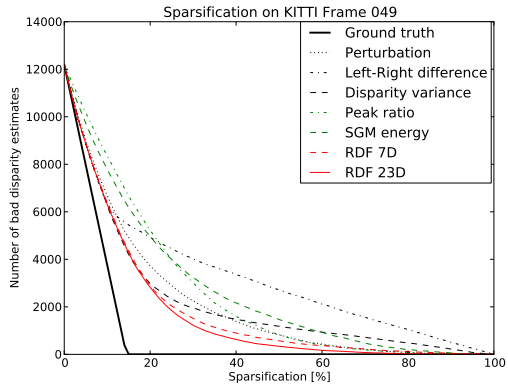
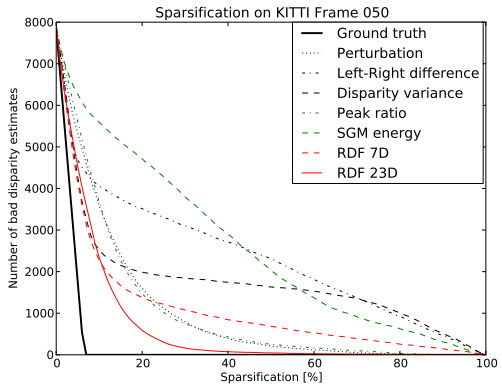
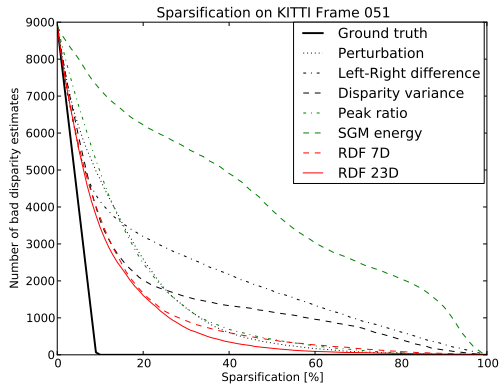
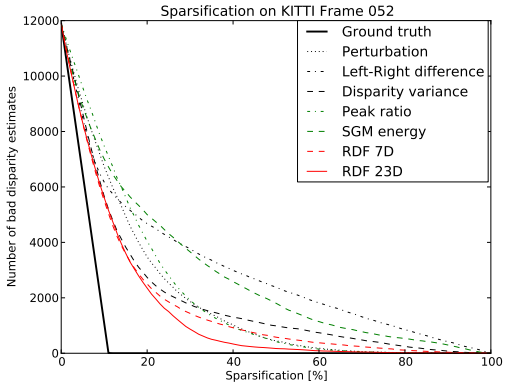
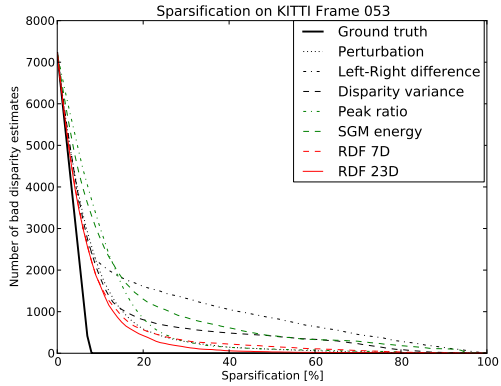
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

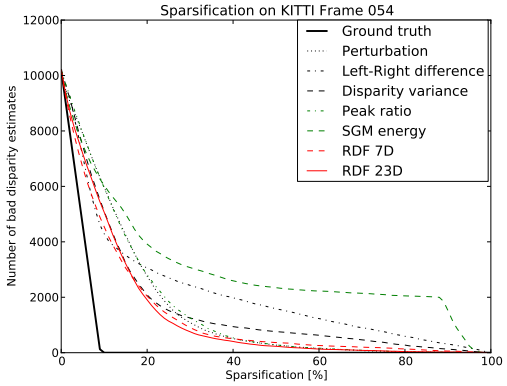

Sparsification on KITTI Frame 049
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

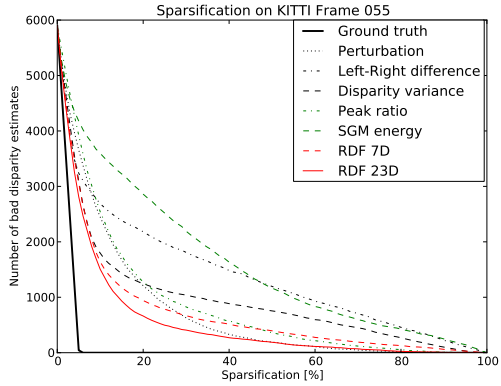

Sparsification on KITTI Frame 050
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

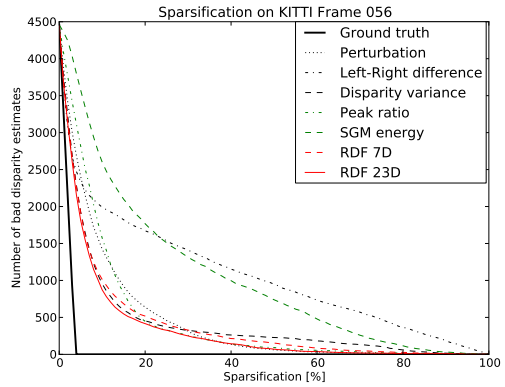

Sparsification on KITTI Frame 051
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

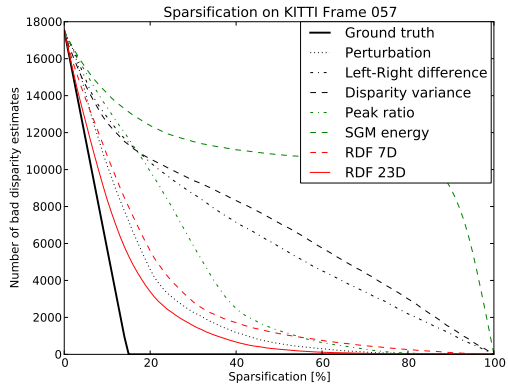

Sparsification on KITTI Frame 052
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

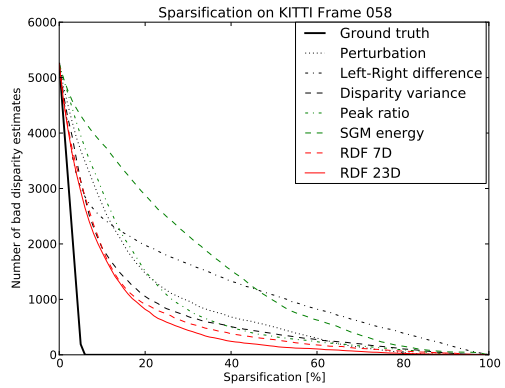

Sparsification on KITTI Frame 053
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

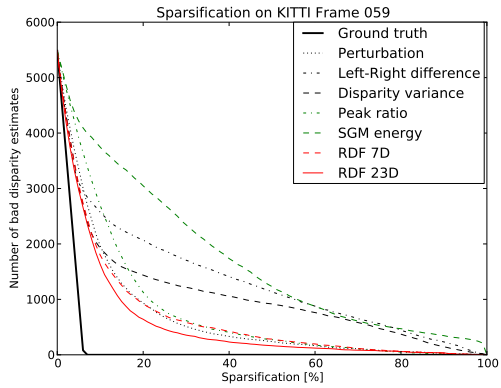

Sparsification on KITTI Frame 054
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

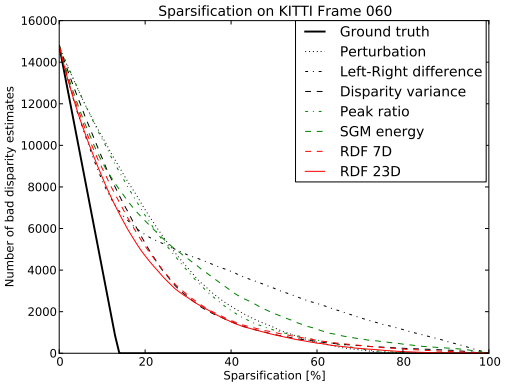

Sparsification on KITTI Frame 055
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

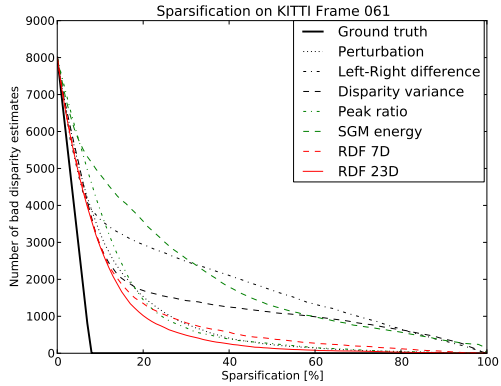

Sparsification on KITTI Frame 056
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

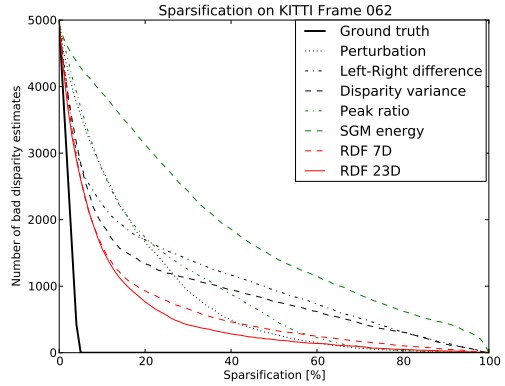

Sparsification on KITTI Frame 057
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

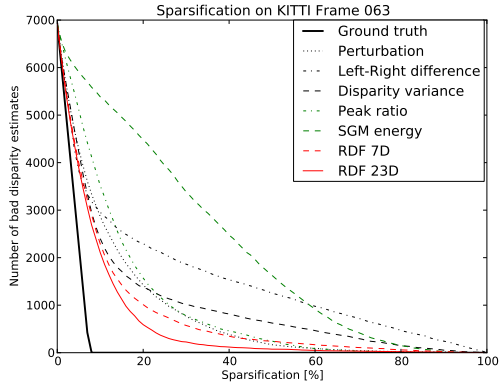

Sparsification on KITTI Frame 058
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

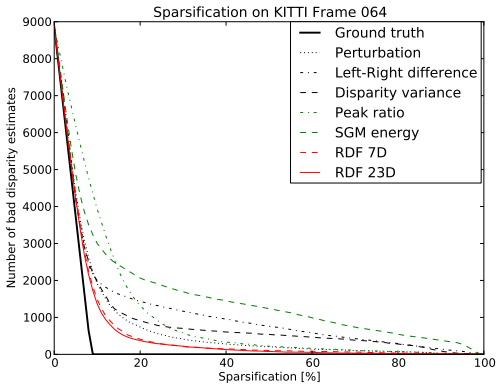

Sparsification on KITTI Frame 059
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

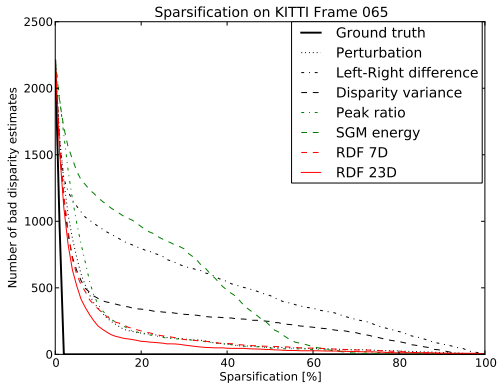

Sparsification on KITTI Frame 060
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

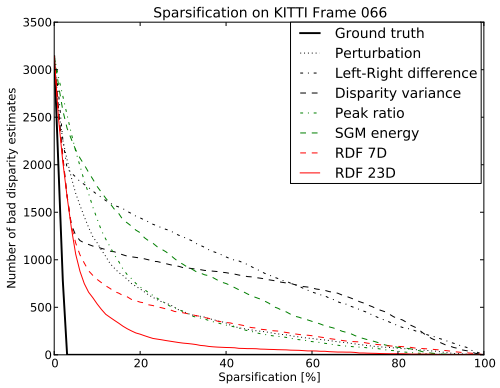

Sparsification on KITTI Frame 061
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

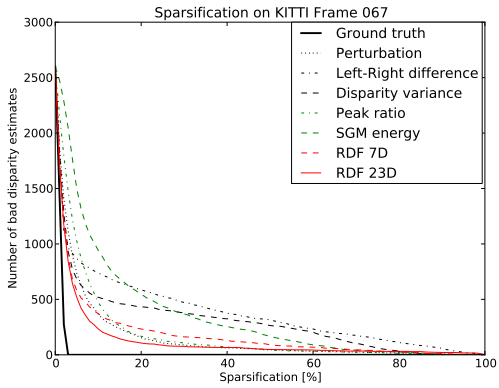

Sparsification on KITTI Frame 062
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

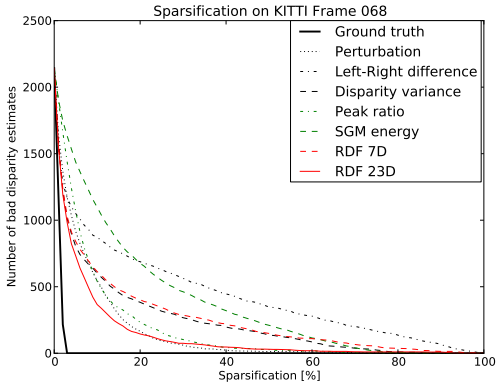

Sparsification on KITTI Frame 063
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

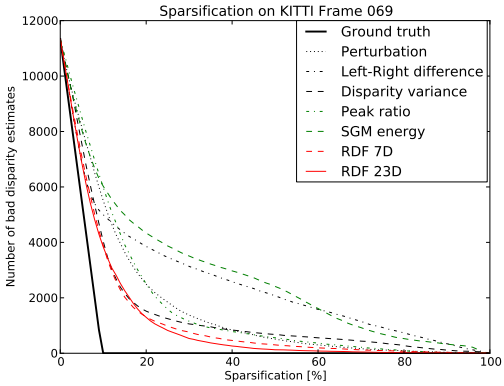

Sparsification on KITTI Frame 064
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

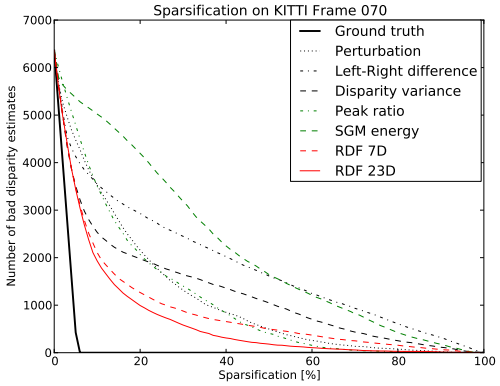

Sparsification on KITTI Frame 065
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

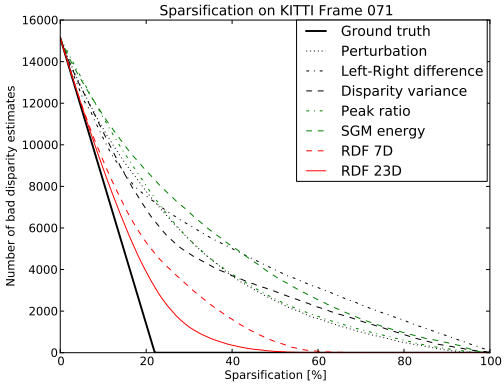

Sparsification on KITTI Frame 066
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

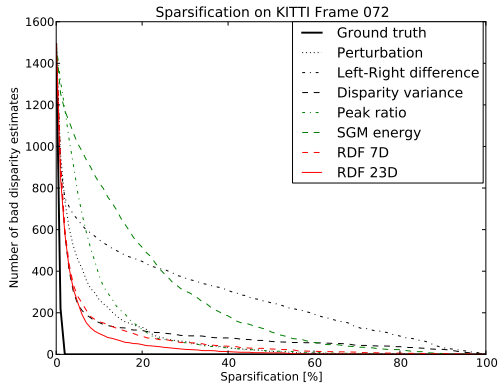

Sparsification on KITTI Frame 067
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

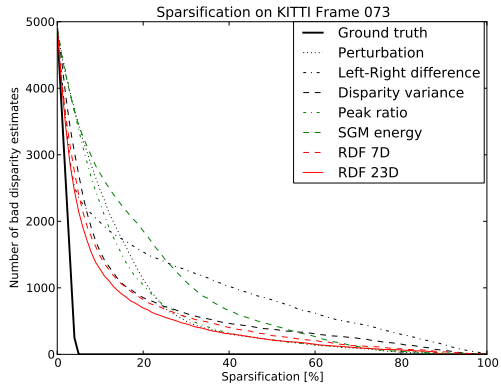

Sparsification on KITTI Frame 068
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

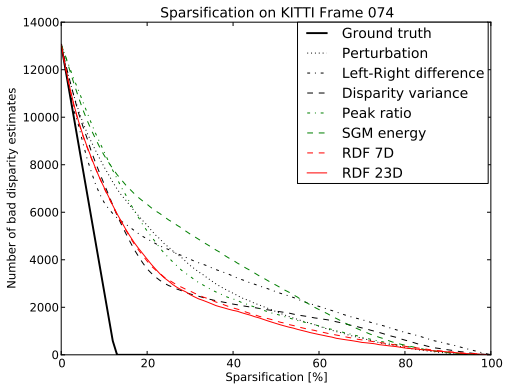

Sparsification on KITTI Frame 069
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

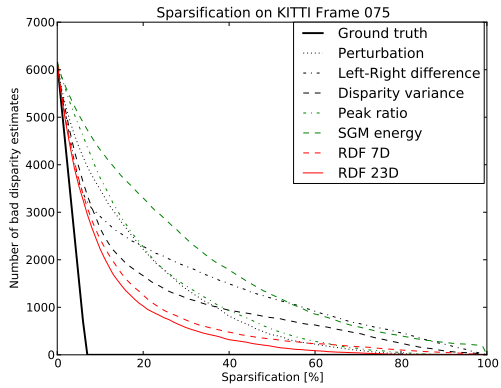

Sparsification on KITTI Frame 070
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

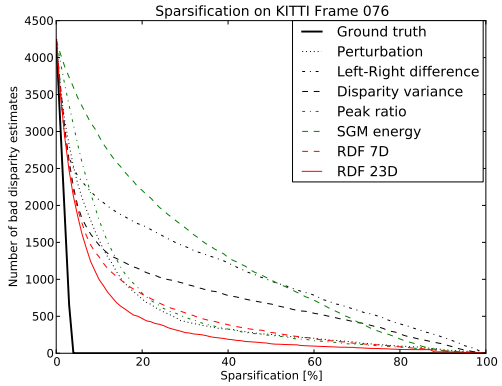

Sparsification on KITTI Frame 071
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

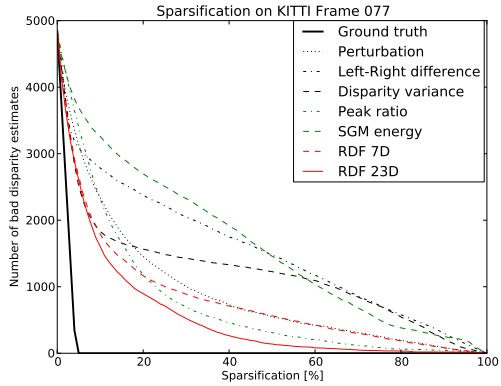

Sparsification on KITTI Frame 072
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

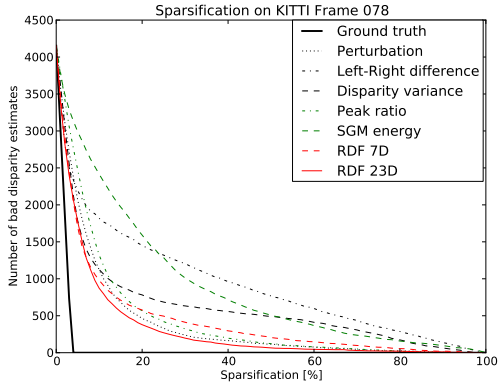

Sparsification on KITTI Frame 073
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

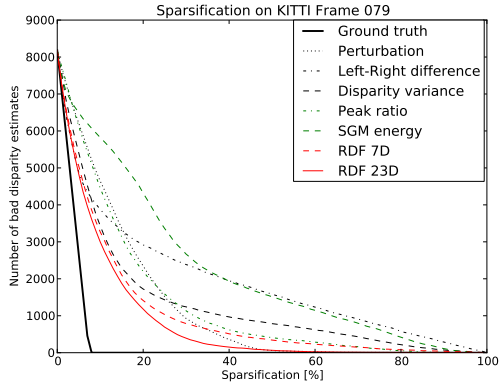

Sparsification on KITTI Frame 074
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

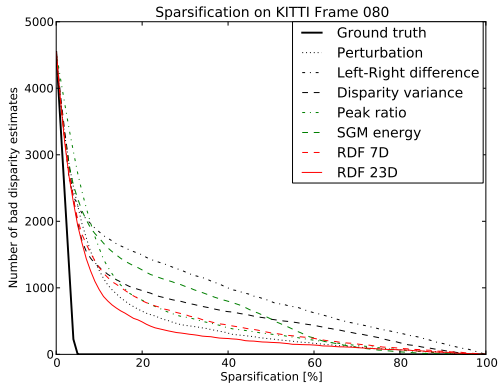

Sparsification on KITTI Frame 075
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

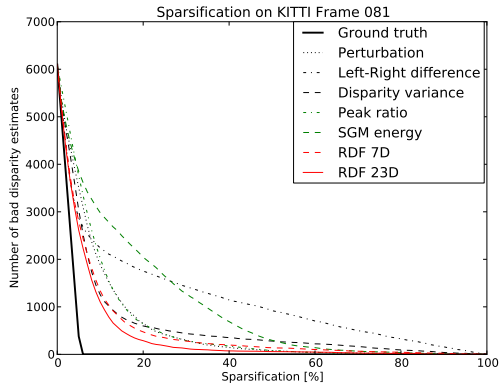

Sparsification on KITTI Frame 076
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

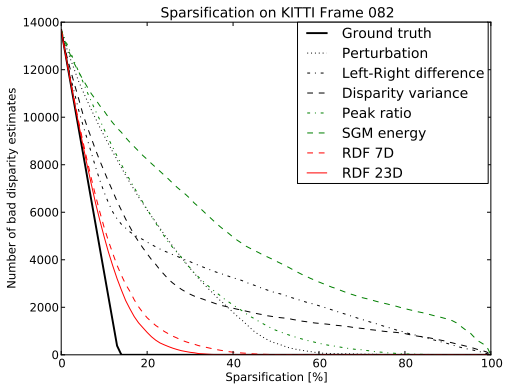

Sparsification on KITTI Frame 077
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

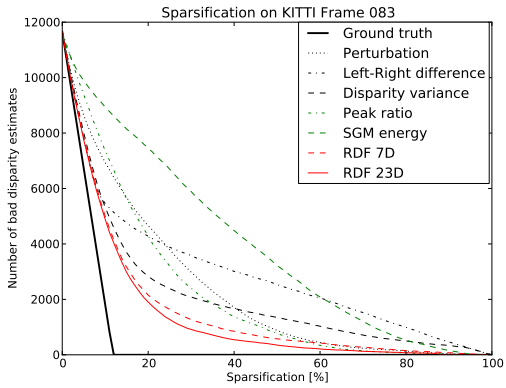

Sparsification on KITTI Frame 078
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

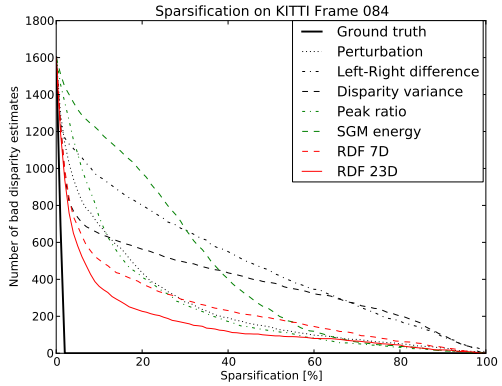

Sparsification on KITTI Frame 079
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

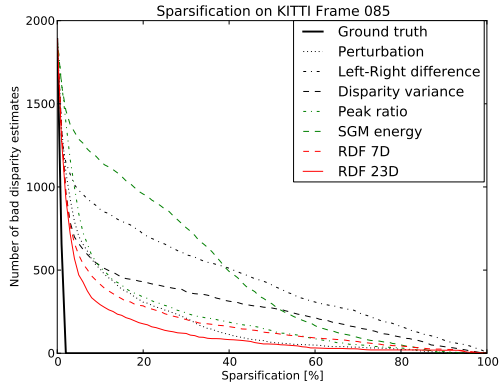

Sparsification on KITTI Frame 080
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

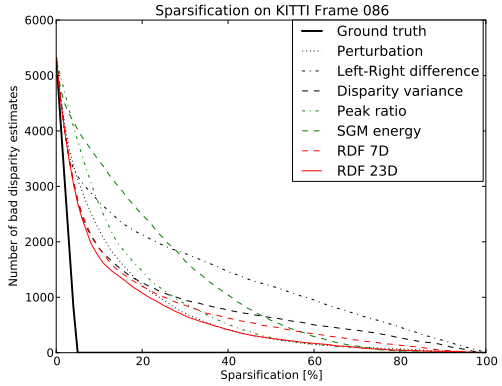

Sparsification on KITTI Frame 081
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

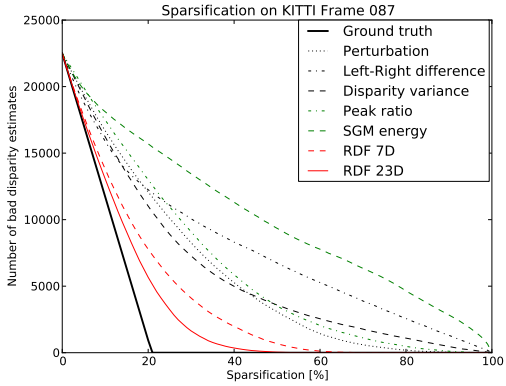

Sparsification on KITTI Frame 082
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

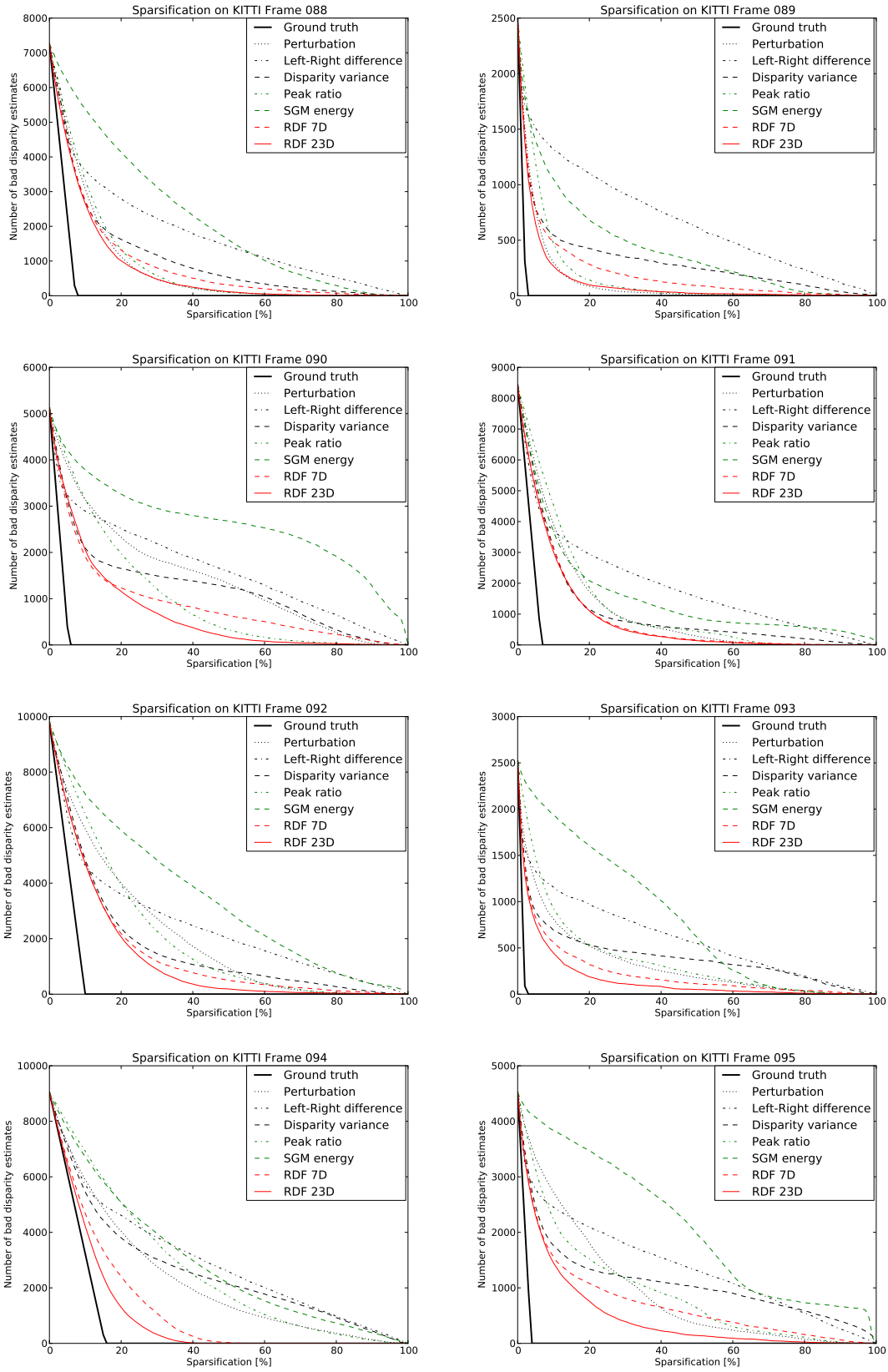

Sparsification on KITTI Frame 083
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

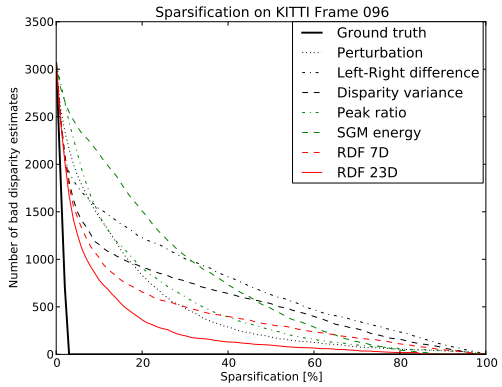

Sparsification on KITTI Frame 084
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

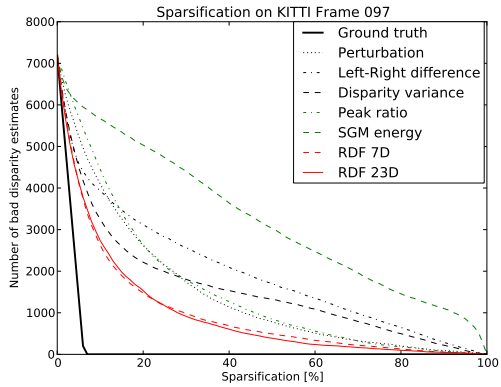

Sparsification on KITTI Frame 085
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

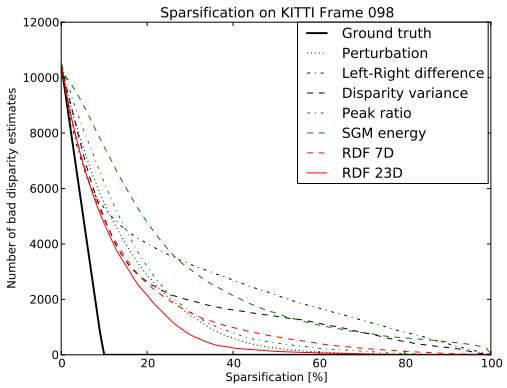

Sparsification on KITTI Frame 086
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

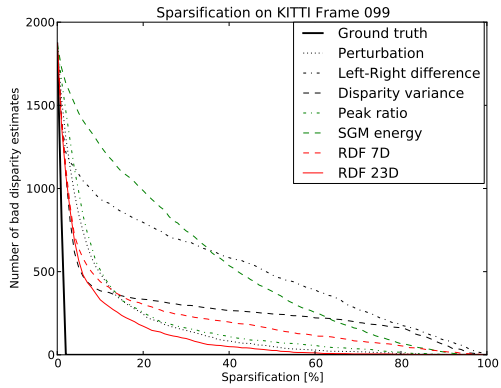

Sparsification on KITTI Frame 087
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

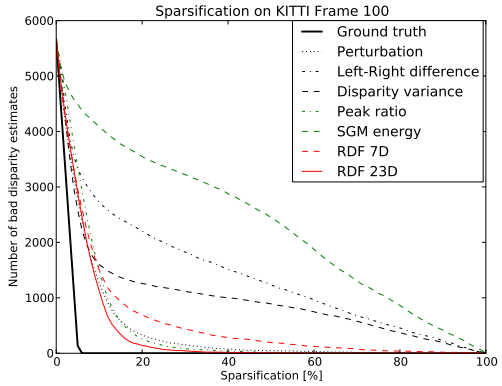

Sparsification on KITTI Frame 088
Sparsification on KITTI Frame 089
Sparsification on KITTI Frame 090
Sparsification on KITTI Frame 091
Sparsification on KITTI Frame 092
Sparsification on KITTI Frame 093
Sparsification on KITTI Frame 094
Sparsification on KITTI Frame 095
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D
Number of bad disparity estimates
Sparsification [%]

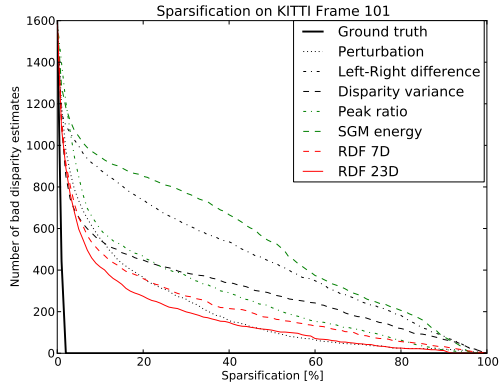

Sparsification on KITTI Frame 096
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

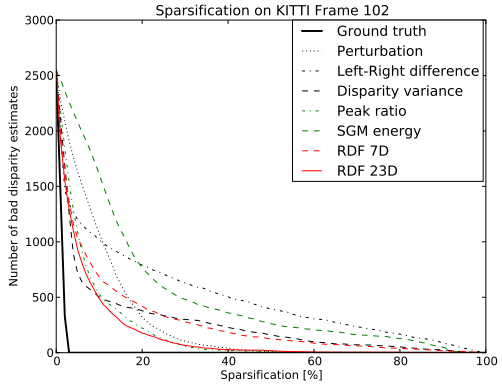

Sparsification on KITTI Frame 097
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

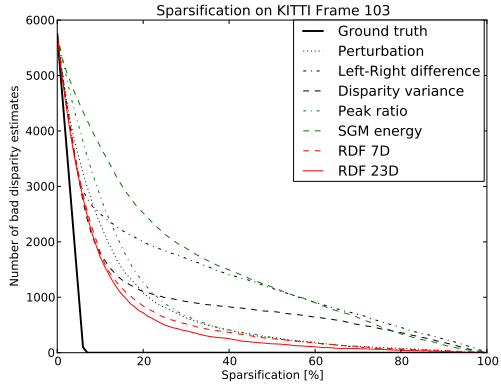

Sparsification on KITTI Frame 098
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

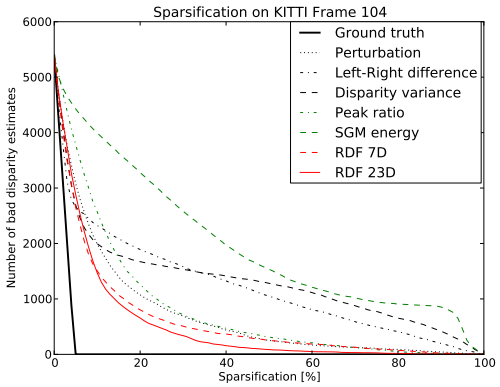

Sparsification on KITTI Frame 099
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

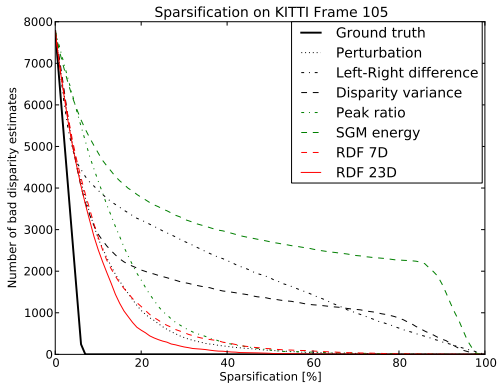

Sparsification on KITTI Frame 100
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

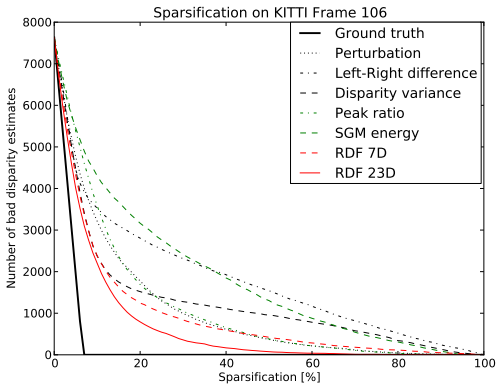

Sparsification on KITTI Frame 101
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

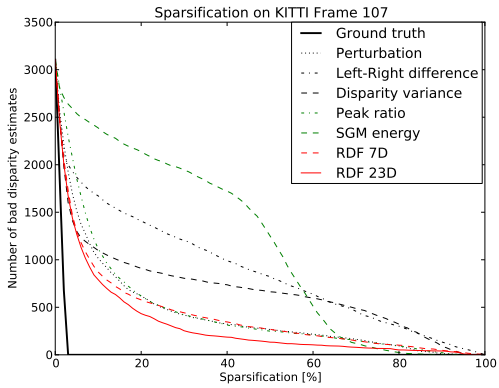

Sparsification on KITTI Frame 102
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

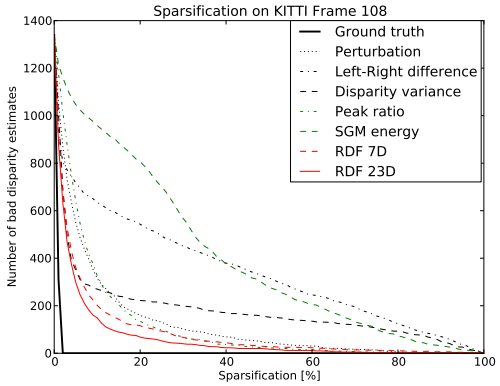

Sparsification on KITTI Frame 103
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

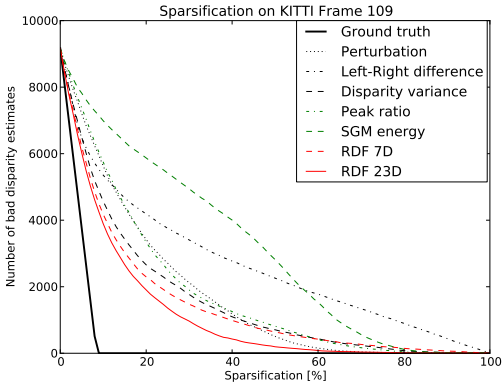

Sparsification on KITTI Frame 104
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

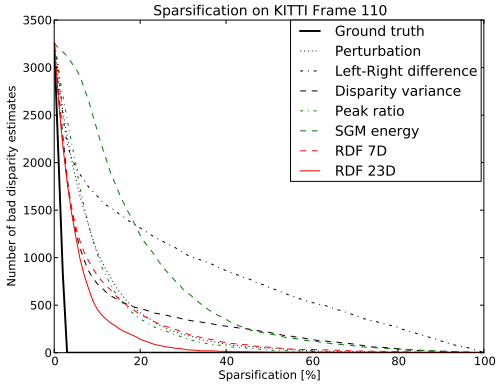

Sparsification on KITTI Frame 105
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

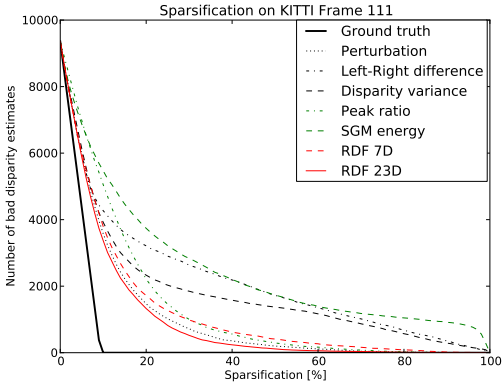

Sparsification on KITTI Frame 106
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

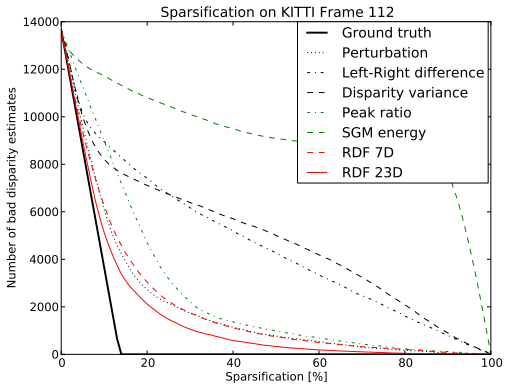

Sparsification on KITTI Frame 107
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

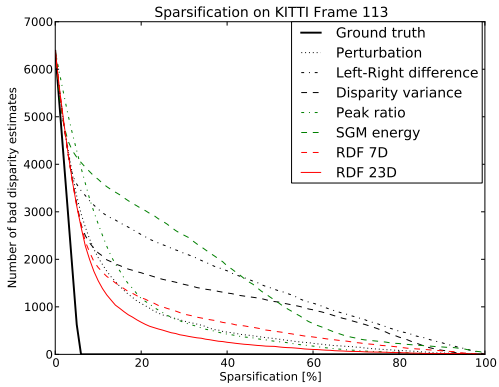

Sparsification on KITTI Frame 108
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

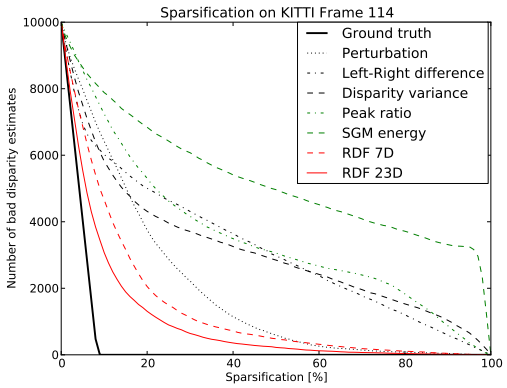

Sparsification on KITTI Frame 109
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

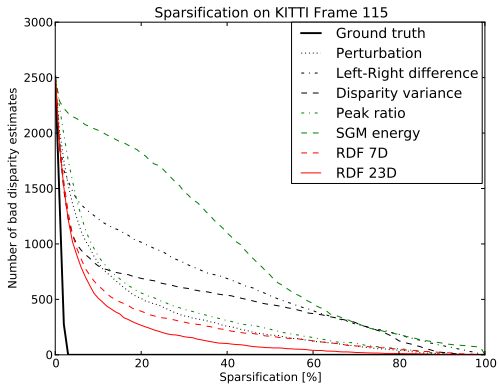

Sparsification on KITTI Frame 110
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

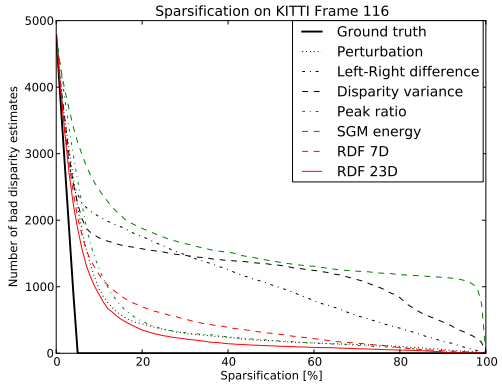

Sparsification on KITTI Frame 111
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

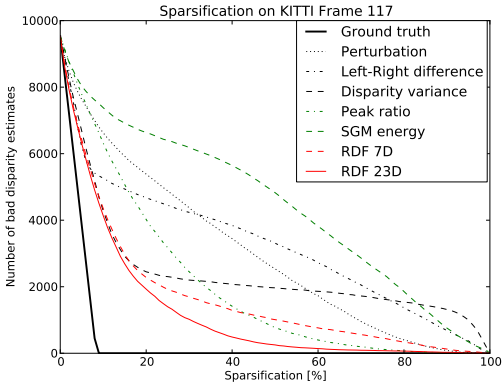

Sparsification on KITTI Frame 112
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

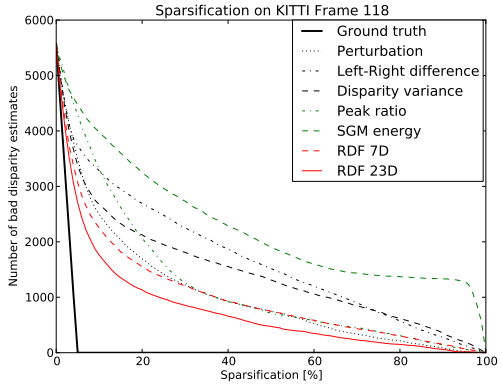

Sparsification on KITTI Frame 113
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

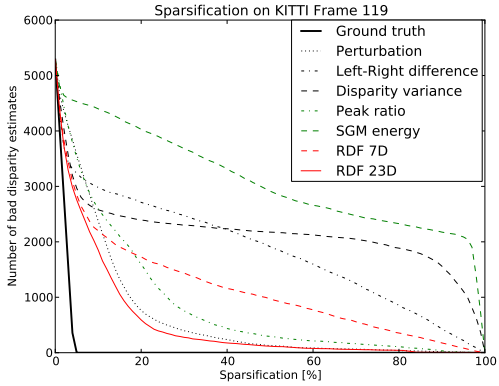

Sparsification on KITTI Frame 114
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

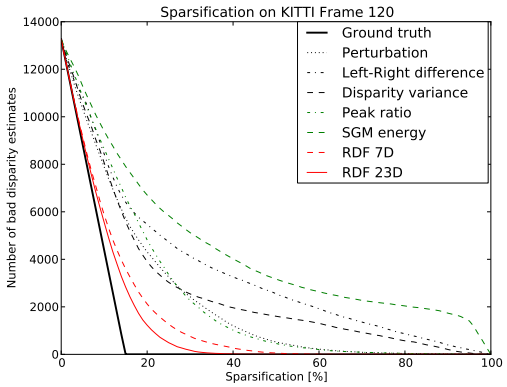

Sparsification on KITTI Frame 115
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

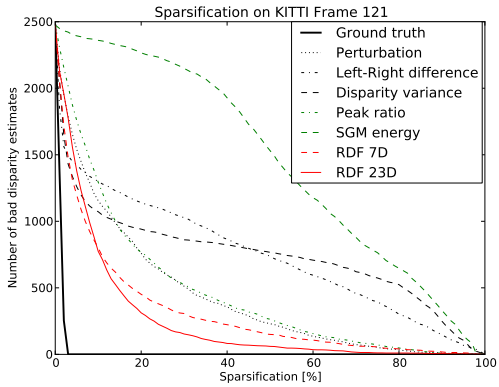

Sparsification on KITTI Frame 116
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

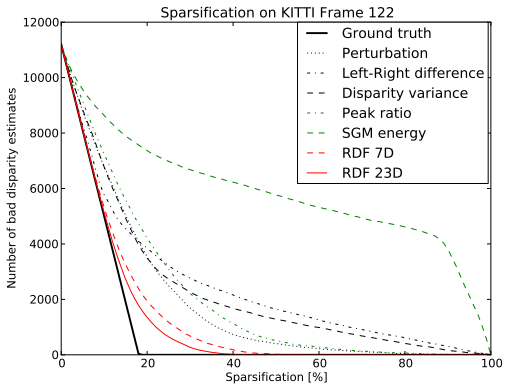

Sparsification on KITTI Frame 117
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

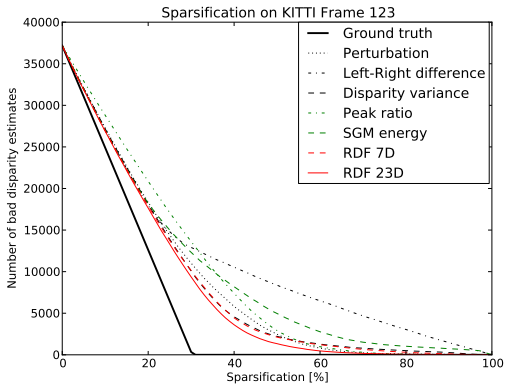

Sparsification on KITTI Frame 118
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

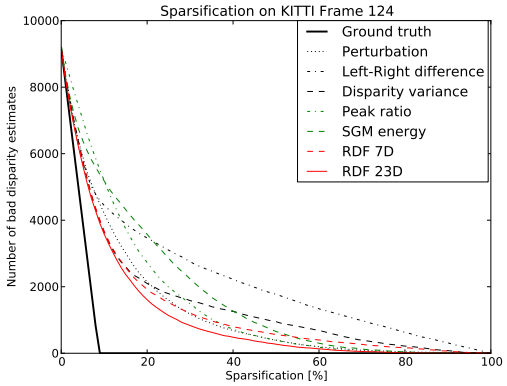

Sparsification on KITTI Frame 119
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

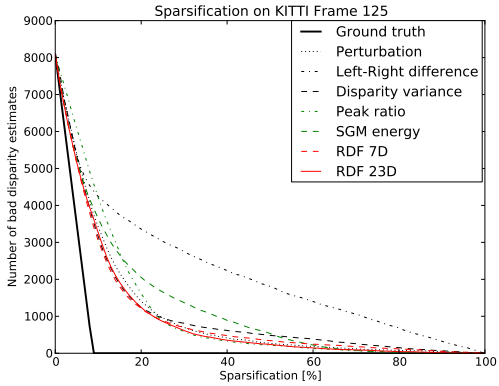

Sparsification on KITTI Frame 120
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

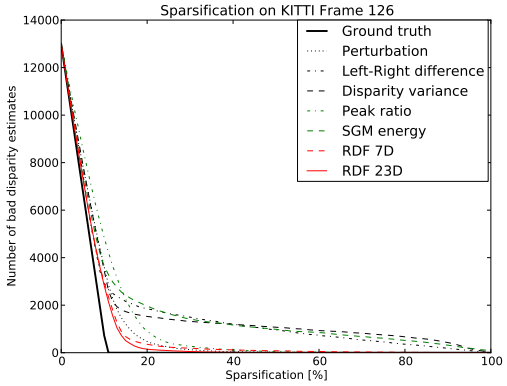

Sparsification on KITTI Frame 121
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

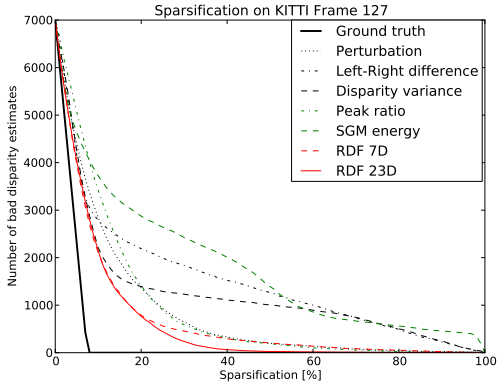

Sparsification on KITTI Frame 122
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

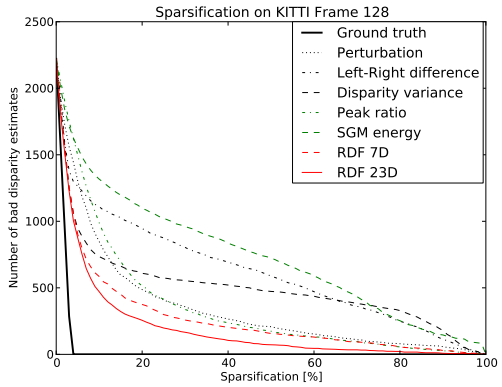

Sparsification on KITTI Frame 123
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

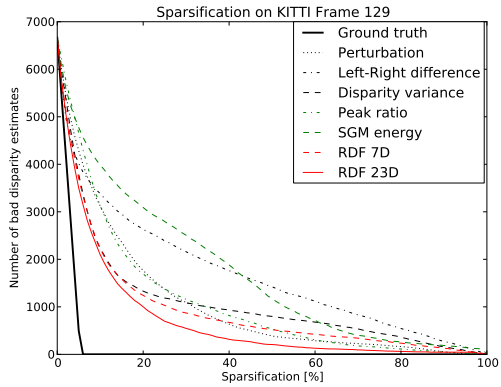

Sparsification on KITTI Frame 124
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

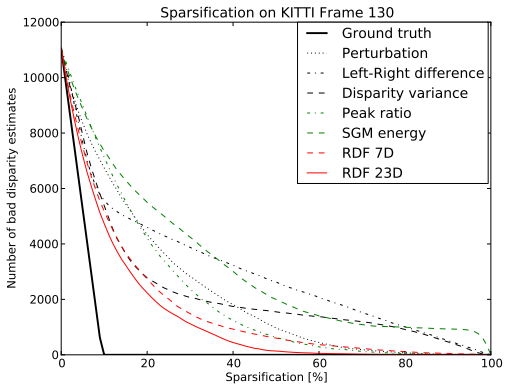

Sparsification on KITTI Frame 125
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

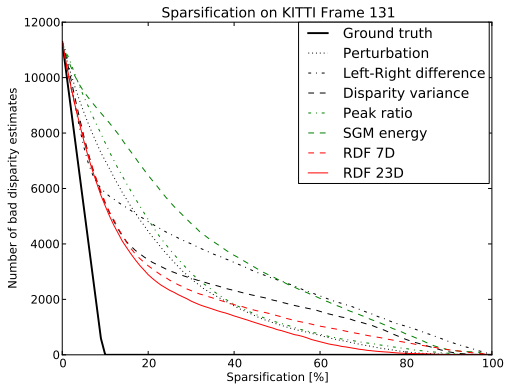

Sparsification on KITTI Frame 126
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

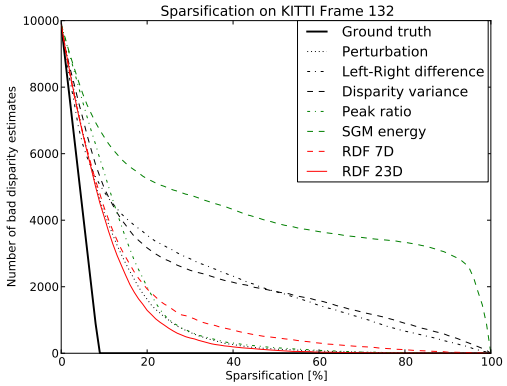

Sparsification on KITTI Frame 127
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

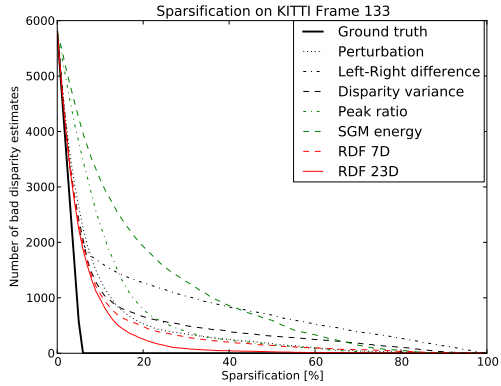

Sparsification on KITTI Frame 128
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

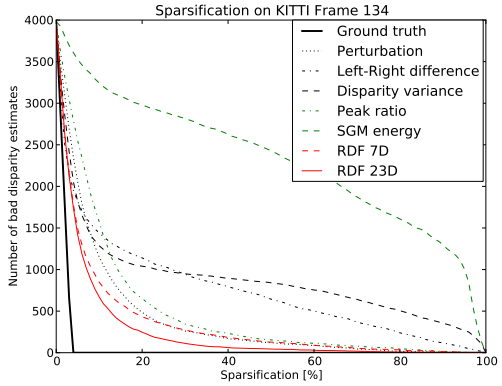

Sparsification on KITTI Frame 129
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

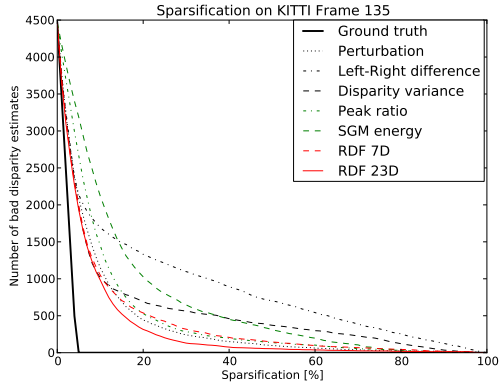

Sparsification on KITTI Frame 130
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

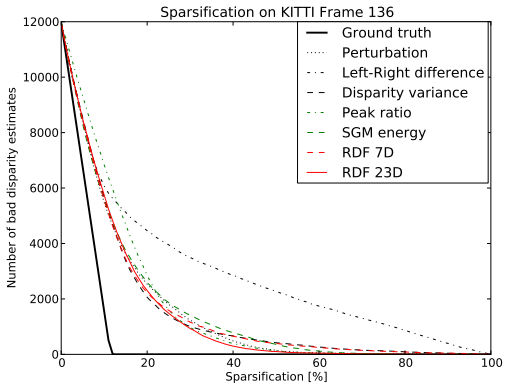

Sparsification on KITTI Frame 131
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

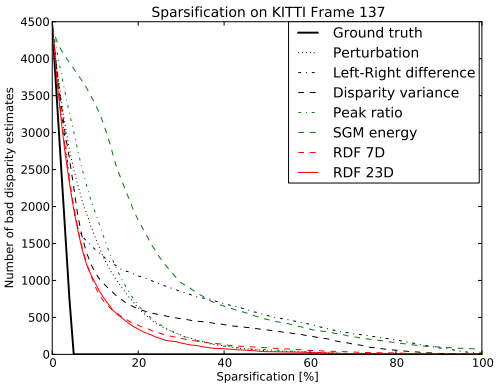

Sparsification on KITTI Frame 132
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

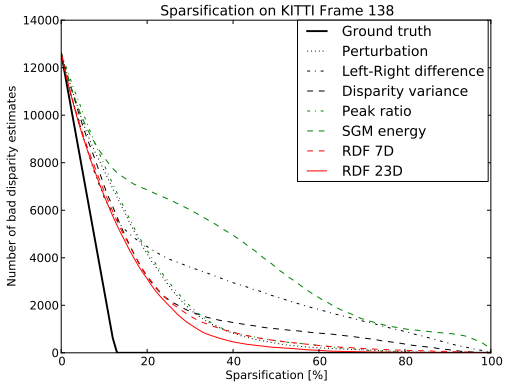

Sparsification on KITTI Frame 133
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

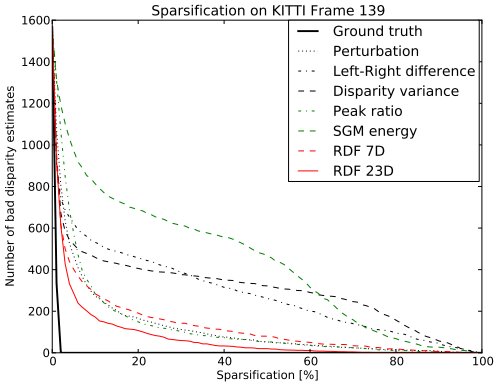

Sparsification on KITTI Frame 134
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

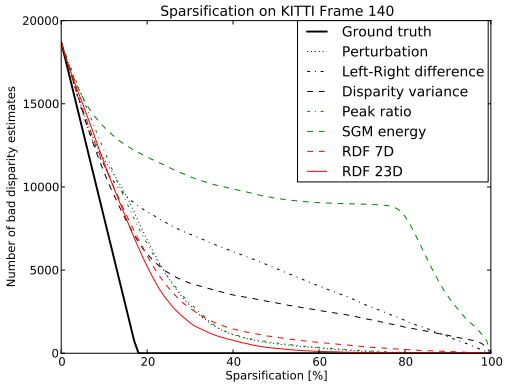

Sparsification on KITTI Frame 135
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

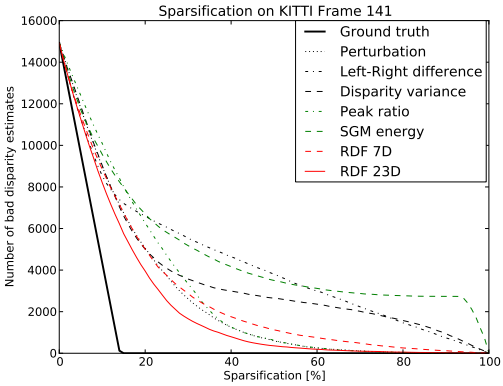

Sparsification on KITTI Frame 136
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

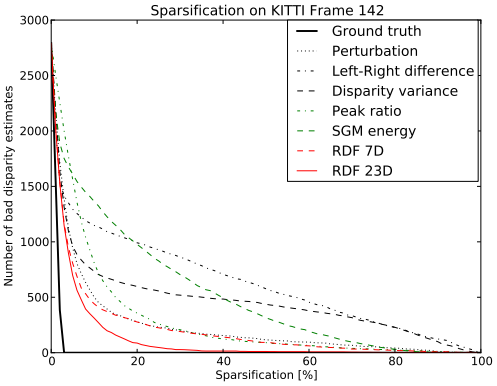

Sparsification on KITTI Frame 137
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

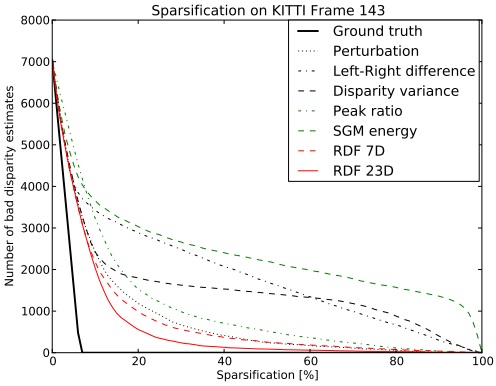

Sparsification on KITTI Frame 138
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

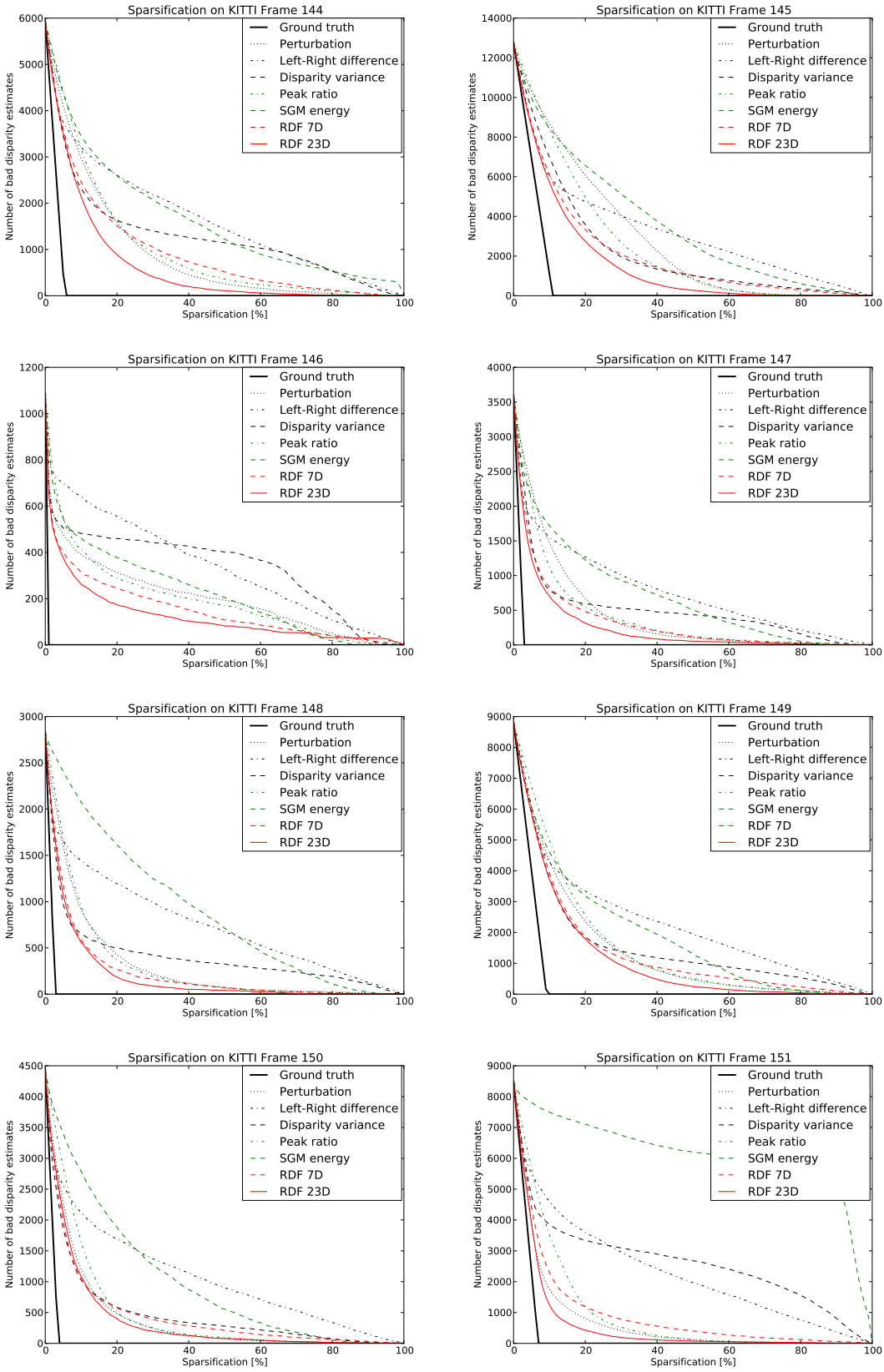

Sparsification on KITTI Frame 139
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

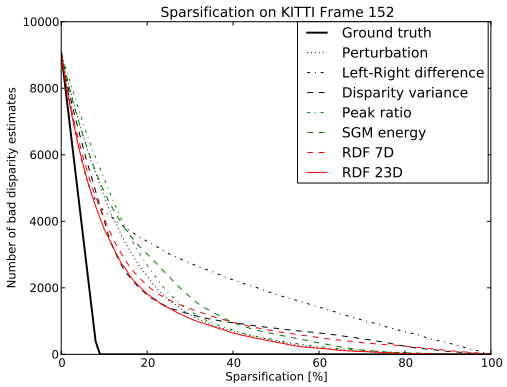

Sparsification on KITTI Frame 140
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

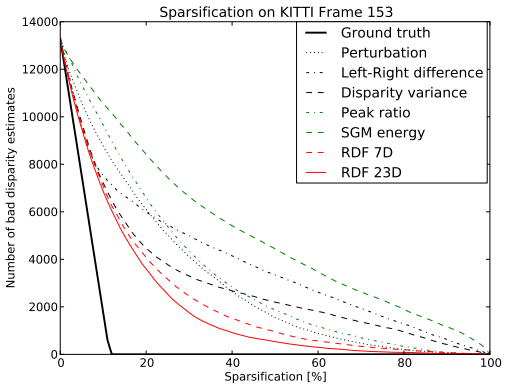

Sparsification on KITTI Frame 141
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

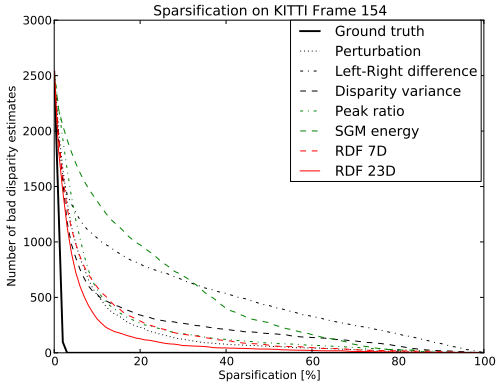

Sparsification on KITTI Frame 142
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

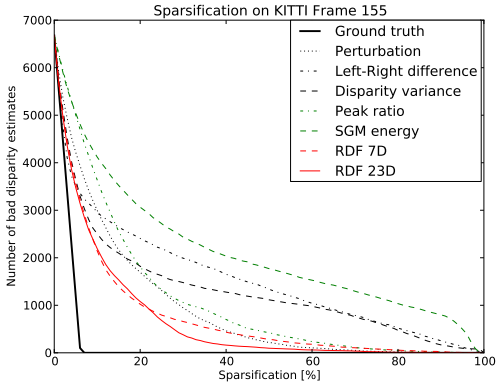

Sparsification on KITTI Frame 143
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

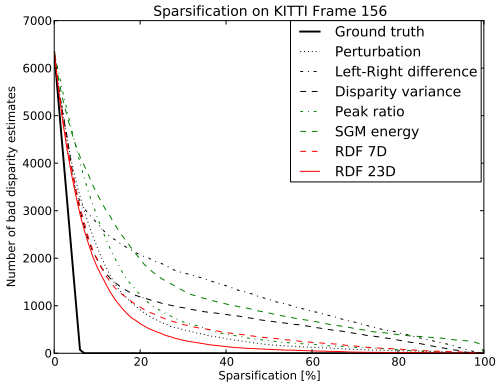

Sparsification on KITTI Frame 144
Sparsification on KITTI Frame 145
Sparsification on KITTI Frame 146
Sparsification on KITTI Frame 147
Sparsification on KITTI Frame 148
Sparsification on KITTI Frame 149
Sparsification on KITTI Frame 150
Sparsification on KITTI Frame 151
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D
Number of bad disparity estimates
Sparsification [%]

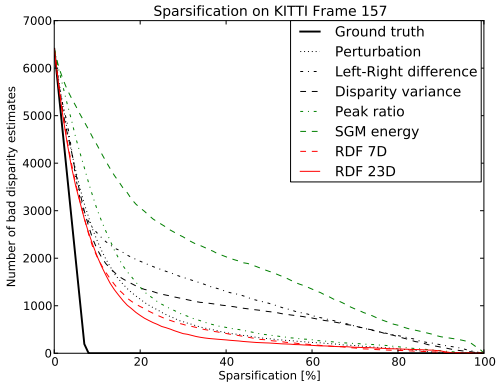

Sparsification on KITTI Frame 152
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

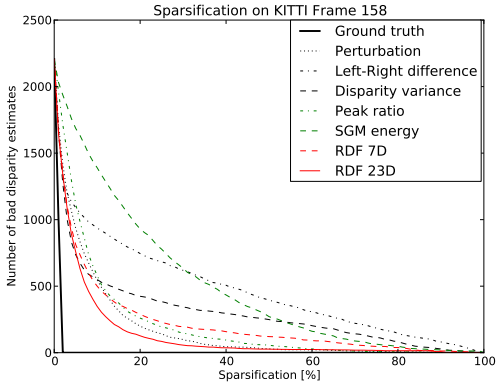

Sparsification on KITTI Frame 153
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

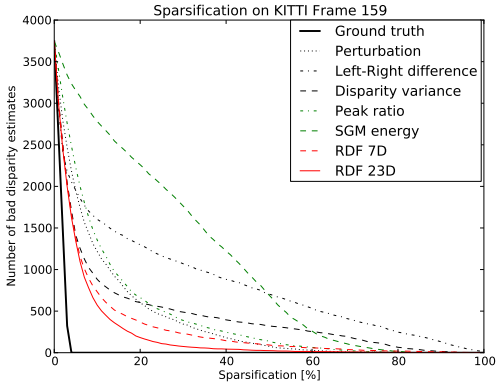

Sparsification on KITTI Frame 154
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

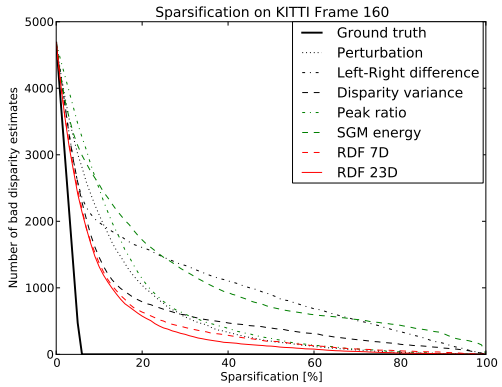

Sparsification on KITTI Frame 155
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

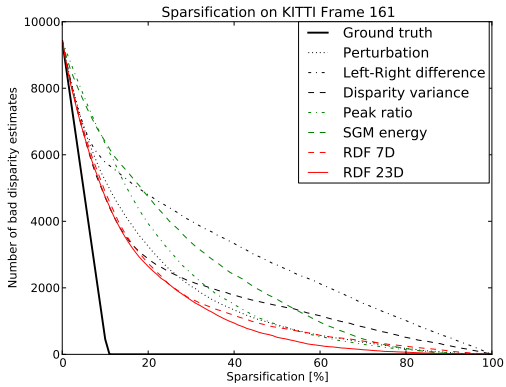

Sparsification on KITTI Frame 156
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

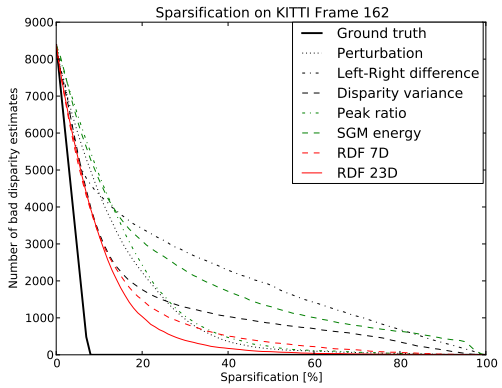

Sparsification on KITTI Frame 157
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

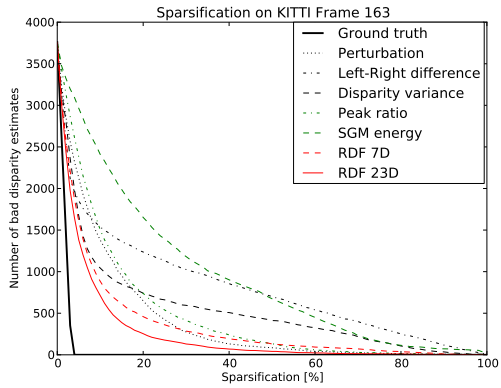

Sparsification on KITTI Frame 158
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

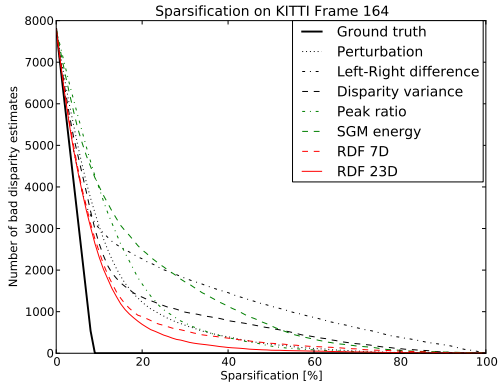

Sparsification on KITTI Frame 159
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

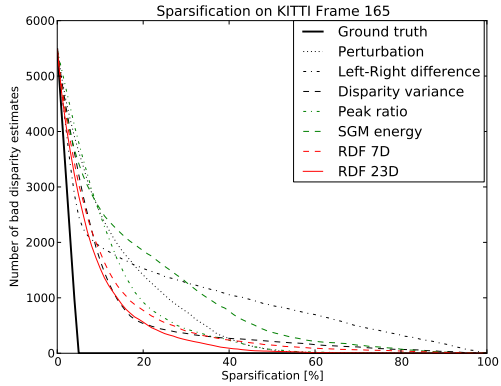

Sparsification on KITTI Frame 160
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

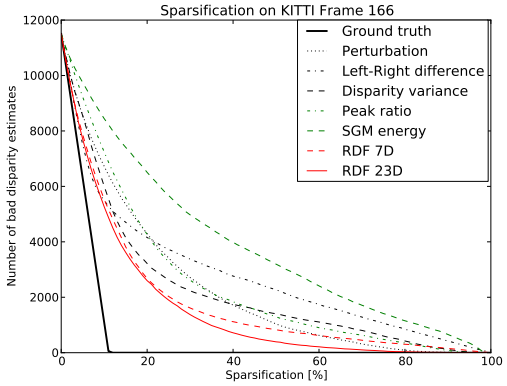

Sparsification on KITTI Frame 161
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

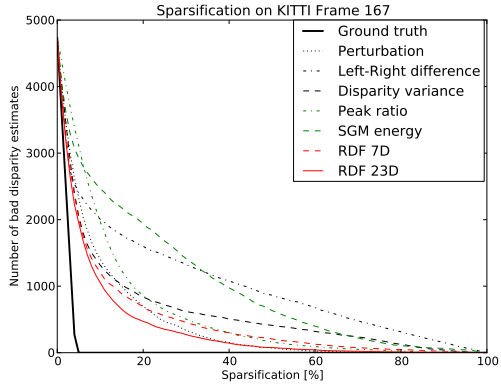

Sparsification on KITTI Frame 162
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

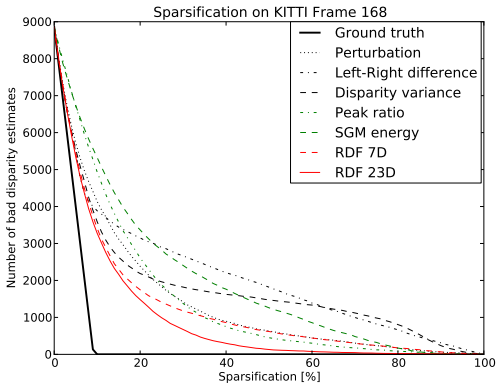

Sparsification on KITTI Frame 163
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

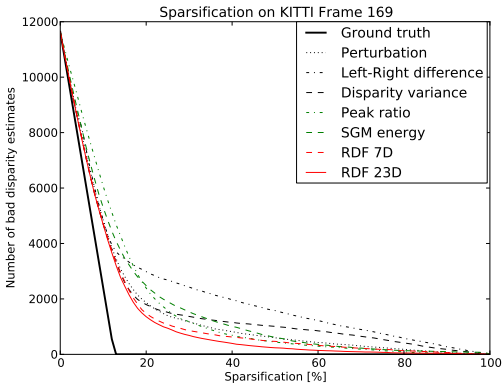

Sparsification on KITTI Frame 164
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

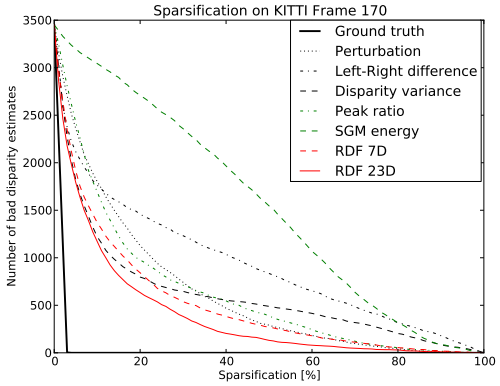

Sparsification on KITTI Frame 165
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

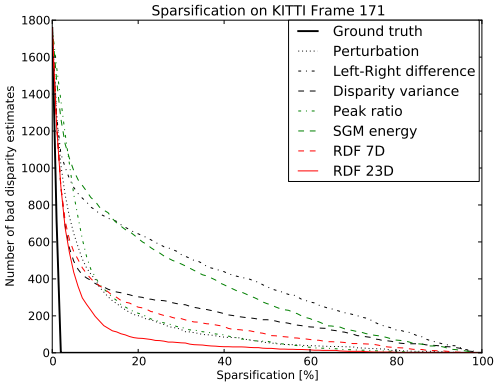

Sparsification on KITTI Frame 166
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

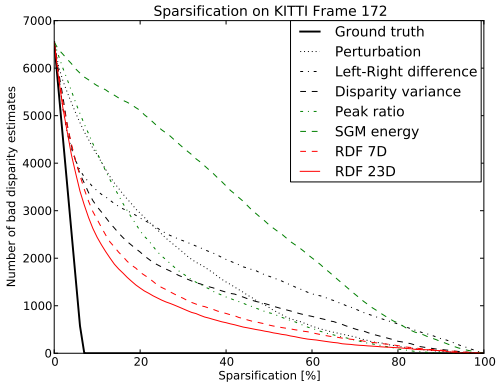

Sparsification on KITTI Frame 167
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

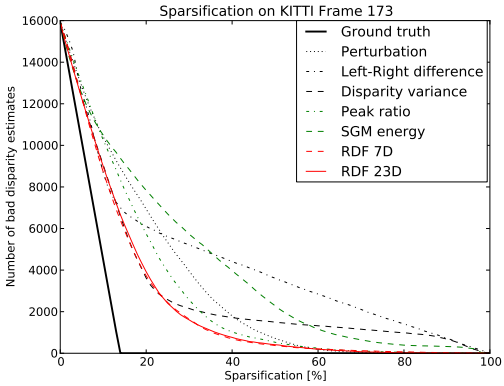

Sparsification on KITTI Frame 168
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

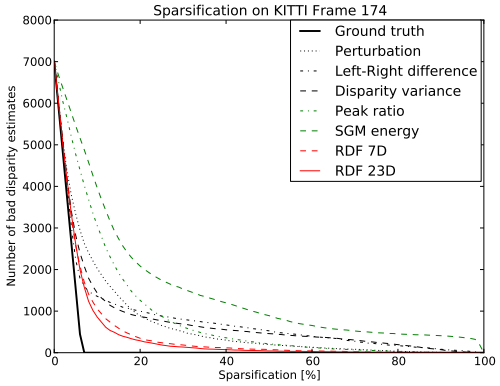

Sparsification on KITTI Frame 169
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

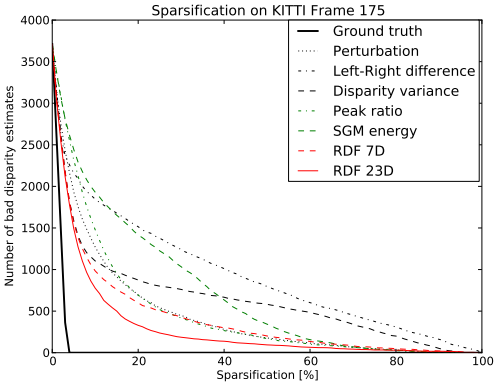

Sparsification on KITTI Frame 170
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

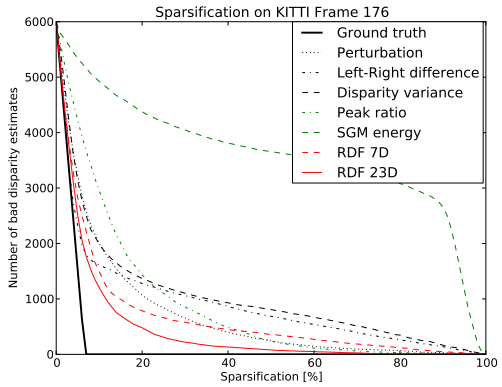

Sparsification on KITTI Frame 171
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

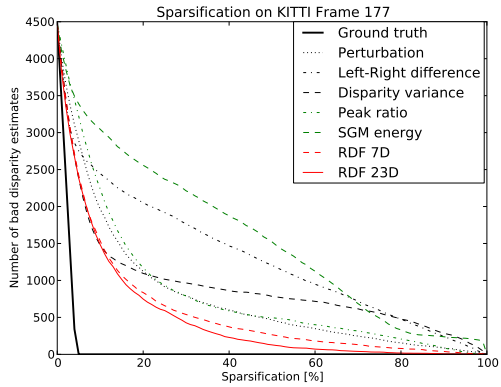

Sparsification on KITTI Frame 172
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

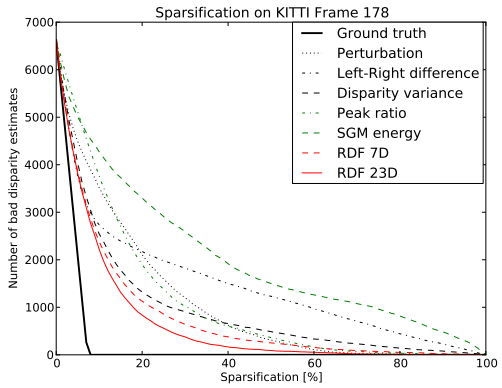

Sparsification on KITTI Frame 173
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

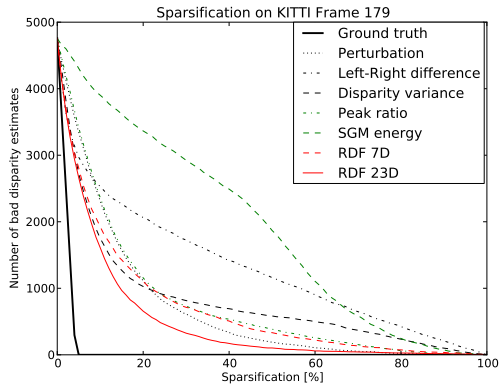

Sparsification on KITTI Frame 174
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

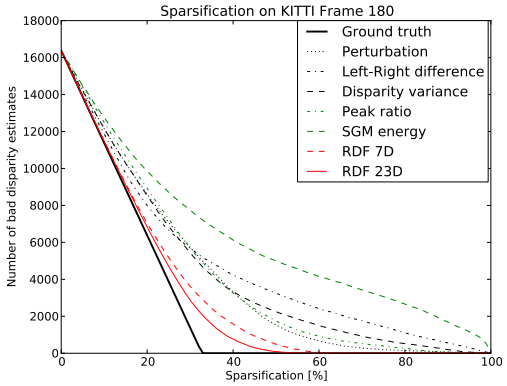

Sparsification on KITTI Frame 175
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

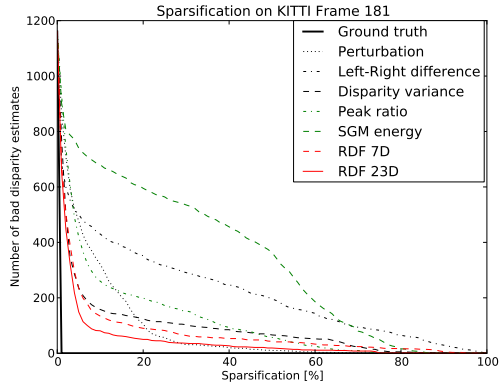

Sparsification on KITTI Frame 176
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

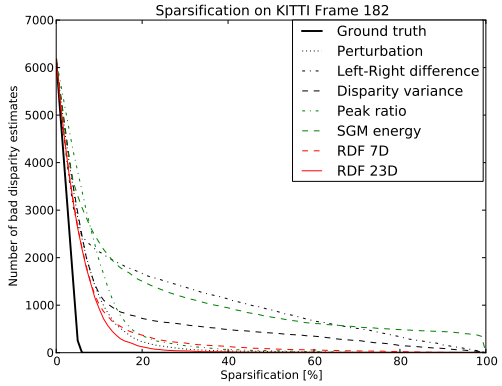

Sparsification on KITTI Frame 177
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

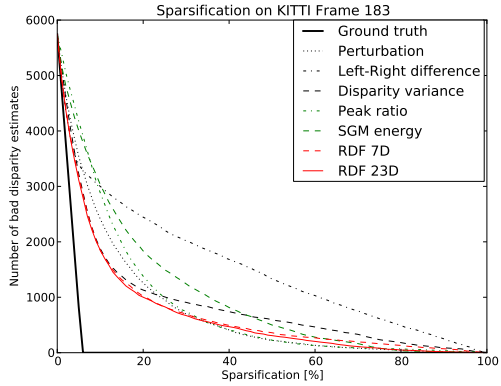

Sparsification on KITTI Frame 178
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

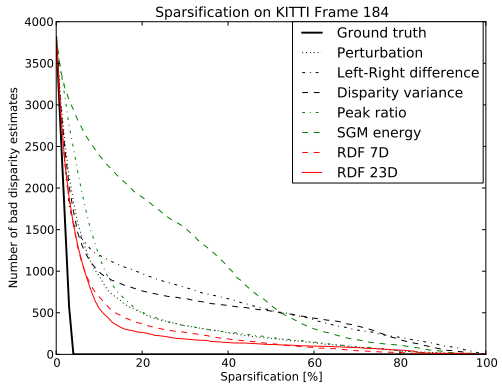

Sparsification on KITTI Frame 179
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

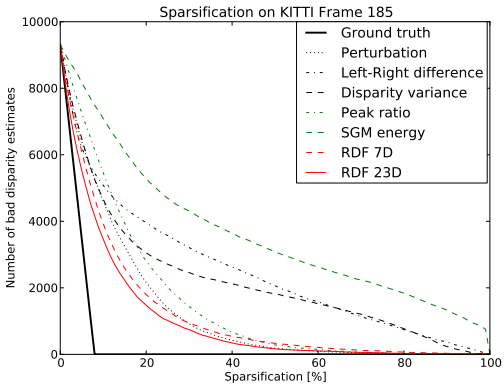

Sparsification on KITTI Frame 180
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

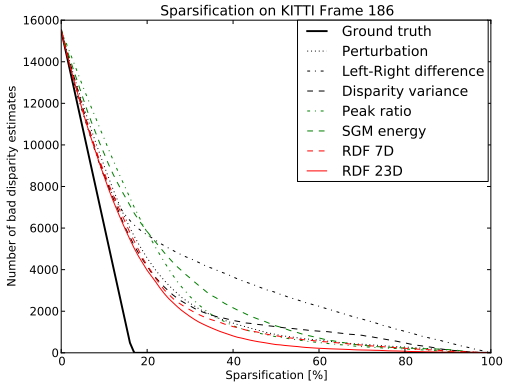

Sparsification on KITTI Frame 181
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

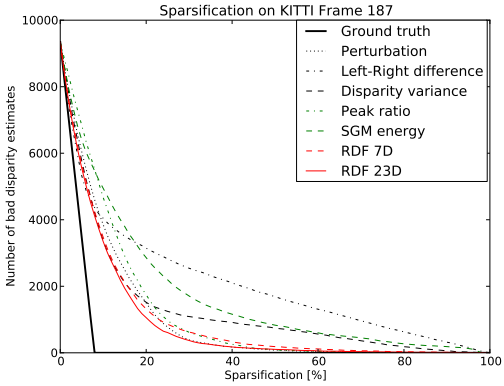

Sparsification on KITTI Frame 182
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

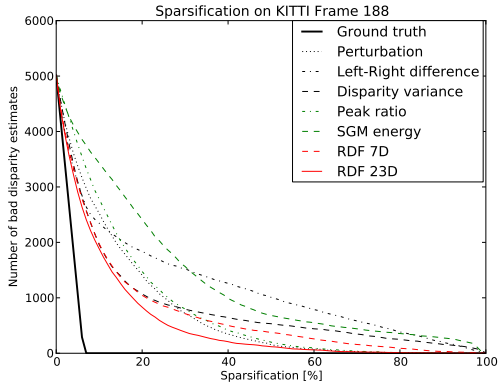

Sparsification on KITTI Frame 183
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

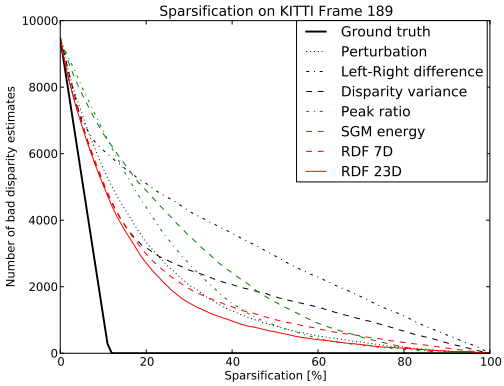

Sparsification on KITTI Frame 184
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

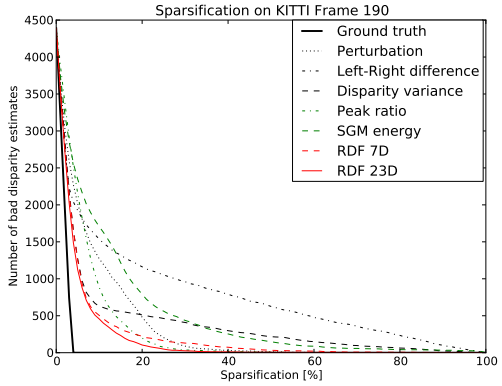

Sparsification on KITTI Frame 185
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

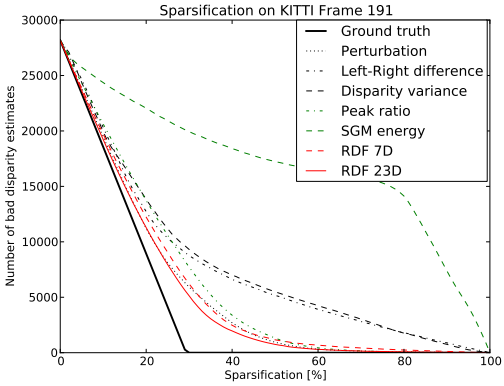

Sparsification on KITTI Frame 186
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

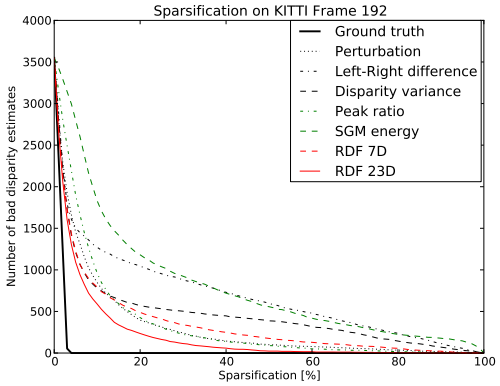

Sparsification on KITTI Frame 187
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D

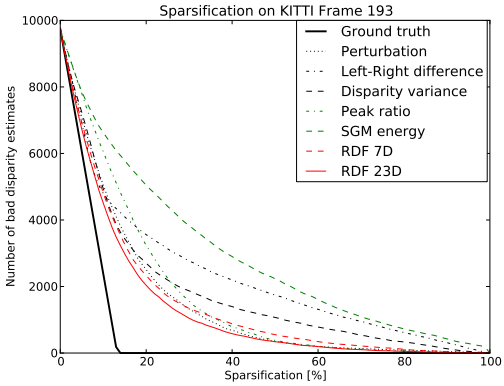

Sparsification on KITTI Frame 188
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D


Sparsification on KITTI Frame 189
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D


Sparsification on KITTI Frame 190
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D


Sparsification on KITTI Frame 191
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D


Sparsification on KITTI Frame 192
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D
0
500
1000
1500
2000
2500
3000
3500
4000
0
20
40
60
80
100


Sparsification on KITTI Frame 193
Number of bad disparity estimates
Sparsification [%]
Ground truth
Perturbation
Left-Right difference
Disparity variance
Peak ratio
SGM energy
RDF 7D
RDF 23D
0
2000
4000
6000
8000
10000
0
20
40
60
80
100