

Real-time Halfway Domain Reconstruction of Motion and Geometry

— Supplemental Material —

Lucas Thies¹ Michael Zollhöfer² Christian Richardt^{2,3,4} Christian Theobalt² Günther Greiner¹

¹University of Erlangen-Nuremberg ²Max Planck Institute for Informatics ³Intel Visual Computing Institute ⁴University of Bath

{lucas.thies, guenther.greiner}@fau.de {mzollhoefer, richardt, theobalt}@mpi-inf.mpg.de

	Figure 2	Figures 5, 6, 8	Figures 7, 9
w_{reg}	1.0	0.5	5.0
w_{photo}	1.0	0.5	1.0
w_{grad}	2.0	5.0	5.0
w_{epi}	0.0	0.5	0.5
w_{s}	5.0	0.75	0.5
w_{m}	5.0	0.5	1.0
w_{d}	0.5	0.01	1.0
m_{s}	5.0	0.5	0.1
m_{m}	100.0	10.0	10000.0
m_{d}	1000.0	100.0	10000.0

Table 1. All used parameters.

1. Parameter Settings

The specific choice of parameters influences our scene flow energy and the reconstruction results. Our approach is quite robust to variation in the specific parameter values. Nevertheless, the best reconstruction results are obtained at the sweet spot between the data fitting term and the prior constraints. Table 1 provides the parameter settings used to generate the results. The two parameters $w_{\text{smooth}} = 1$ and $w_{\text{mag}} = 1$ are constant during all experiments.