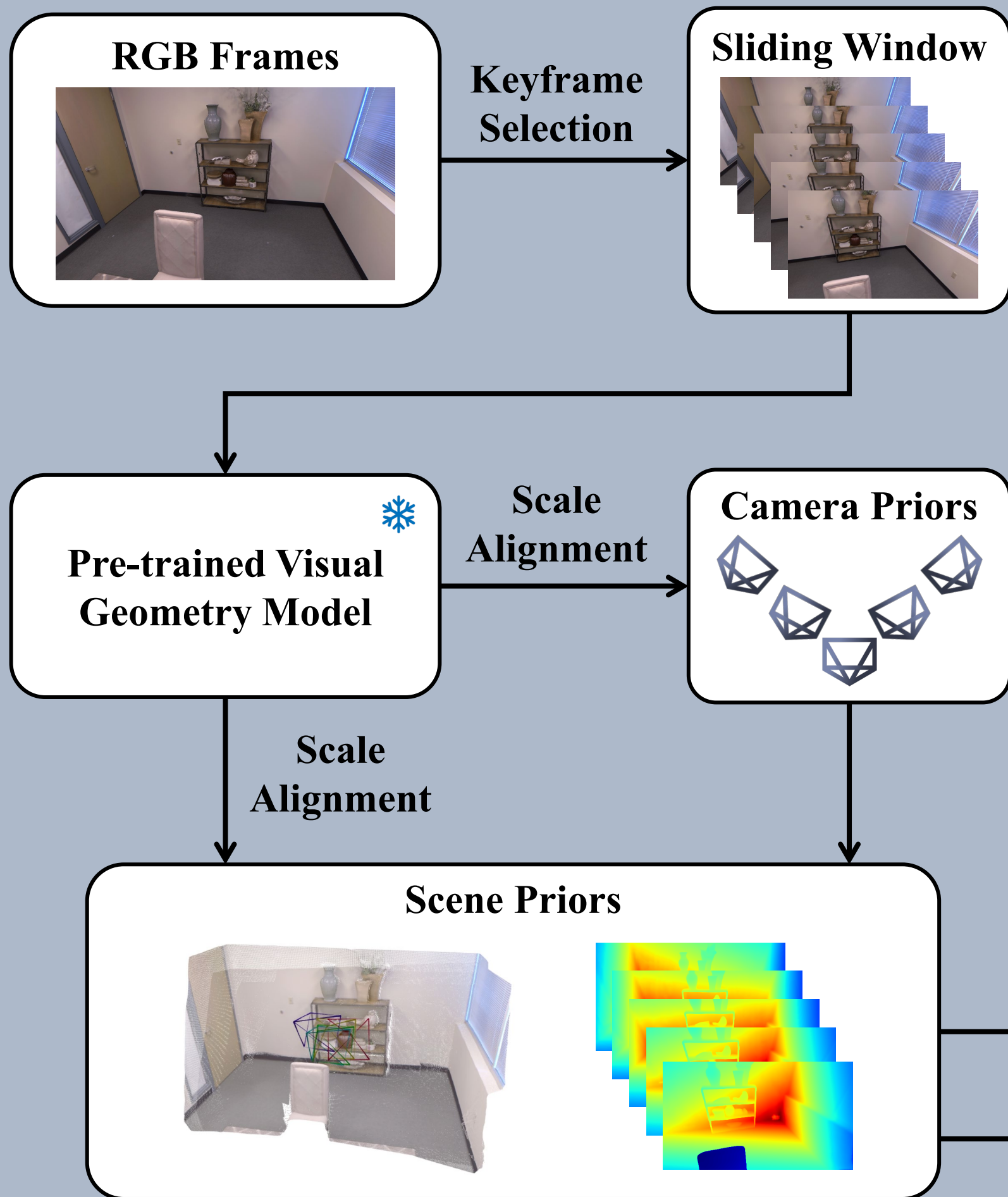
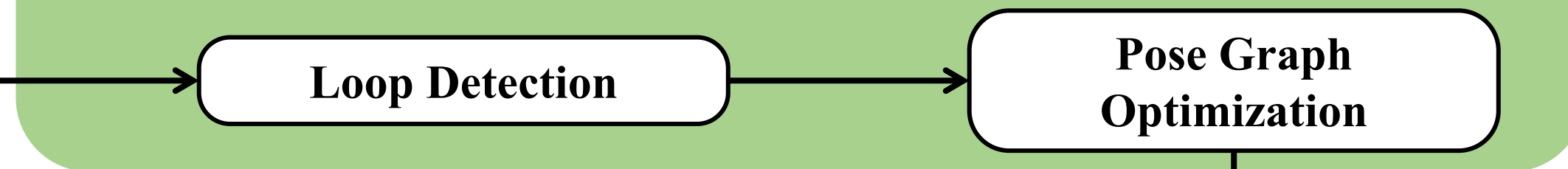


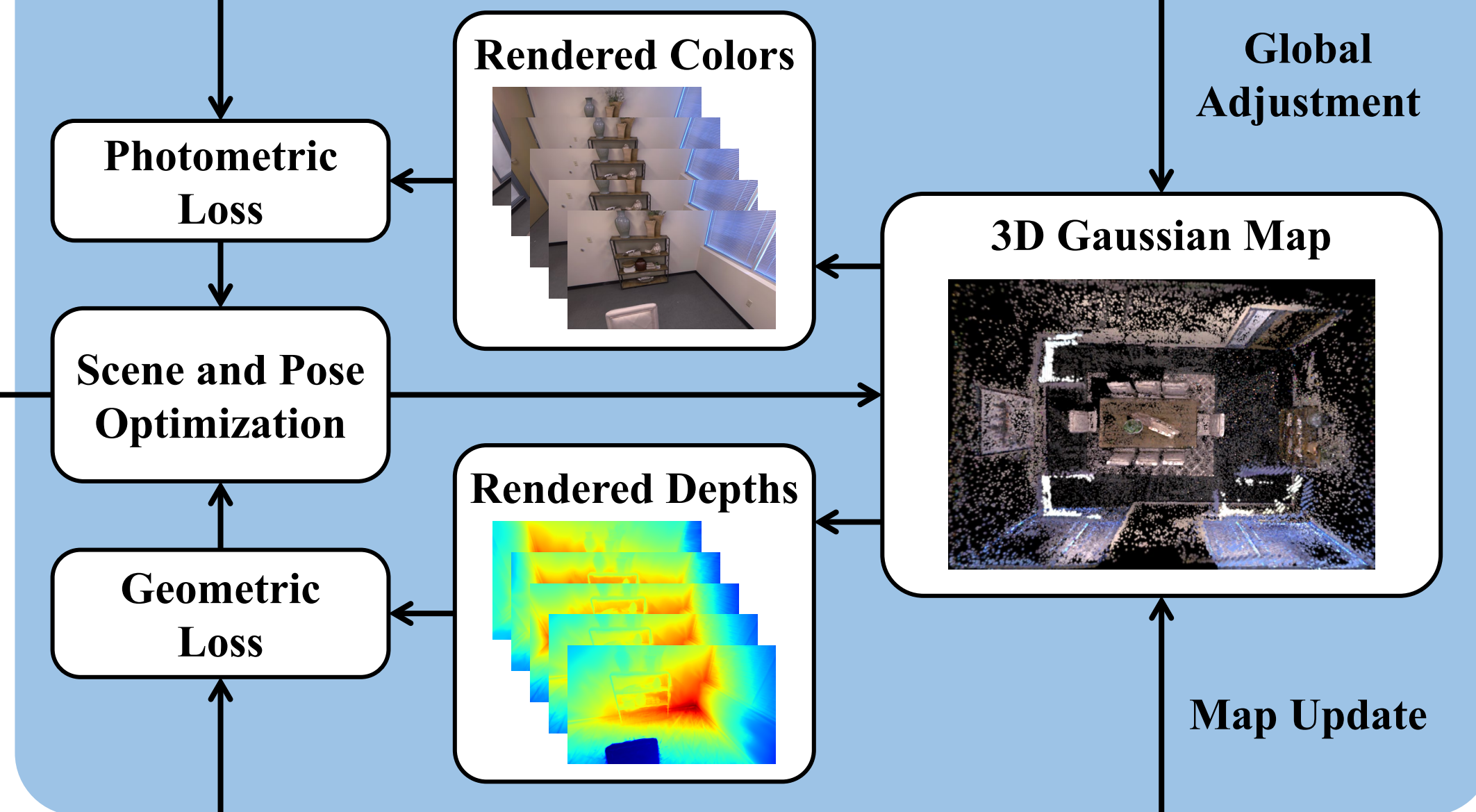
### (a) Geometric Prior Prediction



### (d) Online Loop Closure



### (c) Joint Optimization



### (b) Map Expansion

