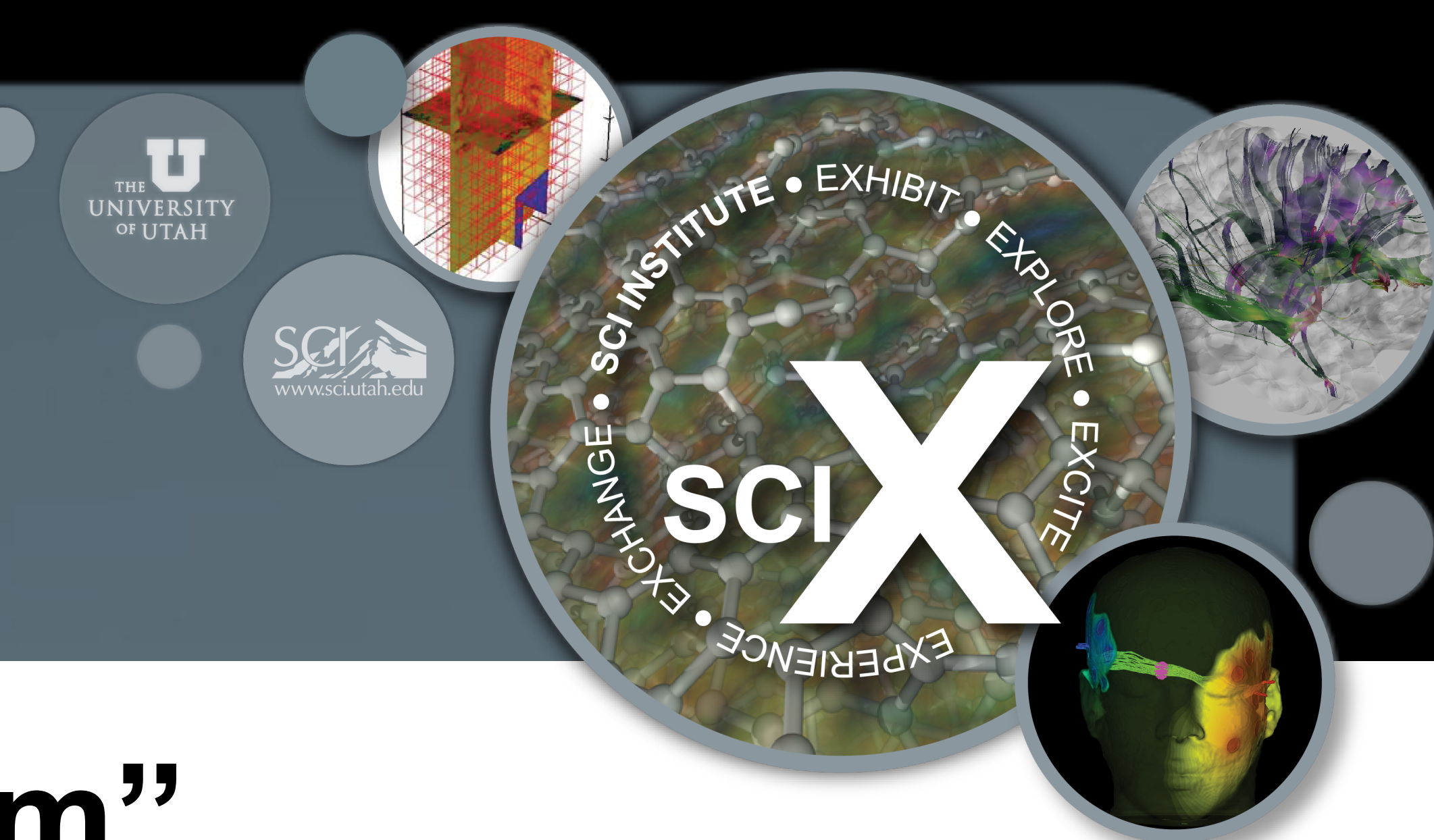
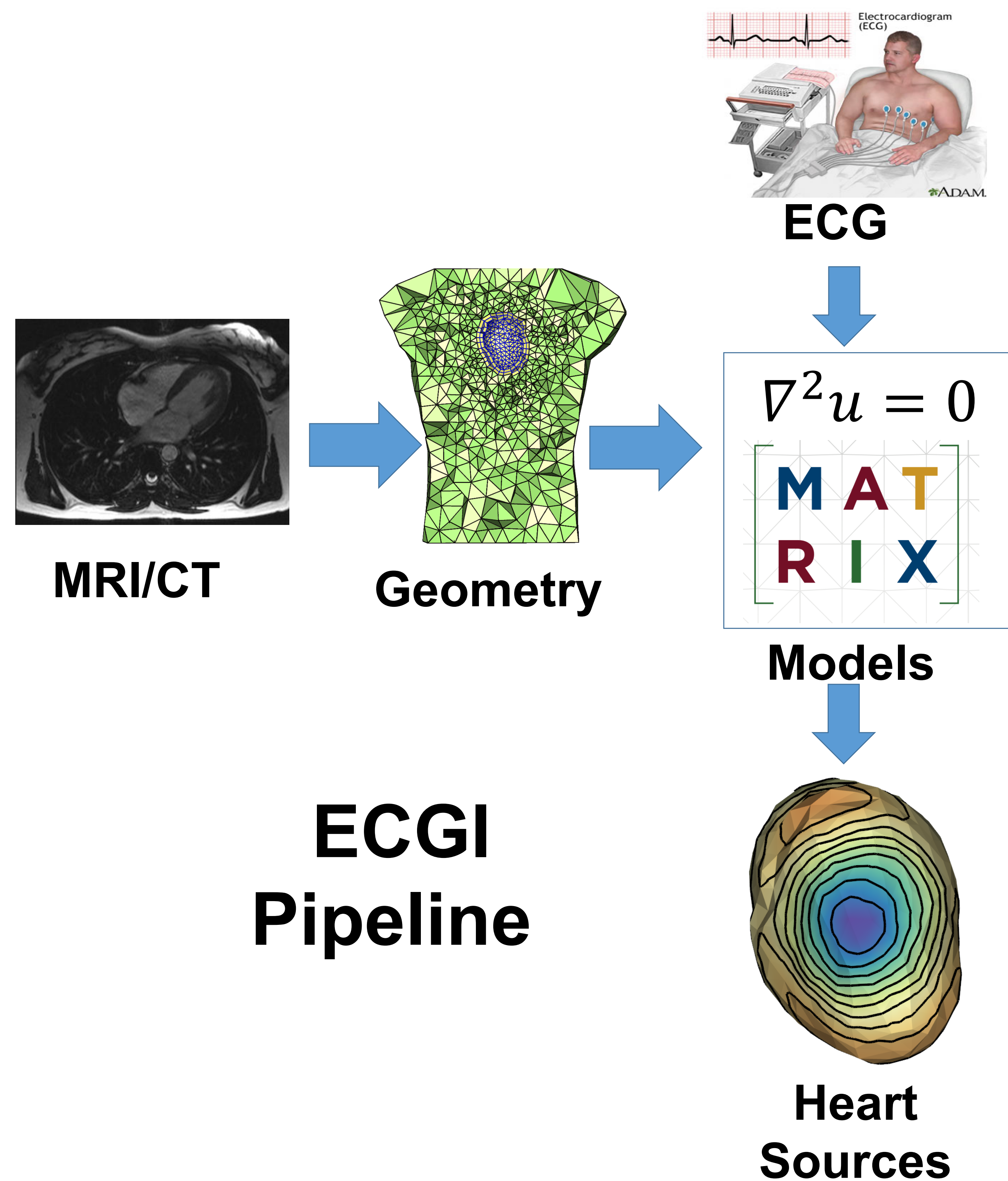


Electrocardiographic Imaging (ECGI)

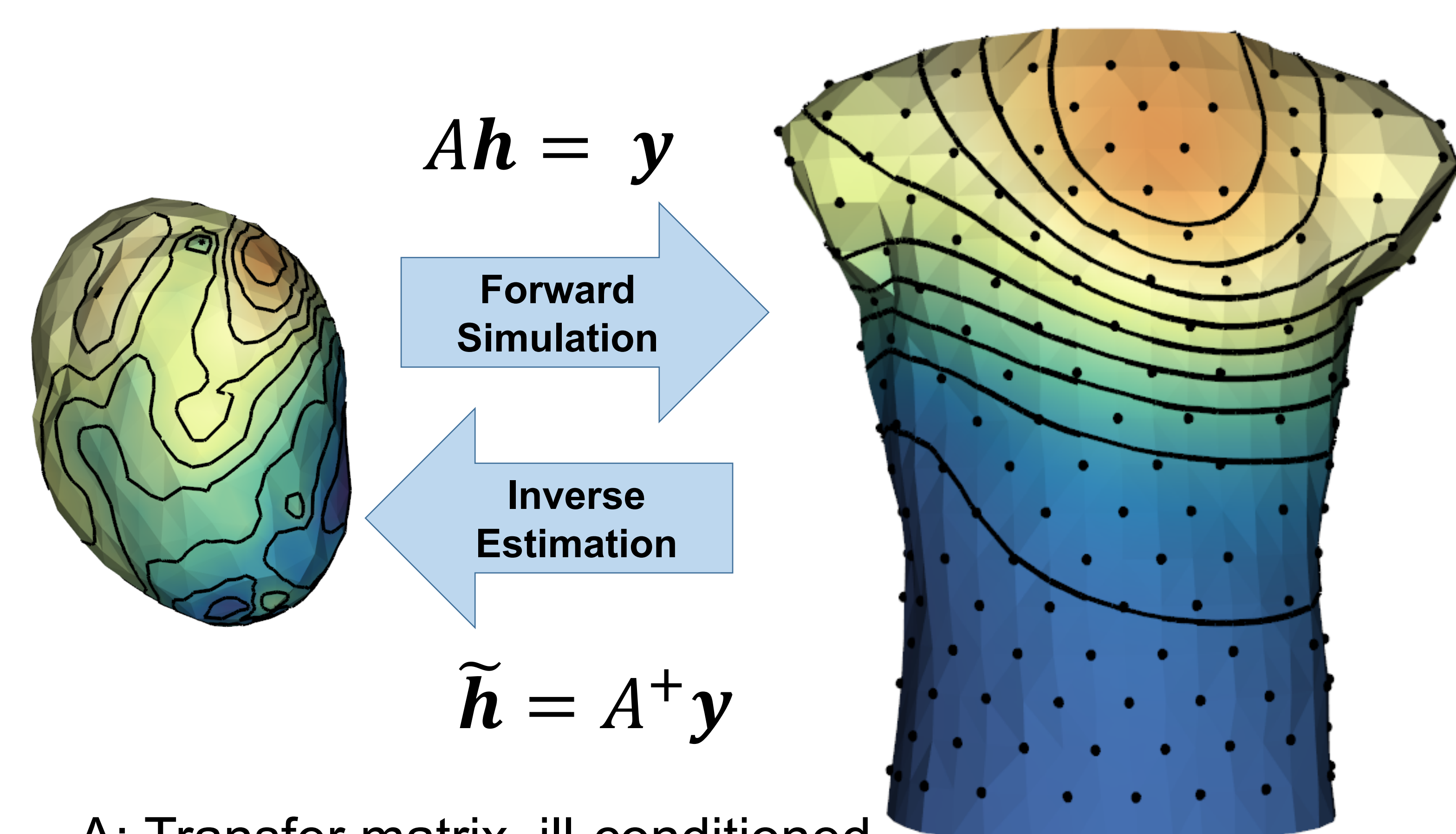
Computational Electrophysiology Group



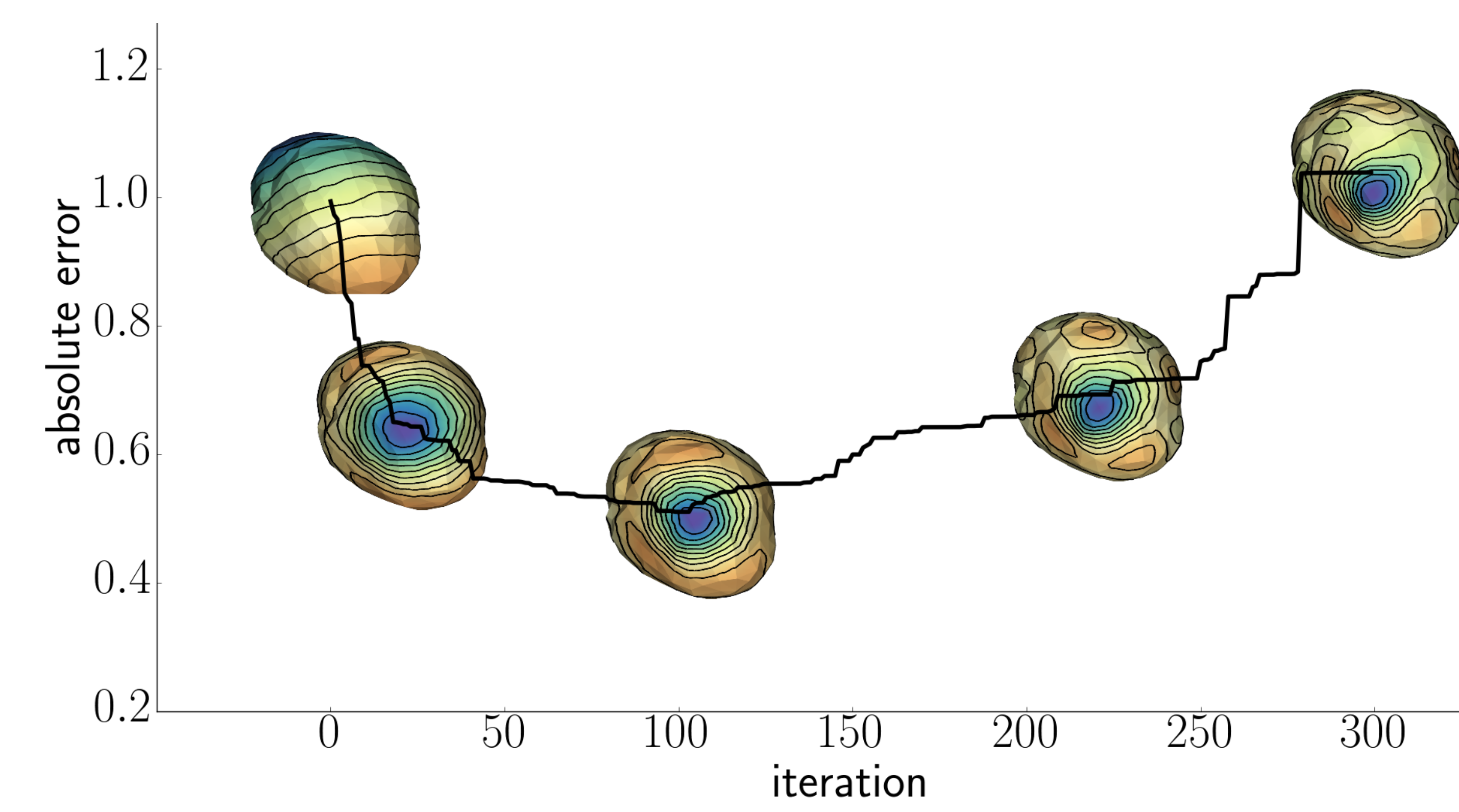
What is ECGI?



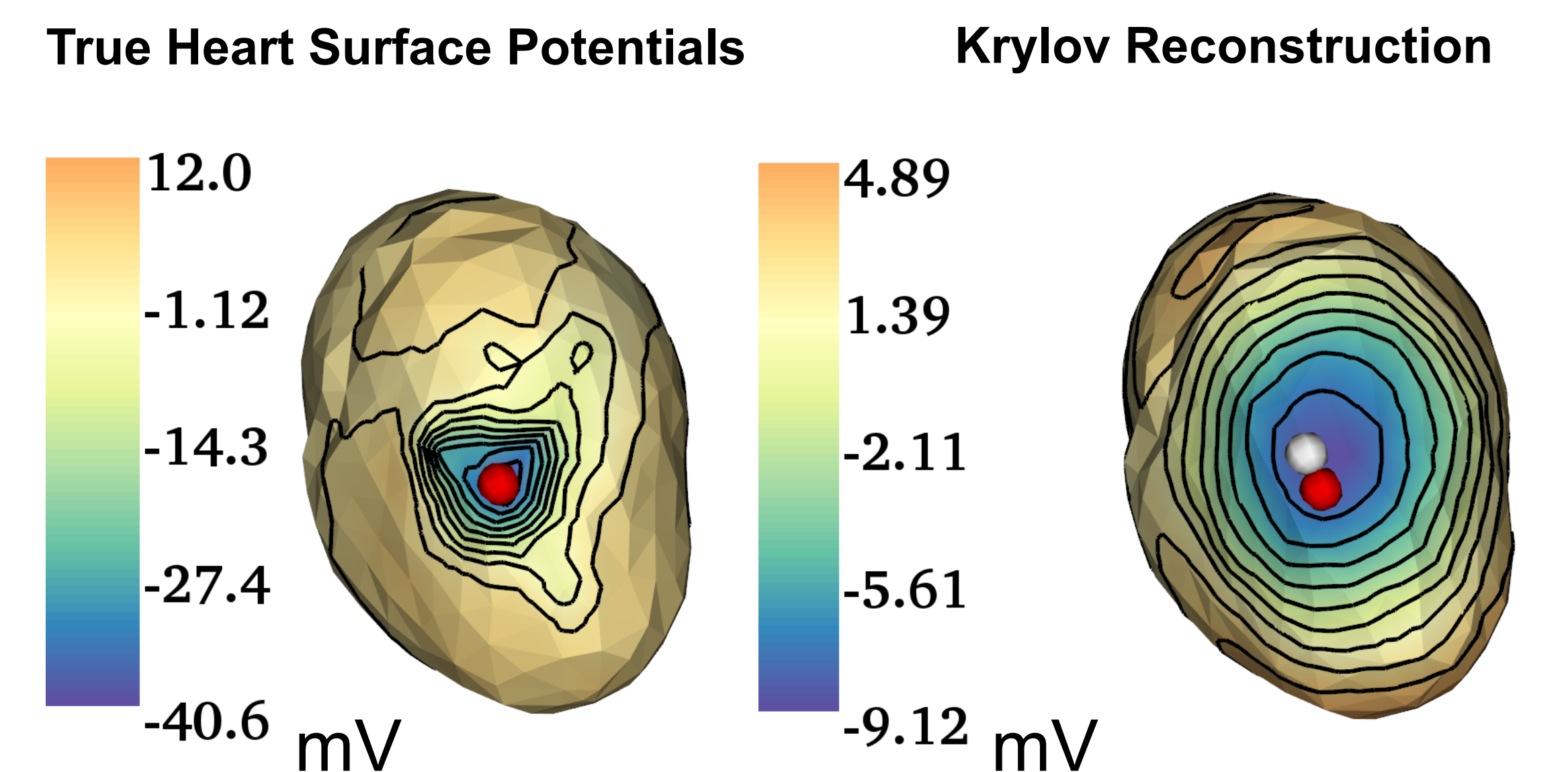
An "Inverse Problem"



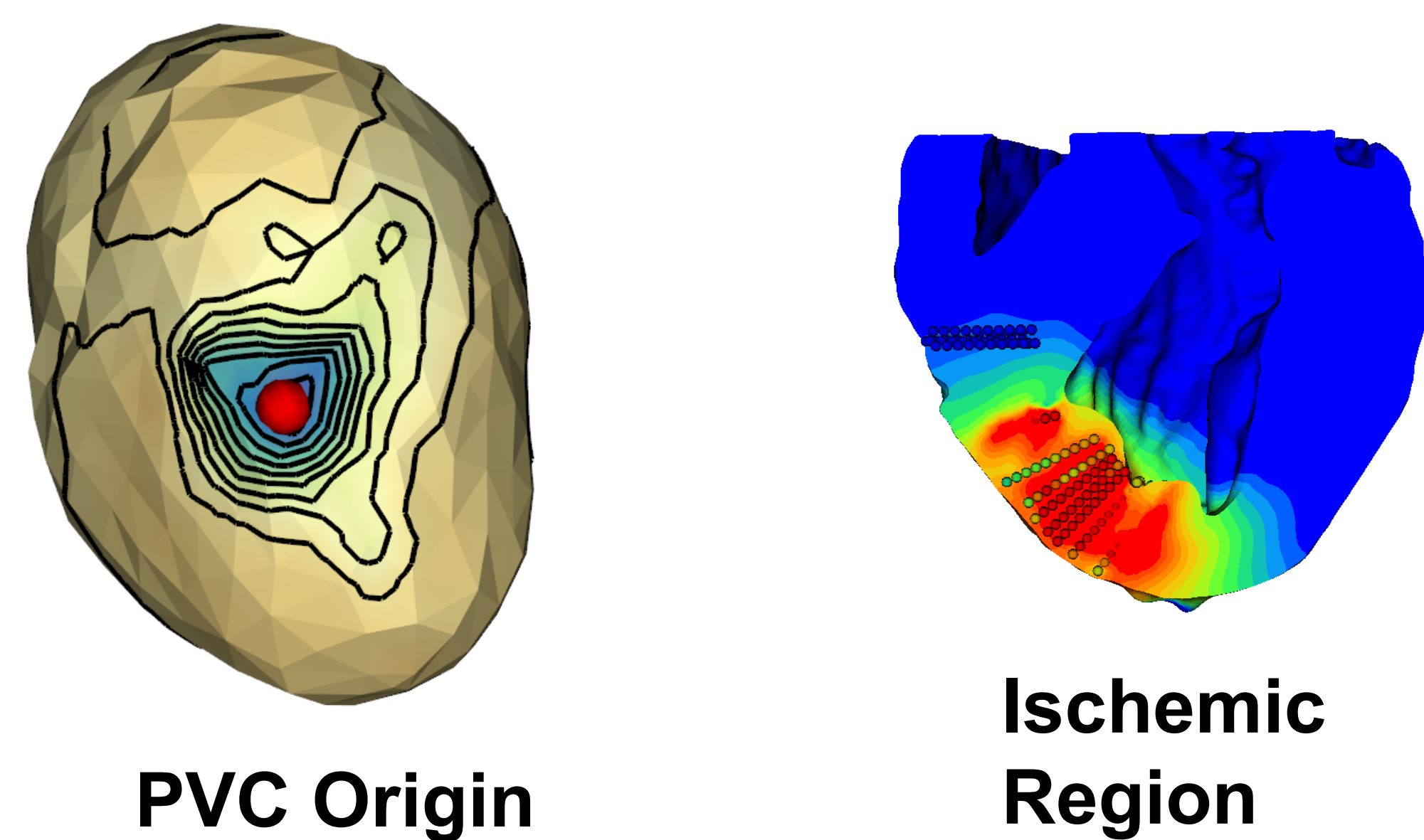
A: Transfer matrix, ill-conditioned
ECGI requires solving an ill-posed inverse problem.



Krylov iterative regularization

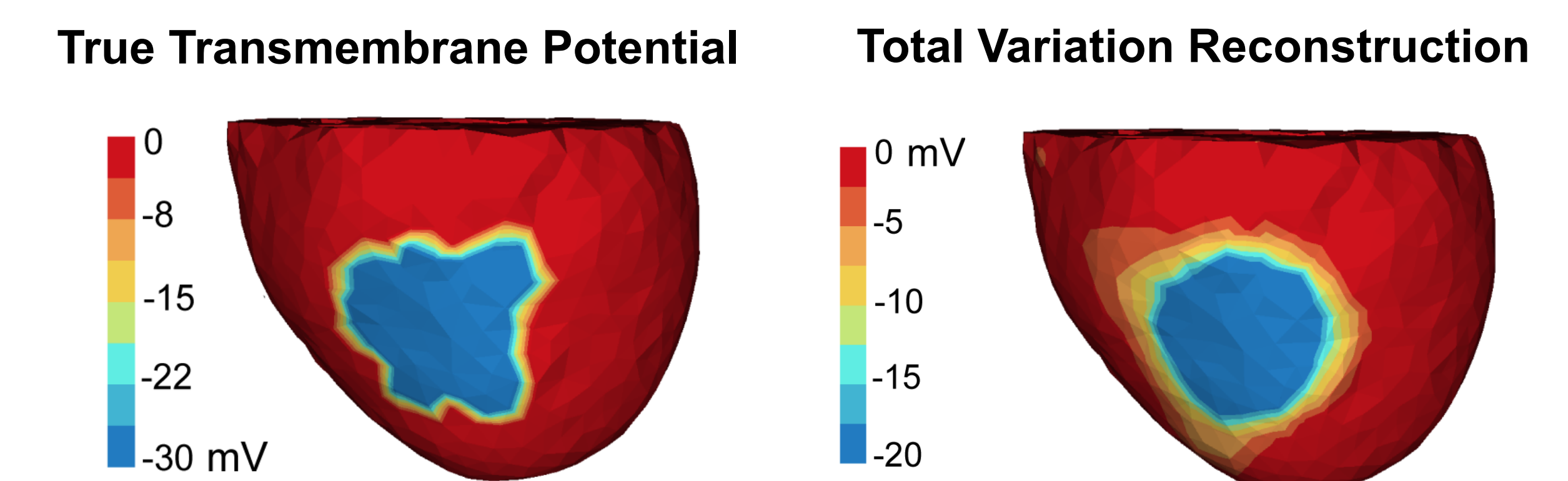
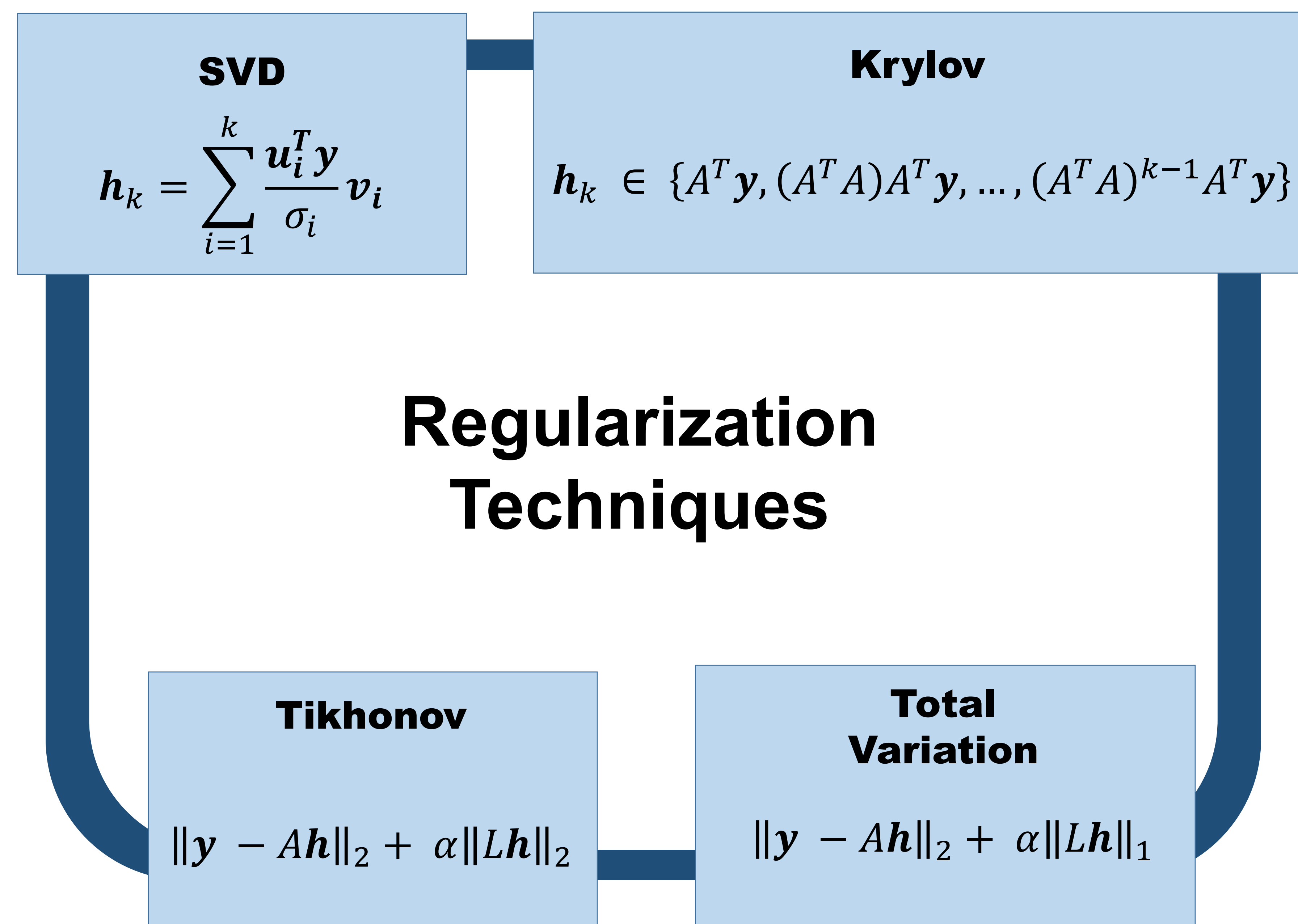


Krylov regularization for PVC localization



ECGI for ischemia and premature ventricular contraction (PVC)

Regularization Techniques



Total variation for ischemia localization