

Rejection ABC

Alternative approach

- Instead of choosing a fixed threshold we can instead sample a very large artificial data set and choose a fraction of samples that are most similar to the observed data
- Threshold can then be calculated after the simulation as the largest distance that was still accepted
- The approach can be used in smaller scale to find out reasonable threshold levels for sampling based ABC methods

Rejection ABC uses samples from the prior

- Unless we have plenty of prior information about the parameters, sampling from prior is hardly effective
- Sequentially formulate importance sampling distributions with more probability mass in interesting regions
 - Sequential Monte Carlo ABC