



HLM2: REML and FML estimation

By default, HLM2 uses restricted maximum likelihood during estimation. Full maximum likelihood is available as an option and, in the case of HGLM models PQL, Laplace or Adaptive Gaussian Quadrature may be used. There are certain features when HLM2 will automatically use full maximum likelihood as method of estimation:

- ML methods for non-continuous outcomes, in other words, EM-Laplace and adaptive Gaussian quadrature,
- when design weights are specified,
- when latent variable regression is requested,
- in the case of spatial dependence models, and
- when the heterogeneous σ^2 option is invoked.

Note also that no standard errors are available for the variance components σ^2 and τ unless FML is chosen. Standard errors of the estimated parameters are only accurate when weighting is used in conjunction with full ML.