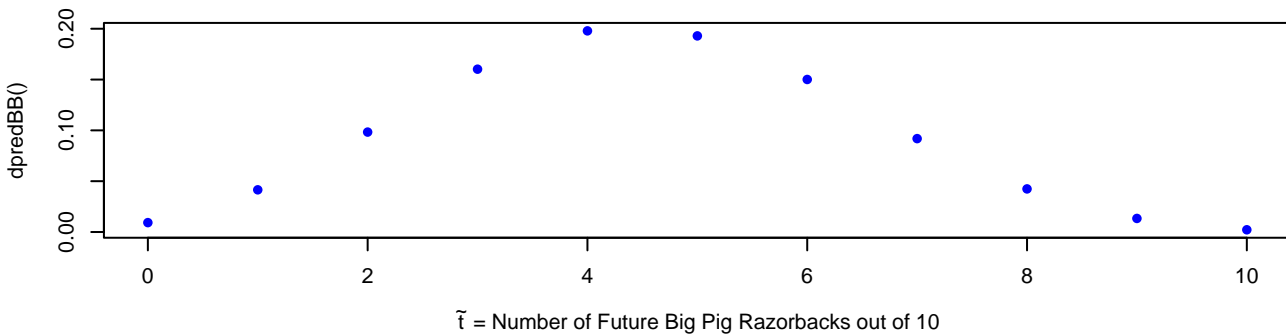
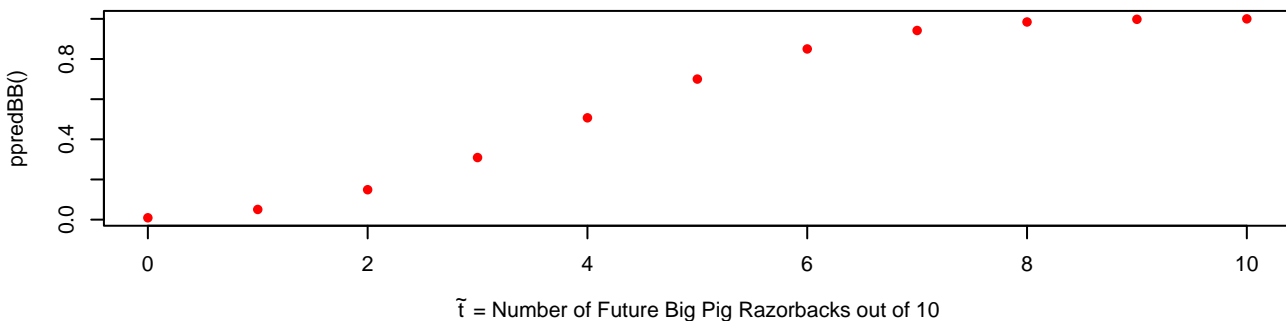


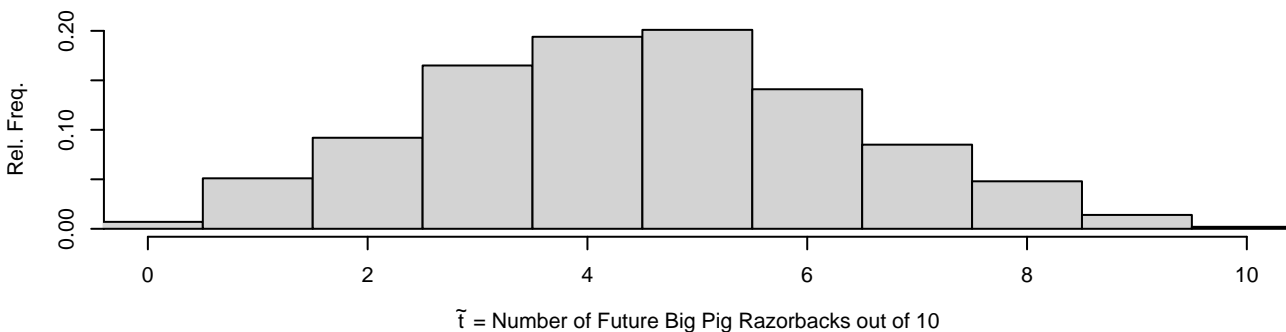
**Beta-Binomial Predictive Probability Mass**



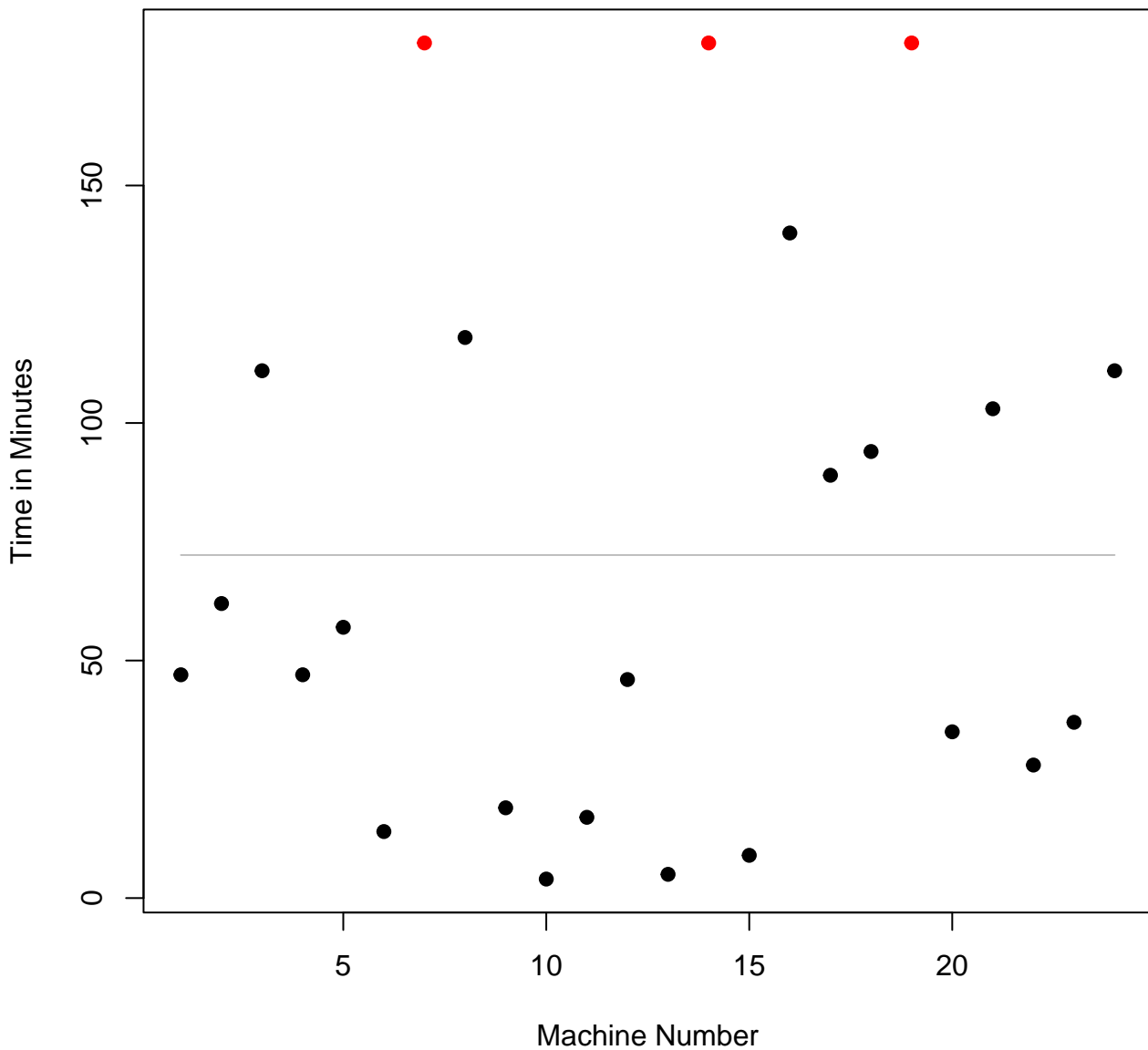
**Beta-Binomial Cumulative Predictive Probability**



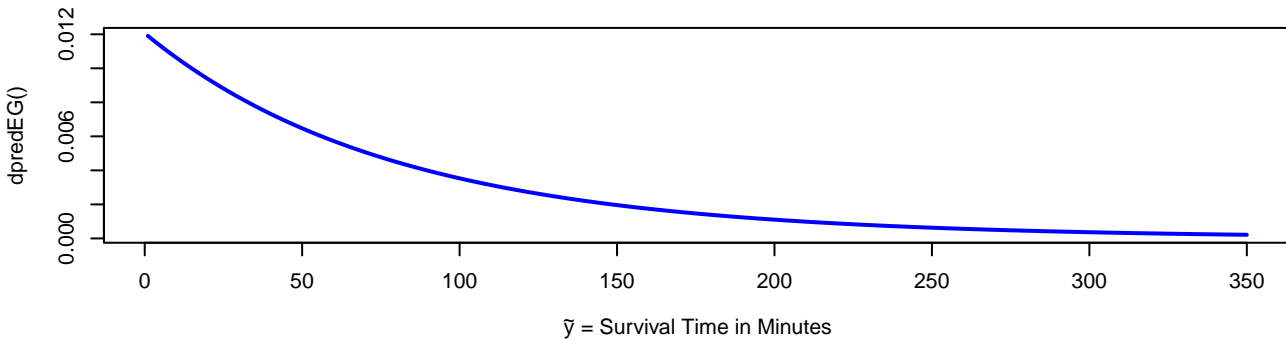
**Histogram of Predictive Sample**



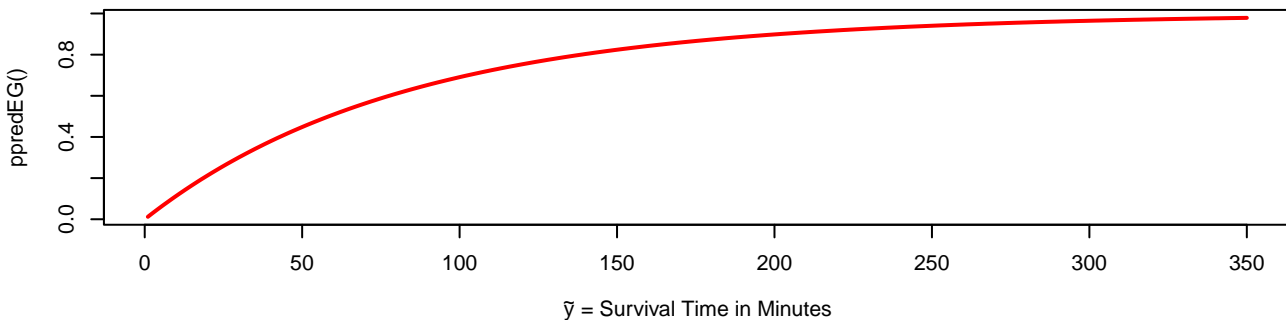
# Machine Tool Lifetimes



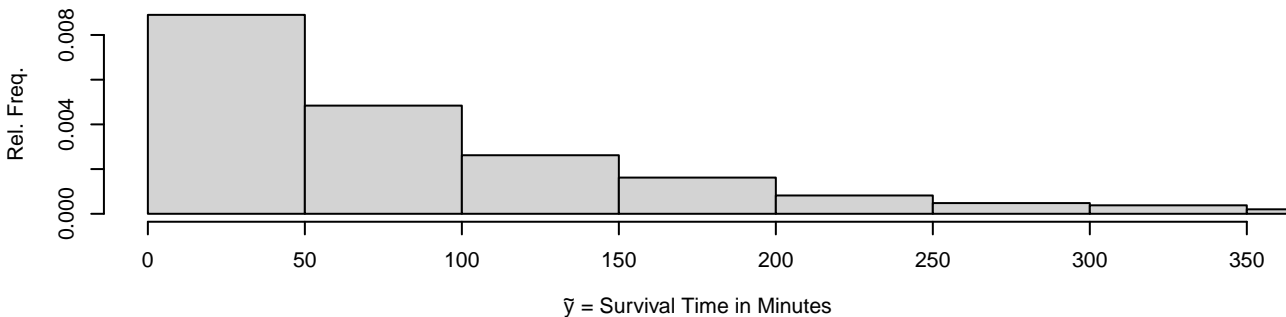
### Exponential-Gamma Predictive Density



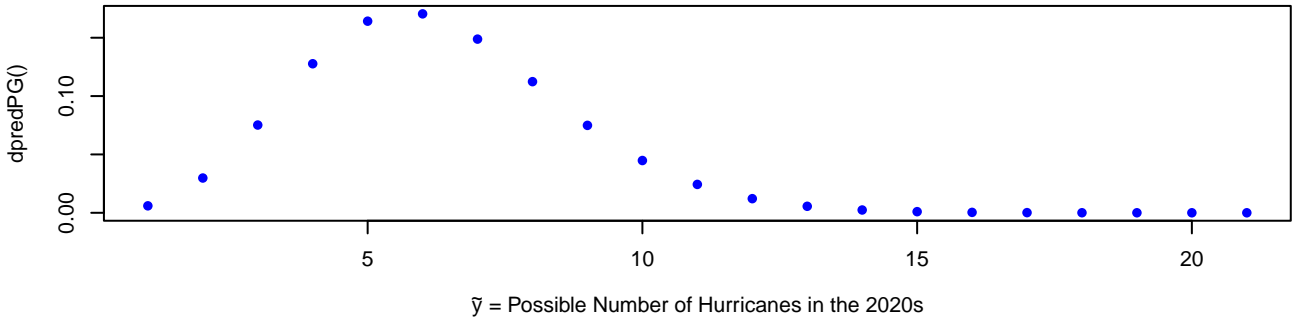
### Exponential-Gamma Cumulative Predictive Probability



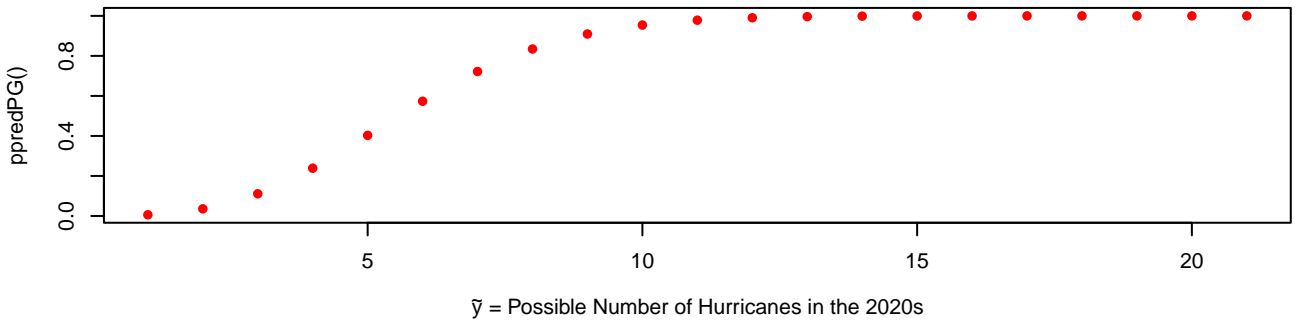
### Histogram of Predictive Sample



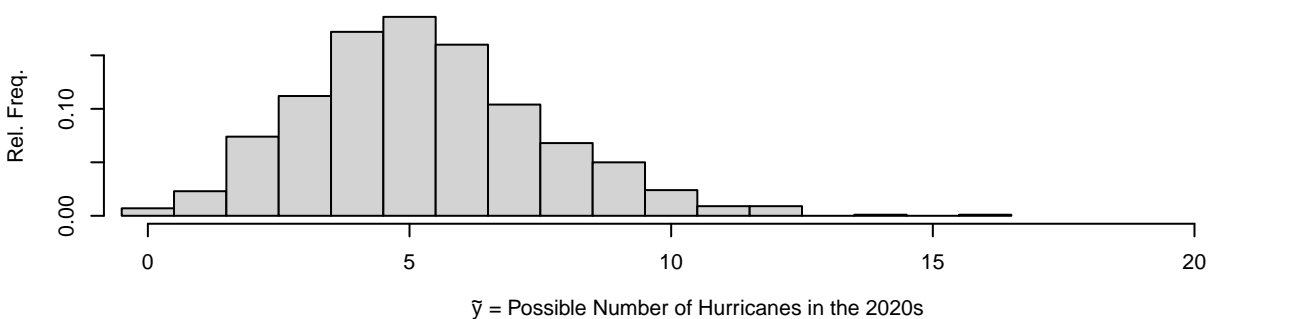
**Poisson–Gamma Predictive Probability Mass**



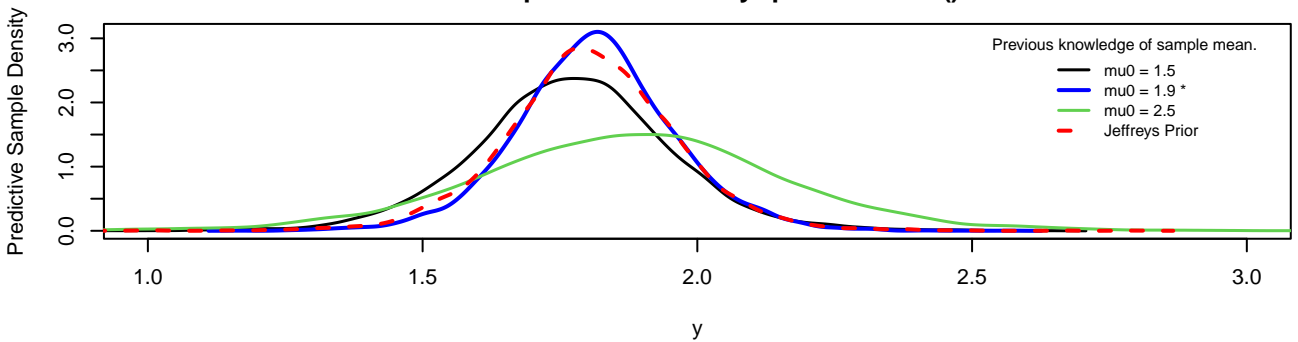
**Poisson–Gamma Cumulative Predictive Probability**



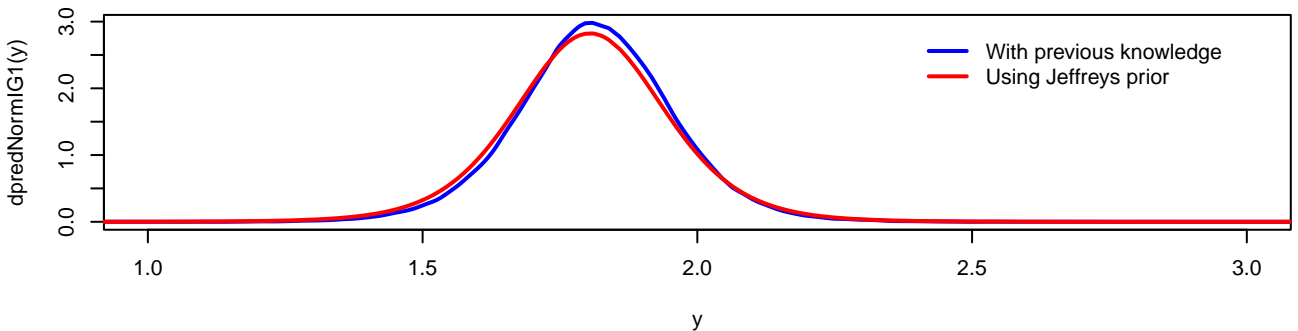
**Histogram of Predictive Sample**



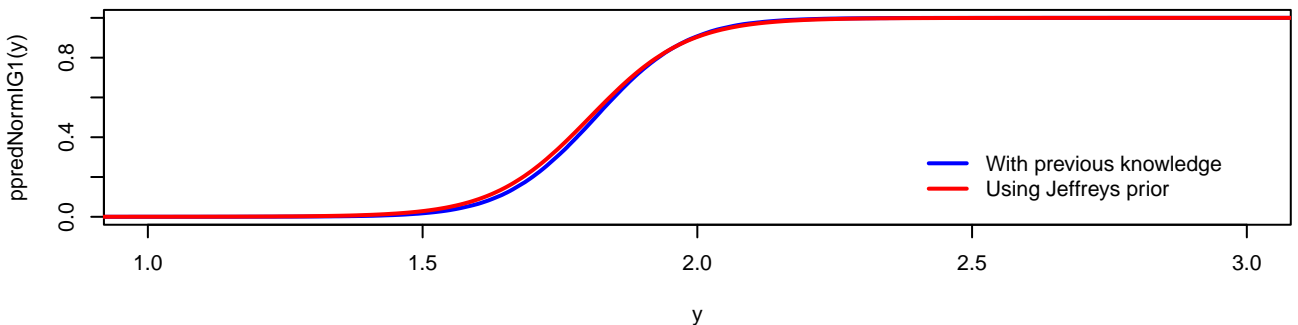
**Normal-Inverse Gamma Density  
of Samples Generated by rpredNormIG1()**

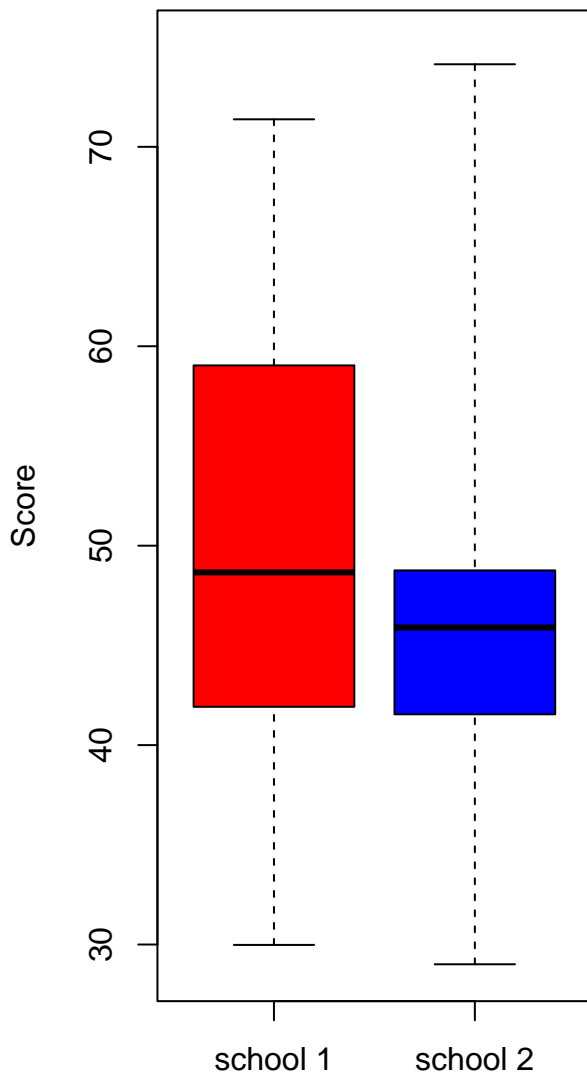
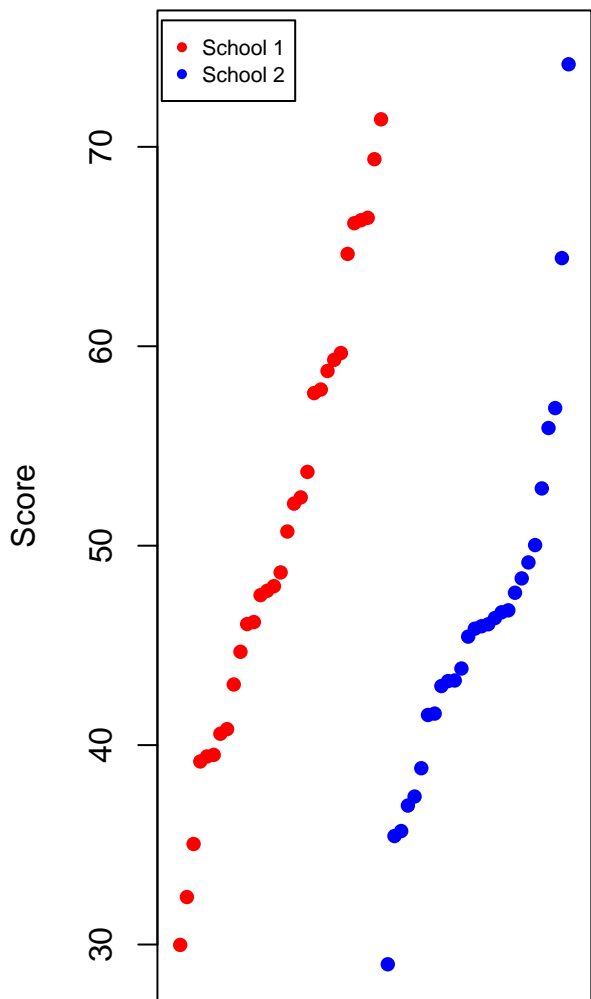


**Normal-Inverse Gamma Density  
Using dpredNormIG1()**

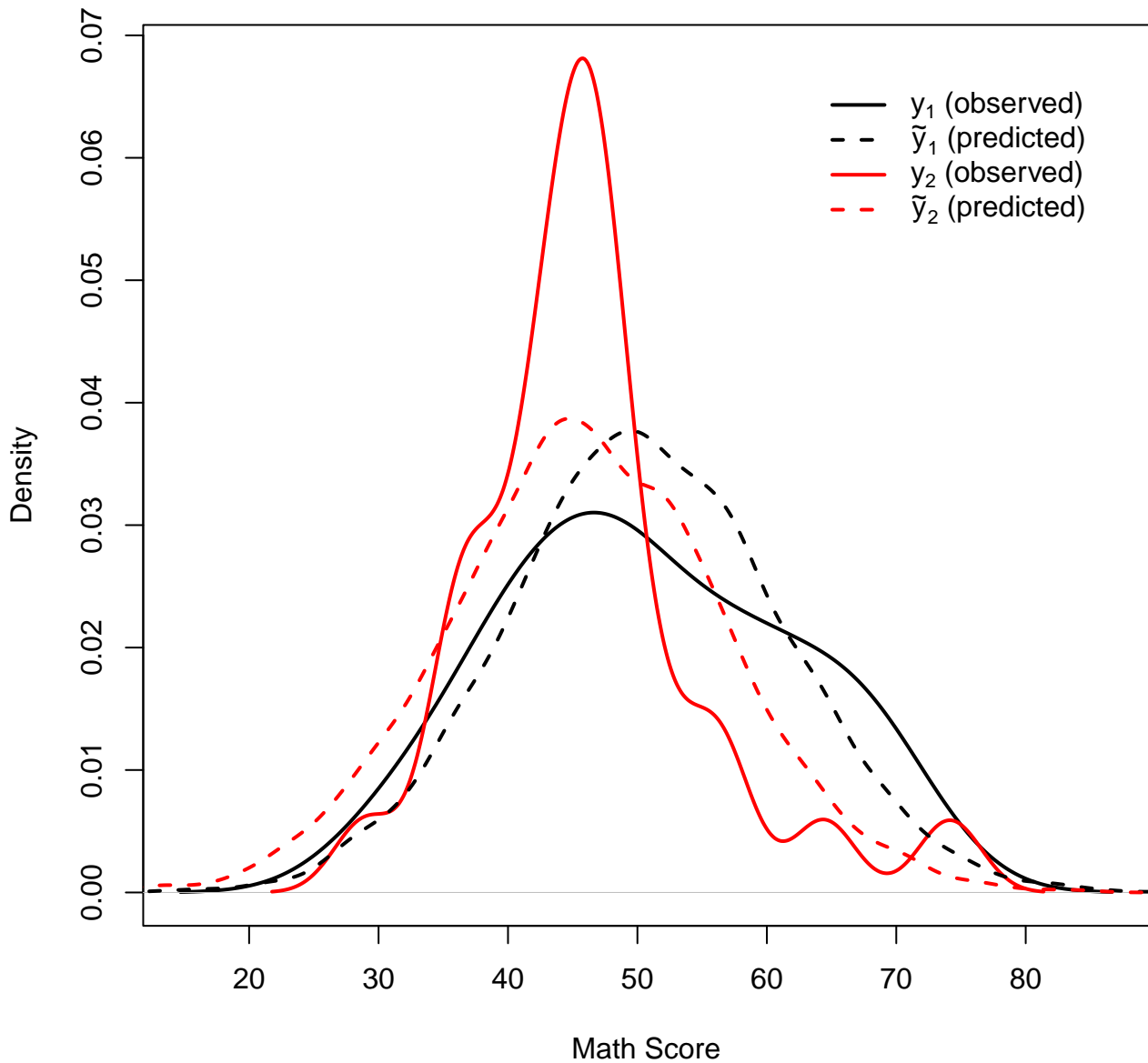


**Normal-Inverse Gamma Cumulative Density  
Using ppredNormIG1()**

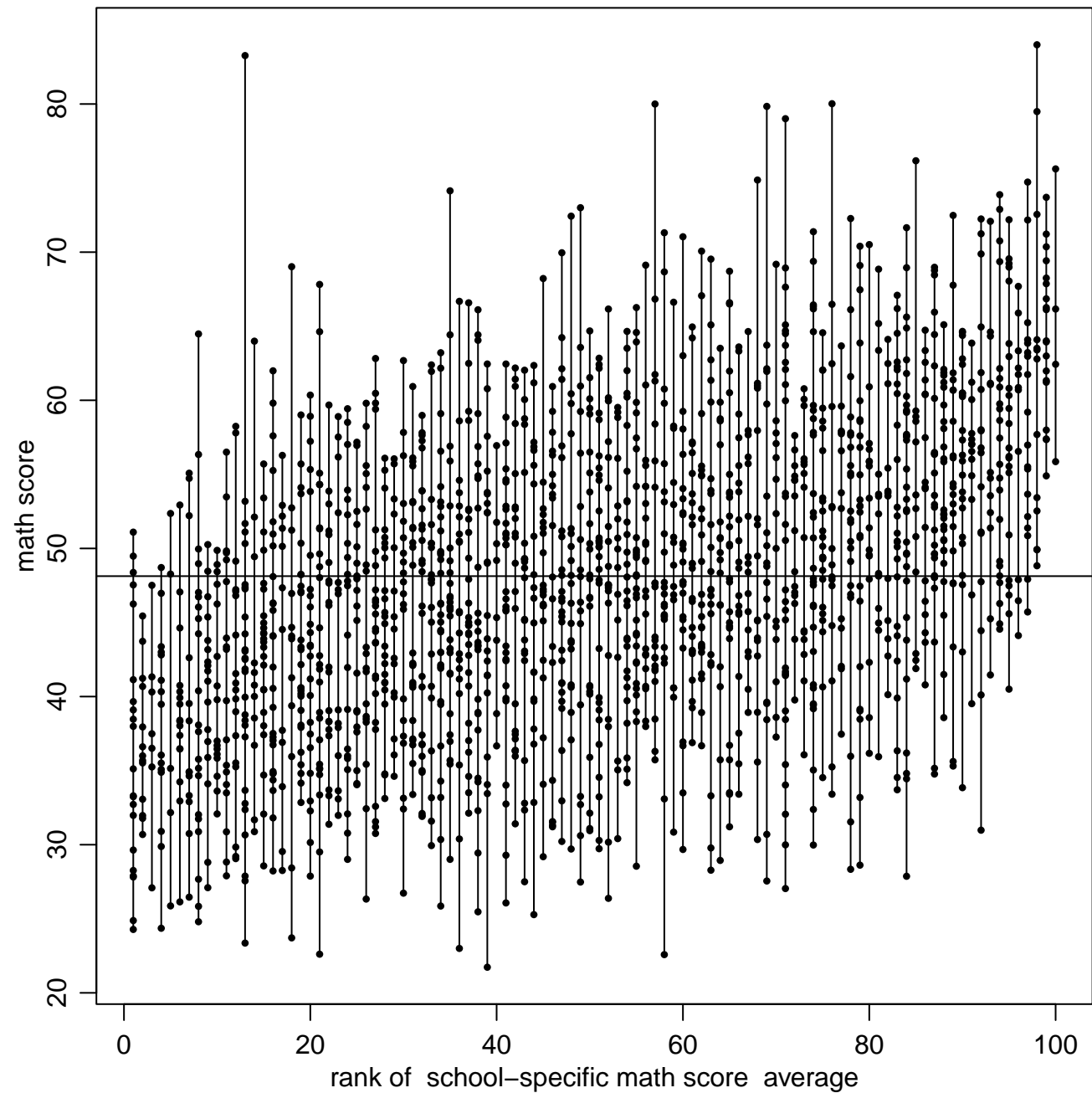




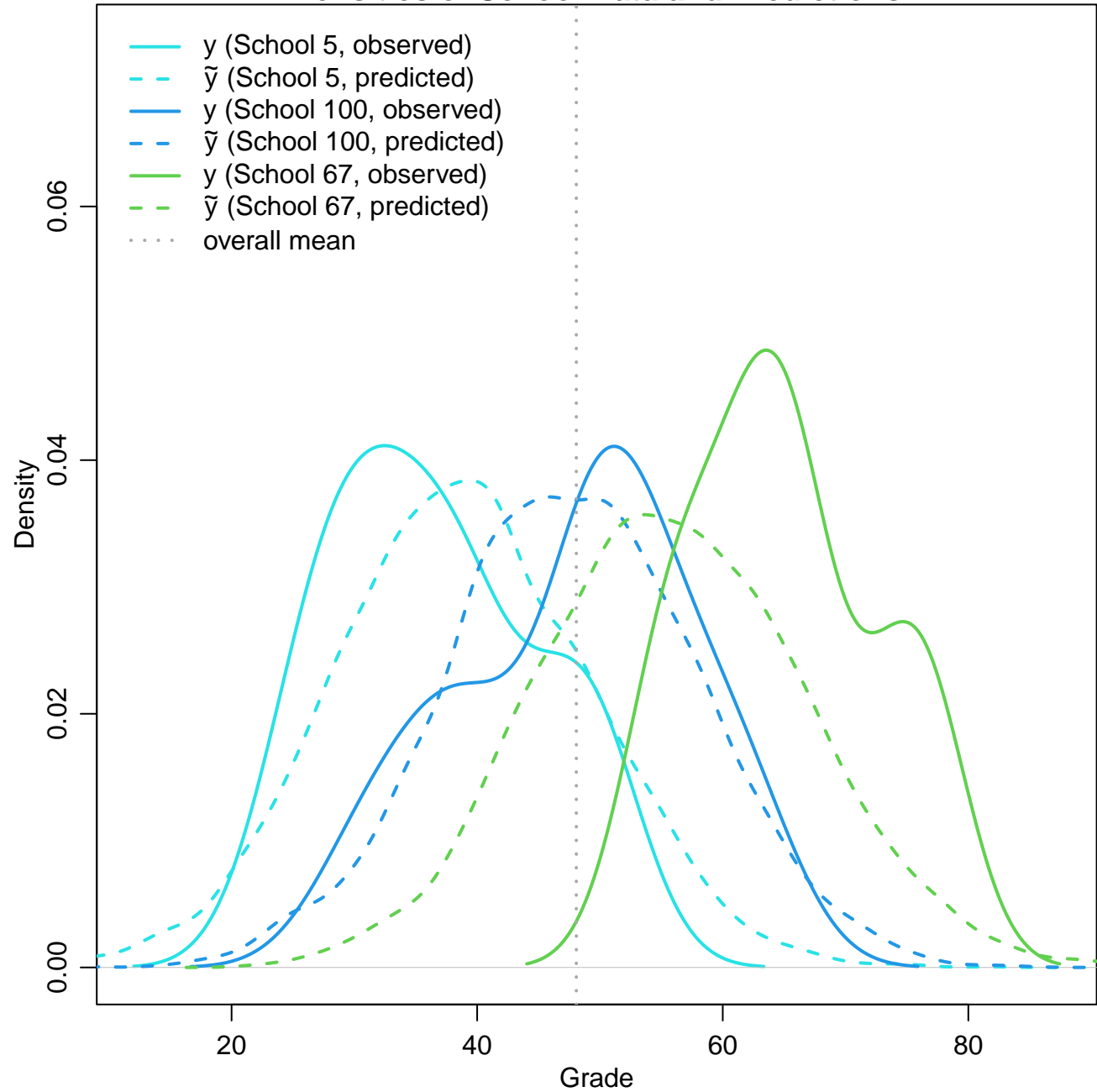
## Normal-Inverse Gamma 2-Sample Comparison

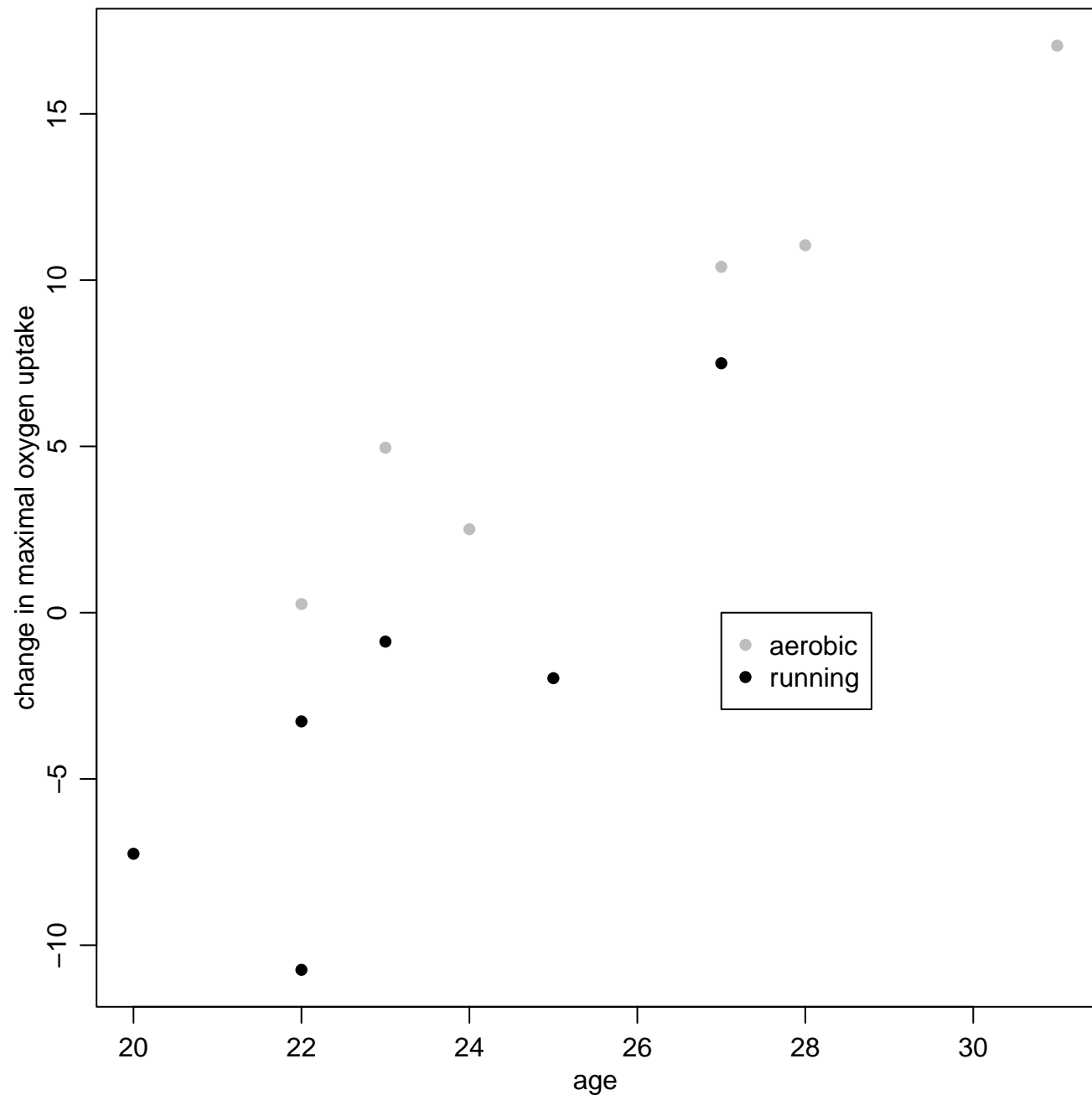




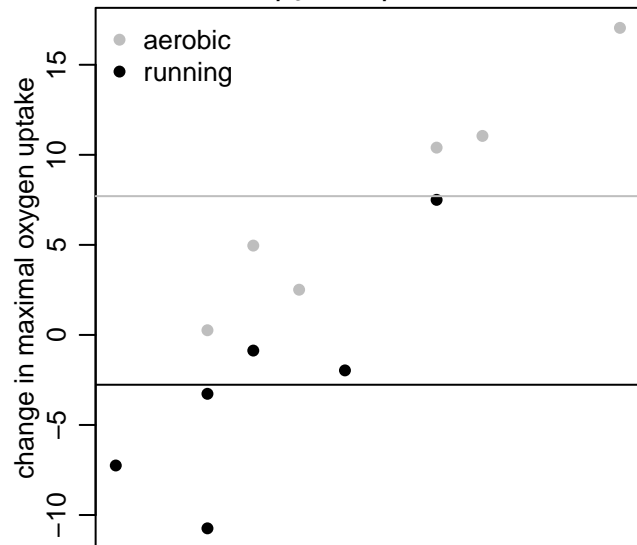


Densities of School Data and Predictions

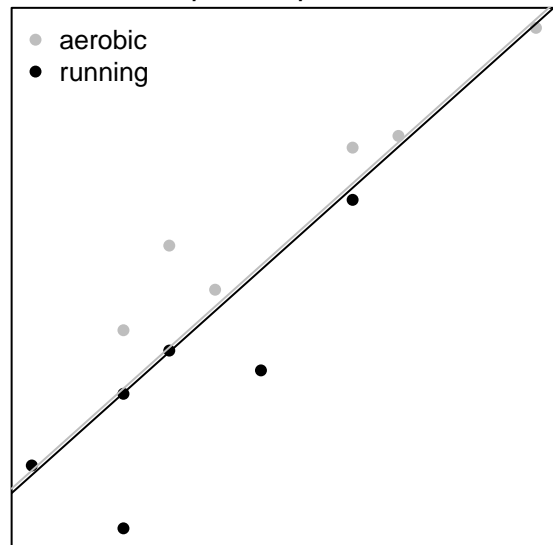




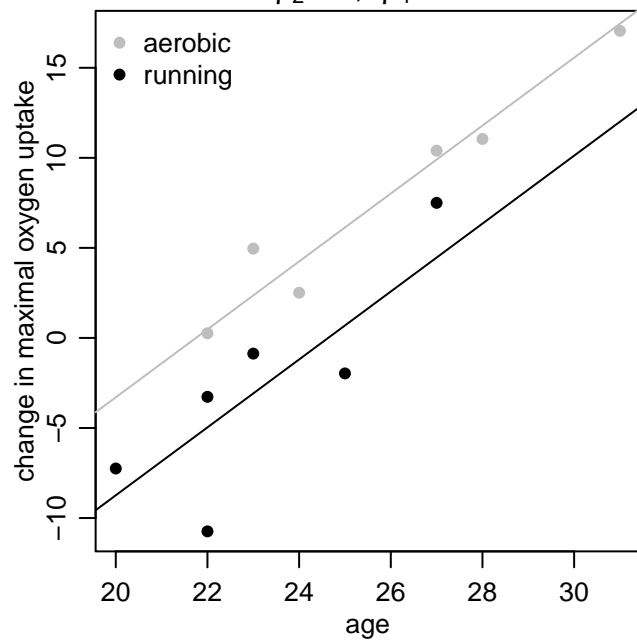
$\beta_3 = 0, \beta_4 = 0$



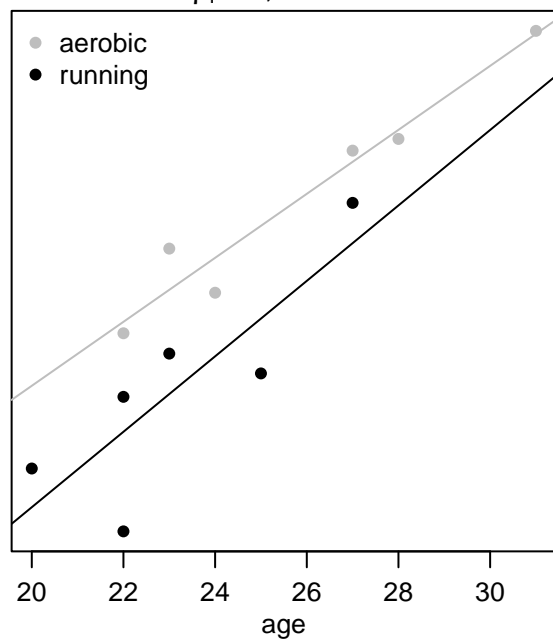
$\beta_2 = 0, \beta_4 = 0$



$\beta_2 \neq 0, \beta_4 = 0$



$\beta_i \neq 0, \text{ for all } i$



# Semi-conjugate prior vs. Zellner's g-prior

