

 $y_i \sim \text{Weibull}(\sigma, \alpha)$   $\eta_{j[i]} \sim \text{Normal}(0, \sigma_c)$   $\sigma_c \sim \text{half-Cauchy}(2.5)$   $h_i \sim \text{MultiNormal}(0, \Sigma)$   $\Sigma = \sigma_p^2 \mathbf{V}_{phy}$   $\sigma_p \sim \text{half-Cauchy}(2.5)$   $\beta \sim \text{Normal}(0, 10)$  $\alpha \sim \text{half-Cauchy}(2.5)$