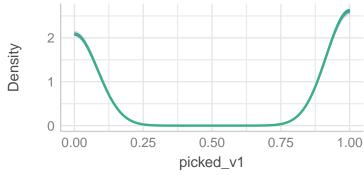
# reg\_rate \* variation \* baseline\_p \* reg\_dist

### Posterior Predictive Check

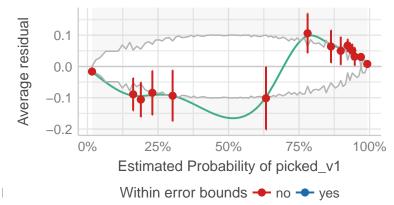
Model-predicted lines should resemble observed data line



# del-predicted data — Observed data — Observed data —

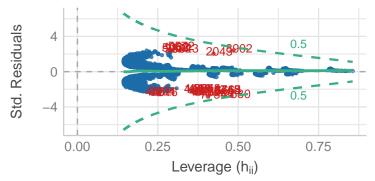
### Binned Residuals

Points should be within error bounds



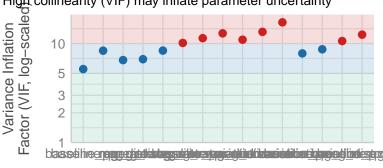
#### Influential Observations

Points should be inside the contour lines



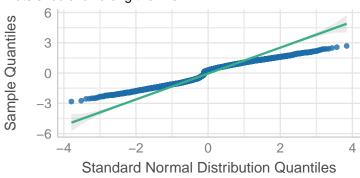
## Collinearity

High collinearity (VIF) may inflate parameter uncertainty



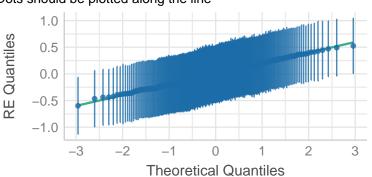
Moderate (< 10) ♦ High (... 10)

## Normality of Residuals Dots should fall along the line



# Normality of Random Effects (base)

Dots should be plotted along the line



# Normality of Random Effects (part\_id)

Dots should be plotted along the line

