

Figures

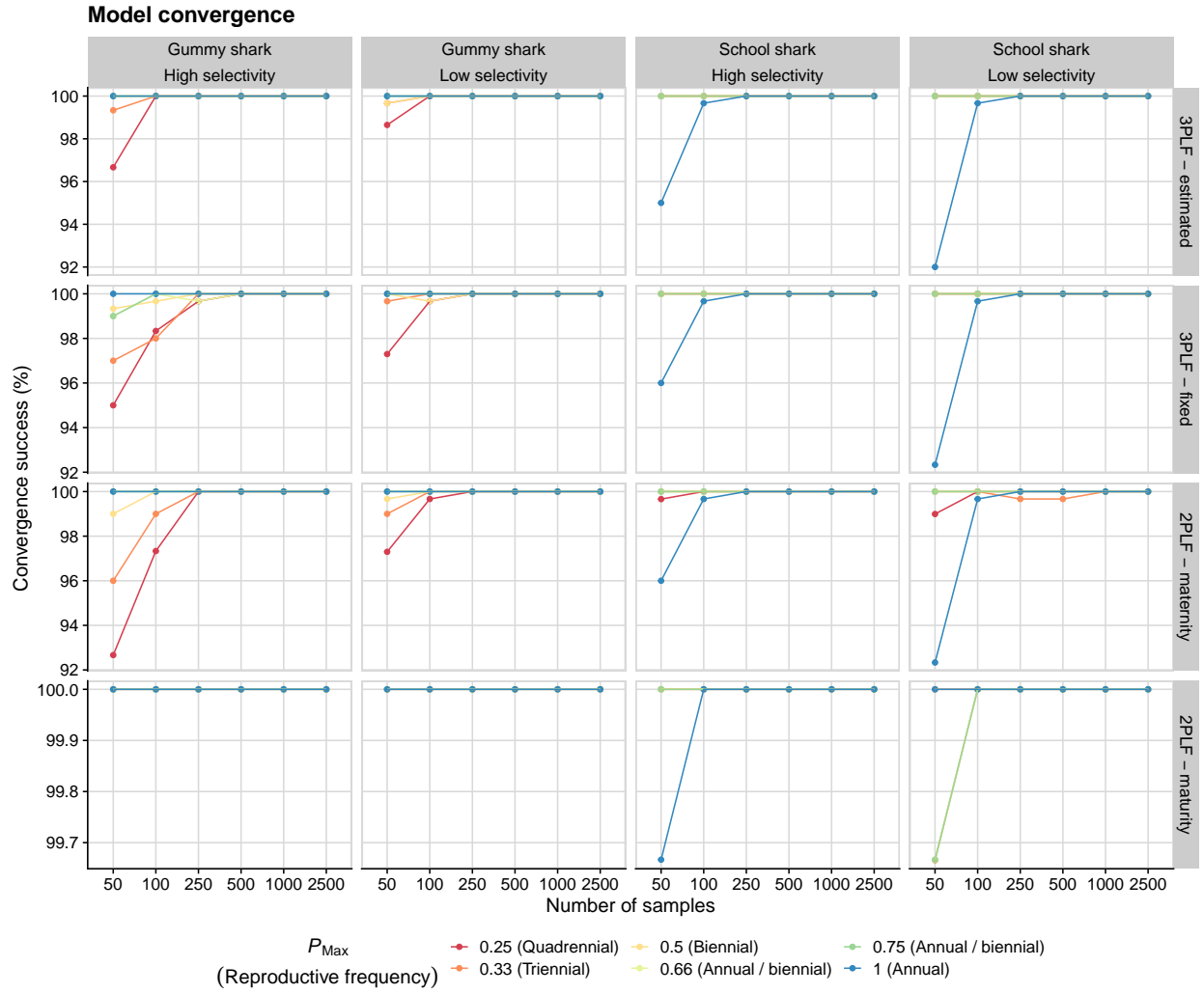


Figure S1. Convergence success of alternative logistic regression models fit ($n = 300$) for school shark and gummy shark.

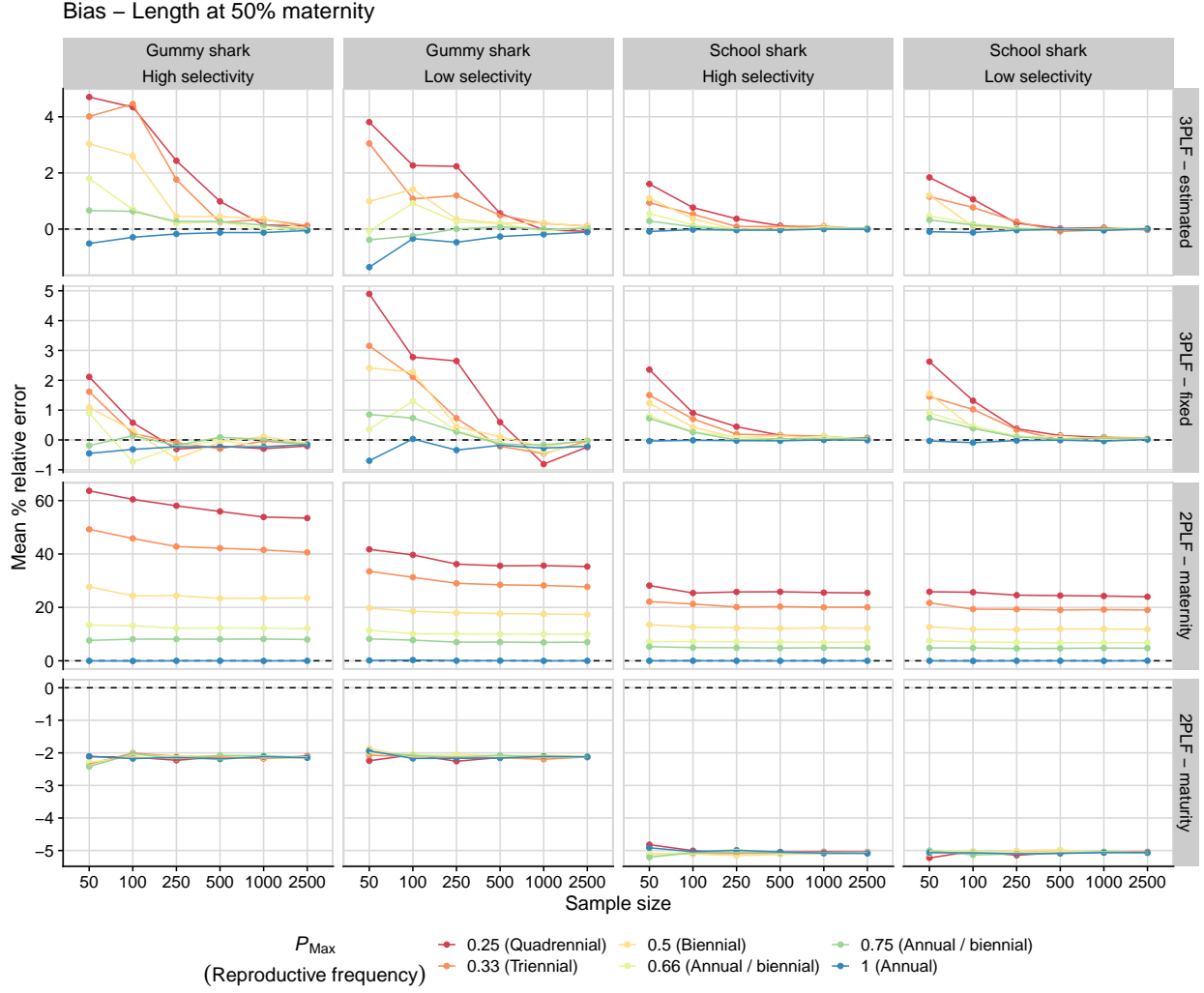


Figure S2. Bias (per cent relative error) in parameter estimates of $L_{50}^{\hat{}}$ using alternative logistic regression models. Each point reflects a mean value from 300 simulated data sets.

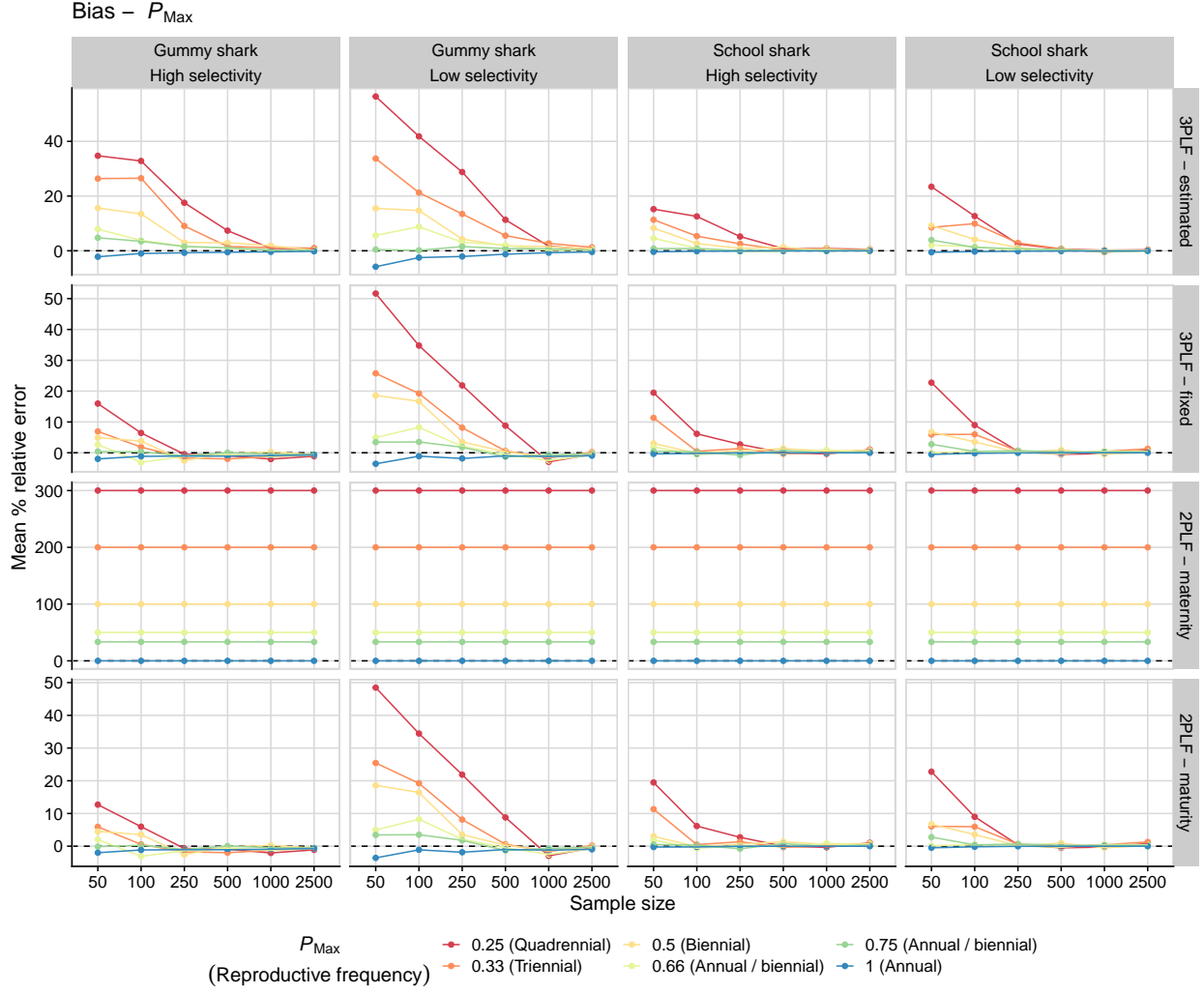


Figure S3. Bias (per cent relative error) in parameter estimates of \hat{P}_{Max} using alternative logistic regression models. Each point reflects a mean value from 300 simulated data sets. Note 2PLF-maturity and 3PLF-fixed methods both used pre-specified values for P_{Max} and are identical.

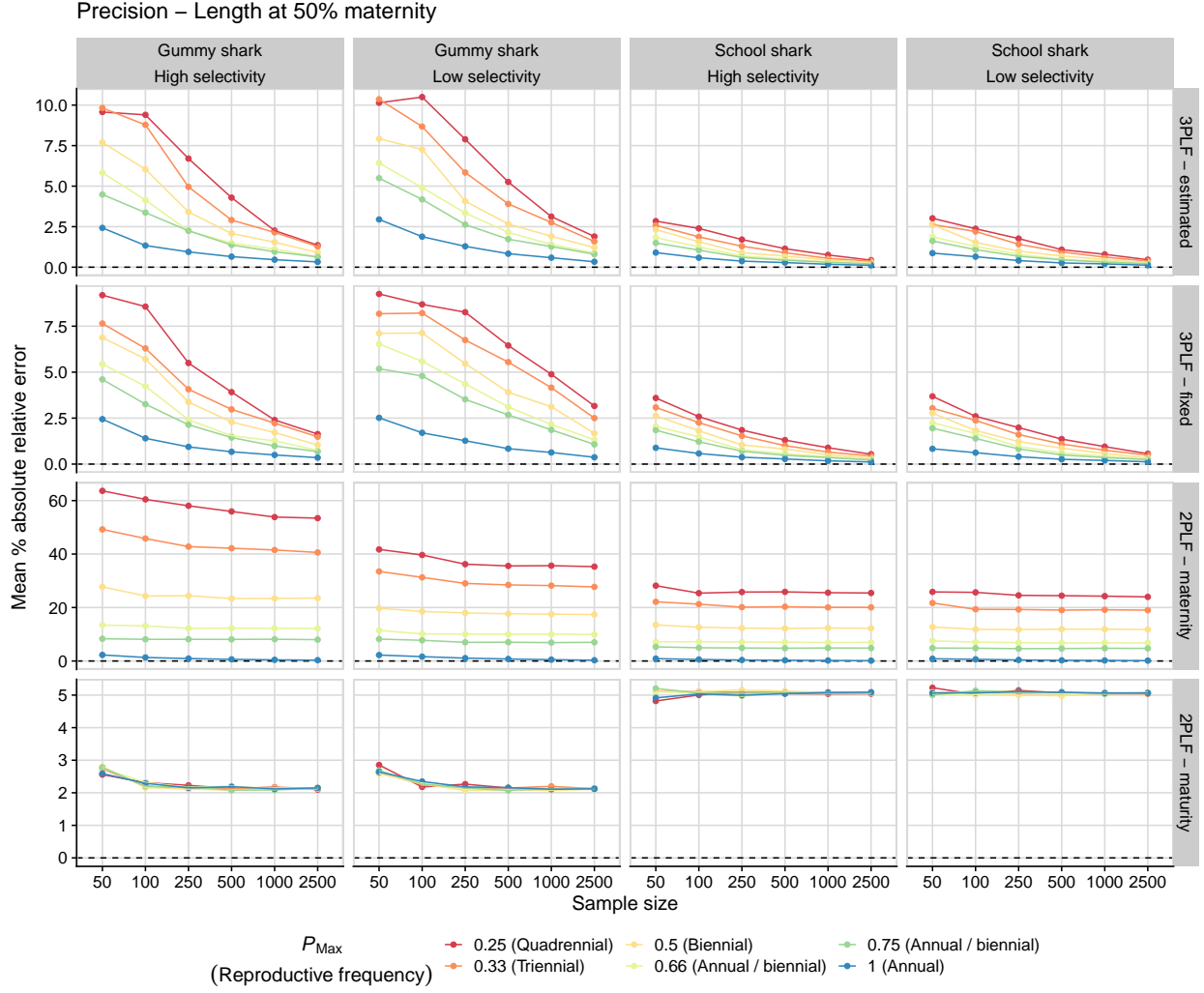


Figure S4. Precision (per cent absolute error) in parameter estimates of $L_{50}^{\hat{}}$ using alternative logistic regression models. Each point reflects a mean value from 300 simulated data sets.

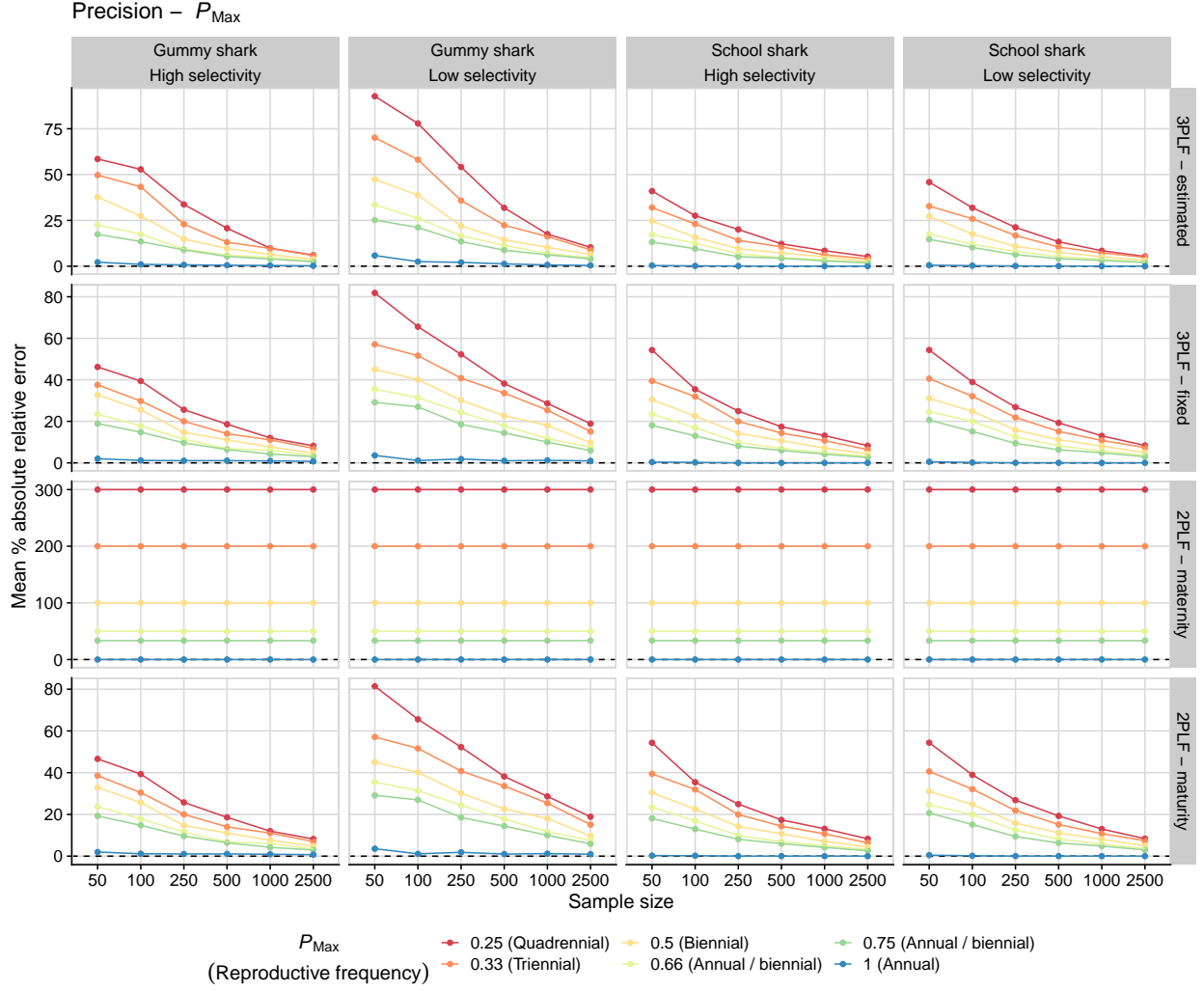


Figure S5. Precision (per cent absolute error) in parameter estimates of \hat{P}_{Max} using alternative logistic regression models. Each point reflects a mean value from 300 simulated data sets. Note 2PLF-maturity and 3PLF-fixed methods both used pre-specified values for P_{Max} and are identical.

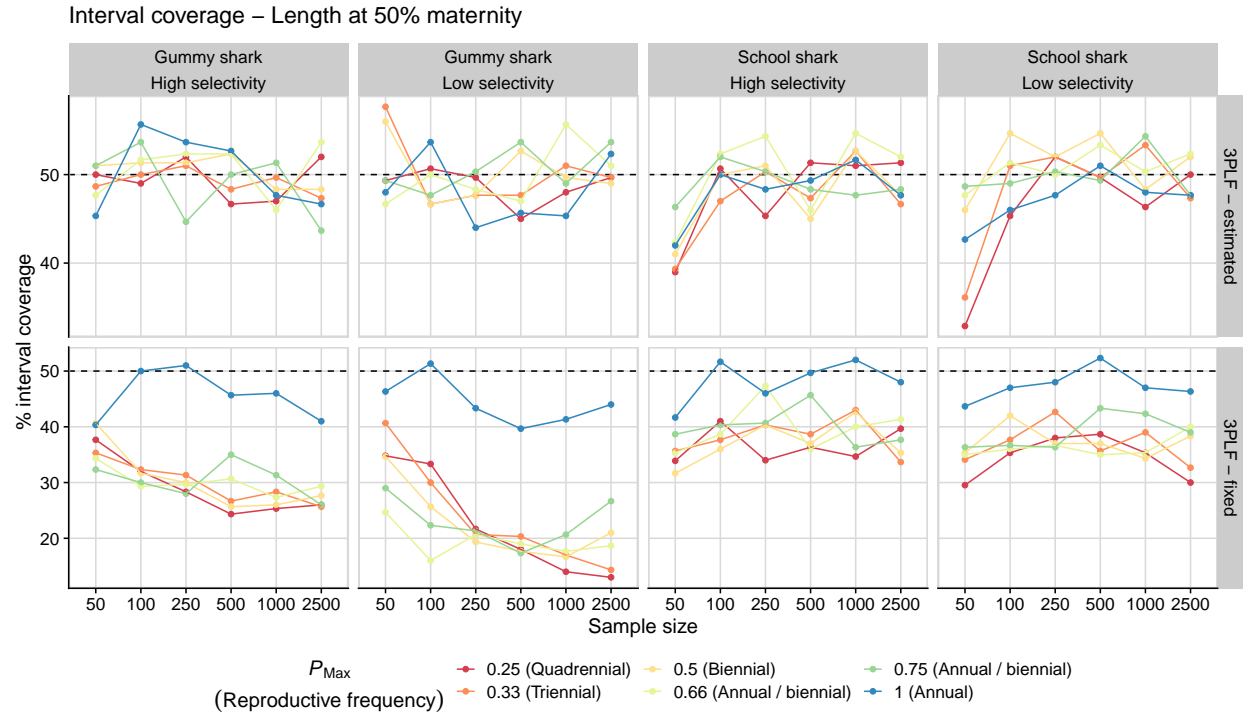


Figure S6. Confidence interval coverage for L'_{50} for 3PLF methods. Figure shows the percentage of simulations ($n = 300$) where the true parameter value fell within the 50% bootstrap confidence interval.

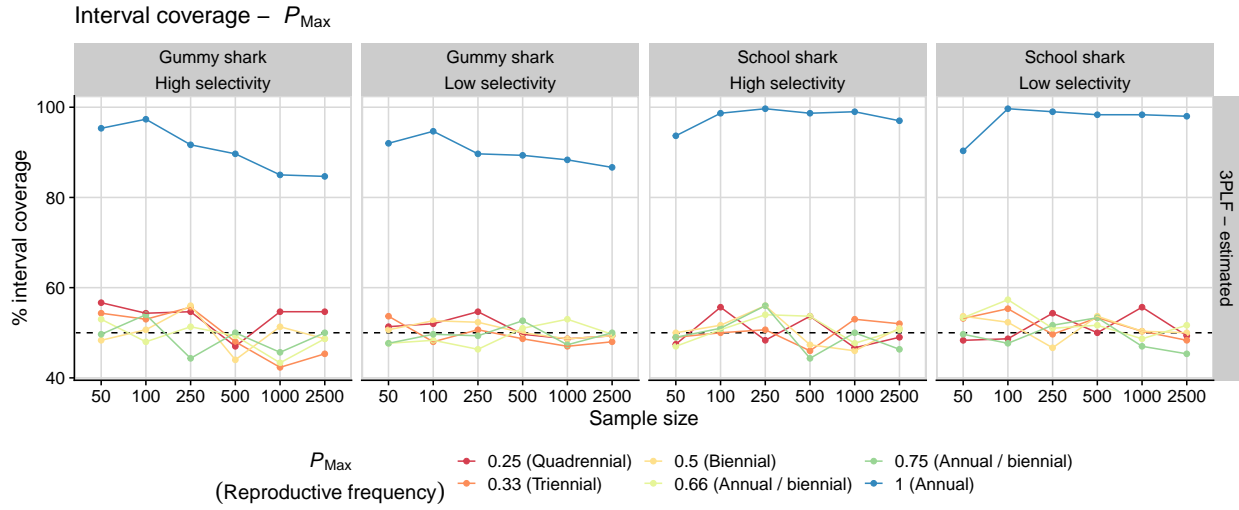


Figure S7. Confidence interval coverage for P_{Max} for the 3PLF-estimated method. Figure shows the percentage of simulations ($n = 300$) where the true parameter value fell within the 50% bootstrap confidence interval.

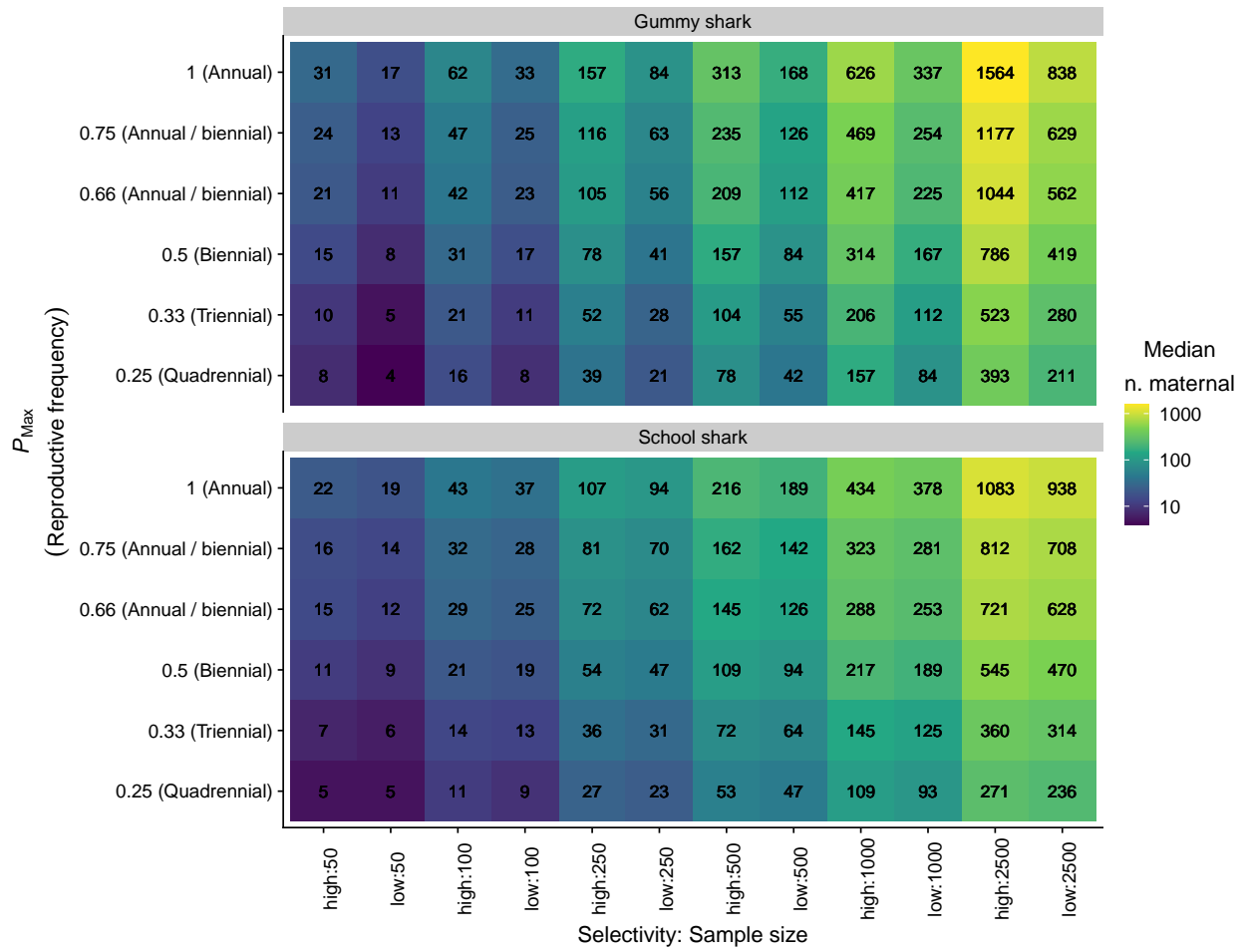


Figure S8. Median number of females in maternal condition in simulated data that were used to estimate maternity parameters subject to varying sample size, gear selectivity, reproductive frequency. 300 iterations were carried out for each simulation.

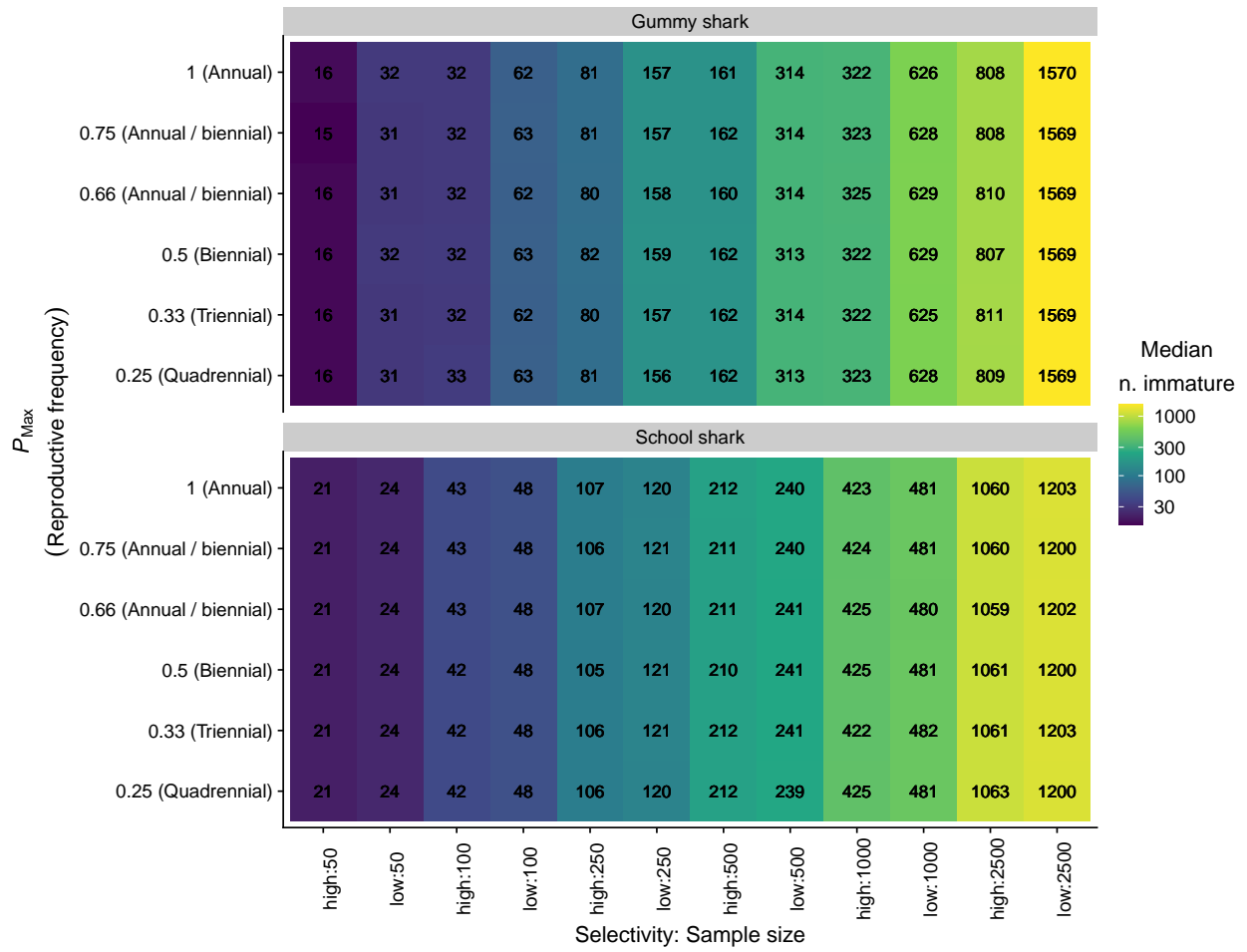


Figure S9. Median number of immature females in simulated data that were used to estimate maternity parameters subject to varying sample size, gear selectivity, reproductive frequency. 300 iterations were carried out for each simulation.

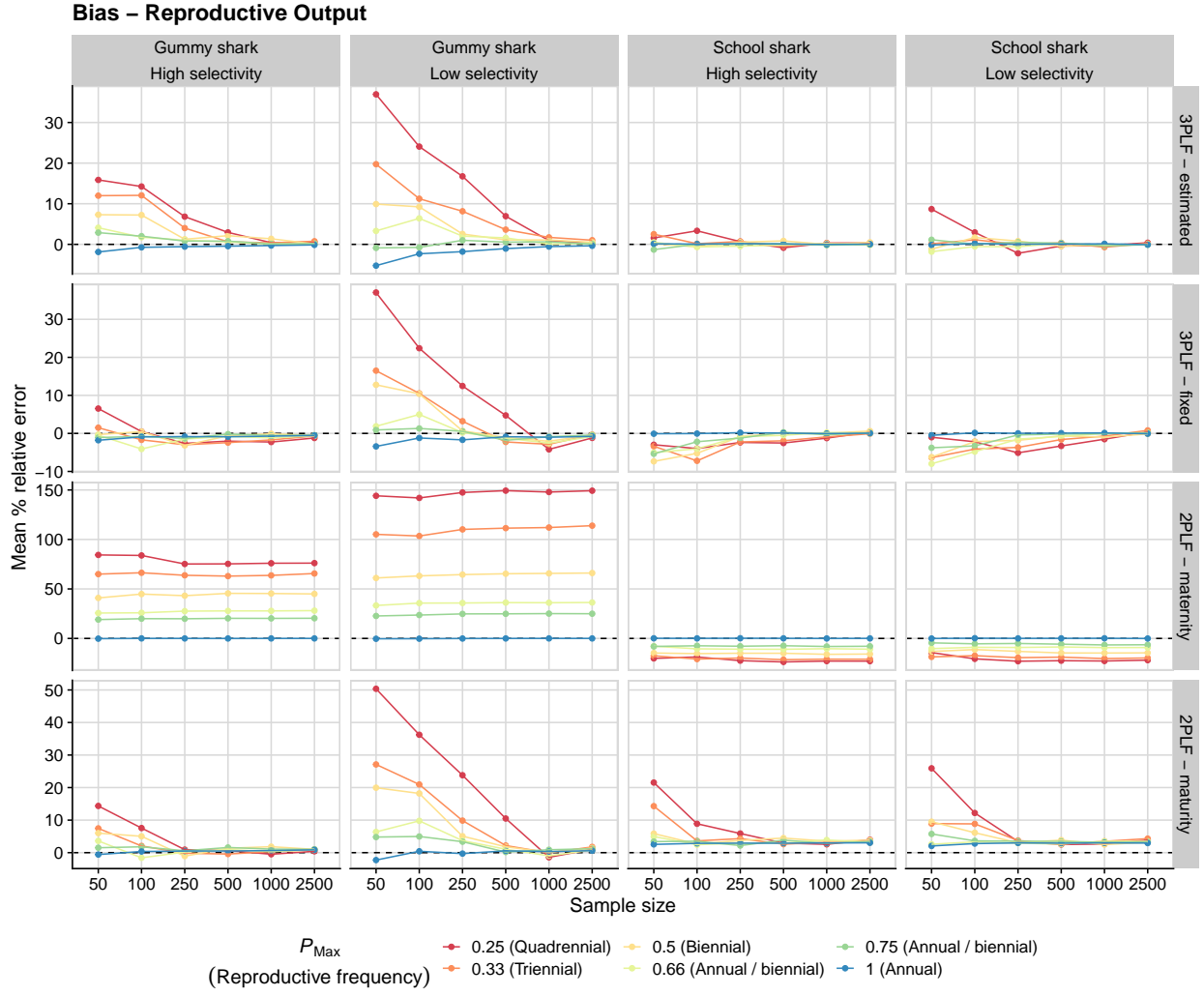


Figure S10. Bias (per cent relative error) in R_0 calculated using maternity parameters obtained from alternative logistic regression models. Each point reflects a mean value from 300 simulated data sets

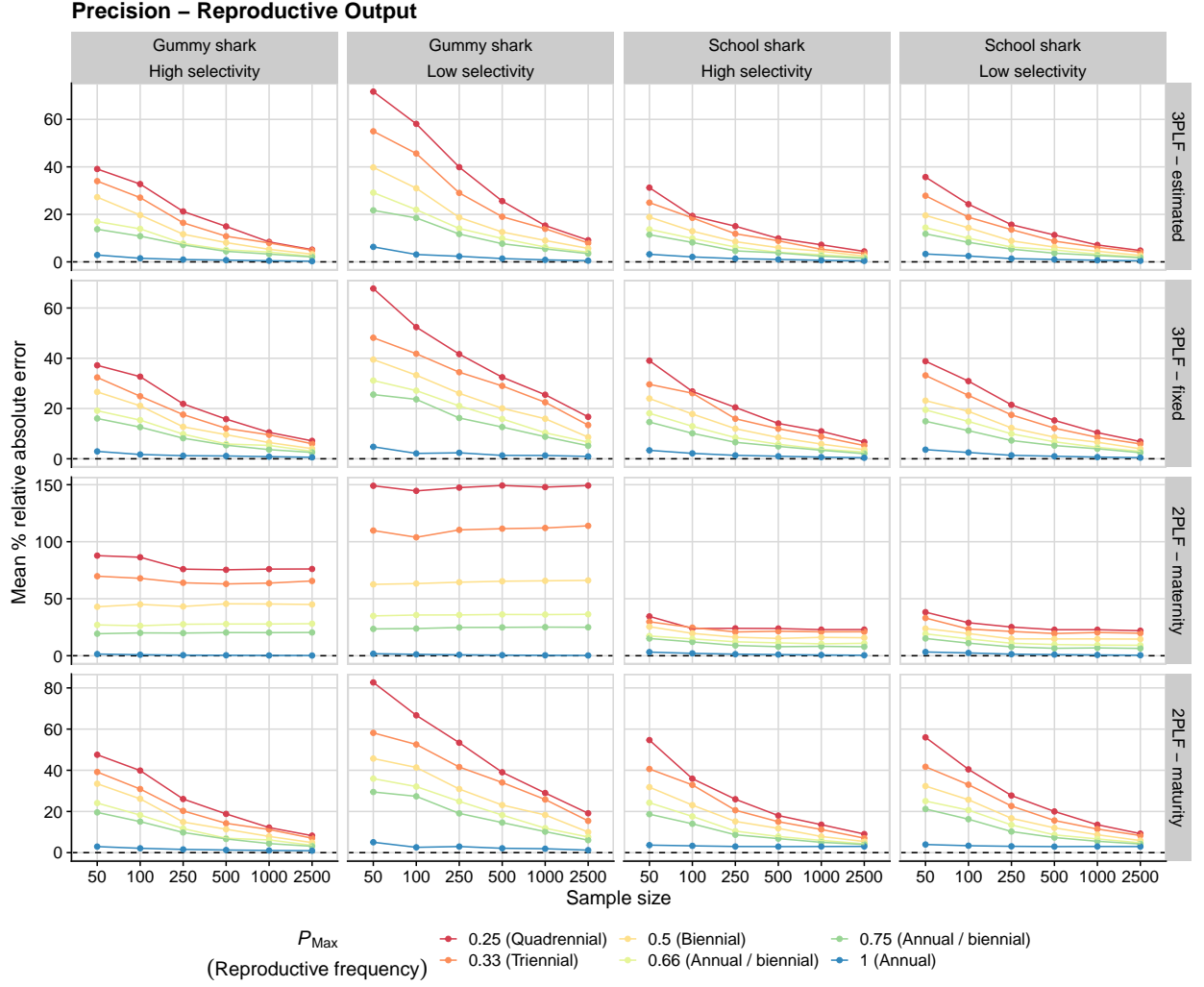


Figure S11. Precision (per cent absolute error) in R_0 calculated using maternity parameters obtained from alternative logistic regression models. Each point reflects a mean value from 300 simulated data sets