

Figure S1: Model 1's logical network

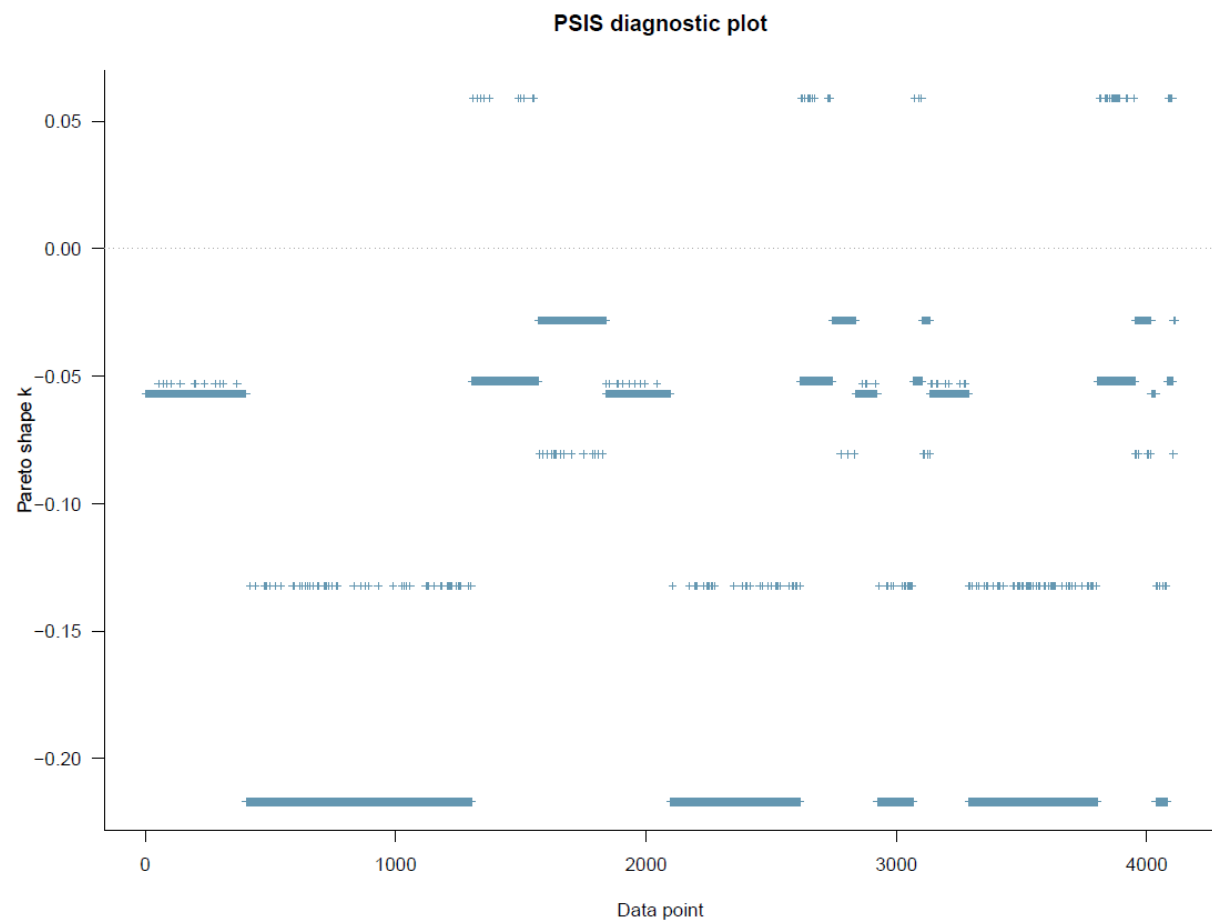


Figure S2: Model 1's PSIS diagnostic plot

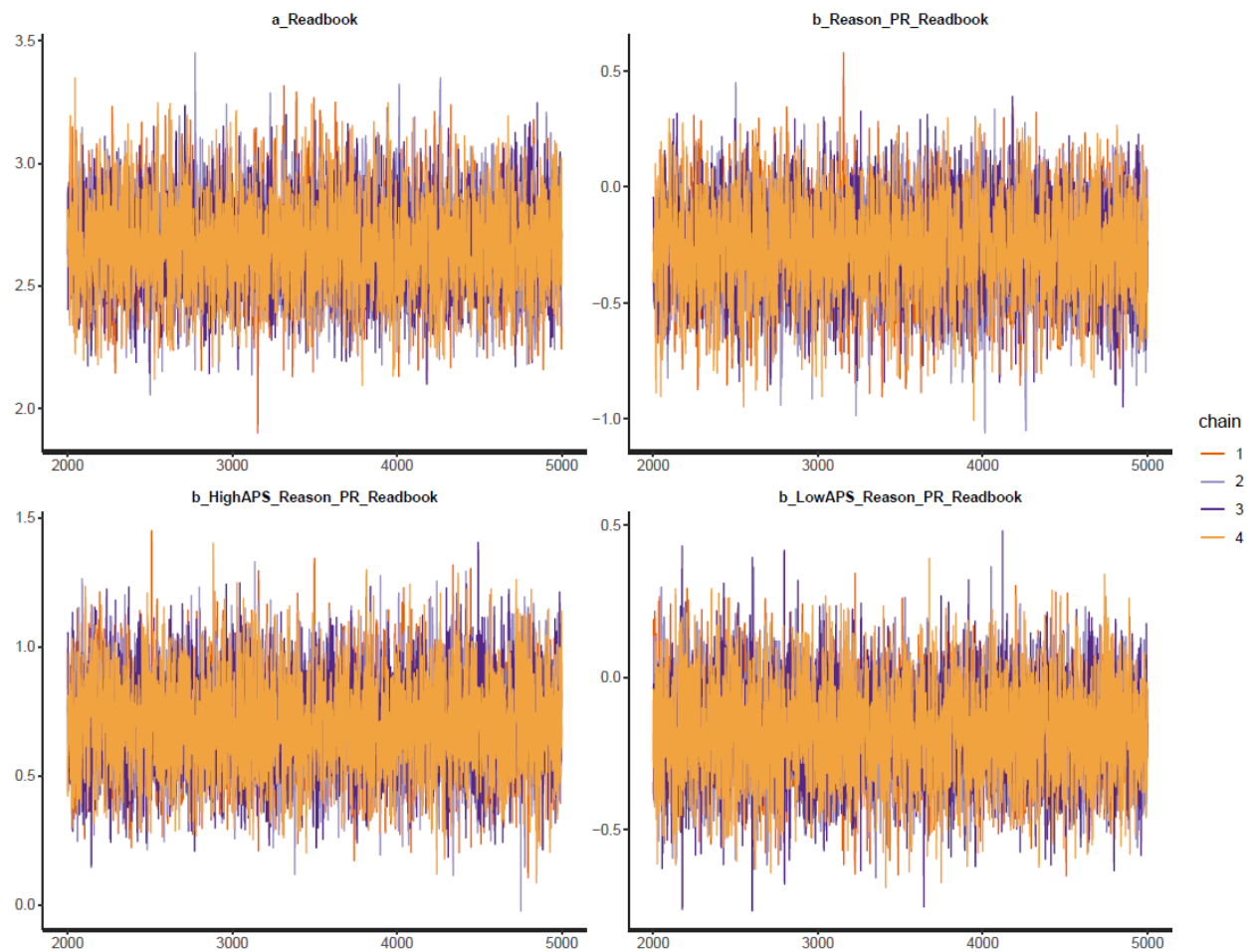


Figure S3: Trace plots for Model 1's posterior coefficients

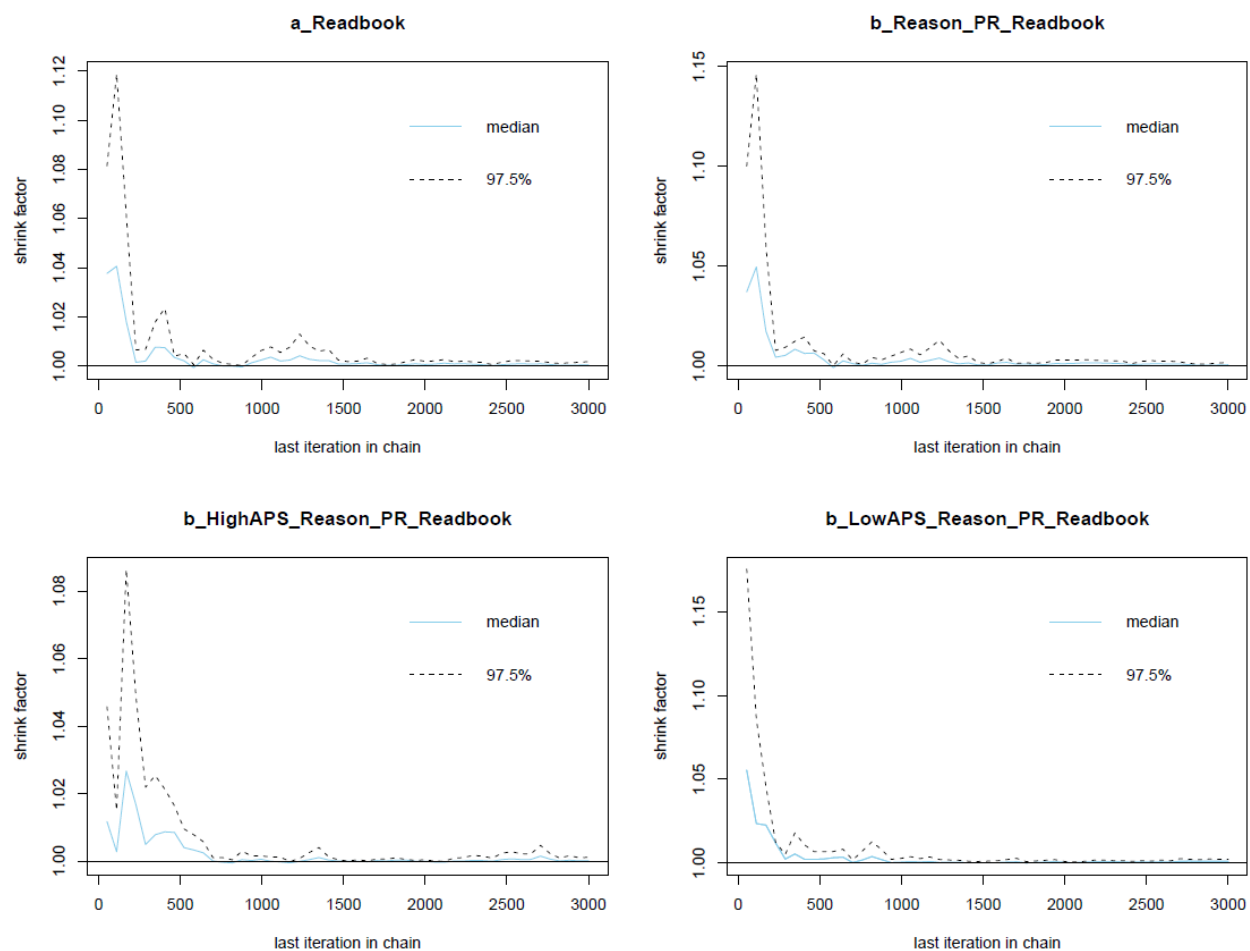


Figure S4: Gelman plots for Model 1's posterior coefficients

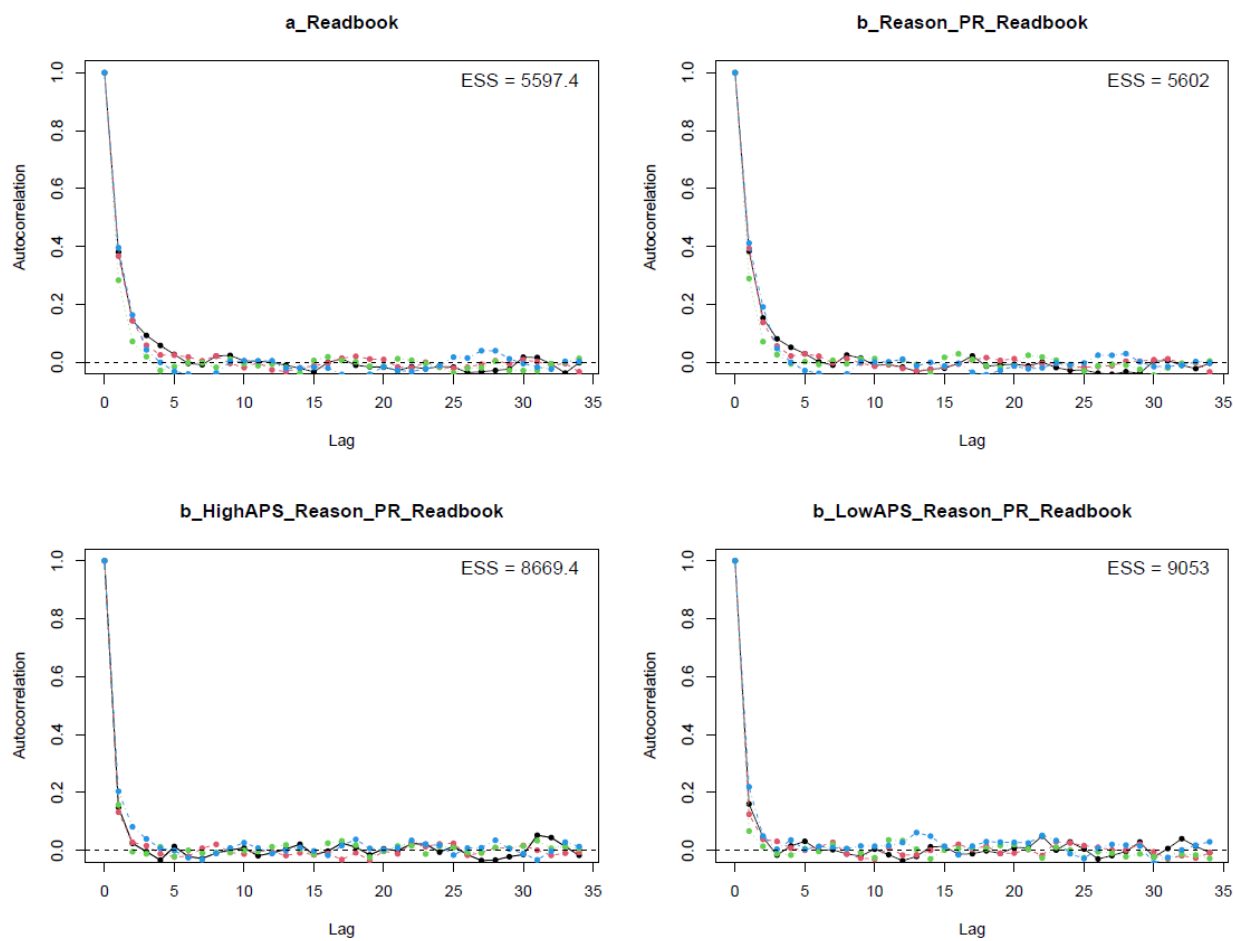


Figure S5: Autocorrelation plots for Model 1's posterior coefficients

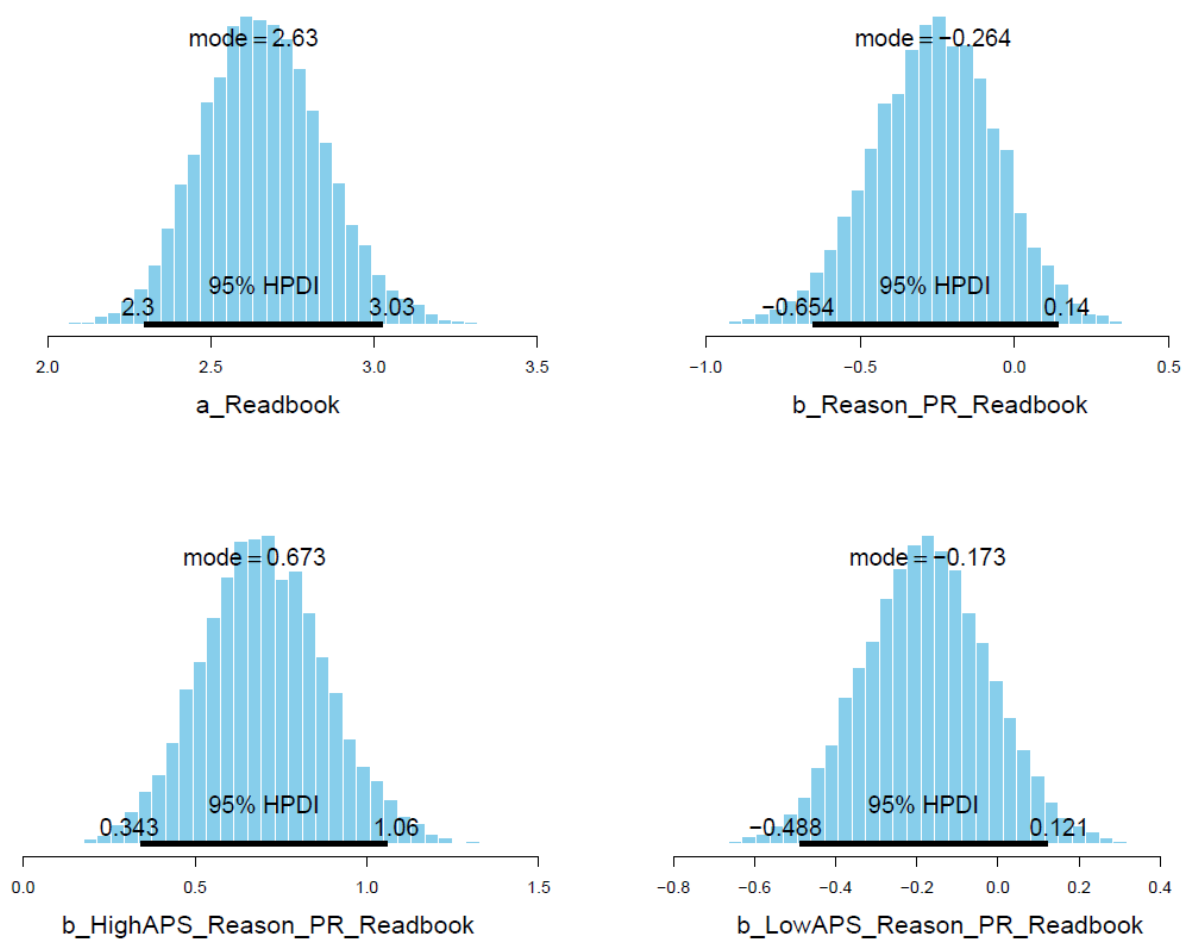


Figure S6: Distributions of Model 1's posterior coefficients with HPDI at 95%

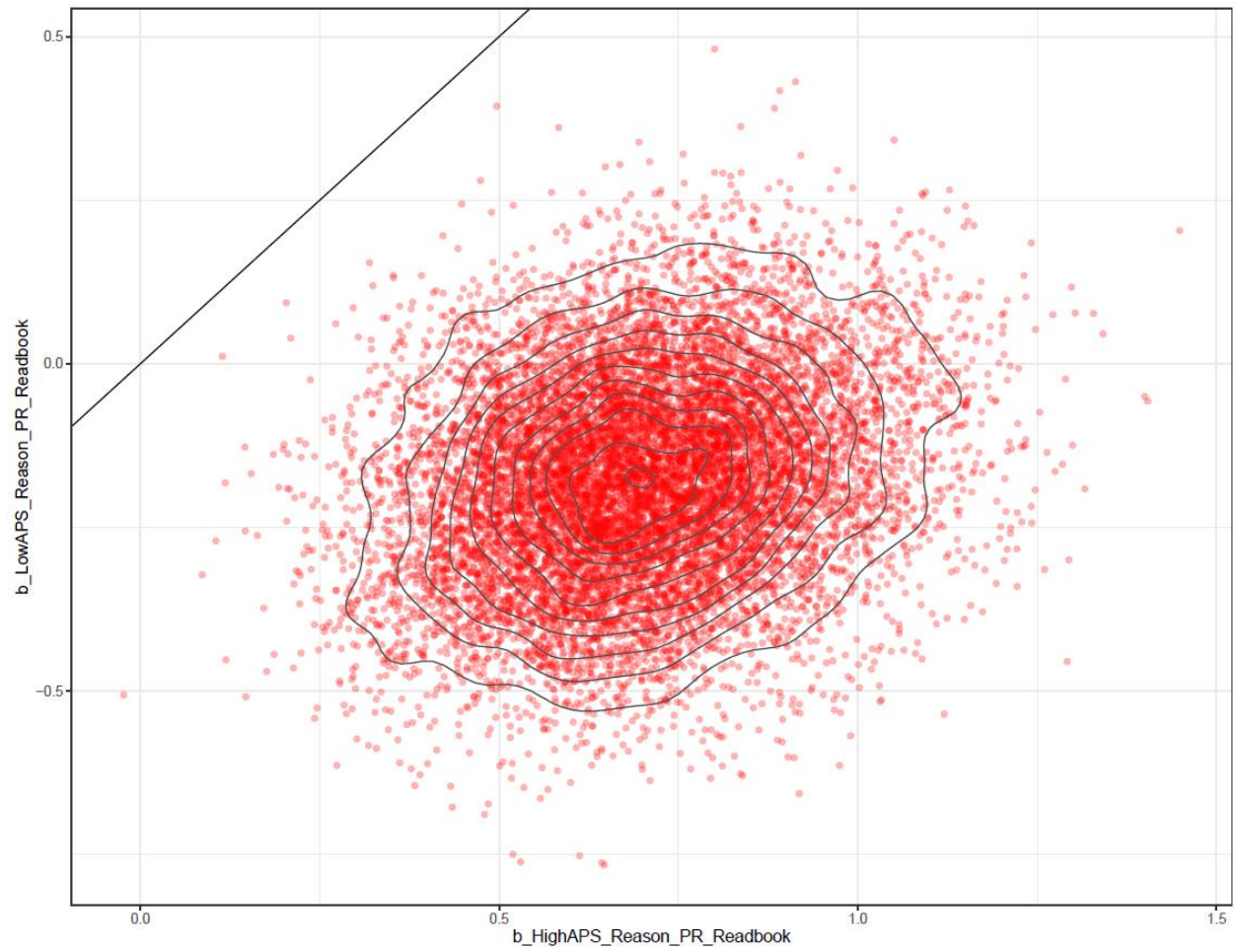


Figure S7: Pairwise distribution plot for model 1's *Reason_PR*HighAPS* and *Reason_PR*LowAPS*

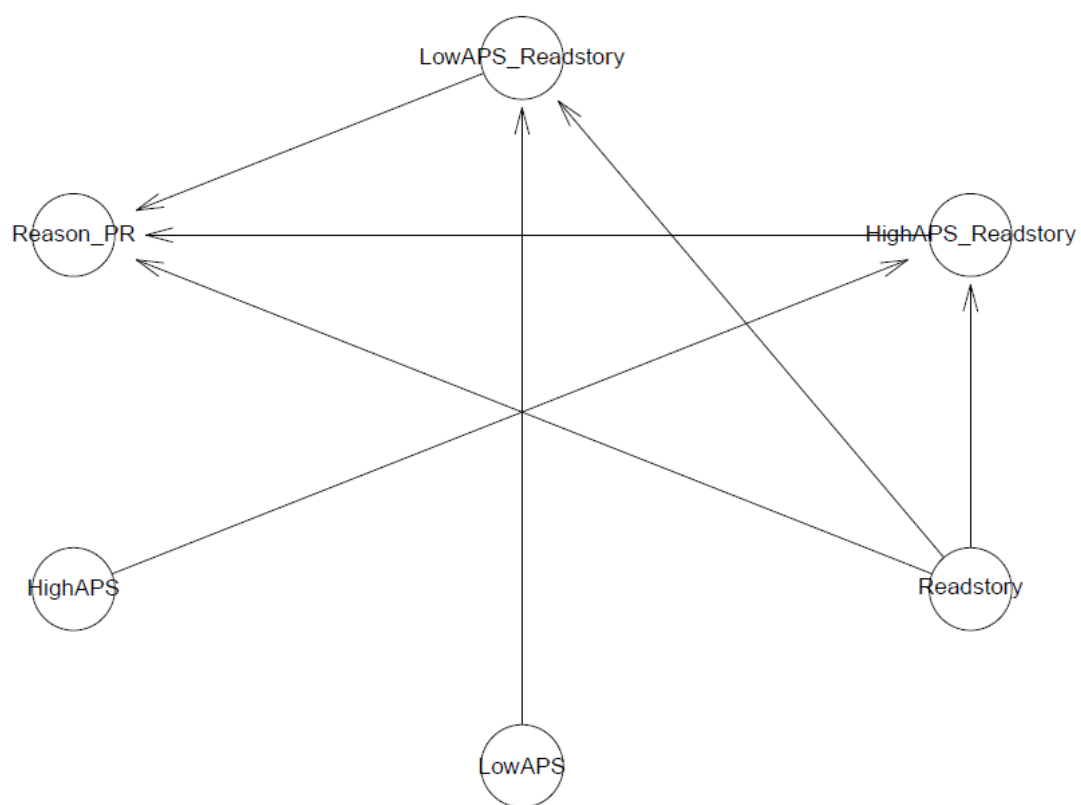


Figure S8: Model 2's logical network

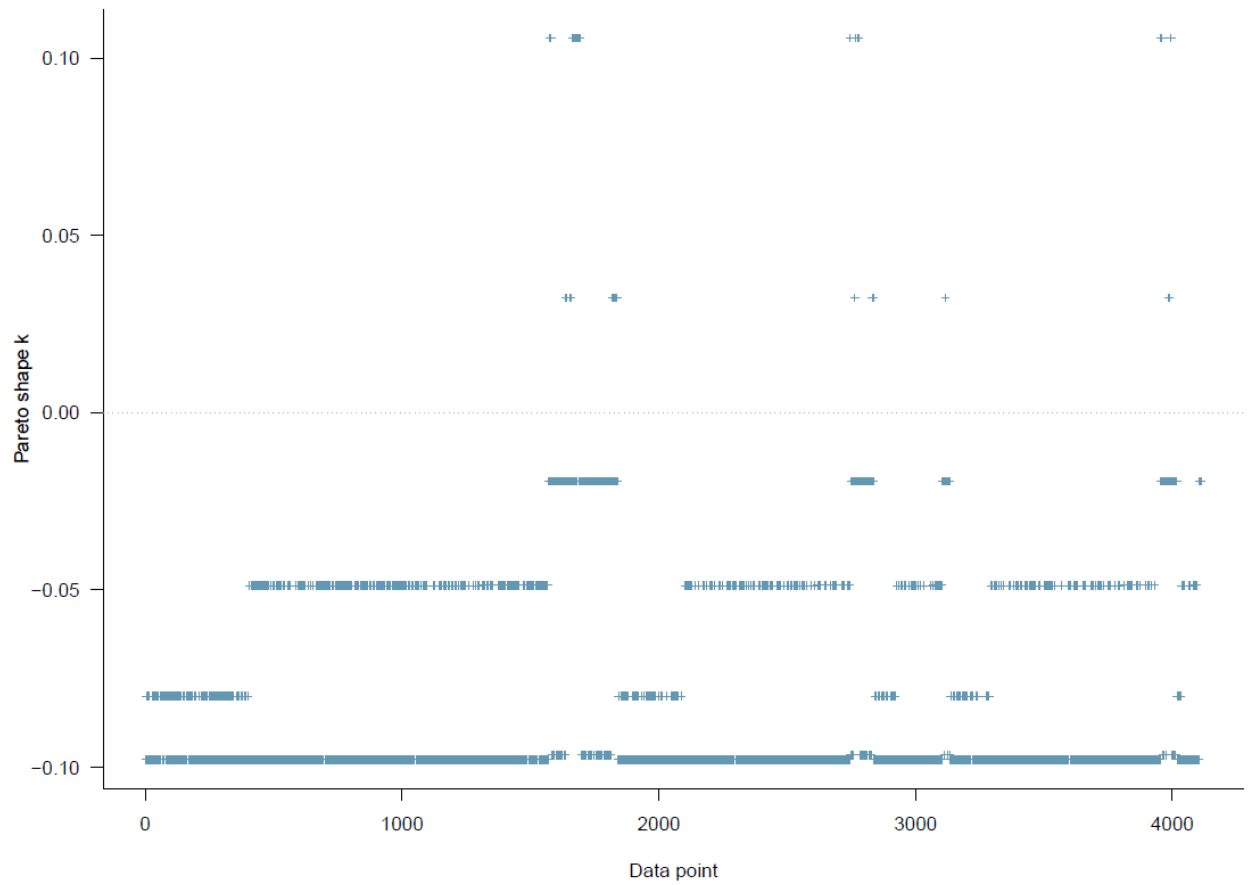


Figure S9: Model 2's PSIS diagnostic plot

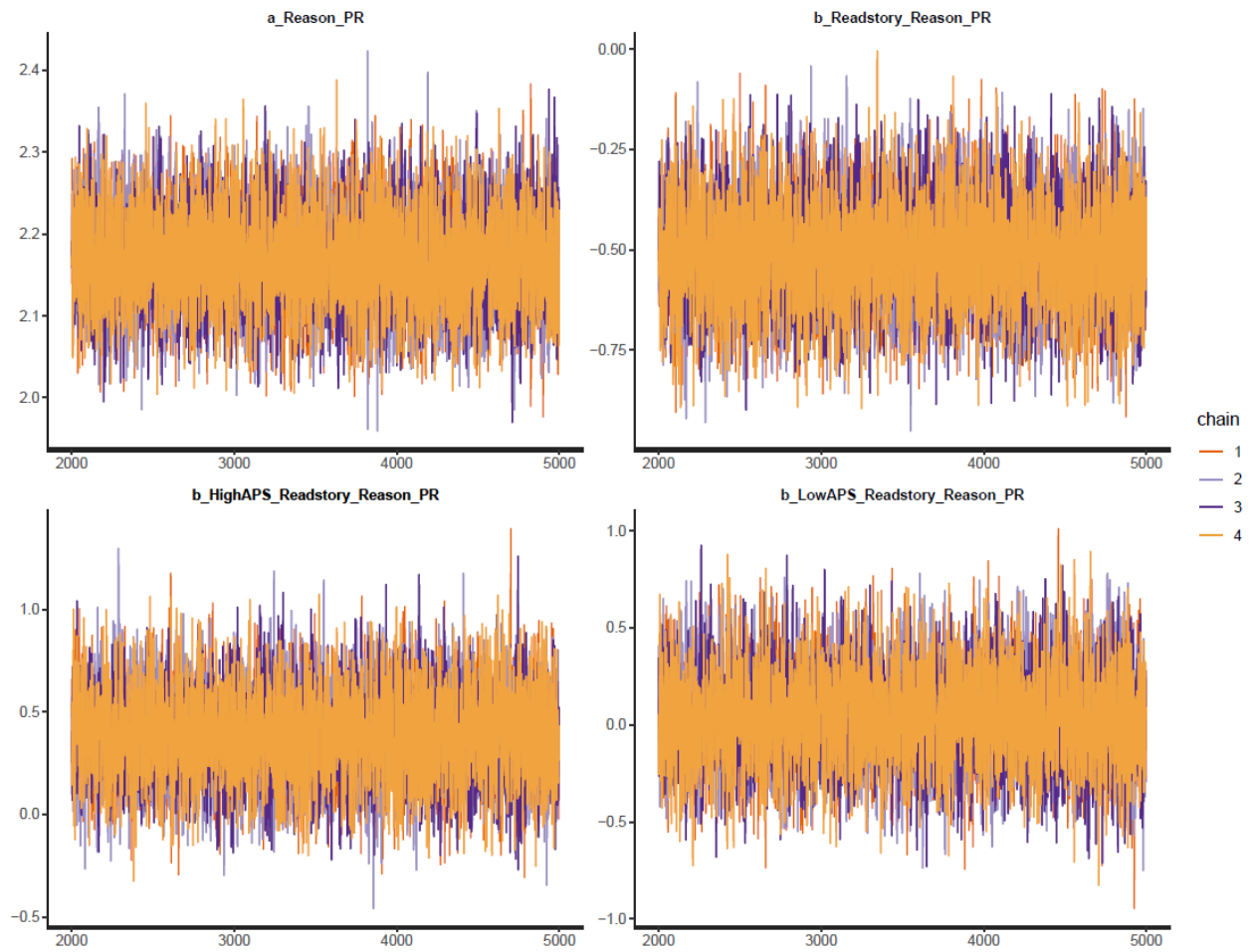


Figure S10: Trace plots for Model 2's posterior coefficients

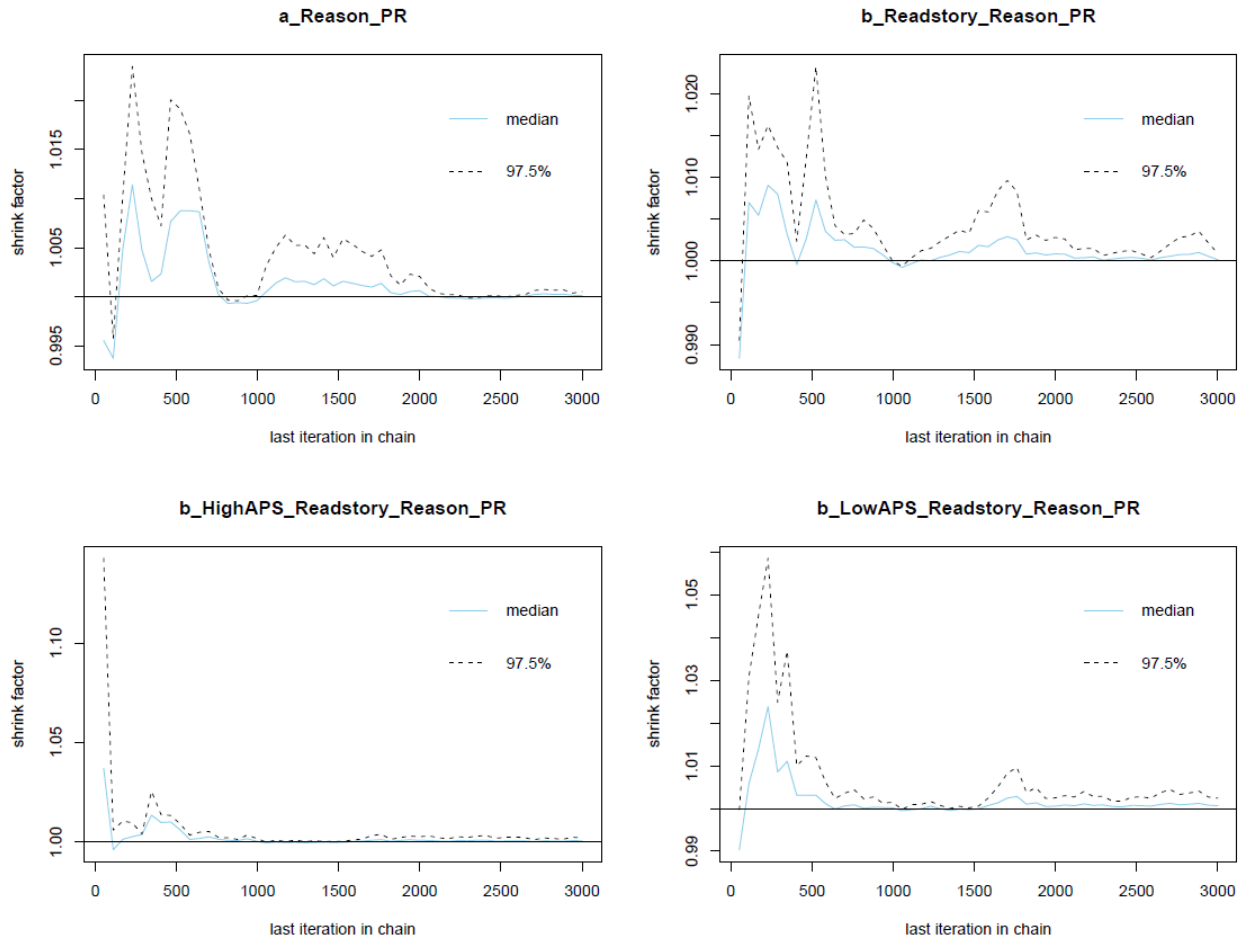


Figure S11: Gelman plots for Model 2's posterior coefficients

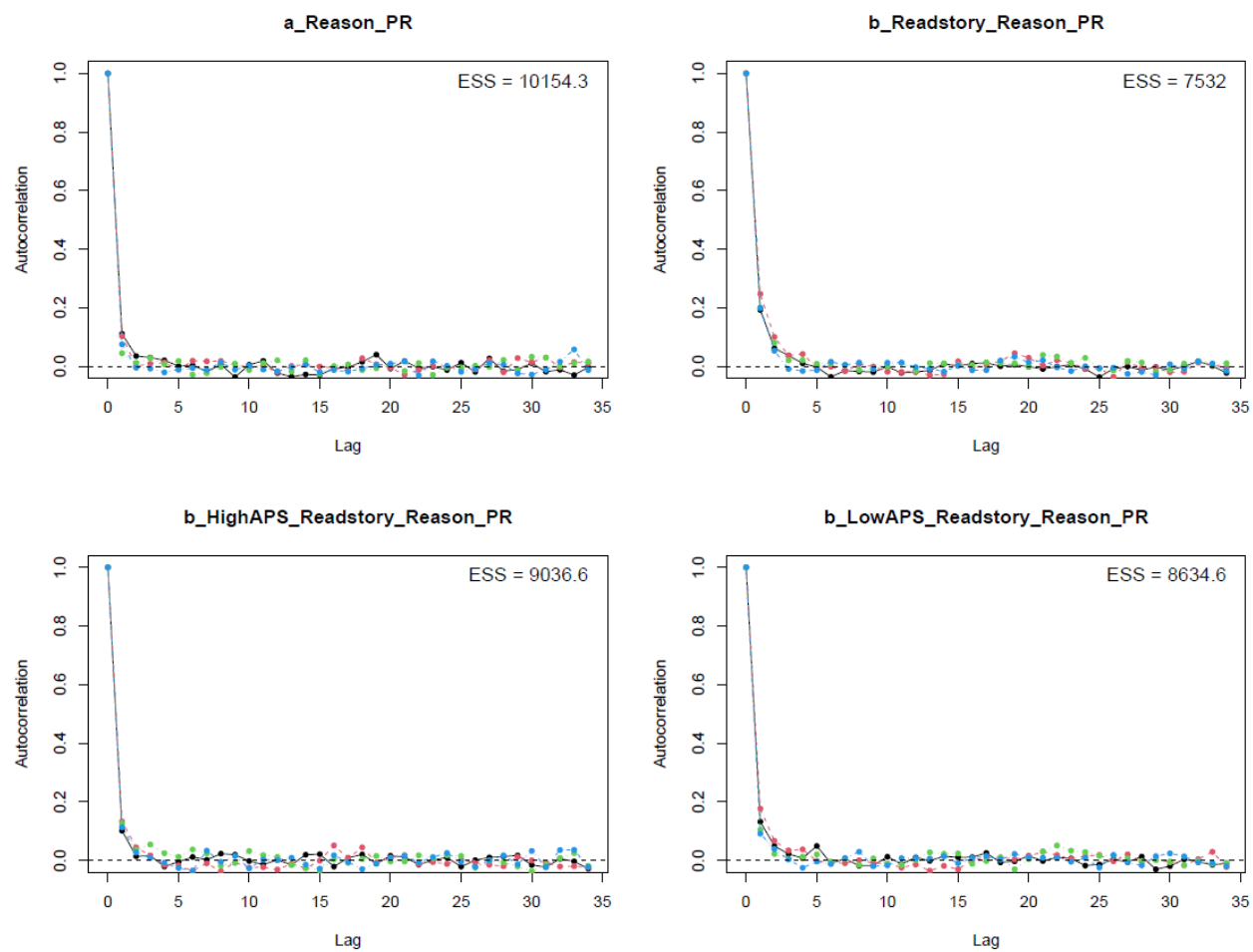


Figure S12: Autocorrelation plots for Model 2's posterior coefficients

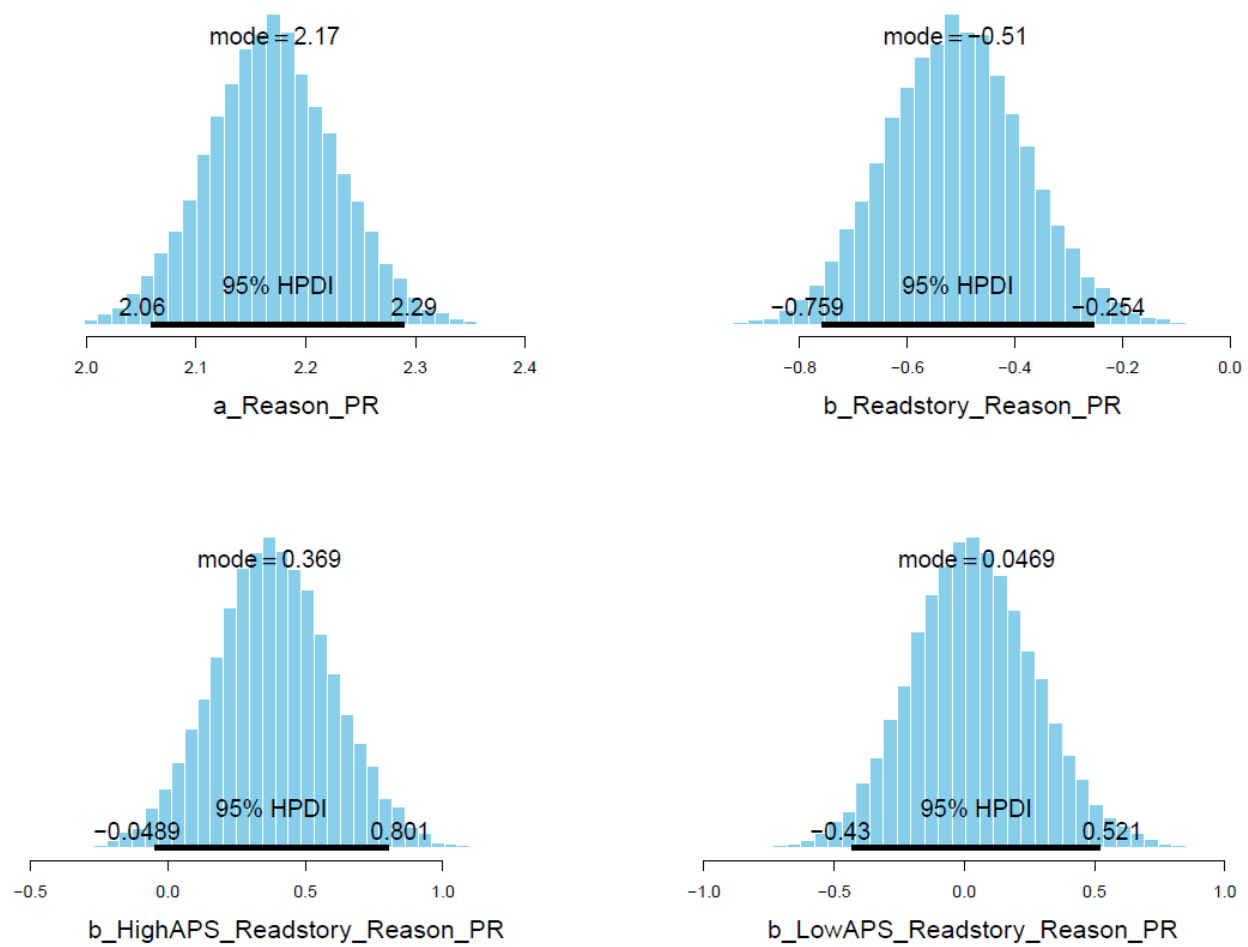


Figure S13: Distributions of Model 2's posterior coefficients with HPDI at 95%

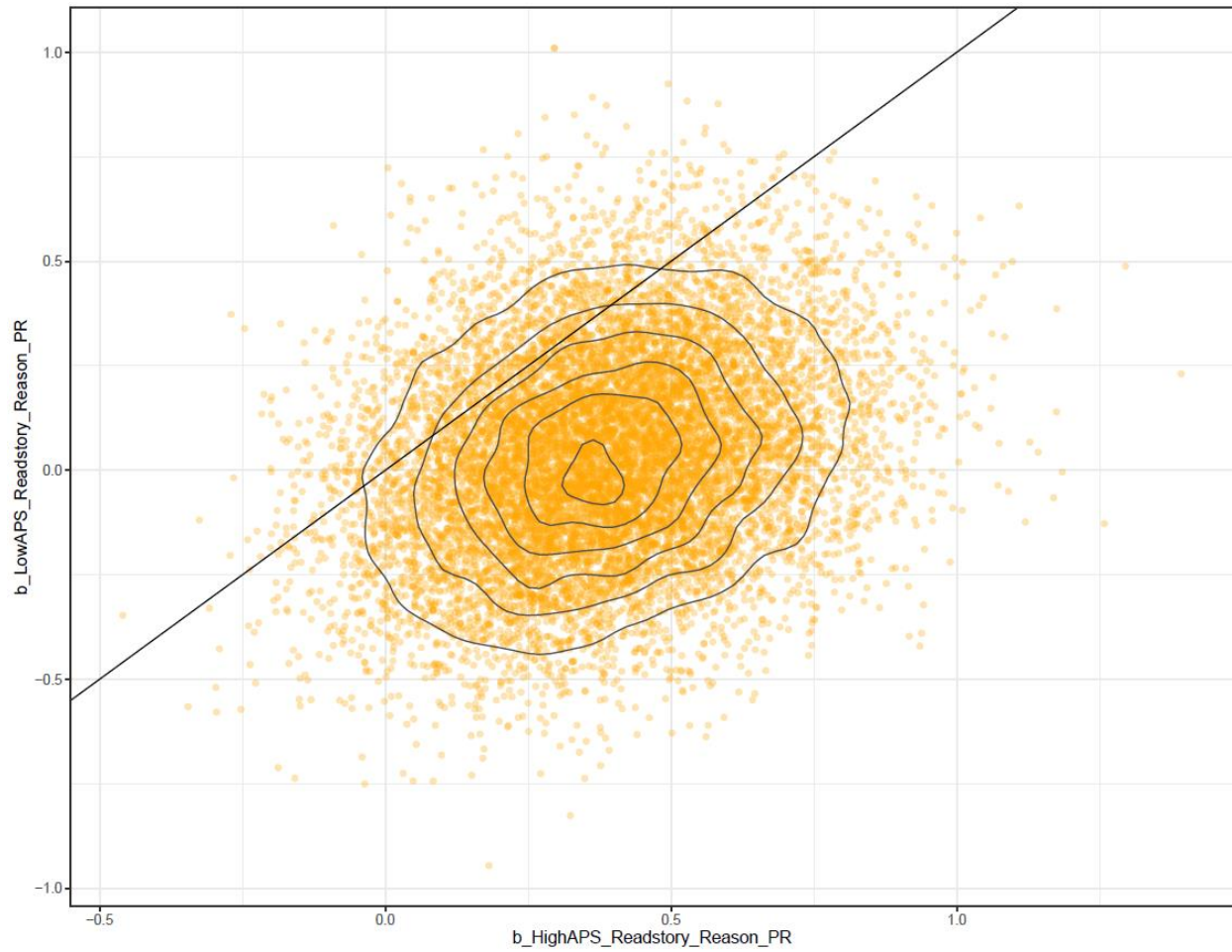


Figure S14: Pairwise distribution plot for model 2's *Readstory*HighAPS* and *Readstory*LowAPS*

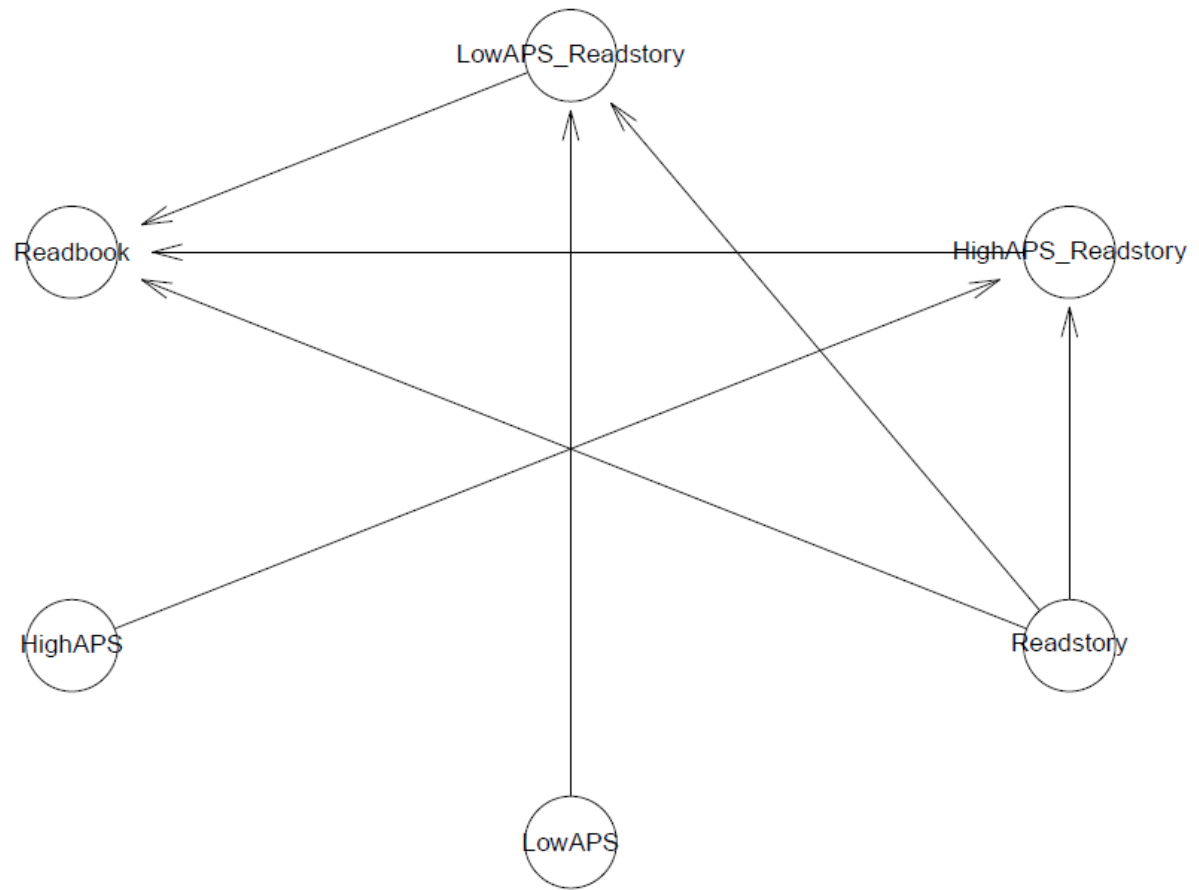


Figure S15: Model 3's logical network

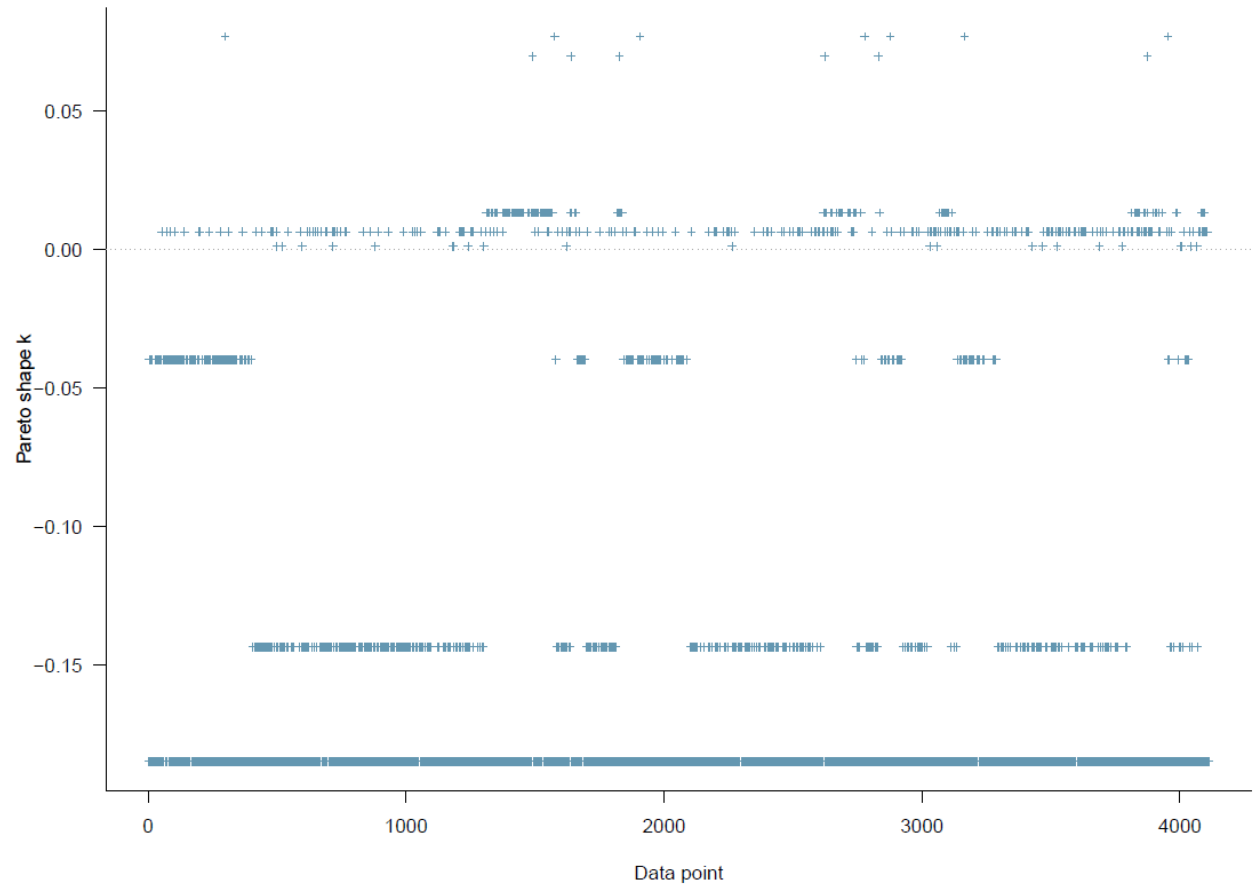


Figure S16: Model 3's PSIS diagnostic plot

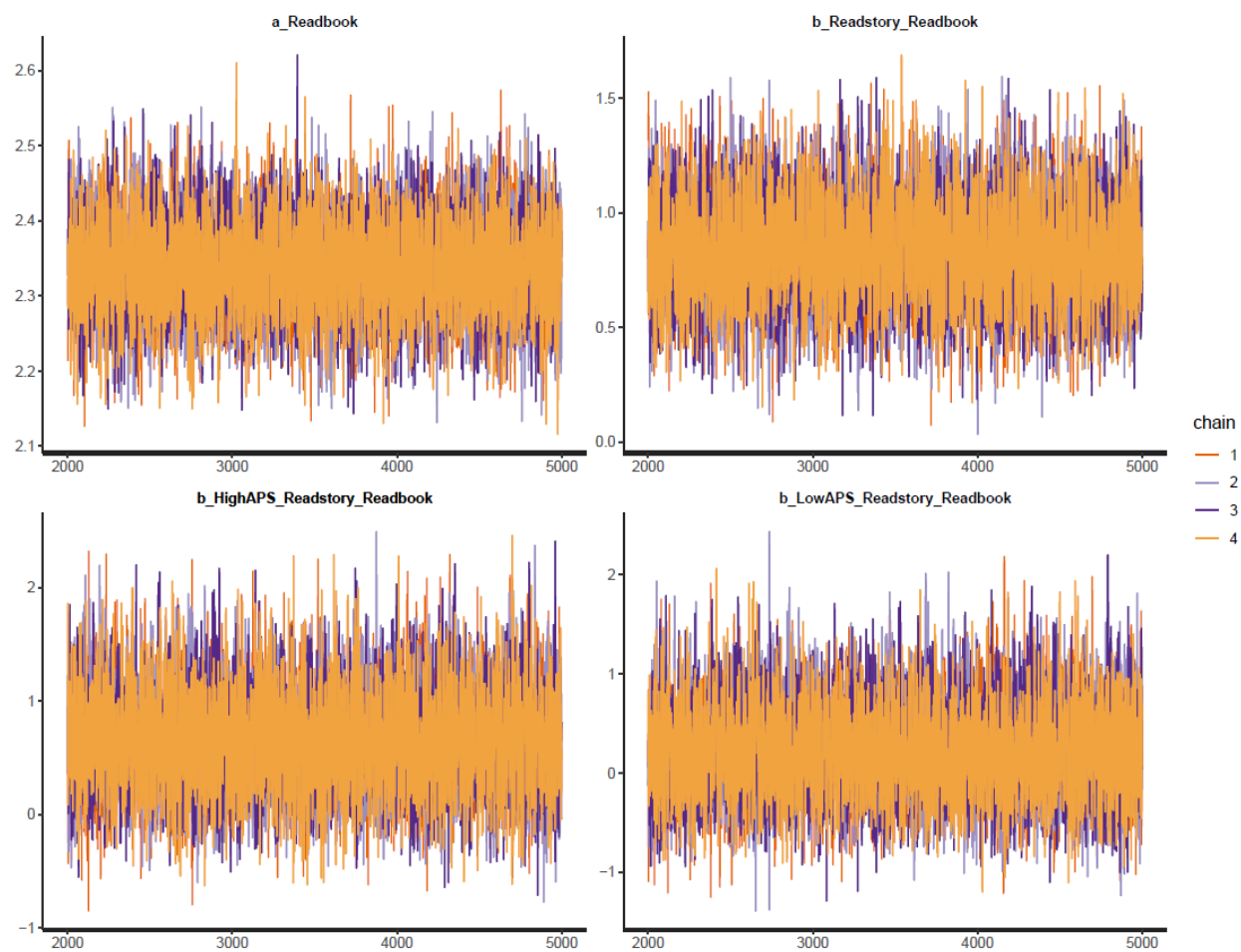


Figure S17: Trace plots for Model 3's posterior coefficients

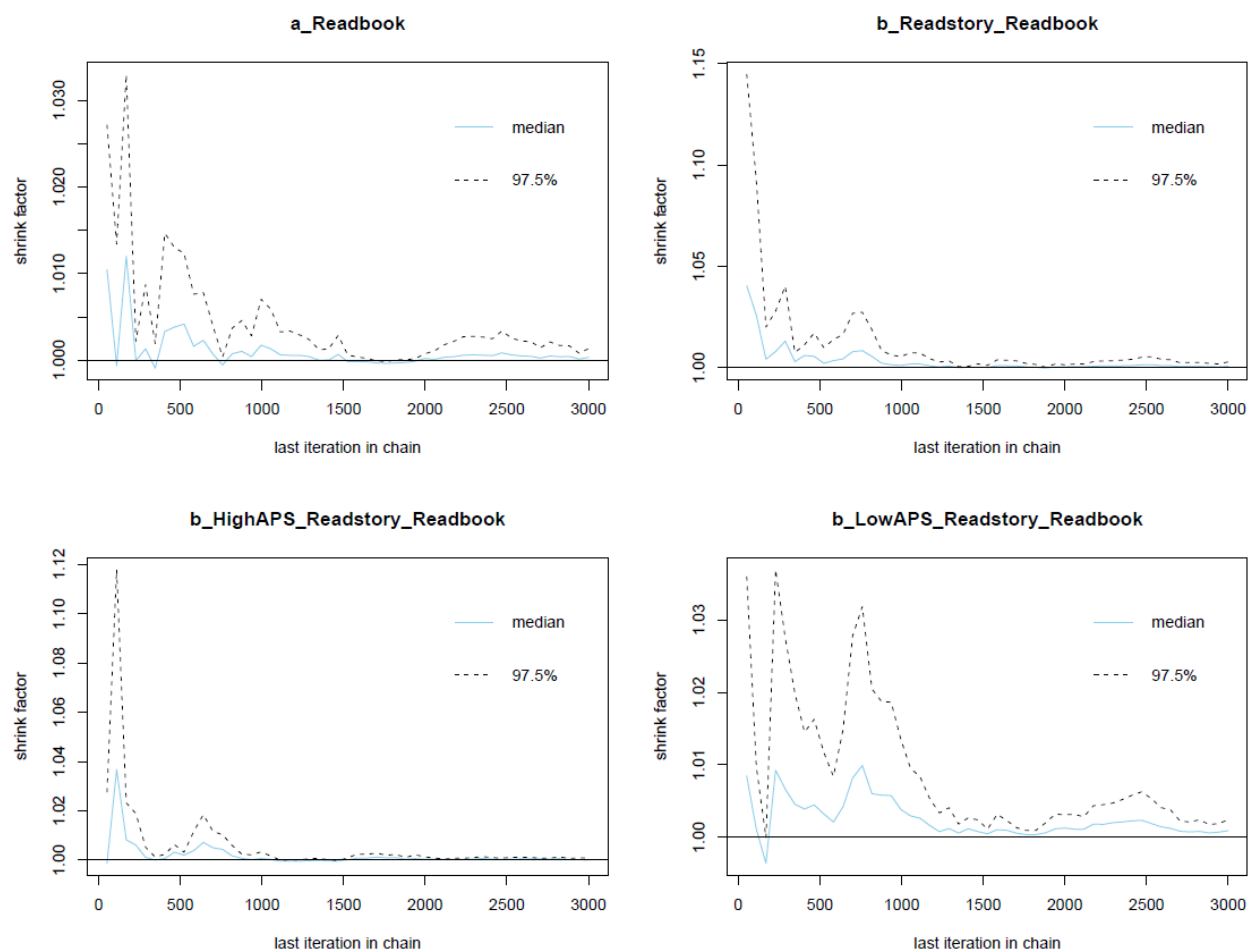


Figure S18: Gelman plots for Model 3's posterior coefficients

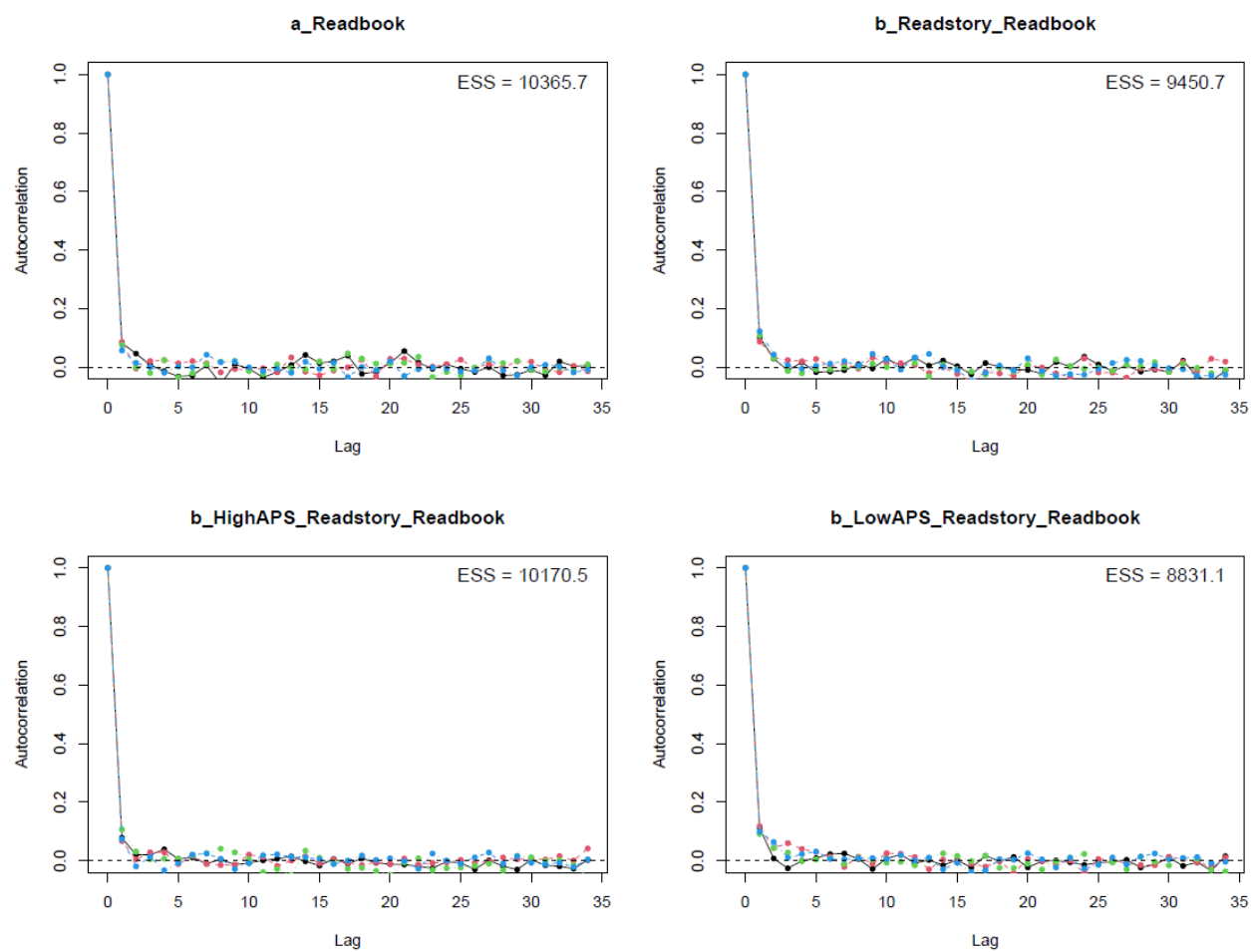


Figure S19: Autocorrelation plots for Model 3's posterior coefficients

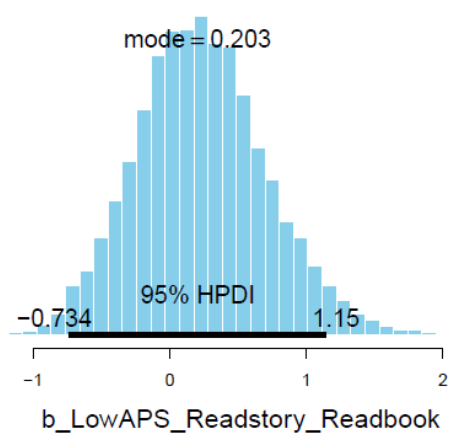
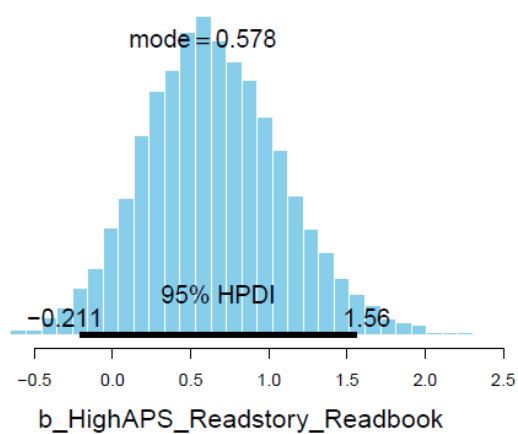
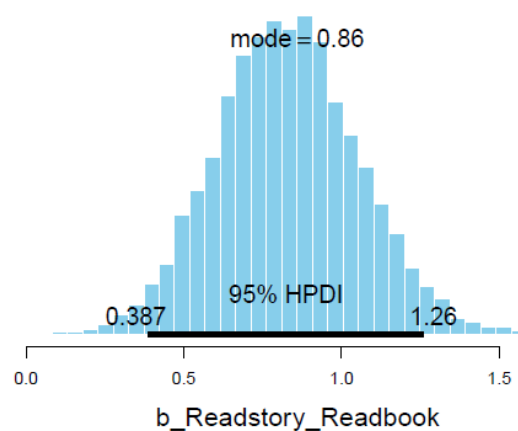
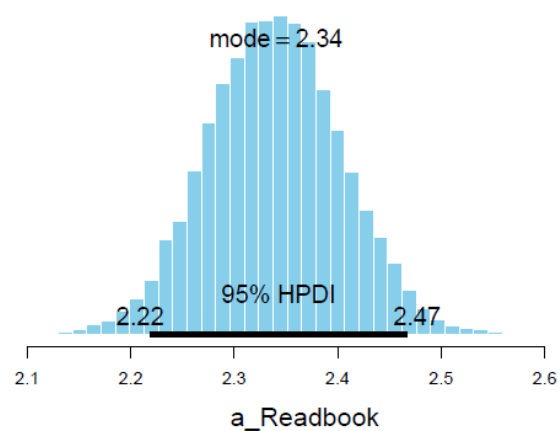


Figure S20: Distributions of Model 3's posterior coefficients with HPDI at 95%



Figure S21: Pairwise distribution plot for model 3's *Readstory*HighAPS* and *Readstory*LowAPS*