

AFFECTED PARAMETER

INDUCTION PROFILE

CHANGE IN FREE ENERGY

INDUCER BINDING

$$K_A^{(mut)} < K_A^{(wt)} < K_A^{(mut)}$$



$$K_I^{(mut)} < K_I^{(wt)} < K_I^{(mut)}$$



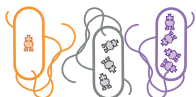
ALLOSTERIC ENERGY DIFFERENCE

$$\Delta \epsilon_{AI}^{(mut)} < \Delta \epsilon_{AI}^{(wt)} < \Delta \epsilon_{AI}^{(mut)}$$



REPRESSOR COPY NUMBER

$$R^{(mut)} < R^{(wt)} < R^{(mut)}$$



DNA BINDING ENERGY

$$\Delta \epsilon_{RA}^{(mut)} < \Delta \epsilon_{RA}^{(wt)} < \Delta \epsilon_{RA}^{(mut)}$$



fold-change

inducer concentration

fold-change

inducer concentration

fold-change

inducer concentration

fold-change

inducer concentration

fold-change

free energy

fold-change

free energy

fold-change

free energy

fold-change

free energy

ΔF

inducer concentration

ΔF

inducer concentration

ΔF

inducer concentration

ΔF

inducer concentration