

Supporting information

Table S4: Mutation and recombination frequencies leading to Rif resistance in *H. pylori* wild type strains and mutants

Recipient	Donor	Frequencies without donor DNA			Frequencies with donor DNA		
		Mean ¹	Std	Bayes Factor ²	Mean ¹	Std	Bayes Factor ²
26695	J99-R3	1.14×10 ⁻⁰⁶	4.95×10 ⁻⁰⁷		4.17×10 ⁻⁰⁵	5.37×10 ⁻⁰⁵	
	N6-R1				2.78×10 ⁻⁰⁵	7.16×10 ⁻⁰⁶	12.27
J99	26695-R1	1.56×10 ⁻⁰⁶	1.86×10 ⁻⁰⁶	8.23×10 ⁺⁰⁵	2.84×10 ⁻⁰⁴	3.28×10 ⁻⁰⁴	3.24×10 ⁺¹²
N6	26695-R1	4.56×10 ⁻⁰⁷	3.54×10 ⁻⁰⁷	3.67×10 ⁺⁰³	1.01×10 ⁻⁰⁵	1.27×10 ⁻⁰⁵	2.30
	J99-R3				9.07×10 ⁻⁰⁵	1.61×10 ⁻⁰⁴	1.16×10 ⁺⁰⁵
26695 <i>comB10</i>	J99-R3	1.23×10 ⁻⁰⁶	1.15×10 ⁻⁰⁶	0.61	1.18×10 ⁻⁰⁶	1.10×10 ⁻⁰⁶	1.97×10 ⁺⁰⁶
	J99-R3EP	9.95×10 ⁻⁰⁷	1.95×10 ⁻⁰⁷	0.08	1.40×10 ⁻⁰⁵	1.52×10 ⁻⁰⁵	1.01
26695 <i>magIII</i>	J99-R3	1.24×10 ⁻⁰⁶	3.37×10 ⁻⁰⁷	0.04	2.10×10 ⁻⁰⁵	1.97×10 ⁻⁰⁵	2.95
26695 <i>mfd</i>	J99-R3	1.05×10 ⁻⁰⁶	4.43×10 ⁻⁰⁷	0.03	6.18×10 ⁻⁰⁵	1.04×10 ⁻⁰⁴	1.06
26695 <i>mutS</i>	J99-R3	9.85×10 ⁻⁰⁷	7.95×10 ⁻⁰⁷	0.05	2.55×10 ⁻⁰⁵	3.08×10 ⁻⁰⁵	0.07
26695 <i>mutY</i>	J99-R3	2.93×10 ⁻⁰⁵	2.12×10 ⁻⁰⁵	2.47×10 ⁺⁴⁷	4.65×10 ⁻⁰⁵	2.43×10 ⁻⁰⁵	0.24
26695 <i>mutY</i> comp	J99-R3	4.37×10 ⁻⁰⁷	2.24×10 ⁻⁰⁷	1.31	1.83×10 ⁻⁰⁶	6.71×10 ⁻⁰⁷	2.24×10 ⁺⁰⁷
26695 <i>nth</i>	J99-R3	9.73×10 ⁻⁰⁶	1.23×10 ⁻⁰⁶	1.63×10 ⁺²³	2.21×10 ⁻⁰⁴	1.03×10 ⁻⁰⁴	4.06×10 ⁺⁰⁵
26695 <i>nucT</i>	J99-R3	2.43×10 ⁻⁰⁶	1.81×10 ⁻⁰⁶	1.34×10 ⁺⁰⁵	4.86×10 ⁻⁰⁵	6.43×10 ⁻⁰⁵	0.03
26695 <i>recA</i>	J99-R3	7.00×10 ⁻⁰⁸	7.00×10 ⁻⁰⁸	31.37	8.73×10 ⁻⁰⁸	7.34×10 ⁻⁰⁸	2.99×10 ⁺⁰⁹
26695 <i>recB</i>	J99-R3	1.40×10 ⁻⁰⁷	9.90×10 ⁻⁰⁸	144.25	1.25×10 ⁻⁰⁶	1.07×10 ⁻⁰⁶	8.02×10 ⁺⁰⁷
26695 <i>recG</i>	J99-R3	6.33×10 ⁻⁰⁷	3.09×10 ⁻⁰⁷	0.18	1.62×10 ⁻⁰⁴	1.21×10 ⁻⁰⁴	1.91×10 ⁺⁰³
26695 <i>recJ</i>	J99-R3	7.90×10 ⁻⁰⁷	6.04×10 ⁻⁰⁷	0.07	1.84×10 ⁻⁰⁵	1.52×10 ⁻⁰⁵	4.34
26695 <i>recJ</i> xseA	J99-R3	1.48×10 ⁻⁰⁶	5.81×10 ⁻⁰⁷	0.05	1.33×10 ⁻⁰⁴	9.69×10 ⁻⁰⁵	28.80
26695 <i>recN</i>	J99-R3	5.44×10 ⁻⁰⁷	4.82×10 ⁻⁰⁷	1.14	3.95×10 ⁻⁰⁶	7.45×10 ⁻⁰⁶	1.58×10 ⁺⁰⁸
26695 <i>recR</i>	J99-R3	8.60×10 ⁻⁰⁷	6.56×10 ⁻⁰⁷	0.05	3.46×10 ⁻⁰⁴	1.35×10 ⁻⁰⁴	1.52×10 ⁺¹¹
26695 <i>ruvA</i>	J99-R3	7.50×10 ⁻⁰⁸	8.38×10 ⁻⁰⁸	7.57×10 ⁺⁰³	1.72×10 ⁻⁰⁶	1.51×10 ⁻⁰⁶	2.41×10 ⁺⁰⁸
26695 <i>ruvB</i>	J99-R3	5.05×10 ⁻⁰⁷	1.23×10 ⁻⁰⁷	18.81	1.50×10 ⁻⁰⁶	1.52×10 ⁻⁰⁶	5.77×10 ⁺⁰⁹
26695 <i>ruvC</i>	J99-R3	1.10×10 ⁻⁰⁷	8.69×10 ⁻⁰⁸	4.37×10 ⁺⁰³	5.39×10 ⁻⁰⁶	4.65×10 ⁻⁰⁶	5.36×10 ⁺⁰⁵

26695ung	J99-R3	2.43×10⁻⁰⁶	1.25×10 ⁻⁰⁷	1.33×10 ⁺⁰³	2.08×10 ⁻⁰⁵	2.09×10 ⁻⁰⁵	0.75
26695xseA	J99-R3	1.28×10 ⁻⁰⁶	4.65×10 ⁻⁰⁷	0.03	9.69×10⁻⁰⁴	6.60×10 ⁻⁰⁴	1.01×10 ⁺²⁶
26695xth	J99-R3	1.06×10 ⁻⁰⁶	2.24×10 ⁻⁰⁷	0.09	5.76×10 ⁻⁰⁵	8.87×10 ⁻⁰⁵	0.12

¹ Cells marked in green represent significant increases of the mutation or recombination frequencies in comparison to the recipient-donor combination 26695/J99-R3 (first row). Cells marked in red show significant decreases.

² Approximated using the Bayesian Information Criterion (cf. Methods).