

Table S1 *Plasmodium* genus-specific (GenB) and species-specific *P. falciparum* (PfA) and *P. vivax* (PvA) primer and probe DNA sequences used for TaqMan™ real-time PCR detection of *Plasmodium* 18s ribosomal RNA gene.

Primer/Probe Name	Sequence
GenB-Forward	5'-TTGAACGAGGAATGCCTAGTAAGC-3'
GenB-Reverse	5'-GACGGGCGGTGTGTACAAAG-3'
GenB Probe	5'-6FAM-AGATTGTGCTGACTACGTC-TMGBNFQ-3'
PfA-Forward	5'-GCGGCGAGTACACTATATTCTTATTTG-3'
PfA-Reverse	5'-AAGCTTTTCAATCAAGCAAGTACATTC-3'
PfA Probe	5'-6FAM-AATATCCTTTTCCCTGTTCTACTA-TMGBNFQ-3'
PvA-Forward	5'-CGTATCGACTTTGTGCGCATT-3'
PvA-Reverse	5'-TTCCAAGCCGAAGCAAAGAA-3'
PvA Probe	5'-6FAM-TGCTATTATGTGTTCTTTTAA-TMGBNFQ-3'

Table S2 *Ex vivo* drug susceptibility of *P. falciparum* isolates collected during 2008-2013 in western, northern, and southern Cambodia.

Region	Drugs	2008		2009		2010		2011		2012		2013	
		N	GM(range)IC ₅₀	N	GM (range) IC ₅₀	N	GM (range) IC ₅₀	N	GM (range) IC ₅₀	N	GM (range) IC ₅₀	N	GM (range) IC ₅₀
West	DHA	56	6.6 (0.1-23.5)	79	8.5 (0.1-30.2)	26	9.6 (1.2-20.7)	43	5.3 (1.8-25.5)				
	AS	55	4.9 (0.1-17.3)	77	5.4 (0.3-20.6)	29	7.0 (1.2-18.6)	44	4.4 (1.4-13.2)				
	MQ	56	33.6 (0.7-197.8)	77	48.6 (0.7-322.1)	29	55.4 (3.8-199.5)	44	53.3 (6.4-205.2)				
	PPQ					11	17.3 (4.0-59.7)	39	17.9 (4.1-45.8)				
	QN	56	111.4 (1.8-536.8)	78	129.6 (2.1-417.5)	29	170.5 (38.7-420)	44	123.4 (15.6-336.6)				
	CQ	55	153.9 (4.2-762.2)	75	168.6 (4.0-710.7)	29	234.7 (78.3-503.8)	44	169.8 (21.5-504.1)				
	LUM	56	6.6 (0.7-39.1)	77	6.4 (0.1-68.6)	18	7.3 (1.8-39.8)						
North	DHA			127	8.1 (0.8-25.4)	44	6.4 (1.5-28.3)	40	4.5 (0.9-19.5)	8	9.8 (4.9-24.5)	89	6.0 (1.6-29.0)
	AS			136	5.3 (0.6-20.6)	48	4.7 (0.9-19.5)	38	4.3 (0.8-14.7)	8	7.3 (3.8-14.4)	86	4.6 (1.1-22.4)
	MQ			134	62.3 (6.2-205.5)	46	67.1 (15.0-245.5)	29	51.4 (3.4-178.1)	7	50.8 (8.6-179.0)	78	26.0 (0.4-216.8)
	PPQ					13	12.8 (1.2-47.3)	32	16.9 (8.4-40.3)	7	26.9 (18.3-45.8)	81	29.6 (4.4-150.1)
	QN			135	149.7 (32.2-513.6)	47	155.1 (40.8-420.7)	33	115.2 (16.9-488.1)	7	146.8 (60.5-595.4)	85	91.9 (9.7-553.0)
	CQ			135	139.4 (19.1-786)	47	153.5 (52.9-591.6)	33	161.8 (28.2-509.2)	7	118.2 (26.9-400.8)	84	112.0 (4.0-666.6)
	LUM			135	7.6 (1.0-35.7)	34	8.9 (1.3-22.5)						
	ATQ											73	6.4 (0.8-31.1)
South	DHA							72	5.3 (1.1-23.4)	11	4.4 (0.7-12.5)		
	AS							73	4.3 (1.0-13.8)	11	3.1 (0.4-9.3)		
	MQ							65	76.6 (5.1-257.2)	9	71.2 (23.1-205.3)		
	PPQ							71	15.3 (4.6-65.8)	10	14.3 (6.2-28.1)		
	QN							68	141.4 (36.9-517.9)	9	158.7 (68.7-241.3)		
	CQ							72	146.9 (15.2-556.2)	11	95.3 (35.5-298.3)		

Geometric mean IC₅₀s with range and number of samples (N) are indicated.