

Table S1. Strains and plasmids used in this study

Strain or Plasmid	Description	Reference or source
Strains		
<i>V. fischeri</i>		
MJM1100	ES114, sequenced wild-type light organ isolate	(Boettcher and Ruby, 1990)
DM159	$\Delta flrA::kan$	(Millikan and Ruby, 2003)
CAB1625	<i>fliL1::pCAB50</i> Campbell mutant	This work
CAB1626	<i>fliL2::pCAB51</i> Campbell mutant	This work
CAB1627	<i>motA1::pCAB52</i> Campbell mutant	This work
CAB1628	<i>motA2::pCAB53</i> Campbell mutant	This work
CAB1629	<i>motB2::pCAB54</i> Campbell mutant	This work
CAB1630	<i>motB1::pCAB55</i> Campbell mutant	This work
MB06265	<i>flgP::Tnerm</i>	This work
MB06357	<i>motB1::Tnerm</i>	This work
MB06428	<i>cheY::Tnerm</i>	This work
MB08164	<i>flgI::Tnerm</i>	This work
MB08359	<i>VF_0171::Tnerm</i>	This work
MB08380	<i>rfbX::Tnerm</i>	This work
MB08627	<i>VF_2581::Tnerm</i>	This work
MB08701	<i>cheA::Tnerm</i>	This work
MB08705	<i>VF_0173::Tnerm</i>	This work
MB08726	<i>igVF_0135::Tnerm</i>	This work
MB08840	<i>flhA::Tnerm</i>	This work
MB08886	<i>flrC::Tnerm</i>	This work
MB08888	<i>flil::Tnerm</i>	This work
MB09672	<i>mutS::Tnerm</i>	This work
MB09956	<i>flgH::Tnerm</i>	This work
MB10022	23s rRNA::Tnerm	This work
MB11332	<i>VF_1697::Tnerm</i>	This work
MB12230	<i>fliM::Tnerm</i>	This work
MB12341	<i>flgK::Tnerm</i>	This work
MB12561	<i>motX::Tnerm</i>	This work
MB13452	<i>rffH::Tnerm</i>	This work
MB14051	<i>VF_0172::Tnerm</i>	This work
MB14478	<i>flgT::Tnerm</i>	This work
MB14580	<i>flgE::Tnerm</i>	This work
MB14746	<i>rmlB::Tnerm</i>	This work
MB15443	<i>flhG::Tnerm</i>	This work
MB15490	<i>VF_0192::Tnerm</i>	This work
MB15821	<i>fliA::Tnerm</i>	This work
MB16040	23s rRNA::Tnerm	This work
MB16329	<i>flgL::Tnerm</i>	This work
MB16504	<i>flaA::Tnerm</i>	This work
MB16653	<i>VF_0077::Tnerm</i>	This work
MB18981	<i>fliG::Tnerm</i>	This work
MB19388	<i>flhF::Tnerm</i>	This work
MB19520	<i>fliL1::Tnerm</i>	This work
MB19624	<i>cheW::Tnerm</i>	This work
MB20044	<i>VF_A0058::Tnerm</i>	This work
MB20794	<i>fliN::Tnerm</i>	This work
MB20979	<i>cheZ::Tnerm</i>	This work
MB21386	<i>flgO::Tnerm</i>	This work
MB21407	<i>flrA::Tnerm</i>	This work

MB21447	<i>fliR</i> ::T _{term}	This work
MB21566	<i>flgN</i> ::T _{term}	This work
MB22953	<i>fliF</i> ::T _{term}	This work
MB23025	<i>flgF</i> ::T _{term}	This work
MB23130	<i>mshB</i> ::T _{term}	This work
MB23533	<i>flgG</i> ::T _{term}	This work
MB23837	<i>cheB</i> ::T _{term}	This work
MB24277	<i>VF_1491</i> ::T _{term}	This work
MB24439	<i>flaD</i> ::T _{term}	This work
MB24714	<i>flrB</i> ::T _{term}	This work
MB25656	16s rRNA::T _{term}	This work
MB26712	<i>motY</i> ::T _{term}	This work
MB26857	16s rRNA::T _{term}	This work
MB27080	<i>fliD</i> ::T _{term}	This work
MB28068	ig <i>VF_1874</i> ::T _{term}	This work
MB28468	<i>flgD</i> ::T _{term}	This work
MB28617	23s rRNA::T _{term}	This work
MB28641	<i>motA1</i> ::T _{term}	This work
MB29802	<i>fliK</i> ::T _{term}	This work
MB30445	<i>rpoN</i> ::T _{term}	This work
MB30578	<i>fliH</i> ::T _{term}	This work
MB31054	ig <i>VF_1837</i> ::T _{term}	This work
MB31274	<i>mukF</i> ::T _{term}	This work
MB32667	<i>can</i> ::T _{term}	This work
MB32946	<i>amiB</i> ::T _{term}	This work
MB33180	16s rRNA::T _{term}	This work
MB33191	<i>VF_0189</i> ::T _{term}	This work
MB33314	<i>mukB</i> ::T _{term}	This work
MB33650	<i>VF_0174</i> ::T _{term}	This work
<i>E. coli</i>		
DH5 α -Apir	Cloning strain	(Hanahan, 1983)
Plasmids		
pMJM10	Plasmid used for T _{term} transposition, kan ^R	This work
pEVS122	<i>oriR6K</i> -based suicide vector, erm ^R	(Dunn <i>et al.</i> , 2005)
pVSV105	pES213-based plasmid used for complementation, cam ^R	(Dunn <i>et al.</i> , 2006)
pAKD701	pES213-based plasmid used for reporter fusions, kan ^R	(Dunn and Stabb, 2008)
pEVS104	conjugative helper plasmid, kan ^R	(Stabb and Ruby, 2002)
pCAB52	pEVS122 containing a fragment of <i>motA1</i> ORF	This work
pCAB55	pEVS122 containing a fragment of <i>motB1</i> ORF	This work
pCAB53	pEVS122 containing a fragment of <i>motA2</i> ORF	This work
pCAB54	pEVS122 containing a fragment of <i>motB2</i> ORF	This work
pCAB50	pEVS122 containing a fragment of <i>fliL1</i> ORF	This work
pCAB51	pEVS122 containing a fragment of <i>fliL2</i> ORF	This work
pCAB11	pVSV105 with the <i>flgOP</i> complementing fragment	This work
pCAB12	pVSV105 with the <i>flgP</i> complementing fragment	This work
pCAB60	pVSV105 with the <i>flgT</i> complementing fragment	This work
pCAB58	pVSV105 with the <i>VF_1491</i> complementing fragment	This work
pCAB59	pVSV105 with the <i>amiB</i> complementing fragment	This work

pCAB66	pVSV105 with the <i>mukB</i> complementing fragment	This work
pCAB65	pVSV105 with the <i>mutS</i> complementing fragment	This work
pCAB56	pVSV105 with the <i>flil2</i> complementing fragment	This work
pCAB36	pAKD701 with the <i>fliE</i> promoter	This work
pCAB37	pAKD701 with the <i>flhA</i> promoter	This work
pCAB38	pAKD701 with the <i>flrB</i> promoter	This work
pCAB39	pAKD701 with the <i>fliK</i> promoter	This work
pCAB47	pAKD701 with the <i>flgA</i> promoter	This work
pCAB40	pAKD701 with the <i>flgB</i> promoter	This work
pCAB44	pAKD701 with the <i>flaD</i> promoter	This work
pCAB41	pAKD701 with the <i>motX</i> promoter	This work
pCAB46	pAKD701 with the <i>motA1</i> promoter	This work
pCAB48	pAKD701 with the <i>flgO</i> promoter	This work
pCAB49	pAKD701 with the <i>flgT</i> promoter	This work
