

1 10 20 30 40 50 60 70 80 90 100 110 120 130

P. putida MDRVRNLL~~EQIQGR~~LDELNKAERKYAEVILLNPQQATRFIAALAAQAAKVSEPTVNRFCR~~SFGVSGYPELKLQLAQLASG~~AAYVSR~~AV~~EA~~DD~~PAAYTQKIFGSAIASLDSACQQLDPQQVSRAYDMHI

P. entomophila MDRVRNLL~~EQIQGR~~LDELNKAERKYAEVILLNPQQATRFIAALAAQAAKVSEPTVNRFCR~~SFGVSGYPELKLQLAQLASG~~AAYVSR~~AV~~EA~~DD~~PAAYTQKIFGSAIASLDSACQALDPQQVSRAYDMHI

P. syringae MDRVRNLL~~EQIQGR~~LDELNKAERKYAEVILLNPQMATRLIAALAAQAAKVSEPTVNRFCR~~SFVSGYPELKLQLAQLASG~~AAYVSR~~AV~~EA~~DD~~NPEAYTQKIFGSAIASLDSACQQLDPALVSKSDMLI

P. fluorescens MDRVRNLL~~EQIQSR~~LDELNKAERKYAEVILLNPQQATRFIAALAAQAAKVSEPTVNRFCR~~SFGVSGYPELKLQLAQLASG~~AAYVSR~~AV~~EA~~DD~~NPEAYTQKIFGSAIASLDSACQALDPNLISRAYDILLI

P. mendocina MDRVRNLL~~EQIQSR~~LDDLNKAERKYAEVILHDPQQATRFIAALAAQAAKVSEPTVNRFCR~~SFGANGYPELKLQLAQLASG~~AAYVSR~~AV~~SA~~DD~~GPEAYTRKIFGSTIASLDAACQSLDPQHVSRAYDILLI

P. aeruginosa MKNLLE~~EQIQSR~~LDELNKAERKYAEVILQNPQQATRFIAALAAQAAKVSEPTVNRFCR~~SFGMSGYPELKLQLAQLASG~~AAYVSR~~AV~~EA~~DD~~GPEAYTRKIFGSAIASLDSAHKLLDPRAIDRAYDILLI

P. stutzeri MAEVILRNPQQATRFIAALAAQAAKVSEPTVNRFCR~~SFGVSGYPELKLQLAQLASG~~AAYVSR~~AV~~EP~~DD~~GPAEYTRKIFGSAIASLDSACQSLDPQLVSRAYDLMHI

Consensus mdrvrnll~~eqiq.rldelnkaerkv~~AEVIL.#PQqATRFIAALAAQAA.VSEPTVNRFCR~~SfgvsGYPELKLQLAQLASGAR~~AAYVsr~~AV~~ea~~DD~~gPeaYTrKIFgsaIASLDSAcq.LDPql!sraVD\$\$I

131 140 150 160 170 180 190 200 210 220 230 240 250 260

P. putida QARQIHFFGLGASAPVALDAQHKFFRNLAVSAHADVLMQRMLASVAHTGDLFVVISYTGRTRELVEVARLARENGASYLGLTAGSPLA~~NA~~CSLSLHIPLPEDTDIYHPMTSRIIQLTVLDVLTG~~MTL~~

P. entomophila QARQIHFFGLGASAPVALDAQHKFFRNLAVSAHADVLMQRMLASVAHTGDLFVVISYTGRTRELVEVARLARENGASYLGLTAGSPLA~~QA~~CSLSLHIPLPEDTDIYHPMTSRIIQLTVLDVLTG~~MTL~~

P. syringae QARQIHFFGLGASAPVALDAQHKFFRNLAVTAHADVLMQRMLASVAHTGELFVVISYTGRTRELVEVARIRARENGASYLGLTAGSPLA~~QA~~STVSLNIPLPEDTDIYHPMTSRIIQLTVLDVLTG~~MTL~~

P. fluorescens QARQIHFFGLGASAPVALDAQHKFFRNLAVTAHADVLMQRMLASVAHTGELFVVISYTGRTRELVEVARIRARENGASYLGLTAENSPLA~~KA~~STLSLNIPLPEDTDIYHPMTSRIIQLTVLDVLTG~~MTL~~

P. mendocina QARQIHFFGLGASASVALDAQHKFFRNLAVSAHADVLMQRMLASVAHTGDLFVVISYTGRTRELVEVARLARENGASYLGLTAGSPLA~~KA~~STLSLDIPLPEDTDIYHPMTSRIIQLTVLDVLTG~~VTL~~

P. aeruginosa QARQIHFFGLGASASVALDAQHKFFRNLAVSAHADVLMQRMLASVAHTGDLFVVISYTGRTRELVEVAHLARENGASYLGLTAGSPLA~~RA~~STLCLDIPLPEDTDIYHPMTSRIIQLTVLDVLTG~~VTL~~

P. stutzeri QARQIHFFGLGASASVALDAQHKFFRNLAVTAHADVLMQRMLASVAHTGELFVVISYTGRTRELVEVARIRARENGASYLGLTAGSPLA~~QA~~STLSLNIPLPEDTDIYHPMTSRIIQLTVLDVLTG~~MTL~~

Consensus QARQIHFFGLGASAsVALDAQHKFFRNLAVtAhaDVLQQRMLASVAHTG#LFV!ISYTGRTRELVEVAriARENGASYLGLTAagSPLA.AstlsLNIPLPEDTDIYHPMTSRIIQLTVLDVLTGnTL

261 270 280 290

P. putida RRGVDFQPHLRKIKESLNASRYPIEDDDLN

P. entomophila RRGVDFQPHLRKIKESLNASRYPIEDDLS

P. syringae RRGVDFQPHLRKIKESLNDSRYPIEDQG

P. fluorescens RRGVDFQPHLRKIKESLNASRYPYGDEFN

P. mendocina RRGVDFQPHLRKIKESLTASRYPADEEPL

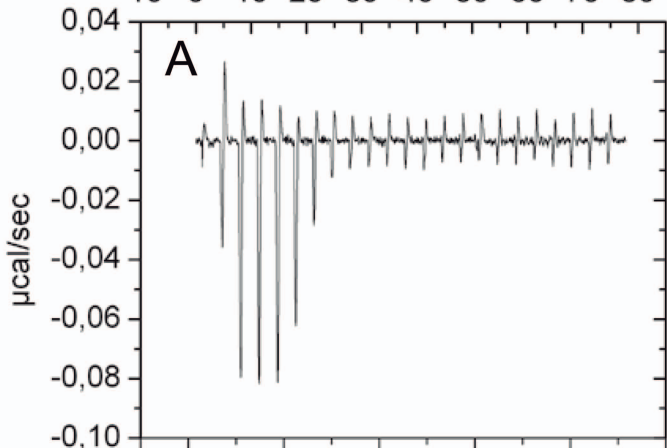
P. aeruginosa RRGVDFQPHLRRIKESLVPTRYPLDEDN

P. stutzeri RRGVDFQPHLRKYKESLNASRYPADEEPS

Consensus RRGVDFQPHLRk!KESLnasRYP.d##...

Time (min)

-10 0 10 20 30 40 50 60 70 80



kcal/mole of injectant

