

Alignment of all alleles observed in PF10_0348 (reference strain 3D7 from PlasmoDB included for comparison)

PlasmoDB 3D7 ref	MKKIYSIFFSLFILNLHIYIKNIKCNLINVNDNSLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
<i>Plasmodium reichenowi</i>	DSNLRNGLLNNSLDAATNGLNKDNSFIDSKEEHENNSYQNKDNNISIVGQDVPITSVYSSKIINAND
3D7	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
RO33	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
FCR3	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
Wellcome	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
T996	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
T9102	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
K1	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
Dd2	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
D10	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
FCC2 A	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
D6 A	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
Palo Alto A	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
HB3	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
7G8	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
FCC2 B	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
D6 B	DSNLRNGLLNNNSLDLTNGLNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
Palo Alto B	NNKDNSFIDSKEEHENKSQNKDNNISIVGQDVPITSVYSSKIINAND
PlasmoDB 3D7 ref	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
<i>Plasmodium reichenowi</i>	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNALSCPENFCGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRRKLCLR-N
3D7	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
RO33	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
FCR3	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
Wellcome	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
T996	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
T9102	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
K1	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
Dd2	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
D10	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
FCC2 A	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
D6 A	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
Palo Alto A	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
HB3	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
7G8	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
FCC2 B	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
D6 B	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N
Palo Alto B	LEGNSIDDTKGLSVTNSGFDDGSAFGGGLPFSGYSPLOQGNHNCPPDENFKGIKNVLCPPKNSTGRNGDWISVAVKESSTTNKGVLVPPRTKLCLR-N

PlasmoDB 3D7 ref	INKVWHRIKDEKNFKEEFVKVALGESNALMKHYKEKNLNALTAIKYGFSDMGDI IKGTLIDYQITKNINRALDKILRNETSN	DKIKKRVDWWEANKSA
<i>Plasmodium reichenowi</i>	I THI WYR IN DEKNFKEE KFFKD ALGE SNAL T KY KE KNL NPL TAI KY GF SD MG DI IK G TD LID Y QIT KN IN RAL D KIL C NER SN	A EIKN RV DW WEANKSE
D7	INKVWHRIKDEKNFKEEFVKVALGESNALMKHYKEKNLNALTAIKYGFSDMGDI IKGTLIDYQITKNINRALDKILCNERSN	DKIKKRVDWWEANKSA
RO33	INKVWHRIKDEKNFKEEFVKVALGESNALMKHYKEKNLNALTAIKYGFSDMGDI IKGTLIDYQITKNINRALDKILCNERSN	DKIKKRVDWWEANKSA
FCR3	INKVWHRIKDEKNFKEEFVKVALGESNALMKHYKEKNLNALTAIKYGFSDMGDI IKGTLIDYQITKNINRALDKILCNERSN	DKIKKRVDWWEANKSA
Wellcome	INKVWHRIKDEKNFKEEFVKVALGESNALMKHYKEKNLNALTAIKYGFSDMGDI IKGTLIDYQITKNINRALDKILCNERSN	DKIKKRVDWWEANKSA
T996	INKVWHRIKDEKNFKEEFVKVALGESNALMKHYKEKNLNALTAIKYGFSDMGDI IKGTLIDYQITKNINRALDKILCNERSN	DKIKKRVDWWEANKSA
T9102	INKVWHRIKDEKNFKEEFVKVALGESNALMKHYKEKNLNALTAIKYGFSDMGDI IKGTLIDYQITKNINRALDKILCNERSN	DKIKKRVDWWEANKSA
K1	INKVWHRIKDEKNFKEEFVKVALGESNALMKHYKEKNLNALTAIKYGFSDMGDI IKGTLIDYQITKNINRALDKILCNERSN	DKIKKRVDWWEANKSA
Dd2	INKVWHRIKDEKNFKEEFVKVALGESNALMKHYKEKNLNALTAIKYGFSDMGDI IKGTLIDYQITKNINRALDKILCNERSN	DKIKKRVDWWEANKSA
D10	INKVWHRIKDEKNFKEEFVKVALGESNALMKHYKEKNLNALTAIKYGFSDMGDI IKGTLIDYQITKNINRALDKILCNERSN	DKIKKRVDWWEANKSA
FCC2 A	INNFPELKKT EGKFENFIYSSAGSEAKQLIKLYGNNT EKA LQAM KYG FAD I GNIV QGND M ID T P TS NKT KTY LEE VLG KQY KVN VND PK DAKT TWI QN KHR	
D6 A	INNFPELKKT EGKFENFIYSSAGSEAKQLIKLYGNNT EKA LQAM KYG FAD I GNIV QGND M ID T P TS NKT KTY LEE VLG KQY KVN VND PK DAKT TWI QN KHR	
Palo Alto A	INNFPELKKT EGKFENFIYSSAGSEAKQLIKLYGNNT EKA LQAM KYG FAD I GNIV QGND M ID T P TS NKT KTY LEE VLG KQY KVN VND PK DAKT TWI QN KHR	
HB3	INNFPELKKT EGKFENFIYSSAGSEAKQLIKLYGNNT EKA LQAM KYG FAD I GNIV QGND M ID T P TS NKT KTY LEE VLG KQY KVN VND PK DAKT TWI QN KHR	
7G8	INNFPELKKT EGKFENFIYSSAGSEAKQLIKLYGNNT EKA LQAM KYG FAD I GNIV QGND M ID T P TS NKT KTY LEE VLG KQY KVN VND PK DAKT TWI QN KHR	
FCC2 B	INNFPELKKT EGKFENFIYSSAGSEAKQLIKLYGNNT EKA HQA I RYS FAD I GNIL IRG D DMM O T P TS KET IT Y LE KV L KI YN EN N DKPK DAKK NWI TE RHH	
D6 B	INNFPELKKT EGKFENFIYSSAGSEAKQLIKLYGNNT EKA HQA I RYS FAD I GNIL IRG D DMM O T P TS KET IT Y LE KV L KI YN EN N DKPK DAKK NWI TE RHH	
Palo Alto B	INNFPELKKT EGKFENFIYSSAGSEAKQLIKLYGNNT EKA HQA I RYS FAD I GNIL IRG D DMM O T P TS KET IT Y LE KV L KI YN EN N DKPK DAKK NWI TE RHH	
PlasmoDB 3D7 ref	FWDAFMCGYKVHIGNKPCPEHDNMDRIPQYLRWFREWGTVCSEYKNKFEDVIKLCNIQQFTNQDDSQLLEISKKDKCKEALKHYEEWVNRRRPEWKGQC	
<i>Plasmodium reichenowi</i>	LWDALMCGYKIHIGNKACP EHDNMDRIPQYLRWFREWGTVCSEYKNKFENVIKLCNIQQFTNQDDSQLLGLSNDKCKDALKH YEEWLNRRRPEWKGQC	
3D7	FWDAFMCGYKVHIGNKPCPEHDNMDRIPQYLRWFREWGTVCSEYKNKFENVIELCNVRQITNQDDSQLLEISKKDKCKEALKHYEEWVNRRRPEWKGQC	
RO33	FWDAFMCGYKVHIGNKPCPEHDNMDRIPQYLRWFREWGTVCSEYKNKFENVIELCNVRQITNQDDSQLLEISKKDKCKEALKHYEEWVNRRRPEWKGQC	
FCR3	FWDAFMCGYKVHIGNKPCPEHDNMDRIPQYLRWFREWGTVCSEYKNKFENVIELCNVRQITNQDDSQLLEISKKDKCKEALKHYEEWVNRRRPEWKGQC	
Wellcome	FWDAFMCGYKVHIGNKPCPEHDNMDRIPQYLRWFREWGTVCSEYKNKFENVIELCNVRQITNQDDSQLLEISKKDKCKEALKHYEEWVNRRRPEWKGQC	
T996	FWDAFMCGYKVHIGNKPCPEHDNMDRIPQYLRWFREWGTVCSEYKNKFENVIELCNVRQITNQDDSQLLEISKKDKCKEALKHYEEWVNRRRPEWKGQC	
T9102	FWDAFMCGYKVHIGNKPCPEHDNMDRIPQYLRWFREWGTVCSEYKNKFENVIELCNVRQITNQDDSQLLEISKKDKCKEALKHYEEWVNRRRPEWKGQC	
K1	FWDAFMCGYKVHIGNKPCPEHDNMDRIPQYLRWFREWGTVCSEYKNKFENVIELCNVRQITNQDDSQLLEISKKDKCKEALKHYEEWVNRRRPEWKGQC	
Dd2	FWDAFMCGYKVHIGNKPCPEHDNMDRIPQYLRWFREWGTVCSEYKNKFENVIELCNVRQITNQDDSQLLEISKKDKCKEALKHYEEWVNRRRPEWKGQC	
D10	FWDAFMCGYKVHIGNKPCPEHDNMDRIPQYLRWFREWGTVCSEYKNKFENVIELCNVRQITNQDDSQLLEISKKDKCKEALKHYEEWVNRRRPEWKGQC	
FCC2 A	VWDAMMCGYKVHIGNKPCPEHDNMDRIPQYLRWFREWGTVCSEYKNKFENVIELCNVRQITNQDDSQLLEISKKDKCKEALKHYEEWVNRRRPEWKGQC	
D6 A	VWDAMMCGYKVHIGNKPCPEHDNMDRIPQYLRWFREWGTVCSEYKNKFENVIELCNVRQITNQDDSQLLEISKKDKCKEALKHYEEWVNRRRPEWKGQC	
Palo Alto A	VWDAMMCGYKVHIGNKPCPEHDNMDRIPQYLRWFREWGTVCSEYKNKFENVIELCNVRQITNQDDSQLLEISKKDKCKEALKHYEEWVNRRRPEWKGQC	
HB3	VWDAMMCGYQYEKKDNKCTGYGNIDIPQYLRWFREWGTVCSEYKNKFEDVIKLCNIQQFTNQDDSQLLEISKKDKCKEALKHYEEWVNRRRPEWKGQC	
7G8	VWDAMMCGYQYEKKDNKCTGYGNIDIPQYLRWFREWGTVCSEYKNKFEDVIKLCNIQQFTNQDDSQLLEISKKDKCKEALKHYEEWVNRRRPEWKGQC	
FCC2 B	VWEAMMCGYQSAQKDQNQCTGYGNIDIPQYLRWFREWGTVCSEYKNKFEDVIKLCNIQQFTNQDDSQLLEISKEDKCKGALKHYEEWVNRRRPEWKGQC	
D6 B	VWEAMMCGYQSAQKDQNQCTGYGNIDIPQYLRWFREWGTVCSEYKNKFEDVIKLCNIQQFTNQDDSQLLEISKEDKCKGALKHYEEWVNRRRPEWKGQC	
Palo Alto B	VWEAMMCGYQSAQKDQNQCTGYGNIDIPQYLRWFREWGTVCSEYKNKFEDVIKLCNIQQFTNQDDSQLLEISKEDKCKGALKHYEEWVNRRRPEWKGQC	

PlasmoDB 3D7 ref DKFEKEKSKYEDTKSITAECYLKEICSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
Plasmodium reichenowi 3D7 DKFEKEKNKYEDTKSITAECYLKEICSECDCKYKDDNTFKEFKDKVTLLKAVIENKKNQDSLTTTS[REDACTED]QGNSHRATVV
3D7 DKFEKEKSKYEDTKSITAECYLKEICSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
RO33 DKFEKEKSKYEDTKSRTAEIYLKEICSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
FCR3 DKFEKEKSKYEDTKSRTAEIYLKEICSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
Wellcome DKFEKEKSKYEDTKSRTAEIYLKEICSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
T996 DKFEKEKSKYEDTKSRTAEIYLKEICSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
T9102 DKFEKEKSKYEDTKSRTAEIYLKEICSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
K1 DKFEKEKSKYEDTKSRTAEIYLKEICSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
Dd2 DKFEKEKSKYEDTKSRTAEIYLKEICSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
D10 DKFEKEKSKYEDTKSRTAEIYLKEICSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
FCC2 A DKFEKEKSKYEDTKSRTAEIYLKEICSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
D6 A DKFEKEKSKYEDTKSRTAEIYLKEICSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
Palo Alto A DKFEKEKSKYEDTKSRTAEIYLKEICSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
HB3 DKFEKEKSKYEDTKSRTAEIYLKEICSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
7G8 DKFEKEKSKYEDTKSRTAEIYLKEICSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
FCC2 B DKFEKEKSKYEDTKSRTAEIYLKQKCSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
D6 B DKFEKEKSKYEDTKSRTAEIYLKQKCSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV
Palo Alto B DKFEKEKSKYEDTKSRTAEIYLKQKCSECDCKYKDDNTFKEFKDNVTLLKAVIDNKKQDSLTTSLSTSINSVRDSSNLQQRGNITTSQGNSHRATVV

PlasmoDB 3D7 ref QQVDQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
Plasmodium reichenowi 3D7 QQPDRTNII LDNVNAVTQRGNNNNNNLERGLGHGALPGTNIIITEEKKLLEF[REDACTED]LTSKDEEDITKHNDVREEIEQQEEIEEDEEELENEGEEQQEEEIEE-----
3D7 QQVDQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
RO33 QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
FCR3 QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
Wellcome QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
T996 QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
T9102 QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
K1 QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
Dd2 QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
D10 QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
FCC2 A QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
D6 A QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
Palo Alto A QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
HB3 QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
7G8 QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
FCC2 B QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
D6 B QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----
Palo Alto B QQADQTNRLDNVNSVTQRGNNNNNNLERGLSGALPGTNIIITEEKYSLELIKLSKDEEDIIKHNEDVREEIEQQDEDIEEDEEELENEGEE-----

PlasmoDB 3D7 ref	TKEEDDEEKNETNDTED	TDDTEDTEDIEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
Plasmodium reichenowi	DEEELENEGETKEEDDEEKNETNDTED	IEEENKEKG LSNQK QSEEKSIS KVDED SYRILSVSYKDNN EVKNVPESIVKKL FSLFNDN
3D7	TKEEDDEEKNETNDTED	TDDTEDTEDIEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
RO33	TKEEDDEEKNETNDTED	TDDTEDTEDIEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
FCR3	TKEEDDEEKNETNDTED	TDDTEDTEDIEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
Wellcome	TKEEDDEEKNETNDTED	TDDTEDTEDIEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
T996	TKEEDDEEKNETNDTED	TDDTEDTEDIEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
T9102	TKEEDDEEKNETNDTED	TDDTEDTEDIEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
K1	TKEEDDEEKNETNDTED	TDDTEDTEDIEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
Dd2	TKEEDDEEKNETNDTED	TDDTEDTEDIEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
D10	TKEEDDEEKNETNDTED	TDDTEDTEDIEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
FCC2 A	TKEEDDEEKNETNDTED	TDDTEDTEDIEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
D6 A	TKEEDDEEKNETNDTED	TDDTEDTEDIEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
Palo Alto A	TKEEDDEEKNETNDTED	TDDTEDTEDIEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
HB3	TKEEDDEEKNETNDTED	TDDTEDTEDIEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
7G8	TKEEDDEEKNETNDTED	TDDTEDTEDIEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
FCC2 B	TKEEDDEEKNETNDTED	IEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
D6 B	TKEEDDEEKNETNDTED	IEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
Palo Alto B	TKEEDDEEKNETNDTED	IEEENKEKELSNQQQSEKKSI SKVDED SYRILSVSYKDNN EVKNVAESIVKKL FSLFNDN
PlasmoDB 3D7 ref	NNLETIFKGLTEDMTDLFQK.	
Plasmodium reichenowi	NNLETIFKGLTEDMTNLFQK.	
3D7	NNLETIFKGLTED	
RO33	NNLETIFKGLTED	
FCR3	NNLETIFKGLTED	
Wellcome	NNLETIFKGLTED	
T996	NNLETIFKGLTED	
T9102	NNLETIFKGLTED	
K1	NNLETIFKGLTED	
Dd2	NNLETIFKGLTED	
D10	NNLETIFKGLTED	
FCC2 A	NNLETIFKGLTED	
D6 A	NNLETIFKGLTED	
Palo Alto A	NNLETIFKGLTED	
HB3	NNLETIFKGLTED	
7G8	NNLETIFKGLTED	
FCC2 B	NNLETIFKGLTED	
D6 B	NNLETIFKGLTED	
Palo Alto B	NNLETIFKGLTED	

This alignment represents all sequences observed, all B sequences were removed for MK analysis. The stop codon in RO33 is represented here in red but removed from analysis.