

HIV2/SIV NEF

Protein Alignment Summary Table (NEF)

| Name | Accession No. | Region | First Author | Reference |
|---------------------|---------------|------------------------------------|-------------------|------------------------------------|
| ROD | M15390 | complete genome | Guyader,M. | Nature 326 (6114), 662-669 (1987) |
| NHIZ | J03654 | complete genome | Zagury,J.F. | PNAS 85, 5941-5945 (1988) |
| ISY | J04498 | complete genome | Franchini,G. | PNAS 86, 2433-2437 (1989) |
| ST | M31113 | complete genome | Kumar,P. | J. Virol. 64, 890-901 (1990) |
| BEN | M30502 | complete genome | Kirchoff,F. | Virology 177, 305-311 (1990) |
| CAM2 | D00835 | complete genome | Tristem,M.F. | J. Gen. Virol. 72, 721 (1991) |
| D194 | J04542 | complete genome | Kuehnel,H. | PNAS 86, 2383-2387 (1989) |
| GHI | M30895 | complete genome | Hasegawa,A. | ARHR 5, 593-604 (1989) |
| KR | U22047 | complete genome | Kraus,G.K. | PNAS 90 (9), 4226-4230 (1993) |
| MDS | Z48731 | gag, pol, vif, tat, rev, nef, env | Becker,M. | Unpublished |
| UC2 | U38293 | complete genome | Barnett,S.W. | Unpublished (1997) |
| UC1 | L07625 | complete genome | Barnett,S.W. | J. Virol. 67, 1006-1014, (1993) |
| EHOA | U27200 | complete genome | Rey-Cuille,M.A. | Virology 202 (1), 471-476 (1994) |
| D205 | X61240 | complete genome | Dietrich Et Al,U. | ARHR 8, 1619 (1992) |
| FO7844 FOTEC ENVA13 | M87069 | partial env | Gao,F. | Nature 358, 495-499 (1992) |
| MM251 | M19499 | complete genome | Franchini,G. | Nature 328, 539-543 (1987) |
| MMPI1 | M72323 | tat, rev, nef | Colombini,S. | PNAS 86, 4813-4817 (1989) |
| MM32H | D01065 | env, gag, nef | Rud,E.W. | J. Gen. Virol. 75, 529 (1994) |
| MM1A11 | M76764 | env, gag, nef, pol, rev | Luciw,P.A. | ARHR 8: 395-402 (1992) |
| MM239 | M33262 | complete genome | Regier,D.A. | ARHR 6, 1221-1231 (1990) |
| MM142 | M16403 | complete genome | Chakrabarti,L. | Nature 328, 543-547 (1987) |
| MNE | M32741 | complete genome | Benveniste,R.E. | Unpublished (1990) |
| MM155 | L28171 | gp120, gp41, tat, rev, nef partial | Kodama,T. | Unpublished (1994) |
| MMW25 | X86727 | partial env, nef | Whatmore,A.M. | J. Virol. 69 (8), 5117-5123 (1995) |
| NEFW61 | X90853 | env, nef | Whatmore,A.M.E. | Unpublished |
| SMMPBJ | M31325 | complete genome | Dewhurst,S. | Nature 345, 636-640 (1990) |
| SMMPBJB | L03295 | complete genome | Dewhurst,S. | Nature 345, 636-640 (1990) |
| PBJ6P6 | L09212 | env, gag, nef | Hirsch,V.M.J. | J. Virol. 67, 2466-2474 (1993) |
| STM | M83293 | complete genome | Novembre,F.J. | Virology 186, 783-787 (1992) |

CONSENSUS-B-A
 M6ASGSKKTS?p2egqLrERLLrargg?c9g??2?sgdeyqsgsegsgrEQkspSCeBgYqGQdFmNtPwTrPA2egek??YkQ0MMDDVdadeddlVgvv.pvtp.rvP1R2M7Yk1AVDmshfIkekyG
 LTR ->
 ROD H-R-PR-Q -A-A-YWME-RF-D -R-R-KD-A-R-NL-R -Q-R-S-K-P-HR-I-L-TR-
 NIHZ K-L-Q -Q-ET-RKNE-G-L-H-N-N-V-A-R-EL-L-Q-F-P-
 ISY R-R-Q -Q-ET-RKNE-G-L-H-N-N-V-A-R-EL-L-Q-F-P-
 ST R-R-Q -Q-ET-RKNE-G-L-H-N-N-V-A-R-EL-L-Q-F-P-
 BEN R-R-Q -Q-ET-RKNE-G-L-H-N-N-V-A-R-EL-L-Q-F-P-
 CAM2 R-R-Q -Q-ET-RKNE-G-L-H-N-N-V-A-R-EL-L-Q-F-P-
 D194 R-R-Q -Q-ET-RKNE-G-L-H-N-N-V-A-R-EL-L-Q-F-P-
 GH1 R-R-Q -Q-ET-RKNE-G-L-H-N-N-V-A-R-EL-L-Q-F-P-
 KR R-R-Q -Q-ET-RKNE-G-L-H-N-N-V-A-R-EL-L-Q-F-P-
 MDS R-R-Q -Q-ET-RKNE-G-L-H-N-N-V-A-R-EL-L-Q-F-P-
 UC2 R-R-Q -Q-ET-RKNE-G-L-H-N-N-V-A-R-EL-L-Q-F-P-

CONSENSUS-B
 UC1 -SA--q-kqQ? -??e?Py-?1SgtrregS-r-pG-DKdLN -na?gAE.....GGG-D?es-E-hE-??y-R-??-p-
 EH0A -SA--Q-KQOP -R-PR-ESSGERRERSL-YPG-DKGLN -D-KTIGAE.....GGG-DT-S-E-NE-Y-R-NR-S-M-I-L-E
 D205 -SA--ERQ -K-VPERP-RLSGERREGS-R-PGE-DKdLN -NARGAE.....GGG-DA-ES-E-E-A#Y-R-#I-p-
 CONSENSUS-D
 F07841 x-----
 5 x-----
 5 x-----

CONSENSUS-SD
 MM251 --gai-?-k?gd-q-ety-rl-ewBdg--lg-ldkGls-l--k-n-qy--N-e-r-La-Rk-----e-----s-i-
 MMP11 --GAI-MR-K-AGD-QK-ETY-RLlGVEVDGS--Lg-L-KGls-R--K-N-QY--N-E-K-LA-RK-I-EE--S-R-K-A-I-
 MM239 --GAI-MR-K-TGD-QK-ETY-RLlGVEVDGS--Lg-L-KGls-R--K-N-QY--N-E-K-LA-RK-I-EE--S-R-K-A-I-
 MM1A11 --GAI-RR-KSAGD-Q-ETY-RLlGVEVDGS--Lg-LDKGls-L--K-N-QY--N-E-R-LA-RK-----E-
 MM239 --GAI-MR-R-GD-Q-ETY-RLlGVEVDGS--Lg-LDKGls-L--K-N-QY--N-E-R-LA-RK-----E-
 MM1 42 --GAI-RR-KSAGD-Q-ETY-RLlGVEVDGS--Lg-LDKGls-L--K-N-QY--N-E-R-LA-RK-----E-
 MNE --GAI-MR-R-GD-Q-ETY-RLlGVEVDGS--Lg-LDKGls-L--K-N-QY--N-E-R-LA-RK-----E-
 MM155 --GAI-MR-R-GD-Q-ETY-RLlGVEVDGS--Lg-LDKGls-L--K-N-QY--N-E-R-LA-RK-----E-
 MM25 --XRR-KSAGD-Q-ETY-RLlGVEVDGS--Lg-LDKGls-L--K-N-QY--N-E-R-LA-RK-----E-
 NEFM61 --GVT-ORRRGN-Y-Q-ETY-XllGVEVDG--Lg-LDKGls-L--K-N-QY--N-E-R-LA-RK-----E-
 SMPB1A --GVT-ORRRGN-Y-Q-ETY-RLlGVEVDGS--Lg-LDKGls-L--K-N-QY--N-E-R-LA-RK-----E-
 SMPB1B --GVT-ORRRGN-Y-Q-ETY-RLlGVEVDGS--Lg-LDKGls-L--K-N-QY--N-E-R-LA-RK-----E-
 PJ16P6 --GVT-ORRRGN-Y-Q-ETY-RLlGVEVDGS--Lg-LDKGls-L--K-N-QY--N-E-R-LA-RK-----E-
 SMP9 --GVT-ORXAGN-x-Q-ETY-RLlGVEVDGS--Lg-LDKGls-L--K-N-QY--N-E-R-LA-RK-----E-
 SMPM4 --GAI-OYKRRGN-Q-ETY-RLlGVEVDGS--Lg-LDKGls-L--K-N-QY--N-E-R-LA-RK-----E-
 SM62A --GAI-OYRRGN-Q-ETY-RLlGVEVDGS--Lg-LDKGls-L--K-N-QY--N-E-R-LA-RK-----E-
 SM670 --A-KODG-Q-ETY-RLlGVEVDGS--Lg-LDKGls-L--K-N-QY--N-E-R-LA-RK-----E-
 CONSENSUS-STM
 STM --ORKQHG-ETY-KllEGl-EGSGP-GA-DKGLN-H--P-R-NE-Q--KN-A-SA-lE-R-----EE-N--A-H-----E-I-L--S-
 --ORKQHG-ETY-KllEGl-EGSGP-GA-DKGLN-H--P-R-NE-Q--KN-A-SA-lE-R-----EE-N--A-H-----E-I-L--S-

| | | |
|-------------|-------|-----|
| CONSENSUS-A | Fs? ? | 236 |
| ROD | --X | 257 |
| NIH2 | --X | 181 |
| ISY | --X | 257 |
| ST | --X | 256 |
| BEN | Y-Ex | 258 |
| CAM2 | --X | 261 |
| D1.94 | Y-Ex | 258 |
| GH1 | Y-X | 255 |
| KR | --\$ | 253 |
| MDS | -N\$ | 255 |
| UC2 | Y-E\$ | 257 |

| | | |
|-------------|------|-----|
| CONSENSUS-B | T?- | 221 |
| EHOA | TE\$ | 238 |
| D205 | TDX | 240 |

| | | |
|-------------|-------------|-----|
| CONSENSUS-D | KTADKKEtG\$ | 137 |
| F07841 | KTADKKEtG\$ | 137 |

| | | |
|--------------|-------------|-----|
| CONSENSUS-SD | KWADkKeTs ? | 252 |
| MMP11 | NWADKREtRx | 261 |
| MM32H | NWADKREtRx | 264 |
| MM1A11 | NWADKREtRx | 263 |
| MM239 | NWADKREtRx | 263 |
| MM1.42 | EMADKREtSx | 262 |
| MNE | KWADKREtSx | 264 |
| MM1.55 | NWADKREtR\$ | 263 |
| MMW25 | NWADKREtR\$ | 258 |
| NEFW61 | NWADKREtR\$ | 251 |
| SMMPBJA | KWADKKEtS\$ | 261 |
| SMMPBJB | KWADKKEtS\$ | 261 |
| PBJ6P6 | KWADKKEtS\$ | 261 |
| SMM9 | KWADKKEtS\$ | 261 |
| SMMH4 | KWADKKEtS\$ | 262 |
| SM62A | KWADKREtS\$ | 263 |
| SMB670 | KWADKKEtS\$ | 263 |

| | | |
|---------------|------------|-----|
| CONSENSUS-STM | KWADKKEtSx | 265 |
| STM | KWADKKEtSx | 265 |

This page intentionally left blank.

II-B-54
DEC 97