

Table S1. Primers used to obtain the complete/nearly complete DNA-dependent DNA polymerase and hexon coding sequences, and partial penton base coding sequences of simian adenovirus (SAdV) strains KNA-S6 and KNA-08975 detected in African green monkeys from St. Kitts. Primers employed in semi-nested PCR assays to amplify a region of the putative hexon that is genetically divergent between SAdV-17, -18 and *Human mastadenovirus-F* strains (HAdV-F) are highlighted with yellow. Forward primers (used in combination with 2 reverse primers designed from partial penton base sequences of KNA-S6 and KNA-08975) that failed to amplify the 5'- region of the penton base are shown with red font.

Target gene	Primer name	Primer sequence ¹ (5'-3')	Primer position ²
DNA-dependent DNA polymerase	NHP-pol-5ENDF	TCTACGGCATCTCGATCCAGCAG	nt 5228-nt 5250
	NHP-pol-5ENDR	AAGCTCTACGCCCTCAAGTGCCTC	nt 5591-nt 5569
	NHP-pol-5261F	TGCGGGGTTGGRCGGCTTT	nt 5261-nt 5281
	NHP-pol-5283F	GCTGTASGGBACCAGBCGGTG	nt 5283-nt 5303
	NHP-pol-5946R	GGTGGATCCCCTGGTGGAGAACG	nt 5946-nt 5924
	NHP-pol-5800F	GATTGAGCGCGCGCTGCTCCAG	nt 5800-nt 5822
	NHP-pol-6954R	CTCCAACTCSCACGCCATCTT	nt 6954-nt 6934
	NHP-pol-6976R	TCTTYCAGCGSCCCACCATCTC	nt 6976-nt 6955
	NHP-pol-6721F	CCCCAGGGCATGGGRTGGGT	nt 6721-nt 6740
	NHP-pol-6742F	AGGGCCGAGGCCTACATGCC	nt 6742-nt 6761
	NHP-pol-7983R	CACCTACCGACGTVGARACCTACAC	nt 7983-nt 7960
	NHP-pol-7751F	TCTGGAGGCGGTCGGTAGT	nt 7751-nt 7771
	NHP-pol-7774F	CGGAACCTTTGCCACCGCCA	nt 7774-nt 7795
	NHP-pol-8817R	CTGTYGAACCTCTTCAGGTTC	nt 8817-nt 8795
	NHP-pol-8752R	CAGGACCTCAACCGCCCGT	nt 8752-nt 8733
Hexon	NHP-hex-18098F	AACAGCATYGTGGGYCTGGG	nt 18098-nt 18117
	NHP-hex-18582R	CGGTCCAGCACGCCCGGATGTC	nt 18582-nt 18560
	NHP-hex-18625R	GGAGTTGTAAGCGGTGCCGGAGTA	nt 18625-nt 18602
	NHP-hex-18253F	CAAGATGCCACCCCTCSATGATGC	nt 18253-nt 18278
	NHP-hex-18308F	CAGGACGCCCTGGAGTACCTGAGC	nt 18308-nt 18331
	NHP-hex-18837R ³	TCTCCGGCTTCGCTGTTCCACTG ³	nt 18837-nt 18815
	NHP-hex-18836R ⁴	GCGTGGGATCAATATTCCATTGCG ⁴	nt 18836-nt 18813
	NHP-hex-18494F	TACAAAGTGCCTTCACGCTGG	nt 18494-nt 18515
	NHP-hex-18524F	GACAACCGCGTCTGGACATG	nt 18524-nt 18544
	NHP-hex-19337R	GGTCATACTGTCYACGGCCTG	nt 19337-nt 19316
	NHP-hex-19100F ³	CAGCAGGCCCTCCAACAGAC ³	nt 19100-nt 19117
	NHP-hex-19177F ³	TGGAAATATGGGAGTCTTGGGG ³	nt 19177-nt 19200
	NHP-hex-19174F ⁴	CACTGGTAATATGGGGTCTTGGC ⁴	nt 19174-nt 19197
	NHP-hex-19192F ⁴	CTTGGCAGGTCAAGCTTCGCAAC ⁴	nt 19192-nt 19213
	NHP-hex-20006R	AGTTGGCGTAVAGGTTRATGCTGTC	nt 20006-nt 19982
Penton base	NHP-hex-19883F	TCCTACACCTACGAGTGGAACTT	nt 19883-nt 19905
	NHP-hex-20887R	CTCATCCATGGGGTCCACCTC	nt 20887-nt 20867
	NHP-hex-20946R	TGCGGCTGGTGGATGCGCAC	nt 20946-nt 20927
	NHP-hex-20783F	AACTTCATGTCCATGGGGGC	nt 20783-nt 20802
	NHP-hex-21114R	AAGCGYTTGTCRAASGTGCCCA	nt 21114-nt 21093
	NHP-hex-21162R	GTGTTRACRATGGGCCASGCCA	nt 21162-nt 21141
	NHP-pen-13461	TGGARAGCCTRGTRGAYAAGATGAA	nt 13461- nt 13485
	NHP-pen-13496	ACSTACGCCAGGAGCAGCGGG	nt 13496- nt 13517
	NHP-pen-13610	AGCGTGTGGACTTGGGGGG	nt 13610-nt 13629
	NHP-pen-13658	GCYCAYCTGCCCKCAGGG	nt 13658-nt 13677
	NHP-pen-14407F	GAAGTTGACACGCCAACCTCCG	nt 14407-nt 14430
	NHP-pen-14462F	ATGCCSGCGCTGTACACCAACGAG	nt 14462-nt 14485
	NHP-pen-15243R	GCGTCRGTGATGGTCACGCC	nt 15243-nt 15223
	NHP-pen-15210R	ATRCTGCTGCGCAGGGCAGGG	nt 15210-nt 15189
	NHP-pen-15036F	ACGAGCAGGCCGTCTACTCGCAGC	nt 15036-nt 15059
	NHP-pen-15446R	CGGTAGTGGCCGGACGCC	nt 15446-nt 15427

NHP-pen-15404R	CGCTTGGCGCCGCCGTACAT	nt 15404-nt 15385
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¹ The primers were designed following multiple alignment of the complete genomic sequences of SAdV-18 strain C676 (GenBank accession number FJ025931), SAdV-17 strain B-105 (KP329566), and HAdV-F strains (HAdV-40 isolates Dugan (L19443) and SA12680 (MK883611), and HAdV-41 isolate Tak (DQ315364)).

² Nucleotide positions are those of SAdV-18 (FJ025931).

^{3,4} Primers specific to SAdV strain KNA-08975 ³ and KNA-S6 ⁴ (designed from partial hexon sequences of respective virus strains), respectively.

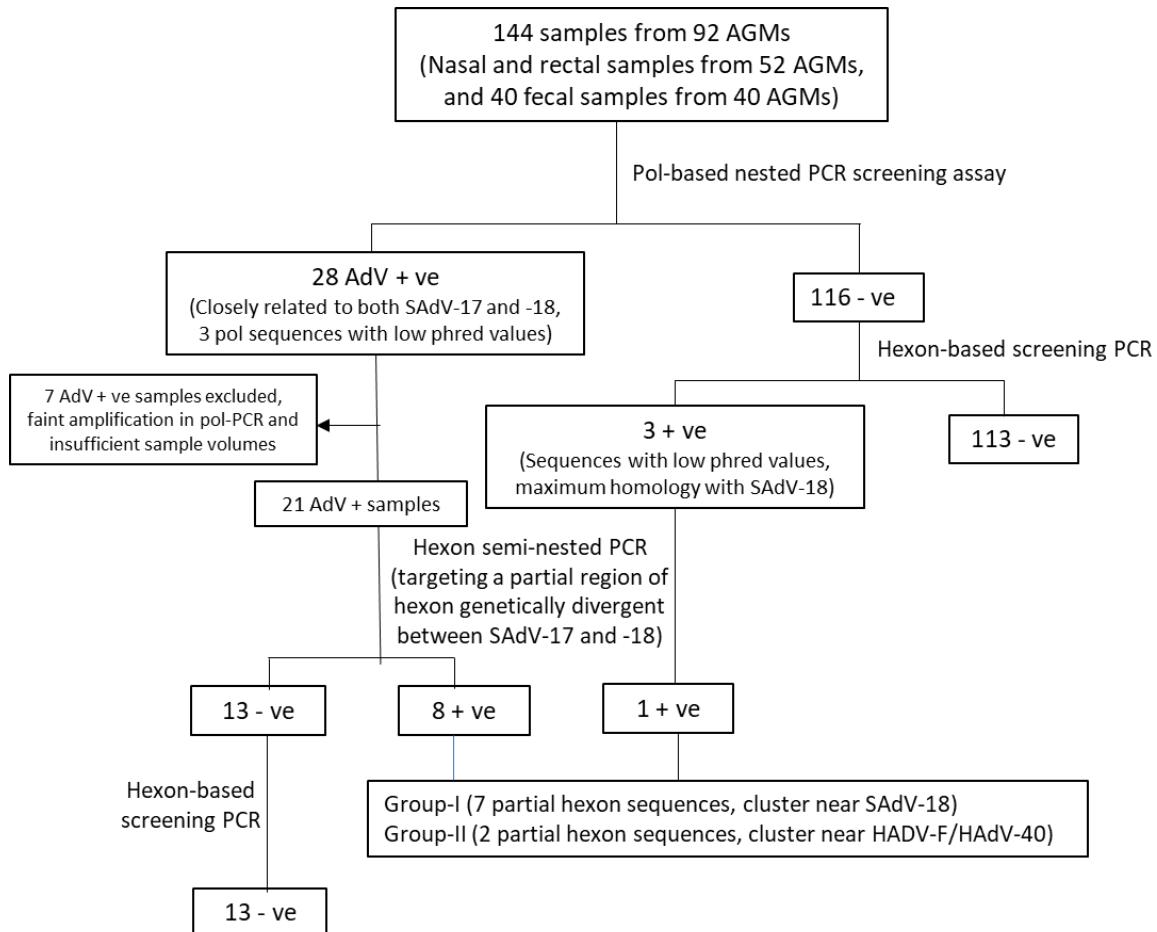


Figure S1. Flow chart summarizing the work pipeline and PCR results from the present study.

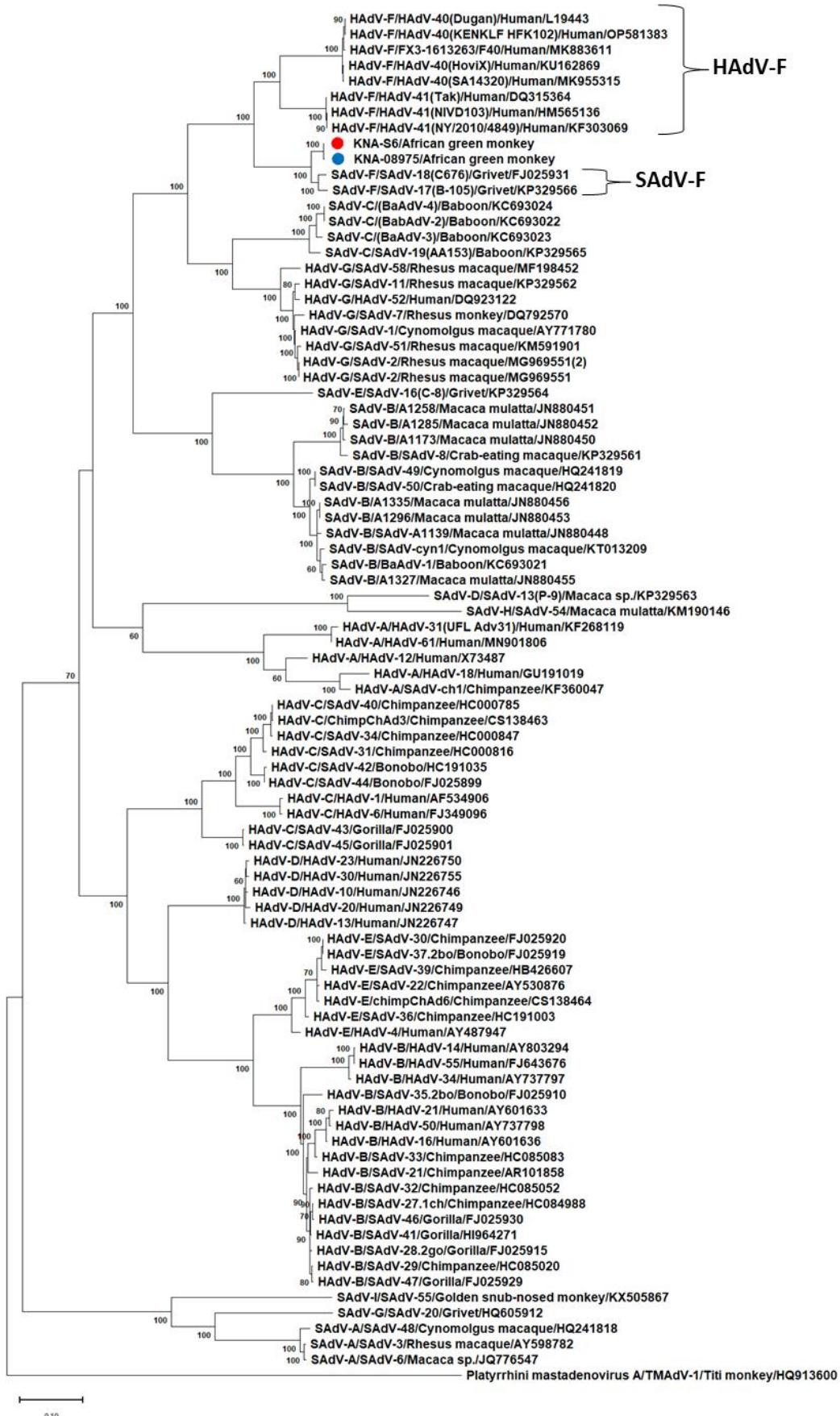


Figure S2. Expanded version of figure 3.

KNA-S6 -----PGAGGLHAAEAHPGTQPPRRRARQSAASPAPAAAGAPRRRAVAAAAGGTRTPAA
 54
 KNA-08975 -----PGAGGLHAAEAHPGTQPPRRRARQSAASPAPAAAGAPRRRAVAAAAGGTRTPAA
 54
 SAdV-F/SAdV-18 MALVPSPGTGGLHAAEAHPGPQPPRRRARQSAASSAPAAAGAPRRRAAAAHAGGTRTPAA
 60
 SADV-F/SAdV-17 MALVPSPGTGGLHAEKAHPGPQPPRRRARQSAASPAPAAAGAPRRRAAGAHAGGSRTPAA
 60
 HAdV-F/HAdV-40 MALVPSPRAGGFPLPAETHSGPQPPRRVRQSTAGAAPTATRAPRRRAATASPEPPSTA
 60
 HAdV-F/HAdV-41 MALVPSPGTGLHSTKTYPGTQPPRCRARQSAAGSASTATRAPGQRASTSSGGSRTATA
 60
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 KNA-S6 ARRPTAANHVS-----PAYRRHRTIVAGRGHALLYAVDTSTNEPLEFKYHQRLAPALTR
 109
 KNA-08975 ARRPTAANHVS-----PAYRRHRTIVAGRGHALLYAVDTSTNEPLEFKYHQRLAPALTR
 109
 SAdV-F/SAdV-18 ARRQAQAGDVTSPPEYATYRRHRTIVARGQALLYAIDTSTNEPLEIKYHQRLAPALTR
 120
 SADV-F/SAdV-17 ARRQAAADV--PPEHATYRRHRTIVARGHGLLYAIDTSTNEPLEIKYHQRLAPALTR
 118
 HAdV-F/HAdV-40 SGRPPAANNVS---LTPNSRLRGТИAPRGQGLLYAIDTATNSPMEIKFHRLASALTR
 116
 HAdV-F/HAdV-41 PRRPSASNDVN---PPSTFRLRGТИASRGQGLLYAIDTSTNSPLEIKFHQRLASALTR
 116
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 KNA-S6 LLQVHRRTLVDLNEAFLNSLDAAQIRALALRLRPPRVDIWTCSRGVVTPSVLHPQQER
 169
 KNA-08975 LLQVHRRTLVDLNEAFLNSLDAAQIRALALRLRPPRVDIWTCSRGVVTPSVLHPQQER
 169
 SAdV-F/SAdV-18 LLQVHRRTLVDLSEAFLDSDLAAQIRTLALSLRPPRVDIWTCSRGVVTPSVLHPQQER
 180
 SADV-F/SAdV-17 LLQVHRRTLVDLDEAFLDSLDAAHIRTLALRLRPPRVDIWTCLRGIVTPSVLHPQQER
 178
 HAdV-F/HAdV-40 LLQVNLRSPADLNEAFLSDLSSQIRTLALKVPRVEVWTCASRGIVTPSVILPQQER
 176
 HAdV-F/HAdV-41 LLQVNLRSLPAGLSEAFLDSDLSSQIRSLALRLQPPRVEVWTCASRGIVTPSVILPQQER
 176
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 KNA-S6 AGAEEHDEAEGQRAEAPLCDPLRFLVRGRRVHLVQEVSQVRCEHCARFYKYQHECTVRR
 229
 KNA-08975 AGAEEHDEAEGQRAEAPLCDPLRFLVRGRRVHLVQEVSQVRCEHCARFYKYQHECTVRR
 229
 SAdV-F/SAdV-18 AGAEEHDEAEGQRAEAPLCDPLRLLVRGRRVHLVQEVSQVRCEYCARFYKYQHECTVRR
 240
 SADV-F/SAdV-17 AGAEEHDEAEGQHAEAPLNCPRLLLVRGRRVHLVQEVSQVRCEYCARFYKHQHECTVRR
 238
 HAdV-F/HAdV-40 AGAEEGDEGERQDTEDFLNFLRFLVRGRQVHLIQMOSVQRCEYCARFYKYQHECTVRR
 236
 HAdV-F/HAdV-41 AGAEENNEGERQSAQEPLNFPRLFLVRGRQVHLIQEVSQVRCEYCARFYKYQHECTVRR
 236
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 KNA-S6 RDFYFHHVNAHSSGWWQEINFFPLGSHPRTERLFVTDVETYTWMGAFGKQLVPMVMH
 289
 KNA-08975 RDFYFHHVNAHSSGWWQEINFFPLGSHPRTERLFVTDVETYTWMGAFGKQLVPMVMH
 289
 SAdV-F/SAdV-18 RDFYFHHVNAHSSGWWQEINFFPLGSHPRTERLFVTDVETYTWMGAFGKQLVPMVMH
 300
 SADV-F/SAdV-17 RDFYFHHVNAHSSGWWQQINFFPLGSHPRTERLFVTDVETYTWMGAFGKQLVPMVMH
 298
 HAdV-F/HAdV-40 RDFYFHHINAHSWWQKINFFPIGSHPRVERLFVTDVETYTWMGAFGKQLVPMVMH
 296
 HAdV-F/HAdV-41 RNFYFHHINAQSSGWWQEINFFPIGSHPRVERLFVTDVETYTWMGAFGKQLVPMVMH
 296
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KNA-S6 LSGEEALVEEACRLAREQSWSDAWGEGDRTFYVVTPEKMAVGKKFRDYRDRLOQTALALQLW
 349
 KNA-08975 LSGEEALVEEACRLAREQSWSDAWGEGDRTFYVVTPEKMAVGKKFRDYRDRLOQTALALQLW
 349
 SAdV-F/SAdV-18 LSGEEALVEEACRLAREQNWDAWGQDGRTFYVVTPEKMAVGKKFRDYRDRLOQTALALQLW
 360
 SADV-F/SAdV-17 LSGEEALVEEACRLAREQSWSDAWGEGDRTFYVVTPEKMAVGKKFRDYRDRLOQTALALQLW
 358
 HAdV-F/HAdV-40 LSGEEALVKEACRLACELQWDTWGNDERTFYVVTPEKLAvgkkfREYRNRLQAHFALQLW
 356
 HAdV-F/HAdV-41 LSGDDTLVEEACRLAHELQWDAWGNDGHTFYVVTPEKMAVGKKFRNYRDRLOTHFATQLW
 356
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 KNA-S6 RGFLQANPQVADWARQELGLYSPDCLTYEELKKAPKLQGRPRFVELYIVGHNINGFDEIV
 409
 KNA-08975 RGFLQANPQVADWARQELGLYSPDCLTYEELKKAPKLQGRPRFVELYIVGHNINGFDEIV
 409
 SAdV-F/SAdV-18 RGFLQANPQVAEWARQELGLYSPDCLTYEELKKAPKLQGRPRFVELYIVGHNINGFDEIV
 420
 SADV-F/SAdV-17 RGFLQANPQVAEWARQELGLYSPDCLTYEELKKAPKLQGRPRFVELYIVGHNINGFDEIV
 418
 HAdV-F/HAdV-40 RGFLAANPQLAEWALEMGLFSPDYLTYEELQKAPKLQGRPRFLELYIVGHNINGFDEIV
 416
 HAdV-F/HAdV-41 QAFLAANPQVAEWARLEMGLFSPDNLTYEELKKAPKLQGTPRFVELYIVGHNINGFDEIV
 416
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 KNA-S6 LAAQVINNRSVPGPFRITRNFMPRAGKILFNDVTFALPNPRSQKRTDYGLWERGACDDT
 469
 KNA-08975 LAAQVINNRSVPGPFRITRNFMPRAGKILFNDVTFALPNPRSQKRTDYGLWERGACDDT
 469
 SAdV-F/SAdV-18 LAAQVINNRSVPGPFRITRNFMPRAGKILFNDVTFALPNPRSQKRTDYGLWERGACDDT
 480
 SADV-F/SAdV-17 LAAQVINNRSVPGPFRITRNFMPRAGKILFNDVTFALPNPRSQKRTDYGLWERGACDDT
 478
 HAdV-F/HAdV-40 LAAQVINNRSVPGPFKITRNFMPRAGKILFNDITFALPNPSSKKRTDYRLWEQGACDDS
 476
 HAdV-F/HAdV-41 LAAQVINNRSVPGPFKITRNFMPRAGKILFNDITFALPNPLSKRTDYHLWEQGACDDT
 476
 *****:*****:*****:*****:*****:*****:*****:*****:*****:*****:
 KNA-S6 DFRFQFLKVMVRDTFALTHTSRKAAQAYALPVEKGCCPYRAVNRFYMLGSYLADERGFP
 529
 KNA-08975 DFRFQFLKVMVRDTFALTHTSRKAAQAYALPVEKGCCPYRAVNRFYMLGSYLADERGFP
 529
 SAdV-F/SAdV-18 DFRFQFLKVMVRDTFALTHTSRKAAQAYSALPVEKGCCPYRAVNRFYMLGSYLADERGFP
 540
 SADV-F/SAdV-17 DFRFQFLKVMVRDTFALTHTSRKAAQAYSALPVEKGCCPYRAVNRFYMLGSYLADERGFP
 538
 HAdV-F/HAdV-40 DFKYQFLKVMVRDTFALTHTSRKAAQAYALPVEKGCCPYKAVNEFYMLGSYRADERGFP
 536
 HAdV-F/HAdV-41 DFKHQFLKVMVRDTFALTHTSRKAAQAYALPVEKGCCPYKAVNQFYMLGSYRADERGFP
 536
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 KNA-S6 AEEYWKDREYYLLNRELWEKKQEPRYDLVRETLDYCALDVLTAAVLVQKLRESYAQFIHD
 589
 KNA-08975 AEEYWKDREYYLLNRELWEKKQEPRYDLVRETLDYCALDVLTAAVLVQKLRESYAQFIHD
 589
 SAdV-F/SAdV-18 AEEYWKDREYYLLNRELWEKKQEPRYDLVRETLDYCALDVLTAAVLVQKLRSYAQFVHD
 600
 SADV-F/SAdV-17 AEEYWKDREYYLLNRELWEKKQEPRYDLVRETLDYCALDVLTAAVLVQKLRSYAQFVHD
 598
 HAdV-F/HAdV-40 AEDYWKDREYYLLNRELWEKKQCOPHYDLVRETLDYCALDVLTAAVLVQKLRESYAQFIRD
 596
 HAdV-F/HAdV-41 AEDYWKDREYYLLNRELWEKKQQSRYDLIRETLDYCALDVLTAAVLVQKLRESYAQFICD
 596
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KNA-S6 649	AVGLPEASFNIFQRPTISSNSHAIFRQVTYRAVRPQRADLGGGLAPSHEMYDYVRASIR
KNA-08975 649	AVGLPEASFNIFQRPTISSNSHAIFRQVTYRAVRPQRADLGGGLAPSHEMYDYVRASIR
SAdV-F/SAdV-18 660	AVGLPEASFNIFQRPTISSNSHAIFRQVTYRAVRPQRGDLGGGLAPSHEMYDYVRASIR
SADV-F/SAdV-17 658	AVGLPEASFNIFQRPTISSNSHAIFRQVTYRAVKPQRGDLGGGLAPSHEMYDYVRASIR
HAdV-F/HAdV-40 656	AVGLPEASFNVFQRPTISSNSHAIFRQILYRTVKPQRSDLGGSLLAPSHEMYDYVRASIR
HAdV-F/HAdV-41 656	AVGLPEAKFNVFQRPTISSNSHAIFRQILYRSVPKRSDLGNGLAPSHEMYDYVRASIR
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KNA-S6 709	GGRCYPTYLGVLREPLYVYDICGMYASALTHPMPWGAPLNPyERALAVRDWERALADPAV
KNA-08975 709	GGRCYPTYLGVLREPLYVYDICGMYASALTHPMPWGAPLNPyERALAVRDWERALADPAV
SAdV-F/SAdV-18 720	GGRCYPTYLGVLREPLYVYDICGMYASALTHPMPWGAPLNPyERALAVRDWERALADPAV
SADV-F/SAdV-17 718	GGRCYPTYLGVLREPLYVYDICGMYASALTHPMPWGAPLNPyERALAVRDWERALADPAV
HAdV-F/HAdV-40 716	GGRCYPTYIGVLREPLYVYDICGMYASALTHPMPWGFLNPYERALAVRDWEHALQVGT
HAdV-F/HAdV-41 716	GGRCYPTYIGVLREPLYVYDICGMYASALTHPMPWGSPLNPYERALAVRDWERALLQVDT
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KNA-S6 769	SIDYFDRQLLPGIFTIDADPPAEDQLDVLPPFCRKGGRLCWTNEPLRGEVATSVDLITL
KNA-08975 769	SIDYFDRQLLPGIFTIDADPPAEDQLDVLPPFCRKGGRLCWTNEPLRGEVATSVDLITL
SAdV-F/SAdV-18 780	AIDYFDRHLLPGIFTIDADPPAEDQLDVLPPFCRKGGRLCWTNEPLRGEVATSVDLITL
SADV-F/SAdV-17 778	AIDYFDRHLLPGIFTIDADPPAEDQLDVLPPFCRKGGRLCWTNEPLRGEVATSVDLITL
HAdV-F/HAdV-40 776	PIDYFNRTLPGIFTIDADPPPENLLDVLPPLCSRKGGLCWTNEPLRGEVVTSDLITL
HAdV-F/HAdV-41 776	PIDYFNHVLLPGIFTIDADPPSENLLDVLPPICSRKGGLCWTNEPLRGEVATSIDLITL
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KNA-S6 829	HNRGWRVRLLPDERATVPEWRCVAREYVQLNIAAKERADREKNQTLRSIAKLLSNALYG
KNA-08975 829	HNRGWRVRLLPDERATVPEWRCVAREYVQLNIAAKERADREKNQTLRSIAKLLSNALYG
SAdV-F/SAdV-18 840	HNRGWRVRLLPDERATVPEWRCVAREYVQLNIAAKERADREKNQTLRSIAKLLSNALYG
SADV-F/SAdV-17 838	HNRGWRVRLLPDERATVPEWRCVAREYVQLNIAAKERADREKNQTLRSIAKLLSNALYG
HAdV-F/HAdV-40 836	HNRGWHVRLLPDERATVPEWRCVAKEYVHLNITAKERADREKNQTLRSIAKLLSNALYG
HAdV-F/HAdV-41 836	HNRGWQVRLLPDERTTVFPEWRCVARKYVQLNIAAKERADREKNQTLRSIAKLLSNALYG
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KNA-S6 889	SFATKLDNKKIVFSQMDPATVKSIAAGQVNICKSTSFVETDTLSAEVMPAFQRAYSPEQL
KNA-08975 889	SFATKLDNKKIVFSQMDPATVKSIAAGQVNICKSTSFVETDTLSAEVMPAFQRAYSPEQL
SAdV-F/SAdV-18 900	SFATKLDNKKIVFSQMDPATVKSIAAGQVNICKSTSFVETDTLSAEVMPAFQRAYSPEQL

SADV-F/SAdV-17 898	SFATKLDNKKIVFSDQMDPATVKSIAAGQVNICKSTSFVETDTLSAEVMPAFQRAYSPEQL
HAdV-F/HAdV-40 896	SFATKLDNKKIVFSDQMDSATIKSIAAGQINIKSTSFVETDTLSAEVMPFTQRAYSPEQL
HAdV-F/HAdV-41 896	SFATKLDNKKIVFSDQMDPATIKSIAAGQIKIKSTSFVETDTLSAEVMPAFQRAYSPEQL
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KNA-S6 949	DLVHSDAEESDGETGHAPFYKPTRDPDGHVTVTYKPITFMDAEEDDLCLHTLEKVDPLVE
KNA-08975 949	DLVHSDAEESDGETGHAPFYKPTRDPDGHVTVTYKPITFMDAEEDDLCLHTLEKVDPLVE
SAdV-F/SAdV-18 960	DLVHSDAEESDGEAGHAPFYKPTRDPDGHVTVTYKPITFMDAEEDDLCLHTLEKVDPLVE
SADV-F/SAdV-17 958	DLVHSDAEESDGEAGHAPFYKPTRDPDGHVTVTYKPITFMDAEEDDLCLHTLEKVDPLVE
HAdV-F/HAdV-40 956	AVVHSDAEESEEPGHAPFYPTHKPNDHVTVTYKPITFMDAEEDDLCLHTLEKVDPLVE
HAdV-F/HAdV-41 955	ALAHSDAEEDEERGA-LYTPAQDPKGHVTVTYKPITFMDAEEDDLCLHTLEKVDPLVE
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KNA-S6 1009	NDRYPQSIAFVLAWTRAFVSEWSEFLHAEDRGIPLEQRALKSVYGDTDSLTVTEAGRRL
KNA-08975 1009	NDRYPQSIAFVLAWTRAFVSEWSEFLHAEDRGIPLEQRALKSVYGDTDSLTVTEAGRRL
SAdV-F/SAdV-18 1020	NDRYPQSIAFVLAWTRAFVSEWSEFLHAEDRGIPLEQRALKSVYGDTDSLTVTEAGRRL
SADV-F/SAdV-17 1018	NDRYPQSIAFVLAWTRAFVSEWSEFLHAEDRGIPLEQRALKSVYGDTDSLTVTEAGRRL
HAdV-F/HAdV-40 1016	NNRYPQSIAFVLAWTRAFVSEWSEIYAEDRGTPLEQRTLKSVDGTDDSLTVTEAGYRL
HAdV-F/HAdV-41 1015	NDRYPQSIAFVLAWTRAFVSEWSEFLYAEDRGTPLEQRTLKSVDGTDDSLTVTEAGHRL
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KNA-S6 1069	METRGKKRIKKHGGQLVFDPQRPELTWLVCECTCAQCGADAFSPESVFLAPKLYALKCL
KNA-08975 1069	METRGKKRIKKHGGQLVFDPQRPELTWLVCECTCAQCGADTFSPETVFLAPKLYALKCL
SAdV-F/SAdV-18 1080	METRGKKRIKKHGGQLVFDPQRPELTWLVCECTCAQCGADAYSPESVFLAPKLYALKCL
SADV-F/SAdV-17 1078	METRGKKRIKKHGGQLVFDPQRPELTWLVCECTCAQCGADAYSPESVFLAPKLYALKCL
HAdV-F/HAdV-40 1076	METRGKKRIKKHGGNLVFDPKHPELAWLVCECTVCAQCGADAYSPESVFLAPKLYALKCL
HAdV-F/HAdV-41 1075	METRGKKRIKKHGGSLVFDPKNPELTWLVCECTCAQCGANAYSPESVFLAPKLYALKCL
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KNA-S6 1129	QCPACGHVSKGKLRAKGHAAEALSYNMLRCYLADSGEDARFHTSRMSLKRTLASAQPG
KNA-08975 1129	QCPACGHVSKGKLRAKGHAAEALSYDMLRCYLADSGEDARFHTSRMSLKRTLASAQPG
SAdV-F/SAdV-18 1140	HCPACGHVSKGKLRAKGHAAEALSYDMLKCYLADSGEDARFHTSRMSLKRTLASAQPG
SADV-F/SAdV-17 1138	QCPACGHVSKGKLRAKGHAAEALSYDMLKCYLADSGEDARFHTSRMSLKRTLASAQPG
HAdV-F/HAdV-40 1136	RCPSQQISKGKLRAKGHAAETLNYDMLKCYLADFQGEDARFHTSRMSLKRTLASAQPG
HAdV-F/HAdV-41 1135	YCPSCQHISKGKLRAKGHAAEALSYELMLKCYLADSGEDARFHTSRMSLKRTLASAQPG
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KNA-S6	AHPFTVTETTLTRLPWRDVT LAPLDAHRLVPYSQSRPNPRNQEVCWI--- 1178
KNA-08975	AHPFTVTETTLTRLPWRDVT LAPLDAHRLVPYSQSRPNPRNQEVCWI--- 1178
SAdV-F/SAdV-18	AHPFTVTETTLTRLPWRDVT LAPLDAHRLVPYSQSRPNPRNQEVCWIEMP 1192
SADV-F/SAdV-17	AHPFTVTETTLTRLPWRDVT LAPLDAHRLVPYSQSRPNPRNQEVCWIEMP 1190
HAdV-F/HAdV-40	ARPFTVTETNLTRLPWKDIT LAPLDAHRLVPYSQSRPNPRNQEVCWIEMP 1188
HAdV-F/HAdV-41	AHPFTVTETTLTRLPWKDIT LAPLDAHRLVPYSQSRPNPRNQEVCWIEMP 1187

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Figure S3. Multiple alignment of the nearly complete deduced amino acid (aa) sequences of the putative DNA-dependent DNA polymerase (Pol) of simian adenovirus (SAdV) strains KNA-S6 and KNA-08975 with cognate sequences of SADV-F/SAdV-17 strain B-105 (GenBank accession number KP329566), SAdV-F/SAdV-18 strain C676 (FJ025931), Human AdV-F (HAdV-F)/HAdV-40 isolate Dugan (L19443), and HAdV-F/HAdV-41 isolate Tak (DQ315364). Numbers to the right indicate the positions of the aa for respective AdV strains.

KNA-S6	MATPSMMPQWSYMHIAQDASEYLSPGLVQFARATDTYFSLGNKFRNPTVAPTHDVTTDR
60	
HAdV-F/HAdV-40	MATPSMMPQWSYMHIAQDASEYLSPGLVQFARATDTYFSLGNKFRNPTVAPTHDVTTDR
60	
SAdV-F/SAdV-17	MATPSMMPQWSYMHIAQDASEYLSPGLVQFARATDTYFSLGNKFRNPTVAPTHDVTTDR
60	
KNA-08975	MATPSMMPQWSYMHIAQDASEYLSPGLVQFARATDTYFSLGNKFRNPTVAPTHDVTTDR
60	
SAdV-F/SAdV-18	MATPSMMPQWSYMHIAQDASEYLSPGLVQFARATDTYFSLGNKFRNPTVAPTHDVTTDR
60	
HAdV-F/HAdV-41	MATPSMMPQWSYMHIAQDASEYLSPGLVQFARATDTYFSLGNKFRNPTVAPTHDVTTDR
60	

KNA-S6	SQRLLRFVPVDREDTASYKVRFTLAVGDNRVLDMASTYFDIRGVLDRGPSFKPYSGTA
120	
HAdV-F/HAdV-40	SQRLLRFVPVDREETASYKVRFTLAVGDNRVLDMASTYFDIRGVLDRGPSFKPYSGTA
120	
SAdV-F/SAdV-17	SQRLLRFVPVDREDTASYKVRFTLAVGDNRVLDMASTYFDIRGVLDRGPSFKPYSGTA
120	
KNA-08975	SQRLLRFVPVDREDTASYKVRFTLAVGDNRVLDMASTYFDIRGVLDRGPSFKPYSGTA
120	
SAdV-F/SAdV-18	SQRLLRFVPVDREDTASYKVRFTLAVGDNRVLDMASTYFDIRGVLDRGPSFKPYSGTA
120	
HAdV-F/HAdV-41	SQRLLRFVPVDREDTASYKVRFTLAVGDNRVLDMASTYFDIRGVLDRGPSFKPYSGTA
120	

KNA-S6	YNSLAPKGAPNPSEQWTNSVTNTKTSSFGQAPFIGEKITNE-GVQVGTDT--SGGDVFADK
177	
HAdV-F/HAdV-40	YNSLAPKGAPNPSEQWTN---QNKTNSFGQAPYIGQKITNQ-GVQVGSDS--NNRDVFADK
174	
SAdV-F/SAdV-17	YNSLAPKNAPNACQWTSTTNGNKTNTFAQAPFIGLSITKD-GVQVGVDTSQTQQAVYADK
179	
KNA-08975	YNSLAPKGAPNPSEWKG--TDSKVNVRGQAPFFSTSISKD-GIQVGTDTSTPTQAIYADK
177	
SAdV-F/SAdV-18	YNSLAPKGAPNPSEWKG--SDNKISVRGQAPFFSTSITKD-GIQVATDTSS--GAVYAKK
175	
HAdV-F/HAdV-41	YNSLAPKTAPNCEWK---DNNKIKVRGQAPFIGTNINKDNGIQIGTDTTN--QPIYADK
175	
***** * . . . : . * . . . : . * . : . * : . * : . * : . * : . * :	
KNA-S6	TFQPEPQVGQTQWNIDPTQN--AAGRILKKTPMPCYGSYARPTNEQGGQAKLVVNG-G
234	
HAdV-F/HAdV-40	TYQPEPQVGQTQWNINPMQN--AAGRILKQTTPMPCYGSYARPTNEKGGQAKLVKNDDN
232	
SAdV-F/SAdV-17	SFQPEPQVGESQWNSNPTTN--AAGRVLKPTTAMLPCYGSYAYPTNEKGG-----
227	
KNA-08975	TYQPEPQVGQEWNSEAGNDKVAGRVLKDSTPMFPCYGSYAKPTNEHGGQCTNSTVDLQ
237	
SAdV-F/SAdV-18	EYQPEPQVGQEWNSEASSDKVAGRILKDTPMFPYGSYAKPTNEQGGQGTN-TVDLQ
234	
HAdV-F/HAdV-41	TYQPEPQVGQTQWNSEVGAAQKVAGRVLKDTPMLPCYGSYAKPTNEKGGQASLITNGTD
235	
***** : *** : . *** : * : * . * ***** ***** : ***	
KNA-S6	QTQTTDVSLSNFFTASESSSFTPKVVLYGEDVNLEAPDTHLVFKPDTND--TSAEILLGQ
292	

KNA-S6 589	PFHIQVPQKFFAIKNLLLLPGSYTYEWNFRKDVNMILOSSLGNLDRVGDASVKFDSINLY
HAdV-F/HAdV-40 587	PFHIQVPQKFFAIKNLLLLPGSYTYEWNFRKDVNMILOSSLGNLDRVGDASVRFDSINLY
SAdV-F/SAdV-17 581	PFHIQVPQKFFAIKNLLLLPGSYTYEWNFRKDVNMILOSSLGNLDRVGDASVRFDSINLY
KNA-08975 586	PFHIQVPQKFFAIKNLLLLPGSYTYEWNFRKDVNMILOSSLGNLDRVGDASVRFDSINLY
SAdV-F/SAdV-18 581	PFHIQVPQKFFAIKNLLLLPGSYTYEWNFRKDVNMILOSSLGNLDRVGDASVRFDSINLY
HAdV-F/HAdV-41 589	PFHIQVPQKFFAIKNLLLLPGSYTYEWNFRKDVNMILOSSLGNLDRVGDASVRFDSINLY
***** : *****	
KNA-S6 649	ANFFPMAHNTASTLEAMLRNDTNDQSFNDYLCAANMLYPIPANATSPVISIPSRNWAAFR
HAdV-F/HAdV-40 647	ANFFPMAHNTASTLEAMLRNDTNDQSFNDYLCAANMLYPIPANATSPVISIPSRNWAAFR
SAdV-F/SAdV-17 641	ANFFPMAHNTASTLEAMLRNDTNDQSFNDYLCAANMLYPIPANATSPVISIPSRNWAAFR
KNA-08975 646	ANFFPMAHNTASTLEAMLRNDTNDQSFNDYLCAANMLYPIPANATSPVISIPSRNWAAFR
SAdV-F/SAdV-18 641	ANFFPMAHNTASTLEAMLRNDTNDQSFNDYLCAANMLYPIPANATSPVISIPSRNWAAFR
HAdV-F/HAdV-41 649	ANFFPMAHNTASTLEAMLRNDTNDQSFNDYLCAANMLYPIPSNATSPVISIPSRNWAAFR
***** : *****	
KNA-S6 709	GWSFTRLKTKEPSLGSGFDPYFTYSGSIPYLDGTFYLNHTFKVSVMFDSVSWPGNDR
HAdV-F/HAdV-40 707	GWSFTRLKTKEPSLGSGFDPYFTYSGSVPYLDGTFYLNHTFKVSVMFDSVSWPGNDR
SAdV-F/SAdV-17 701	GWSFTRLKTKEPSLGSGFDPYFTYSGSIPYLDGTFYLNHTFKVSIMFDSSVSWPGNDR
KNA-08975 706	GWSFTRLKTRETPSLGSGFDPYFTYSGSIPYLDGTFYLNHTFKVSIMFDSSVSWPGNDR
SAdV-F/SAdV-18 701	GWSFTRLKTKEPSLGSGFDPYFTYSGSIPYLDGTFYLNHTFKVSIMFDSSVSWPGNDR
HAdV-F/HAdV-41 709	GWSFTRLKTKEPSLGSGFDPYFTYSGSVPYLDGTFYLNHTFKVSIMFDSSVSWPGNDR
***** : ***** : ***** : ***** : *****	
KNA-S6 769	LLTPNEFEIKRTVDGEGYNVAQCNCMTKDWF LIQMLSHYNIGYQGFYVPEGYKDRMYSFFR
HAdV-F/HAdV-40 767	LLTPNEFEIKRTVDGEGYNVAQCNCMTKDWF LIQMLSHYNIGYQGFHVPESYKDRMYSFFR
SAdV-F/SAdV-17 761	LLTPNEFEIKRTVDGEGYNVAQCNCMTKDWF LIQMLSHYNIGYQGFYVPEGYKDRMYSFFR
KNA-08975 766	LLTPNEFEIKRTVDGEGYNVAQCNCMTKDWF LIQMLSHYNIGYQGFYVPEGYKDRMYSFFR
SAdV-F/SAdV-18 761	LLTPNEFEIKRTVDGEGYNVAQCNCMTKDWF LIQMLSHYNIGYQGFYVPEGYKDRMYSFFR
HAdV-F/HAdV-41 769	LLTPNEFEIKRTVDGEGYNVAQCNCMTKDWF LIQMLSHYNIGYQGFYVPEGYKDRMYSFFR
***** : ***** : ***** : **** . *****	
KNA-S6 829	NFQPMRSRQVVDTTSYSDYKNVTLPFQHNNNSFGVGGMGPTMREGQAYPANYPYPLIGKTAV
HAdV-F/HAdV-40 827	NFQPMRSRQVVDTTYTEYQNVTLPFQHNNNSFGVGGMGPAIREGQAYPANYPYPLIGQTAV
SAdV-F/SAdV-17 821	NFQPMRSRQVVDSVNYANYKEVKLPFQHNNNSFGVGGMGPTMREGQAYPANYPYPLIGKTAV
KNA-08975 826	NFQPMRSRQVVDTTYSDYQNVTLPFQHNNNSFGVGGMGPTMREGQAYPANYPYPLIGKTAV
SAdV-F/SAdV-18 821	NFQPMRSRQVVDTTYTDYKNVTLPFQHNNNSFGVGGMGPTMREGQAYPANYPYPLIGKTAV
HAdV-F/HAdV-41 829	NFQPMRSRQVVNTTYKEYQNVTLPFQHNNNSFGVGGMGPTMREGQAYPANYPYPLIGQTAV
***** : . * : . ***** : ***** : ***	

KNA-S6	PSLTQKKFLCDRTMWRIPFSSNFMSMGALTDLGQNMLYANSAHALDMTFEVDPMDEPTLL
889	
HAdV-F/HAdV-40	PSLTQKKFLCDRTMWRIPFSSNFMSMGALTDLGQNMLYANSAHALDMTFEVDPMDEPTLL
887	
SAdV-F/SAdV-17	DSLTQKKFLCDRTMWRIPFSSNFMSMGALTDLGQNMLYANSAHALDMTFEVDPMDEPTLL
881	
KNA-08975	PSLTQKKFLCDRTMWRIPFSSNFMSMGALTDLGQNMLYANSAHALDMTFEVDPMDEPTLL
886	
SAdV-F/SAdV-18	PSLTQKKFLCDRTMWRIPFSSNFMSMGALTDLGQNMLYANSAHALDMTFEVDPMDEPTLL
881	
HAdV-F/HAdV-41	PSLTQKKFLCDRTMWRIPFSSNFMSMGALTDLGQNMLYANSAHALDMTFEVDPMDEPTLL
889	

KNA-S6	YVLFEVFDVVRIHQPHRGVIEAVYLRTPFSAGNATT 925
HAdV-F/HAdV-40	YVLFEVFDVVRIHQPHRGVIEAVYLRTPFSAGNATT 923
SAdV-F/SAdV-17	YVLFEVFDVVRIHQPHRGVIEAVYLRTPFSAGNATT 917
KNA-08975	YVLFEVFDVVRIHQPHRGVIEAVYLRTPFSAGNATT 922
SAdV-F/SAdV-18	YVLFEVFDVVRIHQPHRGVIEAVYLRTPFSAGNATT 917
HAdV-F/HAdV-41	YVLFEVFDVVRIHQPHRGVIEAVYLRTPFSAGNATT 925

Figure S4. Multiple alignment of the complete deduced amino acid (aa) sequences of the putative hexons of simian adenovirus (SAdV) strains KNA-S6 and KNA-08975 with those of SADV-F/SAdV-17 strain B-105 (GenBank accession number KP329566), SAdV-F/SAdV-18 strain C676 (FJ025931), Human AdV-F (HAdV-F)/HAdV-40 isolate Dugan (L19443), and HAdV-F/HAdV-41 isolate Tak (DQ315364). The region of the putative hexon (genetically divergent between the hexons of SAdV-17, -18, and HAdV-F) that formed the basis of classification of the AdV strains from African green monkeys into group-I and group-II viruses is highlighted with blue. Numbers to the right indicate the positions of the aa for respective AdV strains.

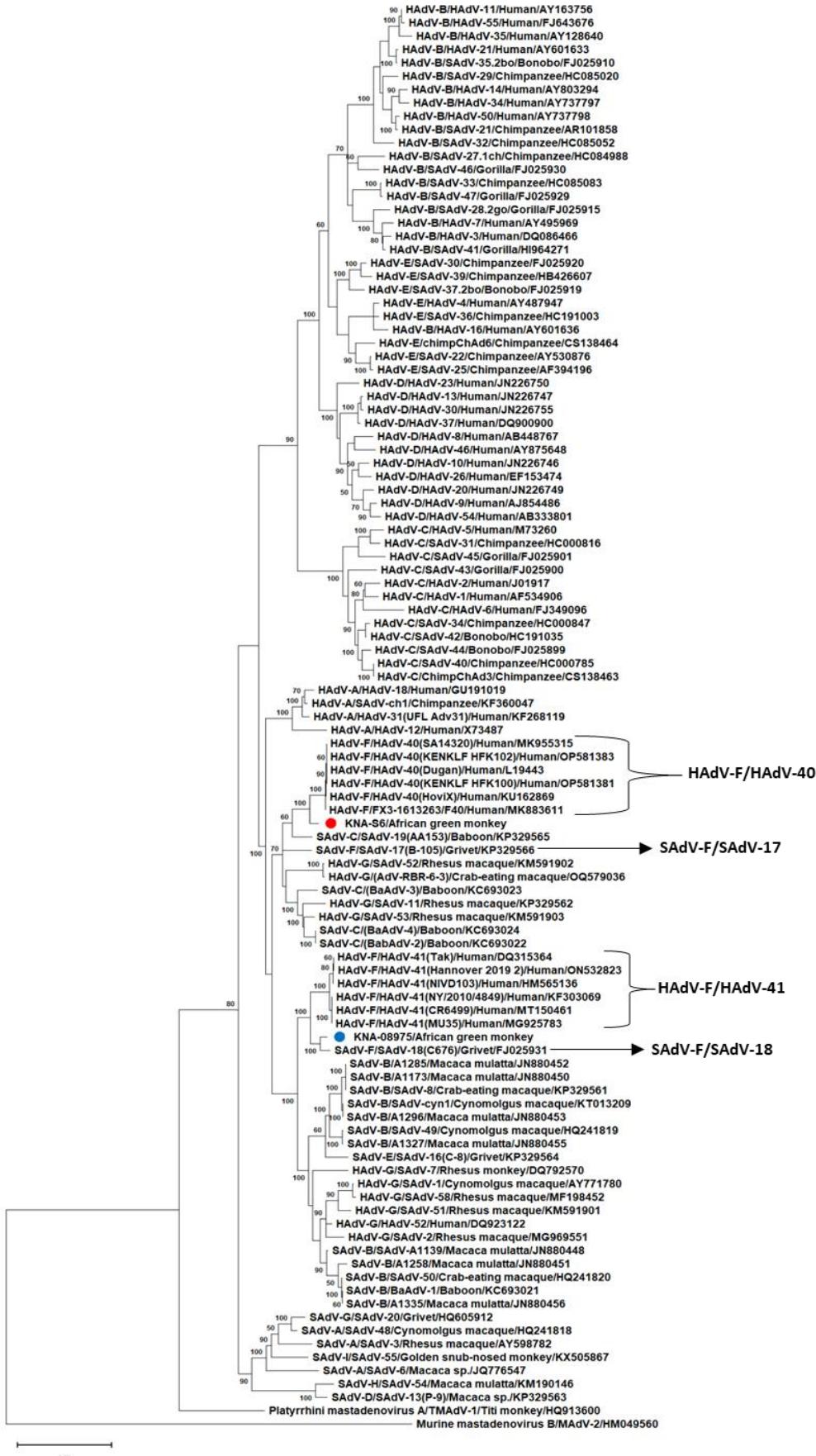


Figure S5. Expanded version of figure 4.

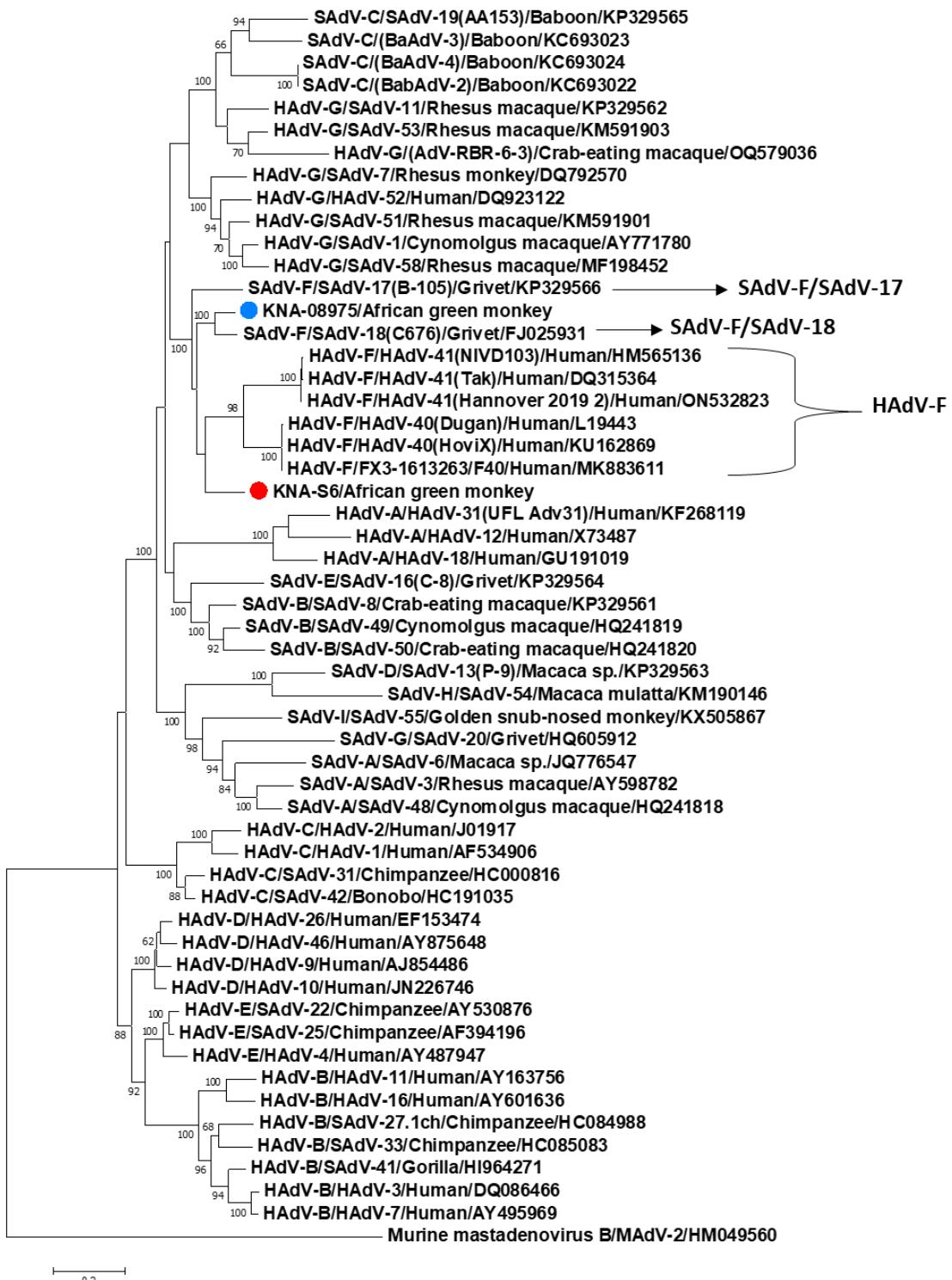


Figure S6. Phylogenetic analysis of the complete hexon coding sequences of simian adenovirus (SAdV) strains KNA-S6 and KNA-08975 (shown with red and blue circles, respectively) with those of human adenoviruses (HAdVs) and other SAdVs. The tree was constructed using the maximum likelihood (ML) method with the Hasegawa-Kishino-Yano model + G and 1000 bootstrap replicates. Similar clustering patterns were observed when the ML analysis was repeated using other mathematical models. *Murine mastadenovirus B/MAdV-2/HM049560* was used as the outgroup sequence. Bootstrap values < 60% are not shown. Scale bar, 0.2 substitutions per nucleotide.

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KNA-S6	NFRLGWDPVTKLVMPGVYTNEAFHPDIVLLPGCGVDFQSRLSNLLGIRKRMPFQEGFQI
SAdV-F/SAdV-17	NFRLGWDPVTKLVMPGVYTNEAFHPDIVLLPGCGVDFQSRLSNLLGIRKRMPFQAGFQI
KNA-08975	NFRLGWDPVTKLVMPGVYTNEAFHPDIVLLPGCGVDFQSRLSNLLGIRKRMPFQEGFQI
SAdV-F/SAdV-18	NFRLGWDPVTKLVMPGVYTNEAFHPDIVLLPGCGVDFQSRLSNLLGIRKRMPFQAGFQI
HAdV-F/HAdV-40	NFRLGWDPVTKLVMPGVYTNEAFHPDIVLLPGCGVDFQSRLNLLGIRKRMPFQKGFQI
HAdV-F/HAdV-41	NFRLGWDPVTKLVMPGVYTNEAFHPDIVLLPGCGVDFQSRLSNLLGIRKRLPFQEGFQI *****:*****:*****:*****:*****:*****:*****:*****:*****:*****:*****
 KNA-S6	 MYNDLEGGNNIPALLDVAKYEASITEAQQQGKEIRGD ₁ TFAVSPQDLVIEPVANDSKNRSYN
SAdV-F/SAdV-17	MYEDLEGGNNIPALLDVAKYEASITQAQQQGKEIRGD ₁ TFAVSPQDLIEPVEKDSKNRSYN
KNA-08975	MYEDLEGGNNIPALLDVAKYEASIQQAREQGQEIRGD ₁ NFTVIPRDRVEIVPVEQDSKGRSYN
SAdV-F/SAdV-18	MYEDLEGGNNIPALLDVAKYEASIQQKAREQGQEIRGD ₁ NFTVIPRDRVEIVPVEKDSKDRSYN
HAdV-F/HAdV-40	MYEDLEGGNNIPALLDVAKYEASIQQKAKEEGKEIGDDTFATRPQDLVIEPVAKDSKNRSYN
HAdV-F/HAdV-41	MYEDLEGGNNIPALLDVAKYEASIQQKAKEEGKEIGDDTFATRPQDLVIEPVAKDSKNRSYN **:*****:*****:*****:*****:*****:*****:*****:*****:*****:*****:*****
 KNA-S6	 LLPDDKNNTAYRSWFLAYNYGDPEKGVRSTLLTTDVTCPQQVYWSLPDMMDQDPVTFR
SAdV-F/SAdV-17	LLPDDKNNTAYRSWFLAYNYGDPEKGVRSTLLTTDVTCPGSQQVYWSLPDMMDQDPVTFR
KNA-08975	LIPTDKTNTEYRSWFLAYNYGDPEKGVRSTLLTTDVTCPGSQQVYWSLPDMMDQDPVTFR
SAdV-F/SAdV-18	LLPGDQTNTAYRSWFLAYNYGDPEKGVRSTLLTTDVTCPGSQQVYWSLPDMMDQDPVTFR
HAdV-F/HAdV-40	LLEGDKNNNTAYRSWFLAYNYGDAEKGVKSWTLLTTDVTCPGSQQVYWSLPDMMDQDPVTFR
HAdV-F/HAdV-41	LLPNQNNTAYRSWFLAYNYGDPKKGVQSWTLLTADVTCPGSQQVYWSLPDMMDQDPVTFR *: * : . **:*****:*****:*****:*****:*****:*****:*****:*****:*****
 KNA-S6	 PSSQVSNPVVGVELLPVHAKSFYNEQAVYSQLIRQSTALTHVFNRFPENQILVRPPAPT
SAdV-F/SAdV-17	PSSQVSNPVVGVELLPVHAKSFYNEQAVYSQLIRQSTALTHVFNRFPENQILVRPPAPT
KNA-08975	PSSQVSNPVVGVELLPVHAKSFYNEQAVYSQLIRQSTALTHVFNRFPENQILVRPPAPT
SAdV-F/SAdV-18	PSTQVSNPVVGVELLPVHAKSFYNEQAVYSQLIRQSTALTHVFNRFPENQILVRPPAPT
HAdV-F/HAdV-40	PSTQVSNPVVGVELLPVHAKSFYNEQAVYSQLIRQSTALTHIFNRFPENQILVRPPAPT
HAdV-F/HAdV-41	PSTQVSNPVVGVELLPVHAKSFYNEQAVYSQLIRQSTALTHVFNRFPENQILVRPPAPT **:*****:*****:*****:*****:*****:*****:*****:*****:*****:*****
 KNA-S6	 ITTVSENPALTDHGTLPLRSSISGVQRVTITDARRRTCPYVHKALGIVAPKVLSRTF
SAdV-F/SAdV-17	ITTVSENPALTDHGTLPLRSSISGVQRVTITDARRRTCPYVHKALGIVAPKVLSRTF
KNA-08975	ITTVSENPALTDHGTLPLRSSISGVQRVTITDARRRTCPYVHKALGIVAPKVLSRTF
SAdV-F/SAdV-18	ITTVSENPALTDHGTLPLRSSISGVQRVTITDARRRTCPYVHKALGIVAPKVLSRTF
HAdV-F/HAdV-40	ITTVSENPALTDHGTLPLRSSISGVQRVTITDARRRTCPYVHKALGIVAPKVLSRTF
HAdV-F/HAdV-41	ITTVSENPALTDHGTLPLRSSISGVQRVTITDARRRTCPYVHKALGIVAPKVLSRTF *****:*****:*****:*****:*****:*****:*****:*****:*****:*****

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Figure S7. Multiple alignment of the partial deduced amino acid (aa) sequences of the putative penton bases of simian adenovirus (SAdV) strains KNA-S6 and KNA-08975 with cognate sequences of SADV-F/SAdV-17 strain B-105 (GenBank accession number KP329566), SAdV-F/SAdV-18 strain C676 (FJ025931), Human AdV-F (HAdV-F)/HAdV-40 isolate Dugan (L19443), and HAdV-F/HAdV-41 isolate Tak (DQ315364). The putative 'RGD' motif is highlighted with green and was absent in HAdV-F strains. The aa numbers shown here correspond to those of the complete deduced aa sequence of penton base of SAdV-F/SAdV-18.

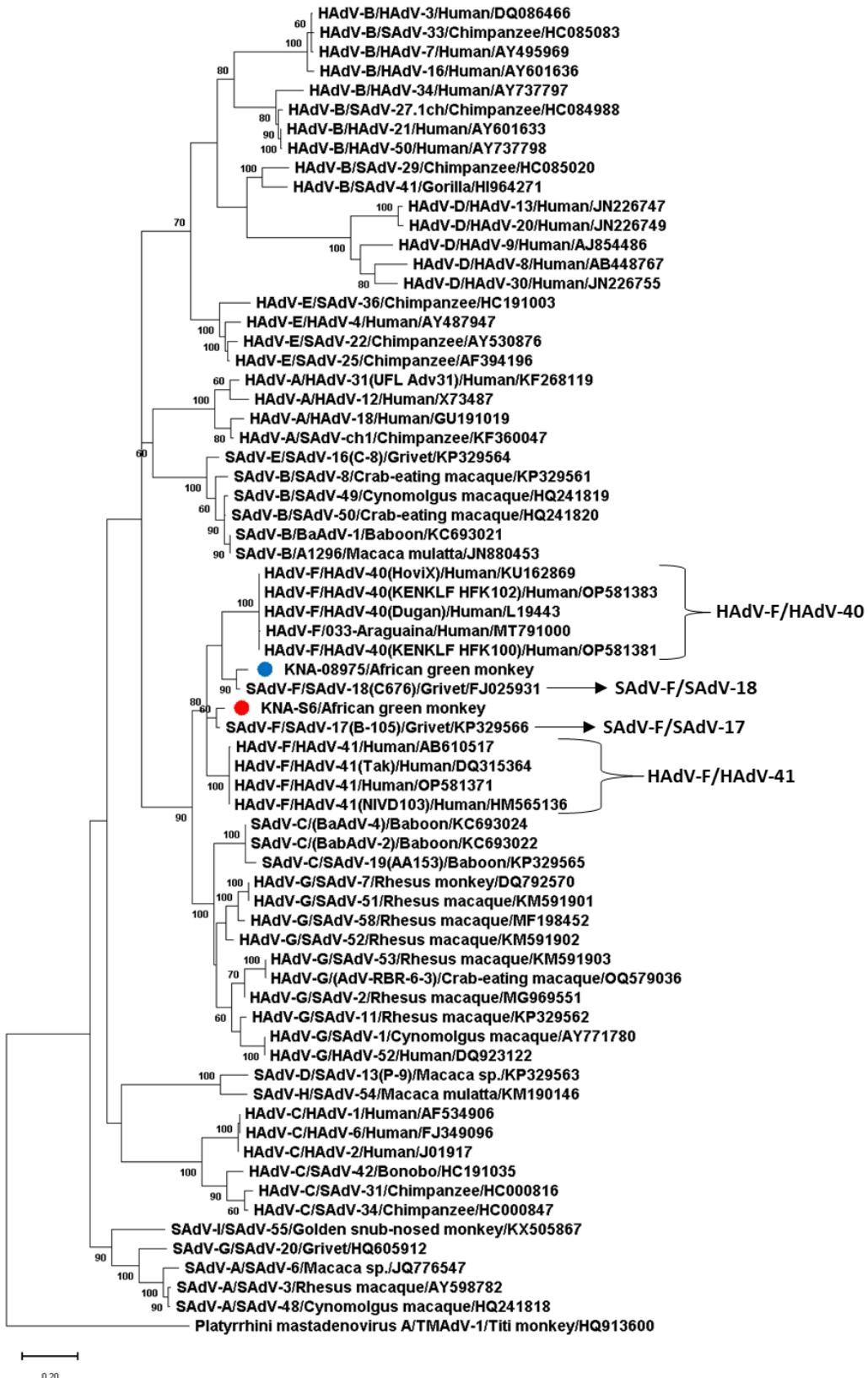


Figure S8. Expanded version of figure 5.

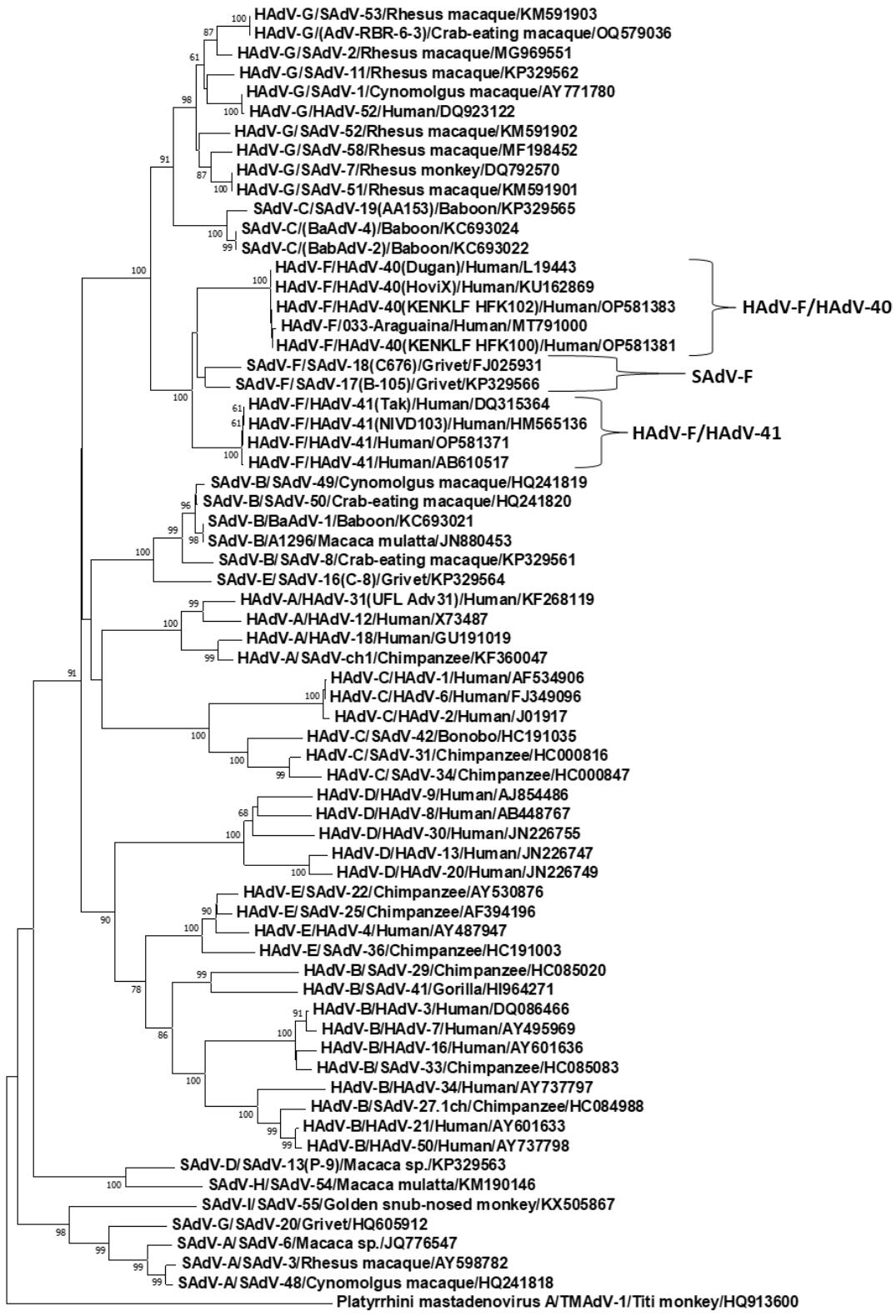


Figure S9. Phylogenetic analysis of the complete deduced amino acid (aa) sequences of the putative penton bases of simian adenoviruses (SAdVs) and human adenoviruses (HAdVs). The phylogenetic analysis was performed as described under ‘Materials and Methods’ section. Bootstrap values < 60% are not shown. Scale bar, 0.05 substitutions per aa residue.