

QUERY	1	10	20	30	40
UniRef90_R6WNN2	V K T F E D L F A E L G D R A R T R P A D S T T V A A L D G G V H A L G K K L L				
UniRef90_UPI0004637644	R I F E H V Y H T I V D R K Q N P K E G S Y T N Y L F E K G I D K I I L K K K V				
UniRef90_UPI000479EA7E	L E I F Q S V Y D T I L D R K K H P K E G S Y T N Y L F D K G I D K I I L K K K V				
UniRef90_D4KXE4	K V L D N Y D V I L D R K A N P K E G S Y T N Y L F D K G I D K I I L K K K V				
UniRef90_R5JXM0	L T I L K E D Y D V I A E R K E N P K E G S Y T N Y L F D K G I D K I I L K K K V				
UniRef90_F3ZX38	D V L A E L Y D V I A E R K E N P K E G S Y T N Y L F D K G I D K I I L K K K V				
UniRef90_R5DU14	L K V F N N V M S I I E D R K Q H P K E G S Y T N Y L F D K G I D K I I L K K K C				
UniRef90_R5VBV8	L K V L E S V Y D I I K E R K A H P Q D G S Y T N Y L F G K G T D K I I L K K K L				
UniRef90_K9ULP4	D T L S D L Y Q T I C D R R D N P R E G S Y T Q S L F A G G D N K I I L K K K I				
UniRef90_S2YD59	L Q V F E T V Y E K L I E R K K N P R D G S Y T N Y L F D K G I D K I I L K K K V				
UniRef90_A1HMG3	M K V L E R D Y R T I L E R R D H P K E G S Y T N Y L F D K G I D K I I L K K K M				
UniRef90_R5CF04	L K V F E N V Y A V I A D R K I H P K D G S Y T N Y L F D K G I D K I I L K K K L				
UniRef90_R7R3C7	L K V F E N V Y A V I A D R K I H P K D G S Y T N Y L F D K G I D K I I L K K K L				
UniRef90_U9VUF8	D T L S Q V Y G V I C D R K A N P K P D S Y T N K L F A G G D N K I I L K K K I				
UniRef90_E0NWH9	E V L A S L Y Q V I Q S R R L H P V E G S Y T N Y L F D K G Q D K I I L K K K I				
UniRef90_H6LC53	M E I L N R L Y D L I A D R K S N P V E G S Y T N Y L F E K G V D K I I L K K K C				
UniRef90_B1I555	V L E E M L Y A L I K D R K Q K R P A G A Y T T Y L F D K G L D K I I L K K K V				
UniRef90_Q8R886	I E I L N K L Y E R I K G R K I N P V E G S Y T N Y L F E K G G D K I I L K K K V				
UniRef90_Q2RGW3	T I L S Q V F Q V I K E R Q A T R P E G S Y T A Y L F N N G Q D K I I L K K K I				
UniRef90_F6CR30	I L E E L F F Q V I K E R Q E K R P P G S Y T A K L F N N G Q D K I I L E K L				
UniRef90_K9YJW5	D T L T E L Y K V I C D R K N P S E K S Y T C S L F A G G D N K I I L K K K I				
UniRef90_R5U641	L E V F E N E Y N I I L D R K L H P K E G S Y T N Y L F D K G Q D K I I L K K K I				
UniRef90_UPI0003819E44	N T L S G L Y E V I R E R Q A N P N E S S Y T C K L F A G G D N K I I L K K K I				
UniRef90_Q3AD47	E V L A K L W Q I I K D R K Q K L P E G S Y T C Y L F Q K G D K I I A Q K V				
UniRef90_UPI00047CE308	R V L D S V F E V I K D R K V N P R E G S Y T N Y L Y E K G D K I I L K K K I				
UniRef90_K9Z3W3	D T L T E L F K I I I C D R K E H P V E G S Y T C K L Y E G G D N K I I L K K K I				
UniRef90_R7HVE8	T V L D D I Y K T I I D R K K H P K E G S Y T N Y L F D N G I D K I I L K K K I				
UniRef90_R5DJE8	L E V F E I Y N T V I V D R K E N P K E G S Y T N Y L F D K G I D K I I L K K K I				
UniRef90_A6P0M3	E V L K R L Y Q V V L I D R K A N P Q E G S Y T C Y L F D K G V D K I I L K K K I				
UniRef90_R6T7X4	V Q V F E H V Y Q T I I D R K N N P K E G S Y T N Y L F E Q G Q D K I I L K K K I				
UniRef90_E6PNN3	D V L D R L A A V I E A R K Q A D P A S S Y V A R L F A K G G D A M I L K K K I				
UniRef90_R7F145	N V L Q E D Y A T I A D R A A N P V E G S Y T N Y L L D N G V E K I I C K K V				
UniRef90_L0EH00	N I L K E L Y D D L I A K R Y A E R P E G T Y T T Y L F E K G I D K I I L K K K V				
UniRef90_G7VX47	E V L A Q L E A I I R E R E V T R P E G A Y T T Y L F D K G G D N K I I L K K K V				
UniRef90_T3H7D9	N I L K E L Y D D L I A K R Y A E R P E G T Y T T Y L F E K G I D K I I L K K K V				
UniRef90_UPI0003604A44	U N L Q E D Y A T I A D R A A N P V E G S Y T N Y L L D N G V E K I I C K K V				
UniRef90_F3B9P6	L Q I F E Y V Y Q T I I L E R K Q N P K E G S Y T T Y L F D K G I D K I I L K K K V				
UniRef90_R6P300	E V L E A L Y Q T I I D R R E Q P K P E G S Y T C Y L F E K G G D N K I I L K K K V				
UniRef90_K9RJN0	D T L S Q L F D V I S D R R D N P T D D S Y T C K L F E E G G D N K I I L K K K V				
UniRef90_M1ZHL5	V L A A Q L E R T V A E R E K E R P E G S S Y T A K L F A K G R K K I A Q K V				
UniRef90_K9H2X0	I L D E L F A V I I E G R K A A D P E S S S Y T A K L F A K G R K K I A Q K V				
UniRef90_W8TFV5	I M G R V Y E L I T E R K E N P V D G S Y T N Y L F D K G G D N K I I L K K K V				
UniRef90_UPI00035E6E71	E F L N D L Y K T I L A R R E S D D E T S Y T K Y L F V K G Q D K I I L K K K V				
UniRef90_S9SU04	V L A E L E N L I A Q R Q I E R P E G S Y T T Y L F E K G L D K I I L K K K V				
UniRef90_B3E616	I L D E L Y Q V V L I S R K G A S P D S S Y T A S L L H K G V D K I I L K K K V				
UniRef90_D5UB39	S I S D K L Y N L I K E R K I N Q T E G S Y T T Y L F N S G G D K I I L K K K V				
UniRef90_UPI000374BFBF	D T L S Q L F Q V I C D R R H R P Q E N S Y T C E L F A G G D N R I I L K K K V				
UniRef90_U2FGD7	L N I L L D D I Y E V I A K Y R G N P L E G S Y T T Y L F E K G G D K I I L K K K V				
UniRef90_A5PU00	I I L T D D L A N V I A Q R A S A P K E G S Y T T Y L F E K G G D N K I I L K K K V				
UniRef90_C8W204	V L L D E L Y G V I I D R K E K M P E G A Y T S Y L F D K G G D N K I I L K K K V				
UniRef90_B8HQN4	D T L S Q V F S V I C D R R D H P A P E S S Y T C S L F K G G D N K I I L K K K V				
UniRef90_L8Y3I0	F S Q L E K K L L I S R R K N S D P E S S S Y T A A L Y A K G T K R I A Q K V				
UniRef90_E6SHE7	L S R I L E A V V I E S R R R Q Q E R P A G S Y T T R L F E A G G L P R I I L K K K V				
UniRef90_R6J032	M T A I E R E Y Q V I I D R R A D R Q E G S Y T C Y L F D Q G G D N K I I L K K K V				
UniRef90_Q46LX2	S E L F N V I I E S R K S N P E E G S Y T T N T L L K E G D N K I I L K K K V				
UniRef90_R6JD5	I L A E L Y R V I Q D K R V H P G K E G S Y T R Y L F M S G Q D K I I L K K K V				
UniRef90_UPI00047A9E62	D F I Y R V I Y K L I E H R R S N P T E G S Y T N Y L F D G G D K I I L K K K V				
UniRef90_B1XX96	D V L A R L A E V I A A R R D G D P D K S Y V A R L F R K G T D S M I L K K K V				
UniRef90_J1HA91	M S V L Q E L Y Q T V I E S R K T E R Q E G S Y T C Y L F E K G G D K I I L K K K V				
UniRef90_10GR99	T V L N D L Y N V I Q N R Q L N P V E G S Y T N Y L F E K G Q D K I I L K K K V				
UniRef90_D9SC18	M T I I Q T L T Q T I I E S R K L A S P D S S Y V A K L F S K G E D A I I L K K K V				
UniRef90_UPI0004189BC5	Q I I L D E L Q S V I A E R K A T L P E G S Y T T S S F F Q E G G V D R I I L K K K V				
UniRef90_B2VA74	E I I L H K L Y E K I Q E R K E T M P E G G S Y V A S L F K K K G S D K I I I Q K V				
UniRef90_G5H606	I I K E L Q S V I Q G R H P E R E M P E G G S Y T T N Y L F T K G V N K I A Q K V				
UniRef90_F2JGU5	M I G E L Y S T I M Q R K E H P K E G S S Y T N Y L L D K G G N K I I L K K K V				
UniRef90_UPI000347DC12	D T L Q R Q L H E V I E S R R R G G D P D K S Y V A R L F H K G T D T I I L K K K V				
UniRef90_F2LU61	D I I R K L Y D L L Q K R K E E L P E G S Y T A K L F I S G T D K I I A K K I I L K K K V				
UniRef90_R5H281	M D A F D K M Y D V V I D R R A N P Q E G S Y T C Y L F D K G G V N R M A Q K V				
UniRef90_R7HMD9	V E F F D Y L Q K F I K R R Y A E M P E G S Y T T S S F K K G V N R M A Q K V				
UniRef90_UPI00037C84EF	R I F D L L M E E I E S R K T E P V E N S Y T N Y L F D K G G D K I I A K K I I L K K K V				
UniRef90_L1NSG3	I I L D E I Q N V I D S R K G A D P E S S Y V A Q L F H K G G D K I I L K K K V				
UniRef90_E6MGJ0	D I I T A L A A Q I E D R R I H P I E P E G S Y T N Y L F N E G E G R E K I I L K K K V				
UniRef90_G9RW14	S L E A L Y A L L E G R R N A Q R P E G S Y T T Y L F E K G G D K I I L K K K V				
UniRef90_Q603K5	M D V L H R L A E I I I E Q R K T E A P D K S Y A A S L Y A K G L D T I I L K K K V				
UniRef90_B5EDR3	D I I A A V Y R V I Q E R K A N P N E S S S Y T A S L M A K G V D K I I L K K K V				
UniRef90_R7B3X0	U R E G L Y D L I M G R K T N P K E G S Y T T Y L F D K G G L D K I I L K K K V				
UniRef90_E3CJ71	L E T L Y Q E V I Q D R K A N P K E G S Y T T Y L F D K G G L D K I I L K K K V				
UniRef90_Q9RPQ3	K I L Q E I Y D V I V D R T I H P K E G S Y T N Y L F E K G G L D K I I L K K K V				
UniRef90_UPI0003708155	E S L Y E L I K Y R K V N P N E K S Y T T Y L F E K G G L D K I I L K K K V				
UniRef90_D1Y7T2	S L E D L M R L I A S R K T E K K E N S Y T A Y L F E K G G L D K I I L K K K V				
UniRef90_R513X8	K V L G D V Y N I I L D R R K N P K E G S Y T N Y L L E K G L D N I I L K K K V				
UniRef90_R9M2A0	D T L N G L Y E V I Q E R R T H P Q E G S Y T C Y L F E K G T D K I I L K K K V				
UniRef90_F7YY52	D V L K R L M E I I I E D R K N N P K E G S Y T V Y L L K S G L D K I I L K K K V				
UniRef90_N1ZAA0	E V L F E L Y D I I L D R K S N V P K E G S Y T N Y L F D K G G L D K I I V N K M G				
UniRef90_H6SS11	I I L A D L Y T V I A G R K G A D P D T S Y T A R L F A K G R G K I V N K M G				
UniRef90_D9TSW3	I I L S N L Y R R I E S R K E N P V T G S Y T N Y L F E K G G L D K I I L K K K F G				
UniRef90_UPI00038F53ED	D I I L G E L E R T I I S E R R Y A E R P E G A Y T S Y L F E K G G L D K I I L K K K V				
UniRef90_D5CNF7	D I I L Q R L A E T L I D A R K Q A A P E S S S Y V A K L F S K G G D D A I I L K K K V				
UniRef90_K4KVT1	R T L E M L A E V I I K R Q N I E P E G A Y T T Y L F T K G G V D K I I L K K K V				
UniRef90_E3HCR7	E I I L G A L D D I L K D R K A N P V E G S Y T T Y L Y T E G V D K I I L K K K V				
UniRef90_R5N012	D V L T E L Y E V V T Q R H E N P Q E G S Y T C Y L F D Q G L D K I I L K K K V				

80

QUERY	50	60	70	80
UniRef90_R6WNN2	E E A G E V W L	A A E H E S N D A	I S Q L L Y	W T Q V L M I S R G L S L
UniRef90_UPI0004637644	E E A T E T V I	A A K N P N L E	I V A D L L Y	H L M V L M V E R G L S S W
UniRef90_UPI000479E7A7E	E E A A E V I I	A A K N P N T E	L K Y E L A D F L Y	H A M V L M A E R G L T T W
UniRef90_D4KXE4	E E A S E L I I	A A K N P D P E	D I K Y E I S D F M Y	H M M V L M A E K G V T T W
UniRef90_R5JXM0	E E A T E M V I	A A K N P D A E	E E L K Y E I S D F L Y	H M M V L M V E K G L T T W
UniRef90_F3ZX38	E E S A E V I I	A A K N P D P E	E I K Y E I S D F L Y	H V M V L M V L Q G V M T L
UniRef90_R5DU14	E E A T E V I I	A A K N P D P E	E I K Y E I S D F L Y	H V M V L M V L Q G V T T W
UniRef90_R5VBV8	E E C T E I V I	A A K N P E P E	E I K Y E I S D F L Y	H C M V L M V E K G I T T W
UniRef90_K9ULP4	E E A V E V V M	A A C K D D R A P	E I A G E A A D L F Y	H T L V A L A H H R V S I
UniRef90_S2YD59	E E A T E L I I	A A K N P N P D E	E I K G E I S D F L Y	H A M V L M V E R G V K W
UniRef90_A1HMG3	E E A A E T I I	A A K N Q D K G E	E I I Y E M A D L W Y	H C L V L L A H H D I T P
UniRef90_R5CF04	E E C T E I V I	A A K N T D P T E	T V Y E I S D L M Y	H L M V V M A E K N I T T W
UniRef90_R7R3C7	E E A T E I V I	A A K N P N V N E	I K Y E I C D F L Y	H M M V L M V E K G V T T W
UniRef90_U9VUF8	E E S A E V V M	A A C K D D D P D	D I A G E V A D L L Y	H T L V A L A H H N V D I
UniRef90_E0NWH9	E E T A E T I I	A A S K N N I R E	D V L Y E M G D L W Y	H C L V L L A Y H N M T P
UniRef90_H6LC53	E E A A E T I I	A A A K N N D P E	E L I Y E S S D L I Y	H L L V L L N N Q N V D L
UniRef90_B1I555	E E T T E V I I	V G A K N N I R E	E E V I N E V A D L F F	H V L V L L A E K N I T L
UniRef90_Q8R886	E E A T E V V I	A A S K N D S K D E	E I V Y E V S D L I Y	H L M V L L V E K N I T L
UniRef90_Q2RGW3	E E A G E T I I	A A S K N R D S R H	E I I L Y E M A D L L Y	H T L V L L A Y H G L E P
UniRef90_F6CR30	E E T T E L I I	E A K N R D R K R	E V V I E S A D V L Y	H L L V I L A E Q G I T P
UniRef90_K9YJW5	E E T A E V V M	A A F K D D D N P A	E I A G E V S D L L Y	H T L V A L A H H N V D I
UniRef90_R5U641	E E A T E I V I	A A K N P D S E E	I I K Y E I A D F L Y	H M M V M M V D K G I T W
UniRef90_UPI0003819E44	E E S A E V V M	A A C K D D D P Q D	E I A S E V A D L F Y	H T L V A L A H H N V D L
UniRef90_Q3AD47	E E A V E T V I	A A S K N D D P K G E	E I I Y E A A D L V Y	H L L V L L A A K D V A L
UniRef90_UPI00047CE308	E E S T E M V I	A A K N T N S N E	L V Y E M A D F L Y	H M M V L M S E K N I S W
UniRef90_K9Z3W3	E E S A E V V M	A A C K D D D P D	E I I V A E V A D L F Y	H T L V A L A Y H K V N L
UniRef90_R7HVE8	E E A T E M V I	A A K N P D S E E	E L K Y E I I S D F L Y	H M M V M M V D K G I T W
UniRef90_R5DJF8	E E A T E L I I	A A K N P S A E E	T K Y E I I S D F L Y	H M I V L M V E K G L N W
UniRef90_A6P0M3	E E C A E T I I	A A K N G V E E	D T V N E C S D L L Y	H L M V L L A A Q D I P L
UniRef90_R6T7X4	E E A T G I V I	A A S K N P N P E	E L K T E M A D F L Y	H A M V L M V E K G I T W
UniRef90_E6PN3	E E A T E F V I	A A K G G E R Q S I	V Y E A A D L W F	H T L V A L A H H G I S P
UniRef90_R7IF45	E E A S E T I I	A A A M K A N K E	V T Y E A A D L L Y	H L M V L L Y Q Q G V T L
UniRef90_L0EH00	E E T A E V I I	A A K N R D N D E	E L R Y E T A D L I F	H M M V L L R E R G L P L
UniRef90_G7VX47	E E A S E T I I	A A K N K D N E E	L R L E V S D L I Y	H L L V L L Q E R K L P L
UniRef90_T3H7D9	E E S S E V I I	A A S K N T D K S E	I I L Y E I S D L V Y	H T L V L M I E K G V E I I
UniRef90_UP10003604A44	E E A A E V V M	A A C K D D D P D	E I I S D L V Y	H T L V A I A H H G V D I
UniRef90_F3B9P6	E E C S E T I I	A A A K N G D D N H	E T V L E I S D L L Y	H L M V M M V N E G I P L
UniRef90_K9RJN0	E E S A E V V M	A A C K D D D P R A	E I I A G E V A D L F Y	H T L V A L A H H N V D L
UniRef90_M1ZHL5	E E T S E V I I	A A A K N R S P E E	E I I R Y E V S D L L Y	H L F V L L R E Q G L P F
UniRef90_K9H2X0	E E G V E C A I	A A A V V S E T P D	D D V V I A E S A D L L Y	H L M V L W A E Q G I T P
UniRef90_W8TFV5	E E A S E V I I	G A K N S D K G E	E T V Y E I S D L L Y	H T L V L L A A R D I P A
UniRef90_UPI00035E6E71	E E A A E T I I	A A S K N D D N K E	E V I Y E M S D L W Y	H C L V L L A Y H N I T I
UniRef90_S9SU04	E E S T E V V I	A A A K S D N D K E	E V L V G E I G D L F Y	H M L V L L R E R N I A L
UniRef90_B3E616	E E A T E V V I	A A G K G G T D T E	E L I Y E T A D L L Y	H G L V L L A A R D I P A
UniRef90_D5UB39	E E C T E V V I	I I G A K N D S N K E	E T I Y E I A D L L Y	H T L V L L M V E K N I T I
UniRef90_UPI000374FBF	E E C A E V V M	A A C K D D D A E I	A I A S E V A D L L Y	H T L V A L A H H Q V D L
UniRef90_U2FGD7	E E T S E V I I	G A K N N D D E	E L V Y E I S D L L Y	H T L V L M V N Q N V T L
UniRef90_A5PU0	E E A A E V I I	A A A K N G A P D E	E V A W E I A D L M Y	H T L V L L Q Q Q G M A I P
UniRef90_C8W204	E E S A E V I I	L A A K N K D K H	E E L V K E S A D L L Y	H L L V M L A E Q G V M P
UniRef90_B8HQN4	E E C A E V V M	A A C K D D D P E A	I I A G E V A D L F Y	H A L V A L A H H Q V D L
UniRef90_L8Y3I0	E E G V E V A L A	A A T V Q D K E	E E L V N E A A D L L Y	H A T V L L H D Q D L S S W
UniRef90_E6SHE7	E E A V E T V I	V V A A G H Q E Q Q	R V V E E A A D L L Y	H L T V L L V A R D V S S W
UniRef90_R6J032	E E C T E M V I	A A A K N N D K D E	E T V Y E I T D L I Y	H T L V M M A N Q G I T P
UniRef90_Q46LX2	E E T A E F I M	A A C K D K N P I	S V A N E A A D L F H	M Q V S L A H H Q N V S W
UniRef90_R6JD5	E E A A E T I I	A A S K N N K D K H	E E L V Y E M S D L W Y	H C L V L L A Y H N I N P
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UniRef90_10GR99	E E A V E T V I	A A S K N N K S E	E V L Y E M G D L W Y	H C L V L L A Y H K T T P
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UniRef90_G5H606	E E A V E T V I	E A I D G N N E R L	V Y E A S D L I Y	H H L V L L E N Q G L T S L
UniRef90_F2JGU5	E E C T E V I I	A A A K D E D D N K E	E L T F E I A D L M Y	H H L T V M M A Q K G L T W
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UniRef90_F2LU61	E E A S E V I I	I A L K N N S Q S E	L V Y E S A D L I F	H H L V G L A E K D V P P
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UniRef90_R7HMD9	E E A V E T V I	E E A T N G T D D R	L V Y E A S D L M Y	H H L I V L L T S K G L S L
UniRef90_UPI00037C84EF	E E A G E V I I	A A A K N N S K E E	E I V F E T A D L L F	H T F V L L A S Q N V K L
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UniRef90_Q603K5	E E A T E T V I	A A K D G E P G K I	V V Y E M A D L W F	H C C V L L A Q Q G L G P
UniRef90_B5EDR3	E E A T E V V I	A A G K G G K R E E	E I I Y E T A D L I F	H H S L V L L G F Y D I D P
UniRef90_R7B3X0	E E C T E V I I	A A A K K D K D E T	I I Y E L A D L C Y	H H M I V L W A D T G V T P
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UniRef90_R9M2A0	E E C S E V I I	A A A K N G Q N E Q	T Q A E E I C D L L Y	H H L V L M V N Q N L S L
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UniRef90_N1ZAA0	E E A T E T I I	A A K N E E D N K E	E V I Y E I S D L L Y	H H I S V L L A E K G G I T T W
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QUERY	
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UniRef90_K9ULP4	R D Y R E E L
UniRef90_S2YD59	E D I K E E L
UniRef90_A1HMG3	G E L L A E E L
UniRef90_R5CF04	K D V T Q E E L
UniRef90_R7R3C7	E E M A E E L
UniRef90_U9VUF8	K D V Y R K L
UniRef90_E0NWH9	E D L E E E L
UniRef90_H6LC53	N S L F R E E L
UniRef90_B1I555	D D V L R E E L
UniRef90_Q8R886	N D I Y N E E L
UniRef90_Q2RGW3	E Q L A A E E L
UniRef90_F6CR30	A E V F A E E L
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UniRef90_R5U641	D E V L E E E L
UniRef90_UPI0003819E44	R E V Y R V L
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UniRef90_K9Z3W3	R D V Y K K L
UniRef90_R7HVE8	S D I V K E E L
UniRef90_R5DJE8	E D I V K E E L
UniRef90_A6P0M3	D A V L A E E L
UniRef90_R6T7X4	E D I T N Q L
UniRef90_E6PNN3	R E V L A E E L
UniRef90_R7IF45	D D V W A E M
UniRef90_L0EH00	D D V M A E E L
UniRef90_G7VX47	D D V L A E E L
UniRef90_T3H7D9	D E I K K E E L
UniRef90_UPI0003604A44	E D V Y K K L
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UniRef90_R6P300	S D V L A E E L
UniRef90_K9RJN0	K S V Y R K L
UniRef90_M1ZHL5	E K V L E E E L
UniRef90_K9H2X0	D R I Y A E E L
UniRef90_W8TFV5	D D I K R E E L
UniRef90_UPI00035E6E71	E E L L N E E L
UniRef90_S9SU04	G D V L S V L
UniRef90_B3E616	D A V W S E E L
UniRef90_D5UB39	N D I K N E E L
UniRef90_UPI000374BFBF	K S V Y R T L
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UniRef90_L8Y3I0	Q D V I A V L
UniRef90_E6SHE7	Q D V A G E E L
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UniRef90_R6IJD5	A E L L N E E L
UniRef90_UPI00047A9E62	D D I K G E E L
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UniRef90_J1HA91	Q D V E D E E L
UniRef90_I0GR99	D Q L D E E L
UniRef90_D9SC18	D D V L T E E L
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UniRef90_F2LU61	E S V L D E E L
UniRef90_R5H281	E D I E T I M
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UniRef90_UPI00037C84EF	E E V E Q E E L
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UniRef90_G9RW14	D D I R A E E L
UniRef90_Q603K5	D D V L R E E L
UniRef90_B5EDR3	E E V Y A E E L
UniRef90_R7B3X0	E D V T K E E L
UniRef90_E3CJ71	T D V A A V L
UniRef90_Q9RPQ3	E D I Y E E E
UniRef90_UPI0003708155	Q D V K D E E L
UniRef90_D1Y7T2	D D V M H E E L
UniRef90_R5I3X8	E E I T Q E E L
UniRef90_R9M2A0	E Q V E Q I L
UniRef90_F7YY52	D D I F E H L
UniRef90_N1ZAA0	Q E V F E E E L
UniRef90_H6SS11	D Q V W A E E L
UniRef90_D9TSW3	N D V Y K E E L
UniRef90_UPI00038F53ED	D S V M E V L
UniRef90_D5CNF7	A D V L E E E L
UniRef90_K4KVT1	S E I A E E E L
UniRef90_E3HCR7	D E I T T Q L
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UniRef90_B9MJR2	D I I F E L L M K T I N D R K Q N K I L E G S Y T S Y	L F E K G L D D K I L K K I G			
UniRef90_W4QIX8	D I L D E L L E R L I A E R E A E R P E G A Y T T Y	L F E K G V D D K I L K K I G			
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UniRef90_UPI0002894B3A	L D I L D T L Q R V I S D R A A E M P E G A Y T T Y	L F N E G V D K I C K K I G			
UniRef90_I8TCV7	V L D Q L L Y A T L L S R K S A D P D S A S Y A A S	L F Y A K G L D D V I L K K I G			
UniRef90_K2A8G6	I K N L L Y S L I R D R F E R K P E N S Y T T S	L F K S G I D K I A Q K V G			
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UniRef90_Q5WDI3	Q I L N D L L E E T I A K R E A E M P E G A Y T T Y	L F T E G V D K I C K K I G			
UniRef90_I3D6C3	F S K L L E R M I A E R K N A D P E S S Y T A K	L F Y A K G T H K I A Q K V G			
UniRef90_I2GRY5	Q F L N Y Y L Q G V I R D R Q K N P S D A S Y T T K	L F F A R G T A K I A Q K V G			
UniRef90_UPI0003B7012F	I L D A L L Y A T V A A R K G A D A D G S Y T A S	L F E Q G L D K I L K K I G			
UniRef90_D5WRB5	T V L A E L W E T I D E R Y R T R P E G S Y T T Y	L F F A R G R G R I A Q K V G			
UniRef90_UPI0003B4EC7C	D T L D R L F A T I A S R K G A D A D G S Y T A S	L F D A R G R G R I A Q K V G			
UniRef90_R5JF18	L K V F E D E Y E Y I E D K Q K N P E R G S Y V N Y	L F D K G T D K I L K K I G			
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UniRef90_W0JFC9	R I Y A T I L Q R K K D M P Q N S Y V A R	L F F S D G L E K I A K K I V			
UniRef90_D5WYF4	E I L E H V M K E I E G R K T E R V E N S Y T N Y	L Y D K G V D K I G K K I V			
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UniRef90_Q82WM7	T I L Q R L A R T I E A R K N A D P E S S Y T A R	L Y A K G T K R I A Q K V G			
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UniRef90_R5EV97	D V L Q Q L A E V L E Q R K Q K Q S A D Q S Y V A S	L Y A K G L D H L K K I V G			
UniRef90_G0A5R4	D V L Q Q L A E V L E Q R K Q K Q S A D Q S Y V A S	L F E E G V D K I L K K I V G			
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UniRef90_Q2VYJ1	K I L E E L Y T V I A S R K G T D P D K S Y T A K	L F A K G L D K I L G K I V G			
UniRef90_Q3A138	D I L E Q V Y Q V V L Q R R D N P S Q K S Y V A S	L L A G G D D R I L K K I V G			
UniRef90_E7S0Y4	D I L A R L A E V I E S R R G A D P S R S Y V A K	L F E R G L D D K I L K K I V G			
UniRef90_UPI000478C186	D V L Q S L Y N T I A I R K K E P K E G A Y T T Y	L F D K G V D D K I L K K I V G			
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UniRef90_UPI00036AF279	D I L N H E K T I A K R E A E R P E G A Y T T Y	L F E E G V D K I L K K I V G			
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UniRef90_H2FVX0	L T F F A E L E Q V I A S R K G A D P A S S Y T A S	L Y A K G T K R I A Q K V G			
UniRef90_F9ZPF3	L D S L L Q E T I H G R R A A D P G Q S Y V A R	L L Q G G Q D R I L K K V G			
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UniRef90_UPI0003B5BFF6	D T L S N V A A V L E S R K S A D A D S S Y V A K	L Y H K G T D A I L K K I V G			
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UniRef90_UPI00035F6791	D V L Y R L Y E V I L E R K R T M P E G S Y T A K	L F A K G K P Y I A Q K V G			
UniRef90_V4J5C9	D V L N R L L A D V L E Q R K G A D P E S S Y V A K	L Y A K G L D A L K K I V G			
UniRef90_R6G3E2	K I I K E L Y E T I I N R K E A G N D G S S Y T K Y	L L D K G T N K I L K K I V G			
UniRef90_UPI000349FE50	L L S E L F A V I E D R R R V N P K P D S S Y T C K	L F D G G D N R I L K K I V G			
UniRef90_F4XAFA8	E G L Y A L L E G R N K E R P E G S S Y T T Y	L F E K G G L D K I L K K V G			
UniRef90_M2NDV7	D G V Y K T I I D R R Q K H P V D N S S Y T N Y	L L D Q G I D K I C K K V G			
UniRef90_F7P134	D Q L E Q V I H S R Y G A D P S S Y T A S	L F A K G V K R I A Q K V G			
UniRef90_U4WPJ4	I L L K E S E A L I A T R Q K E M P V G A Y T T Y	L F E K G I D K I L K K I V G			
UniRef90_J8DBR1	V L K S L L F E T V K E R K Q H P L P E S S Y T T Y	L F S K G E D K I L K K I V G			
UniRef90_U7PDR1	D S L I E D V Q Q S R A N S D D D K S Y T H Y	L L N E G G E D K I T K K F G			
UniRef90_Q31LP4	D Q L E Y E Q V I C D R R Q D R P S E A S Y T S K	L F A G G D N K I R K K I G			
UniRef90_H9UMN9	V L L Q L E Q V I R E R K K K L P E G S Y T T H	L T F T G K E E K I R K K T G			
UniRef90_B1X3F5	D I L T E V Y R V V C D R R Q D R P S E A S Y T S K	L L E G G D N R I L K K I V G			
UniRef90_UPI000255C1F6	D V C T E L L A K T I V Q R R N F P E T G S Y T N K	L F N E G G I D K I L K K I V G			
UniRef90_Q2JWX9	D T L S Q V A V V C D R R Q D R P D S Y T S S C Y	L F E K G L D K I L K K I V G			
UniRef90_R6RF27	M D Y I R N D Y E T L E R K K E A Q Q E G S Y T S Y	L F E K G S E K I L K K I V G			
UniRef90_C9A5E5	T I I D A L Y E L I K G R K D T P Q E G S Y T S Y	L L N K G I N K V A Q K V G			
UniRef90_L8JPX3	L S F L E H T I Q E R K N N P K E G S Y T N E	L F E K G L D K I L K K I V G			

	50	60	70	80
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UniRef90_Q11SL9	E E A V E I V I E A K D N N D D L F K G E A A D L Y H Y L I L E A K N I P L R P			
UniRef90_UPI00036ABF27	E E A T E T V M A A K D G V A K I V Y E V A D L W F H C M V L L A Q R G V T F			
UniRef90_E3GI87	E E S A E T I I A A K N D S K E E L T Y E A S D L L Y H L T V L L N N Q G V T F			
UniRef90_B9MJR2	E E A T E V V I G A K N G K K E E V I Y E I S D L M Y H L S V L L A Y F N V D W			
UniRef90_W4QIX8	E E A G E V I I A A K N R D H E E L K W E V A D L F Y H T L V L L R E Q K I P F			
UniRef90_A5GUG3	E E S A E F V M A C K D D A K D E I A G E A A D L I F H M Q V A L A H G V E W			
UniRef90_UPI0002894B3A	E E A T E S V I A A K N R D A E E L K W E V A D L M Y H L L V L L K E Q N V D L			
UniRef90_I8TCV7	E E A T E T V I A A K N Q D P S K L V Y E L A D L W F H C F V L M A E R G V T P			
UniRef90_K2A8G6	E E S V E V V I S A K N R S K K R M I E E V S D L I Y H L L V L L V A R G I S L			
UniRef90_W0EZ90	E E A V E I V I E A K D D N K D L F L G E A A D L F H Y L V L L Q A K G F E S L			
UniRef90_R5QR09	E E A S E T I I A A K N D N K D L F L G E A A D L F T F V L M D R G V S L			
UniRef90_Q5WDI3	E E A G E V I I A A K N R D P E E L R W E V A D L F Y H V L V L L Q E Q K L P L			
UniRef90_I3D6C3	E E A V E T V I A A M A N D K E E L I G E V A D L A Y H L T V M L H N A D L S W			
UniRef90_12GRY5	E E A V E T V I A A M A N D K E E L I G E V A D L A Y H L F V L L A D A G L T L			
UniRef90_UPI0003B7012F	E E G V E T V I A A L A T P D K V A S E S A D L L Y H L V W A D Q G V K P			
UniRef90_D5WRB5	E E A T E T V I A A K G K T G E V V R Y E S A D L L Y H L M V L W R Q V G L Q P			
UniRef90_UPI0003B4EC7C	E E A T E T V I A A M G Q N A R A I V P E A A D L L Y H L F V L L A D A G L T L			
UniRef90_R5JF18	E A V I E V L I A A K N Q S D T E T K Y E I S D L L Y H L M V L M V E Q G I T W			
UniRef90_E8PME5	E E A G E V I I A A K N Q N P E E V R W E A T D L L Y H L L I V L A E G L T P			
UniRef90_G1Y349	E E A V E A V I E A M R G D R D K L A S E S A D L L Y H L L V L W A D A G L T P			
UniRef90_A9WEK7	E E A A E V I I A A K N G N P A E I A Y E L A D L I Y H S L V L L E Q Q G M T A			
UniRef90_D4KAY2	E E C T E V I I A G E K E D K A E T V Y E I S D L L Y H A V L M V S A G I T V			
UniRef90_W0JFC9	E E T L E F L F A L K E N D T S H I Y E A S D C L Y H L L V A L A Y H G L T P			
UniRef90_D5WYF4	E E A T E L V M A A K D G E A E K I L Y E T A D L W F H S L I A L A Q H G L T P			
UniRef90_W4VF96	E E A G E V V I A A K N D D K E E L T N E V S D L L Y H T F V M M A N Q G V S L			
UniRef90_UPI000380A942	E E A V E L V I E A K D N D R D L F L G E A A D L M Y H Y I V L L A K G Y S L			
UniRef90_M1VMN6	E E A L E V A L D A V Q N R P D R V V E E S A D L L Y H L L W A D L G V H P			
UniRef90_R5PNM8	E E A V E A V I E A T N G T N E R L V Y E C S D L I Y H M V L L T S K G L S I			
UniRef90_AQA037Z2M7	E E T S E V I I G A K N K S K E E L V Y E I S D L L V Y H L L V L I I N E E V T I			
UniRef90_E4RK4M	E E S A E V I I A S K N E T A S K E E L I L E S A D L L Y H M L V L L A E K N I D P			
UniRef90_Q7TUC7	E E T A E F I I M A C K D D N D K D E I A N E A S D I L Y H L Q V A L I Y K G I P			
UniRef90_Q82WM7	E E A A E T I I M A C K D D N D R E Q I I Y E T A D L W F H C L I M L T R H D I S P			
UniRef90_C4LFI5	E E G V E V A L I A A M A K D R E E L I N E S A D L L Y H L T V L L Q N E G L Q L			
UniRef90_R5EV97	E E A V E T I I E A T N G T D D R L I Y E A S D L L Y H L I V L L T S K G H R L			
UniRef90_G0A5R4	E E A T E T V I I A A K D G D K D K Q E L I Y E T A D L W F H C M V M L A D Q G L G P			
UniRef90_UPI00041288CD	E E A S E I I I A A K N R D P E E V Q W E S A D F L Y H W L V L L Q E K G P			
UniRef90_Q2VYJ1	E E A V E T V V I A A L S E G K D E L V G E S A D T L Y H L L V L W A D C G V E P			
UniRef90_Q3A138	E E A T E T A V V A G K G G Q P D E V V Y E V A D L F F H V V L V L L G Y Y D L P P			
UniRef90_E7S0Y4	E E A T E V V I I A A K N Q S K P Q E E V S E T A D L W F H T L V M L A H H E R P			
UniRef90_UPI000478C186	E E S A E V V I I A A K N S S K P Q E E V C D L L Y H I V L V M L E E R G V S L			
UniRef90_I4A788	E E S A E V I I G A K N T D K E E V T W E V A D L T Y H T L V L M E V L G V A V			
UniRef90_A0A024QGF3	E E A S E V V I I G A K N Q D K A E L T S E S A D F L Y H W L V L L Q E K G P			
UniRef90_W7DDA5	E E A T E V V I I G A K N R D P E E V Q W E S A D F L Y H W L V L L Q E K G F R I T P			
UniRef90_UPI000255DC17	E E A S E I I I G A K N R D P E E V Q W E S A D F L Y H W L V L L R E Q G V N L			
UniRef90_UPI00036AF279	E E G V E V A L I A A T S G D K E E L V I N E S A D F L Y H L L V L L Q D Q G F S L			
UniRef90_D0IBL9	E E A A E V I I I I A A K N A D P E E V I N E S A D F L Y H L L V L L A E S D V P T			
UniRef90_D1C4Y5	E E C T E V I I I I A A K N A D P E E V I N E S A D F L Y H L L V L L A M Q K G V I S V			
UniRef90_G7M297	E E A A E V V I I I I S C K D D N D K Q E Q I N E I C D L T Y H L L V L L M A Q V G I S V			
UniRef90_B7K5G8	E E A A E V V M A C K D D S S A I I A S E I V A D L F Y H T L V A L A Y H V D I			
UniRef90_Q8FTD4	E E A G E V W I I A A E Y Q S D E E L I A E E I S Q L M Y W T Q M M V A R G I K P			
UniRef90_A9B1U1	E E S A E V V I I I I A A K N G N A D E L R N E A S D L I Y H L T V L L N Q G V S P			
UniRef90_UPI0003A7EDCF	E E C T E V V I I I I A S L N Q T K E D D L V N E M A D I L Y H L T V L L M A Q K G V I S P			
UniRef90_Q47XB2	E E G V E V A L I A A V A E V E T K E D D L L G E C A D L F Y H T L V L L A D Q K I E L P			
UniRef90_F5SGL2	E E A A E V V I I I I A A K N E S H Q E L I A W E A S D L L Y H L T V L L F R Q Q Q L H P			
UniRef90_H2FVX0	E E G V E T A L I A A T V H D H D E L L V N E S A D L L Y H L T V L L Q Q E G L L H P			
UniRef90_F9ZPF3	E E A T E F V I I I I A A K N G E R E A I L A S E S A D L L Y H T L V L L W A E R N K G I S H P			
UniRef90_UPI00047985F4	E E A T E V V I I I I A A K N D G E P D K I V Y E V A D L W F H T M V L L A Q Q N L H D P			
UniRef90_Q67KI1	E E A T E V V V I I A V K N R D E R E N L L A F E V A D L W F H S L V A L V D Q G I S P			
UniRef90_UPI0003B5BFFE	E E A T E V V V I I M A A K D G E P D K I V Y E V A D L W F H T M V L L A Q Q N L H D P			
UniRef90_F9ZF43	E E A A E T I I M A S K D G N T D Q I I Y E T A D L W F H C L I L A F H E L S P			
UniRef90_R7TGY3	E E A T E T V I I I I A A K N T S K E D L I G E L G D Y Y V L M N A Y G L T V			
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UniRef90_I0I845	E E V I E V I I I I A A K D E G N E R V I Y E T A D L W F V Y H T L V L L F L N M R G L R W			
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UniRef90_UPI000463EBDF	E E A G E V W I I A A E Y E S D E E L S G E I S Q L L Y W L Q V M M I K R G L T P			
UniRef90_Y0KE59	E E A T E T V I I I I A A K D G Q R E A I V Y E T A D L W F H T L V M L A H H N Q P			
UniRef90_Q1H4R0	E E A T E T I I I I A A K D G D A E Q I V Y E T A D L W F H S L V M L A N A G L T P			
UniRef90_Q97KH6	E E T T E V I I I I A S K D D N K E D L I N E I C D V I Y H T L V L L N Y K N I K P			
UniRef90_D5MHZ5	E E A T E L V V I I A S K N G D S G E I V Y E A A D L W F H A L V L L G Y H A P			
UniRef90_I0AGR1	E E A T E V V I I I I A A K N K S R R E I I Y E S A D L I Y H W L V M L A D N E I N L P			
UniRef90_UPI00035F6791	E E A V E T T V I I A Y L A E T K E R V I I S E S A D L I Y H W L V M L A D S G I T L			
UniRef90_V4J5C9	E E A T E T V I I I I A A K D G D A Q I I H E V A D L W F H C L V L L S R Q G L H P			
UniRef90_R6G3E2	E E C T E V I I I I S C K D D D P D A I A S E V A D L I Y H T L V M V D R N S I			
UniRef90_UPI000349FE50	E E A A E V V M A C K D D D P D A I A S E V A D L I Y H T L V A M S Y H V N T V			
UniRef90_F4XAFL8	E E C T E V I I I I A A K D Q D H K E T V Y E I A D L I Y H W L V M L M V A S G I T L			
UniRef90_M2NDV7	E E A T E T V I I I I A A K N E N K E D L I G E I G D Y Y H V L V L L K S Q D L A L P			
UniRef90_F7P134	E E G V E T A L I A A T V G D R E E L K N E A A D L I Y H L L V L L R E Q N L P			
UniRef90_U4WPJ4	E E A A E V L L I A A K N R N Q D E L R Y E M A D L F Y H L L V L L R E Q N L P			
UniRef90_J8DRB1	E E C T E V I I I I A S K N N D K E E L V K M V D V F V Y H C F V L L F V L L H A C Y G V T			
UniRef90_U7PDR1	E E A F E V V I I I I A A M K N Q D E E L A N E T A D V Y L H L F V L L L H A C Y G V T			
UniRef90_Q31LP4	E E A A E V V M A C K D D D A D G L A G E A A D L F F H T L V A L A Q H N V D L			
UniRef90_H9UMN9	E E A V E L L I L A R N N P E M I A E S A D L I Y H L L V L L A E R D I P L			
UniRef90_B1X3F5	E E S V F V M A C K D K N N D I L I G E A A D L I F H I Q V A L A H H Q V K W			
UniRef90_UPI000255C1F6	E E T S E V I I I I A A K N G V K D E T V G E I I A D L I F H T L V M M A N E G I T P			
UniRef90_Q2JWX9	E E T S E V V M V I I A A K N G V K D E T V G E I I A D L I F H T L V M M A N E G I T P			
UniRef90_R6RF27	E E A T E V V I I I I G A M K E D R Q E T V Y E I A D L I Y H T L V L L M A E M G I D L			
UniRef90_C9A5E5	E E C T E V I I I I A S K E D N E V F L F N E A A D L I Y H T L V L L M A E R G V D I			
UniRef90_L8JXPX3	E E A V E L L I L A E K D D D A G L A R E V A D L W Y H C L V A L A H H Q G V D I			
UniRef90_C7H028	E E S S E V I I I I A A M N D D K G E V I Y E S A D L I F H T L V L L H M M V L L I E Q G V S L			

UniRef90_UPI000472CE1F	Q E V E Q E L
UniRef90_Q11SL9	D D V I Q V L
UniRef90_UPI00036ABF27	E L V L A E L
UniRef90_E3G187	D D L F V E L
UniRef90_B9MJR2	T D I L K S L
UniRef90_W4QIX8	D E V L R V L
UniRef90_A5GUG3	R Q V L E V L
UniRef90_UPI0002894B3A	Y D V L G V L
UniRef90_I8TCV7	Q Q V A D E L
UniRef90_K2A8G6	E S I L N E L
UniRef90_W0EZ90	N D V L E V L
UniRef90_R5QR09	E D I Q N K L
UniRef90_Q5WDI3	D K V L E T L
UniRef90_I3D6C3	S E V N A K L
UniRef90_I2GRY5	D D I T A V L
UniRef90_UPI0003B7012F	Q D V W N T L
UniRef90_D5WRB5	E D V W Q E L
UniRef90_UPI0003B4EC7C	D D V R A E L
UniRef90_R5JF18	D D I T K E L
UniRef90_E8PME5	E D L A R T L
UniRef90_G1Y349	D D I Y A V L
UniRef90_A9WEK7	E A V W A E L
UniRef90_D4KAY2	E D V T R E L
UniRef90_W0JFC9	D A I L E E L
UniRef90_D5WYF4	Q Q V L A E L
UniRef90_W4VF96	E N V K Q E L
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UniRef90_M1VMN6	N Q I A A E L
UniRef90_R5PNM8	N D V I R E L
UniRef90_A0A037Z2M7	E D I K N E L
UniRef90_E4RKM4	E Q I R K E L
UniRef90_Q7TUC7	R D V L N V L
UniRef90_Q82WM7	E D I L R E L
UniRef90_C4LF15	A D V V Q C L
UniRef90_R5EV97	E D L V R E L
UniRef90_G0A5R4	E Q V I N E L
UniRef90_UPI00041288CD	D D V L Q R L
UniRef90_Q2VYJ1	A K V W A E L
UniRef90_Q3A138	E R I Y A E L
UniRef90_E7S0Y4	Q D V L A E L
UniRef90_UPI000478C186	N K I L S E L
UniRef90_I4A788	K D I A Q E L
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UniRef90_D0IBL9	E D V V N K L
UniRef90_D1C4Y5	E R V W A V L
UniRef90_G7M297	E E I S E E L
UniRef90_B7K5G8	K D V Y R K L
UniRef90_Q8FTD4	E D V Y K N L
UniRef90_A9B1U1	E D V W
UniRef90_UPI0003A7EDCF	
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UniRef90_H2FVX0	A D V M A K L
UniRef90_F9ZPF3	D D V L D R L
UniRef90_UPI00047985F4	E E V W N K L
UniRef90_Q67KI1	A D V A D Q L
UniRef90_UPI0003B5BFFE	D A V L D E L
UniRef90_F9ZF43	D D V L K E L
UniRef90_R7GJY3	D D V L D K L
UniRef90_UPI000379A769	D D V L N E L
UniRef90_I0I845	E D V E A E L
UniRef90_X2H141	Q D V I G I L
UniRef90_D8DY88	E D V A A E L
UniRef90_F5RDS1	E D V L H E L
UniRef90_UPI000463EBDF	A D V Y R H L
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UniRef90_Q1H4R0	Q D V L R E L
UniRef90_Q97KH6	
UniRef90_D5MHZ5	S E V A R E L
UniRef90_I0AGR1	T D I V D E L
UniRef90_UPI00035F6791	D D V M E E L
UniRef90_V4J5C9	D A V L T E L
UniRef90_R6G3E2	K E I E E E L
UniRef90_UPI000349FE50	Q S V Y E K L
UniRef90_F4XAF8	D E I K A E L
UniRef90_M2NDV7	K D I E K L L
UniRef90_F7P134	H D V L E V L
UniRef90_U4WPJ4	E Q V L L E L
UniRef90_J8DBR1	E D V L Q E L
UniRef90_U7PDR1	D D V K Q V L
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UniRef90_UPI000255C1F6	D R V L R V L
UniRef90_Q2JWX9	R D V Y R Q L
UniRef90_R6RF27	D D V D E E L
UniRef90_C9A5E5	A A I R Q E L
UniRef90_L8JPX3	N D V V K V L
UniRef90_C7H028	A E I T E E L

	1	10	20	30	40
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UniRef90_UPI000288C691	K I I E E L	Y A T I V D	R K S N P S E N S Y T N Y L	F E K G L D K I	
UniRef90_B9CWX3	F S K L	E R T F A	N P S E N S Y T A K L	Y A K G T K K L	
UniRef90_D5V4V8	V L D N L	F H V I	Q D R K N D D P K K S Y T S K L	L N G K E N S M L	
UniRef90_R7PDJ7		[Q D F I]	D R K Q K M P E D T Y T T Y L	F K D G I N R I	
UniRef90_R9C080	Q I L A N L	E E K I I	I N D R K Q K M P E D T Y T T Y L	A Q K V	
UniRef90_K0C914	N I L K R L	E T I L	D P E S Y T A S Y V A S L	F E K G L V D K I	
UniRef90_UPI000375E93E	T L L E R V	Y T T V	A E R L A T L P E N S Y V A R L	H A G G L D R I	
UniRef90_D7UX98	M K M L	T K L	Y A E I E Q R K N E P K E G S Y T T Y L	F E K G L D K I	
UniRef90_UPI00036C50B9		L E K V I	Q N R R D N P N D E S Y T T S L	L N K V	
UniRef90_C6WSY7	D V L T R	L S E L L	P K E A D P A S S Y V A K L	Y A K G M D S I	
UniRef90_M7NGQ5	L L S L E A M I	R D R Q A	D A D E G S Y T N Y L	L G K G L D K I	
UniRef90_D4J841	M T V F D D V	M A T I	L E R K E N P K E G S Y T N Y L	F D Q G I D K I	
UniRef90_UPI0003B6628A	R I I L E E L	A E V L E	E K R K H A D P E T S Y V A S L	Y A K G M D G I	
UniRef90_UPI00021973D5	M Q N L D E L	Y N L V K	E R D I N R P E D T Y T T Y L	F S E G L L D K I	
UniRef90_UPI00020D9B48	Q T L S E L	Y D L V R S R	K E N P L E G S Y T D Y L	F N K G L D K I	
UniRef90_A6LT24	E N I K A L	Y E T I L	K R K T E G E E G S Y T K Y L	F E K G T N K I	
UniRef90_R7GB42	I D I L Q E I	Y N Q I I	D R S V N P K E N S Y T N Y L	L D E G I D K I	
UniRef90_S8GR10		L K A L Q	Q D L V D E R R K A M P E E S S Y V A S L	F R R S G I N K I	
UniRef90_I1YJM7	I L D E L	Y H V L	Q Q R K Q A D A S Q S Y V A S L	Y A K G M D G I	
UniRef90_15BV30		I D T L R A V I	A A R K T A S P E S S S Y T T S L	F H K G G L N K I	
UniRef90_E8ZNS9	N V I D S L	F N I I	E D R K D K P I E G S Y T G Y L	F E K G G L D K I	
UniRef90_E5APV6	D V L L R	A A T I	D G R K G D P E A S S Y V A R L	F H K G G D D A I	
UniRef90_A9BEK3	E V F K V I	T K R T S N	P E E G S Y T N S L	L K A G D N G I	
UniRef90_UPI0004630D16	D K L Y H T L	D R K N A S P K T S Y V A S L	Y K K G E N T I		
UniRef90_19L3L9	L D T L A R L	E T T I A	A A R R A A D P E S S S Y V A R L	N A K G I A K I	
UniRef90_L7WA39	T I N D E K T I	H Q R I D	D Q V E G S Y T T H	I Q K G I N K V	
UniRef90_UPI000476357C	V L S D L A D L I	A V R R T M P E G S Y T T H	F S K G S G K I R K K I		
UniRef90_L0DRZ8	Q N L E E L Y N L V	K Q R K E N P I	D G S S Y T D Y L	F K K G G L D K I	
UniRef90_H3RP11	Q N L E E L Y N L V	K Q R K E N P I	F K K G G L D K I		
UniRef90_UPI00047881FA	F T E L E D T I	K E R K S A D D S K S Y V A S L	F K K G G I N K I		
UniRef90_TONFD1		Q V Q V I S S D R I	D N N I E S S Y T N Q L	Y K R G G L N K V	
UniRef90_A4BP68	V D T F E R L A Q I I	E R R K G A D P T T S Y V A H	Y C K G G D H		
UniRef90_S1NB28	T I S E L Y E L V L S	R K N I P Q E K S Y T S Y L	F A K G N E K I		
UniRef90_B5IQD9	D V C T E L M R V I	E G R R D P R E P E G S Y T N K L	L E G G A N R I		
UniRef90_A6E6Z4	E E Q I I A D R Y E N P V	E G R R D P R E P E G S Y V N K L	R S K G I N K I		
UniRef90_W6RX54	N V I N D L Y E V V	K D R L D N P V	V E N S Y T N Y L	F N K G T D K I	
UniRef90_R5M502	L N F L N E L V D I I	E T R Y K E M P D G S S Y T T S L	F K D G G L N R M A Q K		
UniRef90_F4LW77	L N F L N E L V D I I	D S R F E E K P E G S Y V A K L	Y N G G R E R I L K K I		
UniRef90_I2FJ02	I L D E L Y H I	E Q K K H E N P K T S Y S A S L	F A K G A N G I		
UniRef90_G4L023	E E G L Y E L I	K G R K T E P K E D S Y T T Y L	C K K I		
UniRef90_L0HDH5	K V L A E L W E I I	C D R A D H P K E G S Y T T R L	D K K I		
UniRef90_R7CRK8	L S I L H A L S E E	K D R K K N P Q P K S Y T N Y L	L A E G G S D K I		
UniRef90_D0KW13	E L L A Q L A A V I	E Q R K Q A D P G S S Y V A Q L	F A K G R S K I A Q K		
UniRef90_UPI00035C48C7	D I M E A L Y N I I	Q E R K Q A D G E K S S Y V K S L	F D K G L D K I		
UniRef90_A0A023CZV6	M Q D L E E L Y Q L V L	E R K N N P K K G S Y T D Y L	Y T K G L D K I		
UniRef90_I3CEK9	L D R L A A V L V	N R Q Q A D P Q S S Y V A S L	Y A K G L D A I		
UniRef90_U5T4P2	E I L R R L D A V L A D R R Q A D P Q S S Y V A G L	H A G G I D R I L R K I			
UniRef90_W7DM12	D I L N Q L Y Q V I L S R K D A D P N T S Y S A K L	L A K G S K K T A E E K			
UniRef90_W9DRK5	L S I F N E L Y D L I K D R K E N P S E N S Y V C S L	F E K G K E K I L L K K I			
UniRef90_P26722	V L D R L Y A T V Q A R K G A D P E T S Y T A K L	F H R G T A K I A Q K			
UniRef90_UPI0004099F31	N T L S G L F D V I C	D R R D Y P Q L E S S Y T C	L A G G D N K I L K K I		
UniRef90_F2NPD1	E V L E R V Y R Q I L	E R F A Q Q P E G S Y V A R L	H R E G L D R I L K K I		
UniRef90_E6QS23	E V L Q R Q L A D S L	E A R R H A S P E T S Y V A S L	Y H K G L D G I L K K I		
UniRef90_S0JT7B	S L T Q L Y N L I	Q E R K D T P K E G S Y T S Y L	F E K G K E K I L L K K I		
UniRef90_D9VDB0	V K T F D E L F A E L	A E R A R T R P D G S G T V A	A Q G K V		
UniRef90_UPI0002E21206	V I D T L Y H T I	Q E R K S A D T S S S W T A A L I	S K G D N A I L K K I		
UniRef90_T0JML9	G E L D A L I A T R R E R E R P Q G S S Y T T A L	F D K G V R S I A Q K			
UniRef90_A0A021W9G5	D T L S Q V Y N I V C	Q R R D F P Q L Q S Y T S S L	F T A G D N K I L K K I		
UniRef90_Q8DM88	R I L L D R L S A V I	R S R R G A D P A S S Y T A K L	L A R G R P K I A Q K		
UniRef90_UPI00041E4589	D V L K S L Y E T I	R Q R K E N P I L E S S Y T N Y L	F E E G D K I L K K I		
UniRef90_C2W5T1	D V L K S L Y E T I	R Q R K E N P I L E S S Y T N Y L	F T K G E D K I L K K I		
UniRef90_UPI000255E307	H E L D E V E T R A Q E R P E G S Y T T S L	F E G G G V R R I A Q K			
UniRef90_Q7MAQ8	V V D R L Y H E L L A R Q G A D P Q S S Y T A K L	F S K G E N T I G K K I			
UniRef90_UPI00047A2ADD	E V I N E L Y Q T I I	E R K K I P L E G S Y T N Y L	F E K G L D K I L K K I		
UniRef90_X2H9R8	R V L T E L A D V L L D S R R E A S P P Q T S Y V S Q L	L H A G E D K I L K K I			
UniRef90_Q7NLB5	D T L S Q V F R V V E E R K A H P H P D S Y T S R L	E A G S N K I L K K I			
UniRef90_C4Z9Z2	L T V L E S V Y A V I V D R M K N P K E D S Y T N A V	M E K G I D E I L K K I			
UniRef90_E8T2B8	E V L S K L Y Q V V K Q R K E E M P E N S Y T A E L	F R R G E D R I L Q K			
UniRef90_FORQ07	L E M L G R L E R T V Q G R R D A D P Q A S Y T A R L	L Q G E P R R A A Q K			
UniRef90_UPI000368475F	R I L L F R L A E V L E A T R K Q S D P H A S Y V A G L	Y A R G E D Q I L K K I			
UniRef90_Q2YAV2	D I L F R L A E T I E A R K Q S D P H A S Y V A G L	L H D G R D K I L K K I			
UniRef90_A6ESM3	L Y E L E Q T I A K R V I E G D E S S Y T V S L	F K R G M N K I I Q K F			
UniRef90_UPI00034A499A	L L A E L E Q I I V A R K D S D P Q S S Y T A S L	F A K E S R S C Q K			
UniRef90_E0SRC1	V I D E L Y S V I L D R I A R R P P B N S Y T V S L	I E K G R E Y I A R K			
UniRef90_A0KWA9	A E L L N N L A E L I A S R K G Q N P E S S Y T A S L	F A R G T K R I A Q K			
UniRef90_U5F7L3	M K E L D V L Y E T I K E R K A H G E E G S Y T S Y L	F N K G T E K I L K K I			
UniRef90_W5WY24	L K N F E S L F K E L A T K A E Q R P E G G S T V	D R G V H F L G K K I			
UniRef90_UPI0003620D83	D V F A Q L T A V I E A R R A M A A E D S Y V A S L	F H K G Q D K I L E K			
UniRef90_A0LCF5	V D I L E Q Y Q V I Q Q R K S A P P E A S Y V A K L	F H K G D D A I L K K I			
UniRef90_UPI00016BDFDF8	L Y D I L L D R K T T K K E G S Y T T Y L	F D K G K E K I L K K I			
UniRef90_F0EXP9	F A Q L E Q H L A E K K N A D P A S S Y T A T L	H S K G I K K I A Q K			
UniRef90_UPI000378D97E	T I L D E L Y K V V L S R K G D D A S Q S H T A N L	F S K G I H K I S Q K			
UniRef90_UPI00037665A	D V L S Q L F A T I E S R K G D P K A S Y I A S S L	F Y A K G V D G I A K K			
UniRef90_E4RX30	I R Y L R E I H D R K Q H P S D S S Y T A S L	F A K G I N K V A Q K			
UniRef90_UPI000470714B	T I I Q Q V A K Q I Q N R K S N P K E G A Y T T Y L	F R E G I D K I L K K I			
UniRef90_B5QQW9	Q S I T E L Y D I Q S R K S Q P V S G S Y T D Y L	F T K G L D K I L K K I			
UniRef90_W7CQ40	M E A L E R L M T E I N Q R K I T P K T G S Y T N Y L	F D K G Q D K I L K K I			
UniRef90_L1NK06	L E D F I E K R H E M P E G S Y T T S L	F K D G G L N R I A Q K			
UniRef90_R7G8U6	M N E L A V L Y D T I L Q R K A N P E A G S Y T T Y L	F E K G L E K I L K K I			

	50	60	70	80
UniRef90_C7RN96	E E T A E L I M A G K E G N R [H] V	V W E S A D V L Y H T M V L L A F Y G L S I		
UniRef90_D1PV67	E E A V E T I I E A V K G N N D S L V	Y E A S D M I Y H L M V L L T S K G L L H I L		
UniRef90_UPI000288C691	E E S T E T I I A A K N N D P K E L V	M E T C D L V Y H L L V L L A N Q D I D L		
UniRef90_B9CWX3	E E G V E T A L A A M A K D R E E L V	S E A A D L V Y H L T L H N E N L A W		
UniRef90_D5V4V8	E E A G E F T F A V K D D N S E E M I	Y E A A D L V Y H T M V A A S K D I S P		
UniRef90_R7PDJ7	E E A L E T V I E A V N G T N E R L	V Y E G A D L L Y H L I V L L A E K K N L R I		
UniRef90_R9C080	E E A A E V I I A A K N R D V E L K	W E A S D L I Y H L F V L L R E Q K L P F		
UniRef90_K0C914	E E A T E T V I A A K S G D K T Q I	I Y E T A D L W F H S L V L L A Q Q D L S A P		
UniRef90_UPI000375E93E	E E A G E V L L A A K N G D R A E L	A L A T E A A D L F F H T L F A M A E L G V S P L		
UniRef90_D7UX98	E E T T E V V I A A K N K E N Q E L	I S E T A D L T Y H L L V L L V E K G I P L		
UniRef90_UPI00036C50B9	E E A V E L V I E A K G D D D K N L	F L I N E A A D L W F H Y L V L L A A K G Y T W		
UniRef90_C6WSY7	E E A T E T V I A A K G G G D R E E	L K N E T A D L L Y H L F V L L M A K A D L K P		
UniRef90_M7NGQ5	E E S F E V V I A A M K R D R E E	L E I I Y E T A D L W F H T M I M L A K A D L K P		
UniRef90_D4J841	E E A A E L I I I A A K N P D S D E	V K Y E [C] D F L Y H M M V L M A E R E E V S W		
UniRef90_UPI0003B6628A	E E A T E T V I A A K G K E N R E Q	Q L I Y E T A D L W F H T L V L L A H Q G G L G P		
UniRef90_UPI00021973D5	E E S T E V I V A A K N P G K K E L	V L Y E S A D L D L Y H L C V L W A Q Q G V T F		
UniRef90_UPI00020D9B48	E E N T E V I I G A K N T N D E L	E L I F T A D Y L Y H L M V L M L V A K D I P L		
UniRef90_A6LT24	E E C T E V I I S C K E N N K E E	Q I N E I C D L T Y H L L V L L M A Q M N I S I L		
UniRef90_R7GB42	E E A T E T V I A A K N P N K E E	L V G E I S D L T Y H T L V L M F K T N V S L		
UniRef90_S8GR10	E E A V E T V V E A C N G T D E R	R L V Y E G A D L L Y H L V V L L A S K G L R I		
UniRef90_I1YJM7	E E A T E T V I A A K N D D N K E L	G F L I N E A A D L W F H Y L V L L E A K E Y S L		
UniRef90_15BV30	E E A V E I V I E A K G D D D K E L	F Q I I Y E T A D L W F H S M V L L A H N D E L		
UniRef90_E8ZNS9	E E S S E V I I A A K N E D K E E	L I K E I C D L T Y H I M V L M A E K Q I K L		
UniRef90_E5APV6	E E A T E T V V M A A K D A R H G G	L G L V N E V A D L W F H C L I M L S H Y G P		
UniRef90_A9BEK3	E E S A E F V M A C K D D N A P N	T I A N E A A D L F F H L Q V A L A A Y H E V D W		
UniRef90_UPI0004630D16	E E A G E F C A I K D D K K D E I	I I Y E A A D L A F H A L V A L A Y K N I H P		
UniRef90_19L3L9	E E A T E T V I A A I S S E D E S	L V G E A A D L V F H L M V L L A A R D V P L		
UniRef90_L7WA39	E E A V E T V I D A I N G R E E D	F I Y E A G D L M Y H Y L V L L K A K G Y S L		
UniRef90_UPI000476357C	E E A V E L I I A A K N P D R D A L	V S E M A D L W F H T L V L L E Q E G I R L		
UniRef90_L0DRZ8	E E A T E T V I A A K N S D P A E L	V Q Y E T A D L L Y H L I V L L V E C D L P F		
UniRef90_H3RP11	E E T T E T V I V A A K N S D P A E L	Q L Y E T A D L L Y H L I V L L V E C D L P F		
UniRef90_UPI00047881FA	E E A V E T V I E A M D D N D E L	F L Y E S A D L L F H Y L M L L Q A K G F T L		
UniRef90_TONFD1	E E A V E V V I E A K D D N D D L	F K N E S A D L L Y H L I L L K A K G F T L		
UniRef90_A4BP68	E E A F E T V L A A K S G E R E	Q I I H E T A D L W F H T L V M L A H S N L H P		
UniRef90_S1NB28	E E A T E V V I G A M K N S Q E E	T T Y E I A D L I Y H L L V L M A N N D I T P		
UniRef90_B5IQD9	E E S A E F V M A C K D D Q A D	I A G E A A D L V F H H Q V A L A H H G V S W		
UniRef90_A6E6Z4	E E G V E T V I I A A L N E T D	E F I G E S S D L L I Y H L L V L L R E K G K T L		
UniRef90_W6RX54	E E C T E V I I A A K G D S K E D	M V A E I C D L L Y H L E V L M V D R G I E I I		
UniRef90_R5M502	E E A L E T V I E A V N G T D E R	R L I Y E A S D M F Y H L I V V L L T S K N L R I		
UniRef90_F4LW77	E E A A E V V I A S M S Q D K D A	T I Y E S A D L F F H M L I A L R Y D G I T I		
UniRef90_I2FJ02	E E A G E L C A I K D R Q E S E	I I Y E E C A D L L Y H I L V G L A L E H I N P		
UniRef90_G4L023	E E S T E V I V I A A A K G D K E	T V F E I A D V C Y H I L V L M V Q M G I S V		
UniRef90_L0HDH5	E E S T E F I L A V K N G V P	E R T A S E A A D L F F H V L V A L R A S G V S L		
UniRef90_R7CRK8	E E A S E V I I A D Q H K D K K E	I T S E S C D L L Y H L F V L W E N A G I D L		
UniRef90_D0KW13	E E G V E V A L A A V S G D N V	A I I V S E M A D L W F H S M V L L A D A G L S H		
UniRef90_UPI00035C48C7	E E A T E T A V A V G K G G I	K Q E E I I Y E V A D L F F H V L V L L G Y Y D P P		
UniRef90_A0A023CZV6	E E S T E V I V A A K N P D R N E	L L I Y E T A D L L Y H L M V L L V E Q K K S Y		
UniRef90_I3CEK9	E E A T E T V I A A K N A D S A Q	L I Y E I A D L W F H T L V A L A Y H D V E L		
UniRef90_U5T4P2	E E C T E T V I T V V A S K N G E	R D A I V S E T A D L W F H S L V M L S H H G L D S P		
UniRef90_W7DM12	E E A A I E C L I E C A T G N Q K E	E L I T E S A D V L V L Y H L L V M W V S A G V S P		
UniRef90_W9DRK5	E E S I V E T I L A V K S E N K E	E I I Y E S S D D L L F H L M V M F V A K G I T L		
UniRef90_P26722	E E A V E T V E A V R G D K A A	M A S E S A D L L Y H L M V L W A D A G L E P		
UniRef90_UPI0004099F31	E E S A E V V M A C K D N E K D A I	G A M E V A D L F L Y H T L V A L A Y H D V E L		
UniRef90_F2NPD1	E E A G E V I I A A K N A D A E K	D E L A W E A A D L V F H L L V L V L A E A G L A P		
UniRef90_E6QS23	E E A A E T I M A A K D G D K Q K I	V Y E T A D L W F H T L V L L A D Q G I R P		
UniRef90_S0JT7B	E E S T E V V G A M K E D R E E	T V Y E V A D L A Y H V L V L V M N E M N I S V		
UniRef90_D9VDB0	E E A G E V W I A A E H E S D E R	L R L S E E I S Q L Y H V Q V A L R A R G L G L		
UniRef90_UPI0002E21206	E E G V E T A L I A A V A Q D D A	H A L C G E A A D L L F H L Q V L L R A R G L S L		
UniRef90_T0JML9	E E A G E F C I A A Y K D D D E	H E V I Y E A A D L T Y H M L V A L G V K N I S P		
UniRef90_A0A021W9G5	E E G V E T A L A A V A Q D D A	H A L C G E A A D L L F H L Q V L L R A R G L S L		
UniRef90_Q8DM88	E E T A T V V M A C K D D D P E A I	A S E V A D L F Y H T L V L V A L A Y H R V S S L		
UniRef90_UPI00041E4589	E E A V E T V I A A E M R G D A D A	L A A E S A D L L Y H L L V L W A D A G V A P		
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UniRef90_UPI000468C1D5	E E A G E F S F A V K D N D E K E I I Y E A A D L A F H T L V A L A Y K N V N P
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UniRef90_W0DXK3	E E A I I E T V M A A K D G D K E H L I Y E V T D L W F H T L L L A H Q D L T S
UniRef90_Q5FA47	E E A G E V L M A S K D K D P S H V Y E V A D L W F H T M I L L T H H D L K A P
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UniRef90_E6UBH5	E E A A A E T I I I A A K N G D N A E L M N E I N D L L Y H V M V L A V N Q G L D W
UniRef90_R5ZYJ8	E E C T E S I I I E A V D G N R E R F I Y E A G D L M Y H Y L V M L E Q M G V T L
UniRef90_Q28NJ9	E E A V E A I I I E A V K G D R D A L T S E A A D A L Y H L L V M C A A R D V S L
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UniRef90_F1YGN8	E E A G E V W L I A A E H E S D E S L S E E I S Q L Y H L Q V W L Q V M M I K R G L T P
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UniRef90_A4ARL3	E E A V E V V I I I E A K D N D E D L F L I N E S A D L L F H Y L I I L L Q A K G Y E L
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UniRef90_B6YR97	E E A V E T V V I I E A T N G T S E G L M Y E A S D L L V Y H L I I V L L I S K G L R I
UniRef90_Q21U89	E E A T E V V M A A K D G D K T K V V Y E V A D L W F H C M I A L A H Y G L S P
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UniRef90_B8KUS0	E E A T E V I I I A A K D G T K E A L T E E V A D L W F H S L V M L S H L G L S H
UniRef90_G0HDB4	E E A G E V W L I A A E Y Q S D D E E L S E E I S Q L I Y W L Q V I M V K R G L T P
UniRef90_C8WUY1	E E A V E V A L A G V K A E R D E V A S E S A D L L Y H L L V L W R H V G V Q P
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UniRef90_R8AP10	R D V I R R L	
UniRef90_W6EM05	S L I S K E L	
UniRef90_W3AE92	D Q V V D V L	
UniRef90_UPI0003B4EF80	S C I I R R L	
UniRef90_C7BR13	A D V V E E L	
UniRef90_UPI0003672F1E	D L I K Q E L	
UniRef90_UPI000468C1D5	Q D V V K I L	
UniRef90_E4TVB9	D D V L N E L	
UniRef90_UPI00037FE22D	E D V L K E L	
UniRef90_W0DXK3	E D V L D E L	
UniRef90_Q5FA47	A E V W A E L	
UniRef90_UPI000225FE92	A D V E K V L	
UniRef90_E6UBH5	D E V E H E L	
UniRef90_R5ZYJ8	S D I E A E L	
UniRef90_Q28NJ9	A Q V R A V L	
UniRef90_UPI000479C3DA	Q D V L N E L	
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UniRef90_D5C484	E Q V L N E L	
UniRef90_S2WRH9	E D I Y R K L	
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UniRef90_A0AG13	S S V Q A E L	
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UniRef90_F6GHU4	N D V V N V L	
UniRef90_D5E880	D E I S A E M	
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UniRef90_A8ER32	D R V K Q E L	
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UniRef90_F4B0J5	R D V E K T L	
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UniRef90_Q46WM0	A D V V N E L	
UniRef90_Q5QWQ4	D D V L E V L	
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UniRef90_UPI000409B322	D D V R A E L	
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UniRef90_S3P2M0	V E	L D Y L	G K M M S E R	K Q A N P D S S Y	G L N K I L E K V
UniRef90_N6W610	D V L	G A L	T D V L E	A R K A D P D S S Y	N K I L E K V
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UniRef90_A9WR64	V K S F E	D L	F A E L G	E K A V Q R P E G S K	T V A E L D S G L H G I G K K I V
UniRef90_D7EB98	L S V	L N E I	Y D V I Q	D R K H N P V E K S Y	V C S L L N K G I D K I L E K I V
UniRef90_G2E9E4	L	T E L	E T I I T	Q R K N D A S D D S Y	V A S L F K E G M N K I L A Q K V
UniRef90_A3T1J3	T L	D D L	F V T I Q	S R K T A D P S S S W	T A Q L L A K G P E K C A E K F G G
UniRef90_V2T31	V E I L	D Y L	G Q M M V E	R Q K A D P D S S Y	V A K L Y H G L N K I L E K I V
UniRef90_A7GMV2	K V L	K S L	F E T I E	N R K Q S P L Q G S Y	T N Y L T K G A D K I L K K I V
UniRef90_UPI0002E41D31	M T R F E	D L	F A Q L Q	E R A A T R P E G S G T	V A E L D R G V H F I G K K I L V
UniRef90_D0LRT4	V S V L	P K L	E G V I I A	R R D S A D E K S Y	T K S L L E R G F P K I L A K I V
UniRef90_UPI0003B66544	D V F	A E L	S R V L A	E R K T A S P D S S Y	V A S L Y H G L N K I L E K I V
UniRef90_X1WZG4	T L E S L	E T T I Q	E S V D S N N P	P K Q S Y T N Y L	N K G D K I S K K Y G
UniRef90_A5CXC6	E I L I K L	E Q I I L	E Q R K S A K A	D K S Y V S S L Y N K G	T D E I L K K I I S
UniRef90_R7AE87	T M K G L	A E V I H	H D R R E A S P	E T A R L L T G P E D K L L K K V	E K V A G
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T	I	E																																			

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UniRef90_D4YQG9	E E A A E V W M A A E H E T V E F T A E A S Q L Y H L Q V M M L A K G V R P			
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UniRef90_V2QGX5	E E N A E F I K A F L T E P P Y E T A A E A A D Y I Y H L M V A L R F K G I D W			
UniRef90_C8Q0U1	E E A T E A I I I A A K D I N V K D L V Y E I A D V W F H T M V T L A A W F N I P			
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UniRef90_G8Y7A3	E E L D E L I I E A G T N K D K N E V A W E C A D L F Y F A M V W C V K H G V S L			
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UniRef90_B6K2D2	E E A A E L [C] D A A A T K D E V T W E M A D L F Y F A M T R C V A A G V S L			
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UniRef90_UPI000370E646	D D V E K I L
UniRef90_UPI0003757426	G D V Y R H L
UniRef90_Q2J339	D E V E A A L
UniRef90_Q6A7U7	D D V Y K H L
UniRef90_F6BEP4	D E L M A E
UniRef90_E1Z907	E D V S K V L
UniRef90_D3DFP3	S Q V L E E L
UniRef90_H0A0F4	D E V W Q E L
UniRef90_V4R266	D D V Y A E L
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UniRef90_UPI00037E0BA3	E D I T N E L
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UniRef90_A3UC64	S D V V G V L
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UniRef90_UPI00029A244A	Q D I A K N L
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UniRef90_UPI00041C06FF	K D V V K V L
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UniRef90_E1RDR3	S D V M S E L
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UniRef90_T0MBP5	S D I M N E L
UniRef90_K6VIK4	Q L V L N E L
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UniRef90_UPI0004206C1F	S A V M A E L
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UniRef90_B8M2Z5	E D I E K N L
UniRef90_F4BA32	E E L Y A E L
UniRef90_U7LZJ6	E D I Y K Y L
UniRef90_S3B7T6	D D V Y A H L
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UniRef90_C5WDB4	N A I I N N L
UniRef90_UPI0003B480C9	R D V I N E L
UniRef90_UPI0003B5FF6C	E D V Y R N L
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UniRef90_D7CUB7	H D V A A V L
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UniRef90_UPI00044140F3	A D I E R S L
UniRef90_K2EY62	S D I E K E L
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UniRef90_D4YQG9	E D V Y K Q L
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UniRef90_U1YLJ3	D E V L Q E L
UniRef90_G4R7S9	S E V S E E L
UniRef90_A4RVN0	S D V L A V L
UniRef90_D0J908	H N V I N L L
UniRef90_U7JX56	D D V Y E Y L
UniRef90_W9Y2A4	E D I E K N L
UniRef90_V2QGX5	T D V L K E L
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UniRef90_UPI00046FAE43	N Q I L D E L
UniRef90_E1L445	E A I L E E L
UniRef90_G8Y7A3	A D I E K N L
UniRef90_Q8PUG2	E E I A D E L
UniRef90_J3C787	D E V L Q E L
UniRef90_E5A1T2	E H V E R N L
UniRef90_B6K2D2	E D L S R H L
UniRef90_A7FU84	
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UniRef90_UPI00046A2087	Q E V L D E L
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UniRef90_S8AAT4	L L G A L Q A T L	T S R F A S A P E G S Y T A R L	F K D P A L L	K A K I M	
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UniRef90_UP1000455F71A	V D G L S A L E R T L K A R Q Q N A P E G S Y T R R L	F D D P A L L	R A K K I K		
UniRef90_A3VXR6	T L D D L A R T I	A A R A S A D P E S S W T A K L	L A K G P E K C	A E K F	
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UniRef90_Q2FUB9	M D E I W A V I	E E R A A H P S E E S Y T S K I L	S K G I D K S	L E K I	
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UniRef90_G0W315	L L E L Q S I L L Q D R Q L D P T G S A T V	T A L F N D	E T L L I N A K K I		
UniRef90_K8E0T6	V L D E L Y R L I L S R K A E R P A D S Y T T Y L	F E K G I	D K I C K K V		
UniRef90_D7GEF0	K S F D Q L F D E L T K I A A E R P A G S G T V A K L	D E G V H A I	G K K V V		
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UniRef90_I6X549	M K S F E Q L F D Q L R E T A R T R P E G S S T V A R L E A G V H H I	G K K V V			
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UniRef90_U1Q7E3	V L D L S L F A T I I K Q R Q A E L P D D S Y T A S L F E K G E N E V L E	K F G			
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UniRef90_D5VRR4	I L N E V F E T I I K K R I E E R P E G S Y V A K L I E S G L N K I C E K	I			
UniRef90_J9ZFP0	D V W S E L Q A T V R E R K T G D P D I S Y T A S L L Q S	D V S V V L K K I S			
UniRef90_W4KDT1	V T G L P A L E A T L L R S R L L S A P E G S Y T R R L	F D D P Q L L R S K I			
UniRef90_I2FPW5	L L A K L E A T L L R D R K A S A P A G S Y T A R L	F S D P S L L G A K K L			
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UniRef90_S3K1W1	L L E R L E N I I I A E R F A H P T P G S S Y T A T L	D D K R V R E K I			
UniRef90_A5DE04	L L A K L D S T I I L S R K E S A P E G S S Y T K R L	F E D D K D K L L I A K L I			
UniRef90_J3PXX1	S S Q L Q S T I I L Q R R Q N A P Q G S S Y T H R L	F N D E K L L K K I M			
UniRef90_J9HCX0	R V L D T L W Q T I I D E R Y C L N R P Q G S Y T T Y L	F E H G A L R I G K K V			
UniRef90_K2VJ30	T L L D D L F R I I L E S R K D A D P A V S Y T A K L	L G D R K K I A K K L			
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UniRef90_Q2CDY7	S L A A L A E T I I A K R K G A D P D K S W T A R L	L A S P E M A A E K F G			
UniRef90_G5JK03	Q D L E V V T V A K S A K S D N Q H S Y T K Y L	L T E G I E K I T K K F G			
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UniRef90_D9QR23	D S V D R L L Y E A I V A A K G L D P H T S R T A R L	F Q R G Q A K M A Q K L			
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UniRef90_M5E4F8	L S G L A K L E S T L R E R K A S A P A G S S Y T A R L	F H D P A L L G A K I			
UniRef90_U1PR36	E T L T E L F A R I E D R R E T L P E D S Y T A S L F E K	G E D A I L E K L			
UniRef90_A6UTD9	M D I L K E E F E I I I K Q R I K D K P E G S S Y V A Y L	T T A D N K I C E K			
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UniRef90_Q1GQI3	E T L G R L E A V I I H D R A A G E D E R S Y T K R L	L R E G P Q R A A Q K V V			
UniRef90_UP100036F8973	M K N F D S L Y Q E L Q R E A Q A D P A E S A T A A A L S	G V H G I G K K V V			
UniRef90_Q5KHK8	L S G I A K L S D T L T S R I A S A P E G S S Y T K R L	F T D E K L L R K I M			
UniRef90_W0JZM7	D V L R E L F A V V E D R K E T L P E D S Y T A S L F E K	G E N A A L E K L			
UniRef90_L8X688	E T L E R T L Q Q R L Q T S P Q G S S Y T R R L F E D	P K L L R A K I M			
UniRef90_UP100047B76B4	E V L P D L V R V L V A D R R A N A P E G S S Y T A Q L	R A F A G G K V E			
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	50	60	70	80
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UniRef90_G2LNZ0	E E A I E T I L S A M K K D K N E L I N E S S D L I Y H L I V L L H N Q D L N L			
UniRef90_Q1R002	E E A T E T L L A A K D A T R Q A V V A E T A D L W F H S L V M L S H L D I D H			
UniRef90_S8AAT4	E E A E E L C E A K T K D D V A W E A A D L L Y F A F T K C V S A G V T L			
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UniRef90_UP10002558872	E A V L E E L
UniRef90_G2LNZ0	T T V I E N L
UniRef90_Q1R002	Q A V L D E L
UniRef90_S8AAT4	A D V E R N L
UniRef90_G8PM25	D E V L A K L
UniRef90_M2XQX4	Q A V Y E E L
UniRef90_UP1000455F71A	R D I E D S L
UniRef90_A3VXR6	S D V M V E L
UniRef90_UP10003F5BADC	E A V L N E L
UniRef90_Q2FUB9	Q S V W D E L
UniRef90_UP10003B68BCF	A D V Y K Y L
UniRef90_G0W315	S D V E N N L
UniRef90_K8E0T6	A A V Y Q E L
UniRef90_D7GEF0	E D V Y R H L
UniRef90_G8LS78	Q E I I N I L
UniRef90_Q11CK6	D E V M L E L
UniRef90_J3JFU6	D E L R D E L
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UniRef90_I3I6C7	D S V L N E L
UniRef90_A0A023RXH5	Q L I I D E L
UniRef90_Q6U8A9	Q D I I A N L
UniRef90_F2UAM5	D D V E R K L
UniRef90_U1Y0G9	D A V L Q E L
UniRef90_Q2CDY7	A D I E R E L
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UniRef90_A6TKT7	E A I Y Q E L
UniRef90_M0GUG5	D D L R E E L
UniRef90_Q1GEZ2	D D V L T V L
UniRef90_UP1000225FB28	I E V E H E L
UniRef90_UP100047715F6	D M V A D A L
UniRef90_M7X6U2	K D V Q Q V L
UniRef90_A5WHW8	D R I L A E L
UniRef90_Q2PYM1	T A V L Q E L
UniRef90_A8UV80	S E V M E E L
UniRef90_M1E849	D N I Y E E L
UniRef90_B1KRF8	A D I T D N L
UniRef90_B7GL44	D E V L S V L
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UniRef90_A6UTD9	
UniRef90_H0UQ55	N R V L K R L
UniRef90_Q1GQI3	D A I A A E L
UniRef90_UP100036F8973	D D V Y R Y L
UniRef90_Q5KHK8	R D V E A A L
UniRef90_W0JZM7	E D L L D E L
UniRef90_L8X688	A D I E A S L
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UniRef90_I4Y9C3	L S G L A A L E E T L V S R H Q S A P E G S Y T K R L F N D E T L L R S K I
UniRef90_A0A059G187	L E H L S G T I L D A R A L E G D A G S W T A R L L A K G P D A A A A K I V A G
UniRef90_A0Z8H4	D V L L A A L Q E T L L E A R K S D G A E N S Y V A S S L Y S Q G L N K I L E K V G
UniRef90_A0A022PQD4	L T T L Y S L E S T I T K R K E E S S E S S W T K R L L L D E K K L C S K I R
UniRef90_O67780	E V L L P R L Q D V I R E K I E R K E E E N S Y T A K L V S Q G K E R V F Q K F G
UniRef90_B1YL07	L L H E L E K T V K E K I A S Q D E A S Y T N Y L V K A G R E K I A K K F G G
UniRef90_L0EWV2	S L Y D L E R I V E Q S A N K D P E E S W T A S L I K G G K N K A Q K I
UniRef90_G8JMA0	Q G L F G L E Q L M K Q R L V K I A P S G S Y T K R L F D D Q E L L H A K I K
UniRef90_H0SLJ4	D S I E R L L Y R A I I L A A K D Q D P S R S R T A K L L Q Q G T G K M A K L A
UniRef90_G2LM11	V N F L F E L E N N I L I E N R K N K F S K N S Y T S S L Y Q S G T S R I A Q K V G
UniRef90_Q6UA38	E L E R I L K Y Y K K N N N S T S Y T S S L Y K K G I N K I S Q K V G
UniRef90_S9PG19	L L V I A L D R T I S A R A K A K P E P S Y T R R L L D D R N L R L K K I
UniRef90_A0RMS1	D I L D H L Y H I A L D R K L N R S E N S Y I S K L Y Q K G E N S Y L K K I
UniRef90_UP100037AF483	K S Y T A S S L L A K G P A A C A Q K L L G
UniRef90_Q18KL7	T V F D D L F S V I E S R R E T L P D S Y T A S L F A K G E N A A L E K L
UniRef90_R5PSA0	N F L R E L E V V L L E S R R G A S P E E S Y T A R L Y A A G T K R I A Q K V G
UniRef90_UP10001851356	I L S T L Q N V I K S R E E T T M P E G A Y T T Y L F E K G V D K I L K K V
UniRef90_UP100036441BF	L S A L T H L A E T I I D D R A N S G N D P S Y T E K L L S A G P H K C A K K I
UniRef90_G9P9U5	L S G I A R L E Q T L L K S R K E S A P P G S Y T A R L F S D E K L L R K I
UniRef90_UP100032AA88A	L T S L Y A L E S T I S Q R K A E L A E E S W T K R L L N D K L L C S K I R
UniRef90_D3UJ85	I L D T L Y H I L L E R K F S S S S T S Y T A S L Y Q K G I N T I C K K I
UniRef90_G0VAT9	L L E E L Q K V L S Q R L V D A E V G S Y T K R L F N D D E L L N A K I K
UniRef90_S8EFG9	L R G L E K T L Q A R L A S A P E G S Y T L R L F N D P A L L R A K I I M
UniRef90_W1Q126	T T L Y S L E S T I Y E R K D N L G A N S W T K R L L Q D E K L L C S K I R
UniRef90_A2ST94	K V F D E L W Q V I C E R A A S E S E K S Y V R H L L E K G D K S L E K V
UniRef90_Q8UJ91	S L S D L E R I V A K R A A A S P D E S W T A K L V A A G Q E R A A K K L
UniRef90_G8N9C3	V L G Q V Y A T I Q E R R L T P E G S Y V A K L H Q G G L D R I L K K I
UniRef90_A5E3Y9	K G L V V K D K T L S E R F D A A P E R S Y T K R L F Q D E N L L I A K L
UniRef90_H2ATI9	L V E L E K T T L L N R L S N A V E G S Y T R R L F S D D E E L L N A K I K
UniRef90_U4LIL8	I S K L S A T T L L D R K A N A P A G G S Y T A R L F S D D S K L L R A K I I M
UniRef90_M5S8B5	L D R L M A T T L R T R A A E R T P E G S Y T T K L M N G G A E A I G R K I
UniRef90_F8AVA4	M K T F D E L Y E L A E K W R E R T P G S G S V D A L D K G H H I G K K I
UniRef90_C9RQ70	T F E E M Y A L A C Y Q R K K D M P E G K G T T E L F K K G P H G I G K K I
UniRef90_UP1000375F759	T L A D L A A L V A S R A G T D P A T S Y T A K L L S E G P A K A A K K I
UniRef90_B1M0Q0	L P A L V R T L E A R K S A P A G S Y T K R L F E D P A M L N A K I L
UniRef90_E9C5F8	K T F D T L F A E L L K A R A E S G D T D S S T V A A L G K G V H F I G K K I
UniRef90_E5XSS7	K S F E D L Y A E L S A K V A A G D P D S S T V K R V E A G V H E I G K K I
UniRef90_F5XS38	T L S D L D A I I I A T R A V S D D E K S Y T R K L I G K G V A K C A Q K L
UniRef90_E2CHC9	E V M D Q L Y Y R I I D S R L K E M P E G S Y T A S L A K R G K G V V A R K V
UniRef90_H2C9C6	T L Q E L E T I V A A R S A A S P D E S W T A K L L A K G P E K C A E K F G G
UniRef90_I1AZV8	T L A D L E A L V G T R A A A S P P E E S W T A K L V A S G Q R K A A K K I L G
UniRef90_UP100037036AB	T L D R L Y R G V H L A R A E S P G E S R T A Q L L R D G N P K I A K K V V
UniRef90_A8TJZ9	I D R L Y R G V H L A R A E S P G E S R T A Q L L R D G N P K I A K K V V
UniRef90_J4V237	Q F I N Q M F N D L K I R K N I N E N Q S Y T A H L L N N P E L L G K K I
UniRef90_UP10003B35E0F	V D S L T K L Y A S V L I E A R A R D P A S S R T S K L F S N G V A K M A K K I
UniRef90_UP100035D1FE6	Q I F K E L E Q M I A E R Q K Q N E P R F Y T C R L L T E G T L V E R K V N
UniRef90_K2EWL6	L K S L L Y N V L S D R L K N L P E G S F T A K L F E D E M L L K K I
UniRef90_K2DSA1	Q L A H L G T T I D A R A K E G D A S S W T A K L L A K G P E A C A E K V H
UniRef90_A0A059E912	T W E Y L Q S V I A E R F S N P K P G S Y T A T L D A D L V R E K V M
UniRef90_F5Y985	L S S L E Q V L A S R K D A A P D D S Y T A S L F A K G T K R I A Q K V G
UniRef90_UP100046ED32A	T T L Y S L E D T I S R R K E E S G K P S W T K K L L D N Q L L C S K I
UniRef90_W5CQT6	D F I N S E E K T I D D K R F E S S D I T S Y T Y Q L A K D G I K E I A K K I
UniRef90_K6H3K3	M K I L L N E V Y K V L E D R R D N P I D S Y S S R L M Q D N E D K I L E K I
UniRef90_E3GWU5	U I I R E V Y R V L E D R R D N P V D S Y T S H M Q D S D D K I L E K V G G
UniRef90_F6D2Y6	T V L S N L E A R I A D R K K A M P E G A Y T T Y L F S E G L D K I L K K I
UniRef90_W7ZB73	S F Y K L Q T I I N D R K E Q K T N S S Y T S Y L L N E G N K E I V K K I
UniRef90_UP10003814407	V K D F D T L Y T E L T H R K P G S G T D Q A I A K G I H H L G K K I
UniRef90_C0E3A5	T T L Y S L E S I I S K R K E E S S A P S W T R R L L T D D A L L C S K I
UniRef90_D6ZY2	T L L G R L E A L L A S R K A S A D N G S Y T Q K L F A K G V D R I A K K V V
UniRef90_M4E366	R F L A K L W A T I E S R R A A A P A E S Y T K K L L A A P A R I R R K I I
UniRef90_UP10004127F6E	I Q F I A R L E E V I Q E R K A K P S E A S Y T N F L F N K G V N K I A Q K V G
UniRef90_B4UDK1	V V S N L M A V I A E R K A R P P A D S Y V V S L L Q A G D P K I L G K I
UniRef90_UP100036B25FA	U N D O I U 8 V V S N L M A V I A E R K A R P P A D S Y V V S L L Q A G D P K I L G K I
UniRef90_D3FAV8	E V L P R L E R T V A A R A A E R P D G S W T A K L L A D P G L A G A K V
UniRef90_U1MY51	V I D N L F A V V E D R K Q R L P E D S Y T A E L L E K G D N A V L E K L
UniRef90_K6U3T4	K I I R E V Y Q V L I E N R R D H P I D S Y T S R I M Q K A E D K I L E K V G
UniRef90_R6IC26	V L A E I Y R L I C Y K R Q F G G D N S A A R H L V M S Q D K I L K Q V G
UniRef90_K9CV69	T L Q T L E E Q T I A E R R K A D P S A S Y V A K L T A R G R G K I A Q K V G
UniRef90_T0Z4U6	M I R A R R G E S P D T S Y V A R L I T A G P R S A L L L K K I L V
UniRef90_R613V9	S L E S L A H T I H E R R N A G D E S Y T H R L L T G D D T L L K K V V
UniRef90_10IQZ8	E V W A N L G K T L K T R W D A S P D E S Y V A S S L L K A P V E K S A R K V V
UniRef90_UP10003B79753	R L Y N I I A D R F A N P K P G S Y T A T L D A K R V R E K V E E E A
UniRef90_E6LHY9	M T V I E E V Y Q E I L A R K Q A P K E G S Y T S Y L F E K G D D K I L K K V G
UniRef90_R7QC45	T K L F S K G R Q K I A Q K V G
UniRef90_R9PJ3	L T F I A Q L Q A V L A E R K L A D P E E S Y T A S L F A R G T K R I C Q K V G
UniRef90_Q2NHF0	E I I R E V Y D T L V D R K N N P I D S Y T S K L M Q K A E D K I L E K L
UniRef90_F8CLM2	L A V L D D T L A R R A A E P P S G S Y T R R L M D D R N L R L K K L G G
UniRef90_F2F055	I L P Q L V E V I K Q R E I D M P E G A Y T T Y L F D K G D K I C K K V G
UniRef90_W6MF49	L S A L E S V L N E R L Q N A P A G G S Y T K R L F D D E A L L N A K I
UniRef90_U5HA46	F R T L E E K I I F L R R E V G I H K S Y I R D L F E R S M N K I L Q K V G
UniRef90_L7VJF2	T L Y A L E E L I A R R K T E G A K P S W T R R L Q Q D P K L L C S K I
UniRef90_A9TNG9	

		50	60	70	80
UniRef90_F9ZBD5	E E G V E T A L I A A V S G D D N G L I A Y L L Y H L T V L M H A R S L D W				
UniRef90_F5SR39	E E A V E S I I A A K D A L T D D L I Y E I A D V W F F H T I V T L A W F R I Q S L				
UniRef90_U2EHZ4	E E A A E V V E A A A E A D D G H L V H E I A D L W F F H T M V L L Q A R G G L V N A				
UniRef90_G8ZQQ9	E E A E E L T E A D S K S E L A W E A A D L F Y F A L A K L V A N G V S L C				
UniRef90_F7WZ13	E E A I E T V L I A A L E K D S I N L I N E A S D L I F H L V L L H N R N L C				
UniRef90_B7S0X4	E E A T E T I I A A K D G S R Q A L V G E V A D L W F F H S M V M L S H L N I S I				
UniRef90_K2FQ63	E E A G E V I I I A A K N D D R E L A L E S A D D L L F H L M L L T D R N V P L				
UniRef90_UP100036208D3	E E A R E L A A S S K Y S N K K N I V H E A S D L L L Y H F L V L L E V K K I S I				
UniRef90_E6PHS2	E E A T E E V V I A A K N P D D D E L L I W E S A D D L L F H L V L L E A R G I D P				
UniRef90_14Y9C3	E E A D E L C A A Q S K E D V A F E A A D D L I Y F F A L T R C V S G K V P L				
UniRef90_A0A059G187	E E G N E L A E A V I R E S D D N V A S E A A A D V I Y H L M V G R R A R G V P L				
UniRef90_A0Z8H4	E E A T E T V L I A A K D Y D R S A V I A E T A D L W F F H S L V M L A H L D L R Y				
UniRef90_A0A022PQD4	E E A D E L C R T E E N E D T S R T A S E M A D V L Y H S M V L L S R K G V K I				
UniRef90_O67780	E E A V E T L I A A L M K G E K E V I Y E S A D M L Y T F V S L S V S G V I D I				
UniRef90_B1Y107	E E A F E V V L L A G D D T L A E E T A D L L Y H L T L V L L A D R G V S F				
UniRef90_L0EWV2	E E A L E T V I I A S I N S D R N H L I H E T A D L L Y H L V V L K I A H V P I				
UniRef90_G8JMA0	E E A E E V T D A H T K D E L S W E V A D L F Y F V M A K M A A N G V T P L				
UniRef90_H0SLJ4	E E A I E V A I D A V G G N A E A V V R E S A D D L F Y N L A V L W A E L G I Q P				
UniRef90_G2LMI1	E E A V E T I I I A A M K K D Q T E L I N E S S D L I Y H L I V L L H D Q				
UniRef90_Q6UA38	E E A V E L V I I A A I N K D K K N M L E E C A D D L Y H I L V L F S Y T N I P F				
UniRef90_S9PG19	E E A A E L V T A C A D G D K E R A A E E A A D V L Y H L L V V A V R P L G V T L				
UniRef90_A0RMS1	E E A G E F S F A I K I D K P D Y D V V V Y E A A D I L F Y H I V A L A D F D I H P				
UniRef90_UP100037AF483	E E A V E T V I I A A L Q E D P K A L V U S E S A D D L Y H W M V L L A A K G V I				
UniRef90_Q18KL7	E E A A T E T I I I A A K D S D S A I Q A E S A D D L I Y H L F V V L L A M E E I T L				
UniRef90_R5PSA0	E E G V E T A L I A A T V H D K E E L K N E A A D D L V Y H L L V V L L A D A A D D L E L				
UniRef90_UP10001851356	E E A A E V I I I A A K N R D R E E L K W E S A D D L L F H L L V V L L Q E Q K V P L				
UniRef90_UP100036441BF	E E A V E T V L I A I A S E S D V A A E T A D D L Y H L F V A L R S R G V A L S				
UniRef90_G9P9U5	E E A A E L C D A K T P E E V I A F E A A A D D L I Y F F A L T R A V A A G V S V				
UniRef90_UP100032AA88A	E E A N E L C Q T L E N E D K S R T A S E M A D V L Y H A M V L L A L K D V R V				
UniRef90_D3UJ85	E E V G E L V C E I K D E E K E K M I Y E T A D V F Y H I F V A L A Y Y N I H P				
UniRef90_G0VAT9	E E A E E L T E A Q T K D E E V A W E A A D D L F Y F A M T K L V S K G V T L				
UniRef90_S8EFG9	E E A D E L C T A E T K Q D V A F E A A A D D L V Y F A L T R C V A A G V G I				
UniRef90_W1Q126	E E A D E L C R T L E D E E S S R T A S E M A D V L Y H A M V L L A V K G I K M				
UniRef90_A2ST94	E E A V E F I I I A A K N G V S E E K T V G E A A A D D L I F H M M V A L K A A D V D F				
UniRef90_Q8UJ91	E E A V E A V I I I A A Q D R D G L K N E A A D D L Y H L L V V L K I A D I P				
UniRef90_G8N9C3	E E A G E V I I I A A K N G N P E E V R W E V A D L Y H L L V V L K I A D I P				
UniRef90_A5E3Y9	E E L D E L I D A K G N R D E V A W E A A A D D L I Y F V M T W C V K N G V R L				
UniRef90_H2ATI9	E E A A E L V E A K G K D E I S W E A A A D D L F Y F I M T K L V S C G V S L				
UniRef90_U4LIL8	E E A A E E L C D A T T P R D I A F E A A A D D L I Y F A L T K C V S A G V S L				
UniRef90_M5S8B5	E E A A E L I I E A D E P D R Q H A I Y E A G D G L I Y H A M V M M A W R G I				
UniRef90_F8AVA4	E E A A E T W M A A E Y E G A E R V A E E L S Q L L Y W S Q L V M I S A G L T P				
UniRef90_C9RQ70	E E A A E S W M A A R F E S R D A Q C L E L S Q L V L Y Y V A V M M A E K G L T P				
UniRef90_UP1000375F759	E E S S E L I I D F V K Q N K K G I I N E S A D D L L Y H L L V I W L S S G V D P				
UniRef90_B1M0Q0	E E A V E A A I I A A V Q G D K T T G L R N E A A D D V L Y H L V V L L W A G G V E L				
UniRef90_E9C5F8	E E A S E L T R A V T P D H I I A A E A A D D V L Y F A L T K C V A A G V G I S L				
UniRef90_E5XSS7	E E A A E V W M A A E H E D D D A H A L A L E L S Q L L Y W A Q V V A L A R G I S L				
UniRef90_F5XS38	E E A A E V W M A A E Y Q S R D D A A L E L S Q L L Y H L Q V L M A L E L T P				
UniRef90_E2CHC9	E E A V E A A I A A V Q D D K E E L T G E A A A D D V L Y H L L V V L K A T N V P L				
UniRef90_H2C9C6	E E A V E V V V A S L T E G K E R V I S E T A D D L I Y H L L V V L M A L E G V K P				
UniRef90_11AZV8	E E A I E A I I E A V R G D R A K L L A S E T A D D V L F H L L V V L M L K S R D V A V				
UniRef90_UP100037036AB	E E A V E A V I I A A I A E D R Q N L V V E E S A D D V L F H L L V V L K I A G I P				
UniRef90_A8TJZ9	E E A A E V A V A L D A V V S D R D G V I R E S A D D L Y H L L V V L W V W M G I T P				
UniRef90_J4V237	E E A G E L S I S A V T N D G R V I D E A A A D D L M Y H Y L V L L N F Y D K S L				
UniRef90_UP10003B35E0F	E E S S E L I I D F I K K N K K G T I S E S A D D L I Y H L L V L W V S I G I D P				
UniRef90_UP100035D1FE6	E E A V E V G L D A V Q K H N D N V V L E S V D D L L Y H C V I W A E C N V T P				
UniRef90_K2EWL6	E E A F E V I I H S N T K E E L S W E V A D L Y F V L T F M V K N D V T L				
UniRef90_K2DSA1	E E A A Y E L I E A A F K G Q R G D I L Y E A A T D D L I F H V L V L L R K Y G I K L				
UniRef90_A0A059E9I2	E E G M E L A E A V R R E S D A H V I A S E A A A D D V L Y H A F V A L R S R G V S L				
UniRef90_F5Y985	E E A D E V C T A K T H D E I V W E A A A D D V L Y F T T A L I T R A G V V G V S L				
UniRef90_UP100046ED32A	E E G V E V A V A L A A T A G D K A E L L N E S A D D L Y H L L V L L Q D Q E L S L				
UniRef90_W5WCQT6	E E A G E L I Q T V N E D D K S R T A S E M A D D L Y H A M V L L S V R D V K M				
UniRef90_K6H3K3	E E C A E L I I I A S K N N D E E N I V V E E A A D D L I F H V L V L L R K L D M D F				
UniRef90_E3GWU5	E E A A E V I I I A S K N N D E N L V Y V E A V D D L F F H T M V L M V Y K G V I E L				
UniRef90_F6D2Y6	E E A A E V I I I A S K N N D E N L V Y V E A V D D L F F H T M V L M V Y K G V I E L				
UniRef90_W7ZB73	E E A S E V I I I A A K N R D Q D E L L S S E T A D D L Y H L L V L L Q E Q T P				
UniRef90_UP10003814407	E E A N E L A I S V V S I V D G R V I D E A A A D D L M Y H L Q V L L V A N D L S L				
UniRef90_C0E3A5	E E A G E V W I I A A E Y Q T D D E L L A E E L S Q L L Y W A Q T I M I A R G L T P				
UniRef90_D6ZY2Y	E E A V E T A L I A A V I G T D T K A V V S E T A D D L L Y H L V V L L Q A R G V S L				
UniRef90_M4E366	E E A D E L C T R L E D T E D A R T A S E M A D V L Y H S M V L L S K R D V K V				
UniRef90_UP10004127F6E	E E A G E V V I I I A A K N D D R A E F E L L N E S A D D L F H L D M L L E R G A S V				
UniRef90_B4UDK1	E E A Y E V N E A H Q A D T K D H L A H E A A D D L L Y H L V V L L A S A D V T P				
UniRef90_UP100036B25FA	E E A V E T V I I D A V I A G K T D D T M K G E A A A D D L L Y H L V V L L A A T G M Q L				
UniRef90_L0DIU8	E E A A E V V I A A A D D G G R D H L V R E A A D D L I F H A L V L L R G H D P				
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UniRef90_K6U3T4	E E A A E V I I I A A K N D D R A E F E L L N E S A D D L I F H T L L L V V Y K G V D L				
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UniRef90_E6LHY9	E E A I E V V I I I A A K N E Q A E I S E T S D S L L Y H F N V L M Y K E G V				
UniRef90_R7QC45	E E A V E V V I I I A A K N E Q A E I S E T S D S L L Y H F N V L M Y K E G V				
UniRef90_R9PJ3D3	E E G V E V A V I I I A A K N D D R E E L L V N E S S D D L L Y H F T I L N V L W A D V G V				
UniRef90_Q2NHF0	E E A T E V I I I A A K N D D R E E L V H E S A D D L L Y H F T I L N V L W A D V G V				
UniRef90_F8CLM2	E E A A A E L V T A C A D A D P R A V E E A A A D D L L Y H F V L V L L V A V R P L G L				
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UniRef90_U5HA46	E E A G E L C A A E S K E D I A A A E A A D D L L Y H F A L A K C V G A G I G L				
UniRef90_L7VJF2	E E A V E L I I E A K E N N K E R F L N E A A D D L L Y H F V L V L L Q A K N Y V K L				
UniRef90_A9TN99	E E A S E L C Q T V E A E G M E R T V U S E M A D D L L Y H S M V L L S V Q N V K L				

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UniRef90_F7WZ13	N D I I K N L
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UniRef90_D3UJ85	E N I L Q E L
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UniRef90_S8EFG9	A D I E R S L
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UniRef90_B1M0Q0	D A V M A E L
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UniRef90_E5XSS7	N D I Y G R L
UniRef90_F5XS38	E D V Y R Q L
UniRef90_E2CHC9	A N V M A E L
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UniRef90_J4V237	S D V V E V L
UniRef90_UP10003B35E0F	N D V W E E L
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UniRef90_D6ZY2	E D V Y A E L
UniRef90_M4E366	E D V L E V L
UniRef90_UP10004127F6E	L D V V E V L
UniRef90_B4UDK1	T E V Y G V L
UniRef90_UP100036B25FA	S D V V A V L
UniRef90_L0DIU8	P A V E A E L
UniRef90_D3FAV8	A D V Q Q V L
UniRef90_U1MY51	A Q L R A E L
UniRef90_K6U3T4	D D L Y Q E
UniRef90_R6IC26	A E L L A T L
UniRef90_K9CV69	D D V L D E L
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UniRef90_R613V9	D E F A A E L
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UniRef90_R9PJD3	D E V V A C L
UniRef90_Q2NHF0	D D V F D E L
UniRef90_F8CLM2	D D V K A V L
UniRef90_F2F055	Y E V L D V L
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UniRef90_U5HA46	R E I S K V L
UniRef90_L7VJF2	K D I L D
UniRef90_A9TNG9	E E V T T E L

The figure displays a sequence logo for a protein sequence across 40 positions. The y-axis lists UniProt IDs, and the x-axis shows positions 1 through 40. Each square's color represents the frequency of a specific amino acid at that position, with black indicating the most frequent amino acid.

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50 60 70 80

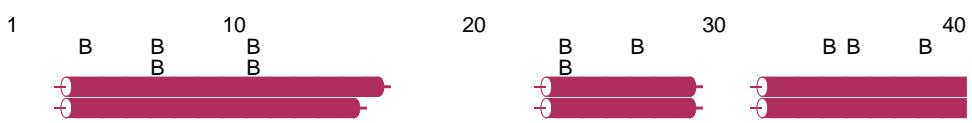
<img alt="Sequence alignment diagram showing a sequence of amino acids from UniRef90 entries. The sequence starts with E E A [] E V I V A S T S E G K E R L V S E T C D L L Y H [] L V L L A V E G I P L. The sequence continues with various amino acids (A, C, D, E, F, G, H, I, K, M, N, P, Q, R, S, T, V, W, Y) and some gaps (represented by dashes). Colored boxes highlight specific residues: yellow boxes are at positions 50, 60, 70, 80, 100, 120, 140, 160, 180, 200, 220, 240, 260, 280, 300, 320, 340, 360, 380, 400, 420, 440, 460, 480, 500, 520, 540, 560, 580, 600, 620, 640, 660, 680, 700, 720, 740, 760, 780, 800, 820, 840, 860, 880, 900, 920, 940, 960, 980, 1000, 1020, 1040, 1060, 1080, 1100, 1120, 1140, 1160, 1180, 1200, 1220, 1240, 1260, 1280, 1300, 1320, 1340, 1360, 1380, 1400, 1420, 1440, 1460, 1480, 1500, 1520, 1540, 1560, 1580, 1600, 1620, 1640, 1660, 1680, 1700, 1720, 1740, 1760, 1780, 1800, 1820, 1840, 1860, 1880, 1900, 1920, 1940, 1960, 1980, 2000, 2020, 2040, 2060, 2080, 2100, 2120, 2140, 2160, 2180, 2200, 2220, 2240, 2260, 2280, 2300, 2320, 2340, 2360, 2380, 2400, 2420, 2440, 2460, 2480, 2500, 2520, 2540, 2560, 2580, 2600, 2620, 2640, 2660, 2680, 2700, 2720, 2740, 2760, 2780, 2800, 2820, 2840, 2860, 2880, 2900, 2920, 2940, 2960, 2980, 3000, 3020, 3040, 3060, 3080, 3100, 3120, 3140, 3160, 3180, 3200, 3220, 3240, 3260, 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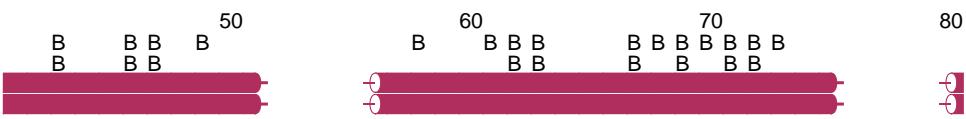
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