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S E G S G H E Y R A P G P G D L R G P C C P G L N A L A N H G  
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G P G S G H E W A A P G P N D N R G P C C P G L N A F A N H G  
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G P G S G H E W Q A P G P N D L R G V C P G L N V L A N H G  
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S G T H E F S P P D S G D Q R G P C C P G L N A L A N H G  
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E Y V T G S D C G D S L V N L T L A E P H A F E H D H S F S R K D Y K Q G V A	G D L T S W S I G G P P S P Q G I S G S H N K Y E C D V S P A R G D L Y Q	G D L V S W S I G G P P G S Q G I S G S H N K Y E T D G S P T R G D L Y Q	D L T S W S I G G P P T A S L G I S G S H N K Y E S D A S P T R P D L Y Q	G N P L S L N P G F S I G G P G L S G S H N W I E S D A S L T R N D L Y	G D L T S W S G G P P P G G L G I S S N S H N K Y E S D V S P T R G D L Y Q Y G N	G N P L S L D P G F S L G N L V G L G S H N W I E S D S S L T R D D L Y M	G N P L S L N P S F S I G G K D D I G T H N F V E S D S S L T R D D L Y M	G D I L S W S M G G G V L A N G L I G S H N K Y E T D A S P T R A D L F Q G	G D G L S W S I G P S T A N L G L S G S H N K Y E T D A S P T R G D L Y Q Y G D	G W S I G G P P T A A V G G L A P L G R G N G L I G S H N K Y E S D V S P C K P	G N I T A A S I G G K P K S Q D G L A T H N R F E A D C S P T R G D L Y	V A N P E P N A T V F T L D D L N R H N V L E H D A S L S R S D A F F G S	K N P L Q L Y F N L D D L N A H D L F E H D A S L S R G D I Y F G	G N P L S L N P G F S I G D T G L T G S H N I I E G D S S N T R A D L Y	S A S T T G N S N T F N L D D I N K H N L I E H D S S L S R N D I F F G	G D V V S L D P S F S I G G G L G L N G S H N F I E A D S S N T R D D T Y	G N I L S W S M G G T P P G L D G L G S H N K Y E A D A S P T R P D L Y Q A	G D L A T V S I G G K P P S Q G L S N S H N R F E S D V S P T R A D L Y	G N P L S L N P G F S I G S L G N L G S H N I I E G D S S N T R D D L Y	P A P P A T T F S L N D L S R D L N K H G V I E H D A S L S R Q D A Y F G	S T T G S W L T F N L D D L N K H G V I E H D A S L S R T D A F F G S	V A N P E P N A T F F T L D D H L N R H N V L E H D A S L S R T D A F F G S	G D I L S W S M G G G V L A N G L T G S H N K Y E T D G S P T R G D L Y Q	G N P L L D W G G G S P G G L G L S G S H N K Y E G D A S A T R D D A Y M N N	G D G L G F F S I G G P P S P Q G M S N T H N R F E S D Q S I I T R D D L Y Q	S T T G H W T T F H L S D L N T H G V I E H D G S L L S R A D L Y	L S V Q G N N L L A T S F N L D D L N E H N F I E H D G S L L S R A D Y Y S S P N	G N P L S L N P G F S I G D L G N L G S H N I I E G D S S N T R A D L Y M	G S L T N L V F S I G G D P A P G L G T H N K M E G D A S C T R K D A Y V N N	G N P L S L N P G F S I G D L G N L G S H N I I E G D S S N T R A D L Y M	G D L T K W S I G G P S I A L G L L G E P Q G I S G S H N R Y E G D A S P T R P	G N V V G W S M G G T P P G G N G L S G S H N K Y E G D A S P T R G D L Y	N N G T F N L D D L N K H G V I E H D G S L L S R A D I F F G	G D L Q A W S I G G T P G G G N G L I G S H N K Y E N D V S P T R P D L Y Q A	G D L T T V S I G A A T T S S I G L L G S H N R F E A D C S P T R A D L Y	G D L T S F S I G G K P K T G G L L G S H N R F E V D G S P T R S D L Y A	G D P I A Q T W S I G I G N G D G L G S H N K Y E G D A S P T R G D Y Y L	L R N S I T T A E T F S L D E D L N K H H N G I E H D A S L S R Q D F Y F G N V	G L L S S K D I A T G A F D L N D L Q H N F I E H D A S L S R K D A Y F G	D L L A W S M A G T G I L G H G L V G S H N K Y E S D A S P T R P D L Y Q A	G N P L S L N P G W S I G P Q G L I G S H N K Y E G D T S P T R G D L F	G N P L T S G P P G G V I P L G L S G S H N K Y E S D S S P T R W D A Y M N N	G P N A T A F T L N D L P H G V L E H D A S L S R S D A H F G S	G N P L S L N P G F S I G V L G L L G T P R G L N G S H N I I E G D S S N T R G	G D G S S W S I G L P H T G I I L G S H N N Y E T D S S P I L K S D L	L T P N A T T F S L D D L D H H N I I E H D G S L L S R G D F Y F G	E D P K A T T F S L S D L N C P G I L E H D G S L L S R Q D T Y F G	P Q P N A T F F D L D H L S R H N I I E H D A S L S R A D Y Y F G H	S P I P F S D R F D L A D L G R H G I L E H D I S L S R S D A Y F	S E P E T L T L D D L K R H G V I E H D A S I S R E D F A L G	P K N T S T F S L D N L G N H N I I E H D A S L S R A D A Y F G	D P T A T N F D L D S L N A H N V G E H D A S L S R A D A Y F G	G N P L S L N P S F S I G G T D I S H S H N F I E A D S S P T R N D L Y	T V A N P E P N A T F F T L D D H L N R H N V L E H D A S L S R T D A F F G	K D P A S A T W D L S D V V Q H N F I E H D A S L S R Q D A F F F G	K N P L Q L Y F D L D D L G N H D L F E H D A S L S R A D L F F G	T E V D N F S L D D L N A H E N I I E H D A S V S R S D H Y F G	G D V L S L D P S F S I G G P D L I G S H N F I E A D S S N T R D D L Y	G N P L S L D P S F S I G G R G L D G S H N W L E H D A S L T R N D L Y L	P D Y P S T R T F D L A D L G R H N I I E H D I S L S R S D A F F	G N P L S L N P S F S I G G Q G L I G S H N F I E S D S S N T R D D L Y	K A V T A S T T G K D T F N L Q D L N T H D L I E H D A S L S R A D T Y F G	G N P L S L N P G F S I G D L G L L G T P R G L N G S H N I I E G D S S N T R A	I A N P Q P N A T F F T L D D H L N R H N V L E H D A S M S R S D A F F F G	S I P N A N F I D L D M L N R H N V I E H D G S L S R R D M Y F D P S	V A N P V P N A T F F T L D D Q L L N R H N V L E H D A S L S R T D A Y F G	V A N P E P N A T Y F T L D D N L N R H N V L E H D A S M S R T D A Y H G	G N P F T S S G L G G L T N L G G I N T H N V Y E G D A S V S R R D Y Y E P G A	I A N P E P N A T F F T L D D Q L L N V H N V L E H D A S L L R L R F F L F D G R	G D M T T W S I G G P E S G P G L S Y T H N Q M E G D A S P T R N D A Y M N N	G L L S S P N P L A G S F D L D N L H N I I E H D D S S L S R D D Y Y F G	G D L T T M K L S I G T G L G D G L A H H G I L E E G D A S V T R D D A W Q G	G S N P N P L T L Q F D L D Q L L D R H N I I E H D A S L S R A D T	P T P N A T I F S L D N L S R H N V L E H D G S L S R A D Y Y W	S T T G D P T T F F N L D D I A K H G N I E H D A S V S R Q D R	K A G L L A S D D Q F S L A D I A L H G N I E H D A S V S R Q D R	G N P V S L N P G Y S I G G P G L S G T H N K Y E S D V S A T R G D L Y	S T T G N N D T I N L S D F D N H N G I E H D G S L S R N D L A L G	G N P L S L D P S F S I G G R D L I G S H N E I E H D D S S N T R D D L Y	P A Y P N T T F F T L D D L N R H N V L E H D A S L S R A D Y Y F G	L S V P G N S L A T S F D L D N L H N F I E H D A S L S R A D Y F	P V A G A Q T F F G L D T L S T H N I I E H D D S L S R C D K F F	G N I L D L T W S I G L G E P G G I D A H N I Y E G D A S V R Q D Y Y A P D A	G D V L N W S M G G G I L G N G L T G S H N K Y E G D A S P T R P D L Y Q A	G M S A S T T G N P D T I N L A D D L N K H G V I E H D A S L S R A D T F	G L L S S P D P F A G A F D L D N L H M N F I E H D A S L S R Q D A Y F G	G N I L W T Q K L S L G G G T L V G I S D H G F L E G D A S V T R G D	G D P I S L D P S F S I G A L D D L G S H N F I E S D S S P T R D D L Y			

130            140            150            160

QUERY	N S N D F	I D N R N F D A E T F Q T S	L D V V A G K T H F D Y A D M N E I R L Q
UniRef90_A7EXL3	I D N R N F D A E T F Q T S	L D V V A G K T H F D Y A D M N E I R L Q	
UniRef90_R7Z2Z6	Y G N D Y K L V M S Q F E E M Y A L P L G P N G Y D L S V L T T P F R A T		
UniRef90_W9CBU1	Y G N N F L V Q L P Q F E E M Y N V P N D Q S N Y D L P L T E F R S S		
UniRef90_M2T6B4	Y G N D Y K L I M S Q F E E M Y A L P P G P N G Y D L S V L T T P F R A T		
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UniRef90_K2RUA1	D D L V Q V P Q F A A L Y A K Q S H V P D D Q A N Y D L D V L T D F R V E		
UniRef90_A0A017S169	T G D A W T M M N M T L F R D I Y D R A D E D G V I S M D L L A D Q A A R		
UniRef90_R0IMB3	T G N N Y A L N M T K F E E F Y A M S T D G T F D M D L M A E R A K I		
UniRef90_K2RTX0	G N N F K L V T S Q F Q Q L I D Y S P G G I V T M D S L M A F R A V		
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UniRef90_E3REL8	D L Y E Y G N N Y K T L T S Q F Q E L I N V S P G G F V T L D S L T Q H R S N		
UniRef90_B6HR61	K T G D P E S L N I P Q F E Q L Y A M P L G P N G Y D L T V M H P F R G K		
UniRef90_C0NTY2	N H V F N E T I F E E T K A Y W T G P I L D A E M L A N S K V A		
UniRef90_C7YSQ2	D N I S F N A T I L W Q S V L D Y F I D D R T V S L G A A A H A R L N		
UniRef90_M4G0P0	V T G D A S T I L V Q Q F K D F Y E M S S G E G D Y N F D V F A E R A Y I		
UniRef90_V5FI75	D N H S F N P T I L W N S T R A W F S E P V V R I E H A S R A V V Q		
UniRef90_E3RQG4	V T G N N Y R L N M D K F M E W Y E M A E D G V F S S E V M A K R A K I		
UniRef90_W3WM32	G N N Y K L V T S Q F Q E L V D M S P G G V T L E S L A A F R S R		
UniRef90_F9FMR3	I T G D P V S L N M S Q F E T I L Y N M P Q G P N G Y D L T V M H P F R G L		
UniRef90_A2QLC7	V T G D A S T M D M N I F Q S L Y D M A S E E G T Y D F D A F A K R A K I		
UniRef90_B2B666	D N H D F N Q T I F D E T R S Y W T S P I I D V K Q A A V S R Q A		
UniRef90_Q2GU92	D N H S F S P E T W E T V F K H F R G L E K I P L Q V A A A A R K E		
UniRef90_M2SL53	N H I F N Q T I F D Q T R R Y W P E P V I T T A H M A N A K I		
UniRef90_X8J6U5	T G N N F Q T V P A Q F Q Q L V D A S P G G F V T L E T L T A F R S A		
UniRef90_M2XZY2	G D A S S L N L T Y F K Q L Y D Q P E G A N F D Y D V I Q H R V N		
UniRef90_V5INN4	S A P P N Y D N H T F V I P E I W A A T L Q V L E N E E R I S I E K A A R M R L A		
UniRef90_G2YKU6	H D D Y S F N Q T I F D Q F L S F F T S P E T S I P V A A A A K Y A		
UniRef90_E5A275	V T G N A W T M M N T L F R D I Y D R A D S N G V I S M D L L A D Q A A R		
UniRef90_X8J5U8	G D A S S L S L D Y F K H L Y N L L P E N E H F D M Q V M V E H R A W		
UniRef90_A0A010QAP2	T G D A S T M V M E Q F Q S F Y D M S S G E G D Y N F E L F A E R A S I		
UniRef90_S3CK33	D L Y Q Y G N D Y K V I L K Q F E Q M F A L Q P D T A N Y D L S V L T P F R A D		
UniRef90_F9XD17	D P A S G A D Y S T F A N Q F Q D L I N Y C P G G T V D I D C L T A F R S H		
UniRef90_J9NN55	D N H S F N E T I F W A S T A S H F T E P T I S I A T A A K A R K E		
UniRef90_N1QG11	G N N Y I T Q A S Q F Q E L I N V S P G G V V T L D S L T T H R S N S		
UniRef90_M2U7S9	K T G D T D S L N L A Q F E E L A A M P L G P N G Y D L T V M H P F R G S		
UniRef90_M2RZ33	T G D P V S L N L A F F E Q L L S M P L G P N G Y D L P V L T A F R L D		
UniRef90_U1GF13	N S G D V S T L R V P L F K A L Y D L A K D D P N Y D L R V L A K H R K Y		
UniRef90_W3XD38	Q A F N E T I I F N Q T R S Y W T D P V T I D I H Q A A N A R N A		
UniRef90_N1QFF0	D D H T F Y D P I W Q Q T L S F Y N G D Q T S L L P A S K A I A N		
UniRef90_M2XG97	G N N Y I T Q A D Q F Q D L I N Y S P G G N V T I D S L T S F R S H		
UniRef90_G2YXL8	V Y G N A W V L Q M P H F Q E L F D L Q P D K A N Y D I G I M S Q L R Q I		
UniRef90_K2QYP1	N N H V F N Q T I F D V S R A W W T E E T V D A K M L A N S K L F		
UniRef90_M5C6A6	G D G N T M N L T Y F K Q L Y D L Q P E G D N F N Y D I I V A N R V A		
UniRef90_S3CW54	N H V F N Q T V F D T S K A F F T D E T I T I R M I A D A K V F		
UniRef90_N4W680	D L Y V T G D A S T L V M D Q F Q E F Y D M S S G E G N Y D F G L F A Q R A S I		
UniRef90_M3ASU3	N Q Y G S N T K F V M S Q F N N L Y N R Q P N T A N Y N L D V L R Q F R K D		
UniRef90_I8U391	D N H S F N Q T L F D Q V K S Y W T E P L I D L H L G A K A R L A		
UniRef90_A2QV48	N N H E F N Q T I F D Q T K S Y W T T P L I D M Y Q A A E A H E A		
UniRef90_G2R8M6	D D H T F N Q T V F D Q T K S Y W K T P I I D V Q Q A A N A R L A		
UniRef90_Q5AZ23	A D P K P F N E T T V W A E T M S Y F T T S M I T V E Q L A K A R M G		
UniRef90_V2XS92	D N L H F N E A V F E T M A N A N P G S D V Y N I T S A A R V L Q V		
UniRef90_G2QID2	N V L Q F N Q T V F D E T K T Y W E G D T I D L R M A A K A R L G		
UniRef90_C8VPW7	N N H V F N P N V F A Q T R A Y W T H P T V T A A M L A N S K I A		
UniRef90_M2YLE1	V T G D P V T M N L T N F E A M Y D L A N D N D T A T L D V I I E H A A V		
UniRef90_L2FY66	N N H I F N Q S V F D E S R A Y W T N A I L D P K Q L A N S K I A		
UniRef90_M3BRW7	N N Q P F N Q T I F D T V L S F Y A N E T D A T I P I Q A K A K Y S		
UniRef90_C1GJ5	D N I S F N E T I I W Q S V L D Y F E D D E T V S F K A A A K A R L N		
UniRef90_UP1000440E2A0	D N H S F N G T L F N Q T L A Q S N G V D Y Y N A T S A G L V M K A		
UniRef90_W6QI00	V T G N S W T L N M D K F M T W Y N M S S D G T Y D M N L M A E R A K I		
UniRef90_B2W349	T G N A W T M M N T L F R D F H D R A D E N G V L S M D A I S D Q A A R		
UniRef90_A0A016PZQ1	A D P N P F K T V W A E T L T Y F P D D M I T V E Q V A K A R M G		
UniRef90_Q0D0P9	V T G D N Y R L N M D K F M E W Y N M S T D G T F S M D L M A K R A S I		
UniRef90_N4UY67	D N W S F N Q T I F D E T K S H W V S E T I S I R D A A K A L A A		
UniRef90_H1V707	D L Y V T G D A S T M V M D Q F Q S F Y D M A E G E G V Y D F L F A D R A A I		
UniRef90_W3WKD5	N N H V F N Q T I F D T T R V Y W T N E V L T A Q M L A D G K L A		
UniRef90_A0A010SNE9	N R F D K P T F D A F V A Y F G D A T T I S T A D M A N A R A R		
UniRef90_Q0CAG9	N N H V F N E T I I F Q E T I K Y W T G S T L D P D M L A N G K L A		
UniRef90_A0A017SKB4	N N H I F N S T I F A K T K A Y W T Q P V L D A T M L A N G K L A		
UniRef90_UP10004561A20	D N V N V Y L P Y F Q S V V D R T R G K D V Y T R D V L A K H R W E		
UniRef90_W3WJL6	D D H T F N E T T V F D E T R S Y W T D E T V T V E M A A N A R L A		
UniRef90_K3VBQ6	V T G N N F H I L L S R F E E Y Y W R A I K P N T P A Q Y T A L A P F H Y K		
UniRef90_R4XCU3	D N H S F N N G K W Q E V L A F V K G G E N F N I T S A A K A K Y H		
UniRef90_X8J3L2	G D A S T L S M D Y F K R L Y D L V P E G E N F D M S V M A K H R A W		
UniRef90_A0A010QYP9	T D A A F G N N H V F N Q S I F D E S R A Y W T K D T L D A Q Q L A N S K I A		
UniRef90_J6F169	N Q W S L S Q D R W N Q F K Q I T H G N G H R V T L K A L A E A R Y R		
UniRef90_S3D5I9	I A G D N H S F N Q T I F W D T V L D Y Y T G M S D T S I P V A A A K Y N		
UniRef90_W3WK20	T G D A K T F N Q S V W D E T S G Y L A E G G R I D V A T M A A A R S K		
UniRef90_N4VE96	D L G N N V V F N E E I Y T T L A N S N P D V D Y Y N T T S A G L V Q K A		
UniRef90_V2XBZ3	T G D N N H V I L L E R F V E Y W S A I R E N T P A Q Y S A L A P F H Y K		
UniRef90_F9G6P9	D N H S F N K T I F A Q T A S F W T T D K I T I A Q Q A K A R L A		
UniRef90_M4FWX5	T T G N N H A L N M S K F M E W Y N M S T D G T F S M D L M A K R A K I		
UniRef90_B8N2J2	N N H I F N Q T I F D T T K M Y W P S E T L T A Q H L I D G K I F		
UniRef90_A7F4T4	S S P T H D N Y S F N Q T I F N Q F F S Y F S S H S T S I P V A A A A K Y A		
UniRef90_W9CDU6	U C E D F I S F N A T V F A K T K A D W T G D N V D V Q M A A N A R I N		
UniRef90_B2VU61	N H D N V L V H L P Y F Q D L L D L T P G K D V Y T A E V L L K H K S N D		
UniRef90_R9P7R7	G N N Y K C V T E Q F Q D L I N H S P G G V V T L D S L T S F R S D		
UniRef90_Q0UF05	T G D N H S F D K T F A M T V S N W P D A K I S I E Q S V R A R N A		
UniRef90_J3NYT6	N D Y S F Y N D N W Q V L N F Y D G K T T D V P T A S R A K Y A		
UniRef90_M2NGT1	K V V G D Q V H L N A T R L E K F I A Q F G D N G D I T P E V C A A S R E R		
UniRef90_J5TSX2	V T G N N Y A M N L S R F E S W Y D M V P E G E S Y T S E V M A E Y A A K		
UniRef90_R1GWF3	K V V G D Q V H L N A T R L E K F I A Q F G D N G D I T P E V C A A S R E R		

170            180            190            200

QUERY	R E S [L] S N E [D] F P G W F T E S K P [I] Q N V E S G F [I] F A L V S D F N [L] P D N
UniRef90_A7EXL3	R F Q Q S I [D] N N P Y F F N A P F S G I A V Q P A A Y T F I V Y R Y M A N K S S E
UniRef90_R7Z2Z6	R F E Q S I [D] N N P Y F F Y G P F S G V G V Q P A A Y T F I F R F M G N K S A E
UniRef90_W9CBU1	R H Q Q S I [D] N N P Y F F Y G P F S G G I A A Q P A A Y T F I Y R C M A N K S T E
UniRef90_M2T6B4	R W A Q S V A T N P Y F F Y G P V T G M V S R N A G Y F F L G R I L S N H T A E
UniRef90_W2RSC0	R F Q Q S I E N N P Y F F Y G P F S G V A V Q P A A Y T F I F R F M G N K S A E
UniRef90_K2RUA1	R W E Y S I G H N P N F Y Y G P V T G M V S R N A G Y F F L G R I L S N H T D E
UniRef90_A0A017S169	R M D Q T K A T N P N F Y Y G P V T G L L A R N A G Y M F V G R I F R N H S E E
UniRef90_R0IMB3	R V I N T Q K K T N A Y F F N G P F V L V Q P A A Y A F I F R F M A N H T A E
UniRef90_K2RTX0	R F Q Q S V D E N P Y F F N A P F S G V L V Q P A A Y T F I Y R F M G N K S A E
UniRef90_N1PBG3	R F D S S I A K N P Y F F N G P F T G V L V Q P A A Y T F I F R F M A N H S A A
UniRef90_E3REL8	R F K D S I A T N G Y Y W A G P V T H F A I N T A T Y L F T Y H F F A N H S A E
UniRef90_B6HR61	R Q I N S K A H N P T Y T F T A T E Q F S L G E V A A P I I A F G D I
UniRef90_C0NTY2	R I K T E R A R N P D F T F A K D D I I S Y T E T A Q Y L S V F G N
UniRef90_C7YSQ2	R F H E S V A T N P N F Y Y G P F T G M I A R N A G Y L F A C R M F A N H S S E
UniRef90_M4G0P0	R L V A A R A S N P A F S I T E E Q Q M Q L A A G A T A L Y L S A L G D
UniRef90_V5FI75	R F D E A I Q T N P N F Y Y G P V T G T I A R N A G Y I F P L R L F A N H T Q E
UniRef90_E3RQG4	R F D Q Q V K S N P Y F F N G P F S G V L V Q P A A Y T F I Y R F M A N H S A E
UniRef90_W3WM32	R F Q N S V N T N P Y F F N G P F T G L A V Q T A T Y V F T Y R F F A N H S A E
UniRef90_F9FMR3	R F H E T V A T N P N F Y Y G P F T G M I A R N A G Y F F A C R L L S N H T V G
UniRef90_A2QLC7	R V I N T S M A T N P N F Y Y G P D S F S Y G E T A A Y I L V L G D
UniRef90_B2B666	R V E S A R A S N P E F S L T E D Q R F S I L E T S L Y L M V F G E
UniRef90_Q2GU92	R Q I E S K A F N P E Y R F T E S V E F S L G E M A A P F I I A F G D L
UniRef90_M2SL53	R V D A Q R K S N P Y F F N G P F A G L L V Q P A A Y T F I Y R F M A N H S A E
UniRef90_X8JU65	R R Q T S V S T N P H F F N G P F S G F I A L P A A Y S F I T R F M S N H S A E
UniRef90_M2XZY2	R F Q Y S V A N N P Y F F K G L N T A F I P E A T S A L V T Y L F A N H S A A R
UniRef90_V5INN4	R I D E E K R G N P N F S M S E D K R F S A I E T A L Y L L R V F G R
UniRef90_G2YKU6	R V K Y E E H D P H F S Y S A Q H F V S Y G E T A L Y L S T L G D
UniRef90_E5A275	R W R Y S I A H N P D F Y Y G P V T G M V S R N A G Y F F L G R I L S N H T D E
UniRef90_X8J5U8	T R E Q C I S S N P H C F F G P V P V T F V S T L A H I L L P R L V S N H S A E
UniRef90_A0A010QAP2	R F N E T I A T N P N F Y Y G P F T G M I A R N A G F L F A C R L F A N H S T E
UniRef90_S3CK33	R F Q Q S V S E N P Y F F N G A F T G V A V Q P A A Y T F I Y R F M G N K S A E
UniRef90_F9XD17	R F D V Q V Q V N P Y F F N G P F S G V L V Q P A A Y T F I Y R F M A N H S A E
UniRef90_J9NN55	R L K A A E A A N P E F S L P A D Q Q F S F I E T A L Y L S V F G N L N
UniRef90_N1QG11	R F D S S I A A N P Y F F N A P F P G L L V Q S A A F T F I Y R F M A N H S A E
UniRef90_M2U7S9	R F N N S I A T N G R Y F A G P F T H F A I N T A T Y L F T Y H F F R N H S A E
UniRef90_M2RZ33	R T R H S I A T N G Y Y F S G P L Q T L A L N P A T Y Q F T Y R F F A N H T A E
UniRef90_U1GF13	T L E N S I S T N P Y F F W P P F A G P A V S N A A H T F I P A L M S N H S A E
UniRef90_W3XD38	R I E T S K A T N P T Y N E T A V N R A S A L E T A A Y I L S F G D
UniRef90_N1QFF0	R T R D S M N [N] P T F T Y G F R E F I Q Y G E V S I Y L Q T M G A D
UniRef90_M2XG97	R F D D Q Q I A N N P Y F F N G P F S G V A V Q P A A Y T F I Y R F M A N H S A E
UniRef90_G2YXL8	T F E R S I R T N P Y F F Y G P F V G M A V S N A A Q S F I Y R F M A N H T A E
UniRef90_K2QYP1	R Q I E S R A A N P N Y T F T Q T E A F S L G E V A A P I I V F G D
UniRef90_M5C6A6	R F K T S V S Q N P H F F Y G P F S G I I A S G T A H A F V T R L M S N H S L E
UniRef90_S3CW54	R Q V I S R S T N P D Y S F S A S V E F S L G E M A A P F L A L G D
UniRef90_N4W680	R F N Q S I A T N P N F Y Y G P F T G M V A R N A G Y L F A C R L F A N H S S S
UniRef90_M3ASU3	R F T E S I N K N P Y Y A Y L P F G G I E V S Q A A F T F I Y R F M S N K S A E
UniRef90_I8U391	G V I N R S K A T N P T F D L S G F R L F S Y A Q T A T Y I L V F G D
UniRef90_A2QV48	R L N T S K A T N P T F N L S E T G L F S F G E T A A Y M I V F E D T N L
UniRef90_G2R8M6	R V L T S N A T N P T F V L S Q G E A F S F G E T A A Y I L A L G D R
UniRef90_Q5AZ23	R L A T S K K T N P E F E L S L L A G F S W G E C A S F F E I M A D
UniRef90_V2XS92	R L A D S L A R N P N V T N S E T E F T N R I E G A T Y L S V M G D A S
UniRef90_G2QID2	R I K T S Q A T N P T Y S M S E G D A F T Y G E S A A Y V V V L G D
UniRef90_C8VPW7	R Q L H S K A F N P N A P Y T Y T E T E Q T S Y T E T G F P I L A F G D L
UniRef90_M2YLE1	R W N Q S V A T N P Y F F Y G P V T G M I A R N A G Y C F I S N L F A N H T K E
UniRef90_L2FY66	R Q V T S R A F N P N Y T F T A S V E F S L G E V A A P I I V F G D M
UniRef90_M3BRW7	R T L D S Q T R N P K F Q Y G L R E F I S Y G E N A L F L I S T M G D
UniRef90_C1GJ5	R I K T E R K R N P D F T F A K D M V I S Y T E T A Q Y L S V F G H
UniRef90_UP1000440E2A0	R L E D S I A R N P D I S T S K E F I L R T G E S G F Y L S V M G N A
UniRef90_W6QI00	R M D Q T I H T N P D F Y Y G P V T G L I A R N A G Y I F A G R L F R N H S S E
UniRef90_B2W349	R W N D S V N T N P Q F W Y G P I T G M I S R N S G I L F L G R L L A N H P P E
UniRef90_A0A016PQZ1	R L A T S K K T N P Q H S L S K L A G F S W G E M A S F F E I M A D
UniRef90_Q0D0P9	R W E Q S K N T N P D F Y Y G P V T G L I A R N A G Y L F P A R L F R N H T K E
UniRef90_N4UY67	R Q K S A E S I N P E F N L P L G H T N S L G Q T A M Y L G L F G D Y
UniRef90_H1V707	R F N E T I A T N P N F Y Y G P F T G M I A R N A G Y F F A C R L L A N Y S S E
UniRef90_W3WKD5	R Q I T S R S Q N P N Y T F T E T T E F S L G E V A A P I I V F G D M
UniRef90_A0A010SNE9	H A L A M S R I N P T F T L P E S A P L F L G E A S L M L A L W G S
UniRef90_Q0CAG9	R Q V S S K A F N P T Y T F T E S M Q F S L G E V A A P I V A F G D L
UniRef90_A0A017SKB4	R Q I Q S R A S N P N Y T F T S S M E F S L G E V A A P V I A F G D I Q H
UniRef90_UP10004561A20	R F Q T S I A K N P N F F Y S P F G G L V V T T A A F I V N F M A N N T A D E Q
UniRef90_W3WJL6	R V H S S I A T N P S Y S M S L G N E F S L G E T A A Y I I A L G D R
UniRef90_K3VBQ6	Q F Q D S E K T N S H F F Y S P F A G V L V S P A G Y S F P R R M M A N H S N E
UniRef90_R4XCU3	R L Q E Q T A I N P T I T Y T P L Q F I S Y G E T S L Y L S V M G D
UniRef90_X8J3L2	T R Q H S I S T N P N Y T F T A P Y A G L F V S T L T H I L S P A L L S N H S A E
UniRef90_A0A010QYP9	R Q V T S R A F N P N Y T F T A T V E F S L G E V A A P I I V F G D M
UniRef90_J6F169	A W K W S Y D N N P Q F D F N P R M L V A Y G E S G F V Y Q A L R
UniRef90_S3D5I9	R V T T E A E R D P A G V Y G P V Q F V S Y G E T A L Y L S T M G D
UniRef90_W3WK20	R L Q T S Q A T N P D F S L S L G S A F S I G E S A A Y L F V L G D
UniRef90_N4VE96	R I A T A Q A T N P T F G L T S S Q T V S L G E S A V I L G T L G G S
UniRef90_V2XBZ3	R M E Q S R A T N P T F R N T K E F Q V R T R E S A L Y L T V M G D
UniRef90_F9G6P9	R F Q D S E K T N S H F F Y S P F A G V L V S P A A Y S F P R R M M A N H S D K
UniRef90_M4FWX5	R I A T A K A T N P K F S M T E Q Q K G S L L E N A L I L M L F G D G
UniRef90_B8N2J2	R M D Q T K Q S N P E F Y Y G P V T G L I A R N A G Y L F P A R L F R N Y S Q E
UniRef90_A7F4T4	R Q I V S R T T N P N Y T F T T Q A F S L G E M A A P I V A F G D K N
UniRef90_W9CDU6	R E N Y E E R E D T R F S Y E A Q Q F L S Y G E T A L Y L S V L G D
UniRef90_B2VU61	R I N E S K K N P D F K F S A V A T Q A S A E G A A Y L L G F G D R A T S
UniRef90_R9P7R7	R W H Q S V A T N P L F F N S A F G G L V V T T A A F V A E F A A N N T V D E N
UniRef90_Q0UF05	R F D A Q K K S N P Y F F N G P F S G V L V Q P A A A E
UniRef90_J3NYT6	R I A D S K A K N P Q F A M S A V Q G S F L E N S L I Q V F G G G
UniRef90_M2NGT1	R V N D S M T I N P T F T Y T R E A I F S Y G E T A L Y L Q S M S D
UniRef90_J5TSX2	A Y R D S R A E P N S F D F N P R M L V A Y A E S G F A M E V F R
UniRef90_R1GWF3	R F H E T V A E N P Y F Y Y G P F T G M I A R N A G Y L F I T R L F A N H S S E R

210      220      230      240

QUERY	D E N P L V R	D W W K Y W F T	N E S F P Y H	L G W H P P S P A R E I E F V T S
UniRef90_A7EXL3	I D	I D	I P	W Y K R A I G D E Y G L V P
UniRef90_R7Z2Z6	Y P E G Y L N G D	V L K S F Y G H E K I	P D N	W Y K R A I G D E Y T I P F
UniRef90_W9CBU1	R P E G Q L T K E	V L K S F F G H E R I	I P	W Y K R A I G D E Y G I G P
UniRef90_M2T6B4	Y P E G Y L N G D	V L K S F Y G H E R I	I P	W Y R R T V E Y G L V P L N D
UniRef90_W2RSC0	Q P E G I L T Q E	V F R S F F G H E T I	P N N	W Y R R T V E Y G L V P L N D
UniRef90_K2RUA1	H P P E G I L N K	E V L K S F F G H E R I	I P	W Y K R A I G D E Y T I P F
UniRef90_A0A017S169	H P P D G I L T Q	E V F K K F F G H E T F	P D N W	Y R K P V E Y G L V P L N L D
UniRef90_R0IMB3	H P P E G V L T K	D I V K S F F G W E R I	P D N	W Y K T P V D Y G L V Q L N L
UniRef90_K2RTX0	N P T G I L T H E	V L Q S W F G V E R I	I P	W Y R R P I E Y A Y D V A Y
UniRef90_N1PBG3	K P E G V L T K E	V L K S F F G H E R I	I P	W Y K R A P G D E Y T I P F
UniRef90_E3REL8	N P I G E L S Y D	V L K S W F G Q E K I	P S N	W Y R R S L T A P Y E N D Y
UniRef90_B6HR61	Y P E G Y L D G E	T L K S F Y G R E R I	I P	W Y R R A L G D E Y G I A G F
UniRef90_C0NTY2	Q A G T V N R S	L V E Y F F E N E R I	L P T D	G W K R P A K V T S L Q D I L S
UniRef90_C7YSQ2	P D T G N P R V	D W I R I F F E Q E R I	L P Y L E	G W Q R P S K Q T N A L T L A P
UniRef90_M4G0P0	N P S G F L N K E	V L K S F F G Y E R I	I P	W Y R R P V D Y S L V H L N L
UniRef90_V5FI75	K V N G T A L R D	H V R V F F E Q E R I	L P A A E	G W C R A K E P V T R S D I G A
UniRef90_E3RQG4	H P E G V L T K E	I V R D F F G W E R I	I P	W Y K A P V D Y G L V Q L N
UniRef90_W3WM32	H P I G I L P S E	V L Q S W F G V E R I	I P	W Y R R A L E Y P Y E T T Y F
UniRef90_9FMRM3	Y P E G F I L D S	E T L K S F F G H E R I	P D N	W Y R R A I G D E F G L A A F
UniRef90_A2QLC7	S T E D I M D R E	T L K S F F G W E R I	I P	W Y R R S I D Y G L I S L N L
UniRef90_B2B666	K E K G L V N R S	R V E Y L F E N E R I	L P L D	L G W S R A K E N I T F D D L S T
UniRef90_Q2GU92	G T Q G N A R T D	W V K V L F E E E R I	L P F Q E	G F T R S P T M L T L G Q I L E
UniRef90_M2SL53	E E A T V N R T	L V E Y F F Q Q N E R I	L P T E	L G W N V R E E V V A V E A I L R
UniRef90_X8J6U5	N P E G I L P Y D	V L Q S W F G G E R I	I P	W Y R R A I A Y P Y D T P Y F
UniRef90_M2XZY2	A P D G I L N H E	V L K S F Y G V E R I	I P	W Y K R P I D Y S I P L
UniRef90_V5INN4	C P A G G C L D A	T N L K S F Y G H E R I	I P	W Y K Y P V G Y G V A N V F A
UniRef90_G2YKU6	G T E G G A E T R	W V R V L F E E E R I	L P I	E G F K R S D K P L T I A E V L E
UniRef90_E5A275	P V E G G V A D	V E W V R V F F E E E R I	L P P Y R E	G W R R G S V Q T N L P S L A G
UniRef90_X8J5U8	H P P G G I L T Q	E V F K K F F G H E T F	I P	W Y R I K G E Y G L L P
UniRef90_A0A010QAP2	N P T G L L N K A	T L K S F F G W E R I	I P	W Y R R A S D Y T V V E V M Q
UniRef90_S3CK33	Y P E G R L L D Q	E T L K S F F G Y E K I	I P	W Y K R A I G D E Y T I P F
UniRef90_F9XD17	N P I G E L N Y D	V L K S F W F G Q E R I	I P	W Y R R S L T A P Y E T H Y
UniRef90_J9NN55	D G N A K T E W V	K T L F Q E E R I	L P I	E E G F K R S D D V I T A A G I L G
UniRef90_N1QG11	D P I G T L S Y S	T I K S W F G H E R I	I P	D N W Y R R S L T S T Y T I P Y
UniRef90_M2U7S9	Y P D G Y L D L E	T L K M S F F G G R E R I	I P	W Y R R S L T S T Y T I P Y
UniRef90_M2RZ33	N P E G Y L D A K	T L M L K S F F G R Q E R I	I P	W Y R R V I G D D Y S I L S F
UniRef90_U1GF13	Y P N G I L D K E	T L K D F F G Y Y E R I	I P	W Y R R P L G P Q N E Y T T L S F
UniRef90_W3XD38	K V T G S V P K A	F V E Y F F E N E R I	I P	P F H L G W Y K S A E S I S F A D F Q N
UniRef90_N1QFF0	D A T G V T R V D	W V R E L F E Q E R I	I P	D A T G V T R V D W V R E L F E Q E R I
UniRef90_M2XG97	N P E G I L L T Y S	T L Q S W F G V E R I	I P	W Y R R P Q A Y P Y E V T Y
UniRef90_G2YXL8	H P E G I L D Q F	N L K S F F G V E R I	I P	W Y R R P G G W G R R A F G D E Y G I L S
UniRef90_K2QYP1	H A A G T V N R S	L V E Y F F E N E R I	L P T E	L G W T K Q A N D V S L E V I L E
UniRef90_M5C6A6	S P Q G V L N H Q	V L K S F F G V E R I	I P	P D I W Y K R P V D Y G F T A
UniRef90_S3CW54	K T N G L V N R T	L V E F W E N E K I	I P	P A E L G W K R V I E E P V V L E N V M F
UniRef90_N4W680	N P T G V L N K Q	T L K S F F G W E R I	I P	W Y R T P V D Y G L V Q L N D
UniRef90_M3ASU3	N P E G I L N K N	V L K S F M G Y E R I	I P	P D N W Y K R N P S D E Y S I P Y F E A
UniRef90_I8U391	K V S G T V N K T	W I E Y L F E K E R I	I P	P V E L G W E K Q E T P I S T S D L D S
UniRef90_A2QV48	G Y A N R S W V	E Y F F E N E R I	I P	P Q E L G W T K R P F I T T G Q V L V D
UniRef90_G2R8M6	V S G T V P R Q W	V E Y L F E N E R I	I P	P L E L G W R R A K E V I S N S D L D Q
UniRef90_Q5AZ23	G T T G T V D K K	Y I I D Y W F R N E R I	M P T E L	G W Q R R N V T M
UniRef90_V2XS92	T G V A P K N F	V Q I F F R E E R I	I P	P L E E G W K R S S P I T L A S L F Q
UniRef90_G2QID2	K E S R T V K R S	W V E W F F E H E Q L	I P	P Q H L G W K R P A A S F E E D L N S
UniRef90_C8VPW7	N E A G T V N R D	F D V E Y W F E N E R I	I P	P S E V G W T V R E E P V T P E Q L A A
UniRef90_M2YLE1	N P V G N L T P A	I L K S F F G H E R I	I P	W Y K R G L D Y T L V E L N
UniRef90_L2FY66	N V A G T V Q K D	F V E Y F F Q N E R I	I P	P E E L G W T K K A E A V T L E N I L S
UniRef90_M3BRW7	P S T G V A P L E	Y V K V L F E Q E R I	I P	P Y A E G W R V P A A E T S L S V G N
UniRef90_C1GJ5	P I N G N P V D	W I R F F E Q E R I	I P	P Y I E L G W R R P A I Q T N A R D
UniRef90_UP1000440E2A0	T T G V A P K D	Y V D I F F R E E R I	I P	P Q A E G W K R S D V P I T L A L M S S
UniRef90_W6QI00	N P E G T I L T K	S H R N F Y G W E R I	I P	W Y K T P I D Y G L V S L N
UniRef90_B2W349	H P T G I L T Q E	I F R K F F G H E T F	I P	P S N W Y R T P L E Y G L V P L N
UniRef90_A0A016PZQ1	G T T G T V E K K	Y I I Y F W F K N E R I	I P	P T E I G W Q R R T T M R G I E R I E F
UniRef90_Q0D0P9	N P E G V L T K E	I V R N F Y G W E R I	I P	P K N W Y K T P V D Y G L V Q L N D
UniRef90_N4UY67	D D G N A N R A	W V E Y F F E N E R I	I P	P Y E L G W A R R S D A I P A T G I L A
UniRef90_H1V707	N P T G L L N K Q	T L K S F F G W E R I	I P	N P T G L L N K Q T L K S F F G W E R I
UniRef90_W3WKD5	A A G T V N R T	W V E Y F F E N E R I	I P	P S S L G W T K K Q E P V T L V N V T G
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Y Q S D L	N A A A L R	H P K F L I P	G P G N T G E	T N T Y T P	P V D I A N L	
Y S L D V	V F N A A V E	P E F L S	S V G G N T G T	N S F T G V D I K N L T G G V		
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F A L D L	N T A L A H	H P Q F L D I	G G N T G T P	N S F T G V D I Q D L		
L V G W V L	K	H P E L G S I	G G N T G T V	N S F T G V D I H S I		
D T V G F	V T K Y P E		G S I G G N T G T V	N S F T G V D I S D L		
L V A D A L	A A A N L H	P E F L D I	G G N I Q G T P	N S F T G V D I V A D L		
Y A L D L	N A A A L Q	H P Q F L S V	G G N T G T G T T	N S F A G V D I Q D L S G G L		
F L A D V A	A A I A L H	P K F A N V	G G N T G K V	N T F T G V D I V T N L		
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L I A K L	M I A G G E V	L P E T L	G S I G G N M G E	V N S Y A G V D I S D L		
D V L A L	A A K Y P E L A		S I G G N M G E	V N S Y A G V D I S D L		
L L N K L	N N A A			L T G G V		
L L D L L	A F I A Q F P E	L A S I	G G N T G T V	N S F A G I H M G D I T G G V		
I A D A V A	V A A A G L	L Y P K F L N I	G G N T G K P	N S F V G T D I G D L S G G L		
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D L L N L	I T K Y P E L		G S I G G N M G K	V N S Y A G V D I D V V S N V T G G V		
M L Q R I	I N A T					
L H K K V	V E A V					
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F T V D F	L Y A G L K H	P E F L S I	G G N T G E V	V N S F A G V N V G D I		
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L N L D I	V D W V M K H	P E L G S I	G G N T G K V	N S F T G L D M S D I T G G V		
D F A K I A	P G H P E F L S L	G G N T G K V	N S F V G V D P G D I			
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F L G D V	V V A A A A L H P K F L S I	G G N T G T T	N S F S G V D V T N L T G G V			
L V A K V	A V A V A S I					
F L G D T	V V A A G L H	A K F L N V	G G N L Q G T T N N F A G V	N V N S D L T G G V		
A L D A V	R A L Q A L P Y M	A V I G G N T G K P	N T F T G V	N I A D L		
T A E A V	S L E V A H	P E L I R V	G G N T Q G P	N S F T G T N T N L		
A Q D L V	V L A Q T A P G	V V A V G G N T G T	V N S F A G V N L A D I			
M S T R V	T S Q A G S Q S P					
M V F E L	Y T S P S A V	P E G				
F M A D L	L N A A L L H	P K F L D I	G G N T G K V	N T F T G V D I N N L		
L T E D I	L Y F A S E Y P N T	L T I	G G N T G E V	N T F S G V D F S D L		
I Q D L V	R N A T N L I T	D A P L P				
L A L D L	V D A A L E H	P E F L S I	G G N M G K V	N S F A G V N L R N I		
L V E S I	G N A T S L I		T A S G N S T A P			
L V S W I	A K Y P E L G S		G G N T G G V	N S F A G V E L S D L T G G V		
D I L Y L	A Q A D P R I	L T C	N K G K V	N T Y S P I D P S Q L		
M I E R V	V M Q A T K E I					
M T T W V	I N S T I G V	T P E				
L T N R V	I N A T					
L A N L	A Q E S H	W N A T N E C P				
S M E E I	E K Y T K E	L E G S N S T S G S				
V T Q M I	A A E A V K L	V T				
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W S G H	I M A A A E	W Q G P T Q				
V D V I	G I F L K Y P E	L G S I G G N L G E	V D S F A G V D L G D L T G G V			
L D L V S	W W L R N P	V L I G G N T G T V	N S F T G L D L H N I T G G I			
T R R L	M E A A G V S					
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L T T K V	A V V H Y L A V					
D L V A L	I T K Y P	P Q G S I	G G N M G K V	N S F A G V D L S D L T G G V		
V T D M I	D A K T H L T T P					
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D F D K L	A L E H P E F F S	F G L I L T	G F G N T G K P	N S F A G A N V D D D L T G G V		
V V E M I	R N A T V L	I T T				
W A A V I E V I K	P A V P G W					
M V L E L	N A A N G E V L P	E G L I L G E S S	L R A V F K G L D			
A M D R I	V					
L S Q S I	A T S S					
L M D E I	A E N S G W T P	E D Q C P W L T	L A Q G A P E D P L N D G S I L			
F L V D V	L E H A A K Y P R	L L N I G G N T G K V	N S F S G V D I G D L T G G V			
M V Q K L	A A A S E					
T L D W L	L K Y P E L G S		G G N T G T	N S F T G I D L S D A T G G V		
V T G A L	A N L T S L L S					
M I W K L	V L A N G D V V P	E G L				
F T A A I	I K A T P A Q A					
V L T L L	S A A A I	D P S L L S	G G N A G Q V	N T F T G L D V G N L T G G L		
F V G D A L	N A I A L H	P K F L D I	G G N T G T G P D S F T G V D I G D L			
V I G Q M V A V						
M V F E L	F L A N P Q N V P	E G L				
V Q S G Y N V	G G A F V P I P S I P	G W T N F L S A G T V	K M N A C S L A S M F			
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290

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1                    10                    20                    30                    40

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 G Q Y E F V A P N S G D Q R G P C C P G L N A M A N H G  
 W S P P G H G D V R G P C C P G L N T L A N H G  
 A E [D F S K W K T R Q P G E L R A P C P A M N S [A N H G  
 Y E Y I A P G P N D V R S P C C P G I N S A A N H G  
 G P G S G H E Y V A P G P N D L R G P C C P G L N A F A N H G  
 G S G H E Y V A P G P G D L L R G P C C P G L N A F A N H G  
 S A G S G H E W Q P P R K G D L L R G [V C P C P G L N A F A N H G  
 A E [D F E Q W H P A G L G D L R C G C C P A M N S [A N H G  
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 S G D H E F R A P G D S D I R G P C C A G L N A A A A N H G  
 S G D H E F R M P G P G D V R G P C C A G L N A A A A N H G  
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 G G L L P P A E D A A H P W Q A P P A G A K R G P C C P G L N T I A N H G  
 P N D P R F S Q W K A P G A G D V R A P C C P G L N S L A N H G  
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 S A P V T P G F N F S N Y P F M A P G P N D M R S P C C P G L N A L A N H G  
 H E G R A G Y P S W H P A G P D D F R G P C C P M M N T L A N H G  
 H P W I A P G A D A V R G P C C P M L N S L A N H G  
 W E P A G P G D F R G P C C P M V N S L A N H G  
 D A S N E W H A P S K W D R R S P C C P G L N T L A N H G  
 D H Q F Q A P G A N D V R G P C C P G L N T L A N H G  
 V N D G T Y Y K A A S A G D I R G P C C P G L N T A A N H G  
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 G G K H A F A A P D A G D Q R G P C C P G L N A L A N H G  
 S G D H A W Q A P G P G D I R G P C C P G L N A A A N H G  
 S G D H A W Q A P G P G D I R G P C C P G L N A A A N H G  
 S G D H A F T P P S A S D A R G Q C C P G L N A L A N H G  
 R P G A G G K W P K F V P P S P G D S R C S C C P A L N A M A N H G  
 P G E S P H P W I A P G P D A V R G P C C P A L N T T A N H G  
 S G D H A W I A P G K G D I R G P C C P G L N A A A A N H G  
 T G D H A F V A P D N G D Q R G P C C P G L N A L A N H G  
 S G E H A W R P P G A N D K R G P C C P A L N A M A N H G  
 T G D H A F V A P D N G D Q R G P C C P G L N A L A N H G  
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 R D G N D T W V P Q E W I A P G P D D S R G P C C P G L N T L A N H G  
 H G I Q H P R K S Q E H A F V P P A P G Q Q R G P C C P G L N A L A N H G  
 T G E H V F I A P A A G D Q R G P C C P G L N A L A N H G  
 T G K Y A F V P P G A G D V R G P C C P G L N A A A N H G  
 T G E H A F V A P N A G D Q R G P C C P G L N A A A N H G  
 D G K Y Q W K A P T S S A Q R G P C C P G L N A L A N H G  
 V N D A E H P F M D A R P G D I R G P C C P G L N T L A S H H  
 D K D H P Y I A P R P G D A R G P C C P G M N T L A N H G  
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 A Q G S V S D W H P A G P G E S R G P C C P M L N T L A N H G  
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 G L L P P G E D K Y H P W Q A P P R G A K R G P C C P G L N T I A N H G  
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 K S G N G T G R L T P N H F F W K A P G P G D Q R S P C C P T M N T L A N H G  
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 D D D H T W R A P G P N D L R G P C C P M V N T L A N H G  
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50            60            70            80

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UniRef90_K1WHK5	Y   P H N G V A T Q Q F I D V F G M G K D L G A F L S I Y G S L A D
UniRef90_G3Y488	L   L P H N G K D I S E E V I I Q V L N S T L N V A D S L S V F L F E E A M T T V
UniRef90_B2B6C6	F   Q R D G K N I T V E G L T P V L K E V F H L S H E L A F T V S Q L G L F T A
UniRef90_N1PL25	Y   L P R S G K N I T P A V V A Q G L L E G L N V G L D F G L P V A Q G A
UniRef90_M3ATT4	F   F P H N G Y A T I T Q F I D A T M N V V G M G P V L A G F L A V L G A T I   D
UniRef90_N1Q994	F   F P H N G Y A T V Q Q Y I I D A T E A V V G M G P P L L A G F L L S I L G G A I   D
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UniRef90_Q00668	F   F N H N G S N I T V N E V I P L M Q E V F H L S E E L A T I V T G L A V
UniRef90_K1Y0V2	Y   Y P R D G I I A T A R T I N T G L W E A F G L D Q T A T L F L Q T A T M F F D
UniRef90_M7SGJ9	F   F P H D G K E I T H A E T T D A L V K A L N I E S V F A G T L H D I A C T T N
UniRef90_F9XMQ2	Y   Y P R S G I I M T A E A I N T G L W E A F S L D K T A T L F L Q T A T M F F D
UniRef90_M3BR78	Y   Y P R D G I I A T A E A I N T G L W E A F S L D K T A T L F L Q T A T M F F N
UniRef90_B8MBG0	Y   Y P H N G V V S L A E V V P A I N Q V I S L N P S F S I A G E S P A I E D L
UniRef90_W9CCX2	F   F P R D G K N I T E Y N V V K G L N D G L N F N K S L A T I M F Q Q A I P A S
UniRef90_V2XT66	F   F P R N G R N I T V S M I L Q S F L D G Y H I E P D A L M L A A K V G L T T
UniRef90_N1PJ16	F   F N H N G K G L T I P Q L I L G G A Q G L N M G P D F M A V I G A V G L
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UniRef90_M3D002	Y   Y P R N G I I A T I V Q Q L V D A T E K G F G M A R D L L G G F L A L Y G A I V D
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UniRef90_S7ZUQ7	F   F P H H G R D L T E E Q V V N G L K S S I N L A E D F S R S F F K A G L R T N
UniRef90_E3QNH5	Y   Y S R D G V T G I A E V T G A L N R V F G M G I D I A A I L G I L G T V F V
UniRef90_UPI0004449FD3	I   I P R N G S N I T T N M I L Q A A V D A Y N V Q P H V L S L A A K I G M L V S
UniRef90_M7TME0	F   F P H D G R N I T K E A A I S G L G A A L N F N E E L A T I M F E Q A I F L N
UniRef90_E3QP26	Y   Y P R T G K E I S M A D L I S G L G T A L H F N E S L V R T L G T P A F A T
UniRef90_G2X439	F   F P H D G R N I T K E N A I F A L G E G I I G F D R G L A A L M W E Q A I
UniRef90_K3VC40	Y   Y P R D G L N I T L D D L I E G F T D A I N L D P A A T T L V G K K A L D T G
UniRef90_G4N266	Y   Y P R N G L N I D M P T L K Q A F T D G V N L A P D A T E F A G K K A L V A G
UniRef90_R4XCT8	Y   Y S R D G I I T D L V E A I Q G T N K V F N M G I D L G G F L S A Y S V L T D
UniRef90_M2YNP2	F   F L A R D G V V T Y N E L V D A Q Q N V Y N V G Y D L A N L L A T L G V V M D
UniRef90_F9WXW8	F   F H R D G R N M T I P H L V K G L A A G L N V G P D F T I A I G G V
UniRef90_H1W2K3	F   F P H D G R N I T S E I V Q K G F K D A M N I I D E A L S A A A F K P A L E L N
UniRef90_V2WX44	F   F P R N G K N I T I P A V L K A G L E G F N V H R D L L I L A A
UniRef90_W3XMK4	Y   Y A H T G I I T T F T E L L I A V H E V Y N M N I D L A V V L I T L A L V F T
UniRef90_M3A712	Y   Y P R S G I I V D A D A I N T G L W Q A F G L D K T A T I F L Q T A T S F F N
UniRef90_B2W1J0	F   F S H D G I I T T F E E L V D A Q Q N V Y N V G Y D L A V V L I A V L G V Q T G
UniRef90_Q5AT15	F   F P H D G R N I T R D K L I I R A L G E A L N F H P S L A S L M F D M A I V V N
UniRef90_E2LMD4	F   F P R N G K X I T I S I L L Q G N N D G Y N I Q N D A L S T A A K L A L F T S
UniRef90_L7I6M5	Y   Y P R N G K D I I S V D A L I D G M H A G L N L R D D A K L F F R L Q G N K A V
UniRef90_A8NL28	Y   Y P R S G I I A T P A Q V I Q V A V M E G F N M E N T F A K F V T Y A A F L V D
UniRef90_M2MX91	Y   Y P H N G V A T I A Q F V D A T T K V F G M G V D L A T F L S T Y G A V L D
UniRef90_D8PX36	I   I P H D G K N I T F T E M G E K I H S T Y N F A P S F C Y F V P N F A A N M L
UniRef90_U4L7I2	Y   Y P R N G V V N M L T G S S M F G K V F G M A G E L S L T L A L Y A T L L S
UniRef90_W9CW20	F   F P R S G R N I T M D D L I P G L K A S L N V A E D L A I M A G T N A F K T N
UniRef90_W3X364	Y   Y Q R S G V V D S D S I N T G L W E A F G L D H T A T L F L Q T A T M F F D
UniRef90_F9XB21	Y   Y A H D G R N I T A T Q I I H A I R E V Y H I S L P M A S V L S V V G T L V C
UniRef90_F0X6W8	Y   Y P H N G V T S L I D T I V G V N T V F G M G I E L I T L L A T M G T V G V
UniRef90_G2XSS1	Y   Y P R D G R K I T L D F L I R D A M L N G F N I A H S D A E G L F P L A L Q T S
UniRef90_R1GXJ3	Y   Y I D H S G V V D T F N N I L A G V N E A Y G M A L D L A A F L A I Y G T V F D
UniRef90_W9VVW8	Y   Y D R S G V V A K F P D V I G V I N E V Y G M D V G L S T I L A V V M G T V W T
UniRef90_K5X0C8	Y   Y S R S G I I T S C S E I I T A V M E G F N M E N N L A I F T C Y S A F L V N
UniRef90_UPI0004414A66	W   W P R S G V V A T P Q Q I I T A S E K G F N M G H N L L A T F V T F A N M L V N N
UniRef90_B8NW63	F   F P H D G K N I T P A Q V I N A T M Q G F N M E F S L A K F V T Y A A F L V D
UniRef90_K5VUE7	F   F P R E G R N F T L P T V K H A L K T G V N V S E E I A E L L Y N F A L T T N
UniRef90_Q0U0A6	F   F P H D G K N I T K F S E L G D K I R E T Y N F A P S F C L F V P N Y A A T M L
UniRef90_A8POW1	I   I P R S G R G I I S F K S L S T T I P D T Y N F S K F A Y T L N Y M A E M L
UniRef90_UPI0004412B68	L   L P R D G H N I L G W T V L V C S L V K V Y N L S Y P F A L L L S T L G V I I C
UniRef90_K5JMW4	Y   Y P R N G I V N P I Q L M V G T F Q A L N L S P D L S A I L V A I S F V G L
UniRef90_Q4PGE1	F   F P H S G K G M T I P H L I K G L A Q G M N M G A D F T T L I G A T G L L A S
UniRef90_E3RHH6	F   F P R N G I V N P V E L L V G T F N G L N L S P D L A A I L A A I S F V G M
UniRef90_E7A211	F   F P R D G K T L L S L S F S R L L L N G F N V Q N D V L A I A A K I A L L T S
UniRef90_V2WPS5	F   F P R N G I V S T E Q T I S G L G E L Y S M S P D L A L F L A V V S T A L A
UniRef90_Q0U7J4	I   I P R D G K N I S F P E M N S T I R A T Y N F A P S F C F F V V P N F A A R M L
UniRef90_B0D4Q6	F   F P H D G R N I T L D K L T K G V K D A L N V A E S R A L N I F E N A L V V N
UniRef90_L2GBA1	F   F P A R D G I I T T F A E L V N A Q Q N I Y N V G Y D L S L L L A F L G L Q A D
UniRef90_F9XF63	Y   Y P R N G L N V S L A D L I T G F T A A V N L D P A A T T L V G Q K A L
UniRef90_L2GC81	F   F P A R D G I I T T F G E L V D A Q Q N V Y V G V G Y D L A V V L L A T L G V G L D
UniRef90_M3AU56	F   F L P R D G K Q I D A A V V I A L E E G Y D I S A P L A Y V L A Y G G H F L L
UniRef90_UPI000440DBD5	Y   Y P R N G V A D M Q T I I K A T N E V Y G M S D L G G F L A V Y G T V F N
UniRef90_N1RPK6	Y   Y P R N G V A A D M Q T I I K A T N E V Y G M S D L G G F L A V Y G T V F N
UniRef90_F9WXP9	Y   Y P H N G I I A T R Q Q F I D G T N A V F G M A R D L G G F L A N Y G A S V D
UniRef90_N4UXS2	Y   Y P R E G K N I K M K D F T T A F T T A L N F D E K F I T G V A E T G F T I
UniRef90_S8E3N2	L   L P H D G R G A S A R D Y I R A L R Q G Y N L S F P L A A F I T M G G H I L L
UniRef90_M2UW13	F   F S H D G I I T N F Q E L V D A Q Q N V F N V G Y D L S L I V H T V L G M Q A G
UniRef90_R0JPK9	Y   Y P S R N G I I T S F A E V V T A I N Q V L G M G L E L A I L G V M G T V W T
UniRef90_A1D8W4	I   I P R S G K H I S Y K Q M S H T I Q H A Y N L A P S L A D Q L T A S A
UniRef90_E3RU44	F   F S H D G I I T N F E E L V D M Q Q N V Y N V G Y D L S V L L T V L G I Q T G
UniRef90_F9G8E6	Y   Y P H N G V A T F T Q Y V T A V G K V W G M A P D M S A L L T T L G V V L G
UniRef90_B2ADX1	F   F P R T G K Y I T L D D L T N G L F N A V F E D A N I S A F L F D F A L
UniRef90_H1VNH1	F   F P R N G R N I T R D V F I E A T N K A I N L D R A F G G V T F D N
UniRef90_M1VXG2	Y   Y I P R D G I I A T L E S I N T G L W K A Y G I D Q T A T L A L H I I T N F F D
UniRef90_M4G1C6	F   F P R N G R K I L M F T L L K G L D D S V N L S K A A T L L V G A V A L T T G
UniRef90_R7S4R3	F   F P R D G K S I S I P T L V T A C Q D G L L N V G A D F C T V L G T T S L L S N
UniRef90_Q0TWP8	F   F P H D G R N I T K K A N A I A G L N G G L N F N G S L G A L M W E Q A I F A N
UniRef90_K9HB99	I   I L P R D G K N I Q F K E M G R L I R T T Y N F S S S F C Y F V P H Y A A E
UniRef90_R7SJY6	I   I L P R S G R N I T F R D L S R L V Q E T Y N F A P T F C F V P N Y A A N M L
UniRef90_J3NL98	Y   Y L P R D G R K I I N L V N I T K G L D A G V N L D A A A T T L V G A V A L T T G
UniRef90_V2X6M8	I   I L P R D G K N I S F K E L T A K V H E T Y N F A P S F C F V P N Y A A G F L

90                  100                  110                  120

This figure displays a segment of a protein multiple sequence alignment from the UniRef90 database. The alignment is shown across four columns (90, 100, 110, 120), with each column representing a different position in the sequence. The residues are color-coded based on their chemical properties: hydrophobic (black), polar (grey), acidic (blue), basic (red), polar uncharged (green), and aromatic (yellow). Specific positions are highlighted with yellow boxes, likely indicating conserved or functionally important residues.

130              140              150              160

UniRef90_W3XLG4	N	NNH <sup>I</sup> F NQT <sup>I</sup> F D S T K <sup>V</sup> Y W T A E V L T P Q M L A N S K □ F		
UniRef90_Q0UJQ4		V T G N A W T M N T T L F W D F H D R A D E N G V L S M D □ L L A D Q A A R		
UniRef90_K1WHK5		T Y K V I I S Q F Q E M F D T Q P D T A N Y D L S V L T P F R S K		
UniRef90_G3Y488		N N H E F N Q T I F D Q T K S Y W T T P L I D I Y E A A E A H E A		
UniRef90_B2B6C6		G D Q S V L H K G Q F Q K F M D H F K G E K Y I S F E A A A K A R Y A		
UniRef90_N1PL25		D N □ H F N Q S V F N Q V L A F Y K G K N S T D □ P S A A N A □ L W S		
UniRef90_M3ATT4		G D D Y K T I A S Q F Q E L I N V S P N G V V T L D S L T T H R S N		
UniRef90_N1Q994		G N N Y K T V T S Q F Q D L I N N S P G T V T L N S L T A F R S K		
UniRef90_F9XN56		E S G N N Y I T D A A A F Q K L I D V S P G G E V T T L D S L T V H R S N		
UniRef90_Q00668		G D G H T I D Q P T L D E F L S Y F D G K E W I D L N D A A A A R Y A		
UniRef90_K1Y0V2		N S N C A S Y P E F A Q E L L D L A T E M T G G N I T P Q V L A R H Q Y N		
UniRef90_M7SGJ9		N V Q P F N Q T V F D Q T R S F W T D P L V D I Q M G A N A L V A		
UniRef90_F9XMQ2		N S N C R S Y P Q F A Q E L L D L A Q K R E N G N I S P R V L A E H S Y N		
UniRef90_M3BR78		N S N C □ S Y P Q F M Q E L F D L A D Q M G N G L I T A R V M A Q H S S N		
UniRef90_B8MBG0		T G D A W T L N L T K F Q H L Y D M S T D G T F S M D L M A E F A K D		
UniRef90_W9CCX2		Y G N N Y I F N Q T I F D T T K A Y W P S E T L T A Q H L I D G K M F		
UniRef90_V2XT66		D N L H F N E A L F E T L A S S N P G S D V Y N I T S A G Q V M Q A		
UniRef90_N1PJ16		N N Y A F N Q K T W D A T L S F F H G Q T K T T P T A S K A R Y S		
UniRef90_M9MF53		W D A D P Q L V A Q F I N E T N T Y G N G N V D V I S L A H S R Y R		
UniRef90_M3D002		Y G S N T K L V M S Q F F S L Y N R Q P D A S N Y N L E V L R D F R K E		
UniRef90_L2G1W8		D N W S F N Q T I F D E T K S Y W P A D L I S I S D A A K A L V A		
UniRef90_S7ZUQ7		D D H S F D S A T F D Q T R S Y W K E P M I D V R Q A A Q A R Q A		
UniRef90_E3QNHS		T G D A S T M V M D Q F Q A L Y D M S P G E G D Y N M D L F G E R S S I		
UniRef90_UP1000449FD3		D N H S F N E T I F Q T L V N V S D Q N D T Y N G T T A G Q S Q K A		
UniRef90_M7TME0		N N H I F N A E V F E E T K I Y W D K P T L T A Q M L A N S K □ A		
UniRef90_E3QP26		▀ T G D A K T F N E T V W A E T R G Y A S A D A K V D Y K T M A A A R S K		
UniRef90_G2X439		N H I F N Q T V F D E T R S Y W T G D V I N A T M L A N S K M A		
UniRef90_K3VC40		D N S R L D P H I W K Q T L Q H F S A P Y I S I Q A A A D A R K D		
UniRef90_G4N266		N N L V L D Q T L W S K T L L Q D F P N D Q I S L T D S A R A R K N E		
UniRef90_R4XCT8		Y G N N Y E L Q L S Q F Q R F Y D Y H R G N P N Y T F D D L L A W R K E		
UniRef90_M2YNP2		K G D N F K F N A T L F A M M T R T T G G N Y N L Q G L A T Y R K Q		
UniRef90_F9WWX8		N D Y S Y Y D P F F Q D V I S F F P S G K T D I P G A A K A I □ A N		
UniRef90_H1W2K3		N D Y S Y Y D P F F Q D V I S F F P S G K T D I P G A A K A I □ A N		
UniRef90_V2WX44	N	Y G N N Y E L Q L S Q F Q R F Y D Y H R G N P N Y T F D D L L A W R K E		
UniRef90_W3XMK4		N V V F N E D □ Y T T L A N S N P G V D S P L T F D D V G D I S A A		
UniRef90_M3A712		N S N C A S Y P V F M Q E L L D L A K A R T G G N L T P R V M A E H S D N		
UniRef90_B2W1J0		G D N Y S F N G T L F A N M K K V A D S G G K F D R N T L S V Y R S Q		
UniRef90_Q5ATI5		N N H I F N A S I F A E T T H Y W T N T T L T P L M L A N S K □ A		
UniRef90_E2LMD4		D N A A F N E T Y F S V T A N S N P G V D Y Y N A T S A G L V F K E		
UniRef90_L7I6M5		D N W S F N Q T I F D E T K S H W P S P T I S V R D A A R A L A A		
UniRef90_A8NL28		D N H S F N Q T L F D Q F V E Y S H G G G F Y N L E S A A E L R Y R		
UniRef90_M2MX91		Y G T N Q K L V M S Q F N K L Y G M Q P D A S N Y N L D V L R T F R N D		
UniRef90_D8PX36		D Q G T P H E P F V R E L L D S A T G E P R F T V A D L S K I S A R		
UniRef90_U4L7I2		F K G D V N S V Q L P K F K K L L E Q D E K P N F D L D V L T E H R K F		
UniRef90_B8LZ19		D N H S F N E T I Y A E T R A W F H E S I I S L P Q A V S A L R S		
UniRef90_N1PN44		N S N C A S Y P Q F A Q E L L D L A K K R T G G N L T P Q V L A E H Q Y N		
UniRef90_UP1000444A508		Y A P S Y V D K D R L Q Q L L D A S S D G Q T L T F N D L V S Q R A A		
UniRef90_W9CW20		▀ T G D A S T M M N T L F L Q I A N G S D S E I I T M E D V G K R A A D		
UniRef90_W3X364		D P F N E T V W A E T T S Y F T T D F I T V Q Q L A D A R M G		
UniRef90_F9XB21		T G D A A T M N I L T R F E K L Y S L V P T D R A F T M D D M A D F A V I		
UniRef90_F0X6W8		▀ T G D A S T L V L Q Q F R G L Y D R S T G E G D Y N M D V L G A H A D A		
UniRef90_G2XSS1		S Y N L E V P L F Q K Y Y D A L V E G V G A D E Q Y Q K L L D F R I D		
UniRef90_R1GJX3		F G D A F R V Q V P Q A Q Q Y V D N T P T D P I S W Y D S L F E Y R I S		
UniRef90_W9VVW8		▀ T G D A S T M D M S R F L Q L Y N R A G E G T D I S E D D V L R H G V D		
UniRef90_K5X0C8		G D N H S F N E T L F Q G F V D F S Y G G G K Y N L T V A G E Y R Y K		
UniRef90_UP10004414A66		N V D F N E N L F Q Q F V N I S F G G G I F N E T A A A E V R Y R		
UniRef90_B8NW63		N N H V F N E T I F E E T K K Y W T G P T L D A N M L A N G K L A Q		
UniRef90_K5VUE7		D N H S F N Q T L W D G F V D F S F G A G K Y N L T V A T E L R I Q		
UniRef90_Q0U0A6		D V I S F N A T V Y N Q T R S Y W T E D L I N I Q M V A N A R L A		
UniRef90_A8POW1		▀ P D Q S K P H I P F I R E L L D S A T G T D L L T I E D L S K Y S A K		
UniRef90_UP10004412B68		F A P S R P D D V L L Q N L L G Y T Q A E G S L T L N D F V R A R □ C		
UniRef90_K5JMW4		W D A D P K R V A Q F I S E T N T Y G K G N V D I W S L A N S R Y R		
UniRef90_Q4PGE1		W D A D P K R V A Q F I S E T N T Y G K G N V D I W S L A N S R Y R		
UniRef90_E3RHH6		D A T A F N E T V W K S F F S F A G K A T T D L D T T A K A R F A		
UniRef90_E7A211		W D A D P Q L V Q Q F I N N T Y G K G N V D I W S L A N S R Y R		
UniRef90_V2WPS5		W D A D P Q L V Q Q F I N N T Y G K G N V D I W S L A N S R Y R		
UniRef90_Q0U7J4		R V G V F Q M R S W E H L Y S □ A E E Y T L D D V A A Q S D Y		
UniRef90_B0D4Q6		▀ V K D Q G K P H □ P F V R E L L D S A S G K D K L T P A D L S R Y S A K		
UniRef90_L2GBA1		N S F D K G T F D N F V S Y F G N E Q A I N T S I I A N A R A R		
UniRef90_F9XF63		G D N F S F N R T L F D M M S S T T G G G N F N R E N L A V Y R K Q		
UniRef90_L2GC81		D N H S F D E E I I W E T V A S H H F V N E T I S I P T A A K A R A A		
UniRef90_M3AU56		G D N Y K F N T T L Y N Q M I Q C S V G G G C N E A N I A R Y R K Q		
UniRef90_UP1000440DBD5		Y A P I H S D P V L W K E L V K N A S D G K K L T T A D V A E A R V R		
UniRef90_N1RPK6		▀ T V G N N F H V I L E R F V E Y W S A □ A R E N T P A Q Y S A L A P F H Y K		
UniRef90_F9WXP9		N Q Y G S N S R L I M S Q F N S L Y A R Q P D T A N Y N L E V L R D F R G E		
UniRef90_N4UXS2		▀ T V G D A N K F D A A I W N A V K A H F T S D T I D T K T M A K A R A D		
UniRef90_S8E3N2		Y A P D E P S Q C L L A H L L Q H H S S D N A T M S V R D F A A A R V A		
UniRef90_M2UW13		G D N Y S F N G T L F A Q M K K V A D S G G K F D R N A L A K Y R S D		
UniRef90_R0JPK9		T G D A F T M M N T L F L D F Y N R A D E N G V L S M D L L G D Q A A R		
UniRef90_A1D8W4		▀ C P D Q G V P H P D L V D R F L S H A S N G K S L S L D D I V Y F S G V		
UniRef90_E3RU44		G D N Y N F F N G T L F G N M K K V I A D S G G K F D R N A L A A Y R S Q		
UniRef90_F9G8E6		D P □ G D N N D M M N T Y F M E L Y N L Q K D N P N Y S I E V L Y E H N K N		
UniRef90_B2ADX1		F N Q E A F D E T R S H W G D I V N V E S G A A A I V A		
UniRef90_H1VNH1		N P F D A E T F D N Y L S Y □ G N D T T I N T T S Q A N A R A R		
UniRef90_M1VXG2		N S N C A S Y P E F Y N Q L L E L S N K R A N G C I T A P V L A E H Q H N		
UniRef90_M4G1C6		D N H S F N V T I W D T V A S H H F P G K G T I D I A T A A K A R N A		
UniRef90_R7S4R3		D N H D F N T T I F Q T L N N S A V N G F Y T E T E A G L V R Q A		
UniRef90_Q0TWP8		N N H V F N E T V Y N A S R Q W W T D E T V T A E Q L A H H S K □ F		
UniRef90_K9HB99		C P D Q S K P H V E Y T Q L L A H A T G K D K L T M K D L A K Y S S K		
UniRef90_R7SJY6		D Q G K □ A H G L V E R V L A G T G N G N L T K K D L S R R L L G Q		
UniRef90_J3NL98		D N H S F N P A L W A T T A A R F P G N G T I D I P T A A A A R K A		
UniRef90_V2X6M8		D Q S K P H □ P F V E E L L A S A S G K D T L T V D D I A R Y S A K		

170	180	190	200
<p>UniRef90_W3XLG4 UniRef90_Q0UJQ4 UniRef90_K1WHK5 UniRef90_G3Y488 UniRef90_B2B6C6 UniRef90_N1PL25 UniRef90_M3ATT4 UniRef90_N1Q994 UniRef90_F9XN56 UniRef90_Q00668 UniRef90_K1Y0V2 UniRef90_M7SGJ9 UniRef90_F9XMQ2 UniRef90_M3BR78 UniRef90_B8MBG0 UniRef90_W9CCX2 UniRef90_V2XT66 UniRef90_N1PJI6 UniRef90_M9MF53 UniRef90_M3D002 UniRef90_L2G1W8 UniRef90_S7ZUQ7 UniRef90_E3QNH5 UniRef90_UPI0004449FD3 UniRef90_M7TME0 UniRef90_E3QP26 UniRef90_G2X439 UniRef90_K3VC40 UniRef90_G4N266 UniRef90_R4XCT8 UniRef90_M2YNP2 UniRef90_F9WX8 UniRef90_H1W2K3 UniRef90_V2WX44 UniRef90_W3XMK4 UniRef90_M3A712 UniRef90_B2W1J0 UniRef90_Q5ATI5 UniRef90_E2LMD4 UniRef90_L716M5 UniRef90_A8NL28 UniRef90_M2MX91 UniRef90_D8PX36 UniRef90_U4L7I2 UniRef90_B8LZ19 UniRef90_N1PNG4 UniRef90_UPI000444A508 UniRef90_W9CW20 UniRef90_W3X364 UniRef90_F9XB21 UniRef90_F0X6W8 UniRef90_G2XSS1 UniRef90_R1GXJ3 UniRef90_W9VVW8 UniRef90_K5X0C8 UniRef90_UPI0004414A66 UniRef90_B8NW63 UniRef90_K5VUE7 UniRef90_Q0U0A6 UniRef90_A8POW1 UniRef90_UPI0004412B68 UniRef90_K5JMW4 UniRef90_Q4PGE1 UniRef90_E3RHH6 UniRef90_E7A211 UniRef90_V2WPS5 UniRef90_Q0U7J4 UniRef90_B0D4Q6 UniRef90_L2GBA1 UniRef90_F9XF63 UniRef90_L2GC81 UniRef90_M3AU56 UniRef90_UPI000440DBD5 UniRef90_N1RPK6 UniRef90_F9WXP9 UniRef90_N4UXS2 UniRef90_S8E3N2 UniRef90_M2UW13 UniRef90_R0JPK9 UniRef90_A1D8W4 UniRef90_E3RU44 UniRef90_F9G8E6 UniRef90_B2ADX1 UniRef90_H1VNH1 UniRef90_M1VXG2 UniRef90_M4G1C6 UniRef90_R7S4R3 UniRef90_Q0TWP8 UniRef90_K9HB99 UniRef90_R7SJY6 UniRef90_J3NL98 UniRef90_V2X6M8</p>	<p>R Q I Q S R A F N P D Y S F S P N E E F S L G E V A A P I L V F G N M R R W N D S V S T N P A F W Y G P V T G M V A R N A A M F F L G R L L S N H T A E R F D Q S I N N N P P F F N A P F A G I A V Q P A G Y A F I Y R F M A N K S A E R L N T S K A T N P D F S L S D G I A F S G E S A A Y M L A F E E M V Q D S R K R N P D F T Y V T H R I T S Y G E T I K Y L R T I V E R V H T Q R K L N G N K Y S G R Q L V L S L V E T S L Y M S L M G N R F D H Q I A T N P Y F F N G P F T G V L V Q P A A Y T F I Y R F M A N H S A E R F D D Q I A S N K Y F F N G P F T G V L V Q P A A Y T F I Y R F M A N H S E T R F D R S L L N N N P P Y F F N G P F P G L L V Q S A A F T F I Y R F M A N H S E A R V L D S R E K N P S F L Y Q D Q Q L I S Y G E T I K Y F R T M V D R K Q H S I A T N P Y Y F S P A Y A G A I F T F G A H M F A Y E L L A N H S A E R Q A T S K A T N P T F N L S E G T V F A Y A E T A A Y I I V L G D R K K Y S I A A N N P N Y Y S P A Y A G V A F T F G A H M F A H V L L A N H S A E R K K Y S I A A N N P N Y F A P V Y P G V A F T F G A H M F A N V L L S N H S A Q R Y Y E S V A T N P N F Y Y G P F T G A I A R N A G Y I F A G R L F R N H S V E R Q I V S R S T N P N Y T F S T Q Q F S L G E M A A P I V A F G D K Y V V R L E D S L A R N P N V T N S G T E L V I R F E S L Y L S V M G N A S N V K K S K A N N P T S L Y G P Q Q F I S S G E T A L Y V Q T M D S A W D S S R Q N N P D F D F N P R M L V A Y G E S G F V H E A L R G S S A K F D R Y Y E S I A K N P N F A Y L P F S G I E V S Q A A F T F I Y R F M A N K S A E R Q K T A K A V N P E F F N L P L D G Y T S L G Q T A M Y L G L F G D Y R V D T S N A T N P T F S L S A A K K T T F I E S S A Y M L A F G D R F R E S I E T N P N F Y Y G P F T G M I A R N A A Y F F A C R M F S N Y S S E R L E D S I A R N P E L N T N K E F T I R T E S S L Y L A V M G N A S R Q I T S R A F A N P D T F T S T E A F S L G E L A A P I L A F G D M R I A T A K A T N P Q F D L P T S Q T V S L G E S A V I L G T I G Q S R Q V T S R A T N P T Y T F T A T M Q F S I G E V A A P I I G L G D M R L Q V A A A N N P E F S M T A E Q K I S L I E T S L Y L T V F G N R H A A A A K A A N K D Y D L P E E Q M F T F I E S A L Y Q S V F G K R F T D S V E N N P N F F Y G A F S G I Q V S Q A A F T F I S A F M S N H S A E R Y D Q S K R D N P N F F F G P L S L L L Y G A A S F L Y E L F P S G R T D D S E A T N P E F V Y G A R E F I R Y G E T S L Y L Q T M G G S H A L E M S R V N P N F T T L P E S A I A A T G E C A F I L T I F G T P G R T E Q S R A T N P N F R N T K E F Q I R T R E S A L Y L S V M G D R W Q E G V A T N P Y F W Y G P L T G Y L P R T G G Y A L T S R T M S N Y S E G R K K Y S I A A N N P N Y F S P P Y A G V A F T F G A H M F A F Q L L A N H S A T R Y G E S L H E N P N F F F G P L S L L L Y G A S S F L Y E L F P S Y R Q I T S R A F N P T Y T F T N S E Q F S L G E V A A P V V A F G N L N R H A D S L A A N N P N V T N K E F Q I K I A E A G L Y L S V M G A R Q K T A Q A V N P K F N L P L Q H T N S L G Q T A M Y L G L F G N Y R I Q Q S F A T N P E M S F S P R W F V A Y A E S M F P I L F F V D G R N H D R F T E S I E K N P L F V Y G P F E G M A V S Q A A F T F I Y R F M A N H S A E R R V Q A R A T N G A Y S L E K H Q K F S A A N T S T M L R I F G G T L Q D S I S T N P Q F F Y G P F S G L L V L S N A G H C F I P G M F A N F T Q D R I E T S R K T N P H F F D L D G S T A T T A S Y L S I F G D T R K L H S I A T N P N Y F S P A Y A G V A F T F G A H M F A F E L L A N H S A A R D A A L S K P L D A I H Q V I T R G E V A L T C E V L G D G R L E V S I A T N P Y F Y F G P Y T G L I V R N A G Y A F S G R L L S N H T I E R L A T S Q A T N P N F T L S G L A G F S W G E C A S F E I L M A D R F R E S I E E N K Y F Y Y G P F T G L V A R S A S F C F V G R L L A N H S D G R F T E T V A S N P P Q F Y Y G P F T G M I A R N A G Y I F S A R A M F A N H S A A R F N N S I T T N P Y F F S S P F A G V L V S P A G Y N F P V R M M S N K S A E R F D D S I N R N G H F F F S P F A G V L V S P A G Y S F P P A M M S N H S A E M L N E C I A T N P Y Y C W Y G P Y T G A I A R N A G I A F T L R L L A N H S A E R R I Q D S I A T N P Q F S F S P R F I T A Y A E A A F A I V F F V D G R K N D K R Q I S S K A Y N P T Y T F T S T S M Q F S L G E V A A P I I A F G D I R R I Q D S I A T N P Q F S F S P R F I T A Y A E A A F A I V F F V D G R K N D K R M L E S V Q H N P Q F A L S E L A A F S A G E G A G Y M L V F G N R R V D A R E T N P E Y T L S K H R T F G S A N S S T L L T I F G G R R E H S R D T N G Q F T M S F H K M F S S S N T S T L L T V Y G G R A L E E R K P L N W V H R G L A H G E S A V A L L V F G Q Q G K P R V K A W D W S R K N N P V F D F N P R M L V A Y S E S E S G F V H E V L R G S F V K F D R F E D S K R N N P E L V F G K E E V L S L A E N A L V L I Q T M G G M A W E Y G R S N N P V F D F N P R M L V A Y G E S G F V H E V L R G S F V K F D R H A D S L A A N D P N I T N T K E F Q I K T R E A A L Y L S I M G D N T R W S V A N N P Y Y F S G P F S G V A P A A H N F V I H F M S N H S A E R R A E S R A N N P E F S L D L F H K M F S S N S S T L L T V F G G H A L Y M S E I N P S F S I T Q E I V I V G E N A F M L A I F G H H R Y D Q S V A E N A N F F F G P L A L L L F G A A S F L Y E L M P S G R L Q A A A A A N P E F S L T A G V Q F S F I E T A L Y L S I F G N L R Y D D S V A H N G N F Y Y G P K S L L L Y G A A S F L Y E L F P S K R E T D E M K A G K E A L D G F H A E I A R G E M A I A L G M F S K D R F Q D S E K T N S H F Y Y G P F A G V L V S P A A Y S F P P R M M A N H S D K R F L E S I N K N P Y F T Y D P F A G I L V V S Q A A F T F I Y R F M G N K S L E R V K A A M S S N P S L R L S E Q V G I T F I E P A L V L G V L A G D R E S A Y G A P P L D A M H E E I A R G E M S M V L G I F G D P S Y R Y D D S V S N N P N P F L F S P L A I L Y G A A A F L Y E L F P S Y R R W A Y S V A H N P V F Y Y G P V T G M V S R N A G Y F F L G R L L A N H T A E R R A E C K R T N G Q Y S M T L H Q F F G S G N N A L M Y S I F G G R Y D E S R R E N P N F L F G P L S L L L F G A S S F L Y E L F P S Y R W H Q T I A T N P Y A W F G P A S G W L V R A S P Y S F T A R L A A N R S A E R M K T C K S T N P Q Y S L S L G E A F I L G E T A A F I S I L G D A Q A L D M S V L N P E F E I T P E I P V I V G E N A M L L S I F G S P R K L H S I A T N P N Y F A P P V A S L A F A P A H T F V W A L M A N H S A E R I A A A K A A N P K F W G T N G E T F S Q I E T A L Y L S V F G N L R L E D S V A R N P N I W L A Q H A L I A Y G E A A L Y L S V M S A P I I A R Q I E S R A S N P Y Y K F T A S E E F S L G E V A A P I I A F G D M G R R A D A R S Y N K K F T L G F I H R M F G S S N S S T M R R V E A K R N N P K F S L A F I H R I F G A S N A S T L L T F G G R L A A A K A A N P E F D I T L G E Q F S Q I E T A L Y L S V F G N R R A D A Q A N N P E F T L A T H R F F G S S N N A T M L R I F G G N</p>		

210      220      230      240

This image displays a detailed multiple sequence alignment of protein homologs from the UniRef90 database. The alignment is organized into four columns, each labeled with a residue number (210, 220, 230, 240) at the top. The sequences are shown as rows of amino acid residues, with gaps represented by dashes. Colored boxes highlight specific residues or motifs across the alignment. The first sequence on the left shows a prominent yellow box around residue 210. The second sequence shows a red box around residue 220. The alignment spans approximately 100 residues, with the first 210 residues being particularly well-conserved.

250                    260                    270                    280

UniRef90_W3XLG4	T T Q L I R N A M D L L T G F		
UniRef90_Q0UJQ4	L N L D I V S W M K H P V L G S I G G N T G T V N S F S G L D M H N I T G G V		
UniRef90_K1WHK5	F V A D V V A A A L A F P K F V S V G G N T G T V N S F A G L D L A N L T G G V		
UniRef90_G3Y488	E V L E L A L I T P E K L P		
UniRef90_B2B6C6	M A A Q V A S S K P K D L L I D L P N L N		
UniRef90_N1PL25	F L A D V A N A A A L Y P K F L N V G G N T G T T N S F T G I D V R N L S G G V		
UniRef90_M3ATT4	F L A D V L N A A S L H P K F L D I G G N G T G T T N S F T G V D V A N L T G G V		
UniRef90_N1Q994	F L G D T V V A A G L H P K F L N V G G N L G K T N N F A G V N I N N L		
UniRef90_F9XN56	D V V Q L A L R T P E		
UniRef90_Q00668	S T G Q Q C L A Y P S N C V G G N T G T V N S F A G V D L G D I S G G L		
UniRef90_K1Y0V2	A Y E R V V V N A T		
UniRef90_M7SGJ9	S T A A Q Q C A A Y P S N C Q G G N T G K V N S F S G V N L G D I S G G L		
UniRef90_F9XMQ2	S T A A Q Q C V S Y P S N C Q G G N T G T V N S F S G V D L G D I S G G L		
UniRef90_M3BR78	D L L G M A G K Y P E L L G G N V G S V N T F S G V D L S N L T G G L		
UniRef90_B8MBG0	V T E V L G N V I T P N P D S L A K R Q M G H W G Q S I		
UniRef90_W9CCX2	L G T S I A E E S H W N A T D E C P T I P L G		
UniRef90_V2XT66	Y I T Q L S A A N P		
UniRef90_N1PJ16	W A G I I E L A K P T L P G W S V G K K G A F V P L		
UniRef90_M9MF53	F E A D I L Y F A E T V P E V L G L G C N K G A V N T F S P I D P S Q L		
UniRef90_M3D002	L T T K V A V H Y L A A		
UniRef90_L2G1W8	M S Q K L A I A T Q E I		
UniRef90_S7ZUQ7	L D L V A L I L K H P E L G S I G G N M G E I N S F A G V N L G D L T G G V		
UniRef90_E3QNH5	I A Q E I K A A S E W P		
UniRef90_UPI0004449FD3	V S G L I G D A T N L L T		
UniRef90_M7TME0	L S Q L I A T S S		
UniRef90_E3QP26	V N E I I I T N A T S L I T G E P V P G		
UniRef90_G2X439	M V N K V A Q A S A		
UniRef90_K3VC40	L T T K I A A L T V		
UniRef90_G4N266	D A A R I F A Y D P R T V S V G G N L G E T N S Y A G I N L E D I		
UniRef90_R4XCT8	V T A E I V K M Y L L H P V L F G G N T A A G S F N A P S N F G A I K N G Q		
UniRef90_M2YNP2	M I F E L F G A N P N A A P E G V		
UniRef90_F9WWX8	T I Q Q I A N E I V A Q T P S D V P		
UniRef90_H1W2K3	L F G A I A Q G S G W T P E A G C P W V T L A Q G A P E D P V N D G S I L		
UniRef90_V2WX44	L D L L K W S K K H P F L L D I G G N T G Q V N T F T G L D L S N I T G G L		
UniRef90_W3XMK4	S T A A Q Q C A S Y P S A C V G G G N T G E V N S F D G F D L G D I S G G F		
UniRef90_M3A712	U H I A Q Q C A S Y P S A C V G G G N T G E V N S F D G F D L G D I S G G F		
UniRef90_B2W1J0	V T E E I L A Q Y L Q A P K L F G G N V G K D N F E T P F D V I K N G K		
UniRef90_Q5ATI5	L S R I I L A Q Y L Q A P K L F G G N V G K D N F E T P F D V I K N G K		
UniRef90_E2LMD4	I I A A D V A L T F Q W P D P D R C P W F V L A P G G T E N P F R D G S I M		
UniRef90_L7I6M5	L G L T V Q V A		
UniRef90_A8NL28	L V T D I L Y F T E S N P Q L S L V G C N E G T V N S Y Q N I D A G T L		
UniRef90_M2MX91	F Q D T V K A V A A G I D		
UniRef90_D8PX36	T V F A Q L I R M A S K Y P Q L L V G G N T G R V N S F V G F D L G N I T G G I		
UniRef90_U4L7I2	L A T R I L A N		
UniRef90_B8LZ19	S T A A Q Q C A S Y P T N C Q G G N T G K V N S F S G V D A G D I T G G F		
UniRef90_N1PNG4	V S N K V A T V A K I L S K S I G G N T G Q V N T F T G V D L S N I T G G V		
UniRef90_UPI000444A508	L L T W I G K N P I L G S I G G N T G Q V N T F T G V D L S N I T G G V		
UniRef90_W3X364	L D I I S M A V R H P V L A S I G G N T G T V N S F T G V D L S N P A T G L		
UniRef90_F9XB21	I V A L I I L K Y P Q L A S I I G G N V G T V N S F A G V D L G D I T G G V		
UniRef90_F0X6W8	F L A D V V D F A L Q Y P P L L D I G G N M G S P N T F A P V N L G S I T K G V		
UniRef90_G2XSS1	F L A D V L S Y A I L R D P R L L S V G G N T G E P N T F T P V D I G D L		
UniRef90_R1GJX3	L V K W F V Q Y P Q L A S I G G N T G T V N S F T L L D I R D L S G G L		
UniRef90_W9VVW8	V L A A H P I E P G T N V N G V N T Y T P D P T S G		
UniRef90_K5X0C8	D V V L N S L I G A H P V L P G S N V Q N P G T F H W V D K S E T L T K Y		
UniRef90_UPI0004414A66	V T Q M I S N A T N L I T P S R G A N N G A V N T Y T P D P H S G D		
UniRef90_B8NW63	E T I I T A A H P I A A		
UniRef90_K5VUE7	F S D D I I N A T S Y		
UniRef90_Q0U0A6	N L K T V H K V E G G I D E E K Y I		
UniRef90_A8POW1	L N A V V L		
UniRef90_UPI0004412B68	L L N T V A T R T R Q Q D		
UniRef90_K5JMW4	W A G I I D L A K P T I P G W S V G K G A F		
UniRef90_Q4PGE1	M S V E L L E K S P D T G G E L G T V		
UniRef90_E3RHH6	W A G I I L A P K P T V P G W S V G K G A F I P L		
UniRef90_E7A211	I A R D V I A F Q W P D P N R C P W I V L S P G G V E D P A R E G S L		
UniRef90_V2WPS5	D V Q V M N A M Y P G I V R V G G N T G T T N S F T G V N L G D L T G G V		
UniRef90_Q0U7J4	F Q P T V L K V		
UniRef90_B0D4Q6	F V Q D I I A Q S P P D V P		
UniRef90_L2GBA1	V R E I I L A M Y L E A P V L F G G N T A Q G K F L G L D F G A I K E G K		
UniRef90_F9XF63	L V S K V I A A A S V		
UniRef90_L2GC81	E I F K Q Y E A Y P V A F G G N T G K P N S F V G L		
UniRef90_M3AU56	U A R E I K G A M E K I		
UniRef90UPI000440DBD5	V D V L E H A A K Y P R L L N I G G N T G K V N S F S G V D I G D L T G G V		
UniRef90_N1RPK6	F F S D I R Y F A E T Q P E I L A V G C N Q G R V N S Y N G I D P S V L S G G		
UniRef90_F9WXP9	L A G E I K K A T P K A Q E F		
UniRef90_N4UXS2	T S Q K I R S A M		
UniRef90_S8E3N2	A V T E I L T M Y L Q Y P K L F G G N V G T G N F S T P F D I		
UniRef90_M2UW13	T V G W V M K H P E L G S V G G N T G K V N T F T G L D L H D I T G G V		
UniRef90_R0JPK9	A V S K T L		
UniRef90_A1D8W4	L V T T E I L A Q Y L Q Y P K L F G G N A G K D N F		
UniRef90_E3RU44	A A N A L D I V T H S H P E V L S I G G N T N G V N T F V G I N F N D L A G G V		
UniRef90_F9G8E6	N L Q A V A V		
UniRef90_B2ADX1	L I Q E M I G L S P S D V P		
UniRef90_H1VNH1	G V A S Q C L A Y P S T C I G G N T G T V N S F Q G I D L G D I S G G L		
UniRef90_M1VXG2	L K N K I V A A S A S		
UniRef90_M4G1C6	T V A Q I L V F A		
UniRef90_R7S4R3	V T D M I R N A T S L I T G T P V		
UniRef90_Q0TWP8	F N L T V		
UniRef90_K9HB99	F N L T V		
UniRef90_R7SJY6	F N L T V		
UniRef90_J3NL98	L R N K I N D A A		
UniRef90_V2X6M8	T A L K I E N S T		

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L N S V S L L E N  
 F N S A T L L

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 T G G V F N G A D L L K G N N

V N S V T D L S N P

V N S A T D L S D P A  
 I N S A T D L Q D P  
 L N A A N L L E G N N

T S G A Y T A Q Q I A K S P

L S L S K L L E G N N

I P S T T G G V Y N A Q N L A E G D N

L N S A T L L E G N N  
 V N S V S D L S D P  
 L P S T N L G C F L Y Q L A T G P

S N G A Y S A Q D A A A N P

Y N S

L N S

L N A E T L L E G N N

A N I P S L L K S  
 L N A F Q T G S  
 T G G V F N A A T L L E G N N  
 L N A A T L L E G N N

A D T N C A V Y E A

F N S F C T V Y T

F N A G S L A

L D A

A Y S S A D V A K N P

L N S A T L L

L N G K N L L

I N V A E D L Q D P T

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R R	A R P I D L Y Q I G K H N V I E H D A S L	L V H H D T P G G E E
K L S V T C S K Q F S T F D L G G T A L H G C I	E H D A S I S R S D F N S A S	
G H W D G L S C K	[L] D L H D L A K H N V I E H D G S	L V H D D T A P G E T
K R	G N G T F D L E D T V K H N V V E H D G S	M S R N D E A [L] G
T T G N	T S T V N A D M V K H N V I E H D G S	[L] S R A D
G D F V T T K L S I G T G N Q P G L V G H N K F E	G D S S L T R G D Y F P	
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G D P L S L T P G F S L D G Y H G I G K H N W L E A	D A D A A P G Y L	
G N L L T D L L S P P P A N I G G L S E H G L F E	G D A S M T R G D A F F G	
G I A N P T P N S T F F T L D H D L N R H N V L E H	D A S I I S R T D A Y F G	
S S L S D L Q R H G I L E H D A S L	L S R Q D A A I Q G	
G N Q L T N L M S I G D A S R G G L S V H G T F E	C L H V D Q F D G A A	
P G G S T W G L D T L S K H N I L E H D G S	L S R Q D	
G D L V G T T L G N A L A D E L G L D G H N H F E	A D T S L T R N D Y F L A N	
G L V V N P N N T A D R W D L Q Q L R A H N T L E	H D A S L L S R A D D Y W N	
T T S S T S N T T F N L D D L D K H N I L E H D G S	S R A D I F S G	
G D P I T Q K W S I G G F S P D L L G G H L K S E	G D A S I T R G D F L A P T M	
G Q W K H M S L S D L L C R H N C I E H A A S I	V H G D P K K Y D Q	
G Q F R R L S L G D L A R H G A I E H D G S	A R R N A R A T S E	
S L S T T G N S S T F H L H D T L K H N A I E H D G S	M S R N D V Y	
G D I I T T R M S I G T A P L G G L D T H D T F E	A D D S S L T R N D Y Y L A N	
L Q F R R L S L S L S D L L A R H N C I E H D A S I	V H P D V K	
P T P N A T F F D L E M L H A H N V I E H D G S	L S R K D A I F D S T	
G L F S Q P S S H R S K Y E I H D A S P T R P D L	Y Y D P L	
N R D P A S D S F D L S D L S V H N M I E H D A S F	C R K D I Y Y D P L	
G S N G K L D L A Q L A K H N K I E H D A S L A H	L D F A D G	
K A F G H D V F D L V D L N T P G I Q H T S L	L T R D D Y T P	
G D P L T G R F S I C A Y G H N H I E A D A S M T	R G D W A P S Q	
G L T T G N I S T F N L D L K K D D V E F D G S L	S R N D A F F G	
G D P L S D T W S I G F P A R G I I G T H N K Y E G	D A S I M R G D A Y L H G G	

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UniRef90\_F9XFB5  
UniRef90\_K5WZ35  
UniRef90\_V2YBC5  
UniRef90\_R7SZH5  
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UniRef90\_A0A010S2U1  
UniRef90\_F9WZN5  
UniRef90\_B2W220  
UniRef90\_T0KRR9  
UniRef90\_K5XIK0  
UniRef90\_M2MZ01  
UniRef90\_B9W4V6  
UniRef90\_N1Q4B2  
UniRef90\_M4GG76  
UniRef90\_K1WMB5  
UniRef90\_N4VYMO  
UniRef90\_Q0V4S4  
UniRef90\_A7EJ11  
UniRef90\_W3WRL0  
UniRef90\_M3D0V9  
UniRef90\_E3R0S8  
UniRef90\_Q0TVR6  
UniRef90\_B8NCA0  
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UniRef90\_C5GUV9  
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UniRef90\_F9XD69  
UniRef90\_M5FX63  
UniRef90\_E5R441  
UniRef90\_S3CWT4  
UniRef90\_UP100044095FE  
UniRef90\_UP100046214F8  
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UniRef90\_B2W710  
UniRef90\_UP100044074B7  
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UniRef90\_B6HRF0  
UniRef90\_K5V3F8  
UniRef90\_N1PFG1  
UniRef90\_S3CVA0  
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UniRef90\_K1WBL7  
UniRef90\_M5FYQ1  
UniRef90\_M3AEY5  
UniRef90\_W4KDW4  
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UniRef90\_S7ZGE8  
UniRef90\_J6F9L8  
UniRef90\_M3AKZ7  
UniRef90\_F8NK37  
UniRef90\_N1PBS9  
UniRef90\_E3S0Q5  
UniRef90\_W2S578  
UniRef90\_D3VN13  
UniRef90\_W3WL34  
UniRef90\_U9SS01  
UniRef90\_UP1000441266A  
UniRef90\_M2TGH4  
UniRef90\_N1PQX4  
UniRef90\_M3D222  
UniRef90\_S3D0K7  
UniRef90\_U5H750  
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UniRef90\_M2RQQ6  
UniRef90\_W4KCK9  
UniRef90\_W3XQ26  
UniRef90\_R4XEH7  
UniRef90\_F8ND28  
UniRef90\_A0A010R4H9  
UniRef90\_E5A685  
UniRef90\_R7SIX5  
UniRef90\_M5BR77  
UniRef90\_G0RQQ6  
UniRef90\_H0ETA8  
UniRef90\_B8MRF3  
UniRef90\_N1PK21

Sequence positions: 130, 140, 150, 160

170 180 190 200

R D A T [H A P] [L D S [H A Q] I A R G E A V L T L A V F G D R G F R D D  
R F D [H Q K A T N A Y W F N G P F T G V L V Q P A A Y T F I Y R F M A N H T Q E  
R E K [L S K P] [L D P] [V H A E I A R G E M A I I L G V W E Q K S K D K V  
R L E N S L A T N N K T V N T K E I T F R S T E A A L Y L T V M G R G D  
R Q D A S R P I [G S V P A V V S K G E L D L I Y E V F G I V P G S K E  
R F A T A K A L N P Q F D M S G D S L A N T F V N H A V W Q L S F G D R V E G N  
R I S A A M A E N P Q F N L T P A Q K T S F A E S A F I L G V M A G D  
R Y Y E C R A N N P N F Y F G V L S L L L F G A A S F S Y A G F P G A S H  
R L E T S K S T N P Q H K T S L L A G F S W G E C A S F F E I M A D G T T S  
R F E W G E K F N P E F N A T F A R S G S L L Q Y A L L L S A F G D Y  
R I Q E S I A T N P N F S P R F F T A Y A E S V F P I N F F I D G R Q G D  
R W H Q S Q A E N P N F Y F G P L T L L Y G A A S F S L Y E L M P N G N H  
R I Q D S I A T N P N F S F V D F R F F A Y G E T T F P A N L F V D G R  
R Y D W S L N H N G N F Y F G P K S L L L Y G A A S F S L Y E L F P S L  
R I L A A N A S N P G F N L T E A Q G V A T A S A F V L L F G N G  
R Q L E M R A F N P N F T T P S E R V T F S E M A A L F V F G D I  
R F D A S K A E N P E F Q V T D N Q R G S L L E M A I I A R L F Q  
R V Q N S K T R N S K V Q Y G D A Q R F S Y F E S S A Y Y Q L F K D P N S S  
R Y Q Q S L R D N P N F Y F G P L T L L L F G A S S F L Y E L M P S G  
H A L D M S R V N P D F A I A E S V P V L V G E N A M L V A I W G D P V V Q  
R F A E S I E K N P Y F Y Y G P F S G T T V S I A A Y S F I Y R F M A N H T A E  
R I R T S A G T N I D F E M R L E D N L R G L G A G F Y L T L G D  
R K K H S I A T N P F Y F S P A Y A G V A F T F G A H M F A Y H L L A N H S A E  
R Y G L A M S A N P Q F N A S E L K Q F Q Y G T T A L Y L L T L W D N D H N A  
T Q Q Y S E S E S N N P H Y S A P F S A V T P A A H N F V I G F M S N H S A E  
R Y D Q S L R D N E N F Y F G P L S L L L F G A A S F L Y E L M P S G T H  
R F E Q S I L Q T N P E F Y Y G P V T G F I A R N A G Y L F P A R F F R N H S S E  
R V A V A M K T N P T F N M T E A Q L L S F A E S A F I L G V L A G D  
R R V E A K R T N P T K Y S S T F T H K M F G A S N G S T L L T L F G G  
R F D D Q I S S N P F F F N G P F T G V L V Q P A A Y T F I Y R F M A N H S V E  
R I Q E S I A H N P D F Y F S P R F N T A Y A E A V F P I A Y F I D G R V Q G D  
R Y E A S K A D N G N F F F G P G S L L L F G A A S F L Y E L M P G S S H K P D  
R Y Q Q S L K D N P N F Y F G P P S S L L L F G A A S F L Y E L M P S G  
R F N D S I S T N P Y F Y Y G P V S G T I A R N T G F C F V A N L M A N Y S S G  
R I A E S K A T N P Q H V F G L A Q S I V D I E T A T Y T F G T G G  
V T R W S L L N P Y Y F S A P F S L V A P V A H N F V I N F M S N H S A E E  
R F Q E S K F E N P Y F Y Y G P V T G L I N R N A G Y I F P G R I F R N H S R E  
R I Q D S I A R N P T F R F S P R V S T A Y A E S V F P F A Y F I D G R L V G D  
R R S E A K A Q N P Q Y S E S S F H N M F S A N S S T M L T I F G G  
R I A E G P K L N P E G F S S E D L R F S A I E T A L Y L R V L G R  
T M Q Y S V E N P Y Y F S A P F S L V A P D A H N F V V N F M S N H S A D  
R R T D S R R K N G Q F T L T F H K L F A S S N C A T L I R I M G G  
R Y D E S V A T N D N F F F G P L S V L L Y G A A S F L Y E L F P S Y  
R F N D S L T T N G Y F F F G P F A G I L V A P A G F S F P V R M M A N H S D E  
R D S E A R P L D P V H S F I T R G E L A L I L A M G V P N G E N  
R R V E A K R A N P E Y E S L S F H K L F G S W N C S T L L R I F G G  
H A Y E M S K I N P E F T I T Q S S L T I M G E S A M M M L V W G S  
R Y Q Q S L N E N G N Y F G P K S V L L F G A A S F L Y E L F P S F G G F  
R Q K D S H L T N G N C D L S A R V N S C G Q A G I P T V F G S  
R E D V E G P R E G T E V T S V Q Q E I L A R G E V A L V L Q I F G  
R I Q D S V A C N P N F F F S P C F N T A Y T E A I F P I A Y F I D G R V K G D  
R W D Q S V E E N P N F Y F G P L S L L L F G A A S F L Y E L F P S  
R R L Q O A K T H N P N Y T R S L F H D V F S S N N A T T L T I F G G  
R M D E T I H T N P D F Y Y G P V T G L I A R N A G Y I F P G R I F R N H S A E  
R R M E S K R R N G Q F S L T F H K F F G S S N S S T M L T I L G G  
R V Q D S Q K R N P T F T Y G P E F L L S Y G E A A L Y L S V L G D  
T H T D S I Q N N P Y Y F S A P F A L V P P I A H H F I V N L M S N H S A D  
R Q A A S P P L H A L Q S I V S K G E L D I M E V F G I H A S E T L  
R E A H R A A G K E F E Y G V K E F I L S Y G E S A L F L G I L G G A  
R R A D C R R D N S Q F S M T F Q K L F S S S N C A T F I R T F G G  
R Y N A S K A D N G N F F F G P G S L L L Y G A A S F L Y E L F P T A G G T A D  
R D A A I S Q P L S N V H N V I A R G E L A L T C Q V L G D  
R Y S A S R A S N P Q F Y F N P S A A V V M G A Y Y F I P G F F S N G T L A N E  
R F D E A I Q T N P D F Y Y G P V T G L I A R N A G Y I F P G R I F R N H S Q E  
A Y Q D S V Q N N P A V D F S T R H L I A Y A E S G F A M E V F R G A N V S C  
A Q N E S I A N N P Y Y F T G A F S T V V V P A A Y N F V I N L M S N H S A E  
R E R G L K R P L D M V H A A I G K G E V G L S W L L K  
A Q D E S I A N N P Y Y F T G A F S T V V V V P A A Y N F V I N L M S N H T A E  
R Y A A S K A A N S Q F Y F N P S A A V V M G A Y Y F I P G F F S N G T I G A G  
G L H E C I A T N P Y C W Y G P V T G M I A R N A G M A F A I R L M S N H S T E R  
R I Q D S I A T N P E F N F S P R F S A A Y G E S V A P N N F V D G R  
R Q I E S R S T N P E Y T F T T H E P F S L G E M A A P L I V F G D L  
R Y T D S K E R N K D F Y Y G R Q S L S F G E S S L L L C V I G G A  
R I Q D S I A R N P T F D F G P R F A T A Y A E S V F P L A F F I D G R V K G D  
R M I L D S L K I N P Q F S I T P A V G F S H L E T A I Y M I V F G D R S K K  
R Y S A S K A D N G D F F F G P G S L L L Y G A A S F L Y E L M P T A N  
R Q A K S K F T N P E Y F F F N M K A E T F S L G E V L S L V A W G G D  
R L A A A A A V N P A F N L T A G A Q F S F I E S A L Y Q S V F G D A  
R K L Y S I N T N P N Y F S P A F A G V V F T P A A H H F V F A L M A N R S S E  
R E E E D Q C P L D K M H A H I A R G E L G L V L D I F G  
R E N S L R V P L D H M H A E I L A R G E M A L V L G I F G G A S A V E A  
R I A K A K E A N P E Y E A I N N S S A G L G E T A L Y E I T F G D R  
R Y D E S L A T N G N Y F G P K S L L L Y G A S S F L Y E L M P T A G  
R E K I C R P L D G V H S E I A R G E M A I A I G V L G G K N A D K E  
H A Y D M S L I N P T F S I T D A Q I V I V G I N A F L L A I F G D P D V A  
R F D T Q I K N N P D F F N G P A G V L V Q P A A Y T F I F R F M A N H R A E  
R R V E C R K N N P Q F S L S L G Q F I G S T N A A F I L K V F G G V  
R E R Q V L P R T L S T A H S V V A R G E S V L G V L V M G D G Q H M  
L L Q E S E P R V L P D N Q V T F T L F E A A M T L T M M A D H S P D A D  
R R Q H S I S T N P N Y F S A P F A G L F N F G A H M L A Y T I L A N H L A E  
R V R D A M R L N P V F N A S A E M T G S P G T T A L Y L T L W D  
S R Q Y S L A N N P Y Y F S A P F S L V A P A H N L V I N L M S N H S A E

210      220      230      240

UniRef90_J4I8H4	D D E R A I P K A Y I I E Q W F G E D R I L P D G W H R P S K K V G L I S V T L
UniRef90_F9XFB5	R P E G I L T Y D T L K S W F G V E R I P D N W Y R R A L E Y P Y E T T Y F
UniRef90_K5WZ35	G V P V D W M K W R L G H E R L P D G W R P D H T E G L L D V I R
UniRef90_V2YBC5	P K S A Q A S K R F V D T I F R E D R I L P A E G W K K A E V K I T N E L L M P
UniRef90_R7SZH5	A S E T V V P K S Y L K Q W L G Q E R E R L P D G W K G P V N A I T L T S L
UniRef90_E9F6S4	A N T L F T R V I F G K V V L E E R E R L P F K E G F V R P C Q P I T G S D I A N
UniRef90_A0A010S2U1	F K A P M A P T Q F M N I I F E Q E R F P F N E G F K T S A T K V T G D Q V D A
UniRef90_F9WZN5	Q P D L Y T M T Y F F V H E Q I P P N W Y N R V D P Y N N Q K V T D
UniRef90_B2W220	T V R K D F I E F W L R N E R I L P T E I G W T R R P T V M E T S E R T K
UniRef90_T0KRR9	G D A N K T L V R Y W V E N E R I L P S L G W Q P P A K P I I H
UniRef90_K5XIK0	G Q L D L D V A R G F F Q N M R M P D G F H R A S M P T G L E G L
UniRef90_M2MZ01	N Y A P D L E T I S S F F G E E R I P D Y W V N R V I P Y D N T
UniRef90_B9W4V6	R D D G Q L D M D A A R S S F F Q F S R M P D D F F R A P S P R S G T G V E V
UniRef90_N1Q4B2	G E L G T A D P T Q M S Y F F Q K E E L P P N W Y S R V D P Y T I P D V
UniRef90_M4GG76	T E G N A D R R Q T R V L F E E R E R L P F K E G Y R T P D R P V T A A Q V G E
UniRef90_K1WMB5	P S G T V S R E Y V V S W F E N E R I L P T E L G W T K S S T E L T Q S I I Q E
UniRef90_N4VYMO	T N A G G A S P E W I R V L F E E R E R L P Y L E G W A R P S I E T T L D D L A K
UniRef90_Q0V4S4	K A R V D W I K V F F Q E E R M P V N E G W K P V N H D G F S V A Q V
UniRef90_A7EJ11	T K N Y V P D Y E T I S S F F G A E K I P A N W T N R V T P Y T T V D V
UniRef90_W3WRL0	V I D R A Y F E Y F F F R N E R I M P V E L G W S P P S T E I G P
UniRef90_M3D0V9	A P D G V L N G E V L K S F M G H E R I P P E N W Y R R S L T D G Y E L D G
UniRef90_E3R0S8	R V D G T V N R T W L T Y F E K E F L P V P F G W S R P R D P I T L E A L Q A
UniRef90_Q0TVR6	S P R G F L T Q D V F M D F F G Y E R I P D N W Y K R H P L D P W T L A D I G I
UniRef90_B8NCA0	V P K P W V K A L M G E D R I P Y K E G Y T R G N V T K T G Q H I Q A
UniRef90_F9WX48	N P G G F L T R E V I L S S F F G Q E R I P L N W Y R R P S S S Q S T L A D V A L
UniRef90_K2S2T0	N Y A P D L T I S S F F G A E R I P D N W T N R V L P Y T N E D V
UniRef90_Q4WDT7	N P E G V L T K E I V R N F Y G W E R I P P E N W H K T P L D Y G L V Q F N D
UniRef90_L2GCS3	F Q N P Q A P T K Y M M N V M F E Q E R F P F D E G F K T S A T K V T G D Q V
UniRef90_UP10004623D8F	R V D D L R S L L E E R I P D G W E P R V R H R M G L T I A E
UniRef90_M3BT06	S P H G E L R S E V L Q S W F G W E R I P P E N W Y K R P I E Y P Y D N A Y
UniRef90_UP100044133CA	D V R G G L D L E V M R G F F A D H R M P Q D F H R R A G A F G L S D V G R
UniRef90_F9XP91	U A T M M S S F F G Q E R I P P E N W Y N R V E H Y S N
UniRef90_G2XVY9	T K N Y A P D Y D T I S S F F G E E R I P P E N W T N R A T P Y S N T D A A D
UniRef90_M3BRF5	K P E L T H D I L K T F Y G H E R I P P S N W A K T P I D Y G L V Q L N
UniRef90_G4N1Z1	G V N G G A N R E W L K V I F Q E E R F P P Y E L G F H K F E Q V A T G E M V D Q
UniRef90_E5A464	V P P G G T L T R D V L K Q F F G Q E R I P P E N W Y K R P G G I E A Y N G V K
UniRef90_C5GU9	N P Q G T L T K N I I K S F Y G W E K I P P E N W Y R T P V D F G L I Q F N D
UniRef90_UP100044123D9	D A A Q G L D L G V M R G F F E D A R M P P G F V R R E G A F G L G A V G D
UniRef90_R0JSG5	R V D D L K L M L T E E K F A E N W E P R I R A P Y G L T M A A
UniRef90_F7W2P8	G T E G G A E T R W V R V M F E E E R L P P E E G F K R S D K P L T I A E I L E
UniRef90_F9XD69	N M G G Q L S R E T L K S F F G Q E R I P P E N W Y K R P T S Q P M N T V D T
UniRef90_M5FX63	S I S D L K V W L Y E E R I P P E N W F N R R S P Y S H V N V
UniRef90_E5R441	G P E G V A D L A T M K S F F G A E Q I P P S N W F N R R S P Y S H V N V
UniRef90_S3CWT4	F P T G M L S K E N L K S F F G H E R I P P E N W Y K L P I G D E Y T I L G
UniRef90_UP100044095FE	A V D R V V P R Q H L E Q W F A E E R L P P E G W E P R F R R R M G L T I L E
UniRef90_UP100046214F8	V E N P G A N R K F F E Y F F R N E R I P P E N W F S R V D P Y T I P L I A A
UniRef90_K2SCB3	G T P D Q T T M D F F F I K E Q L P P N W I N R V A P Y S N R L V
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UniRef90_UP100044074B7	G K E F R V P V E V V K S W W G E N K L P P E G W K P T R L T T L Q G T I S
UniRef90_UP10004414790	G E A T G L D L E V V M R G F F R D H H M P K D F H R R E S A F G L G D V G N
UniRef90_M2YS38	G P D Y P D Q T T M E S F F V H E R I P P E N W I N R V A P Y S N R L V
UniRef90_UP1000455DEFF	U R V D D L T R T I L H E E R L P P E N W F S R V D P Y T I P L I A A
UniRef90_B6HRF0	N P E G T L T K S H L R S F Y G W E R I P P E N W Y K T P V D Y G L I S L N
UniRef90_K5V3F8	R V K D L R P F L L E E R I P P E N W G W Q P R I R H R M G L T M A E
UniRef90_N1PFG1	P T S G G A P V K Y I Q T F F E Q E R I P P Y N E G W R T P T Q Q T T L N S V G N
UniRef90_S3CVA0	N I Q G Y L N R D I L K T F F G Q E K I P P Q N W Y K R P S N N P Y G A A A A A A
UniRef90_UP10004624410	V P N A V V P K S F L E Q W L G E E R I P P E N W G S G P S H Q T G L K E I I T
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UniRef90_M3AKZ7	Q P A G Y L D G Y N F K S F F G Q E R I P P E D W Y R R P S Y A P Y E A Q D V I G
UniRef90_F8NK37	U E D N G R I P Y T R L Y Q W Y G E E R I P P E D W Y R R P S Y A P Y E A Q D V I G
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250                    260                    270                    280

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UniRef90_K5WZ35	R A K E M R A V M E		
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UniRef90_F7W2P8	L Q R K V E A V G A A P D P K		
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L I A

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I N G T T I L L E G N N

F P A E N

K I N P D I P Y N A L  
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L G V T N V L

W T G G I F N I A D I A E G N N

A N  
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T K G I F S A A T I L L E G N N

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I N L A G M I K D

I N A T I C A A  
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N I N Q Q T S S Y A

F N I V T N I L L

I S A N T I L

A Y D A E T I F Q D D N

M N I V P T I L L E D

Q I N Q Q T A D Y A

Y D S S

S N G K I S A S T A Q D A G

F N

V N A I V E D F Q D P

T N G A I N S A Q I L F Q G N N

1            10            20            30            40

G H **V** A A R E E H A F **C** P A K K T D S R S **P** C P A L N A L A N H G  
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E Y I P P G E G D S R S A C P M L N A M A N H G  
G H G G K W P T G D H A F Q A P D G G D Q R G P C C P A L N A L A N H G  
D N T H A Y **C** P P Q E G D S R S P C C P A L N T L A N H G  
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P D D D H P F M A P G P T D Q R G P C C P A L N A L A N H G  
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H D D P H A Y I P P K E G D S R S A P C C P A L N T M A N H G  
P G H N L S W P E Y V V P P K E G D S R S A C C P M I N A M A N H G  
P W T P A E E H D S R G P C C P M I N T L A N H G  
I L N P D D S R F L H Y R K P G P D D S R S P C C P G L N A L A N H G  
H E F R A A G P Y D S R S P C C P G L N A L A N H G  
E L L G D H K F Q A P G P F D S R S P C C P G L N A L A N H G  
C A A E F E V F P F A N P K P T D R R S S C C P A L N A A A N H G  
P G H E F Q P T P E D S R S P C C P A L N A A A N H G  
E E W Q A P Q S G D S R S P C C P M I N S L A N H G  
E H K Y F R P S G D D I R S P C C P A L N A L A N H G  
E Y I A P K D G D S R S A C C P M I N A M A N H G  
Y P F V A A G P D D S R S P C C P A L N A A A N H G  
W P F Q A P Q P G D L R S P C C P A L N A A A A N H G  
C Q V N N D M F P F I P P Q P G F R R S S C P I L N S L A N H G  
H H Y F R P S G A D V S G F P P P S A I N H R S P C C P A L N S L A N H G  
P G K G V G G A V G D T A H Q F V A P G P N D I R G P C C P G L N A A A N H G  
G E D S S H A Y Q P A A Q G A R R G P C C P G L N T I A N H G  
V N D A E H P F M D P K D T D I R G P C C P A L N T L A N H G  
V N D R A H P W R P L R R G D V R G P C C P G L N T L A S H H G  
P W M P P G P N D S R G P C C P M I N T L A N H G  
T G T H A F V H P H P G D A R G P C C P G L N A L A N H G  
G V K C P V T G Q A H G F **C** P A Q K T D S R S P C C P A L N A L A N H G  
P G H N L T W P E Y V V P P K E G D S R S A C C P M I N A M A N H G  
G L L P P A E D K Y H P W Q P P K G A K R G P C C P G L N T L A N H G  
H P Y H P P A A S D S R S P C C P A L N T L A N H G  
Q Y Y R G G A D D L R S P C C P I I N S L A N H G  
Q Y H P A G P D D L R S P C C P V L N S L A N H G  
G V V N A Q G S V A S W H P P T A G D S R G P C C P M I N T L A N H G  
T G V H A F K A P G A S D T R G P C C P G L N V L S N H G  
D H T Y S P P S P G A S R S P C C P A L N A L A N H G  
V N D E D H P F M P P R K G D A R G P C C P G L N T L A S H H G  
Y Q S P G P N D I R G P C C P G L N A A A N H G  
W R P P G P G D V R G P C C P A L N S L A N H G  
K H E Y Q A P G P N D S R S P C C P A L N S L A N H G  
P F S I D T H P F V P P K S S D S R S P C C P A L N T L A N H G  
K P G A G G D W D K Y V Y M P P V E S D S R S P C C P A L N T L C N H G  
G D W D K Y V Y M P P V E S D S R S P C C P A L N T L A N H G  
K Y P W E P P G P N D Q R G P C C P G L N V A M A N H H  
Q P G T G K G G P A P G D T H A Y E A P S S T D I R G P C C P G L N M A A N H H  
P G A G G R W P E Y I P P K E G D S R S A C C P G L N T L A N H G  
I W G E Q D E E H P W I A P G P G D I R G P C C P G L N T L A N H G  
P E P G F E F K A P G P N D S R G P C C P G L N L L A N H G  
Q P G K G I G G P A P G D T H Y Y Q H P P P G A Q R G P C C P G M N T L A N H G  
S G E Y Y Q I A P G L K D I R G P C C P G L N A A A N H G  
P G H H G A W P E Y V V P T D G D S R S A C C P G M I N A M A N H G  
S D N G P N P F M P P T T S G Q L R G Q C C P G L N A A A N H G  
P G H G G L W P P H V P P Q P G D S R S A C C P M I N A L A N H G  
P V F A G F D T W A P P G P Y D V R A P C C P M I N T L A N H G  
Y G G T K L I N D A R H P F R A P G R N D I R G P C C P A L N A L A S H H G  
G G I K V P A D G D T H Y Y T A P G P N D I R G P C C P G L N A A A N H N S  
H E F N P P L F D D E R S P C C P A L N A L A N H S  
Q V G D Y F R P P S D N V T A F A D S T S P T F R R S P C C P G L N T L A N H G  
P G R S G L W P E Y V A P Q Q S D S R S P C C P G L N A L A N H G  
P G A G G K W P E F V P P K E G D S R S C S C P A L N A M A N H G  
W R P A D P E E D S R G P C C P M I N T F A N H G  
P S S G H Q Y I A P T G S D Q R G Q C P G L N A A A N H G

50 60 70 80

UniRef90_M2PCT5	P R D G K R I S A K I V T N A L E E G Y H C S G P L A Y V L A H G G F L L L
UniRef90_F0ULJ3	P R N G K R M A Y P T L L K G I L E G L N V G F D L T L V A G T G G M I G A
UniRef90_J4GI20	P H D G R G I S Y S N Y I R A M R E G Y N L S P L A T L L T Y G G H M I L
UniRef90_R7S391	P R D G K N I P F A Y M G Q Q R K T Y N F A P S F C Y F V P S Y M A Q L L
UniRef90_W3WL17	P R D G V V G F L D L I D A G N T I Y G M G I D L I T V L A I M G T A G I V
UniRef90_J4ICQ3	P R D G K C I T P Q V L I N G L R D G Y H L S T P L A W F L T H G G F Y L L
UniRef90_A0A014NBM5	P H N G R N L S V K H F G D A V V E A L N A A P S Y G T L P
UniRef90_K5XSD1	N R N G I A N P A E I I T A V M E G F N M D H G V A V Y T T Y A A F I V D
UniRef90_M2PTQ8	P R N G I V T Q A D I V S G T A A G F N M G G D L S E F L A L I G I A Y D
UniRef90_K3WBV1	P R D G Q N V T K P V L K E A I M G V Y N L G E D A A A I L
UniRef90_A8P4U7	P R N G V A S P S Q I I D A V Q E G F N M E N E L A R F T T Y V A H L V D
UniRef90_M2ZIJ7	A H N G V V G L F E V V H T I N Q L Y G V G I D I A L A N A L M A V L S A
UniRef90_M2PKR8	P H S G R D I T F R E L N A A V R A S Y N F A P S F C F F V P N Y I A G V L
UniRef90_J0DBC0	P R S G V A T P A Q L I N A V Q E G F N M G W G V A V L V T Y A A F L M D
UniRef90_G1XKB4	A R D G R N I T A D E I M K A F Q E E L G L G D V A F G L T K P P F T L H
UniRef90_M2U985	P R N G I S T I Q M T T A A N E V Y S M A G D L T S F S I G G K P K T G
UniRef90_W4JVD1	P R N G R N I P I R A L L T P A L R S T Y N F A P S F C V F V P R Y I
UniRef90_S8FKR1	P R D G R N I A F H D L D M R C R E T F N I A P T F A F F T T R Y A A T M L
UniRef90_K1WWV4	H N G I G T V T Q C L Q Q A Y N M D I P L S T V L A T I G V A L T
UniRef90_F8NR15	P R N G R G I T F K E M M N A K I R T T Y N F A P T F C L F V P N F A A N M L
UniRef90_N1PEE8	S H D G I V T Y N E L V D A Q Q N L Y N V G Y D L A N V L A L L G L T L T
UniRef90_F9X231	P H N G V G S H T D F I E G T F K A F G M S A D L S G F L T V L G G T L D
UniRef90_Q0UK37	A R D G I T T F N E L M D A Q Q N L W N V N Y D L A L L L Q D G D I I T G
UniRef90_B0DVA6	S R N G K N I S A S E I V T G L K A C Y G L S T P L A L F L S H V G F L V L
UniRef90_K5XIL5	S R N G I E S P S N I V R G A M E S K F T C Y A A F M V N
UniRef90_K3WD30	P R N G Q S V T R A D L K A G I M N V Y N I G V G V A D I L V S Q V
UniRef90_B0DV60	P R N G I A T P A Q I V N A V Q E G F N M G N D L A V F V T Y A A H I G G
UniRef90_R7SV03	H D G C N L T A S Q L V S V L R A K Y K I S W I L A L L S Y G G V A L C
UniRef90_UP10004414A6E	P D G K D I S F L T A F R A L R A G Y N L S W P L A F L L S F G T A L L I
UniRef90_S8ARU0	P R D G R N V T A D E V K A F E E V L G L A P W F H S F L S K L P V P T M
UniRef90_M2Z4V4	P R T G V T T I Q Q T I D G L G A A Y S M S P E L A L A L A V I S V A I S
UniRef90_A2QKY6	P N N G K R I T Y A Q L S H A I Q H A Y N L A P T L A S Q L T S A A
UniRef90_Q0UF04	H S G K N I S F R Q L N T V R Q S F N F A P S F C F V P N F A A N F L
UniRef90_UP10004416847	S R D G K N L S G R D L A N G L M A C Y N I S M P L A Y F L S Y G A L
UniRef90_G1XNL7	H D G K N I T F V I E L N H K I R Q T F N F A P T F C F F V P K F A A D F L
UniRef90_G9NIK5	H N G R N L T A T L I E N A F T N F L N V E A G F A A V
UniRef90_T5ABQ4	P R D G K N I G M A Q I V C A L F E G I G V D P V I S V A I L A F G I A S S
UniRef90_F9G5I7	P R D G A N I N Y D M I N H A A Q A A Y H F E D G F Y I D A V N M V F Q L
UniRef90_G7Y1F3	P R D G K N I D Y D L I N K A T Q D A Y G W A P G S F T T V V D M V F E F N
UniRef90_M4FYU2	P D G L N I S R E Q L D G L Q R G L G L N T T G P L Q N T T D K
UniRef90_X8JU91	H S G K H G F F Q L C K A V H E V Y G L S Y P L A A L S I G G I L F C
UniRef90_W3XRC8	P R N G I N V D A P T L R N A L Q S N S F D P D A L S D V I T Q A L S T S
UniRef90_G5A444	P R D G K N V T P H V L Q D A L V E V Y N L D Q S L A E F L V
UniRef90_F9XGA4	P R D G K N I T F K E L I N K T V R Q T F N F A D S F C F F V P K F A A D F L
UniRef90_G4U343	H D G K N I S V F Q L I S A L R E V Y G V S L P F A F G L A A G G V A L C
UniRef90_M3CLX5	P R N G R D I D L E M L G A V R I L A Y N M T Y D A M L V V G E P G L T T
UniRef90_L7HVD5	P R D G L N I S R E Q V L D A M Q K G L G F N T T G P L E S T T A H
UniRef90_D0N8X3	P R D G K N I T P Q L I R D A V V M D V F N V D E G L A E R L
UniRef90_S3CJ64	H D G V T T F N E L V D A Q Q N L Y N V G Y D L G L T L T D G D I V T E
UniRef90_V5EA37	P R N G I V N P I Q L V V G T F E G L N L S P D L A G I L A A I S F I G M
UniRef90_K5WP62	N R N G I D T P S N I V R A A M E G F N M H N N L A K F T C Y S A F V V N
UniRef90_A8NAQ8	P R D G V A T P A Q I T A V Q E G F N M E Y G I A T F V T Y A A H L V D
UniRef90_G9N1K7	H S G R N I S A L L I E N A F I Q F L N I E A G F A A A
UniRef90_R1GW61	H D G V T N H D E L I K A L L D V F A M D Y G V A E Y L T L L G M A S S
UniRef90_UP1000455E1B7	R N G Q H I H V G Q L I K A L R E G Y N L T P L A S F L A V A A C M L L
UniRef90_N1PWD2	H D G K N I T F K D L I N Q K V R E T F N F A S S F C F F V P N F S A R F L
UniRef90_Q4P9V1	P R S G V I N P I D L I V G T F L G L N L S P D L A G I L A A I S F V G M
UniRef90_UP10004418277	P D G R H I S L F Q L A D A V R R A Y H L S T P L A Y I L A V G G L L L C
UniRef90_I7ZXW6	A R D G R N I T G S Q L K A A L E H I G L G F D T A G G L V K I A F Q D H
UniRef90_G7XCF5	A R D G K S I T A A E L I K S A I R Y V G L G L D I A S V L V S R V F Q I H
UniRef90_R0KJX1	H N G R N F T L D N V K H A L T T A L N L T D E L A E L L N K F A L T T N
UniRef90_U5H9P2	F A R N G N T N L V E S I S A L V E V F N M G V D T A T V L V A Y S I A I
UniRef90_S8FR02	P R N G R R I S V V Q L V R A L V E V Y N F S
UniRef90_A8P4T7	P R N G I A T P A Q I I I N A V Q E G F N M E N E I A R F T T Y T A H L M D
UniRef90_M2YL42	N R N G L S T L Q N T I T G L G D L Y G M S V D L A G F L A A Y A I A V D
UniRef90_F2TE76	H N G K R M T Y P T L L E G I S E G L N V V G F D L T L V A G T G G M I G A
UniRef90_U9SYU5	P R N G K N I T A N Q L I E A I N E G F N V V S K F I A F I L S H A G S Y L I
UniRef90_B8P407	H D G R E I T R T D Y I R A L R Q G Y N L S P L A T F L T I S G H V L L
UniRef90_G4TF47	P R N G R N L K F T E L Q P I L A D A Y N L S P S L T F G L L N I I
UniRef90_G9MX32	H N G R N I S A Q Q F A D A A L E V V N I D G M A I K Q V A N Y F L R A A
UniRef90_M3DB47	H T G V V S T W E L L R G A V N T F N L G F D M A L L T V I A A T L S G
UniRef90_F9X1K4	H D G Q T T T Y N E M V D F A Q N V F N W R Y D L A A F V A T F G I V Q D
UniRef90_B8PGX4	P R S G R N I S F R Q M N A I R S T F N F A P T F C F F V P S Y M A G V L
UniRef90_J6F6J7	P R N G I C T P Q E L L M M G V W K G S M S P E L S G I L A I A G V V W K
UniRef90_M2SHF4	P R D G Y V N F G Q V L E A T A R G F N M G A D L A T V L A T F A V L G S
UniRef90_M5FSH4	S R D G L T T F T E L V A G G M Q N V W N V Q W E L A V I L A V L G I A T D
UniRef90_F9X0W1	P R N G I Q N I E Q T I S G L G A L Y N L G P R I T A V L A A Y A V I T E
UniRef90_W718Y3	H D G K N I T F V D L H S I R K T F N F A P S F C F F V P K F A A D F L
UniRef90_M3C5Y5	P R N G R A T I E Q T V T V G L G N A Y G M S A D L S I V L A A I A I L I S
UniRef90_K1Y125	H S G R G I P F R A L N T A V R Q S F N F A P S F C F F V P R F A A D F L
UniRef90_Q2GW6W6	H D G H E I T T R E Q T E N A L F D A L H I D K M L G S S L F D F A M T T N
UniRef90_K5X3V1	H N G I A R P S E I V A A V V M E A G F N L E N S A V L T T Y A A F L V D
UniRef90_J9NJ54	E R S G R G I F M D D L N A S M K H V G M S P L L G S V F S F D Y F G C
UniRef90_Q0UT82	H D G V T N F N E L V D A Q Q N V Y N V G Y D L S V L L A D G D I V T T
UniRef90_UP10004411ED4	P H D G R D I G F W K S V N A L R D V Y N L S L L A V V L T V A G C L L C
UniRef90_G5AHA1	H R S G K N I T H E N L G A A L M S V F N T D T N F T Q T L L N Q V
UniRef90_W9XDL6	P H S G K N I T E N D T V N A L N A A L N V D R K L G V F L F Q H A I T T N
UniRef90_G4N3U4	P R T N I S M D Q L V S A L E L S I G L E G A A T R I V V G G K A L A T
UniRef90_M2QYC8	H S G R G I S F V I E A E K A I R H T Y N F A P T F S K L L P L Y A S Q M L
UniRef90_A8NVF3	H D G K N I K F S E M G D K I R E T Y N F A P S F C F F V P N Y A A T M L
UniRef90_M2YL26	P R D G R N I T I E D V V Q Y A M G K G L N Y G E E I I K V T F E A A I T T N
UniRef90_N1PEV2	P R S G I A T I Q Q T M D G L G K A Y S M S T D L S L A V I A I A I S

	90	100	110	120
UniRef90_M2PCT5	G Q R	G Q T [C] A D L	A R H N R I E H N A S L	L A H P D A
UniRef90_F0ULJ3	K N P L Q L Y	F N L D D L A N H D L F E H D A S L	S R G D I Y F G	
UniRef90_J4GI20	S Q Y	S A L S L S D L S R H N F I E H N A S L	G H P D A V G D E E	
UniRef90_R7S391	R R S Y R K D	T L D L S D L S V H N G I E H D A S L	C R H D T F L Q P	
UniRef90_W3WL17	G D P L S L N P G F S I G G E G L E G S H N W I E A D S S G T R D D L Y			
UniRef90_J4ICQ3	G Q R R K R I C	L R D L S R H N C I E H D A S L	V H P D V H H R D E	
UniRef90_A0A014NBM5	A R V F V K S W G K D F F D L E D L N T P G I L Q H	R G S L T R D D M T P T E R		
UniRef90_K5XSD1	G N L I T T G R S S S G T T A G G L L	N T F E G D S S L T R M D A Y F G		
UniRef90_M2PTQ8	G D L I T E K F S I G G P D E G G L L	D H H G P F E A D A S A T R R D D A F F G		
UniRef90_K3WBV1	L G L V P P D E F N L D F L G T H N M V E H D A S L A H A D A Y F G			
UniRef90_A8P4U7	G N L T G P D P P P P A I V G G L L	N N H G T F E G D A S L T R G D A F F G		
UniRef90_M2ZIJ7	G D P I T L T W S I G G P D Q G L L	D F A H N L V E A D C S L T R N D L F		
UniRef90_M2PKR8	G R S Y W T G K F D L S D I D V H N G I E H D A S L A R V D S F			
UniRef90_J0DBC0	G N Q L T N L M S I G I K S L G G L L	S T H G T F E G D A S M T R G D A F F G		
UniRef90_G1XKB4	T Q E D E S E G G E P V L N L D Q L K R H G A V E H D V S L V R R D F A Q G			
UniRef90_M2U985	G L L G G V V S S L G L L G Q G L L S A S H N R F E V D G S P T R S D M Y A			
UniRef90_W4JVD1	G Q I L G R S Y L N D T L D E D I D V H N G I E H D A S L L T R E D A			
UniRef90_S8FKR1	G R D Y G T G K L D L A D L S A H N C I E H D A S L C R E D T F			
UniRef90_K1WWV4	G D V L G G T W S G G P Y S A G L L G S H N L Y E T D G S V T R A D A Y M N N			
UniRef90_F8NR15	N K S Y R T D T F D L E E L D L H N G I E H D A S L T R V D T A A			
UniRef90_N1PEE8	D T S R T S V N P A L T G S E P G L L D G H N K F E A D S S L T R N D Y F			
UniRef90_F9X231	G N G L V W S S I G G P P P L P I L G T P Q G I S G S H N N Y E S D V S P G R G			
UniRef90_Q0UK37	K L S I A C D A T S R T A A L G G L L N S H S R F E A D A S L T R N D Y F			
UniRef90_B0DVA6	R K T F R R V S L F E E I G K H G Q V E H N A S L L V H H D T P P A G E V			
UniRef90_K5XII5	G N L T G P D P K E Q P M T I G G L L T H N V F E G D S S M T R A D F Y D G			
UniRef90_K3WD30	P E T L S L D Y L L G T H N L I E H D A S L L V H Y D A Y L G			
UniRef90_B0DV60	K T P Q T G P D P P A P A I V G G L L N T H A V F E G D A S M T R G D A F F G			
UniRef90_R7SV03	G H R D G W S W K L D L H E L L A K H D V I E H N G S L V H D D A A P G H P			
UniRef90_UPI0004414A6E	G R G A L R R F S L L A D D L A H A H N V I E H D G S L L S R A D A T G P			
UniRef90_S8ARU0	D T Q L S L Q G L G E P V L N L D Q L S R H G A V E H D V S L V R N D F A Q G			
UniRef90_M2Z4V4	G D P I A G T W S G G T L G L G I L L G T H N R Y E G D A S L L V R G D A Y M H D G			
UniRef90_A2QKY6	K Q L D Q G R G W I D L H D L N V L N V Q V H D A S F T R P D I A F			
UniRef90_Q0UF04	S R S Y W T G T F D L A E L S K H N A I E H D A S L L T R R D A A			
UniRef90_UPI0004416847	[L] H P R V E L S D F A L H N H V E H D A S I C H E D G			
UniRef90_G1XNL7	N R S Y W K D K F D L E E I S K H N A I E H D A S L L T R Q D A A L			
UniRef90_G9NIK5	K D F T Q A W G H D V F N L H D L N A P D I L Q H I A S L T R D D Y T S			
UniRef90_T5ABQ4	K K P L C F T F D L E D L A S H K M I E H D C S F S R D D W K N G			
UniRef90_F9G5I7	D I S T T S R P N E T F H L R D L L A Q H D Q I E V D G S L L T R N D I F F G D			
UniRef90_G7Y1F3	I S T T N R P N E T F H L F D L L A R H D T I E V D G S L L T R N D I Y F G			
UniRef90_M4FYU2	G L S M S S T G N P N T V H L D D I L D K H G V I E R D A S L S R Q D I G			
UniRef90_X8JU91	G S K G K L D L A Q L A K H N K I E H D G S L L A H E D L A D G			
UniRef90_W3XRC8	T T G N S S T F N L A D T V I K H N V I E H D G S L L S R D D Y A			
UniRef90_G5A444	S T [L] A D K F S L A D L G E H N V V E H D A S L V H D D A C I G T			
UniRef90_F9XGA4	N K S Y S K D T F D L A E L S L H N A I E H D A S L T R H D A A L Q P			
UniRef90_G4U343	G K G F K [L] N L G D L C K H N A I E H D A S L V H R D V R E T G G			
UniRef90_M3CLX5	S T T G N A S T F H S D L L A Q H Q A V E H D G S L L T R E D A Y F G R G			
UniRef90_L7HVD5	G L T M S S T G D N N N T M H L D D I L D R H N V I E H D A S L L S R A D L G			
UniRef90_D0N8X3	T R P L P S E L T L A D D L S V H G F I E H D A S L V H D D T Y L			
UniRef90_S3CJ64	K L S I G C D T R T R G S E P G L L D G H N K F E A D T S L T R N D F F L G			
UniRef90_V5EA37	G D L M Q L S D Q G A K S G L G D G L L H N G I L E G D G S V T R L D H Y F G N S			
UniRef90_K5WP62	G N M T G P D P P Q P A I V G G L L N T H N V F E G D S S M T R A D F Y			
UniRef90_A8NAQ8	G N P T G P D P P P P A I V G G L L N T H A V F E G D A S M T R G D F H L G			
UniRef90_G9N1K7	A K D F A E A W G H E T F D L D D L N A P D I L Q H I A S L T R D D Y T S Q H P			
UniRef90_R1GW61	G S V D M W T L S I G G H P G L S G T H V F E T D A S P T R S D L Y D A R D			
UniRef90_UPI000455E1B7	G Q F R S I S L Y D L S R H N L I E H D A S L V V H A D A T P G S E			
UniRef90_N1PWD2	N K S Y S T D R F D L E D L S M H S A I E H D A S L T R Q D A A L			
UniRef90_Q4P9V1	G D L M K L S I G G R Y G L G G G L S H H G I L E G D A S V T R K D N Y F G N S			
UniRef90_UPI0004418277	S R R W L A A H I D L G D L S H H G I L E G D A S V T R Q D R A L G			
UniRef90_I7ZXW6	V D P P E G T P G D P V L N L D Q L L G R P H A I E H D V S V T R Q D R A L G			
UniRef90_G7XCF5	S D D P E H G P G M P V L N L D Q V G R P H A L E H D V S I T R Q D R A L G			
UniRef90_R0KJX1	LA A N A T T W G L D T L S N H N I L E H D A S L S R A D N F F N N			
UniRef90_U5H9P2	G D P I A L S P G K S T L L P G I L S A P G G I D Q S			
UniRef90_S8FR02	V I G V I L C G N W W S L D L H Q L A K H G L I E H N G S L V H D D A R P H D A			
UniRef90_A8P4T7	G N L V T D L L S I G P K T P G G L L N N H G T F E G D A S L L S R A D A F F G			
UniRef90_M2YL42	G D V Q W S I I G G P L P A N L G T L L G K P T G I S Y S H N N Y E G D T S I G R C			
UniRef90_F2TE76	K N P L Q L Y F N L D D L L A N H D L F E H D A S L S R S D I F F G			
UniRef90_U9SYU5	G K T R E G E L S L E D L F N D A I E H P V S L T R P D			
UniRef90_B8P407	S Q Y S T L L S L S D L G R H N F I E H N A S L L G H W D A V G D E E			
UniRef90_G4TF47	A K M F E K D Y F H D S V D L E L F G T H N V I E H D A S F A R H D N Y			
UniRef90_G9MX32	N Q S F I D L T D L N R P G I L Q H I A S L T R D D V			
UniRef90_M3DB47	G D P V T W T L S I G G P D P G L E H T H N L I E V D S S M T R N D I Y			
UniRef90_F9X1K4	G N V L T G E L G G Q Q V P N T G L I N T H D K F E A D S S I T R T D Y Y L S P N			
UniRef90_B8PGX4	G K S Y W T D T L D L S D I S V H N G I E H D A S L T R E D T S E S P H			
UniRef90_J6F6J7	A D I K T L K I S I G A G T Q G G L S N H G F I E G D A S V T R D D			
UniRef90_M2SHF4	G D F D G L S L G S G K N G I G G L S N R H S V V E A D V S P N R E D Y Y N G			
UniRef90_M5FSH4	G D P V T E M L S I G T G N Y G G L D Q H N A F E L D V S L T R D D F Y L			
UniRef90_F9X0W1	G W S I I G G P L P Q D L L T N P L L G T H N T Y E G D C S I G R G D A Y L N N G			
UniRef90_W718Y3	K R S Y W K D T F N L E E L S L H N A I E H D A S L T R Q D S A L L			
UniRef90_M3C5Y5	G D I P T G E W S I I G G G P K G I L G T H N K Y E G D A S I V R G D A Y L N N G			
UniRef90_K1Y125	G R S Y W T D S F D L A E L S Q H N A I E H D A S L T R Q D V A L			
UniRef90_Q2GWW6	P V A N S T T F S N D L L G N H N V L E H D A S L S R S D A Y F G			
UniRef90_K5X3V1	G N L I T D K L S I G G S T P G G L N E H T F E G D T S M T R L D A H F G			
UniRef90_J9NJ54	W N A K Q I S D G K K Y I L N V D L L A S H G A I E H D I S L S R R D I A Q K Q G			
UniRef90_Q0UT82	K L S I G C D A T S R T A A L P L L G R H N K F E G D S S L T R T D Y F L N N			
UniRef90_UPI0004411ED4	G P G A G T F T F R S S F S L S D L A Q H G K I E H D G S L S R P D A R Q G S L			
UniRef90_G5AHA1	P A P N A T D F S L L D L L S R H N I L E H D A S L S R G D Y Y F G			
UniRef90_W9XDL6	S T T G N P N T F N L D D L V K H G I L E H D G S L S R S D I A D G			
UniRef90_G4N3U4	P I P N S T W F D L W H L G R P H L L E H D A S L S R R D S Y L A N A			
UniRef90_M2QYC8	C R D Y K T G T F D L A D V A H N G I E H D A S L T R D D A A			
UniRef90_A8NVF3	G K D F N K D T F D L Q E L D L H G I E H D A S L T R E D A A L			
UniRef90_M2YL26	P I P N S T W F D L W H L G R P H L L E H D A S L S R R D S Y L A N A			
UniRef90_N1PEV2	G D P I A G T W S I I G G S P T G I V G T H N R Y E G D A S M I R G D A Y M H D G			

130                    140                    150                    160

G H R D E Y A P T H V K D	L L E E F L A H S K D G E L I T P D D V A R A R V R		
D N <b>I</b> S F N A T I W Q S V L D Y F I D D R T V S L G A A A H A R L N			
Y A P T K A S L S L I T Y Q M T N E S T D G S F M T M H D F A S A R V L			
D Q S K P A H D L I T E M L A Y P T G R T S L T A A D I A A F M S K			
V T G N A W T M N M T L F R D I Y D N I D G A L T M E D I G D R A A A			
Y A P V D M H L H M L E D L M T F A E D G V V M T P D D V A R A R V C			
N I D V D V A R V N A L L E D S P T D Y V D A A S I A K S R L R			
D N H N F N E K L F Q E F I E Y S Y G G G K Y N L S V A C E F R R K			
D D H T M Q P N L Y A Q M K S I A A Q G G G L Y N L D A M K D L Q L L			
K D P A E V D S T L A G D L I A H A D V N G I L G P K E L A A V R K A			
D N H N F N Q E L F D Q F K N F S Y G N G F F N M T V A G E L L R F H			
D T G D A W T L D I N L F H R L Y N S V P E G R P F T F H D M G A I A A R			
H S N D Q G K V C A T L V I Q D L L S S G T G G G N L T T H D L S R A L G R			
D N H S F N E T L F Q Q I V D S N G G G K Y N L S A A A D A R F L			
D N T T I Q P D L H D L L A S A S D S G N F T I Q D F A Q F R N R			
T G D P V S L N L D Y F E Q L L S M S F G K N G I D I P V L T A F R L D			
R V S P D Q S R P S I P L V E Q L L A S A S G P P T L T V S D L A R L T S K K			
H N A D Q S K P A P R L I N A L L E S A S G N G T L L T M G D I S R M L S K			
G D S S T L Q M D R F M A L Y N R S E L Y T L D I M R Q H N K A			
N P N Q S V I H A P F V E E L L G S A S G K A A D G H Q L T S K D L S R I S G K			
T H G G D N K Y F N G T L F G M M T Q T T G G N Y D L Q G L A Q Y R Y E			
D L Y Q Y G N D F T L Q M S Q Y Q E L Y D M A K N G G N I D P L L T D F R S K			
T H G G D N Y S F N G T L F A R M K E V A D S G G N F D Q K A M A A Y R S Q			
Y A P I E I D A G L V D K L I D D V E G E K M N A V D V A R A R I R			
G D V E S F N E T L F Q G F I E Y S F G G G R Y N L T A A G Q F R L K			
K D P S A V D P A L L A D F L D R A N S D G L L T L S D V A A V R K Q			
D N H S F N E T Q F D E F S A F S F G G G Y Y N L S V A A E F R W Q			
F A P T D V D R V L L R Q L L S A S S E S D A L T H D L C R T Q V Q			
V A P T Q P D A A R M A S L L G D G E T L L G D D L A K V R A A			
F V G F F E D H R W N R L L Y D A I G S D G L L T H D K A A A Q A Y Y			
C P D Q S I P H T G L I N R L L D H A S D G K H L S L T D F S Y Y S G L			
E I F D L F A P C P V I P K M F D D F V K D S A T G T H C N A R D I A A T R V R			
Q N P H I R P N L H R I E S F F D D S P S L H I D I D S I A K S R L R			
T G N N R D F N P E L W K V T Y D S S T P R T Y I N F I T M G R A K A V			
D L H F D A T V F D P V A R D L G L D I S R K D K F V T I E T A A K A T K N N			
D D V H F D A T V W D L G L D D I H S N S L F T P E I A A K A T K N N			
V G D P K P F N P T I W N S T I L A W L P D D V V S V N Q L S R A M A Q			
D N K N V C P R L V I N E V G E S T D G H G L S L H D L A R V R I R			
H A Q N D L H F D A E I W S Q V V V S H F T S D T I S I E T A A K A R L D			
D P S S V N M T L A S S L L A R G N K D Q C I T R M T L A A Y R R E			
D Q S K P D L Q V L D E L L K E A T Q K T T M T K T D L S R A L S K			
P L A T N K P D M E L V K A L I D S D G K Y V T L D N L I K A K L A			
K P I Q N D F S W K A W G R A I L D S W G N A S I I D F R V A A T E L K A			
V G D P R P F N P T I W A T S L V F W P D Q A I N I N Q M A R A F A Q			
K R D P A Q I N G T L A E K L L A K S K D G K L D K H S M A T V R K E E			
K G D N F S F N G T L Y K M M Q T T G S N Y N R D N L A K Y R Y E			
W D A N P A L V I E M F I N N T W G H G D V T P Y S L A H S R Y R			
W D A N G D V E S F N E T L F Q G F I E Y S Y G G G R Y N L T A A G E Y R L K			
D N F F N F N Q T L W E Q F K D Y S Y G G G R Y N L T A A A E L R W A			
H L K P N L L R I E L M A D S P T L F I N I D S I A K T R L R			
H P D D V H M M N I E F F K Q L F D R Q A G I A D E D V D F S L E V V A E H K F A			
Y A P T Q V V M R S L V T R L I R T I G H E R T D R M T L D D I A N I R V N			
V K D Q S K P D L K L V D D L L K E A D G H P F M T K A D L S R A L S R			
W D A D P K L V K Q F I Q E T N T Y G K G N V N I W S L A N S R Y R			
Y A P T A V D P A L L S D V L A R C P P Q G M G L E D L C E V R A A			
D Y I H L N P D L Y Q Q L L A S S S N G T S F S I S D I G N L R K K			
D C I H L D P E L Y K Q F L R T A K G R F H T T V M G R Y R K V			
D S T S F N Q T V F D R T R A F W T A P W I N I Q M A A N A R L A			
H N N Y E S D D A S V T R D K F K A L Y N L Q S D P A T Y T C D I L V Q H R N F			
Y A P T T V D P A L V A Q L L A V T P A P G L S M H D F A K A R A L			
D N H S F D Q E L F D Q F R N F S Y G N G F F N M T V A A E L R F H			
D A Y N G G D A H S L S T T R F A T A Y A S G N G S P T Y T L D T M S R L Y A K			
D N N S F N E T I W Q S V L D Y F R H D E T V S F L A A A K A R L N			
K D L S E D Y R K I S P E L L D S L F S E K N E N N K L T R K S F A R Q F I K			
Y A P D K T T S S R L I S Q L V N Q S T D G R T M S M R D F S A A R I L L			
I Q P D Q S V P S V D L I K A F L S A T G A R I I T P A D I S A F L R Q			
K D P D S V D V S A S Q D R I H H L I Q D S D T D C I T V A S L A K T R L H			
D T G D A W T M N I D L F R Q F Y N S V P E G E L F T H E A I V S A S C L			
G D N Y G V N E T L F N Y W N D F C N G D F T L E C M G P Y M R S			
Q G E P C E R F I N E L A S G T G G G N L T V A D L S R I S G K			
S I I G D Q V H V N E T K L H R Y Y D I H N G Y D I N P E V C A E S R Y V			
C G D N H H I S S R L V K Q M V G F A A K D P K F S M N V M A E H Y A Q			
D A H S V R R C G W E W W S R F T N F R N V L I F G S H F Q A Q D			
V P D Q S K P D L K L V H D L F A E A T G K P R L T I P D L S R A L S K			
N V G V F Q W Q S W N D L Y E T G T D G L T L D K V T A H S D R			
E P D Q A A P D L A L V A A L L G G A T T G G K V L T K A D L S R A L A R			
N T L T F N Q T V F D E T K S Y W T D E T V T I E M A S N A R L A			
D N H N F N E K L F R S F V E Y S Y G G G K Y N L T V A S E F R N K			
N N D P Q Q D L I E E M L D Y S F D G E T L T I E D L A R F K A			
G D N Y S F N G S L F A E M K S F A D S G G K F D L D A L A A Y R G K			
L A P C P P D P A R L A S L C S E N A D S L T L D D M C R V R A A			
V P D M V N V K T L V N D L F N R S L D G K T L G V T E L G E T R S D			
D D H T F N Q T I F D Q T R S Y W T V P I L I D I E T A A K A R L A			
D N H S F N K T L L W D T T L T F F K D D K I S I L A Q G A A A R N A			
H T I N Q S S S Q H A L A L E L L T G G T G T G D L T P A D F S R F T S E			
V P D Q S K P H I P F I R E L L D S A T G T D V L T I E D L S K Y S A K			
S I F V G Y F E M H R W E H L Y S L L G T N G L T H D K A A A Q A Y Y			

170 180 190 200

RES VSG PVD G HAEI ARGE MAI V M H FGDYN IPND  
R KTERARN P DFTFAKDD I SYTE TAAQYL SV FGN  
RE REYK WPALDPLHE EIARGE ISMVLGV FGGAN  
RRADS R VQNGQHT LTFHKI FGSSNSATMLL FGG  
RFDES VGINPYFYGGPYTGMI ARNAGYAFVGRVLS N HSTE  
RES YTIPLDP VHAEIARGE MAIALQL FNNSTSSKE  
VEA LSE PERLSSWHDLLAYMESSLVLLVMKEGEVPSA  
RFQDSIATNPPEFTIA PRFYTAYADAVLPINLWVWDG R  
RYQQSIEEMNPPTFYFMP SGPLIVGAKAFISEFFSNGTYGAG  
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RIQSIATNPEFLSGLRHTTAYAEASFPSLFFVDRKTA  
RFHECILATSPNFYFGPVSGMVVAANAKIFARLFANYTD  
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RIQQSLATNPTFVFS PRFATAVAYEAI FPLAFFVVDGRS  
RLEQKRENPKVNFGREREALALAFGEVALVMSVWGAKSVTEY  
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RRAEA K K QNGQFSLSTS HKMFSSNSGTL LIT FGG  
RRAESKRANGQYQSQTSHKIFGASN SALLTACGGG  
MRDWSVQNNPPYFSAAASHAGLVA P A H T L I P L M F S N H S A E  
RRVEARANNPDYT LSLFHKMF GSNSSTL LIT FGG  
RYHQSQVENE PNFYFGPFSLLF GAA SFLYELM PS  
RFDQSIANPPYFFNGP FVLVQPAAYTFIYRFMGNK  
RYDESLAENGNNFWGPLA ILLYGAASSFVYELFAPYG  
REKQSPVLD GV HAEIARGE MAI LGVW E EGAG  
RQDGQVHNPTFTI VAPRL FAYSEAVNPINMWVWDG R  
RAATCRAVNPD C DLGKPQSLAFLESSVLLRALGGFN  
RIQESLATNPNFSLSPRYFTAYAESIVFPLVFFVDRVSD  
RQANSGPLSSVRASI AKGEVALLHQAFAGQSATAE  
RDAELLA L GKP LSGVHTRIARGEVALAYAMFADA  
RLREQKQDNPQLNFGREAI LAFGEVALIMCIWGVSFSGGY  
TAQYSIENNPPYFFSGPFSLVA P D A H N F V V H L MS NRSEE  
RRAECCKRNNGQYT LSGHKMIGSGTSALMYSI FGG  
RRLCECRANNEA YSESFSFHNGFGSANSSMTLIT FGG  
REAESKARA A QFYDG L HAEIARGETALVLGI FGGGG  
RRVDARKTNTNYSSESFFHN VFGSSNSSTMLT L F GGSIND  
VQAESH PNM L SKARFDAA LFEAA M V L V M M T D N V P D A  
RVKDALRRRN P D S Q W A P R A W F N Y S E H G L V L S A F S D  
RLDLAKRVNPEFNVSVHH ET E Y G T T A L Y L L T L W D E H Q K A  
RYDLAERVN P QFNNNSARHATEYGT T A L Y L L T L W D G  
RIVANANASNPKFNLTKAQEGVA V N A G L T L L M F G N G  
RET R P M DAMH K R F A Q G E S V L S V M V M G D G  
RIANAQSTNSEYSQPNGDTASLAETA F Y L M L L G D R  
REAESAAANTP DFFT A Q R A L T S Y S E S A V M L L V M G D  
RRAEARTSNKDYTESFSFH LFGSANSATMLT I Y G G L  
REDQAI D N T H G Y P N K L L R T F S H G E L L I M E L L Q R D G  
RF D YM Q F N P E F F N A T F A R T G A L L Q Y G L M M S T F G N T  
RMTAAAASNP R F S L S E T Q A V A N A L S N V M L M F G D G T V  
REAQCKQE PYEAFPKAQATAYGESALLLIGMGDY  
RYQQS L RDNP N P F Y F G P L S L L F G A S S F L Y E L M P S G T R N Y A  
AWD Y GRKSNP V F D F N P R M L V A Y A E S G F V H Q L L R G S L S R F D  
RTLDGQI QNNP T F T I A S P R L F A Y S E S V N P I N L W V D G R  
RIQQSMATNGQFDFT P RYFTAYAESIVFPI N F F T D G R F T S N  
VETESM P S A L S K N Q T N A A L F E A A M V L V M M S D H S P D A E  
RTIDS V E N N P D M F L S P A N A A M G S M A A H L F I S S F M S N H S A E  
REAE THVLD K MHAEIARGE LTIALGVLGGKSAYED  
RRADARKSNREYESSESFFHN M F S A N S A T M L T I F G G L  
AWD Y GRKNNN P V D F N P R M L V A Y G E S F V H E V L R G S F V K F D  
RE TANARDARL D GLHRTL GAAEA VFLYNTLKDAS  
RFEQSKRDNP E L D L DKRMHYIA C A E V G G I M G V F G K G L Y  
RYDEQQRDNPH Q F G K F E HYVACSEVAALRSVFG K  
RALDSVKFNRQFALSELAAFSAGEGAYLLVFGDR  
T Q Q S I S T N P V F A P G L V V A T A A H N F V A N F F A N H A A S  
RDSSI P T P L D G I H A E I A R G E A A L T I Q T F G D I R G N L D  
R IQ Q S I A T N P E F F S F G L R H T A Y A E A S F P P I F F V D G R K T G A  
NTIRSI S T N P Y Y F A P L F S L V S P A A Y N F V V N F M S N H S S A  
R I K T E R V R N P D F T F A K D V V I S Y T E A Q Y L S V F G N  
RRDQS L RDNSKF H G L S F L Q K Y Q V F G E Y S L T L L C F P G S E N  
REKAYS R P L D S L H E E I A R G E M S M V L G I F G R G N E S  
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VEDLSS P Q E L T V K E Q S L A Y V E A G L L L V M N D G P V P S G  
RWHQTVAASSP N F Y Y G A G T G Y F R N F A Q M A L L L W G N H S D G  
R D Q S L H T N G N F F N G P L F L F A L G T A A L P F Q S F A S Y G N  
RRIEAKRNGQFT LSAFHKLFGSSNSGT L L T I F G G  
AWKDSVDSN H A M D F N P R H L V A Y A E S A F A M E V F R G Q N Q S C  
SASF SKNNNP F Y Y F P F P Q I V S L G A F A F Y P Q F F S N G T Y G A G  
RYNQSI A E N P W I V F P P G E I H N Y G A G V F L F E A F P S S  
E SI A N N P Y Y F T G L F S T V V V V P A A Y N F V I N L M S N H S A A  
RRV D A R L S N K D Y S E T R F H N M F G S S N S S T M  
VTEF SVQNNP Y Y F S G P F S L V A P A A H N F V V N F M S N H S A E  
RR L S C R A M N R E Y S E S F H T L F G S A N S S T M L T I F G G  
R I K T S N A T N P T Y S M S E G N G F T K G E S A A Y V V I F G D  
RFRDSI A T N P E F S I A P R F Y T A Y A D A V L P V N L W V D G R  
RISRQL E D N P E L V Y G P E H Q V N C G Q A L M M G C F G D G  
RYDES LATN A A S F L Y E L F P S Y  
RDAQLR Q P L S L F H A E V A R G E V A L T Y G T F A  
RLAACRANNP Q C V F G A N Q A I A Y L E A A V F I I G F G G  
RVDTSKATN P T F N L T T G T L F S F G E T A A Y I I A L G D R  
AIAAAKARNP K F A M A A G A Q N S A V E S A L Y L R V F G G V N  
RRAH S R R A N A Q Y T M S T H R L F A S A N S A I M M T T F E G  
RRV D A R E T N P E T L S K V H R T F G S A  
RQLASRVSN P T Y T F E K A G V G T S T G E L S S L V L T L G N  
TAEYS L L N N P E Y F S A P F S L V A P D A H N F V V H F M S N R S A E

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210            220            230            240

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 E T V P V R W L Q E W W L N E R F P E D F K P R H S Q T L F K T V  
 D V E T L K T V L H E E R L P D G E S T Y R K P F G L T L A A F N A  
 F P G G N M T K E V F A S F F G V E Q I P E N W Y R T A V D Y G L V S L N D  
 P P L P G V P D M L R V W M H E E R L P D G W R P Y H K T G L I H T R  
 F S F P T A P K E R V R V W L T E E R L P D E L G W K R S E R K L G S L D L V P  
 Q D D G Q L D I E A A R T F E G G R F P P D F H R A A R P M G A N N E  
 G V P N E A S I S A F F G P E R F P D N W Y R R G T P F G L E A I G Q  
 K T N E S V S A E V A R S F V I E E R I P E G W K R A S T V I S V A E V K A  
 E A G Q L D M A T A E S F F R D M M Y P P D F F R P A A P V A G D  
 H P E G V L T H D I L K L K S F F G W E R I P E R W T R R P G A Y G L L E F N F  
 K D L Q P I L L E E R L P D G W Q P S E R H Q M G L T L T A  
 T E Q A L D L K V M R G F F Q D S R M P R D F F R R N G T F D F G T A G E  
 D R V P F E Y I K A I F E E E R F P Y R E G W V K R N V P L T L P E L T A  
 N P E G Y L D A K T L M S F R G Q E R I P E N W Y R R V I L G D D Y G N V F N  
 R V D D L R T V L L E E R L P D G W E S R V R E P M G L T I A V  
 R V K D L Y P M L L E E R I P D G W Q P R V R T P G G I T F L T  
 N P N G Y I D R G I L K S F F G H E R I P N N W Y R R P S Y N R L G I V N G  
 R V E D L R S V L L E E R L P S G W E S R I R Q P Y G L T M C N  
 G P N Y T P D E A T I S S F F G A E K I P A N W T N R V A P Y D L N A V G S N  
 Y K R A I G D E Y S I P F

G Q A D L A S V S S F F G A E R I P D G W H N R R Y P Y T T A  
 T D K L G I P P A A W M R R W Q E E K I L P D G W R P T R T Q G L L D T V K  
 Q D D G Q L R L D H A R S F F E A A R F P D D F H R A A R P M S A D  
 N E S I S R S F A Q S F E Q E K I P S D Y Q K P A T D V S L V K L L D  
 G R L S L P N A R G F F Q N S Q M P K D F F R P N Q S I G L N E I G D  
 E G E P V V P K G R L E Q W L G D E R L P A D W P G P E Q G I G L T S I F G  
 A S G K V P V E L F R T W F G G D R L P Y E L G W T P P A T P Q G L L A T Q K  
 D K A P Y E Y I K A I F K D E R I P F Q E G W K R R T I P L T L A E L T L  
 N K G G D L K A N V L K S F F G H E R I P L N W Y K R P T S Q P M N T V D T  
 N I P G F A R L C V I K A L F E E E R L P W K E G W R P G K F R L N L V S L  
 A P K H W V K A L L G E D R I A Y R E G Y N K G K S V K T N K Q V G A  
 E N N A A Q K S W V K A L L G E D R I P Y R E G Y Q K G N T T K N P Q T L G A  
 A E N N A K T K Q H I R V L F E E E R L P F A E G W R Q P N P L V Q A S Q A E  
 K Q I S C D A V K A W F G E E R L P S G W T P Q R P M G M F S V L R  
 V D G N P P T A W V K I F F E Q E R L P F A E G F V N K D P V M T L D E I E T  
 E A T T S I S V D H A R S F L I Q E R I P D D Y E K P K V P V T L F R S L  
 V D D L R P M L T E E R F T E G W E P R I H D R F G L T M A K  
 P G V P V E W F R E W I G N E R I P V E L G W Q P S K R A I K L A D L N P  
 L T G D G N V S L I R Y W I E K E R I L P L E F G W Q P S K S E L N L P E N S L  
 N T T A N K L W V R V L F E Q E R L P F A E G W R Q P E Q P L Q P A V T A E  
 E S K S I S M D H A K S F L V D E K I P D N F Q R S D K P I S T  
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 E I A I R S W F V Q E R F P E G W S K R L V P F S T P E I L A  
 Q D D G Q L R L D H A R S F F E A A R F P D D F H R P A R P M T A D N  
 T T A P G P D M D S A L I S F F R D H R Y P K D F H R A P V P S G A R  
 F N P P Q G P K D R I I R A W F E Q E R F P T E F G W K P S A R T I K L A D L N P  
 H P E G R L D R Q T L K S F F G V E R I P D N W Y R R H S A R P Y R V E D L N A  
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 G G V P R D R L E Q W L G E E R F P D G W T R P E Q Q G F L A L  
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 G V T K G L P D D Y V R A V F G E E R L P Y D E G W S P R R F K V Y F P E A L A  
 Q N Q T A N R D M V E F F F E N E R L P Q M G W K A P N P A I S S T V L F D  
 R P E G Y L D Q S T L K S F F G E E R I P S N W Y K P P T P Y T L V D V V I A  
 H V E G A V S K A F L E Q W L G Q E R L P D G W H K P E I A I G L V G T A S  
 E A G Q L D M A A A E S F F K H M M Y P P D F H R P A E P V N S D  
 S P A G Y L D G A Q F T F F G Q E R I P D N W Y K R P V A V P Y N A V D V  
 P D T G H P Q V D W I R I F F G E  
 G R G E E I D V D T L R S I Y Q F E R F P D N W K K S E S T I G L S Q L H N  
 V P I S W I E E W W K N E T F P S D F  
 R V D D L R T W L T E E R F P Q G W Q P R Y T K R Y G Y T M M A  
 A T A Y C A P K K R V E T W L T E E R F P E E L G W K K S E R T L G L V D F V P  
 T L D G Q L T H E I V Y S L F G H E R I P D N W Y R R P E P F D I A G  
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 G V P N Y K S V A R M K E F Y V P E R W P E N W Y R R D T P Y G  
 A R N M T P D L E T V G S F F G P E R I P Q G W H N R V S P L N S S I I A N  
 E P A G Y L D K K N F K S F F G Q E V L E N W Y R R P S Y A P Y E A E D V V G  
 L T L F A G S V E D L T P M L T E E R F S E N W E P R V R S R F G L T I T K  
 Y P G G Y L S R E V L M S F F G Q E R I P Y N W Y R R N T V D A Y T A V D V  
 R V E D L T P M L T E E R F A D G W E P R V S S R F G L T M A R  
 K I S G T V P R A W V E W L F E F H R A A R P T G T D N E I E  
 Q D D G Q L D L E V A R I F F E D G R F P H D F W S R V A P Y T N N D V  
 K T I P V K Y V K A I F E D E R L P I E E G W K R R S T M G L V E F F G A  
 G D K G V A D L A T M K S F F G P E R I P E N G W S R P R E T Q G L L A T M K  
 R A D G R V L V S D L L T W F G Q D R I L P Y Y T K S A V P V S L D F M R T  
 N V N E S V T L E A A R S F V W H E R I P E N

Q E S I T V S R N F V E Y F F E N E R I P I S L G W T P P E  
 N K G G V L N G E V L K S F F G H E Q I P L N W Y K R P T S E P M N T V D T

250                    260                    270                    280

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UniRef90_R7S391	L V S W I M K H P V L A S	V G G N I G T T N S F A G L N I E D V T G G L	
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UniRef90_M2PTQ8	T V A N I I A A T V		
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UniRef90_J0DBC0	N S T Y L Q A S A I Y D Y T G R F W		
UniRef90_G1XKB4	A Q T L L		
UniRef90_M2U985	F N K T V L		
UniRef90_W4JVD1	L Q G M V L		
UniRef90_S8FKR1	F A D L G V T A A R F P E L I S I G G N T G T V N S F V G V N P K D I S G G V		
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UniRef90_K5XII5	G I S A I A S A H P I A P G K N E G V G N		
UniRef90_K3WD30	L V R K I		
UniRef90_B0DV60	L G K Q V A A		
UniRef90_R7SV03	N S T Y L Q A A T F I D S F R Q P G		
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UniRef90_M2Z4V4	F N G T V L		
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UniRef90_G1XNL7	M T Q A V R A V V G W K P		
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UniRef90_G7Y1F3	M M S K I S A V Q		
UniRef90_M4FYU2	W I T L Q L K V L A L L S P		
UniRef90_X8JU91	F N F T V L P V E H K I D		
UniRef90_W3XRC8	L A G N I		
UniRef90_G5A444	L N K S F K A A M P E Q		
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UniRef90_L7HVD5	E E V V L A A H P I E P G G N I I N G V N T Y T V D P N S P		
UniRef90_D0N8X3	G L D V V A A A Y P I Q P G Y N A G K V N N Y V		
UniRef90_S3CJ64	A I D G I I K S M E R Q D Y N R S P		
UniRef90_V5EA37	D I R Y T I Q K H P T L L N D F F V G G N A G R A D N W Q S V D I E K L T S G N		
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UniRef90_UP1000455E1B7	M L L V I		
UniRef90_N1PWD2	M S E L I V N A T N Y Q S		
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UniRef90_G7XCF5	F G D L I P E F F A A Y P D T F R F G G N T N G V N T Y T G V D I A N L		
UniRef90_R0KJX1	L V G N I R		
UniRef90_U5H9P2	L N L R S I Q A L W A		
UniRef90_S8FR02	V I K G I		
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UniRef90_U9SYU5	W A L L F N S I R T V Y P G Y T L G R T G A F F P L A F G G G V T N F		
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UniRef90_F9X1K4	F L D L L A G A A S Y P N T L R I G G N T G T T N S F T G V D V G D L S G G V		
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UniRef90_J6F6J7	L F N D H P I E P G R N V K G V N T Y K P D H S T P		
UniRef90_M2SHF4	V K K L V N A V G V E		
UniRef90_M5FSH4	V Q Q I L A M Y L K A P K L F G G N I G V N N F D G L T F G K I Q G G E		
UniRef90_F9X0W1	R A K R V R		
UniRef90_W718Y3	I V A K L M A		
UniRef90_M3C5Y5	I V S K I T A A		
UniRef90_K1Y125	T A T R I E L G V E E E V R D Q L K W		
UniRef90_Q2GWW6	N V D T V I N N G M Y P G I I R F G G N T G K T N S F V G I D T G S L		
UniRef90_K5X3V1			
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S S L P A A F T L A D D M G V V H N L L E H D A S L V H D D S Y
K F L F A G R D W N E T M T D D L N A H G A I E H D A S Y T R A D I K W Q H D
G N V I T D L M S I G P A N P G G L N L H G F I E G D A S F T R G D A F H G
G N L K T G P D P P A P A N P G G L N L H G A I E G D A S M T R G D A Y W G
G D I P T L T F S I G G A D P T G L D G H G R V N G D A S A S R C Y L
G D I P T G I Y S I G G Q D V Y G I D R H G L F E I D A S I S R G D R Y F G
T S P L K P V F T L S D L L S E H N F I E H D A S L V H N D E Y F Q T
N K S Y W N D R F D L L S K H N A I E H D A S L T R H D L A L Q P
T T G V D G T F H L D D L L A R K P L D H D G S L S R G D L A L G
P L P Q H F T L A D D L S V H G F I E H D A S L V H D D T H F Q R
G D L D G L S L G S G K N G I G G L N R H S V V E A D V S P N R E D Y Y T G
P P N F T L A D D L G D P N F I D H D A S L V H D D S F F Q M A
G W S I G G P P P S D T V T D A I L G Q H N I Y E G D T S I G R S D A Y L N N
L L T T T G N S S T F N L A D D L L A K H D C I E F D G S L S R N D F Y L G
G N P L T L S I G S K T F L V G G N L T H A V F E G D A S M T R G D A F F G
G Q W R F L S L Y D Y C R H N G V E H A A S L A H P D V R H D P Q
G D I A S F Y L G S G P G N V G G L N R H S T V E A D I S P N R E D F Y N G
V W H T I S D P G H R V L N L D Q L A L P N V V E H D I S L T R R D H
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P L P Q H E F T L A D D L G K H N F L E H D A S L V H H D D A F F
K F L F A G R D W N E K M T L D D L L N A H G G I E H D A S Y T R A D T K W Q P D
S L P E T I A L S D L L S Q H N V W D H D A S L V H T D A H F G R
S V S T T G V P G T L N L D H L D A S P V T E H D G S L S R P D R H G G
V A N P E Q N A T F F T L D H L N R H N V L E H D A S L S R S D A F F G
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D N V T F D L D N L N K H G V I E H D G S L S R N D I F F G
A T S R T S I S P I L T G S E P G L L A G H N K F E A D S S L T R N D Y F T S N
P V P E I F F S L Y D Y S R H V L P E H D A S L V R T D V Y F G H
G L T R T S W S P I I T G S E P G L N G H S K M E I D A S L T R N D F F A A G
P D T F S L D Y L S T H N M I E H D A S L L I H N D V Y F G
G R N Y W T D S L D L A D I D V H N G I E H D A S L L R E D A K
E R N Y W T D T F D L A D I S A Q L H R A R R V P L P C
Q R D F R S D T I D L G D L C V H N G I E H D G S F T R Y D T A L Q P
E D D P K K E N G I P V L N L D Q V G R P N A V E H P C S M T R R D R E Q G
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G T F R F V G L A P S T L D E N L A L H N R I E H D A S L V H A D A A P H A K
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G T L S P A V I F D L N D L S K H N N I E H D A S M A C S D S Y F G E
A S K W R F W E W G L K I D A S L A Q F G V I A H K A S L G H P D T
S N I F H N L L G L A G E P R G I T A G H N L L E S D S S N T R G D V Y E T G Q
D E T S H N E S G M P V L N L D Q T G R P H A I E H D V S L S R E D R A L G
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P G P N A T T W G L D T L G N H N I L E H D A S L S R S D K F F N D
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130                    140                    150                    160

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210            220            230            240

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 L L P P D V K S V E T F F G V G K L | P P D G Y W Y R R S V P L T F V I E  
 G K V P T E F V R Q W V G E E R F P | E G W K R P E K T I G  
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UniRef90_M7SCJ0	F V P H N G R N I T E P I L V K A C M D A F N I A R D F A V G F Q N G I I V N		
UniRef90_W9W9J2	W L P R D G R N L T I P Q V Q H A L E T A L H M D W F A A A S L C		
UniRef90_V2W8J8	Y I P R N G R N L T F K V I F C G L K A C Y G L S T S L A T I L T L G G F L A M		
UniRef90_T4ZZ71	F L P H S G K G I G V A Q V I L A L F F G I G V S P E L S A I I I A F		
UniRef90_F4RJS9	Y I S R T G I T D I H E L M Y G M Q E M L G F G P D T A A L L V I L G V K A A		
UniRef90_V5E945	L I H Q S G R K V A A S K M V V A S R A F N I A P T M A L Q L Y S P L F S T		
UniRef90_F4S713	Y I S R N G I T N V S E L L M Y G M Q E M L G F G P D I S A V V S F D L T S L		
UniRef90_M5CEB3	V I P R N G R G M T W K E L L G E A S R A A Y N L S P T L C K Q V P W L T A		
UniRef90_I2FU85	I V D T S G R K V P A S K M V A A I S R A F N I A P T M A L Q L Y S P L F P V L		
UniRef90_F4RFV5	Y I S R N G I T D V G E M M Y G M Q E M L G F G P D T A A I V T T L G L T T L		
UniRef90_M5G2D9	F L S R D G I T T Y A E M V I G L Q N V F N V H P T A V V L T T L G F V F D		
UniRef90_T0PIC0	V L P R S N I S A S D L R S A L G A L Q C D S L I Q R I L S R D S V M A L		
UniRef90_G2YYV6	F L A R S G R N I S Y E E I A Q A S R D V F N F G D D N I I I V L S A A F A Y H		
UniRef90_V2W2M1		D G Y H I E P A A L I L A A K V G L T T	
UniRef90_M2R8T7	F I P R Y G Q K I T I L E L I H A I C V V Y N F S W L L A F V L A L A G V M T C		
UniRef90_A0A024TX20	L I P R T G I A L T I F Q V D E A L Q K L F T G A A V T A L A S S V P Q E		
UniRef90_K1XHU9	F V P H N G R N I S R E P F I T A C M Q G L G L S H D F A A Q I F E T A L A D I		
UniRef90_F9FRH5	F I N R S G R N I S Y D E I A Q A A R V V W N F G D D N I E I V L G P T		
UniRef90_C1G5Q2			
UniRef90_T5ALI1	F L P Y N G K R I T M I D V I V A C F E G F G V S P E T S A L I M A D G L V E S		
UniRef90_T5AQ77	Y L P R D G K N M T V S Q V E A A L R E A L S M T S S L A A S N T		
UniRef90_F4S799	Y L P R N G I T D M T T L L Y A S E E G L G M A P P D F A L I L V A F A L K T C		
UniRef90_S8AJ15	Y I P R D G K N L T V D M V H A A L M K A L H M T P T A A W A L T T A		
UniRef90_N1PL05	Y L P R D G K G L T I S Q V E Q A C M I G L H Q S K A L A T A A R P		
UniRef90_L2G732	F I N R S G R N I S Y D E I A Q A A M R V V W N F G D D N I A L V V S P T S Q L		
UniRef90_F4RYY1	Y I P R N G I A T V V D M I S G M E E M L G F G P D I A A V I V A L G F I A S		
UniRef90_UP100044086ED	F I H R D G K Q I H L L S S L V K A L Q D V Y N L S E E L A Y F L A V P G I L L C		
UniRef90_B0D733	Y I S R E G T Q V T F F K L I L A L V K V Y N I S V P L A F L L A F V G F L T C		
UniRef90_L8X2R3	Y L P H S G K N L G P L Q L C K A V H D L Y G L S Y P L A A I F A F T I A I G G L		
UniRef90_M2Z124			
UniRef90_M2M9R5	Y L P R D G K A I T K A K L K A A L I V A G N S T P L F A D V L S S I M G I D L A T I L G V L G T V W V		
UniRef90_F2TJV0			
UniRef90_H0EKPO			
UniRef90_S7QKR0	Y L P R N G R K I S Q W D L I R A L Q Q G Y N C S L P L A I F L T W G G Y L L L I G G A		
UniRef90_M2XM89	Y I S R N G I V T A G E V I A G T A E L F N M G V D V A A F L L A G S V A L D		
UniRef90_UP100044186EC	M T V P T L V A A L N T G L K V S S E T A T F L A N A G L A I A		
UniRef90_E4ZTC2	Y I N R T G R N I S Y D E I A Q A A R V V W N F G D E N I L V V		
UniRef90_M7SZ99	L I H V S G R K V A A S K M V A A F S R A F N I A P T M A L Q L Y S P L F P L		
UniRef90_R9P357	W L P R S G K N I D L P T L Q V A V A G A Y N Y A P N T F D D V F K L A Q N C N		
UniRef90_G0RUK9	Y I N R S G R N I T Y A E L A H A V R K V W N F G D D H S T N S F P Q S M L V L		
UniRef90_Q4WA37	Y I P R S G I T D M T T L L Y A M Q E A L A I K T C V D L T T L K M S		
UniRef90_F4S7A4	Y L P H D G K N L T K E T V V A G L G N G L N F D P V L A G I M W E Q A I F V A		
UniRef90_H0ECHO	Y L P H D G K N I D L A T I Q S A F E A A M G F S T E S F V S I T Q S A L A V		
UniRef90_W3XEP2	I I P F D G R S I S R E A I I H A L T D T F H L S P K M A T L F A A G A L K A N		
UniRef90_W2RYS6	Y L P R S G T K I H F R Q L A R A L H D V Y H L S P Y P L S A F L A S A A F V A L		
UniRef90_S7Q3M2	Y I N R S G R N I T Y A E L A H A V R K V W N F G D		
UniRef90_A1DA16	Y I N R S G R N I T Y A E L A H A V R K V W N F G D		
UniRef90_D8QAD1	Y L P R N G D D V S L L D V I C A L Q E C Y G L T W F L A A F L A I G		
UniRef90_B2VWW1	Y L P R N G I A S V V Q M T L A S N E V F G M G L D L S A F L S V Y A S V M G		
UniRef90_UP10004560C0F	I I P L D G R G I R P H Q L A S A V M H T F N L S P T L A L A L T W T A E P L W		
UniRef90_V2WY05	Y I P R D G R N I T F A T I F S G L Q A C Y N I S T P L T I L L T V G G F L L I		
UniRef90_E3KPY2	Y L E D S S Q K I P V I H K L M I A L V E C I N S L W T F A I V F A I V G T L R L		
UniRef90_M5BUM4	Y L P R N G V T L F T D A I L A C N K V F G M G L E I G T S L S T V A M F L A		
UniRef90_L2FIL3	Y L P K D S R D I P F Y K L I Y A L V K C F N L S W L N A I F L T F F S I F L F		
UniRef90_F4RB84	I I N P S G R D I S F H Q L A A A L S R T Y N I S P T F S V R A L L G A		
UniRef90_F4S6R1	Y L P R D G R N I T S F H Q I T S A I S R T Y N I S P T I A M Q L L G A Y P I L		
UniRef90_K1WGL2	I I P R D G R N I T I T D V H A V L K S A L H F D G P L A A N L A		
UniRef90_M7X700	I I P R D G R H I T P S Q L S S A I Q Y A Y N L S P T L A I Q L L S P F E P L W		
UniRef90_J4VZH4	P H D G R N I T V E Q F G K A V S E G L N M D P S I G T L P		
UniRef90_R1EXB2			
UniRef90_A8P840	Y I N R D G K N L S A W S I A K G L R E C Y G L T M P F S I F L S Y T T F L L L		
UniRef90_B2VS68		M G A D F A T L I G A T G L L A S	
UniRef90_M3AU11	Y I S R D G I V S L A E A V A A I N K V Y G M G I E L A T I L L A V M G V V W A		
UniRef90_B8NQ60		H V D P P E G T P R T T A N F G L R	
UniRef90_M5BM60			
UniRef90_F4RMW1	I I N A S G R D I S F H Q L A A A L S R T Y N I S P T F S V R A L L G A		
UniRef90_K1WFB8	Y L P R N G I N I S M D D I A Q G L A E S I N L D P A A T A I F G A A A V		
UniRef90_E2LZ55		D G F N V Q N N A L S I A A K A A L F T	
UniRef90_R1G1K6		F K D G M N I A T D L A A G T F E T A L G A N	
UniRef90_B2W0A0	I I P R N G I A T I G Q I Q A G T Q A L F N M G A D L S A L A T G G A L D G		

90            100            110            120

UniRef90_W4GGJ3	M K V G S T V H G K Q Q L T L   A Q   L S Y H N S I E H D A S L   T R Q D A		
UniRef90_R9AFL8	K S S G D G K T W L D L   K D I E A P N V I E H D A S L L   R H D R M F Q P N		
UniRef90_M2MQP7	G D I A S W Y L G A G P G N V G G L N R H D T A E C D I S P N R E D Y Y L A		
UniRef90_M7SGP9	G L E T T D L E D L N A H N V T E H R A S L T R D D Y R A P G D		
UniRef90_G0RU68	K S Y R L A A F D L H E L L S D H G F V T H D C S L S R G D A		
UniRef90_H3GUM1	P D I F S L D F L S H H N A P E H D A S L V H T D A Y F G H		
UniRef90_T5AG20	G L L S A K L P L T D I F T L H D T D R R S W I Q H S R S L S R E D I P K S G		
UniRef90_G4UCN3	S T T G H W T T F H L S D L N Q H G V I E H D G S L S R A D L		
UniRef90_M2YIZ2	T W S I G G P P P G N A L T E G L L G Q H N T Y E S D M S I G R P D A Y T N N		
UniRef90_E3RON6	G L L K N P Y S Y F S Y F N L E N L A S H G A I E H D I S L S R R D F A Q D Q G		
UniRef90_J6FCR6	G D M K T L S I G G A V Q N A G G I R E H G I L E G D A S V T R K D L K L G N N		
UniRef90_S2J0Z9	Q E A N P H D S L F A Q F D L D R L T V F G V L E H D V S L T R Q D F A L G H Q		
UniRef90_H3H4P0	G G L S P D L F D M N D L S K H N Q V E H D A S L A R I D S Y F G		
UniRef90_G4Z2Q9	L T P A Q F D L N D L A K H N P I E H D A S L S R S D V Y F G E		
UniRef90_I1BPA9	K H S L S Q L G F T D K I N L N Q L S V Y D V L E H D V S L T R H D T A L L P H		
UniRef90_H7SQJ6	R N P P M T A L P H F L D R E L A L H N H I E H D A S L V H A N T A P Q H A		
UniRef90_G7E4S1	G N S A T G I G S K A A G R Q Y G L D A H S R C E G D I S A T R E D Y Y L N N		
UniRef90_L2FCY6	G D I A S F Y L G A G P G G V G G L N R H S T V E V D I S V N R E D F Y N G		
UniRef90_A5AAF5	S D D P K H G P G I P V L N L D Q V G R P H A L E H D V S I T R Q D R A L G		
UniRef90_F4RQH1	K M S I G R T D S R T D G P L S L G T H N K Y E L D G S L G G D D A Y F A P G		
UniRef90_D0N8X0	S K L P A E F S L A D L G E H N V V E H D A S L V H D D S W K G Q		
UniRef90_G5AHA2	P T T F S L D I I S R H N V L E H D A S L		
UniRef90_M7SCJ0	P V P N S T F F N L D M L A T H G V I E H D G S L S R R D A V F D P T		
UniRef90_W9W9J2	S S L P P L R K D G T F D L V D T R H N V I E H D S S T F R L D F H Q G		
UniRef90_V2W8J8	K N P D G S T S V P G I L D L K L V G R V E H D A S L V H E D L Y P P D W		
UniRef90_T4ZZ71	G I I S S R N G L S F K I D L E D L A Q H F V I E H D C S F S R N D A		
UniRef90_F4RJS9	V D L T T F K L S I G R T D P G V L S S H N K F E V D G S L L S R V D E Y F A Q G		
UniRef90_V5E945	F S D R G H V F D L E S I G I A N I E H D A S L L R P D Y F L A D W		
UniRef90_F4S713	K T S I G Q T D S R T D G P L S G L N A H N K F E V D G S L L S R V D G Y F A K G		
UniRef90_M5CEB3	K L I Y A G R D W N E T M T L D D L N A H G A I E H D A S Y T R A D I R W Q R D		
UniRef90_I2FU85	S E K G H V F D L D S I G I V N I I E H D A S L L R P D Y Y L A D W		
UniRef90_F4RFV5	K A S I G R T D S R T D G P L S G L N A H N K F E I D G S L T R V D G Y F A N G		
UniRef90_M5G2D9	G D P R T G Q H G K F T G Q Y G G V S R H G T F E L D V S L A R S D F Y L N		
UniRef90_T0PIC0	G H G G L L T L A D L D V H G A I E H D A S L L T R Q D A A L G		
UniRef90_G2YVY6	P G L D R L D L D M L A V H H R I N C P A S P T R N D R E L L G		
UniRef90_V2W2M1	S P E P E T F T L D D N L K Q H R V I E H D A S L L S R Q D F A I G		
UniRef90_M2R8T7	G N G W S V S L H D L A V H N V I E H D R S M V H D D A P P N A R		
UniRef90_A0A024TX20	G K E A T T E E T P K T L T L S A L S Q H N A M E H D A S L L S R Q D A A L G		
UniRef90_K1XHU9	A T A N P R L N S T T F D I W M L N T G I V E H D G S L A R Q D I F F D P		
UniRef90_F9FRH5	R K E H P G P R I D L D M F A D D A V Q F K I N C L A A P T R D D R R		
UniRef90_C1G5Q2	G N P I S L T P G F G I G G P G L I G S H N M I E S D S S N T R D D L Y A		
UniRef90_T5ALI1	K R F L D S V F D L E E I S E P F G I E H D C S F S R K D S S Q G		
UniRef90_T5AQ77	R Q L K S I L H A D G T F N L T D L R Q H G V I E H D R S F T R R D L G D G		
UniRef90_F4S799	V D L T T L R P D G T F D L V D T R R H N V I E H D C I A A P T R N D R G M G		
UniRef90_S8AJ15	L K P L L R P D G T F D L V D T R R H N V I E H D A S F T R L D F H Q G		
UniRef90_N1PL05	L K E I V R S N G T F D L I D L R R H N V I E H D A S L L T R L D A R Q G		
UniRef90_L2G732	H P G P R I D L D N F N D D P V Q F I V N C I A A P T R N D R G M G		
UniRef90_F4ARYY1	F D L T T L T S I G Q T D T D G L E S H N K F E V D G S M S R V D G Y W A N		
UniRef90_UPI00044086ED	G H I V G L Y V D L D K L A R V N R I E H R F S L V H A D A G E G Q A		
UniRef90_B0D733	G R L S F Y S P A D D T L D L A S L S Q R G K I E H D A S L V H P N T L P		
UniRef90_L8X2R3	F G G V L I C G S K G K L D L A D L A K A H K I E H D A S L A H M D L A D G		
UniRef90_M2Z124	G I Q A N P N P L A T S F D L D Q L D Q H N F I E H D G S L S R Q D I Y		
UniRef90_M2M9R5	V K S V T R K D G T F T L V D L R R H N A V E H D A S F T R L D A R Q G		
UniRef90_F2TJV0	G N P I S L T P G F G I G G P G L I G S H N M I E S D S S N T R D D L Y		
UniRef90_H0EKP0	A Q F G H I S L D D L R R H E Y I E H K A S L V H G D A		
UniRef90_S7QKR0	G L F S S P D V L S G A F D L N D L D Q H N F I E H D A S L S R Q D A Y F G		
UniRef90_M2XM89	G D I P T L R F S I G G A D G G L G T E T G L D G H G R F N E G D L I P H S A		
UniRef90_UPI00044186EC	K N P A S G A F D L D E M N V H N G F E H D A S L S R R D Y D L G		
UniRef90_E4ZTC2	G P T R M N H P G L D R I D L D M L A V Q Y D T N C I P A A P T R N D R E L L G		
UniRef90_M7SZ99	F S E R G H I L D E D I G I A N I E H D A S L L R P D Y H L A D W		
UniRef90_R9P357	L T T T G N I S T F N L A D D L A K H D C I E F D G S L S R N D F A L G		
UniRef90_G0RUK9	A P T F A M H G W P E T I D L D Y F N A Q Y V I N C I P A A P T R N D R A		
UniRef90_Q4WA37	G D T D A R T D G P L T F L L G R T P T H N K Y E V D G S L T T D D A Y F A G G		
UniRef90_F4S7A4	G P N A T A F T L N D L N P H G V L E H D A S L S R S D A H F G S		
UniRef90_H0ECHO	G S T T G N S S T F N L Q D T A H N H A I E H D G S L S R N D A F F G		
UniRef90_W3XEP2	P A P N A T T F D L D M V D K H G F I E H D V S L S R D D I A L S S		
UniRef90_W2RYS6	G Q F S D L S L G D L C R H N H I E H D A S L A H R D A A P E Q E		
UniRef90_S7Q3M2	D N D D L V Q Y V I N C I P A A P T R N D R A		
UniRef90_A1DA16	D N D D L V Q Y V I N C I P A A P T R N D R A		
UniRef90_D8QAD1	G Y V L L H W W P W R V F R L E E I G K H G A V E H D A S L V H E D A R G R P		
UniRef90_B2VWW1	G N I T A A S I G G T G L D L G L S A T H N R F E A D C S P T R A D L Y		
UniRef90_UPI0004560C0F	R H R G E F D L S D L C A H N V V E R D A S L L R P D V N S V E Q		
UniRef90_V2WY05	K R L D G S K I K P G V I D L H I L I G R H N G T E H D A S L V H E D		
UniRef90_E3KPY2	G K L F G F S I Q E L G E H G K I E H D A S M T R F D A		
UniRef90_M5BUM4	G W S M G G S P G K S L L S P G L S G A H N K F E G D G S P T R L D L Y M N N		
UniRef90_L2FIL3	P D P N A D Y I D L D M L N K H N V I E H D G S M S R R D E Y F D P T		
UniRef90_F4RB84	G K V W N L C I D D L S L H D F I E H D A S L S R F D		
UniRef90_F4S6R1	D D L S L H D F I E H D A S L L R P D I Y D P D Y		
UniRef90_K1WGL2	H S L K P I V R K D G T F D L F D M R K H N V L E H D R S V T R F D F R Q G		
UniRef90_M7X700	R D R G W F D L S D L G V H N L V E H D G S L T R E D N N S P F A		
UniRef90_J4VZH4	A R V L T L A L G R G T L D E D L N T P G L L Q H I A S L S R D D V T P T E A		
UniRef90_R1EXB2	N P E P N A T F F T L D N L N R H N V L E H D A S M S R A D A Y L G		
UniRef90_A8P840	R K F R P I D L Y E I G K H G V V E H N A S L V H H D T P P G Q I		
UniRef90_B2VS68	A D P L S L S F N L D D L N Q H N F P E H D V S I S R P D A Y F G		
UniRef90_M3AU11	G A P L S L N P S L S I G S N G L D Y S H N F I E S D S S P T R D D L Y		
UniRef90_B8NQ60	D A G Q V N E D G D P V L N L D Q L G R P H A I E H D V S V T R Q D R A L G		
UniRef90_M5BM60	M E G D A S P T R N D A Y		
UniRef90_F4RMW1	T T L W E G R K T I N L S D L C A H G L I E H D G S L L R P D V N S G D		
UniRef90_K1WFB8	L T S T T G N P N T F N L D D L Q G P G L I A H D A S L S R A D Q Y W G		
UniRef90_E2LZ55	S L L N D Q F T L D N D K L H G N I E H D G S I S R A D H A L G		
UniRef90_R1G1K6	P I P N A T Y F D L D M L N V H N F I E H D G S L S R R D A Y I D S S		
UniRef90_B2W0A0	G D I L S T K M S I G G P D N S L L G T P S G I A G H G K F N E G D A S A T R L		

UniRef90\_W4GGJ3  
UniRef90\_R9AFL8  
UniRef90\_M2MQP7  
UniRef90\_M7SGP9  
UniRef90\_G0RU68  
UniRef90\_H3GUM1  
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UniRef90\_G4UCN3  
UniRef90\_M2YIZ2  
UniRef90\_E3RON6  
UniRef90\_J6FCR6  
UniRef90\_S2J0Z9  
UniRef90\_H3H4P0  
UniRef90\_G4Z2Q9  
UniRef90\_I1BPA9  
UniRef90\_S7QJ6  
UniRef90\_G7E4S1  
UniRef90\_L2FCY6  
UniRef90\_A5AAF5  
UniRef90\_F4RQH1  
UniRef90\_D0N8X0  
UniRef90\_G5AHA2  
UniRef90\_M7SCJ0  
UniRef90\_W9W9J2  
UniRef90\_V2W8J8  
UniRef90\_T4ZZ71  
UniRef90\_F4RJS9  
UniRef90\_V5E945  
UniRef90\_F4S713  
UniRef90\_M5CEB3  
UniRef90\_I2FU85  
UniRef90\_F4RFV5  
UniRef90\_M5G2D9  
UniRef90\_T0PIC0  
UniRef90\_G2YVY6  
UniRef90\_V2W2M1  
UniRef90\_M2R8T7  
UniRef90\_A0A024TX20  
UniRef90\_K1XHU9  
UniRef90\_F9FRH5  
UniRef90\_V2W2M1  
UniRef90\_C1G5Q2  
UniRef90\_T5ALI1  
UniRef90\_T5AQ77  
UniRef90\_F4S799  
UniRef90\_S8AJ15  
UniRef90\_N1PL05  
UniRef90\_L2G732  
UniRef90\_F4RYY1  
UniRef90\_UP100044086ED  
UniRef90\_B0D733  
UniRef90\_L8X2R3  
UniRef90\_M2Z124  
UniRef90\_M2M9R5  
UniRef90\_F2TJV0  
UniRef90\_H0EKP0  
UniRef90\_S7QKR0  
UniRef90\_M2XM89  
UniRef90\_UP100044186EC  
UniRef90\_E4ZTC2  
UniRef90\_M7S799  
UniRef90\_R9P357  
UniRef90\_G0RUK9  
UniRef90\_Q4WA37  
UniRef90\_F4S7A4  
UniRef90\_H0ECHO  
UniRef90\_W3XEP2  
UniRef90\_W2RYS6  
UniRef90\_S7Q3M2  
UniRef90\_A1DA16  
UniRef90\_D8QAD1  
UniRef90\_B2VWW1  
UniRef90\_UP10004560C0F  
UniRef90\_V2WY05  
UniRef90\_E3KPY2  
UniRef90\_M5BUM4  
UniRef90\_L2FIL3  
UniRef90\_F4RB84  
UniRef90\_F4S6R1  
UniRef90\_K1WGL2  
UniRef90\_M7X700  
UniRef90\_J4VZH4  
UniRef90\_R1EXB2  
UniRef90\_A8P840  
UniRef90\_B2VS68  
UniRef90\_M3AU11  
UniRef90\_B8NQ60  
UniRef90\_M5BM60  
UniRef90\_F4RMW1  
UniRef90\_K1WFB8  
UniRef90\_E2LZ55  
UniRef90\_R1G1K6  
UniRef90\_B2W0A0

130                  140                  150                  160

The alignment shows a highly conserved sequence of amino acids (H, V, Q, L, D, M, A, L, L, G, Q, L, S, M, S, T, D, G, V, Y, I, T, K, T, Q, L, A, K, Y, R, A, L) with some variations at positions 130, 140, 150, and 160 indicated by colored boxes (red, blue, yellow, green). The variations are as follows:

- Position 130:** Red box (UniRef90\_W4GGJ3), Blue box (UniRef90\_R9AFL8), Yellow box (UniRef90\_M2MQP7), Green box (UniRef90\_M7SGP9).
- Position 140:** Red box (UniRef90\_G0RU68), Blue box (UniRef90\_H3GUM1), Yellow box (UniRef90\_T5AG20), Green box (UniRef90\_G4UCN3).
- Position 150:** Red box (UniRef90\_M2YIZ2), Blue box (UniRef90\_E3RON6), Yellow box (UniRef90\_J6FCR6), Green box (UniRef90\_S2J0Z9).
- Position 160:** Red box (UniRef90\_H3H4P0), Blue box (UniRef90\_G4Z2Q9), Yellow box (UniRef90\_I1BPA9), Green box (UniRef90\_S7QJ6).

170                    180                    190                    200

UniRef90_W4GGJ3	R E A H S R T Y N P A F T F G P Q Q F L A Y G E A A L L V L A L		
UniRef90_R9AFL8	R R E N K V R N G Q Y F L P G K L K I F G A G N S A I P L L I L W D G		
UniRef90_M2MQP7	N A A F S L K N N P Y Y F P F P S I V S L G A F A F Y P Q F F S N G T Y G A G		
UniRef90_M7SPG9	V E A L S G P P A L A G T P L T Q S L G E A A L L L P A A P P N S S A N A S G V		
UniRef90_G0RU68	R D L Y D I A H N P Q Q C G A R S I A F G A L E N G F L L Q A L G		
UniRef90_H3GUM1	R A V L C E T T N P E C T F G A S E K K K S F L Q	A A L L L V A L	
UniRef90_T5AG20	R V R D G N V H N P E K Y D V S A A G H G A V E A A R M M L A M G N R Q G		
UniRef90_G4UCN3	R I E E G P R G N P N F R M S K E K R F S A I E T A L Y L R V F G	R	
UniRef90_M2YIZ2	K G K Q S V E T N P Y F F S A P F S G V I V A P A A Y L F V I N L M S N H S A E		
UniRef90_E3RON6	R I K Q Q L I D N P E L V Y G P Q H Q V N C G Q I A L M M G C F G D G Q		
UniRef90_J6FCR6	A Y T N S K E N N N G F D F N P R A I V A Y A E S G F A M E V F R G Q N S R Q T		
UniRef90_S2J0Z9	R W M E S I R D N R H M H L N F F S Q F A S S E C S L L I D I L G		
UniRef90_H3H4P0	R M A W G E E H N P E F D F G T T A F I I A G A E A A L L L R G F G G E N G N S T		
UniRef90_G4Z2Q9	Q V A Y G R K N N P E F D Y S S T A F I G S A E S A L L L R G L G G Q N G N Y S		
UniRef90_I1BPA9	R W L E S T K H N P L F H Y P L F Q I A S F E C N L L L N T I G		
UniRef90_S7QJJ6	R E Y Q T N D T I D A F H A E V A R G E V A L V L G I F G A A S T D D E		
UniRef90_G7E4S1	N S K E S I A Y N P R L Y F A Y T L V V V L L G E Y P F L P N F F S N G T Y G A G		
UniRef90_L2FCY6	N S M F S Q K Y N P Y L Y Y F P F P L I S L G A F A F Y P Q F M S N G T Y G A G		
UniRef90_A5AAF5	F G K F E H Y V A C S E V A L R S V F G	K	
UniRef90_F4RQH1	Q Y K E C R D M N P E C H W A V V D Q F A F Y A A Q N L I S T L I P S S E E N		
UniRef90_D0N8X0	R E A D S A A Y T P E F F T T E R A L T A Y A E A V V M M L L V M G E Q S T S		
UniRef90_G5AHA2	R L S E C R A N N P E C V F G T N Q T T F S Y L E A A V F I V G C G G N V		
UniRef90_M7SCJ0	H A F D M S L I N P D F T I L E G A P V I M G E N A N M L A I W G H		
UniRef90_W9W9J2	R D K E S R A A G A P K L P L N L W F V R V L Q A V G A V N T A		
UniRef90_V2W8J8	R E R E I S P K K L L H W F H R D L A R G E M A I L I G V W G E M N G G V A		
UniRef90_T4ZZ71	R V K D Q R I R N P K T V Y G A R A W M N G A E V G L V T S A F G I		
UniRef90_F4RJS9	A Y Q D C R N N N P H C Q W A I G E Q L A Y V A Q S F V S K T M A S A A P D		
UniRef90_V5E945	R R A E S K R K N R Q Y S S N V V Q L I G S G S C C L M L N V F G G K V L D L R		
UniRef90_F4S713	Q Y K E C R E K N P Q C Q W A V G E Q F L Y I A Q A F V G D T M T S A D A N G N		
UniRef90_M5CEB3	R R A H S K A F N G Q Y I M N R S K S F G C I N S A I A Y D V F D G N A A D		
UniRef90_I2FU85	R R R E S K E H N R Q Y S S N V V Q L I G S G S G C C L M L N I F A G K V L D L R		
UniRef90_F4RFV5	Q Y K E C R E K N P C T W A P G E Q L S Y I A Q A F V G S T D M T S A D E N G N		
UniRef90_M5G2D9	Q H E R A R V E N P W L Y F P E L V L H N Y G A A T F L Y E A F P S S		
UniRef90_T0PIC0	R A A D S K A R N P A F R F G R E Q V V A Y A E A A V L F V A F		
UniRef90_G2YVY6	R H N Q S L A E N P H F R F G N L D A A C A L A Q Y A N L V G M L G K I G K		
UniRef90_V2W2M1	R L A D S L A R N P N V T N S Q E F G I R S F E S A L Y L S V M G N G S		
UniRef90_M2R8T7	R D E Q S K R P M R K L H T R I A N S E A A F L A L I Q Q Q S T D D		
UniRef90_A0A024TX20	R E E Q S K A K N E A F V F D A K Q Q F L A Y A E A A L L L L A L R		
UniRef90_K1XHU9	H A W H M S A A N P R F S I A P A A P V I V G E N A M L L G I F G K G N A T S		
UniRef90_F9FRH5	R H N D S K A T N P N F R F G N S G A I C S L A Q Y A N M F G M L G R Q G K		
UniRef90_C1G5Q2	R F Q E S K L E N P Y F Y Y G P F T G L V S R N A G Y I F P G R L L G N Y S R A		
UniRef90_T5ALI1	R I K A E R R R N P R T K Y N K D A A A Y G S A E V G M L L G V Y G T S V R		
UniRef90_T5AQ77	R A T E H K Q I A R E S L P		
UniRef90_F4S799	E Y N L C R N L N P Q C W A V V D Q L A F Y M A Q A L V P S I M P S S G P N G L		
UniRef90_S8AJ15	R N K E S K R D G A P G L G L W F V A V L Q A V G V M N T A		
UniRef90_N1PL05	R R R E R K A D G G I A L P L N L W T V S F I N T A		
UniRef90_L2G732	R H N D S K A L N P K F R F G N H G A V C S L A Q Y A N L F G V L G R R G K		
UniRef90_F4RYY1	Q Y N D C R N N N P Q C Q W A G Q Q A H A Y I A G A F I T N T M A S A D I H G N		
UniRef90_UPI00044086ED	N N L M G K E N L D K I H A T V A S G E I I M I M W M F G H G T D		
UniRef90_B0D733	R E A S S P S P L L S S F H E Q I A L G E C G I L A W L V L R P H N R K A S		
UniRef90_L8X2R3	R E S Q V P R P L R A D Q A I V A R G E S V L S V M V M G D G Q F		
UniRef90_M2Z124	R I K V Q R A L N P D F I Y G A R Q L V S T G E T A L Y L S T M G N		
UniRef90_M2M9R5	R D R E E K A A G N G A G V T F W R S P R L Y V T T W S Q A C I L L Q		
UniRef90_F2TJV0	R F Q E S K F E N P Y F Y Y G P V T G L I N R N A G Y I F P G R L F R N H S R E		
UniRef90_H0EKP0	R F Q Q S V S E N P Y F F N G A F T G V A V Q P A A Y T F I I Y R F M G N K S A E		
UniRef90_S7QKR0	E A T Y T T P M D A L H A E L A R G E V A L V L G I F G		
UniRef90_M2XM89	R T Q D S Q A I N P T F T Y G F R E F I F Y G E T A L Y L Q A M G G D		
UniRef90_UPI00044186EC	R Y Q D S Q A I V T N N P N F Y F V P P S A I V V V G A T Y F I P A F F S N A T I		
UniRef90_E4ZTC2	R V K S S R A Q N P K F S L A K H R F I S Y I E S A A Y H A I F R D		
UniRef90_M7SZ99	R H N D S K A N N P H F R F G N Q M A I C S L A Q Y G N M F G V L G R V G K		
UniRef90_R9P357	R R T E S R E Q N R Q Y S S N V V Q L I G S G S C C L M L N V F G G N V M D L R		
UniRef90_G0RUK9	R V A D A M K A N D K F N A S I N Q Q M S P G T T A L Y L T L W D		
UniRef90_Q4WA37	R H N Q S K A E N P N F V F G N Q G A I C S L A Q Y T N M V G V L G K F G K		
UniRef90_F4S7A4	Q Y D M C R N S N P E C H W G V E Q L V F Y L Q G Q A F I P T M M T S T G A D		
UniRef90_H0ECHO	R Q V I S R S T N P D Y S F S A S V E F S L G E M A A P F L A L G D		
UniRef90_W3XEP2	R V W D A K L I N P G F N L T A G L L G S Y G E T S V F L T A F W N		
UniRef90_W2RYS6	R V I Q S Q K R H V E V Y G I K E A I L S Y G E S A L F F N V L G		
UniRef90_S7Q3M2	R E R Q Y A R P L D G V H A E I A R G E V A L V L G I F G		
UniRef90_A1DA16	R H N Q S K A E N P E F V F G S S A Q Y T N M V G V L G K F G K		
UniRef90_D8QAD1	U R E K E S P P L D A V H A E I A R G E I A I M L C V W E Y A L G E P C		
UniRef90_B2VWW1	R F K D S V A T R R L Q C A A S D G Q Y S L R L G Q K V A S F K T A L L H G L L G G K I S D L R		
UniRef90_UPI0004560C0F			
UniRef90_V2WY05			
UniRef90_E3KPY2	K K K L E L E S R L L T K F E N Q S K L L G R G E V C L A L Q A C L R S G S E S		
UniRef90_M5BUM4	R Y N H S L S T N P Q		
UniRef90_L2FIL3	H I Q Q M S L L N P T M N V T E A R G T S A G E C A F M L A V W G S		
UniRef90_F4RB84	A Q Y E S E R T R P M T K R G I F A M G E V G L I L S I F G K H A S F E L		
UniRef90_F4S6R1	R R I L E C A N K N P C F H R A L N F D L F G S G N C G L M		
UniRef90_K1WGL2	R K K E S R A A G S P A L P M N L W F V N L L Q T V S L L N T A Q V A		
UniRef90_M7X700	R R I L E A R E H N P Q F V Y T L H R I F A S G N A A L E F R T I D D K I Q D H R		
UniRef90_J4VZH4	V E K L S A P A R I P P Q H D A I A L G E A A L L L M M M K E G P V P S A		
UniRef90_R1EXB2	R Q L V S R S E N P E Y T F T Q T E A F S L G E V G A P V I V F G D		
UniRef90_A8P840	R E K E S P P L T S V Q A K I A R G E L A I Q A V W E K K V		
UniRef90_B2VS68	R F E N S K R Y N P E L V F G K E E I L S L A E N S L L L Q T M G G A G S D		
UniRef90_M3AU11	R G F I A R N A G Y L F A L R L F A N H S T E		
UniRef90_B8NQ60	R F E Q S K R D N P E L D L D K R M H Y I A C A E V G G I L M G V F G K G L Y		
UniRef90_M5BM60	T R E K S I S T N P C Y F T A P F A G L F V S T L T H F I S P A L L S N H S M E		
UniRef90_F4RMW1	R R M E C A A K N P A Y Y R S F K F D L I G S E N C A I L L A V T G G N		
UniRef90_K1WFB8	R I A T S K A T N P E F D L P P T I L R N S A I E W A A I L T V F E E P D N		
UniRef90_E2LZ55	R H A D S L A N N P N T N K E S Q I K L T E A A L Y L S V M G D		
UniRef90_R1G1K6	H A Y A M S K F N S G F T I T E D A F V I L G E N A M M L V W G S		
UniRef90_B2W0A0	R Y A A S K A V N R Q F Y F N P S A A V V M G A Y Y F I P G F F S N G T I G A G		

D S T G H V R V D W L R M V L E Q E K L P F D L K W R T R P I C I A D V L G  
R Q D Y I R P F F V E E R L A Y R E G W H P R E D P A G F F G L S F  
G V A N Y E S I S S I F V P E K W P S Q G W Y R R A T P Y G  
Y D D L Q A P K D R V A A W F A E E K L P I V L G W Q A P S R E L G L A D I Q G  
G N P K L E W V R S L F E E Q R I P T H L G F  
G E G D A I S V E H A R S F L V K E Q I P S D F V K S V E P V S V A R L N A  
A N L E F L R S M F E H E R L P R N L G W K P T P F A G P I E E M L D  
G T E G G A E T R W V R V L F  
E P A G W L D G K M F K E F F G Q E R I P D N W Y R R P T L N S Y D I P N A  
T I P L K Y V R A I F E E E R L P V K E G W T K R T S M G L I E F F R S  
P I D D H W F R Q D K F P P Y W S R R S V P M T A E I I T  
R D G T I T L P H L K S F L L N E S F P E D W H P R E T T F T L K E L A T  
A T T F T A T F F L Q E M F P E G W T K P D T S I T Y D D A L A  
K T S F V A T F F L L E T F P L D W Q K S P T E L T Y P D V L A  
R H G R L R V D H L E S I L H E R F P N D W Y P P T E P T S L I S E I L  
K A G G G I D V A L L E T W F G Q E R L P A G W A P R H V Q T L T G T V Q  
G D S N T I D N A T Q Q I C Y Q P E R F P D N W Y R R T P Y G V A Q L V E  
G V A N Y E S I S S I Y V P E T W P K N W Y R R A T P Y G A V Q T  
G V T K G I P D D Y V R A V F G E E R L P Y D E G W S P R R F K V Y F P E  
G K P G P A L V D T I D T F F G F H R F P P S G V W Y R R T V P H T F P E F V E  
I S V E H A R A V L V E E R L P D D Y K K P S E P V T M T  
N E T V T L D A A H S F L V D E R I P D D Y S K S V E P I S L T F M R S  
P E L Q I G N L E Y M E Y F F R N E R L P V E L G W S P S P V E I G P  
Q T G G I L T K E V A Y A I F A E E R F P E V E N K K K R T V F T L L G N A L A  
K R K K G A P L P F L L T W L A D E R L P D D G W K P D H V Q S L K G V S K  
V P G L A K L D V I R C Y F E E E R L A Y H L G W R P K P F F T N T L  
G S S G D P D V K S I E S F F G N K L L P G P D G W Y R R T V P L S L V E A A L  
E M A G S V E R D L V R T T Y G Y E R R M P L P P D G F W Y R R T V P L S L P Q Q A A  
L L P P D V K S I Q T F F G D N K L L P P D G F W Y R R T V P L S L P Q Q A A  
L R T W F L E E Q I E W N  
E M A G S V N R Q L V R S T Y G Y E R M P  
L L P P D V R S I E T F L G A G K L P P D G H W Y R R S V P L F V E Q A L S  
A K N N T P D L E T I S S F F G  
D D S G A M R L D W L E M F F A Q E K L P F E L G W T L R H I S L S R V L L V A  
N G L L T L F V E D V R Q F Y V D E D L P I E G Y G R R Q L P Y  
A G V A P K S F V Q T F F R E E R L P I E E G W T R P S S P I E V A S L D Q  
A S E P L V P K S Y L E D W L W E E K L P I N G W T R P T Q T I G F K Q V W R  
D S T G N I K I D W L K L V F E Q E K L P L E L G W E V R P I T A D E V L A  
P V V D R A H F E F F F R R E E F P V R L G W T P N R G V G P  
N G P G T L H V E D V K K F Y L D E D W P K D Y W R R Q L P Y Y S P E Y I D R  
N P E G V L T K E V I R N F Y G V E R I P E N W Y R R P V D W G L V G F N  
G A I A E Y C I R H L F E Q E R I P R G R A C R P T R I T S K F  
L H G G G L S R E V M D M F Y V E E R F P E E L D N K R P R T L L G L V G N  
P G P P L A D S I N E F M G N E R L P P E G V W F R R T V P L T G A E F A A  
Q T G G K L T P E V V R A V Y E E E R F P  
D T G G K V P E D V M R T F Y E D E R I P D  
H G P T T L Y I E D V K K F Y L D D D W P V G Y E R R Q L P Y Y S T E A G S  
A G P P D V E S I Q T F F G H G K L P P D G Y W Y R R E P L T V V E Q L A T  
K K K K L V L K A A M R A W H D G K F P E G W E T P E K Q L T L G E L N K  
E Q E D V I P L C V L E Q W F G E E R L P E G W S R P I K Q F G L L E  
L D C K A A R E W F G D E R L P S G W T P Q R P M G L F R I I G E  
P S T G D A P V S Y V K S L F E K E R L P Y E L G W T K P D Q E T N L M S L G A  
T F G E E I G V E E L R K F Y T E E R L P V E G W E K K R M T F L G Q L G D  
N P Q G T L T K N I I K S F Y G W E K I P E N W Y R T P V D F G L I Q F N D  
Y P E G R L D Q E T L K S F F G Y E K I P D N W Y K R A I G D E Y T I P F  
G R D E R V D A D T L R N W  
D S T G V T R V D W V R M L F E K E K L P Y E L G W R P R A E P I T I P S L G Q  
G A G G V A N E A S I A S F Y V P E R I P P Q G W Y R R G V P M T L V E L I A  
P Q T R L A P L E W I V V W F S Q E R L P Y R E G W R P V N D I T G I T I A A D  
H G L N T L Y V E D V K K F Y L D D D W P V G Y A R R E M P Y Y S P E A N S  
E M A G S V H Q D L I R T T Y G Y E R I P  
D A A G A A P K E W V K T F F G K E R L P F A R P L R Q K T N D D I N A  
H G R T T L F I D D V K T F Y L D E D I P R N Y E R R E A P V  
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E T A G G V P K D Y A R V L F G E

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GG T Q Y V D V D L V Q Y L S G L E H I P S G W Q P A S T A T L L E A L W R  
P E A G T A S T D W M R T W F T E E R L P V E Q G W K K P V A K I T L L G T L A

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D W L G V G G D D G C E R F P R N F  
F S L P K A P K D R V K V W L T E E R L P E E L G W T R S E R T L S T L D L V P  
H E S V T V N R S L I T Y F F E N E R L P V E L G F V K Q A E P I S L E A V T R  
G E K V G S P L E W I K R W L G E E R L P D G W K P D R E V G F V I A T N T  
Y P E G Q L T H E N L K S F F G V E R I P Q N F Y K V P L D W G L V Q L N  
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H P D G F L N H D V L K T F Y G H E R I P E G W Y R R P D D Y D L F T H  
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V E Q P G A N R E F F E Y F F R N E R L P V D L G W A P G T T E I G P  
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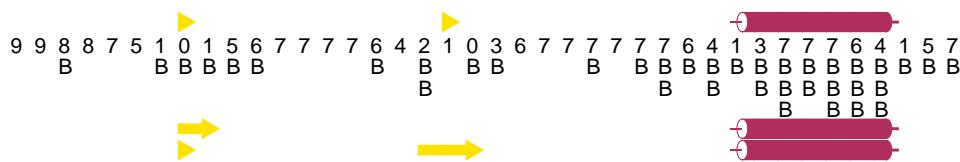
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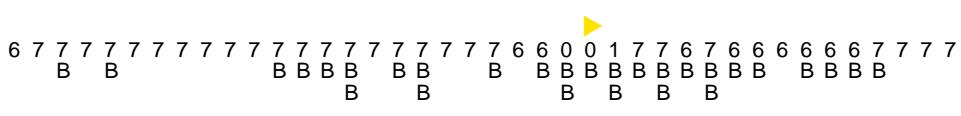
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G H G N I E H D G S I □ S R A D H A L G			
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E G R Q T □ K L S D L S A H G I I I A H D A S L T G P D I Y S P A			
W G K N T F N □ E D L N T P G I I Q H □ A S L T R N D V T P T E K			
G □ G I N D N F N L H D A D R S S K I E H S R S F T R Q D I G S G R S			
K F L F A G R D W E G K M T □ D D □ N A H G A I E H D A S A D I K W Q P N			
G K □ L T S □ R W T V S □ S T □ S M R G P Y K □ A H N A A F □ V H			
E W S □ G G P P A R N A □ T T G L L G Q P Q G I S Y A H N T Y E S D M S I □ G R P			
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R P L N Q I L H P D H T F D L I D M R R H N V I E H D A S M T R □ D A R Q G			
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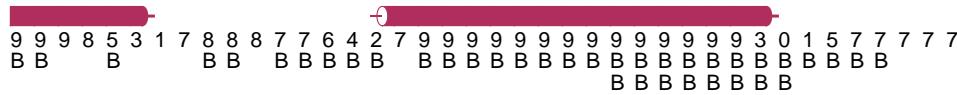
The figure displays a sequence logo for a protein sequence, likely a multiple sequence alignment. The x-axis represents the positions of the amino acids, and the y-axis lists the amino acids. The height of each bar at a position indicates the frequency of that amino acid at that position. Colored bars represent different amino acids: S (green), C (yellow), G (light green), D (blue), E (red), A (orange), T (pink), N (purple), P (brown), F (dark green), I (light blue), V (light orange), L (light pink), K (dark blue), R (dark red), M (grey), H (dark purple), Y (dark red), and W (dark green). The sequence logo shows a highly conserved central core of hydrophobic residues (I, V, L) flanked by polar and charged residues.

lupas\_21  
lupas\_14  
lupas\_28  
jnet  
conf  
sol25  
sol5  
sol0  
jhmm  
jpssm

UniRef90\_J3PPY5  
 UniRef90\_M5BW48  
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 L A T F A R R P [ L S L K A R M T A L G E V G L I F S I F G N R Q D S V H  
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 R [ L A A A A A V N P A  
 R R A E C Q A E N P R F H R T L Q T I I G C M N C S V L L T V T G G D R K V I R  
 V E A L S A P Q K I P T Q H E V L A L T E A G L L L M M M K E G Q V P S A  
 R A A A G H G A V E S A R R L L M L G  
 R R A H S K V F N N Q Y I M N R N G K T F G C A N S A I A F D G A Y A R W  
 T Q Q E S I A T N P Y L F Y A P F A L V V P A A Y N F V L N F M S N H S A E  
 M E D E L H S P L N E F H R Q V A L G E C G L A W A V M G P K G S P D  
 Q T R W S I A N N G Y Y F S V P F A L V P A A H N F V I N F M S N R S A E  
 K G K S S V S T N P Y F F S A P F S G V L V A P A A Y L F V I N L M S N H T A E  
 R W L E S S R N N K F L R L S L M H Q V M T F K Y T F  
 R E R Q P T R P V S Y F A S H I A A G E L A L L L Q V F G D H T  
 T H D E S V Y H N P N F F M  
 R M D A Q K Q D N P G L L Y G P L Q  
 R R R E R Q A D G G A P I P L N L W F V N V Q T V S F L N T A A D A T G D D G  
 L A A F A H R P F S L K T R M T A L G E V G L I F S I F G N  
 R Y A A S R A A N A Q F Y F N P S A G V V M G A Y Y F I P G F F S N G T I A N E  
 R I I Q S R I H D R F F R F S Q F V L T A Q G Q Y W F P T I L S G E M D I R D G  
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 R L A H L L A N N P Q  
 S M N E N W Y R R D T P Y G V V Q T I A D G F L A V Y P R S I I V P G A  
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 R L A T C L K N N P Q C D F G T A Q S K N A F A E G V A L V A A M G G  
 R Q G T D V H L H P K R L V E L T S G S A Q A F V S E F F S N G T Y G A  
 R Q R D I L P K K L D A K H E E I A R G E M G I I L G V W E R E T F V E N

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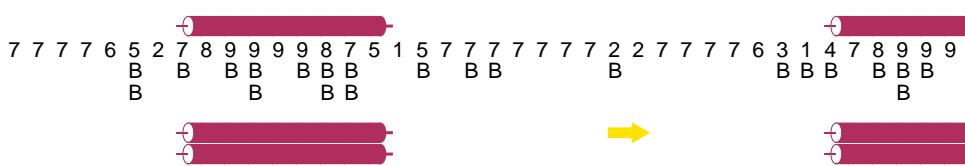
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 N P E G V L D H N I L | K S F Y G V E R I P D N | W Y K R S I D Y S I P L |  
 T A D T I E W F F D K E R F P P N | W K R R N V P V T M T E L M T  
 S T S L E N I Y L H E K L P R E | W N K P K R P I S I W D V V K  
 G K P G P A L V D S I | D T F F G D S R Y P P S G V W Y R R T | P H T L A E F V I E  
 G L P G P A L S D S I | N Q F M G H S H F P P E G V W Y R R T | P L T T A E L A  
 P L T G K A P K N L V N | F F R E E R L P | L E E G W K R H G P I S A S T L G P  
 E E R L P Y E E G W R R P S Q E L T | A G I L G  
 N L T G I A | G Y E Q F | D R D W K P A G R Q I S G A R L Q F  
 L S M P K A P K D R V | K V W L T E E R L P | E E L G W K R S E R T | G V L D L A P  
 S A E G A Q L N F I R S V L E Q E K L | P R D L G W E P Q E F S G R I D V M L D  
 L G T Q K P D Q E W V |  
 E P N G Y L D G S Q L | K Q F F G Y E R I | P E E W Y R R P S S N Q Y S L V S V V A  
 E R E E M V T A D V L S E W F G S E K L | P E N W G G L R P V H P I G L L E  
 N P G G V L T R D V L F Q F F G Q E R I | P E N | F Y R R S S S L Q Y S I P A  
 E P S G Y L D G K T F K Q F F G Q E R I | P D N

R N H A V D K K T | N D F | A H E R | P A V M | K P R S S P G V W S T V R T  
 G G E A E | L S S D | V L K | F Y E E E R | S D  
 K Q G G K W N D P E | L E Y T S | V P E R I | P | E Q G W Y R R A T P M T | V V E  
 V P K D Y I R M | L W T E N R | L P D N F

A Q V G T P N | L S V |  
 Y P R G C L S | P S S F E S | L Y G H E R | P D N Y Y K S A | E D Q W T | V P D | L T  
 R Q N D T I S | V A H T A S F | L V L E K F | P S D | Y K K A V D | P | T F A D | L G T  
 G V P V E S I P | S F F G A E Q F | P D N | W Y R R G T | P F G L L D

D G T E P | V N S E W | L T W | A E E R | P S | G W | K P D R | V V G | S D | V M K

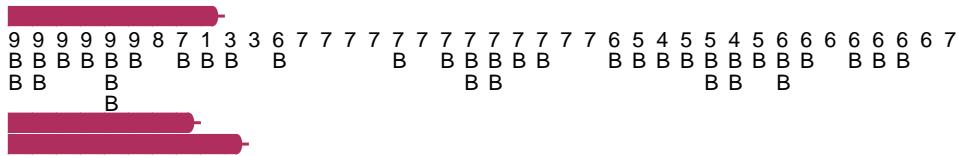
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T   V R K   L I   K A T Y A V D   L L   Y A G F K W G M L   F Q I A	250 Y A V D   L L   Y A G F K H P E F L S   G G N V W G M L   F Q Q I K P S N P G Y N I A I A	260 G Q F V   P   I	270 280
A V N   A S S F Q W P D P N R C P W V V L   A P G G T D N P   R D G S   I L V   G K I   A A A S   V L   G A W   V V   A A V V   A A R S Q A			
D   A   G F   V R D P S T   F G G N T G T P N S F   V G   V D   V G D   L V   A D   V Q   V N N A M D P G   V R F G G N T G N   V N S F T G   V D   T D   T G G A			
S T R   T R A M A A   N S			
A A A G   L   D   V   Y   L   Y A R P   A A D Q S W   V   V   G   P   V   D			
G F   A Q N   C   L   S   Y   P   S   D   C   V   G   G   N   L   G   T   V   N   S   F   T   G   V   N   L   G   D   I   S   G   G   L N   S   V   K   I   A   V   Y   A   V G   I   E   Q   I   L   D   F   L   S   S   K   N   L   A   F   G   A   N   A   G   A   V   N   S   F   V   P   L   D   L   A   A   A   T   N   V   N R   N   K   V   I   K   T   V   A			

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**I** N S

G **L** A **C** N **V** **P** S S **L** S Q **P**

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								B				B						
									B			B						

