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

QUERY	A	K	A	L	L	S	Q	F	P	T	A	P	N	Y	P	Q	A	D	G	S	V	K	L	A	A	G	W	L	I	70	80														
UniRef90_R9VNH3	A	R	I	L	L	A	R	F	P	H	A	P	H	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	Q	T	K	K	G	T	S	L	G		
UniRef90_WOLE19	A	H	V	L	L	A	E	Y	P	A	K	M	P	H	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	T	H	K	K	G	Y	R	Q	M	G
UniRef90_A6VL10	F	R	I	L	L	Q	A	E	Y	P	A	L	P	H	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	H	K	K	G	Y	C	L	G	
UniRef90_D3V6T2	A	Q	K	I	K	F	D	E	Y	P	E	C	P	Q	Q	Y	H	H	N	E	H	N	V	K	L	A	A	G	W	L	I	D	Q	Q	C	H	K	K	G	Y	C	L	G		
UniRef90_C6DHHQ4	A	E	R	V	L	L	R	E	Y	P	N	A	G	A	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	E	K	K	G	F	C	L	G		
UniRef90_UPI000360673C	A	S	T	L	L	Q	H	H	A	G	A	P	H	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	E	L	K	K	G	F	C	L	G		
UniRef90_D4HUP7	A	A	E	L	L	H	N	R	Y	P	D	I	P	Q	Q	Y	P	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	E	R	C	S	L	K	K	G	F	R	L	G		
UniRef90_UPI000329931C	A	Q	R	L	L	A	A	A	F	P	N	A	P	Q	Q	Y	P	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	K	K	G	Y	C	L	G		
UniRef90_J7SJD8	A	Q	R	L	L	K	A	Q	Y	P	D	C	P	H	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	Q	L	K	K	G	H	C	L	G	
UniRef90_UPI000471D322	A	A	Q	I	K	A	I	F	P	D	A	P	M	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	D	L	K	K	G	F	Q	V	G		
UniRef90_D2TVN5	A	N	Q	I	K	A	R	Y	P	R	C	P	E	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	A	L	K	K	G	F	C	L	G	
UniRef90_D4F008	A	L	A	I	R	Q	Q	Y	P	Q	M	P	E	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	A	L	K	K	G	W	R	I	G	
UniRef90_R8AM00	L	A	D	L	R	Q	T	Y	P	S	I	P	C	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	A	G	L	K	K	G	H	R	I	G	
UniRef90_I0QL54	V	N	A	L	L	A	E	Y	P	N	M	P	H	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	V	E	K	A	G	L	K	K	G	F	R	I	G		
UniRef90_D2C1E1	A	E	C	L	L	L	K	H	Y	P	N	A	P	H	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	L	K	K	G	Y	C	L	G	
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UniRef90_Q7MYE5	A	A	K	I	K	E	N	Y	P	D	S	P	Q	Q	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	E	R	Q	C	C	K	K	G	Y	R	I	G		
UniRef90_Q65WM5	F	A	L	L	Q	Q	E	Y	P	N	I	P	N	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	Q	L	K	K	G	Y	Q	I	G	
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UniRef90_V6MGR2	A	Q	H	L	K	T	K	Y	P	F	C	P	H	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	G	L	K	K	G	H	I	G		
UniRef90_I2NDW4	F	Q	Q	I	L	Q	T	A	Y	P	H	I	P	N	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	G	L	K	K	G	F	Q	V	G
UniRef90_F4HAI3	F	Q	W	L	Q	T	A	Y	P	D	I	P	H	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	G	L	K	K	G	Y	Q	L	G	
UniRef90_U3TSC2	A	E	A	L	L	T	H	Y	P	A	M	P	H	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	A	L	K	K	G	R	I	G		
UniRef90_F2P561	R	T	R	L	L	A	D	Y	P	S	M	P	N	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	A	L	K	K	G	H	I	G		
UniRef90_A4SHT9	A	D	T	L	L	K	Q	Q	Y	P	Q	M	P	C	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	G	L	K	K	G	F	A	I	G
UniRef90_UPI00046ED55C	S	H	R	L	L	A	T	Y	P	G	L	P	H	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	Q	L	K	K	G	Y	R	I	G	
UniRef90_C6C4T9	A	D	K	L	L	E	L	Y	P	G	A	P	H	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	L	K	K	G	Y	R	I	G		
UniRef90_C4K6L8	A	A	L	M	I	K	N	Y	P	D	L	V	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	H	L	K	K	G	Y	T	I	G		
UniRef90_Q1LSX5	L	S	K	L	Q	A	N	Y	P	N	I	P	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	V	D	Y	Q	C	C	L	K	K	G	Y	T	I	G		
UniRef90_E6LOC2	F	E	R	L	L	Q	A	N	Y	P	N	I	P	H	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	N	L	K	K	G	Y	Q	I	G
UniRef90_Q6LLV2	K	D	A	L	L	Y	Q	Y	P	Q	M	P	N	Y	P	K	V	S	N	L	E	Y	K	L	A	A	G	W	L	I	D	Q	Q	C	C	D	L	K	K	G	M	Q	I	G	
UniRef90_B1YVE7	F	D	A	L	R	A	T	Y	P	D	V	V	S	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	A	G	W	K	G	R	T	G		
UniRef90_I0KFN2	F	D	Q	L	K	R	A	T	Y	P	A	L	P	G	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	E	Q	A	G	W	K	G	R	S	L	G			
UniRef90_UPI0004684F17	R	D	A	L	L	A	G	E	H	P	A	L	V	S	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	A	G	W	K	G	R	S	L	G
UniRef90_UPI0002F866B4	C	D	A	L	L	S	E	R	Y	P	Q	L	V	S	Y	P	Q	Q	E	D	G	S	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	G	W	K	G	K	S	L	G	
UniRef90_UPI0004712BF9	A	A	T	L	L	K	A	T	Y	P	E	I	P	L	Y	P	A	S	L	L	G	K	N	K	I	A	A	G	W	L	I	E	Q	C	C	G	L	K	G	K	R	O	G		
UniRef90_B0TM29	F	A	S	L	L	E	R	Y	P	S	I	V	G	Y	P	S	V	Q	G	K	T	K	V	A	A	G	W	L	I	D	T	A	G	L	K	K	G	H	Q	I	G				
UniRef90_A6FED7	F	N	A	I	A	L	H	P	N	I	P	H	Y	P	A	A	G	G	D	I	K	L	A	A	G	W	L	I	D	Q	Q	C	C	L	K	K	G	Y	Q	L	G				
UniRef90_UPI0004663137	A	Q	R	I	L	A	T	Y	P	H	L	P	C	Y	P	A	L	A	H	D	E	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	G	L	K	K	G	Y	Q	L	G	
UniRef90_UPI0003112CB8	F	N	R	L	L	K	T	A	Y	P	E	L	S	G	Y	P	M	T	E	G	G	V	K	L	A	A	G	W	L	I	D	Q	Q	C	C	G	L	K	K	G	H	Q	I	G	
UniRef90_U5A4Y0	F	D	R	L	L	L	L	Y	P	E	L	V	G	Y	P	N	N	N	M	I	K	V	A	A	G	W	L	I	D	Q	Q	C	C	A	G	F	K	V	T	E	G				
UniRef90_W2USB9	F	N	N	F	I	S	K	Y	P	E	A	P	H	Y	P	K	V	S	E	R	E	V																							

QUERY	90	100	110	120
UniRef90_R9VNH3	G A A V H H R Q Q Q A L V L L I N E T D N A K T S S E E D V V V Q R E L A A H H F V R R R Q Q Q S T V G G A A K K F F F N D D I			
UniRef90_WOLE19	G A A V H H E K Q Q Q A L V L L I N N T A G D N A T S S Q S D D I V V V E L L L A A H H H R R R R Q Q Q A T A V G A A K K F F F D D I			
UniRef90_A6VLI0	G A A V H H E K Q Q Q A L V L L I N N K G N A T G S Q D D I V V V E L L L A A H H H R R R R Q Q Q A T A V G A A K K F F F N D D I			
UniRef90_D3V6T2	D A A I H H E M K Q Q A L V L L I N N K G N A T G S Q D D I V V V E L L L A A H H H R R R R Q Q Q A T A V G A A K K F F F N D D I			
UniRef90_C6DHHQ4	G A A V H H E K Q Q Q A L V L L I N N K Q N D A T S S Q D D I V V V E L L L A A H H H R R R R Q Q Q A T A V G A A K K F F F N D D I			
UniRef90_UPI000360673C	G A A V H H E K Q Q Q A L V L L I N N A E N S A T S G Q D D I V V V V N L L A R T T R R R R Q Q Q R V G A G E K F F F N N V			
UniRef90_D4HUP7	G A A V H H E K Q Q Q A L V L I I N A E N S A T S G Q D D I V V V V N L L A R T T R R R R Q Q Q R V G A G E K F F F N N V			
UniRef90_UPI000329931C	G A A V H H R Q Q Q Q A L V L L I N N R D N N A T S G A D D V I A M L A Q A V R R R R Q Q Q R V G A G E K F F F G V			
UniRef90_J7SJD8	G A A V H H R M N Q Q A L V L L I N N K D N H A T S A D D V I A M L A Q A V R R R R Q Q Q R V G A G E K F F F G V			
UniRef90_UPI000471D322	G A A V H H Q K Q Q Q A L V L L I N N K D N H A T S A D D V I A M L A Q A V R R R R Q Q Q R V G A G E K F F F G V			
UniRef90_D2TVN5	G A A V H H R D Q Q Q A L V L L I N N K E E H A T A A D D L M I A L A R Y H V R R R R Q Q Q R V G A G E K F F F G V			
UniRef90_D4F008	G A A V H H R S Q Q Q A L V L L I N N Q G N A T T R E D V V V Q L A H T V R R R R Q Q Q R V G A G E K F F F G V			
UniRef90_R8AM00	G A A V H H D K Q Q Q A L V L L V N Q G N A T T R E D V V V Q L A H T V R R R R Q Q Q R V G A G E K F F F G V			
UniRef90_I0QL54	G A A V H H D K Q Q Q A L V L L V N Q G N A T T R E D V V V Q L A H T V R R R R Q Q Q R V G A G E K F F F G V			
UniRef90_D2C1E1	Q A A V H H D K Q Q Q A L V L L V N K G G A N S D E E L I V S A L L A R Y V V V R R R R Q Q Q R V G A G E K F F F G V			
UniRef90_UPI0004010317	G A A V H H R Q Q Q Q A L V L L I N E N N A T A D D D I V V L Q L A A A H R R R R Q Q Q T G A N K F F F N I			
UniRef90_Q7MYE5	G A S V H L R R Q Q A L V L L I N N K G N A T A G S D I V V V E L L L A A H Y I V R R R R Q Q Q S I S K F F F D V			
UniRef90_Q65WM5	G A A V H H Q Q Q Q A L V L L V N N K G E D A T A G S D I V V V E L L L A A H Y I V R R R R Q Q Q S I S K F F F D V			
UniRef90_Q8ZAN4	G A A V H H Q Q Q Q A L V L L I N N Q S E A T A G S D D I V I H L A R Y I R R R R Q Q Q Q A A Q R F F S I			
UniRef90_V6MGR2	G A A V H H M K Q Q A L V L L I N N K G N A T G K M D I V V N L A A K A V I R R R R Q Q Q V A F R D K F F D V			
UniRef90_I2NDW4	G A A V H H A Q Q Q A L V L L I N N K E N A T G S D D I V V A L A R Y I V H H N V R R R R Q Q Q V A G E K F F F G V			
UniRef90_F4HAI3	G A A V H H D K Q Q A L V L I I N K E E N A T S G S D D I V V A L A R Y I V H H N V R R R R Q Q Q V A G E K F F F G V			
UniRef90_U3TSC2	G A A V H H R Q Q Q A L V L L I N E E N A T P Q R D I V V A L A R Y H H R R R R Q Q Q V A G E K F F F G V			
UniRef90_F2P561	G A K V H H P Q Q Q A L V L L T N A G G A T A N D D I V V H L A Q Y H V V V V D T S V G M A K F F F G V			
UniRef90_A4SHT9	R A A V H H Q E Q Q A L V L L V N L G G A T A M E L I V A L A A H H V R R R R Q Q S V G M A K F F F G V			
UniRef90_UPI00046ED55C	G A A V H H S L Q Q A L V L L I N N D Q A D A V P Q R D I V I I G E L A K K Y V R R R R Q Q Q V G G A G D K F F F G V			
UniRef90_C6C4T9	G A A V H H D R Q Q A L V L L I N N K N H A S S Q D I V L D L A R Y H Y R R R R Q Q Q V A F T F F F G V			
UniRef90_C4K6L8	G A A V H H D R Q Q A L V L L I N N K N H A S S Q D I V L D L A R Y H Y R R R R Q Q Q V A F T F F F G V			
UniRef90_Q1LSX5	N V A V Y E K Q Q A L I L I N N I G Y A T A S G I E V A A L A K Y R Y K V A E K F F F A I			
UniRef90_E6LOC2	G A A V H H E Q Q Q A L V L L V N T G N A T A R D V L L L A Q H H V V N A N D K F F F G V			
UniRef90_Q6LLV2	G A K V H H E Q Q Q A L V L L V N T G N A T A R D V L L L A Q H H V V N A N D K F F F G V			
UniRef90_B1YVE7	A A A V H H A K Q Q A L V L L V N R Y G N A T G A D D I V L D L A R A Q R V R R R R Q Q S V R R R R Q Q S V A N D K F F F G V			
UniRef90_I0KFN2	D A G V H H A K Q Q A L V L L V N R Y G N A T G A D D I V L D L A R A Q R V R R R R Q Q S V R R R R Q Q S V A N D K F F F G V			
UniRef90_UPI0004684F17	A A G V H H D R Q Q A L V L L V N R G G A T A A Q D I M A Q L L A Q A I I Q A A D V L A R F F F G V			
UniRef90_UPI0002F866B4	A A G V Y E R Q Q A L V L L V N R A E N A T S G D D I V L Q R L A A R A Q Q A S H Y T R F F F G V			
UniRef90_UPI0004712BF9	G A R V H H P Q Q Q A L V I T N A E N A T S D D D V L S L L A R F V V D K I D E D F F F G V			
UniRef90_BOTM29	G A A V H H E K Q Q A L V L L I N N K G N A T S D D D V L S L L A R F V V D K I D E D F F F G V			
UniRef90_A6FED7	G A Q V H H T E Q Q A L V I V N T G T A T A G D D I V V R L A A K H V R R R R Q Q T Q Q V D Q A D K F F F G V			
UniRef90_UPI0004663137	G A A V H H T E Q Q A L V L L I N N K A K A T A Q D D I V V R L A A K H V R R R R Q Q T Q Q V D Q A D K F F F G V			
UniRef90_UPI0003112CB8	G A Q V H H P Q Q Q A L V I V N A G E A T S K D I V L D L A W F V R R R R Q Q T Q Q S H K Y F F F G V			
UniRef90_U5A4Y0	G A Q V H H P N Q Q A L V I V N Y D K A T A L D E I V L K L A E R T R R R R Q Q S L D K F F F G V			
UniRef90_W2USB9	D A G V H H K N Q Q A L V L V N H G N A T G K E I V L N L A N T I V I S T V L K E R F F F G V			
UniRef90_D0I3L1	D A A V H H K Q Q A L V L L I N N K G N A T A D N I V A L A K H V I V D T T Y A R F F F G V			
UniRef90_H8XVT7	D A G I H H T K Q Q A L V L L V N Y G N A T G S E L W A D L A S K N I V Q Q K T I K E K F F F G V			
UniRef90_UPI00041BE605	D A G V H H A K Q Q A L V L L V N Y G N A T G Q E I V L D L A S K N I V Q Q K T I K E K F F F G V			
UniRef90_A1RE97	K A A V H H D K Q Q A L V L L V N R G G A T G Q D I C R L A Q H H I E R V N D T F F F G V			
UniRef90_X2GZ75	G A A V H H Q N Q Q A L V L L V N N K Y G N A T A Q D I V V E L A R Y I V R R R R Q Q A V R D T F F F G V			
UniRef90_A4CPB7	D A G V H H K N Q Q A L V L L V N Y G G A S G K E I V L A R E I V R R R R Q Q A V R D T F F F G V			
UniRef90_A0KRK7	N A G V H H A K Q Q A L V L L V N L G H A T G Q D I C R L A L H I V I T R V N E K V F F F G V			
UniRef90_D8IPC2	R A G V Y E K Q Q A L V L L V N R Y G N A T G A Q D I V A R L A K A I Q Q E A V K E K F F F G V			
UniRef90_L7WA05	D A G I H H E K Q Q A L V L L V N Y G N A T G Q E I V L D V L S K K I Q Q K T V W D K F F F G V			
UniRef90_G8X9R3	D A G V H H T K Q Q A L V L L V N Y G N A T G Q D I V L N L S Q F V Q Q K T V W D K F F F G V			
UniRef90_R5VK48	N A G V H H D K Q Q A L V L L V N L G G A T G T E V V V K L A E E E V R S N V K E K F F F G V			
UniRef90_B2RJV4	A V G V Y E H Q Q A L V L L V N Y G G A T G T E V V V K L A E E E I I R S N V K E K F F F G V			
UniRef90_Q26BI9	D A G V H H D R Q Q A L V L L V N H G N A S G Q E I T T L A R E E I Q S M V F N R Y F F G V			
UniRef90_G8TAS5	D A G V H H E K Q Q A L V L L V N Y G H A T S G Q E I Y D L A S S V I M K S V H D K F F F G V			
UniRef90_C0BNC4	D A G I H H E K Q Q A L V I V N Y G N A S G K Q L L A M A Q K V I Q S T V K E K F F F G V			
UniRef90_UPI00047D8A5B	D A G V S E R H A L V L L V N R G A A T G A Q L L A L A R R I I A R Q T V D E R K F F F G V			
UniRef90_F9S4P5	G A Q V H H P N Q Q A L V L L V N N K H Q G A T A Q D I V V V A L A R H I R Q T V W L K E K Y A G V			
UniRef90_U6SHF1	D A G V H H T Q Q A L V L L V N Y G N A T G Q E I V L N V L S D A K I Q Q K T I L E K Y A G I			
UniRef90_D5X0T1	N A G V H H E Q Q Q P L V L L V N R G G A T G A N I V L E L A R A V Q Q D S V L E Q K F F F G L			
UniRef90_C7PM73	D A G V H H A R Q Q A L V L L V N Y T G D A T G N E I Y H L A S A Q V R D D S V E E K F F F G V			
UniRef90_U4K9L2	G A Q V H H P D Q Q A L V L L V N T N N A I P V D I L L A A L V R D D K V E E Q E K Y Q I			
UniRef90_A1S201	D A G V H H D K Q Q A L V L L V N F G A A T G K D I L K L A K H I V I N E V H T R F F F G V			
UniRef90_A9M3P3	G A A V H H G R Q Q A L V L L V N N K N A T A N D D V R Q L A Q H H I K F A S V F A F F Q V			
UniRef90_R6ACJ4	P A A V H H D K Q Q A L V L L V N L G G A T G K D V V V A L A S D A H I K F A S V F A F F Q V			
UniRef90_UPI0004752A16	G A R V H H D Q Q Q A L V I V N F N D A T A E D V V L S V A W H V K Q Q T V W N Q K Y Q I			
UniRef90_Q9KV40	G A K V H H P K Q Q A L V I V N T G D A T A Q D I V L M L A A D I Q Q Q R D V F K E Y G I			
UniRef90_G6ADZ1	N V G V Y D K Q Q A L V L L V N H G G A T G A D V V V H L V E A Q Q Q H D R V F K E K F F G V			
UniRef90_UPI00036A9974	D A G V H H A R Q Q A L V L L V N Y G K A T G H E I V L A L A H E V Q Q R S V G S E K F F F G I			
UniRef90_E1SLQ6	D A A V H H E Q Q A L V L L V N R D K A S A E D V T A L A R H H V A T S S E R Y F F F G V			
UniRef90_G2DRS2	G A A V H H E K Q Q A L V L L V N K N H A C A E V R L L A E H H I C R E V S R E K F F F G V			
UniRef90_F0F191	G A A V H H D K Q Q A L V L L V N K N H A T A A D V R A L A S D E I C R I V A Q R F F F A V			
UniRef90_H0J154	A V G V H H A A Q Q A L V L L V N F G G G A R S A H D I L A L A E A Q R A S V R R E R F F F G V			
UniRef90_M5IU05	A V G V H H A R Q Q A L V L L V N H F G G G T A H R D I E R L A R Q A I R G S V R R E R F F F G V			
UniRef90_A2TSJ2	D A G I H H D R Q Q A L V L L V N H G N A T G Q D I V W A V A M K V Q Q A V E E K F F F G I			
UniRef90_B8CNB5	G A A V H H D K Q Q A L V L L I N N K D N A T S D D D I V L Q L A R H H I V D C I F K E F F F G I			
UniRef90_UPI0004706B30	P A G V H H Q Q Q Q A L V L L V N F G G A T G A D I C L G L A R H H I L D T Y E Q E F F F N V			
UniRef90_Q47UY2	D V G V H H Q Q Q Q A L V L L V N Y G S E L G A E I T S L A K Y I Q Q K T V A K K F F F S V			
UniRef90_R6FLJ7	N A A V H H D K Q Q A L V L L V N Y G G A T G A D I V A L S E D A V R O A S V R E K F F F G V			
UniRef90_I2EUT0	N V G V H H A K Q Q A L V L L V N Y G G G K G Y E I K E L S E K I Q R A S V K E K F F F G V			
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UniRef90_Q9HZM7	P V G V H H A Q Q Q A L V L L V N H G G A T G A Q V R L A E R I Q Q E D V R R R R Q Q F F F G V			
UniRef90_X2HAK9	G A A V H H E Q Q Q A L V L L V N K K Q A S A S D I V V A L A K Y V R N C A Q H F F F Q V			
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UniRef90_UPI00036F78D9	A V G C Y K H Q A L V I V N H G G A T A A E I V L A F S T L I M K D V Q E K Y G I			
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UniRef90_Q5LBG5	P A A V H H D K Q Q A L V L L V N R G G A K G A D V L A L A S D A V R A S V R A K F F G I			

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UniRef90_V8CNV1
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Y R R H C S V Q Q D N H Q I V L A A T F S L T P G I Q K R M
L G Y R R S K C I Q E K E Y I V L S A V I D K E A I Q T K M A
S L Q E I R Q A V L C I R R S K A M D E E D S R S V G S F F K N P I L L E S A A
I K A R M D E L T E K R E S K Q P L E Y A S A G S T F K R P
P E K I R A Y M E L E K R R V T Q P L E Y P S A G S T F K R P E
V P A A S A R A A V L D L R R S K G M A D H D T W S A G S F F T N P V V D A G
L T P E Q A R D M A F G Y R H S V I Q S T G D V V I S A K F A L R P I L T Q E M K
I D D R M K E L A E A R R S K P L E Y P S A G S T F K R P E
V P V A A A R T A V L G L R R G K G P G D H D T W S A G S F F T N P I L T H D A
V P I A E L R R S V L A L R S S K G P D D P D S V S A G S F F T N P I V S E N F
I K S K M Q E L L Q R R K D K P L E F P S A G S T F K R P V
S L K K V I F E T V C K V R Q E K L P N P S E L A N A G S F F K N P I V S S E Q
P A A I K E R M D D L Q A R R E K Q P L E M P S A G S T F K R P E
L P T A Q V R D A V L G L R R G K G P A D H D T W S A G S F F T N P V L T D G E
V P A V D V R Q A V L G L R R S K S M A N R N T Y S A G S F F T N P I V T A E Q
V P L E K A R E V V L G L R R G K G P A D P D T R S A G S F F T N P V L S P E E
P K E I Q A R M D D L N R R R S K Q P L E M H S A G S T F K R P
P A A Q V R E T V L R L R A G K G M T D H D T W S A G S F F T N P V V P D D R
Y R R H S A V I Q D N H G I V L E A V F D L K P G D Q A E M
S I N D K M G E L T K R R E S K Q P L E M P S A G S T F K R P
S I K A V M D D L K E K R V S K Q P L D R P S A G S T F K R P E G H
V R A E V L R L R K K G P D D H D T W S A G S F F T N P I V S P E V
S Y R T S I L L Q G S K K L V T K A T F Q L Q P H V L A V T
V D P H A A R E E V L A L R R G K G M T D H D T W S V G S F F T N P V L P A V D
P D A I R E R I S E L R K R V S K Q P L N F P S A G S T F K R P
A Y R H S I L I Q E N G G I V I S A T F K K P K I Q A E M
P E V I R E T M K D L T R T T K Q P L E Y P S A G S T F K R P E
Y R Y S L V I Q D T G D V V V S A T F G L E T I K D K M E
Y R H S L L Q E N D E I V I A A T F D K A T I L D Q M N
T I D A K V A E L T F L R E S K Q P L E Y P S A G S V F K R P P G D
E E I R E E M E R L A R R K L L Q P L C Y P S A G S V F K N P E E I D A K I
L G Y R K S I T A Q K N Y I V L S S L F R K N E E I D A K I
T M Y D L S K A I L Y I R N R K L P N P K K I G N A G S F F M N P I I G I L D
V P A D E L R D A V L A L R R G K G P E D P D T R S A G S F F T N P L L D P A A
E E I R A S I A D F T Q R R E K Q P L E M P S A G S T F K R P E
T I K H L T N E E L D Y R H S S I Q D N N G V V L D A T F A L E P E I K A R M
V P S K Q I R E A V L A L R R S K G M A D H D T W S A G S F F T N P V V A P E D
E A M F S Y R H S L M D C P E A V V L H A V F R D P V V I R E M
T I H N L N Q A I F N I R H R K L P N P K N I G N A G S F F I N P V V G I L L E
A A I R E V M D D L K Q R R V T P E D E N G S A G S T F K R P E
S L A E V R A T V L R L R R S K S P E D E N G S A G S F F M N P T L D V E T
P G E I R E K M D E L A R R K A S Q P L E Y P S A G S T F K R P A
K K I K N R I D E L Q R R R E K Q P L E Y A S A G S T F K R P T G H
S P K E L I Q D N F E L A K S T Q P L N Y R S A G S V F K N P
V P L K E A R E A V L E L R R G K G P A D P D T R S A G S F F T N P I L G P D A
V I E R E L E S Y R H S I T P E K G Y L V I S A V L K L Q P E I Q S I M
P A N I R E T M E L R R R R E K Q P L E Y P S A G S T F K R P E G H
I Q S T M K E L N A K R R E K Q P L E Y P S A G S T F K R P E
V P I A E V R E A V L A L R R G K G P D D P D T R S A G S F F T N P V L D A A E
L T P D G L L Q T M T S Y R T S V L L Q G S N L I V T Q A T L Q L Q P E V T A T T
S Y R H S L I I Q D N G S I V L V A Y F E M A P T I R A R M
P E A I A A R M K D F R R R R D K Q P L E F P S A G S T F K R P E
E E L L A R M N E L A R R K E K Q P L E F A S A G S T F K R P E G H
Q L Q K R D A T Q P T K E R S A G S T F R N P A G F S S T
E I R A K M D I Q R R K D K Q P L E Y P S A G S T F K R P
E E I L A R M Q E L K N K R V K Q P L E Y P S A G S A F K R P E
T P Q V I R D A V L A I R T D K L P P K L K P N N G S F F K N A I I E D W Q
P A A I R R M D D L A R R R Q S Q P L E Y P S A G S T F K R P E
V P E R E L R E A V L E L R R S K G M T D H D T W S A G S F F T N P I L T T E Q
L T P P D L G Y R T S V L L Q G G N R L V T Q A T F Q L R P G V M A E T
R K V R E T V L A I R G S K G P D D H D T W S A G S F F T N P I I P D Q
P E K I R A K M D F T Q R R E K Q P L E L P S A G S T F K R P E
E N I Q K R M T E Y R E R E R S Q P V G V R T A G S M F K N P V
P E T L H A R M D Q L R K R D E T Q P T K D R S A G S T F R N P A G F S S T
V R S T V L E L R R G K G P E D H D T W S A G S F F T N P I L P E A V
D Y R Q S V Q T N G G V I V S A T F A N K Q N I L Q S R M D
P D V I Q A T M S E L A R R K A A P L E L P N A G S V F R N P P G G
I H E R M T S L A R R K A S Q P L D Y P S G S V F R N P E Q G
E E K I K A V I Q K R N E K Q P V G W I G S A G S F F E N P I V S N K E
E I K A A M L N L N K R K S K Q P L E Y P S A G S T F K R P V
A D D V R E A V L R L R R S K G M D D P D T Y S A G S F F T N P I V S A R E
S Y R H S A L Q Y Q D L V V L S V S F V L K P I I E A K M
V D I N N V I S I T Y N T R N S K L P N I K E F G N V G S F F K N P I V S K D V
I K K Y M D E L T E K R T T K Q P L H L P S A G S T F K R P E G D
I S Q E M A R L T H L R E L K Q P L E F P S G S V F K R P V G H
S Y R H S A I I Q D Q P A I V L S A T F K L T P I E K R M K
V D S R A V R E A V L E L R R S K G P D D H D T W S A G S F F T N P V L T A Q Q

	50	60	70	80
UniRef90_R5ZBD6	D D Y R Q R R E D K Q	P L M P S A G S T F K R	P A G K L I	M D A G L R G H A V G
UniRef90_X8K5P5	A E L T K K R T S K Q	P E F P S A G S F F K R	P A A K L I	E D A G L K G V S V G
UniRef90_DOKZL8	A N M L K T T W P	D L P L Y A L D D D S V	K L S A A G W L I	E Q A G W R G R L F G
UniRef90_Q1QHL0	F L K M Q A R G L Q M	P S Y P A D E G Y K K	L S A A W L V	E K A G F H G Y F H G
UniRef90_R6W6Y0				Q E S G L Q G G F Q V G
UniRef90_UPI0003B719BF	G	Q A D D T H E L	K A W A L I	D Q A G L R K G H S W G
UniRef90_G8S7Q7	F A E L T A A R G E M P	H W P G A D D T V K V	P A A W L I	E H A G F P R K G F A G
UniRef90_M2YH15	A E R L L P	A E A P R Y P V L D G S G K	L S A A W L I	D R S G F K G F G L G
UniRef90_F4XCE9	A E L A Q K R K S K Q	P E Y P S A G S M F K R	P A A A L I	D Q C G L K G G F T V G
UniRef90_U7UCZ3		P G Y	F A G T L I	D Q T G L K G G L S C G
UniRef90_UPI0003473F70	A R K L F A R Y P Q L P	C F A Q P G G G Y K L	A A G W L I	D R C G L K G G Q R F G
UniRef90_X0PB46	T H L N Q L R A S K Q	P E L P S C G S V F K R	P A G K L I	H D S G L R G G F Q I G
UniRef90_U2BSQ3	E L A G K R R D K Q	P L E Y P S A G S T F K R	P A G K L I	E D A G L R G G Y R E G
UniRef90_UPI00036298BF	F A E L C R R A E K P	P S Y P T S D G K Y K V	P A A W L V	E N A G F P G F Q R A
UniRef90_D1BNP7		P G Y	F A G T L I	E Q T G L K G G L S V G
UniRef90_R6EMF8				E D T G L R G G F R V G
UniRef90_F4CSA7	A V P G G P D T E G M P	R W P A A S D R V K L	S A A W L I	Q H A G F A R G H A G
UniRef90_G5KFP6	R L N H L R Q L K Q P	L E Y P S C G S V F K R	P A G Q L I	M E S Q L K G G H R I G
UniRef90_R5VQQ1				G Y F A G K L I
UniRef90_UPI00037FC4D3	F A E L S A R T A R H P	S Y P S G A D H V K T	S A A W L I	E R A G F K G Y G Q G
UniRef90_U2T5Y5	A R S L P R D A P R W	P V T P P D G V H K L	S A A W L I	E Q A G L R G Y G L P
UniRef90_R5YC58				G Y F A G G L I
UniRef90_UPI00016B20DE	L E Q L L A N Y P N V	P Y Y D M G N N Q Y K V	P T G W L I	D N C G L N L K G K L I K
UniRef90_X7E972	H D E L K K R F P N L	V S F P F E S G F K L	A A G W L I	D Q A G W K G K K Y Q
UniRef90_K0YMJ2				G Y F A G K L I
UniRef90_R7WMMW3	L A I V L E R I A D V	P Q F P A E R G T K L	S A G W L I	E R A G F T R G Y P G
UniRef90_D7BKD3	A K N L P P E A P Q F	P V T P V V E G L V K S	S A A W L I	S H A G L R D K G H P G
UniRef90_UPI00034CF42A	Y S A F R E R A A E I	P G H P D E A G N V K L	S A A W L I	D R A G F K G Y G D G
UniRef90_UPI00047D47FD				G Y Y A G K L I
UniRef90_G0VQL6				F A G T L I
UniRef90_UPI00016B20DE	L A E V L A A I S P V	P R F P A D G G T K L	S A G W L I	E R A G F A K G S H P G
UniRef90_M2X5E7	D D L N A R R A A K Q	P E L P S C G S V F K R	P A G K L I	H D A G L Q G Y T S G
UniRef90_H3RR83				Q G Y F A G T L I
UniRef90_UPI000369C317				F A G K L I
UniRef90_R6VBQ1	V Q H V R D D A A A M P	C F D A S G G R K K L	S A A W L I	E R A G Y P K G Y P G
UniRef90_C0DZW1	K Q H K Q H R L N T Q	P Y H L P S C G S V F R A	A G W L I	E Q S G L K G K Y I G
UniRef90_UPI00034CCE08	A P R V I D R I E T P	Q Y P A P D G V K L	S A G W L I	E R A G F G K G Y S G
UniRef90_D5UXY7				F A A A L I
UniRef90_D2RJG0	D R L N D L R R S K Q	P E Y P S C G S V F K R	P T G H L I	T K A G L R G Y R V G
UniRef90_UPI00024933FD				G Y F A G K L I
UniRef90_R7H1F9				Y A G K L I
UniRef90_Q8R8Z6	Y F N G L R R A K Q P	L E Y P S C G S V F K R	P V G H M I	T K A G L Q G K R I G
UniRef90_I7JVF1	Y L N A L R S Y K Q P	L E Y P S C G S V F K R	P T G H M I	L K A G L Q G K Q I G
UniRef90_U1GB18				F A G K L I
UniRef90_UPI0004702F2F				T A G R L I
UniRef90_A5D143	A D L T Y K R Q S K Q	P E Y P S A G S V F K R	P A G K L I	E M A G L K G M R V G
UniRef90_UPI000318A230	F K K L K S K Y P T I	T G Y S I S T N Q V K L	S A S S L I	E T G W K G K K Q G
UniRef90_D0J972	F A A L E H R V H D P	P A F P E P D G R T K T	S A A W L I	E R A G F R G H A R P
UniRef90_UPI0003B73FE6				G Y F A G T L I
UniRef90_UPI0004256B8B	D D L N E R R E A K Q P	L D P S C G S V F K R	P A G K L I	H D A G L Q G Y T S G
UniRef90_A5VIJ8	V P	E G A P A Y P Q P	D G T V K T S A A W L I	D H A G F K K G H A G
UniRef90_E9V3T5	R E L M A R R K A G Q	P E Y P S A G S T F K R	P A G T L I	E Q C G L K G L T V G
UniRef90_R9LY11	F K K L K H K Y P A I	I G Y N I S N H K V K L	S A N S L I	E N I E W K E K K I R
UniRef90_I3QGH3				G Y F A G K L I
UniRef90_V8C6K4	F A G V R A R I E A A	P T F P G G E G R V K V	P A A W L I	E R A G F K G M A I G
UniRef90_UPI000177023				G Y Y A A A L I
UniRef90_R6CWA6				F A G K L I
UniRef90_R4KCU2				S S K H S A G M L I
UniRef90_UPI000399C23D	L A E L E R R F P R Y	P E K P G P D G R V K T	S A A W L I	D R A G F K G Y G D G
UniRef90_UPI00036C4F9B	D D L K E K R V S K Q	P E Y P S A G S T F K R	P A G K L I	Q D A G L R G F R V G
UniRef90_R5U4N2				G Y F A G K L I
UniRef90_G5IEL3				F A G K L I
UniRef90_R6ZVG5	A A D L D R R A P G H	P R W D M P D G T V K V	P A A W L I	E E A G F P G Y E K G
UniRef90_W2ERB2	K Q H K K H R L A T Q	P Y H L P S C G S V F R S	A G R L I	E E A G L K G F K I G
UniRef90_K9R7N4	D E V N T L R A A K Q	P E Y P S C G S V F K R	P V G H L I	Q K A G L Q G H Q I G
UniRef90_G6CCQ4				G Y F A G K L I
UniRef90_R6ZSI9				F A G K L I
UniRef90_E6ME16				M D S G L R G A R I G
UniRef90_F7K6X9				Q D A G M K G A T R G
UniRef90_UPI000469C6C9	G	Q A D E V H D L	K A W K V I	E Q C G L K G C R I G
UniRef90_R6NT09				D G Y F A G A L I
UniRef90_R7JN03				G Y F A G K L V
UniRef90_R4PKD2	L T D L R E T Y P D I	P T Y N M P D G R Y K V	P T G W L I	M D A G F S G Y A V G
UniRef90_R5D1M2				G Y F A G T L I
UniRef90_F9PI36	A E Q L P E D A P R F	P V T P V I E G L V K T	S A A W L I	D H A G F S K G T G A
UniRef90_UPI0004764CAB	E H H L K Q R Q N S Q	P Y H L P S C G S V F R K	A G W L I	E H T G L K G Y Q I G
UniRef90_U7JPM5	V P D	G A P A F P Q P	D G R V K T S A A W L I	D H A G F H R G H D A
UniRef90_U1Y2V0				G Y F A G K L I
UniRef90_R5QI08				G L K A W L I
UniRef90_UPI0004691033	G	K A D D V H D L	K A W K V I	D D A G M R G A R V G
UniRef90_S3A7W4	A A S L P	E G A P R F S A G E G L V K T	S A A W L I	D H A G C K G F H L P
UniRef90_D5T501	D N N F K R A N K Q P	L N Y P S N G S V F K R	P A G K L I	M D S E L Q G V R I G
UniRef90_B8FT55				S A G R L I
UniRef90_R7CI28				S A G A L I
UniRef90_K2EM74	L	I E K F E K E T G V	R S R D S K I	P A G W L I
UniRef90_R5N5B4				G Y F A G G L I
UniRef90_G7H708	I A A V I A Q I A V V V	G P E V S G E D T K L	S A G W L I	E R A G F T K G Y P G
UniRef90_G4Q2N9	A D F S R R R R T K Q	P L Y P S A G S T F K R	P A A A L I	D E A G L K G M R V G
UniRef90_M1L7E5	L L N A I Y L F S N	L V F W K I G E D S Y K V	S A G W L I	D N C G W K G K T Y G
UniRef90_R1AUW1				Y A S R L I
UniRef90_UPI00037BD50A				F A G Q L I
UniRef90_S0KJN0	E L T E L R E L K Q P	L E Y P S C G S V F K R	P V G K L I	M E A N L K G H R I G
UniRef90_C0W693	A E R L P P E A P R Y	P V T P V V D G L V K T	S A A W L I	E H A G F P K G G Q A

		90	100	110	120
UniRef90_R5ZBD6	G A Q	V S E K H C G F L V N A T D H A T A A D D I V D E L I R H I	Q A T V K V D Q F F N V		
UniRef90_X8K5P5	G A Q	V S E K H C G F M I N T R G G A N G A A D D I V D Q L M H L V I	Q A T V K V D Q F F N V		
UniRef90_DOKZL8	A A G	V Y S T R K H S A L V L I N R R G G E A N G S E I Q Q G F L A M E A I	Q E R A D T V W A T R H F F A G L		
UniRef90_Q1IQH0	N V G	I Y S D T R K H S A L V L I N R R G G E A N G S E I Q Q G F L A M E A I	Q E R A D T V W A T R H F F A G L		
UniRef90_R6W6Y0	G A Q	V S E K H C G F V I N K T D G Q A T A A A D I A E E L I R Q Q R	R D R R D R V E E E K E F F S G V		
UniRef90_UPI0003B719BF	G A Q	V M S T Q K H P N F L I N K T D G Q A T A A A D I A E E L I R Q Q R	R D R R D R V E E E K E F F S G V		
UniRef90_G8S7Y7	G V A	J S T K H T L A L T H R G G A G D T A A G A L L E A D L L A R T E I	V R D D G V R R Q R E A Q Y T G V		
UniRef90_M2YH15	R A A	V S T E K H T L A M T N R R G G S A T A S D V L E A L A R T E I	V R D D G V R R Q R E A Q Y T G V		
UniRef90_F4XCE9	G A Q	V S E K H A G F V I N R R G G N A S C A R D V L L T V I H E R E V	Q R R R R V R R K E A Q Y T G V		
UniRef90_U7UCZ3	D A E	V S V K H A G F V I N R R G G N A S C A R D V L L T V I H E R E V	Q R R R R V R R K E A Q Y T G V		
UniRef90_UPI0003473F70	A F A	V H D R Q A L V L V H T G D G D R A G L E A A A S R V V A A T T	V Q A A T S F Q R F F G I		
UniRef90_X0PB46	G A Q	V S E T K H A G F I V N V D H A T A T D Y L N S L C R S I T S H	Q Q K K V F K E T S G V		
UniRef90_U2BSQ3	G A Q	V S E K H C G F V I N S G G A T A A E D I R S L C R S I T S H	Q Q K K V F K E T S G V		
UniRef90_UPI00036298BF	S V G	I S R R H A L A I V N R G G A T A A E V L A F M G S E I E D A V V	D D L L F A V V		
UniRef90_D1BNP7	D A Q	V S E K H A G F V I N T R G G A T A A K A D V L D L I S E Q V A	Q R R V E D Q K H F G V		
UniRef90_R6EMF8	G A Q	V S E K H A G F V I N T R E N A T A A D I V S L M E S E Q V A	R R V E D Q K H F G V		
UniRef90_F4CSA7	P V A	L S S G R H V L A L T N R G D G T T E D L L A L A A E V R A G T	E L D T N K F F G V		
UniRef90_G5KFP6	G V E	V S E K H A G F M I N V D N G T A S D Y E Q L I V H I K D V	Q K D V D D D T F F G V		
UniRef90_R5YQQ1	G A Q	V A S E K H C G F V I N S G G A T A A D V V L I R D V I Q K D	V V Q Q R V V Y E E K K G V		
UniRef90_UPI00037FC4D3	R A R	I S T E K H T L A L T N R G G Q A S T E D V L L T L A R E V V R	D G V H D D T F F G V		
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Q Q K I K A L L E Q R A K T Q P T N Q P S C G S V F V N P V G D
K A N T E Y R S S V H P L N L P S A G S V F K N P K
V N D N L S Y R S Y F P D D W I L S Q T H P D A P E T I K K K L
E T A N K S I E Y R K N T Q P Q G V K T A G C V F K N I T P A E A
I Q E K M N E N L S F R Q N K Q P A P L T L P N C G S V F R N P Q G D
M N E I K N A R S S T Q P I K E R T G G S T F A N P E
T E E E V R A R I K E F E K K A T Q P V T A K T A G C V F K N P E
T A Q Q L R D V I I E I R E A K L P D P K V L G N A G S F F M N P I V E K A K
S Y R H C G I S E D F V F T A A G K L G N R D D L R A A M
S I E L V E A K M N E H W I K R S Q P Y H Y K S A G C I F K N P E G E
I K A K M D E Y A Q Y R K D K Q P L E Y P S A G S T F K R
E A I R S M L T I R Q R R Q K F P R K L P N C G S V F V N P A M Y D E Y
I Q E K T K E T I V K R A S M G L H G V K S A G S F F M N P T V A
T P A D V V D E M M A V T G Q N E D V N R H S C G S F F M N P I V S Q S I

	50	60	70	80
UniRef90_UPI0003740A7A			A A R L I	E A T G L K G K R I
UniRef90_U1R6Z6	A E K L P Q D A P C F A A I D A S G N A	V K T S	A A W L I	Q H A G F P G Y R I H
UniRef90_UPI00036F7412		GR K A W E L L		D H A G C R G L V M G
UniRef90_B5Y9L7		S K E Y K A W E L L		T E V G L A G Y R I G
UniRef90_Q180P9		T G Y F A G K L I		E E T G L R G L T L R
UniRef90_S6CG18		F A G A L I		Q E A G C Q G L R V G
UniRef90_UPI00035FE3F7		Q G Y N A W Q I V		D Q L G Y R G K S I G
UniRef90_UPI0003B3D338	D R I A A A R E A S Q P R T R T G G S T F K N	P A W E L V	H N A G C R G L R V G	H N A G C R G L R V G
UniRef90_UPI000469F748		W A A R L I		E S C G L K G F H I G
UniRef90_R6C7W7		Q G A Y		D R C G L R G L T V G
UniRef90_V9G3N2		A A R L I		E A A G L K G F R I G
UniRef90_B8IZU3		S A E L P A G K L L		D Q A G F K G K K M G
UniRef90_A0A011U113	A R T L P P E C P R W P P P V S V Q P	S A E L P A G K L L		H A A G L K G F R I G
UniRef90_B6BH92	V A L F K K M R S N Q P S L P S A G S C F K N	P A G R L I		E A V G L K G K R L V S G
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UniRef90_UPI000289BC16		Y A A Q L I		E A S G L K G K R V G
UniRef90_S3UJT6	Y D Q E G K E R K	A W Q F I		D S A G L R G L Q I G
UniRef90_F9U8G6		A A R L I		E S E G L K G Y R I G
UniRef90_UPI000382C4C1		A A R L I		E A A G L K G R S I G
UniRef90_M4V9Z8		V A Q L I		D Q C G L K G Y R I G
UniRef90_R6Q4I5		F A A A L I		D Q C G L R G Y R H G
UniRef90_B9K7Z5		R N D F Y V G K A I		E S L G L K G Y T I G
UniRef90_X1VSE1		R G V S A G A L V		D R A G L K G L Q I G
UniRef90_Q73HL4		K N Y R A W E L I		D K S G C L R L N I G
UniRef90_UPI0004697353	A R T L P E D A P R F P V Q P A P E R M V K L S	A A W L I		H A V P K G F R L S
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UniRef90_UPI0004708FD5		A W Q L I		D E A G C R G L T R G
UniRef90_V5BVW8		F A A R L I		E V T K L K G Y R I G
UniRef90_D5RIR4		A W A L I		D A A G C R G L R Q G
UniRef90_F0JF53		D K S A G K L L		D K A G M K G V R I G
UniRef90_D1BA04		S A G L M L		D S A G C G L S V G
UniRef90_UPI00035F8634	A G I H L P S S A P R F E A G N E L V K L S	A A W L I		D H A G V R G F A L S
UniRef90_UPI0004785FC9		T A G T L L		D R A G L K G T R V G
UniRef90_J0QE16		S I S A W R V I		D E A G C R G L R I G
UniRef90_F0T000	P H	L S A G A L I		E Q A G W K G K T V G
UniRef90_R5DXE1		S A G R L L		D A V G V K G L K I V
UniRef90_R6U3H1	K E N S L A R K A K Q P E Y P N F G S V F K R P V G K L V			D D A G L R G Y K I G
UniRef90_UPI000377CA62		K N S A G W F I		E N C G L K G H R V G
UniRef90_R7GF09		G T D F I T A K L I		D D A G L K G Y R V G
UniRef90_R5SQM6	E N N A S R R A K Q P I E L P N S G S V F K R P E G H M I J E			D D A G L Q G K T V G
UniRef90_J3HSE4		S A W K E I		D A A G G R G L R I G
UniRef90_B2GI55	L T D R I P A D A P R Y P V L D G A V K F S	A A W L I		D H A G F K G F G L S
UniRef90_W0E5Q3		A A R L I		E A N G L K G R R L G
UniRef90_D7TT25		S N L G V T A G E L I		E R A G L K G Y K V G
UniRef90_UPI00042B1B0C		S S L G V S A A E L I		D K T G L K G F S I G
UniRef90_F8E3T8		N N Y A G T L I		E S C G L K G L R I G
UniRef90_Q3B0X9	L E N L N H R T T T Q P Y Q Q P S C G S V F R K A G K L I			E N L G L K G T R I G
UniRef90_E6VXG2		S A G R L L		D E A G L K G V S R G
UniRef90_C0N6A1		F A G R L I		E T S G L K G L R V G
UniRef90_R5VST8		Y A S F L I		D Q C G L K G A S V G
UniRef90_UPI00028A2EE5	A R A L P A D A P R W V A V P L G E E P A K L S	A A W L I		E N S G V K G F R L S
UniRef90_UPI0001C372F2		Y A S L L I		D Q C G L K G L S C G
UniRef90_UPI0003B616B3		T P E M S A G R L L		D E A G F K G R Q I G
UniRef90_A5GHN8	L Q N L N H R T S T Q P Y K L P S C G S V F R K A G R L I			E S L G L K G G R A I G
UniRef90_F8GE43	S Q Q R I Q R V D S Q P L N Q P N A G S V F R Y A A R L I			E A C G L K G C R I G
UniRef90_UPI00037D486E		A W K L I		K D S G C A G V S I G
UniRef90_S3JRQ1		P S G Q L I		D E A G L R G L R I G
UniRef90_C7NDG5	N H A F G K	F A A K L I		S D A D L K G Y R V G
UniRef90_D5BW28		A G R L I		E S C G L K G V S I G
UniRef90_R5EF29	E L I A R R T A S Q P L G V P S A G S A F K R P	A A A L I		E E A G L K G Y Q V G
UniRef90_UPI00037D10EF		A A R L I		E Q A G L K G Y A I G
UniRef90_UPI000412CA55	A A A L P D D S P K Y P A T L P D G S T V K L S	A A W L I		D H A G F H G Y R V S
UniRef90_U7UHN8		Q G Y F A G K L I		D D S G L R G F R Y K
UniRef90_S7W3R4	A R A L P A D A P R W V I D P V A D R T V K L S	A A W L I		E H S V P K G F R L P
UniRef90_K2CK66	I E L F A Q S I K N D P F P I	L P A A K L L		A M A D L K G K R V G
UniRef90_A4EJP3	G H	A D D V H D L K A W K V I		D D A G M R G A R I G
UniRef90_R6CTI6		F A G R L V		E D C G L K G F S I G
UniRef90_K2EEP0		M S A G A L I		D Q A G L K G L R V G
UniRef90_UPI000316E7CF		D N Y A G K L I		E E S G L K G F K I G
UniRef90_R6LZK5		G L S A G K L I		E D A G L K G Y K I G
UniRef90_K5YZD5	A E I K T K R E A T Q P V R A R T G G S D G Q K	A W E L V		D G A G C R G L T V G
UniRef90_B9Y7Z3		Y A S A L I		D Q C G L K G K Q I G
UniRef90_I0I9A8		Y A G R L I		E A A G L K G F A V G
UniRef90_R7NEE4		F A A K L I		E D A G L K G V S V G
UniRef90_D4L8R5		F A G A L I		E Q C G L K G K T V G
UniRef90_R5TRP4		D G M F A G K M I		E D I G L K G L T K G
UniRef90_V2Y5Q8	I E N A K R R E K Q P L D Y P S A G S T F K R P	A S Q L I		E E A G L K G T R V G
UniRef90_M4Q6X0	A N V C H H R E T V Q P I K E K T G G S T G H	S A W Q L I		E K S G C R G L E F G
UniRef90_UPI00035E7208		Y A A R L I		E Q A G L K G F T L G
UniRef90_UPI0003B746B0		N S G F T A G Q M I		D R A G L R G R R I G
UniRef90_R6I311	D E Q K A Y R L K S Q P C N A R T G G S T G L K	A W E L I		K K S G C A D L R V G
UniRef90_K2B060	I I A Q T P D H T T	S S G Y L I		D H A G C K D K V V G
UniRef90_R5KRI2		F A G R L L		E S V E V K G L V C G
UniRef90_Q92IT8		G R K S W E L I		D K A G L R G Y R I G
UniRef90_C6BYG4		G Y S A G K L L		D D A G F R G R N L G
UniRef90_R6BQ76	Y E E M A A L Y P G M P H Y T I D D S H E K I P	A G W M I		D Q C G W K G K W L D
UniRef90_J0QL42	D E V V L H R E A V I Q P V R E K T G G S T F I	S A W R V I		D E A G C R G L R I G
UniRef90_UPI000466067A		S A G R L L		D I S G C G L R V G
UniRef90_R7FHJ0		G D N F I T A K L I		D E A G L K G Y S I G
UniRef90_N6WUV2	G	P P G A V I		E K C G L K G M K H G
UniRef90_K2E0T0	D D K L K E E F S K E K G V A V R N D K L P	A G W V I		D Q V G L R G K K I G
UniRef90_UPI0003B44CBC	A D R L P D D A P K Y P A T I L P D G S T V K L S	A A W L I		D H A G F H G Y R V S

UniRef90_UPI0003740A7A G A Q I S D V H A N F I V N H G N A S S H D I N A L L Q L V 110 Q R V L E E F D F 120
UniRef90_U1R6Z6 A A S Q L S T S T K H T L V L T N R G G A Q T S S D I V E N L A R E L V I R Q R R V L R E E T F Y G I
UniRef90_UPI00036F7412 D A Q V S E T K H C N F L I N N R G G H A T A R E D L E N G L G E E V Q R R R A R V L G N A R F S G G I
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UniRef90_Q180P9 G A Q V S T E K H C G F V V N N Q G E A S A K D V L L D L I Y V T K Q S R R A R V Y N A K F T Y G V V I
UniRef90_S6CG18 G A Q V S T E K H A N G F V V N N Q G D N A T A A R D V L L A E V I Q Q Q R R A R V Y N A K F T Y G V V I
UniRef90_UPI00035FE3F7 G A M V S P I H S N F I V N N E G N A T A A R D V L D R L I A E N I Q Q Q R R A R V Y N A K F T Y G V V I
UniRef90_UPI0003B3D338 G A E V S E K H S N F L I N S H R A T A A S D I E A V L G E L V R A K T H L R T Q T G G V L
UniRef90_UPI000469F748 G A M V S S T K H A N F I V N T G G A T A S D I E A G V I D R V Q A K T H L R T Q T G G V L
UniRef90_R6C7W7 G A Q V S S K K H A N F V V N I G G A T C A S D V L A G Q V E V K D C K E K E K T G G F
UniRef90_V9G3N2 G A E L S L Q H A N F I E N T G Q A T A E D V L L A L L M E R L K E T T V I S E R K N G G T I
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UniRef90_F9U8G6 G A Q V S E K H A N F I V N T G D A T A E D I R E L L D L I D L Q Q R R V I S E R K N G G T I
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UniRef90_UPI0004708FD5 G A Q V S E K H C N F L I N T L G E A T A S S D I L E A N L G D E V R Q R K V L D D M S G I
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UniRef90_UPI00037D10EF G A R I S E K H A N F I V N L G G T A A A D I E K A L L S Q V I S E Q V Y K S S G I
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UniRef90_S7W3R4 G A A V S T K H S L A I V N R T G A T A A E V S E L S R Y I A A L V L S R Y G I
UniRef90_K2CK66 D A Q L S E K H P N F I V N L G N A S S E D V K A L I K I A K E T I R D K Y H I
UniRef90_A4EJP3 G A V M N A M H S N F L T N A G D A T A A D L E D L G E L V R K K V Y A S Q G I
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 R L R R R L A S Q P L S Y P S A G S V F R N P
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E	L	V	L	E	Q	V	V	I		
S	L	E	Q	E	I	N	V	W		
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E	T	E	V	E	Q	K	L	L		

140

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