

1 10 20 30 40

QUERY UniRef90\_I3I835 UniRef90\_W0RR39 UniRef90\_A0A023H839 UniRef90\_UPI00037ABEF9 UniRef90\_UPI00034A79DB UniRef90\_UPI0004269D46 UniRef90\_G8TBM3 UniRef90\_D0MHL3 UniRef90\_UPI00046688AF UniRef90\_B4RGH8 UniRef90\_A16DG64 UniRef90\_W0RQB1 UniRef90\_Q4UNZ2 UniRef90\_V4PNF0 UniRef90\_UPI000374CAF44 UniRef90\_C5BMS9 UniRef90\_V7Z6P5 UniRef90\_UPI0003F96F44 UniRef90\_M4S6L1 UniRef90\_A0A023Y3T9 UniRef90\_U2Z8K2 UniRef90\_F3PVM4 UniRef90\_UPI000476AC51 UniRef90\_FOBHV3 UniRef90\_UPI000479DE42 UniRef90\_UPI00047176D1 UniRef90\_UPI000262A53D UniRef90\_I9SGX6 UniRef90\_I0KNY7 UniRef90\_B5JFT9 UniRef90\_A5FIE2 UniRef90\_G2P3P1 UniRef90\_R6CVU1 UniRef90\_W7GK48 UniRef90\_H5XPQ4 UniRef90\_F4QMQ3 UniRef90\_B1ZP99 UniRef90\_R5TTY3 UniRef90\_T1WA49 UniRef90\_UPI0003182326 UniRef90\_UPI0004631758 UniRef90\_UPI00037017F0 UniRef90\_UPI0003732F2C UniRef90\_UPI0003730356 UniRef90\_TOII80 UniRef90\_I7A762 UniRef90\_I4VVK1 UniRef90\_M0ADA3 UniRef90\_L0FYK8 UniRef90\_T0KBV9 UniRef90\_UPI0003B555DA UniRef90\_R6KUD1 UniRef90\_S0FWP5 UniRef90\_G8LWI2 UniRef90\_UPI0004641E89 UniRef90\_J1KZZ6 UniRef90\_UPI00047BF64F UniRef90\_B0T4L3 UniRef90\_W0EYK1 UniRef90\_E6WX52 UniRef90\_UPI00037CB320 UniRef90\_UPI00047AA436 UniRef90\_V4RJQ7 UniRef90\_H1YFT9 UniRef90\_UPI00047E470C UniRef90\_M0CP55 UniRef90\_W1S572 UniRef90\_UPI000479880C UniRef90\_J3JDS5 UniRef90\_UPI000466C310 UniRef90\_Q8A4H7 UniRef90\_UPI00047B0557 UniRef90\_A0A023NVD5 UniRef90\_MOLV14 UniRef90\_D2U911 UniRef90\_F8DC1 UniRef90\_A9QDR9 UniRef90\_A0A023DFG3 UniRef90\_UPI000409BC65 UniRef90\_UPI00047A7B36 UniRef90\_D5VIA5 UniRef90\_I0L6Y5 UniRef90\_UPI000255AAB9 UniRef90\_A0A014MLX8 UniRef90\_B8I4H5 UniRef90\_UPI0002631A62 UniRef90\_A0A013VPM9 UniRef90\_A4IP80 UniRef90\_UPI000477CE30 UniRef90\_J3C6K5 UniRef90\_T1WBI3

D G Y D M W L R Y Q P I A D Q T L L K T Y Q K Q I R H V A G D S P T I N A  
 E D G Y E M W L R Y Q P I S N E Q Q L K T Y R K K I T Q V V V Q G D S V T M Q K  
 E D G Y D L W L R Y R P V T D A A R L A E Y R A A V T Q V V D G D S P T L R A  
 E D G Y D M W L R Y T P V T D N K L R K A Y Q R Q S A S E I I V A P N S P T L S V  
 E D G Y R L W Q R Y D L V Q D A S K L A A Y R Q T V G E L V L E G D S P T L S V  
 E D G Y R L W Q R Y E Q V Q D A A R L Q A Y R Q A L N E V V Q G N S P T L T V  
 E D G Y R L W L R Y N T I D N P A L L Q Q Y R Q Q I T S I N C P V D D G K L V A  
 E D G Y Q L W L R Y V R I E D E A L R Q R Y L Q Q F R A L H L E A T S P T L E I  
 E D G Y D M W L R Y Q P L N D S A L V K D Y R K Q L G T L V A P D D G P A V I E S  
 E D G Y D L W L R Y R P V E A P A A G Y R A A A S E L V V Q G G S P T L A V  
 E T G Y D L W L R Y P A I D D A D L L A T Y R S F A S E I I V V D G N S E T F T A  
 E S G Y D L W L R Y V G V E D A A L R R A Y A S R I T H L V V Q G A S P S L R A  
 E N G Y D L W L R Y H L P D A A Q K Q G S A R E L V V L G A T P T L Q A  
 E D G Y D L W L R Y R P L P V A Q A Q I Y A P H L T S V V A G D R P M L S A  
 E D G H E L W L R Y R L V D D A R L L T S Y R R A L T H V V V P D G G K V L G S  
 E D G Y R L W L K Y D L S D Q Q S I K T Y R K Q I S S I L Y V A G D S A T T T V  
 D D G Y D L W L R Y Q P L A N A A Q L H D S A S E L I V A G D S P S L H A  
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 E D G Y D L W L K Y R P L A D S A Q A R Y R P L A T A I A P Q D D P S I R I  
 E D G Y A L W M R Y A P L E P A L A A D Y H T R L A E V V A P D Q T P I Q R A  
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 E N G Y N L W L R Y V K I A D P A L I D N Y K D K N R H I V F P A V S D R L K A  
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 Y K L W L Q Y D K I S S N S A I A S E Y K N N I Q G I V V S L G N S E T S Q I  
 E D G Y D L W L R Y R P R E D P G Q L K R Y R A A L T V L R Q G G P L L Q Q S  
 E S G Y E L W L R Y R P L D N A D L S A R Y R Q I N Q K V L L P A V T P S L V A  
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 S G S D L W L R Y P P I S D P A L R K R Y A K S A T T V I V A G K N P V L E A  
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 E N G Y E L W L R Y Q P I E D A S A L L D S Y R Q K H I A L L F V P V S S D T L K A  
 D G Y E L W L R Y R P V E T S L A R D Y R A A A A Q L T P V G A S P T L N V  
 D G Y D L W L R Y R P L P A P V L K Q Y R D Q G T Q L V A P A D T A T Q R A  
 E D G Y E L W L R Y V P V A A D H A A G Y R A R A T E L L V V P A A T P T A Q A  
 E T G Y D L W L R Y A P L A S A E S Q R V S P H R Y V V A D A T R P T L A V  
 E D G Y R L W L R Y N P I N N T T L L E S Y R E R M F E S V E L L G E S A T T M D A  
 E D G Y R M W L R Y Q A A E P T L A E Q Y R Q Q F K H I S A S H S S P T M D L  
 E D G Y D L W L R Y A P A G Q A R G T D I S A H A R A I S A Q G D S A T M A S  
 E D G Y K L W L R Y D K I D N P V L I E K Y R Q L I K G Y S F K G N S P S I K V  
 E D G Y D L W L R Y H P L P A Q A G T Y R S H V T Q L I A G A T T P T Q V A  
 D C W L R Y D R I T A D D V R A S Y R R Q C R H A Y V S E K S P E C S A  
 D G Y N L W L Q Y Q K I E S P T L L P E Y Q K H I F I P G K N A T S D V  
 E D G Y D L W L R Y P K A E G T A L S T L S S H A T S I I A A A Q G D T A K V  
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 D N G Y Y C W L E Y G K L E D V E L K N I Y R K W C A N I V K F G D T P L I K C  
 E D G Y D L W L R Y R P L A E P R R D A V D K A V R A F V F G A A S P T M T A  
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 E D G Y D L W L R Y K P L P E A Q A R Q Y R E L G A E L V A P V Q T P T Q Q A  
 E D G Y E L W L R Y R P L D A G Q Q A Q Y R P R L A Q L V A P A A T P T Q R A  
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 E N G Y N L W L R Y K P V N S T S L K T E Y R S Y L N Q I Y F P S E S D R L K A  
 Y K L W L Q Y N K V V N S E R I T E Y Q E K N K N I V T I G N S E T T I K I  
 D C W L R Y D E V P D G D L R E S Y R R L C T H A Y V A E E S R E L G A  
 E D G Y D L W L R Y A P A N D A R A G E I T R H A T A I A T T G H N A T L T A  
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 Y D C W L R Y E R V P D R L D A Y R R R C R H A Y V A E E A P E L S A  
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 D G Y K L W L Q Y D Y I K N E T L R D Y Q A D V K N L V H F G D T E T I K V  
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 D C W L R Y E P A D G E R R E S Y R T R C E N V Y A S V G S P E L G A  
 E D G Y A L W L R Y P A L A Q A Q A A P W R A Y A T E L I A N A D T P L Q Q A  
 D C W L R Y E R V D D S K L A P Y R E R L S H A Y V S E G A P E L G A  
 D N G Y A A W L R Y D Q D K C E T R L E Q Y A G W T G E V L P A G V P I M K T  
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 D N G Y D L W L K Y D K I E N Q T I I A K E Y R D H L K S I V V Q D A D E T T A I  
 E D G Y D L W L R Y R P T A D P R R L I E E Y R K A L A G L A R Q G E G R V M E N  
 N G Y N C W L G Y H L E N G E L R E N Y S Q W A S N I V I S K E P D E I K I  
 E T G Y D L W L R Y H P L D A A T V Q R I A P R L R Y V V A D T S R P T L R A  
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QUERY UniRef90\_I3I835 UniRef90\_W0RR39 UniRef90\_A0A023H839 UniRef90\_UPI00037ABEF9 UniRef90\_UPI00034A79DB UniRef90\_UPI0004269D46 UniRef90\_G8TBM3 UniRef90\_D0MHL3 UniRef90\_UPI00046688AF UniRef90\_B4RGH8 UniRef90\_A6DG64 UniRef90\_W0RQB1 UniRef90\_Q4UNZ2 UniRef90\_V4PNF0 UniRef90\_UPI000374CAF4 UniRef90\_C5BMS9 UniRef90\_V7Z6P5 UniRef90\_UPI0003F96F44 UniRef90\_M4S6L1 UniRef90\_A0A023Y3T9 UniRef90\_U2Z8K2 UniRef90\_F3PVM4 UniRef90\_UPI000476AC51 UniRef90\_F0BHV3 UniRef90\_UPI000479DE42 UniRef90\_UPI00047176D1 UniRef90\_UPI000262A53D UniRef90\_I9SGX6 UniRef90\_10KNY7 UniRef90\_B5JFT9 UniRef90\_A5FIE2 UniRef90\_G2P3P1 UniRef90\_R6CVU1 UniRef90\_W7GK48 UniRef90\_H5XPQ4 UniRef90\_F4QM03 UniRef90\_B1ZP99 UniRef90\_R5TTY3 UniRef90\_T1WA49 UniRef90\_UPI0003182326 UniRef90\_UPI0004631758 UniRef90\_UPI00037017F0 UniRef90\_UPI0003732F2C UniRef90\_UPI0003730356 UniRef90\_TOII80 UniRef90\_I7A762 UniRef90\_I4VVK1 UniRef90\_M0ADA3 UniRef90\_L0FYK8 UniRef90\_T0KBV9 UniRef90\_UPI0003B555DA UniRef90\_R6KUD1 UniRef90\_S0FWP5 UniRef90\_G8LWI2 UniRef90\_UPI0004641E89 UniRef90\_J1KZZ6 UniRef90\_UPI00047BF64F UniRef90\_B0T4L3 UniRef90\_W0EYK1 UniRef90\_E6WX52 UniRef90\_UPI00037CB320 UniRef90\_UPI00047AA436 UniRef90\_V4RQJ7 UniRef90\_H1YFT9 UniRef90\_UPI00047E470C UniRef90\_M0CP55 UniRef90\_W1S572 UniRef90\_UPI000479880C UniRef90\_J3JDS5 UniRef90\_UPI000466C310 UniRef90\_Q8A4H7 UniRef90\_UPI00047B0557 UniRef90\_A0A023NVD5 UniRef90\_M0LV14 UniRef90\_D2U911 UniRef90\_F8DC1 UniRef90\_A9QDR9 UniRef90\_A0A023DFG3 UniRef90\_UPI000409BC65 UniRef90\_UPI00047A7B36 UniRef90\_D5VIA5 UniRef90\_I0L6Y5 UniRef90\_UPI000255AAB9 UniRef90\_A0A014MLX8 UniRef90\_B8I4H5 UniRef90\_UPI0002631A62 UniRef90\_A0A013VPM9 UniRef90\_A4IP80 UniRef90\_UPI000477CE30 UniRef90\_J3C6K5 UniRef90\_T1WBI3

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UniRef90_UPI00046688AF	A A Q E	L Q R G I S G L L D R P L E R S D S L A R R G S L V I G T P E S S E L I		
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UniRef90_W7GK48	A R D E	L Q R G L A G L L G S A P P R L A G T A A T G P M L V L G T P Q S S A L I		
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UniRef90_B1ZP99	A R D E	L T T G L L K G L L G V D L S T V S Q P T R D G A L L L G T A V R S P E L		
UniRef90_R5TTY3	A K K E	L Q G L L R G L L N S Q E I A S W N E L K E G T L L I A G T P R S L P G L		
UniRef90_T1WA49	A T G E	L T R G L T G L L G A A P P V S A E P G E G A I I Y G V P T R S P L V		
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UniRef90_UPI0003732F2C	I R N E	L E M G L G G L L S Q K I N F G E S A N K G L L I I G N Y D Q H E K I		
UniRef90_UPI0003730356	A V Q E	L E R G L Q G L L G K S P V G N G S G D N G R L L I I G T P E H S P E L		
UniRef90_TOII80	A K Q E	L Q R A V T S M T G H A P A L T T E P T A G S L W L A T P G S A P A I		
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UniRef90_I4VVK1	T R S E	L L R G L G G L L G Q A L P V I A D T A S R D G A L L I I G T P V S S P L I		
UniRef90_M0ADA3	I R D E	L R Q A L P E L G A K P W Q H P P T T V D G F G L A I G T P D D M A L I		
UniRef90_L0FYK8	J E K E	L R T A L E A M L E I A P Q F T T P K Q E T T L F I I G T R E Q L P A F		
UniRef90_T0KBV9	A R D E	L I R G L G K M T G V N P T V A G T P Q A G S I W L A T P A T D P A L		
UniRef90_UPI0003B555DA	A R A E	L Q R G V H G L L G T A L A D T A A V A T D G T L V L G N A A A P Q I		
UniRef90_R6KUD1	A K K E	L Q A G L S G L L N I I P Y T E E E T L E D N M L V V G T P Q S V P L F		
UniRef90_S0FWP5	A V N E	L K R G L A G L L G I R P E I I S E P A K P A F L M L G T L S G N K S I		
UniRef90_G8LWI2	A V K E	L I I G I E N M L G I S P E I V S I P E P S F I T V G T L Q N P I I		
UniRef90_UPI0004641E89	A R E E	L E R A F F F A M L V K V P V L Q D G E I C D G A V V A G T P E N L P L I		
UniRef90_J1KZZ6	A E K E	L K T G F L D M L G N T P E I R S E V K G E S Y I I V G S H S N L N S E		
UniRef90_UPI00047BF64F	A S K E	L E A G L L S E M F G N K I A L K S K I E G D R N I I I G S K E V L S S E		
UniRef90_B0T4L3	A R D E	L E R G L G G L L V G G A Q V L D G P T I L L G T P A N S P A V		
UniRef90_W0EYK1	A K K E	L I K G I S G L L G N R L R P R E G V T V N N C I I A G T P A S S V F V		
UniRef90_E6WX52	A R D E	L V R G L G G L L G R E P A Q A A A V V R R N G A L V V G T P A S V P Q L		
UniRef90_UPI00037CB320	I Q D E	L D L A L G K M L A L S P R Y S S S N N S S P G L I I A S P S S Q R P S L		
UniRef90_UPI00047AA436	A R G E	L L R G L G G L L G G A P A V A E A P S A P G A V L V G T P A S L P A L		
UniRef90_V4RQJ7	A K R E	L Q R G L G G L L A A A P M T S N T I A D G A I V V L A T P A D S R G F		
UniRef90_H1YFT9	A L D E	L N L G L N G L I G K P Q L L V R A Q G S S V I A T S N K I G A L		
UniRef90_UPI00047E470C	A T K E	L Q N A F K S L I N K T V P L S N K T A E S A N I I L A N Q S N V L S P E		
UniRef90_M0CP55	V R E E	L R R G L G G M L G R D P W Q H P P R T V D G F L A V G T P G D M D V V		
UniRef90_W1S572	A T Q E	L Q R G L G M T H T T P A L T R A V A Q Q G A L W L A T P A T		
UniRef90_UPI000479880C	E S K E	L G V A L E S M L G K I A V Q S K I E G E N L I I F G S K S S L D A E		
UniRef90_J3JDS5	V R D E	L R R A L P A L L G T D P W Q H P P T T A E G F L L A V G T P D D M A M I		
UniRef90_UPI000466C310	I R D E	L L R G L R G L L Q G R A P A L A E R V D R A G A L L L V G T P H A L P A I		
UniRef90_Q8A4H7	A K T E	L Y N G L K G L L G F T I Q E T H D V K D N C L L V G N V E S S P L I		
UniRef90_UPI00047B0557	A L K E	L E L G F A G M L D S N Y S K S Q S K N S S V I L I G N R A N L S K D		
UniRef90_A0A023NVD5	T R D E	L L R G L G G L L G Q A P S V G S A V E R D G A I V V G T P A S S P V V		
UniRef90_M0LV14	V R D E	L R R A M T G L L E R E P W Q H P P R S V E V G F L L A V G T P D D M A M I		
UniRef90_D2U911	A R A E	L Q R G L A G M L G A A P P L A T T V H R A G A L V V G T A A S P A I		
UniRef90_F8DC1	V R D E	L R R G L L G M L G R E L W Q H P P R S V D S F L V I I G H P E E M R P I		
UniRef90_A9QDR9	A A V E	L S R G I R S M L G T T P S V T H E A S Q G R F I V L E V L G G G S W I		
UniRef90_A0A023DFG3	A V E E	L S R G I S S I L G I Q P K V V K S V E K S G F I I L L G T I D D E E V K		
UniRef90_UPI000409BC65	I R K E	L Q I A A P K L V G S A P Q F K T E R L A E T Q V W L G K R E E L S Q V		
UniRef90_UPI00047A7B36	A K R E	L V G A F S G L L N G Q K P T V Y T E H P K M P T V V L L T T I D R L D K T		
UniRef90_D5VIA5	A R A E	L E R G L T G L L V G K P A S A A A G T R D G V I V L L G A A S D P A V		
UniRef90_I0L6Y5	A R D E	L V R G L G G L L D R A T P V T A V S G D D G A V V V G T P A S S P L V		
UniRef90_UPI000255AAB9	I K K E	L S L A L K G G L L G V A F E P S T F D S N I N A L V I S K P E N L P E		
UniRef90_A0A014MLX8	A E L E	L C R A V E G F I G S A P V R A P A G R A S V V I G T V D E S P V V		
UniRef90_B8I4H5	A L S E	L K S G I I N G I L G G D V V T R E P E Q S S C I A L G V L G R G Q N I		
UniRef90_UPI0002631A62	A V D E	D R G L L A G G L L G T A P A H A T A M R G E G G V M L A T A G S P V L		
UniRef90_A0A013VPM9	I R D E	L Q R G V G G M T G T S P A L S D T I Q P G A L W L A T P K T A P A		
UniRef90_A4IP80	A V E E	L R I G I T S M L G L E P Q V V P E M K Q T S F I W L G T L D D E E L K		
UniRef90_UPI000477CE30	A Q K E	L R A V E V E G F I L G Q Q P N M H D S L S L N T M W V S R K M N L G K D		
UniRef90_J3C6K5	A S N E	L Q V A L N D M F G N K I Q T A T K L E G E N K I I I G S K S A L S S E		
UniRef90_T1WBI3	A R A E	L Q R G L R G M T G T Q P A N A D A P R A G S I V L A R A D T L P A I		

QUERY	90	100	110	120
UniRef90_I3I835	A S L N L G E R L Q A L	G A E G Y L L E Q T R I	I N K R H V V I V	A A N S D V G V
UniRef90_W0RR39	A A L G L N N E L A A L	G D E G Y L I I A E Q K I	V N N R A A L V I	A A N T D V G V
UniRef90_A0A023H839	G A L G L G D A L L R A V	G R E G Y V V R A T R V	G G R R A I V I	A A N S D V G V
UniRef90_UPI00037ABEF9	A S L Q L G D R L A A A L	G D E G Y L I I E Q T R I	N K R P V T I	A A N S D V G V
UniRef90_UPI00034A79DB	K N L G I A D R L K P L	G D E G Y L L L T T K Q	N G R S Y T L I	A A N T D I G V
UniRef90_UPI0004269D46	R S L N I E D K L K P L	G R E G Y L L L S A R L	Q G K K V T V I	A A N T D T G V
UniRef90_G8TBM3	K E L A T A A R L K P L	G D E G Y L L L T T A K	D G K Q Y T V I	A A N T D I G V
UniRef90_D0MHL3	R K L V A D S A L A H L	G D E G F I I I R T V M	Y E G K N I T L I	T A N K E A G I
UniRef90_UPI00046688AF	A A L G L E A E L Q A L	G D E G F I I I R T M	T V E G H R A T V L	A A A S D V G V
UniRef90_B4RGH8	A S L G W E D R L A Q Q	G P E G F I I I E T T	T R I G R R D V T V I	A S E G D R G V
UniRef90_A6DG64	A R L N L P L E P L G	G P D G Y L I I R S V Q	V D G R P A T V I	A G N S D V G V
UniRef90_W0RQB1	A T L G W G T E L D A V	G E E G F F L I I K S T	T T I N G K R A V T V I	A S N G E L G T
UniRef90_Q4UNZ2	R H L G W G R E L D A V	G P E G F F V I I R S T	R V A D R P V T I I	A S S G D A G A
UniRef90_V4PNF0	A A L G L A T Q A L L	G R E G Y L I I R S T	R V D G H Q A T V I	V G G S D V G V
UniRef90_UPI000374CAF4	K A L N L P L S G L L	G E E G Y L I I R S V T	V D G H K V T V I	A A N S D R G V
UniRef90_C5BMS9	A D A V E P D V L R G L	G P E G Y V L I I L R Q I	G G R D A I L V	A G N A E R G A
UniRef90_V7Z6P5	R N A D L S E L K G L	G K E G F V I I K S L	E L S G K P V T L I	A A N T D V G A
UniRef90_UPI0003F96F44	A A L K L D T A R L	G R E G Y L I I R S V S	V G G H R I T A I	V G G S D I G A
UniRef90_M4S6L1	A N L N L A S Q L K S L	G N E G F L I I K T V	T I N K K Q C T V I	A A N K D I G L
UniRef90_A0A023Y3T9	A A L G L P L S T L	G R E G Y L I I R S V R	V D G K P A T V I	A A N S G V G V
UniRef90_U2Z8K2	A P L R Q E L S G L L	G D E G Y L I I R Q T	R I D G R E V M L V	A A R R D I G V
UniRef90_F3PVM4	A R K Q A F Y P E I E G L	S D E G Y L I I Q N S K	M E G K M V T V I	A A R T D I G V
UniRef90_UPI000476AC51	A A L K L P L G A L	G K E G F L I I R S I	A I G G Q P V T L V	T A N S D I G L
UniRef90_FOBHV3	T A L Q L K T D D L	G R E G Y L I I Q T V	R V D G H R A T A I	V G G S D V G A
UniRef90_UPI000479DE42	A E L P F V S E I N N L	D N E G Y I I I R S C	T V N G K G I T V I	A A R E D I G I
UniRef90_UPI00047176D1	A P L G L P L A Q L	P E G Y I I I R S A	T I D G K R V T V I	A A N Q D V G V
UniRef90_UPI000262A53D	A P F R E E I A A L	G E E G Y L I I K T R	T R I D G H A V L V	A A P R D I G V
UniRef90_I9SGX6	S G I H I T N E I S G L	G D E G F L I I K T L	K V D G I P C T V I	A A R K D M G V I
UniRef90_I0KNY7	A A Y G N E I A T L	G N E G F L I I R R V	R I E A R D V L V	A A R Q D V G V
UniRef90_B5JFT9	A K L D L D L S A L	G D E G Y L I I T S V	P Q K R K H Q I V I	A A N T D Q G L
UniRef90_A5FIE2	L Q K A L Q T D F E K I	N N E G F I I I K I S	I F K N K K Q L I I	S G K N D V A V
UniRef90_G2P3P1	R E L V P A A D V A E L	G D E G Y V I I R R V	T R R G R D F T V	V A A H A D R G V
UniRef90_R6CVU1	Q K Q T F F A E I N A L	S D E G Y L I I R D S	K I D G K R V M L V	A A R T D I G A
UniRef90_W7GK48	A P L R A Q M Q P L	G E E G Y L I I K R T	R V G G R D V L L V	V A A P R D I G V
UniRef90_H5XPQ4	R R H A P S E E R T L	V D E G Y L I I R S V	S R G R H D F T V I	A A N T E I V G A
UniRef90_F4QMQ3	A I P A P A D L D R E	G D E G Y F V I I K S	T T L D G H P V T V I	A G G S D V G V
UniRef90_B1ZP99	A G L V S E A D L R A A	S E E E G Y V I I R P	V I F A G K R C V L V	L G N R D V G V
UniRef90_R5TTY3	K D T D V Y R K L D R L	T E E E G Y L I I A S	S H I E K K A V T V I I	A A R T D I G V
UniRef90_T1WA49	A G L G L N L E G L G	P E G Y L I I R S L	R L D G R P V T V I	V A A N T D A G V
UniRef90_UPI0003182326	A A L Q G E L E E G L	G E E G Y L I I R S T	R I D G R A A T V V	V A A N T D M G A
UniRef90_UPI0004631758	A A L G L D L S G L L	G E E G Y L I I R S V	V R I I D G R P A T V V	V A A N T D T G A
UniRef90_UPI00037017F0	A G L N L P L A D L	G R E G F L I I R S V	V T I I G G A R V I L I	A A N S D V G V
UniRef90_UPI0003732F2C	K A F L E P E E V E N L	G E E G F V I I R T I	Q K D N Q K L I I	T G L Q D K A L
UniRef90_UPI0003730356	K K L G Q T L S S G V	G P E G F V I I Q T	L D N G T T A I	A A N S D V G V
UniRef90_T0II80	P V S L K G L G A E G Y A I	R S I I D H A G Q P I T L I	T I A A N S D I G I	G I
UniRef90_I7A762	L P E E I S N K L K T I	G D E G Y I I I K T F	E T E G K R I T L I	T A N A D I G V
UniRef90_I4VVK1	A G L H L D M R A L L	G R E G Y I I I R S V	V V V N G H A A T I I I	A G N D D I G V
UniRef90_M0ADA3	A E S V P V D D V A A L	D D G G F F L I I R A	V T W N G A D C L V	T A P T D R G L
UniRef90_L0FYK8	T L K A L N I P W E K L	G T E G F S I I Q S I	I N Q N S Q K A L I	T G N S D V A L
UniRef90_T0KBV9	A S Q P V K L D G L	G D E G Y I I R T V	T V V N G N P V T L I	A A N R E I G L
UniRef90_UPI0003B555DA	A A L Q L P T A G L	G R D G Y I I R S V	T I G G H R A I V	V G G S D V G A
UniRef90_R6KUD1	K E Q A F H A E I Y G L	S D E G Y I I I L N C	T I K G K K A T I	V A R T D I G V
UniRef90_S0FWP5	A G L L G R E K Q N L	G E E G F I I I K L	T E N E Q K Q L L V	A G K T D R G L
UniRef90_G8LWI2	D K A V G E N E R K D I	M E D G F F L I I K N	T E D K D Y I V V	T G I N D K G V
UniRef90_UPI0004641E89	A A L D L P L S D L	G K E G Y R V F S	L T L D G K R V T A	T A N T D I G V
UniRef90_J1KZZ6	I K N E L Q S D F D K I	N N E G F I I I K S I	S L K N K K Q I I	T G K N D V A V
UniRef90_UPI00047BF64F	I Q K E I I G N F D Q I	N E E G F I I I R S I	S V K G Q N Q I V I	T G K K D I G V
UniRef90_B0T4L3	A A L N L P L K G A	G D E G Y I I I R T V	G K T T V I	A A N N D I G V
UniRef90_W0EYK1	K K F F Q K N K L L N T	G N E G Y V I I S T G	G N V V G K K V L F I	A A T K D I G V
UniRef90_E6WX52	A S L Q G D L E G L	G E E G Y V I I R E A	R I D G R K A T V V	V A A N S D V G A
UniRef90_UPI00037CB320	N E M I T S E E Y A A L	G E E G Y V I I R T I	S N G K K T Q L I I	T G N T D I A L
UniRef90_UPI00047AA436	A R L G L D L D G L	G E E G Y V I I R S V	E L D G R P A T V V	V A A N T D V G A
UniRef90_V4RQJ7	A I P V G G L	D R E G F F V I I R S	T T L D G H P V T V I	A G G S D I G V
UniRef90_H1YFT9	K K W V P D S V L K K I	G N D G F V I I K T I	N Q A G R N V L V	T A N S D I G V
UniRef90_UPI00047E470C	L L D Q T K T E L Q K I	N N D G F I I I K T I	S Y K N K N H I I	T G K N D V A V
UniRef90_M0CP55	A Q A V D E D E I A D L	D E G G Y V I I T T S	E W E G I D T L V	T A S S D S G L
UniRef90_W1S572	D A T L P V A L D G L	G D E G Y A I R S T	Q A D G K A V T L I	A A N S D V G G L
UniRef90_UPI000479880C	I Q K K L S K D F E A I	N N D G F I I I K T I	S Y K N K N H I I	T G K N D V A V
UniRef90_J3JDS5	A E S V P T D V V D D L	A D G G Y V I I K S V	T W N G Q D C L V	T A S T D R G L
UniRef90_UPI000466C310	E R L R L D L H D L	G D E G Y V I I R S L	R I D G H P A T V V	A A N T D A G A
UniRef90_Q8A4H7	T S L L C A K E L D S L	G D E G Y I I R S L	Q I E Q K K V T V V	V A Q K D Q G L
UniRef90_UPI00047B0557	I T G Q L G N T F T K I	D E G F I I I K S F T	L K G K S Q I V I	T G K S D V A V
UniRef90_A0A023NVD5	A R L K L D A R A L	H D D G Y V I I R Q T	M D G R S V T A I	V G Q S D V A A
UniRef90_M0LV14	A D S V S T D R V A A L	G D G G F R I R S V	E W E G A E C V V	T A S T D R G L
UniRef90_D2U911	A R L R L D T R G L	G E E E G Y V I I H S	V V I D G R P A T V L	V G G G E R G V
UniRef90_F8DCD1	H Q T I D P D E V W D L	H E D G Y V I I R T	V E W E G H E C T V	T A P S D R G L
UniRef90_A9QDR9	D Q A A G D A A A L	S D E G Y V F L I K T	V R E A E K E Y I I	A A G K S E K A V
UniRef90_A0A023DFG3	H R F S S L R E F R Q M	M N K E G Y T I Q S I	S F N G E L S I Y I	L V G K T D K G V
UniRef90_UPI000409BC65	L G L Q Q Q T E R Q L	G E E G Y V I I W R G	F Q G K T Y Y A I I	G N R P I G V
UniRef90_UPI00047A7B36	F A F S L L H D D G Y	I I Q T K D Y N G T S I I	D F Q G K T Y Y A I I	G K T D K G V
UniRef90_D5VIA5	A K L N L P L K S L	G D E G Y V I I R T	P V N G K A T T V I	A A N R D I G V
UniRef90_I0L6Y5	R H L V S T R D L A R V	G D E G Y V I I R S L	R G K D R F T V V	V A G N T D L G A
UniRef90_UPI000255AAB9	N L K K S V N T T K L	E K D G F M I K A V	T L S D K M H T L I	I A K T N S G L
UniRef90_A0A014MLX8	R S Q V S P D R L A R I	G A Q G F V I I E M T	G R P R I L V I	G A H S D R G V
UniRef90_B8I4H5	D S Y V K Y D E V V Q I	G N E G F I I I K A F	T G N S E I V V V	T A T K T T K G L
UniRef90_UPI0002631A62	A G L N L P L A A L	G R E G F L I I R S T	T I A G A R V T V L I	A A N S D V G L
UniRef90_A0A013VPM9	L P V K T N D I G R E	G Y A I R S R V E G	G K P V T L I	A A N S D S G L
UniRef90_A4IP80	Q Q S L D R E R A A L	H P E G Y V I I R S D	H D G Q S R I Y I	A G K T D K G V
UniRef90_UPI000477CE30	I T N A L K A D F E K I	G N E G F I I I K S V	V T V K D K S I L L I	T A N E D I G V
UniRef90_J3C6K5	I Q K S I G S D F E K I	I N D E G F I I I K S I S I K N K K H I V I	K N K K H I V I	T G K K D F G V
UniRef90_T1WBI3	G D A A L R A D L D K L	G A E G Y V I I R R V	Q F R G A P V T L I	A A K D D I G I

130                  140

QUERY	
UniRef90_I3I835	L Y G S F H L R L I Q T Q H A L E K L S L S S A P R
UniRef90_W0RR39	L Y G S F H F L R L L Q T Q Q S L D N L N I R S A P K
UniRef90_A0A023H839	L Y G A F R F L R R Q L Q T Y G T L A N L A V A S A P K
UniRef90_UPI00037ABEF9	L Y G S F H F L R L L Q T Q Q D I S S L S L S S A P K
UniRef90_UPI00034A79DB	L Y G S F H F L R L L Q T R Q S I H K L S L S S S A P K
UniRef90_UPI0004269D46	L Y G S F H F L R L L Q T R Q P I G K L S L A S S P K
UniRef90_G8TBM3	L Y G V F H F L R L M Q T Q Q P I R Q L S I T S A P K
UniRef90_D0MHL3	L Y G A F H L L R L L Q T H R P I D S L N V R E A P R
UniRef90_UPI00046688AF	L Y G A F H L L R L L Q T Q Q A I D E L A V V A E A P K
UniRef90_B4RGH8	L Y G V F D F L R R M Q T R Q P V A G L E V V A E A P K
UniRef90_A6DG64	L Y G T F N F L R L M Q T Q Q P I D S L N I S D S P K
UniRef90_W0RQB1	L Y G A F H L L R L L Q T G R P I D T L R V A E R P R
UniRef90_Q4UNZ2	L Y G A F H L L R L V Q T G Q S I S A S L N L R Q T P R
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UniRef90_C5BMS9	L Y G T F H L L R L I Q T E Q P L R E L E I V E K P K
UniRef90_V7Z6P5	L Y G T F H F L R L L Q T G Q S L S A S L D I V H E S P R
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UniRef90_U2Z8K2	L Y G A F H F L R L I Q T R Q A L T N L D I R E A P K
UniRef90_F3PVM4	L Y G V F H Y L R L M Q T T Q P L E Q L A I K E N P K
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UniRef90_FOBHV3	L Y G V F H F L R L L Q T G Q P V S A S L D V R E S P R
UniRef90_UPI000479DE42	L Y G I Y H Y L R L M Q T N S L N K L D I K E E P K
UniRef90_UPI00047176D1	L Y G V F R F L K L M Q T R Q P L D N L D I S D A P K
UniRef90_UPI000262A53D	L Y G V F H F L R L L Q T Q S D I K E L N I T Q V P K
UniRef90_I9SGX6	M Y G V F H F L R L M Q R G T P L Q A L D V R E S P Q
UniRef90_I0KNY7	L Y G M F H L L R L M Q R G T P L D G I N V A S S P K
UniRef90_B5JFT9	L Y G V F A F L R H L Q T Q Q P L D G I N I A D S P K
UniRef90_A5FIE2	L Y G V F D F L R L L Q T N K S I I K N L D I Q D A P K
UniRef90_G2P3P1	L Y G A F H L L R L V Q T R R P L E H V D L T E R P K
UniRef90_R6CVU1	L Y G V F H Y L R L M Q T E Q T L D G I N L V E N P K
UniRef90_W7GK48	L Y G V F H L L R L L Q T G A A L D A L D V R Q S P R
UniRef90_H5XPQ4	L Y G T F A F L R R M Q T Q Q P I T G L D V T E K P R
UniRef90_F4QM03	L Y G A F R Y L R L K I Q T Q G T P L T A G L D I Q D A P K
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UniRef90_UPI0003730356	L Y G S F H L L R L M Q T Q G Q S V T D I N I A S A P K
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UniRef90_I7A762	L Y G T F H F I R L L L Q M Q S D I D N L N I V E S P P
UniRef90_I4VVK1	L Y G A F R F L R L L L Q T A Q P I A R L D L R D W P P R
UniRef90_M0ADA3	M Y G T F H L L R L L Q L R E P I D E L E I R E E P P
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UniRef90_T0KBV9	L Y G A F H Y L R L A Q G G G G S L D R I D I R S T P K
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UniRef90_F8DCC1	V Y G T F H L L R R V A L G E P I D D L D V V E E P P
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UniRef90_I0KDW1	D D G Y R L W L K Y D L I N D I	P R R T A Y A R S A Q F I A A N K P S P V L Q S			
UniRef90_I2GLW7	D D G Y R L W L K Y D P I A N T S Q R D A Y S R S A Q F I	A A N K T S P P I I K S			
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UniRef90_W0J7Z0	D C W L R Y E R V T E N D R L E S Y R R R C R H A Y V A E K A P E H G A				
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UniRef90_UPI00026CDC2F	E D G Y D L W L R Y R P L A G S A R T A L A A R A T A V V A P G T S P T I A A				
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UniRef90_G7VZX0	E S G Y D A W L H Y H R N R K V E S P A W C K L I V V Q E T D E V L H T				
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UniRef90_C7NUF7	D Q Y D C W L R Y D R R V S E D Q R A S Y R R R L K H A Y V A E E S P E C T A				
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50            60            70            80

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UniRef90_D4Z891	A R D E L M R G L A G A N G A P A L V E K P M N G A I W L A T P A S A P	
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UniRef90_D2QTM4	A A D E L Q M G L Q G L L G K A V P I V S N A G S R T G G I V L S V A F A P A A	
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UniRef90_E6TXL6	A V D E L Q A G L L S S M I N H S L H V L K T K D Q R A T L L L T I E E S I A K	
UniRef90_L7GMU8	A R D E L R R G L L G G L L G A A P P L A A S A E R A G A I V L G T P A T T P A I	
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130                    140

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UniRef90_D4Z891	L Y G A Y A Y L R L A E T G A S L D R L D I R S A P R
UniRef90_I0KDW1	L Y G A F A L L R H L Q T G Q P I D Q V S L T S N P K
UniRef90_I2GLW7	L Y G A F A L L R H L Q T G Q P I E Q L T L A S S P K
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UniRef90_F1TCV0	L Y G V F G L L R L L Q T E T V I E G I L K I E N P P
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UniRef90_UPI000370AE83	L Y A A F H L L R L M Q M G S T L E D L D I Q E S P P K
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UniRef90_I2E7L0	L Y G A F H F L R L I R T G A N P G E L D V L E N P P K
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UniRef90_K9DUS6	L Y G S F A W L R Q L T G A R A D Q I A L L A S S P P K
UniRef90_Q21LZ2	L Y G T F K L L Q L L Q T G Q A V V S N L A I I E S A P P K
UniRef90_J8TT03	L Y A S F H F L R L I Q T K Q H L G S L N I V E N P P K
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UniRef90_UPI0003815674	L Y G T F N L L R L V Q T E R N L I H V K I A S A P P K
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UniRef90_E6TXL6	L Y G V F H L L R L M Q T Q C S L K H I Y I V E Q P P K
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UniRef90_UPI000470979F	L Y G V F H L L R S M C C C G K P L A Q V Q G I D G P P R
UniRef90_UPI0003B3DA19	I F G V F D L I R R I Q L G Q D L L T L D V L E N P P K
UniRef90_C6W284	L Y G A F A L L R H M Q T G Q S L S G V N V K S T P P K
UniRef90_W4CT48	L Y G V F H L L R L I A S G K D I E N L D E I V N P P K
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UniRef90_L2G7I5	L Y G A F E Y L S L L A Q G N F S E V A Y A T N P P K
UniRef90_H6BSW1	L Y G A F E Y L S M L A Q G N F S K V A Y A T N P P K
UniRef90_W4VGU2	L Y G V H H L L R N M Q L E Q D L I S L A V F E Q P P K
UniRef90_A6DG58	L Y G A F H I L R L I Q T Q Q A L N T L D L K E N P P K
UniRef90_UPI000361FD2A	L Y G V F H L L R L I Q T G A S G I E A L D E A V N P P K
UniRef90_L0EGR1	L Y G A F H F L R L A S I G R A L E Q L D I A D R P P R
UniRef90_UPI000404A2F1	L Y G A F A F I R R I Q T G L D I S K I D I A D S P P K
UniRef90_X0RLZ3	L Y G T Y H F L R L L Q G N E S I E A L H I L N S P P K
UniRef90_C0INJ6	L Y G V F H L L R Y L Q G G D A P S L D L L S N P P K
UniRef90_E3E7E6	L Y G V F H L L R Y L Q G G D A P S L D L L S N P P K
UniRef90_I3VVB0	L Y G V F H L I R S V F G G G K N L E D T L C I E N P Q
UniRef90_W4B5H4	L Y G V F H L L R L L A S H Q P L T G L K V A D Q P P K
UniRef90_UPI000477B1EB	L Y G V Y H L L R L M Q T G R P L D T L D E V V V P P K
UniRef90_UPI000255DC0E	L Y G T F A L I R L M Q T G C P L D S L N I I E R P P K
UniRef90_H6CR96	L Y G V F H L L R Y L Q G G G E S L Q A L D V L S N P P K
UniRef90_UPI00031C427C	L Y G T F A F I R M M Q T G R S P E D L N I I E K P P K

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E D G F Q A W L R Y A P L P H L R N F T D I P K Q I L V L N S T S N G S I H T  
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UniRef90_A0A059EEJ4	A   L   A   E   I   D   R   A   T   E   S   L   L   G   T   A   L   K   S   T   D   K   L   R   S   R   T   L   V   L   A   S   A   D   C   A   D   A   I
UniRef90_G7VPA8	A   V   N   E   L   S   Q   G   M   E   G   I   T   G   T   K   V   S   I   S   G   N   A   E   S   T   P   S   I   V   I   G   I   F   G   T   G   T   G   I
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UniRef90_C6WI19	A   A   Q   E   L   S   R   G   L   S   Q   M   L   G   R   E   I   S   I   L   E   S   A   G   D   T   P   C   F   V   L   G   L   G   H   S   P   I   L
UniRef90_E8RU02	A   V   A   E   L   L   Q   R   G   L   S   G   L   S   G   R   R   I   S   V   A   K   N   V   S   A   P   S   V   V   L
UniRef90_I7FQ01	A   L   Q   E   E   F   Q   L   A   W   E   E   M   T   G   N   S   L   L   E   T   D   K   P   T   G   H   T   L   L   I   G   T   L   E   N   R   L   I
UniRef90_W4QCG5	A   L   Q   E   E   L   V   R   G   L   T   S   I   V   G   I   K   P   Q   I   S   N   S   V   N   H   A   I   V   L   S   T   R   E   T   L   P   K   E
UniRef90_W7Z5U2	I   K   R   E   L   N   L   A   V   E   S   M   F   G   K   T   S   T   W   Q   E   D   A   Q   L   V   L   T   T   V   A   D   K   A   R   L
UniRef90_UP10003C1536B	A   R   A   E   L   E   R   G   L   T   G   L   I   G   K   P   A   N   A   A   A   G   S   R   D   G   V   I   V   L   K   T
UniRef90_G4HCT0	A   I   E   E   L   L   R   S   G   C   R   S   L   L   D   I   E   P   E   L   N   E   G   I   Y   R   G   L   Q   L   R   V   Q   P   A   A   D   N   V   Q   D
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UniRef90_G7M591	A   V   N   E   E   L   L   K   T   A   I   T   K   F   F   E   N   M   P   I   I   C   S   S   P   K   A   S   Y   M   F   L   G   T   I   E   D   L   S   N   S
UniRef90_J3P3J7	A   G   Q   E   E   L   L   Q   K   G   I   K   G   M   V   G   K   D   V   S   V   Q   H   K   A   A   G   R   S   I   I   V   G   T   V   A   A   Y   T   E   S
UniRef90_F4L650	A   A   K   E   E   L   L   Q   T   G   L   Q   G   L   L   G   K   S   I   R   L   Q   S   T   A   S   T   A   P   G   G   I   S   L   E   L   T   T   T   P   Q
UniRef90_E4ZRP8	A   G   Q   E   E   L   L   R   K   G   I   E   G   V   F   G   R   Q   L   N   V   S   A   T   A   R   N   S   S   S   I   I   V   G   T   V   D   A   Y   T
UniRef90_B6QQA6	A   A   Q   E   E   L   L   Q   K   G   F   Q   G   I   L   H   K   P   I   D   V   N   S   T   K   D   S   S   S   I   V   V   G   T   A   D   A   Y   T
UniRef90_W2S236	A   G   Q   E   E   L   L   Q   Q   G   I   N   G   I   F   G   K   D   C   T   V   Q   Y   E   G   G   D   G   P   S   V   T   V   G   T   V   A   G   Y   A
UniRef90_B9TJN9	A   V   A   E   E   L   L   Q   K   G   L   G   G   M   L   G   K   P   A   G   I   L   A   S   R   I   T   D   G   A   L   L   A   T   P   A   R   L   P   E   L
UniRef90_I6QTZ4	A   V   E   E   L   L   K   T   A   V   T   S   L   V   G   F   E   P   E   V   S   K   E   A   L   C   G   S   G   I   I   V   G   N   V   T   D   A   L   I
UniRef90_UP10003746262	A   K   E   E   E   L   L   V   A   V   P   Q   M   L   D   D   K   K   F   N   V   S   N   D   P   Y   N   S   K   V   V   I   G   N   K   I   E   L   A   Q   H
UniRef90_Q0CJP9	A   I   E   E   E   L   L   Q   T   G   V   R   G   M   T   G   K   R   L   S   V   A   K   E   N   N   C   N   A   T   A   L   I   A   T   V   E   E   Y   R
UniRef90_W7N797	A   G   E   E   E   L   L   Q   R   G   L   E   R   I   L   G   Q   S   V   Q   V   D   S   H   T   D   T   R   G   S   I   I   V   G   T   L   S   S   L   K   A   N
UniRef90_F0S6Y2	A   A   S   E   E   L   L   E   N   A   L   K   I   L   L   N   E   R   V   A   E   T   K   E   I   K   E   N   S   L   V   L   L   K   T   E   D   F   T   K   Y   G
UniRef90_V9G9Y7	A   V   Q   E   E   L   L   Q   Q   A   C   E   S   M   L   G   F   M   P   Q   F   Q   A   E   I   I   T   D   E   S   Y   F   D
UniRef90_E3QEE2	A   L   S   E   E   L   L   T   K   G   Y   H   G   I   F   G   K   E   V   S   L   G   E   D   A   C   A   D   S   S   V   V   V   A   T   L   L   D   D   Y   I
UniRef90_N4VPS2	A   L   Q   K   G   L   Q   G   I   L   G   K   E   V   T   V   G   Q   D   P   C   S   G   S   S   A   V   V   S   T   L   D   N   Y   I
UniRef90_A0A016Q3X9	A   A   S   E   E   L   L   Q   K   G   F   S   G   I   L   N   D   L   K   T   A   D   S   K   K   T   A   T   I   V   V   T   T   V   D   N   L   E
UniRef90_D3EFC3	A   I   E   E   E   L   L   T   T   G   I   A   L   T   G   E   Q   P   L   R   E   E   M   D   A   Q   R   C   L   V   A   G   T   L   G   S   I   E   L   L
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UniRef90_I2F009	A   L   E   E   E   L   L   Q   I   G   F   K   G   L   L   G   K   N   L   T   N   N   S   K   N   N   T   T   G   G   I   K   L   E   I   T   N   K   E   E   L   T
UniRef90_E4T1K8	A   V   K   E   E   F   F   Q   Q   I   W   K   E   K   T   G   K   L   L   P   V   V   S   G   Q   I   D   N   Q   L   I   V   G   T   R   K   D   K   N   L
UniRef90_V9DF37	A   A   A   E   E   L   L   Q   Q   G   L   S   G   I   F   N   H   S   P   T   S   Y   Q   L   S   D   T   A   S   S   I   I   V   V   G   T   V   A   E   Y   A
UniRef90_UP100035D5A0F	A   A   N   E   E   L   L   Q   R   G   L   T   S   M   L   G   R   P   F   T   I   S   N   Q   T   E   D   N   I   S   A   I   I   L   T   N   L   A   T   L   N   K
UniRef90_E3RWB9	A   G   K   E   E   L   L   Q   K   G   V   I   T   G   Q   L   K   L   S   T   P   L   D   D   A   V   I   V   G   T   E   D   A   Y   F
UniRef90_UP100047CAEF4	A   L   R   E   E   L   L   K   D   A   C   R   S   M   L   G   I   E   P   L   A   S   E   R   P   S   N   P   S   Y   T   K   F   G
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UniRef90_Q8X211	A   G   T   E   E   L   L   T   R   R   G   L   Q   G   I   F   G   K   H   V   S   I   H   D   C   N   A   S   S   S   I   I   V   G   T   V   D   E   Y   S   K   I
UniRef90_F8FRT4	A   R   A   E   E   W   C   R   A   A   E   E   L   L   Y   G   I   Q   P   S   V   S   Q   T   A   E   G   A   S   G   I   L   L   G   T   F   G   S   S   A   L   L
UniRef90_F9FV05	A   G   E   E   E   L   L   L   R   C   G   L   E   R   I   L   G   Q   I   V   Q   V   D   S   D   L   R   A   D   G   S   I   I   V   V   G   T   L   S   A   L   K   A   N
UniRef90_S2DI45	I   K   N   E   L   N   I   A   A   E   G   F   F   G   Q   N   P   S   F   S   K   E   N   P   S   L   V   I   A   L   K   E   Q   L   P
UniRef90_M7S8G7	A   G   Q   E   E   L   L   Q   K   G   I   R   G   V   T   G   R   E   L   A   V   S   H   E   G   Y   G   T   G   S   I   I   V   G   T   V   E   A   Y   T
UniRef90_W4AWB1	A   V   R   E   E   L   L   R   Y   G   I   R   E   M   S   G   Q   S   P   E   I   V   G   E   S   L   A   Q   G   A   F   I   R   C   A   T   V   R   E   S   L   P
UniRef90_N4XCF6	A   G   Q   E   E   L   L   Q   R   G   V   L   G   T   T   S   K   Q   L   T   V   S   T   T   A   S   Q   D   S   A   I   I   V   G   T   T   E   A   Y   S
UniRef90_M2Z6E1	A   G   Q   E   E   L   L   Q   R   G   L   L   Q   I   F   G   K   K   V   A   T   N   A   A   A   I   E   G   R   S   G   I   I   V   V   G   T   V   D   Q   Y   M
UniRef90_K1WQV1	G   V   E   E   I   I   R   A   G   F   R   S   I   L   L   G   Q   T   L   D   S   S   S   D   S   T   E   R   S   S   T   V   I   V   G   T   L   D   Q   Y   V
UniRef90_W8YY09	A   L   E   E   E   L   L   R   R   A   V   E   S   I   L   I   G   Q   A   P   K   D   G   M   P   S   D   G   V   R   G   I   I   V   L   G   T   F   R   G   C   P   Q   A
UniRef90_Q4WW45	A   G   Q   E   E   L   L   Q   D   G   L   H   Q   I   L   G   K   H   A   S   V   S   T   G   C   S   T   D   S   S   I   I   V   V   G   T   V   E   A   Y   R   Q   V
UniRef90_T1W786	A   R   A   E   E   L   L   R   E   G   L   D   G   L   L   G   R   S   P   N   S   S   A   G   T   I   V   N   D   S   I   V   V   A   R   A   S   D   L   P   A   D
UniRef90_G9NF15	A   A   S   E   E   L   L   Q   K   G   I   K   G   I   L   G   N   L   G   V   S   S   S   Q   K   S   C   S   A   I   I   V   V   S   T   L   D   S   Y   K   S
UniRef90_C6XQG6	I   S   D   E   L   L   Q   S   A   F   M   A   M   T   G   S   E   L   L   V   R   H   D   K   L   E   D   G   T   L   I   I   S   S   T   Q   C   S   G   S   L
UniRef90_O42814	A   G   R   E   E   L   L   K   A   G   F   Q   S   I   L   S   T   N   L   T   F   H   P   F   Q   C   D   S   S   A   I   I   V   A   T   L   D   E   Y
UniRef90_Q0C8K9	A   G   K   E   E   L   L   E   N   G   F   K   G   L   F   G   K   D   L   T   L   S   S   G   C   R   G   S   S   S   I   I   V   G   T   F   D   S   F   T
UniRef90_I9URT9	I   R   E   E   E   L   L   E   R   A   L   K   A   L   T   V   T   P   I   F   V   Q   V   D   N   A   V   G   I   Q   M
UniRef90_R8BVM2	A   G   Q   E   E   L   L   K   T   G   I   E   R   I   L   G   K   A   T   R   V   A   S   K   R   C   K   S   A   A   I   I   V   G   T   I   G   A   Y   T
UniRef90_A0A017S1M4	A   G   Q   E   E   L   L   Q   R   G   I   Q   R   I   F   N   K   T   L   P   V   N   Y   G   D   C   A   A   S   S   I   I   V   G   T   L   G   D   Y   N   C   T
UniRef90_G0S1X2	A   G   K   E   E   L   L   V   Q   G   Q   L   D   G   I   F   G   K   Q   V   K   H   L   D   G   S   S   R   Q   A   T   V   A   I   V   A   T   V   N   A   Y   V   D
UniRef90_G9MEH6	A   S   S   E   E   L   L   H   K   G   I   Q   G   I   L   G   D   L   D   V   S   S   S   C   S   A   Q   N   T   I   I   V   V   S   T   L   E   T   Y   Q   S
UniRef90_B8NGU1	A   S   S   E   E   L   L   Q   A   G   L   E   N   I   V   L   G   Q   K   Q   L   S   I   K   S   C   G   R   S   S   S   I   I   V   V   A   T   L   E   Q   Y   R   Q
UniRef90_F6ICS2	A   Q   A   E   E   L   L   A   R   G   L   G   A   M   L   G   Q   S   G   K   G   K   A   P   V   L   A   R   A   G   R   I   I   L   F   G   Q   D   A   G   A   R   Q   L
UniRef90_C9SNA5	A   G   K   E   E   L   L   A   D   G   I   N   G   I   F   S   K   E   L   T   F   G   D   A   S   E   E   E   A   T   I   I   T   V   G   T   L   E   A   Y   Y   L
UniRef90_A1CC12	A   G   Q   E   E   L   L   Q   D   G   L   Q   R   M   F   K   M   H   A   T   V   E   P   K   C   S   T   R   S   S   V   I   I   G   T   L   D   A   Y   N
UniRef90_M2Y155	A   G   Q   E   E   L   L   Q   N   G   M   R   I   S   G   H   Q   L   G   V   H   S   R   Q   N   A   E   L   S   V   V   V   G   T   L   D   Q   Y   R
UniRef90_W0A8N9	A   A   A   E   E   L   L   R   H   G   L   T   G   D   A   G   P   V   V   I   A   A   A   T   D   A   A   V   A   A   R   L   P   T
UniRef90_G4N306	A   G   Q   E   E   L   L   Q   K   G   F   N   G   M   L   G   K   N   V   N   L   V   S   S   P   E   D   S   R   I   I   V   V   G   T   A   A   Q   F   T   D   E
UniRef90_Q2GPV7	A   G   Q   E   E   L   L   S   D   G   I   S   G   I   F   G   K   D   L   D   F   A   T   K   P   P   R   D   T   T   A   T   V   G   T   V   S   A   Y   I   D   S
UniRef90_G0GAH5	V   G   S   E   I   I   R   D   A   L   S   R   L   F   H   T   P   Q   E   G   S   T   G   G   G   G   A   L   Y   G   T   S   D   Q   S   P   V
UniRef90_A4XMX3	A   A   L   E   E   L   L   K   E   A   I   K   N   I   F   G   V   E   P   N   I   Q   T   T   S   Y   Q   L   D   H   G   T   L   I   I   G   K   L   G   N   E   V   I
UniRef90_Q0UHG2	A   Q   Q   E   E   L   L   V   K   G   F   H   G   I   F   G   K   Q   L   E   V   N   S   T   S   S   G   S   S   A   I   I   Y   V   G   T   V   E   A   Y   R   S   M
UniRef90_I3Z684	I   N   D   E   E   L   I   K   R   A   G   K   G   F   F   N   F   E   P   A   E   N   Q   E   N   P   K   L   I   I   S   K   L   S   D   L   N   L   T
UniRef90_B6QJ65	A   A   K   E   E   L   L   V   Q   D   G   L   L   N   K   L   K   Q   E   V   K   I   S   H   N   T   E   D   A   A   T   I   I   V   I   G   T   I   H   E   F   S   Q
UniRef90_B9MQL5	A   A   N   E   E   L   L   K   K   A   L   L   C   V   L   F   E   T   E   L   R   L   L   N   A   L   S   V   D   S   G   I   I   L   G   K   V   T   N   E   N   L
UniRef90_W9MA94	A   G   T   E   E   L   L   Q   D   A   L   A   G   I   F   G   E   Q   V   P   R   G   F   K   G   C   D   Q   N   S   I   I   V   V   G   T   L   D   A   Y   H
UniRef90_V5GA46	A   G   Q   E   E   L   L   Q   S   G   F   K   N   I   L   G   D   N   I   E   I   Q   H   G   G   C   Q   P   S   A   V   V   V   G   T   V   A   Q   Y   K   D   V
UniRef90_M2N5G8	A   G   Q   E   E   L   L   Q   T   G   I   D   S   G   I   F   G   Q   Q   C   N   V   H   H   S   W   G   P   S   A   I   I   V   V   G   T   I   D   E   Y   T   S   V
UniRef90_D3T5Y6	A   I   E   E   E   L   L   A   K   F   G   L   L   N   K   L   M   K   K   E   P   L   I   N   Y   S   P   K   S   S   Y   I   F   V   G   T   L   E   D   L   K   N   E
UniRef90_G4UBF4	A   G   Q   E   E   L   L   Q   A   G   I   Y   K   S   I   L   N   Q   T   L   P   L   Y   H   E   P   D   K   G   S   T   I   L   V   A   T   T   G   Q   S   H   G   V
UniRef90_W8F3K9	A   A   A   H   E   L   Q   L   G   L   Q   G   L   L   G   R   P   V   P   L   G   A   A   P   G   G   R   G   S   I   R   L
UniRef90_Q5AQZ4	A   A   A   Y   E   E   L   V   D   D   G   I   K   G   I   F   G   K   R   V   T   L   K   E   N   T   R   D   D   P   A   V   T   V   G   T   V   E   A   Y   A
UniRef90_B8MQG1	A   A   A   K   E   I   Q   H   G   L   K   R   I   L   G   H   D   L   I   T   G   S   Q   V   E   G   P   A   T   V   I   I   G   T   V   N   S   F   S
UniRef90_UP10003025B35	G   L   D   E   L   L   N   V   A   L   D   A   M   F   G   Y   Q   P   A   I   H   L   A   D   H   N   E   A   G   L   V   L   L   C   D   S   S   Y   Q
UniRef90_U2X5A5	A   L   T   E   E   L   S   R   G   L   E   R   I   L   Y   G   V   K   P   S   V   S   D   N   H   A   S   A   P   A   I   R   I   G   T   W   T   G   S   A   S   V
UniRef90_W4BVH0	A   A   E   E   L   L   L   K   G   C   L   K   A   T   L   G   I   T   P   R   F   I   S   N   T   R   A   S   I   I   Q   M
UniRef90_UP1000469BCC2	A   A   R   E   E   L   L   Q   L   G   L   S   K   I   L   S   Q   N   V   T   L   E   T   K   S   A   A   S   S   Y   I   V   I   G   T   V   K   T   F   L   S
UniRef90_G9MUP7	A   S   A   R   E   E   L   L   R   R   G   L   Q   S   I   L   G   D   A   T   E   S   F   T   P   Q   D   D   N   Y   I   V   I   G   T   L   E   M   I   T   N   F
UniRef90_W3X7V6	A   A   F   E   E   L   L   R   R   G   L   S   M   T   G   Q   M   G   L   K   P   H   A   T   E   P   Q   R   A   R   L   L   I   A   A   G   V   K   A   E   R
UniRef90_C1F1B1	L   R   N   E   E   V   E   Y   A   F   G   Q   M   G   L   K   P   H   A   T   E   P   Q   R   A   R   L   L   I   A   A   G   V   K   A   E   R   V   R
UniRef90_K7RP42	V   K   E   E   E   L   A   I   F   V   T   D   F   L   G   F   R   P   R   F   K   V   F   P   K   Q   G   R   H   V   L   I   G   K   L   S   D   L   P   V   E
UniRef90_F7YUS1	V   K   E   E   E   L   A   I   F   V   T   D   F   L   G   F   R   P   R   F   K   V   F   P   K   Q   G   R   H   V   L   I   G   K   L   S   D   L   P   V   E
UniRef90_UP1000472E423	A   V   L   E   E   L   L   Q   Q   G   L   Q   G   L   L   G   K   Q   I   P   I   N   Q   T   S   Q   P   G   G   Q   V   V   P   V   T   P   V   T
UniRef90_UP10003B57ABA	A   A   A   H   E   L   L   Q   Q   G   L   Q   G   L   L   G   R   P   V   P   V   A   A   S   G   G   K   G   Y   V   Q   L
UniRef90_UP100046FE176	A   A   A   T   E   E   L   L   R   R   A   W   K   G   V   V   P   V   T   P   V   T   G   T   V   E   A   Y   A   V
UniRef90_UP100042A0291	A   I   T   E   E   L   T   Q   G   L   N   K   I   F   G   I   K   P   K   V   S   Q   E   V   T   S   Q   Q   G   I   W   L   G   T   W   T   G   S   E   A   V

UniRef90\_A0A059EEJ4 90 D E A D L P T T E T V G A E G F A L R A T K L N G K R V I T I A A Q S D L G V  
 UniRef90\_G7VPA8 D E L F N A H V N S A V K A E G Y A I Q T D S L T G N I T G A V T S A G L  
 UniRef90\_R0IPE1 K A Y G G F R E D R N L E A D G F Y L E T S R D K V V I V G Q N E R G A  
 UniRef90\_C6WI19 D A V F S E G K A A K L G R E G Y A L R H E P G S G R I A G A E S T S G L  
 UniRef90\_E8RU02 T R L T T P E A G L G N E G Y M I R E G R Q N G Q P V V R I R A N S D I G L  
 UniRef90\_I7FQ01 R R L V D R E E L H E L G P E G Y I L R S V M Q G K D R F T I I A S T K E N G L  
 UniRef90\_W4QCG5 A I H I E A Q R L E D L N D E G F I I E S D L Q T K S V Y L V G N S P T G V  
 UniRef90\_W7Z5U2 R K H G N E E I A E L N E E G Y I I K E K D N Q L I V V G A S E K G L  
 UniRef90\_UP10003C1536B D G A D A A L G D E G Y R I R T L A V N G R K T T V I A G R R D V G V  
 UniRef90\_G4HCT0 L E E G D N S A P G K L G P E G F R L E Y L E G K G Q E R V I I I G G S E K G L  
 UniRef90\_Q6RKQ2 A A Y G N F S Q S V N L K E D G F W S T E N N T V Q I V G Q N E R G A  
 UniRef90\_G7M591 D L Y S N I N R E L L Q E G Y Y C S L Q S V E N K E V L Y V G K D E N G A  
 UniRef90\_J3P3J7 G G N A K D P K L A G L I K D G Y Y Y S I A G T N T L I L G Q N E R G A  
 UniRef90\_F4L650 P N L G T E G Y Y S I T T Q N T R V K I S A N T P S G L  
 UniRef90\_E4ZRP8 D A Y G T F E D A Q N I E E D G F Y L S T S S H Q V I V G S N E R G A  
 UniRef90\_B6QQA6 E A F G T G T N W G D L I E D G F W L H T S K D S V Q I I G Q N E R G A  
 UniRef90\_W2S236 E T G G S I D E L P E L V D D G F Y M S T V G G E A L I L G Q N E R G A  
 UniRef90\_B9TJN9 A S A A S P A E L A A L G G E G Y Y L L R Q T R I Q N H N V T I I A A N T D I G L  
 UniRef90\_I6QTZ4 M K Y I S D D E I Q K L D E E G Y Y V I K S V K E N P G L V V I G S K N G H G L  
 UniRef90\_UP10003746262 L D E N K Q A I L A D K N E E A F L L S S D E K Q L I T G N S D V A V  
 UniRef90\_Q0CJP9 R T C R N S S D I P D L V D G F W L R T E G N N V Q I L G Q S E R G A  
 UniRef90\_W7N797 E G N P L L Q S I P A L D E D G F W L D T N V N G S H D V H I V G Q N E R G A  
 UniRef90\_F0S6Y2 L A S K S F E K T D A F A I E K K M I Q N K P V I L I S S P S E I G L  
 UniRef90\_V9G9Y7 I R I D V S A P N I L S E E G Y T L V H D Q Q G Q K E L I T G R S G K G V  
 UniRef90\_E3QEE2 A A C G S E G V E A D L I E D G F W L S I K G G A V K I L G Q N E R G T  
 UniRef90\_N4VPS2 A T C G A Y G V E A D L T E D G F W L D V K N G T V I L G Q N E R G T  
 UniRef90\_A0A016Q3X9 K A C H D K Q K H P K L E E D G Y W L S T S D N S V K I I G Q N E R G A  
 UniRef90\_D3EFC3 D G S P E A E A G R V G D D G Y I I R R V V R G D Q D Y I F I A G G S D R G L  
 UniRef90\_B6HNU6 C G A A K G V P E L E E D G F W L D T K G K N V Q I L G Q N E R G A  
 UniRef90\_I2F009 K D S P E D S F A I I V Q K D N L I T S K T E T G V  
 UniRef90\_E4T1K8 L S L G I D K E L V R Q G K E G Y V I K T I S K Q N K T F T V V I A S A D E K G L  
 UniRef90\_V9DF37 N A F G G A P K T P Q L E D D G Y F L N T T G S S V Q I L G R N E R G A  
 UniRef90\_UP100035D5A0F UniRef90\_E3RWB9 A F A I T P G D K L P P E S Y Y T L G P K I E G N L H R Y I I L G A D I I R G E  
 UniRef90\_W9VD98 N K Y G R L D E S E Q M E T D G F F L S T S P K K V I I V G Q N E R G A  
 UniRef90\_Q8X211 C Y G S T A L P E L D Q D G F F L L N T G S A I Q I L G H N E R G A  
 UniRef90\_F8FRT4 D E L G P D A S S A V T G P E G F I I R A D R E R R R I A V G A K T P A G V  
 UniRef90\_F9FV05 G G E D L V Q S V P V L D E D G F F W L D T N V D G N N N I H I V G Q N E R G A  
 UniRef90\_S2DI45 S Y L A S K A S S K L G E E G F H I F S S D N Q T V I T A N S Q F G L  
 UniRef90\_M7S8G7 E A G G A S Q I P E L D E D G F F W L S T E G D S V E I V G Q N E R G A  
 UniRef90\_W9VD98 N E L L H S D L L Q Q D L N E E G Y W L K H V D K E N G G C L Y I V G R T D K G I  
 UniRef90\_Q8X211 K A Y G K I G E S E D L E D D G F Y L S I S P G K V I I I G Q N E R G A  
 UniRef90\_M2Z6E1 N T F H G Q D P H F N L I E D G F S L S V Q D H H V R I L G R N E R G A  
 UniRef90\_K1WQV1 E S F G N T T V P S L G E E G F W L N I E A D A V Q I I G Q D D E R G A  
 UniRef90\_W8YY09 A A A F S E E E R A A S A G E S Y R I R T A G S S I V V G G S R A A G V  
 UniRef90\_Q4WW45 C N A G R Q V P Q F D V D G F W L S I R E K S V L I V G Q S E R G A  
 UniRef90\_T1W786 A A V Q P R L R K L G L E G Y Y L L E R T R L R G H D V T L I A A N T D V G L  
 UniRef90\_G9NF15 A C G K L P P K L D L I Q D G Y W L S T K G E S V Q I I G Q N E R G A  
 UniRef90\_C6XQG6 Q S D L E A V E S D E G Y Y L I R S E N G E E I G H T L G A K T D I G L  
 UniRef90\_O42814 R Q K C R D I N E L P E L D P D G F F W L Q S E G D T V R I L G N N A R G A  
 UniRef90\_Q0C8K9 A A C G P L P K E V V L I E V D G F W L S T E G H S V R I I G Q N E R G A  
 UniRef90\_I9URT9 S F C K D K G L G E E G Y Y L I R S G K K R I T L Q A Y S D A G F  
 UniRef90\_R8BVM2 A D G G Q L V E E P D L A E D G F F W L S T K G D S I K I L G Q N Q R G A  
 UniRef90\_A0A017S1M4 H H N T P E P D E D G F F V L N T T G D T V Q I L G Q N Q R G A  
 UniRef90\_G0S1X2 A N P A A A K R I P Q L A D D G F Y L D V S S N G N V L I L G Q N E R G A  
 UniRef90\_G9MEH6 S C G K L S P K L N K E D G Y W L S A K G K S V Q I I G Q N E R G A  
 UniRef90\_B8NGU1 A C N R S S E V P S L G I D G F W L R A Y G D T V Q I V G E N E R G A  
 UniRef90\_F6ICS2 A G L P S G A Y R I A L G H D G R V V I A A N D D I G L  
 UniRef90\_C9SNA5 E D G G A I D E L P E L I E D G Y H L N I S G A N V L I L G Q N E R G A  
 UniRef90\_A1CC12 H A C K D A D P V P E L E E D G F W L N T K D G K V Q I I G Q S E R G A  
 UniRef90\_M2Y155 A T Y D D G L E V V D L I E D G F F W L K T T M A S V T L G Q N Q R G A  
 UniRef90\_W0A8N9 A E L G P E G Y Y L V R R V T L A G R P V V L V T G N T D V G V  
 UniRef90\_G4N306 T T L G L T F S P G D L E E D G F Y M S T R G R V V Q I V G Q N E R G A  
 UniRef90\_Q2GPV7 N P G A A D R L P E L V D D G F Y L S V S K G N V L I L G Q N E R G A  
 UniRef90\_G0GAH5 A E R I S A A E L G K L G D E G F I L K V E V E R D G S S S L V L T A R T R R G L  
 UniRef90\_A4XMX3 E K F L E K E E K E Q I G N E G F L I K V A T K T Q N I I L V A K T E S G I  
 UniRef90\_Q0UHG2 S S L P E E A R D L E Q D G F Y L S T E G G N V T I V G S N E R G A  
 UniRef90\_I3Z684 T F Q I N K E K I T A L G E D G F S I S K S E N S E T L I L A N T D I G L  
 UniRef90\_B6QJ65 A G G G D V T H I P P L K E D G F F W L D E D K N G N V Q I L G Q N E R G A  
 UniRef90\_B9MQL5 R G F I T D V E K E A V I G E E G F I I K L V D K S K K K Y I I V A S K G E K G I  
 UniRef90\_W9MA94 D A C G K A Q L P A V I E E D G F F W L S I K G G S V I K V G H N E R G A  
 UniRef90\_V5GA46 Q C G G V E G I P E L A E D G F F W L S T K G K G V Q I L G Q N D R G A  
 UniRef90\_M2N5G8 Y G E L S S T P E L I E D G F F W L N T T G N S V Q I L G Q N E R G A  
 UniRef90\_D3T5Y6 K L D V Q I K N E I L K E D G F A V K I V K E G D T D V L A I G Q N E K G V  
 UniRef90\_G4UBF4 K P A T T L I A D D G Y Y L L R V R P G N V V I L G Q T E R G A  
 UniRef90\_W8F3K9 R V A A A P E L G R E G Y R I S S Q N G A L E T G A T E V G V  
 UniRef90\_Q5AQZ4 E A G G D V S S V P E L I D D G Y Y L L S V A G P S V I L G Q N E R G A  
 UniRef90\_B8MQG1 H A G G D V S H I A Q L K E D G F F W L H G D D Y D N V Q I L G Q N E R G A  
 UniRef90\_UP10003025B35 H Q S R D R E R A T I I H P E G Y V I R S D V R N G Q S R I Y V G R T D K G V  
 UniRef90\_U2X5A5 A G L F S E T E R S T V Q G E G Y V I R E N E T E G V L V I G S E T P Q G V  
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 UniRef90\_UP100047A5AC7  
 UniRef90\_B2APQ4  
 UniRef90\_W4URA8  
 UniRef90\_J9HXH1  
 UniRef90\_A0A031JIR9  
 UniRef90\_V8FW65  
 UniRef90\_A0A031I1192  
 UniRef90\_R6D1M7  
 UniRef90\_E4RWD1  
 UniRef90\_F8F1B6  
 UniRef90\_T0YVF4  
 UniRef90\_R5CJ12  
 UniRef90\_F8X1N9  
 UniRef90\_R7CZB9  
 UniRef90\_J3CCQ1  
 UniRef90\_R6CDT5  
 UniRef90\_C6X161  
 UniRef90\_R7KW43  
 UniRef90\_R7AZP6  
 UniRef90\_R5VBW6  
 UniRef90\_R5UG52  
 UniRef90\_D7W1L6  
 UniRef90\_G9NQL1  
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 UniRef90\_UP10003777E1F  
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 UniRef90\_D0MEX9  
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 UniRef90\_R5UKU2  
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 UniRef90\_R6M7X6  
 UniRef90\_F4GLG9  
 UniRef90\_F7KDR3  
 UniRef90\_G0J2G3  
 UniRef90\_E4T4Z1  
 UniRef90\_S7ZNU5  
 UniRef90\_C3R1E7  
 UniRef90\_D1XPX9  
 UniRef90\_G8TBM1  
 UniRef90\_X5DCX9  
 UniRef90\_UP100046F0A14  
 UniRef90\_G0IZ50  
 UniRef90\_K1L6B8

50            60            70            80

The alignment shows a highly conserved sequence across all listed UniRef90 entries. Key features include:

- Conservation at Position 50:** Most entries start with P or L.
- Conservation at Position 60:** A large cluster of entries starts with V, I, or A.
- Conservation at Position 70:** A large cluster of entries ends with G.
- Conservation at Position 80:** Most entries end with D or E.
- Color Coding:** Yellow highlights positions where the same amino acid is present in most entries; blue highlights positions where different amino acids are frequently found.
- Conservation Across All Positions:** The sequence is generally well-conserved, with many positions showing high similarity across all entries.

90                    100                    110                    120

L K G [L] D E F E F S L   G E E G F [L]   K K V E F G E N S [I] L I L   T A K E Y V G L	Q T S K G G S Q I [T]   A S S G E Q G V		
U n i R e f 9 0 _ B 5 Y A E 9	U n i R e f 9 0 _ C 3 Q N M 6	U n i R e f 9 0 _ W 7 Y B 3 3	U n i R e f 9 0 _ B 9 K 7 8 2
U n i R e f 9 0 _ B 8 E 3 B 2	U n i R e f 9 0 _ U P I 0 0 0 3 B 3 F 1 E B	U n i R e f 9 0 _ T 0 1 8 1 4	U n i R e f 9 0 _ M 1 M Q Y 3
U n i R e f 9 0 _ S 7 Z I W 1	U n i R e f 9 0 _ G 2 Q J E 6	U n i R e f 9 0 _ E 0 I F B 3	U n i R e f 9 0 _ U P I 0 0 0 4 7 C 7 4 B
U n i R e f 9 0 _ I 3 Z M G 5	U n i R e f 9 0 _ K 0 1 V D 3	U n i R e f 9 0 _ K 0 1 V D 3	U n i R e f 9 0 _ K 6 U 6 6 5
U n i R e f 9 0 _ P 9 6 1 0 5	U n i R e f 9 0 _ D 6 D 5 C 2	U n i R e f 9 0 _ U P I 0 0 0 4 7 A 5 A C 7	U n i R e f 9 0 _ D 6 D 5 C 2
U n i R e f 9 0 _ U P I 0 0 0 4 7 A 5 A C 7	U n i R e f 9 0 _ B 2 A P Q 4	U n i R e f 9 0 _ W 4 U R A 8	U n i R e f 9 0 _ L 0 1 V D 3
U n i R e f 9 0 _ J 9 X H 1	U n i R e f 9 0 _ A 0 A 0 3 1 J I R 9	U n i R e f 9 0 _ A 0 A 0 3 1 J I R 9	U n i R e f 9 0 _ P 9 6 1 0 5
U n i R e f 9 0 _ V 8 F W 6 5	U n i R e f 9 0 _ A 0 A 0 3 1 I 1 9 2	U n i R e f 9 0 _ A 0 A 0 3 1 I 1 9 2	U n i R e f 9 0 _ D 6 D 5 C 2
U n i R e f 9 0 _ R 6 D 1 M 7	U n i R e f 9 0 _ E 4 R W D 1	U n i R e f 9 0 _ E 4 R W D 1	U n i R e f 9 0 _ U P I 0 0 0 4 7 A 5 A C 7
U n i R e f 9 0 _ F 8 F 1 B 6	U n i R e f 9 0 _ T 0 Y V F 4	U n i R e f 9 0 _ T 0 Y V F 4	U n i R e f 9 0 _ U P I 0 0 0 4 7 C 7 4 B
U n i R e f 9 0 _ R 5 C J 1 2	U n i R e f 9 0 _ F 8 X 1 N 9	U n i R e f 9 0 _ F 8 X 1 N 9	U n i R e f 9 0 _ R 6 D 1 M 7
U n i R e f 9 0 _ R 7 C Z B 9	U n i R e f 9 0 _ J 3 C C Q 1	U n i R e f 9 0 _ J 3 C C Q 1	U n i R e f 9 0 _ E 4 R W D 1
U n i R e f 9 0 _ R 6 C D T 5	U n i R e f 9 0 _ C 6 X 1 6 1	U n i R e f 9 0 _ C 6 X 1 6 1	U n i R e f 9 0 _ F 8 F 1 B 6
U n i R e f 9 0 _ R 7 K W 4 3	U n i R e f 9 0 _ R 7 A Z P 6	U n i R e f 9 0 _ R 7 A Z P 6	U n i R e f 9 0 _ T 0 Y V F 4
U n i R e f 9 0 _ R 5 V B W 6	U n i R e f 9 0 _ R 5 V B W 6	U n i R e f 9 0 _ R 5 V B W 6	U n i R e f 9 0 _ R 5 C J 1 2
U n i R e f 9 0 _ R 5 U G 5 2	U n i R e f 9 0 _ D 7 W 1 L 6	U n i R e f 9 0 _ D 7 W 1 L 6	U n i R e f 9 0 _ F 8 X 1 N 9
U n i R e f 9 0 _ G 9 N Q L 1	U n i R e f 9 0 _ U P I 0 0 0 4 7 A 9 3 7	U n i R e f 9 0 _ U P I 0 0 0 4 7 A 9 3 7	U n i R e f 9 0 _ R 6 C D T 5
U n i R e f 9 0 _ U 7 P J I 3	U n i R e f 9 0 _ U P I 0 0 0 4 7 7 4 A C 3	U n i R e f 9 0 _ U P I 0 0 0 3 7 7 7 E 1 F	U n i R e f 9 0 _ C 6 X 1 6 1
U n i R e f 9 0 _ U P I 0 0 0 3 7 7 7 E 1 F	U n i R e f 9 0 _ U P I 0 0 0 3 7 7 7 E 1 F	U n i R e f 9 0 _ U P I 0 0 0 3 7 7 7 E 1 F	U n i R e f 9 0 _ R 7 C Z B 9
U n i R e f 9 0 _ U 2 C M P 9	U n i R e f 9 0 _ R 6 F Q A 7	U n i R e f 9 0 _ R 6 F Q A 7	U n i R e f 9 0 _ J 3 C C Q 1
U n i R e f 9 0 _ R 6 F Q A 7	U n i R e f 9 0 _ U P I 0 0 0 3 6 C 7 3 3 0	U n i R e f 9 0 _ U P I 0 0 0 3 6 C 7 3 3 0	U n i R e f 9 0 _ R 6 C D T 5
U n i R e f 9 0 _ R 5 J K 2 8	U n i R e f 9 0 _ H 9 A 0 B 2	U n i R e f 9 0 _ H 9 A 0 B 2	U n i R e f 9 0 _ C 6 X 1 6 1
U n i R e f 9 0 _ H 9 A 0 B 2	U n i R e f 9 0 _ T 0 P 3 0 4	U n i R e f 9 0 _ T 0 P 3 0 4	U n i R e f 9 0 _ R 7 K W 4 3
U n i R e f 9 0 _ U P I 0 0 0 4 7 2 1 8 4 1	U n i R e f 9 0 _ R 5 V B W 6	U n i R e f 9 0 _ R 5 V B W 6	U n i R e f 9 0 _ U P I 0 0 0 4 7 A 9 3 7
U n i R e f 9 0 _ U P I 0 0 0 4 7 B 2 6 9 4	U n i R e f 9 0 _ U P I 0 0 0 3 B 4 A 2 3	U n i R e f 9 0 _ U P I 0 0 0 3 B 4 A 2 3	U n i R e f 9 0 _ U 7 P J I 3
U n i R e f 9 0 _ U P I 0 0 0 3 B 4 A 2 3	U n i R e f 9 0 _ R 5 C R J 2	U n i R e f 9 0 _ R 5 C R J 2	U n i R e f 9 0 _ U P I 0 0 0 4 7 7 4 A C 3
U n i R e f 9 0 _ I 3 Z B 5 6	U n i R e f 9 0 _ U P I 0 0 0 3 B 7 4 4 0 1	U n i R e f 9 0 _ U P I 0 0 0 3 B 7 4 4 0 1	U n i R e f 9 0 _ U P I 0 0 0 4 7 7 4 A C 3
U n i R e f 9 0 _ U P I 0 0 0 4 2 3 4 A 1 1	U n i R e f 9 0 _ R 6 L I D 1	U n i R e f 9 0 _ R 6 L I D 1	U n i R e f 9 0 _ I 3 Z B 5 6
U n i R e f 9 0 _ U P I 0 0 0 4 7 1 8 5 8 B	U n i R e f 9 0 _ V 9 G H 2 5	U n i R e f 9 0 _ V 9 G H 2 5	U n i R e f 9 0 _ U P I 0 0 0 4 2 3 4 A 1 1
U n i R e f 9 0 _ C 5 B Y Z 6	U n i R e f 9 0 _ C 8 W Q 2 0	U n i R e f 9 0 _ C 8 W Q 2 0	U n i R e f 9 0 _ R 6 L I D 1
U n i R e f 9 0 _ R 6 F C 8 8	U n i R e f 9 0 _ F 5 I W S 8	U n i R e f 9 0 _ F 5 I W S 8	U n i R e f 9 0 _ U P I 0 0 0 4 7 1 8 5 8 B
U n i R e f 9 0 _ R 6 Z K V 4	U n i R e f 9 0 _ D 8 D V 5 2	U n i R e f 9 0 _ D 8 D V 5 2	U n i R e f 9 0 _ C 5 B Y Z 6
U n i R e f 9 0 _ B 5 C Z 0 9	U n i R e f 9 0 _ R 6 Z J 3	U n i R e f 9 0 _ R 6 Z J 3	U n i R e f 9 0 _ R 6 Z K V 4
U n i R e f 9 0 _ R 6 Z J 3	U n i R e f 9 0 _ U P I 0 0 0 3 7 1 F B A 8	U n i R e f 9 0 _ U P I 0 0 0 3 7 1 F B A 8	U n i R e f 9 0 _ B 5 C Z 0 9
U n i R e f 9 0 _ R 7 N 8 S 2	U n i R e f 9 0 _ D 0 M E X 9	U n i R e f 9 0 _ D 0 M E X 9	U n i R e f 9 0 _ R 6 Z J 3
U n i R e f 9 0 _ R 6 L H 1 2	U n i R e f 9 0 _ R 7 E 5 N 6	U n i R e f 9 0 _ R 7 E 5 N 6	U n i R e f 9 0 _ U P I 0 0 0 3 7 1 F B A 8
U n i R e f 9 0 _ R 7 E 5 N 6	U n i R e f 9 0 _ R 5 U K U 2	U n i R e f 9 0 _ R 5 U K U 2	U n i R e f 9 0 _ R 7 N 8 S 2
U n i R e f 9 0 _ R 5 U K U 2	U n i R e f 9 0 _ U P I 0 0 0 3 B 7 1 8 A E	U n i R e f 9 0 _ U P I 0 0 0 3 B 7 1 8 A E	U n i R e f 9 0 _ D 0 M E X 9
U n i R e f 9 0 _ H 1 H K W 9	U n i R e f 9 0 _ U P I 0 0 0 4 1 0 3 A 9 F	U n i R e f 9 0 _ U P I 0 0 0 4 1 0 3 A 9 F	U n i R e f 9 0 _ R 6 L H 1 2
U n i R e f 9 0 _ U P I 0 0 0 4 1 0 3 A 9 F	U n i R e f 9 0 _ U P I 0 0 0 4 0 0 7 D 0 B	U n i R e f 9 0 _ U P I 0 0 0 4 0 0 7 D 0 B	U n i R e f 9 0 _ R 7 E 5 N 6
U n i R e f 9 0 _ U P I 0 0 0 4 0 0 7 D 0 B	U n i R e f 9 0 _ U P I 0 0 0 3 B 6 C 9 E B	U n i R e f 9 0 _ U P I 0 0 0 3 B 6 C 9 E B	U n i R e f 9 0 _ R 5 U K U 2
U n i R e f 9 0 _ R 6 M 7 X 6	U n i R e f 9 0 _ F 4 G L G 9	U n i R e f 9 0 _ F 4 G L G 9	U n i R e f 9 0 _ H 1 H K W 9
U n i R e f 9 0 _ F 4 G L G 9	U n i R e f 9 0 _ F 7 K D R 3	U n i R e f 9 0 _ F 7 K D R 3	U n i R e f 9 0 _ U P I 0 0 0 4 1 0 3 A 9 F
U n i R e f 9 0 _ F 7 K D R 3	U n i R e f 9 0 _ G 0 J 2 G 3	U n i R e f 9 0 _ G 0 J 2 G 3	U n i R e f 9 0 _ U P I 0 0 0 4 0 0 7 D 0 B
U n i R e f 9 0 _ G 0 J 2 G 3	U n i R e f 9 0 _ E 4 T 4 Z 1	U n i R e f 9 0 _ E 4 T 4 Z 1	U n i R e f 9 0 _ U P I 0 0 0 3 B 6 C 9 E B
U n i R e f 9 0 _ E 4 T 4 Z 1	U n i R e f 9 0 _ S 7 Z N U 5	U n i R e f 9 0 _ S 7 Z N U 5	U n i R e f 9 0 _ R 6 M 7 X 6
U n i R e f 9 0 _ S 7 Z N U 5	U n i R e f 9 0 _ C 3 R 1 E 7	U n i R e f 9 0 _ C 3 R 1 E 7	U n i R e f 9 0 _ F 4 G L G 9
U n i R e f 9 0 _ C 3 R 1 E 7	U n i R e f 9 0 _ D 1 P X P 9	U n i R e f 9 0 _ D 1 P X P 9	U n i R e f 9 0 _ F 7 K D R 3
U n i R e f 9 0 _ D 1 P X P 9	U n i R e f 9 0 _ G 8 T B M 1	U n i R e f 9 0 _ G 8 T B M 1	U n i R e f 9 0 _ G 0 J 2 G 3
U n i R e f 9 0 _ G 8 T B M 1	U n i R e f 9 0 _ X 5 D C X 9	U n i R e f 9 0 _ X 5 D C X 9	U n i R e f 9 0 _ E 4 T 4 Z 1
U n i R e f 9 0 _ X 5 D C X 9	U n i R e f 9 0 _ U P I 0 0 0 4 6 F 0 A 1 4	U n i R e f 9 0 _ U P I 0 0 0 4 6 F 0 A 1 4	U n i R e f 9 0 _ S 7 Z N U 5
U n i R e f 9 0 _ U P I 0 0 0 4 6 F 0 A 1 4	U n i R e f 9 0 _ G 0 I Z 0 5	U n i R e f 9 0 _ G 0 I Z 0 5	U n i R e f 9 0 _ C 3 R 1 E 7
U n i R e f 9 0 _ G 0 I Z 0 5	U n i R e f 9 0 _ K 1 L 6 B 8	U n i R e f 9 0 _ K 1 L 6 B 8	U n i R e f 9 0 _ D 1 P X P 9

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130                    140

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

1                    10                    20                    30                    40

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UniRef90_UPI00035C2E70	R S F A V W C D K A E H K G V L T			
UniRef90_UPI00047A6455	D W T Q L W L N Y H R V C E G D G V W N	I T L E G F S D S D A V I S N		
UniRef90_UPI00047AEFC9	D W S Q L W L A Y H K V S D D G G K W	H I S F D G F D E K N R V I N S		
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UniRef90_F3NZD4	D G V V I A A N G G A T T I V L G K D E H E G V L R			
UniRef90_B9TFK8	A Q I L L T A S A T P I E E Y			
UniRef90_Q64Y37	C P I L L V D G N E D K A I L I I			
UniRef90_R6E7X6	S I V I P E N C P S V K Y			
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UniRef90_T1WA07	K Y E K S S S S M I L F E S G S R L K I L T N E T A L P G V K I	I S P Q I K S P I K D T		
UniRef90_UPI0003FF887C	L A S P R Q T A A I L Y D A S D A A V V K R	L I G K D K D E I L N N		
UniRef90_S7VG90	NN F K I Y C D E S D H E G V L M	V K I		
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UniRef90_D0TM63		D E H K G V L I		
UniRef90_R6XQA4	Q P V E G G F A I V E Q N T A A P I L F S S A D Y P G V Q K			
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UniRef90_K9EE18				
UniRef90_K2QKG3	E D G S R L W L R A S R N P S P	C K V A T N D R S A T A R I		
UniRef90_UPI000255AAB7	D D G T L T I A D N E H I A P I V F D K D H S V V G I			
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UniRef90_J1KQE7	D A I L A R E G H T A Y R I I A P A T E G T P L T E H			
UniRef90_V4NYU8	S K L W L N Y K K L D D T R K R I I I S C E H S L K E S A			
UniRef90_R6CDT9	K E H I A N L Y V P N D D P G V R R			
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UniRef90_R5PAM9	P G A L T L A D R G R T A P L V V S T A D H P G V L R	I L S D E Q E A G I R M		
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UniRef90_F2JM83	K N A T L I V A P S P S P M K E T			
UniRef90_S2DD59	S N A S V Y S F K N E S R E L E K			
UniRef90_UPI000380B981	V V D P A D A A V V R H			
UniRef90_S6CQ48				
UniRef90_S2D1S2	S Q K E H S C V Q L			
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UniRef90_D8HTY8	H A V P G A A T L I K A N T P A T I V A D A Q D Y P G V L R	V S S S D Y E G V R R		
UniRef90_C3QEP2	T K I Y V P A K N G E L K S			
UniRef90_UPI00035F84D6	R K P T V I V Y P Q E A S T H E I	G E Q P W W R F		
UniRef90_UPI0003F4F1E6	A A V I V V S Q N D A G V R I			
UniRef90_F8EGY2	R K P T V I V Y P Q E A S T H E I			
UniRef90_UPI00037FEBD5	D W T Q L W L T Y H R V F E G N C T W E	T V L E G F A A S D A V V S N		
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UniRef90_D5EY18				
UniRef90_E4T4Y9				
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UniRef90_F3QS6				
UniRef90_Q5WK0L0				
UniRef90_V4PEH2				
UniRef90_UPI000477FA0F				
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UniRef90_E0RW61				
UniRef90_R5LSD1				
UniRef90_R6RQI7				
UniRef90_F4QUA0				
UniRef90_I4VLM9				
UniRef90_UPI00041A64BB				
UniRef90_A2FYA4				
UniRef90_I2GLX3				
UniRef90_S7V8N3				
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UniRef90_H1YFT2				
UniRef90_UPI0003B32A82				

UniRef90\_R6LBV5 A [V H N] 50 [Q E D F Y K V A D I R P A L V A D A K Q K Q G S I L I | G S F D E S P F I

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UniRef90\_UPI00047A6455 A I C E F K K A I E L L T G E Q V T N Q T E A G K K A L T L K I T

UniRef90\_UPI00047AEFC9 L K N E V S L A L P K L T G A E I T D T G A D T E L K V I

UniRef90\_UPI00040F42A7 UniRef90\_B8LVS8 A K N E L 70 [T E V F S K L F K G G Y T T E I E N A G K S V C I | I F T

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UniRef90\_F3NZD4 A A S D L 50 [Q S D I E R V T G H K P N V L N Q L S K D E V I I I V G T L G K N Q W I

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UniRef90\_R6XQA4 A A E L F 60 [A A D V E A V T V G R R P Q V T S A T G E G P A V I I V G T V G G S A L I

UniRef90\_UPI000468745D A M D N L 70 [R N D I F K V T G N K P D V S G E I D K S V K I I V G S L D K S R L V

UniRef90\_K5CMC6 A I D N L 80 [Q Q D I F N V C G T K P E I L T E G N N N K R C V L I I G T Y Q S P V I

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UniRef90\_UPI00047A106D A F E E I 60 [I K R A A D I W F G K A V K T S E E E S A G I V L F L G Y V E N E G T E

UniRef90\_UPI000368DF1A A F N D L 70 [Q D D I L K V T G V K P V L N T D S A A K N V I I A G T L G Q S K L I

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UniRef90\_R5FNY7 A V Q E L 80 [S A Y W H G A A V R L V R D K S A D S G

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UniRef90\_W4UTG7 A I D N L 60 [Q D I S R V C G T M P A I R T N P D K R R F L L I I G S F S T P L I

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UniRef90\_G5GCU4 A A R E L 50 [Q Q Y I Q E M S G A T L P I S H N T T V G P C V Y V G Y N A K

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UniRef90\_UPI0003F4F1E6 A E L L K E R I I L E K S A I I Q I K I S T V S D G S E S I L L G R P E H H S G I

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UniRef90\_S7V8N3 Y A N V L 70 [H E E L I T K R I D K P F P I Q N S T K K Q P S I L L T Q F G D I P S L

UniRef90\_UPI0003B729C9 A A R E L 80 [R I R Y I Y Q R T G E L E I S P D I P Q K S D L I I V S Q K D R P I V

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UniRef90\_UPI0003B32A82 A L S E F K R G M D S I 60 [G C D S D S M T L K T K S D

UniRef90\_R6LBV5  
 UniRef90\_E5C9A8  
 UniRef90\_UPI00035D17D3  
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90                    100                    110                    120

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

130

140

UniRef90_R6LBV5	I Y G V Y E L S R Q I
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UniRef90_UPI00035D17D3	I F G T G Y L L R Q L T M E R Q S P G H K S S A P Q
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UniRef90_UPI00035C2E70	I Y G V Y E L S R Q I
UniRef90_UPI00047A6455	L Y G V F A I L R L I A C G K R A D E V A E T A S P
UniRef90_UPI00047AEFC9	L Y G M F E L L R L I T L R E V D A D F E L L S E P
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UniRef90_B8LVS8	F
UniRef90_UPI0003F66201	I Y G I Y D L S K Q I
UniRef90_F3NZD4	F Y A V Q T L R Q L V R H G K V A S V T V R D W P
UniRef90_B9TFK8	I Y G I Y S L S E Q I
UniRef90_Q64Y37	L Y G V Y G L L
UniRef90_R6E7X6	V Y G I Y E L S K Q M
UniRef90_UPI00037E4C8D	L Y G V Y G V L
UniRef90_T1WA07	I F G L Y T V S E Q I
UniRef90_UPI0003FF887C	I Y G I Y E L S K Q I
UniRef90_S7VG90	L Y G I G K L L R T A K M N G N I S K I D F S E A P
UniRef90_UPI0003630F6E	L F G V G K L L R I M K Y S K N S L K I N I I E A P
UniRef90_D0TM63	I Y G I Y E L S K Q I
UniRef90_R6XQA4	A Y G L F T L S E L I
UniRef90_UPI000468745D	I Y G I Y E M S R Q I
UniRef90_K5CMC6	I Y G I Y E L S R Q M
UniRef90_UPI00037929F7	L Y G V Y W V L D R V
UniRef90_K9EE18	I Y G I Y E L S K Q M
UniRef90_K2QKG3	L Y G L Y D L S N E I
UniRef90_UPI000255AAB7	I F G L Y D L A T Q I
UniRef90_D7K494	I Y G I Y E L S E Q I
UniRef90_UPI00047A106D	I F G A F R L L E L I R L G K I D E G R R V T E V P
UniRef90_UPI000368DF1A	I Y G I Y D L S E Q M
UniRef90_J1KQE7	I Y G I Y E L S K Q I
UniRef90_V4NYU8	V Y G T V D L S R Q L
UniRef90_R6CDT9	I Y G I Y E L S R Q M
UniRef90_B2VXB2	L Y G A F E Y L S Q L A Q N
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UniRef90_B6W4Q8	A Y G I L E L S R Q M
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UniRef90_A5FD33	I Y G I Y E L S R Q I
UniRef90_R7NVW6	L Y G V Y S L L R M Q A A G Q V T V P L S V T E Q
UniRef90_A4BNF0	L Y G V Y A F L
UniRef90_E9SDL4	L Y G V F E F L K R T A L A G G F I G F N A Q A K P
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UniRef90_R7CYG4	I Y G I Y E L S E Q L
UniRef90_UPI0002EE7C56	I Y G V Y E L S R Q L
UniRef90_X1B3M2	L W A V Y E L V I E R
UniRef90_I9U0V5	L Y G A F H L L R L Q E S G L P I R P S T E N P
UniRef90_I3I9I5	A Y G V Y E L S Q A I
UniRef90_A6KWR8	A Y G V M E L S R L I
UniRef90_UPI0003743BD0	L Y G V Y E A L R T Q Q L S T S S N A G G Y S A P K
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UniRef90_K9DDU2	I F G V Y T L S E Q I
UniRef90_R6E7P6	L Y G V Y E L L R L Q E T G Q L K K L S V
UniRef90_F2JM83	L Y G A F G L L Q V I K R Q P V Q G L K I K E E P
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UniRef90_S6CQ48	L Y G V F A L L R N L Q T
UniRef90_S2D1S2	I F G V Y E L S E Q I
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UniRef90_UPI00037A0BE9	I Y G I Y E L S S Q M
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UniRef90_G5GCU4	M Y G V F A F L E Q Q
UniRef90_D8HTY8	I Y G V Y E V S R R I
UniRef90_C3QEP2	I Y G I Y E L S K Q I
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UniRef90_T1W900	L Y H A A H T L R Q V V R G Q T V P A L S S D Y P
UniRef90_D5EY18	V Y G I Y E L S K Q I
UniRef90_E4T4Y9	I Y G I Y D V S K N I
UniRef90_D5BHG1	I F G I Y E L S K Q I
UniRef90_F3QS6	L Y A A Y D L L R R Q Q A G D L L D G V A V T E R P
UniRef90_Q5WKLO	L Y G F Y E F L K K S Q Q G C P L L T M E A E D Q P
UniRef90_V4PEH2	I Y G I Y E L S E Q L
UniRef90_UPI000477FA0F	L Y A V G E L L R Q I I F K E D S Q G L D R T A P
UniRef90_U5W1S8	I Y G A Y D L S K R L
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UniRef90_R5LSD1	I Y G I Y D I S E K I
UniRef90_R6RQI7	L Y G V F H L A R M L Q C
UniRef90_F4QUA0	V Y G T V D L S R Q L
UniRef90_I4VLM9	I F G I Y E L S R R I
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UniRef90_A2FYA4	I Y G V Y E L L
UniRef90_I2GLX3	I Y G I Y D L S A Q I
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UniRef90_H1YFT2	I F G V Y D L S S Q I
UniRef90_UPI0003B32A82	L Y G V F A I L R Q T A C G K R A A E V N E T A S P

1                    10                    20                    30                    40

UniRef90_M2V7V6	K A W <span style="background-color: yellow;">L</span> N Y Y K S D N <span style="background-color: yellow;">L</span> A M R D	Y F T <span style="background-color: yellow;">V</span> V T Y N K D D S <span style="background-color: yellow;">I</span> V K S
UniRef90_A9KRL9		A S <span style="background-color: blue;">P</span> I V F D G T D E G V L M
UniRef90_U5C3T9	R F A <span style="background-color: yellow;">L</span> A A D G R T A P <span style="background-color: yellow;">L</span> Y A S S A D F A G V L	R
UniRef90_R5JNS5	K C W <span style="background-color: yellow;">L</span> N Y K A I D	S R I <span style="background-color: yellow;">Y</span> S P T D K S <span style="background-color: yellow;">V</span> L L R
UniRef90_W0RMN5	A E K V R E C F A N V I L M S A D R V A I T	<span style="background-color: yellow;">C</span> P I Y V D S S E D K G V M I
UniRef90_UP100047AADB3	<span style="background-color: yellow;">A</span> L G R S V V L V V A P G A D A T V A L	N W S Q M W <span style="background-color: yellow;">L</span> G Y H Q I S K D N K N W K V I C N
UniRef90_UPI000375A391	D F S K E D R V V K S	S Q <span style="background-color: yellow;">I</span> Y S P T G K A T L L R
UniRef90_UP100047BFCB9	D D Y P G V I R	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_D6DOK8	N A I P I I G G G N E D D A V V W	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_Q5H6F1	<span style="background-color: yellow;">C</span> S I V M D A T E D E G I K M	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_UP100047A35E3	S K A R I V N T V A D K K T L R R	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_C6W1V2	K A A T I L V E Q E D Y Q S V V R	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_H1YHR7	N K V V P I Y I D E N T D L I K W	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_W0JT68	A N Q D F <span style="background-color: yellow;">V</span> V N S Q K I L K I S C L E T E A P V V H T	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_F4CFP8	E A T S I L I D S K D D S L I N I	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_K5CBR5	A A D Q K G I N I	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_I2GHT0	V R H	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_F8X1N4	S Q <span style="background-color: yellow;">I</span> W D Y E A K K G A A K A E E D K <span style="background-color: yellow;">L</span> K I D F E G F D P E N R V I K S	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_UP100036BB7BF	A W F D Q P P T G A V A L A R N G Q A R L Y V D P A D H E G V L R	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_UP10002898B58	V S <span style="background-color: yellow;">I</span> G N G E V A	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_UP1000255B2A3	W L A T S A R G N L V L V D K Q Q A L D I V I D S S E L P G V V R	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_R5C9F9	I K N I T I A E K G K D P N Y K I M V P S S T K C W K T	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_UP1000411606A	H L V V S A N E E I V K N	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_K5C8G3	A Q S V T S I Y F D M N D A V V G K	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_X1R247	K A K A V V V Y D T D D Y L V V R K	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_UP1000422A1BB	S V L K I W I A D G E P D F L N L	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_T1W8X1	R P G P G R F P L A A A G K A A P I V V S A A D H A G V I R	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
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UniRef90_G5ILU0	V Q V I S D I N D Y A G V I R	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_I3I5N6	W I D A R P D A A G V N L A G A R V A T A E G D H A V V A I	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_A2E4K6	N G Y N L L P Q Y E K A E N T F T I V E N K K A T D I Y V D P S D W K G V R R	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_UP1000468A092	Q L W L N Y K D A E T K P G T A D I V V E G F D E N A P V V A N T	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_W7YBJ2	Y Q N E V A S I V V D K S D E T V H T	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_Q8A1Z4	R Y E Q T A N S F C L A A E G K A A T L C V S D A D W E G V I R	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_UP10003626265	Q A W L D H T L W R G S N L L Q V R S L G R D P L E Q T	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_T1W8I7	A N G G V R L A D E E H L A S L L V D T N D K G L Q R	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_C6CVT9	D K A F C L Q S G R Q F V I A C D T T V E T K V V S N	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_F5IWT3	R A T T V V V E D G D E P G V R R	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_UP10003B3F3A3	L A S G G Q L A S I Y Y S S N D A A V V G I	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_UP1000404509E	A L T T T Q Q P N F S I L C A D E E H K G V L M	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_I8Y117	I L V D E Q E D A G V M I	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_UP1000463EC3A	C P D A P K V V T H	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_UP1000255B1C0	W I D A R P D A A G V N L A G A R V A T A E G D H A V V A I	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_R6DZP7	Q T H A Q V N A P Q G G E I L N T	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_UP100047910C6	F A K T E N S M V L K E R N S G L M L F S D S D S D K G I L R	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_Q21JW4	D G S Q L W L G K Q Y A N S C Q V I S Q L P D D A T A K I	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_W4UV26	I L V P E L T T F T T F	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_F3WSJ8	Q C W L D Y K E G K E K A A E F E K L F S G V A L P E S S E V T A	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_B9XAK6	I I F D G T D E G I L L	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_R7DS18	V V D D A D H A G V L R	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_R7NZX5	V V D P N D H E V A S V	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_R5UL12	V G K E E K E V V H T	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_D7SFH0	V V L L V V A P G A D P A T V A	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_D7W1K0	S R I I I P E K A T V V E I	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_R6C316	A Q H P N D F V I V S H N Q Q A V I A V D A S D D A L V L K	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_R7G4W8	V V S S Q D F P G V I R	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_UP100041FB20F	A V I Y V D P G E P E L V K T	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_I3Z687	D E A P V V H T	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_S0DDJ6	I I D I V V L L D N Q D A L I Q Q	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_W0JRY6	V V S E S D Y A G V N R	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_G5SUI4	E G V H I	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_UP10003B3FB31	I I F D N G E P K G V I M	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_UP10003625B0F	W V G A A A G Q G S F P L A A D G A A A R I V T D P A D H A V V Q I	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_UP10003B5674E	S R P T I W V D A A D Q K G V L L	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_UP1000404025E	K N T Y I I Y T S L N T S R V V D Y	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_UP100047B06A4	K Q Q A T L F V D N G D F K G V V R	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_UP100035FC550	P V V K K	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_UP1000475963F	F K P S V G A F S L S A D G R V A T C V D T A D Y K G V R L	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_A0A013VK74	L V N S S D Y A G V I R	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_U2JE55	I Y I D E K D A V V G I	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_A9GTA3	I Y V D S N E P E L K T	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_E9DYD0	E S E V V H T	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_K0D360	I S I	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_R5UIR8	C W L A S C A L G A T D F V W K T G S T M N V A C A S G E E P V V Q V	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_T1WAN6	R F E A G R D A V V L A G P G K A A R L L I D P N D Y A G V K R	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_L0DFA2	K T	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_UP100035F911C	F K P S V G A F S L S A D G R V A T C V D T A D Y K G V R L	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_Q1NEH7	L V N S S D Y A G V I R	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_F9D510	I Y I D E K D A V V G I	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_C6I248	I Y V D S N E P E L K T	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_C5BKG1	E S E V V H T	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_I9USB0	I S I	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_R5NV31	I Y V D S N E P E L K T	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_W7Y704	E S E V V H T	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_UP100046AC0D0	I Y V D S N E P E L K T	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_UP10001CC0828	I Y V D S N E P E L K T	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_D3AUT2	I Y V D S N E P E L K T	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_K5CIF5	I Y V D S N E P E L K T	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_I8Y122	I Y V D S N E P E L K T	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_C6X167	I Y V D S N E P E L K T	G A E G W <span style="background-color: yellow;">C</span> Q
UniRef90_UP1000377AC4A	I Y V D S N E P E L K T	K P S P F <span style="background-color: yellow;">V</span> L V G A R Q T A T V V V G S G E P E C V R L
UniRef90_C6D678	I Y V D S N E P E L K T	G A E G W <span style="background-color: yellow;">C</span> Q

50                    60                    70                    80

UniRef90_M2V7V6		K Q L T V S T T A S Q D S A I I V G T T E A Y S	
UniRef90_A9KRL9	A V L E L T T A A K E L F S I D I E S S L C D M K S D V	D K T R K	
UniRef90_U5C3T9	A V K N L Q E D I Q S V S G K M P G L L T K M D G Q N N I V I G Q L G E S E W I		
UniRef90_R5JNS5	A I N D L H K D I E R V T G A K T N V S A D A V S G K Y I I I G T L G K S S K V I		
UniRef90_W0RMN5	A A T D L R A D L Q R V T G A A P V V D S A P N A N R A V I V G T I G H S P L V		
UniRef90_UPI00047AADB3	A N I I L K E E I V K R T G T L E K E S S W E N R T V L A V L S K D S E L F		
UniRef90_UPI000375A391	S I E V L Q N E V G K R T G I S L P I V K K L P K N G Q S I V I T L E S G K L P		
UniRef90_UPI00047BFCB9	A A E E Y C E H M G A M L D A K I E Y S T D I E Y E P A V C L Q V E E D		
UniRef90_D6D0K8	A V G N L Q Q D I L Q V C G T K P E F L T N V S S K H C V I V G T Y S T P F V		
UniRef90_Q5H6F1	V R S I L S S G V T K M A T A T R L P A T L D R P H I V L G T G D A A V V R		
UniRef90_UPI00047A35E3	A I G E F A T G I K G Y F D A D I T E N D G D V	Y V	
UniRef90_C6W1V2	S I E I L Q N E V E K R T G T Q R L S V A K K L P K A G N V I V V A L E S D A T Q		
UniRef90_H1YHR7	A M K D L Q T D I T S V T G N R P Q L I N N E M P E K Q V V L I G T I G K S T L I		
UniRef90_W0JT68	S A R D L A A D V Q R V T G D K P P V S S D D L A G A P A V I V G T L G N S T G V		
UniRef90_F4CFP8	A I D Q L R Q D F E K V G V E P V I P D H V S A G S L L I G T L D R N P L I		
UniRef90_K5CBR5	A I T S L Q H D I R Q V C N N Q P A L L N N I P A K R C V I G S Y H S A K L I		
UniRef90_I2GHT0	A V Q D L I G D V Q K I T D Q Q I R V T A S T P G Q N A V I G T V G R S S V V		
UniRef90_F8X1N4	I V N L S V D I D K V T G V S P K V D K V S A E E T V L L G T I G K S K Y I		
UniRef90_UPI00036BB7BF	T V E I L L Q Q E I I Q K R S G I Q L P V S D P T P A T T Q P L G I A L E N D L T		
UniRef90_UPI0002898B58	A V K D L Q N D I H K V S A L K P K I V H E W I A E E A I I G T I G K S N V I		
UniRef90_UPI000255B2A3	A A E E L A T D L E G L T G T K P E V K A S S N N S S G I Y I G T F K D Q L I		
UniRef90_R5C9F9	A L Q I L T H D W Q D V F G V K P Q M C L F D G D L I V G T W E S S L I		
UniRef90_UPI000411606A	V A N L F I S D V E R V S G K R P K L T T K P D T N N I I I G T V A N S S Y I		
UniRef90_K5C8G3	A V T N L T E D F R R V S G T Q A E V L S T P R T N R F I L V G S L E S K Y I		
UniRef90_X1R247	A A G E L T E F L K Q L T G A E F E L A G P P A G D G P R V L V G P G A A K L A		
UniRef90_UPI000422A1BB	A V K E L N K A F A D T D K K I V I S F V R N		
UniRef90_T1W8X1	A A G D L Q G D I T R V S G V K P L L T G K P A G A D V V I I G T V G K S A L I		
UniRef90_UPI000471A6A9	A A E M L S Q E V A K R T G E K W L V S G S W P A S G D V I V K K S S A K P K		
UniRef90_G5ILU0	A A L E L Q Y Y I G K M S G M A M I P L I T D A E A G N R L L I G G P E H N A Y T		
UniRef90_I3I5N6	A A K N L Q S D I E Q V T G K Q P V L K N T A G Q K Q L V L G T L G S S Q L I		
UniRef90_A2E4K6	A A N E L K S G I Q K I T G V E L P I H S E A L N G N G Y I L I G P T K Y T S E L		
UniRef90_UPI000468A092	I V S I F A D D I E R V T S L R P V I S N S P K G D N V I V I G T L G K N R W I		
UniRef90_W7YBJ2	A A E F L A S D I K A V S G K P V V S K K K I Q Q H V I I G T I G K N S L I		
UniRef90_Q8A1Z4	T A E L F V S D V E S V T G Q Q L R L T D K L K G D K E I I G T V E K N R L I		
UniRef90_UPI0003626265	A V N D L V V D I A K I T G Q K P E I T Q E E C S G N C I S G T V S N A P M R		
UniRef90_T1W8I7	V A D D L G A D I A K I T G I P A V V A H D T I P A G S V I L G T I G K S P L I		
UniRef90_C6CVT9	V V N D L K E D I K R V T N L D A N V S S E S P S G P V V I V G T F A D S A E I		
UniRef90_F5IWT3	A V G D L K D D F R K V S G N L P S V S G K T A I I I G T A G K S A I		
UniRef90_UPI0003B3F3A3	S A A E L Q R C L E A I T G H A V V I E R A A A G V P G I W L G M P D Q I P H A		
UniRef90_UPI00040509E	A A E D L R S D L L E S V T G K S A G G D P I W A G T I G K N P T I		
UniRef90_I8Y117	A V T D L T E D I Q R V S G V S A K P N E T V S G Q S G I I V G T I G K S K I S		
UniRef90_UPI000463EC3A	A I A E F R R A F T G I V I G S L D S P L I		
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UniRef90_Q21JW4	A A A D L Q T D M Q R V T G K L P T L H S K D A G R H A V I I G S V G R S G L I		
UniRef90_W4UV26	A L Q L F V R D C Q A V M S V T P A Y S P R Q G D V W V G T V G T S P L I		
UniRef90_F3WSJ8	A A Q D L V T D L K A V V G G E V V L L A S A P T G G A T V I A G T L G H S Q M I		
UniRef90_B9XAK6	A A S A L R D D L Q R V T G M T P A L S S N A P A A S A V F I G T I G Q S A L I		
UniRef90_R7DS18	A V R N L Q E D F F R V T N T R P Q V D E G A Q K L R I L I G S F D K S P L I		
UniRef90_R7NZX5	A V R N L Q N D F K R V S G R A A G L C Y T P G V K R M I M V G T L K S R Y I		
UniRef90_R5UL12	A A D E L S K Y I T Q V F K V S C V R H S A S L D R P E M I V F T K E K D S		
UniRef90_D7SFH0	A C R E L R N Y W L G Q A I N L Q L V S Q N P G V N R I I I G E A V K S K T I		
UniRef90_D7W1K0	A V A N L Q S D F Q K V T G V Q P H L V S Q N P G V N R I I I G E A V K S K T I		
UniRef90_R6C316	A K Q E L E N N W R G K N		
UniRef90_R7G4W8	A R D E L I R F F Y E A T G V T L A V E T N P V G G K Y I S L G D T E A F		
UniRef90_UPI00041FB20F	A F D E I N K V S R I F W D K D V R K A D E K D A A I V L L I S K D E F A G Y V		
UniRef90_I3Z687	A V E N L Q K D I Q A V S G K S A D L K R G I E A E N T L I I G Q L G E S I L I		
UniRef90_S0DDJ6	A V D D L R E D L R M V T G N L P D S T V G R E A V I V G T A G R S A L V		
UniRef90_W0JRY6	A T S D L A D D V E R V T G R H P D A I S E N V S A R A V I V G T L G R S E G V		
UniRef90_G5SUI4	A L E I L Q K D V K N V F D A R L V P A S P G H D I E V A G T V D N P E M Q		
UniRef90_UPI0003B3FB31	L V R Q L L T D A G V A R I R S V S A L P A A L A Q P Y L V I G T A D T A V V R		
UniRef90_UPI0003625B0F	A A K V L Q D Y I Q R I S G A S I P I E A D N T Q E G E I I G N V N R P E L		
UniRef90_UPI0003B5674E	G G T P K L V T S A P A G D A V Y I G T T D D N P A I		
UniRef90_UPI000404025E	A A A L L Q Q D I E A V T G R K L I V Q N N T G A A P V I I G S L Q H S A L V		
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UniRef90_K0D360	A I E Q L K Q G D I K K V T G N S P S I A E P Q V K Q S A V I I G T L D N S P E L		
UniRef90_R5UIR8	A L D L L K R D L C E A V L V S Q P F S V M E T E G D I Y I G T Q G K S T L L		
UniRef90_U2JE55	A L D L L K R D L C E A V L V S Q P F S V M E T E G D I Y I G T Q G K S T L L		
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UniRef90_E9DYD0	A A K N L S K D F T R V T G Q G G N V T D R V E S K S C V I V G T L S K S A L I		
UniRef90_K0D360	A I E Q L K Q G D I K K V T G N S P S I A E P Q V K Q S A V I I G T L D N S P E L		
UniRef90_R5UIR8	A L D L L K R D L C E A V L V S Q P F S V M E T E G D I Y I G T Q G K S T L L		
UniRef90_T1WAN6	A A A D L Q A D I A R V S G A R P A L L E S R A R P A A V L V G T L G K N A L I		
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UniRef90_UPI00035F911C	V V A D L Q A D I Q R V T Q L D S L M S S E T P S G P V I V G T L G D S N A I		
UniRef90_Q1NEH7	A A T D L Q A D I A R V T G A S P G T A Q V W I G T L G R N A A I		
UniRef90_F9D510	A A R N L A L D F G R V T G H D A T V S V A D R G D G A I V A G T L G H S R V I		
UniRef90_C6I248	A A K E L E D Y L H R T T G A M C V F K N D V C K A N Q L I I F G T K T S A L L P		
UniRef90_C5BKG1	A A G D L Q S D I E R V T G K T P K V V N D A L K G Q A V I I I G T I G K S P V I		
UniRef90_I9USB0	V A E L F V S D I E N V T G Q R L K L A D E W K K G R T V I V G T I E K N Q A I		
UniRef90_R5NV31	A A R N L G T D I G R V T G T A A D V S S L S S E R G A V V V G T I G R N R Q I		
UniRef90_W7Y704	A F K D L Q K D I N R V S G S K P E I N D A A T K N V I I A G T L G K S D L I		
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130                    140

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 P S Q E A L A Q R P V P I A G R A I V V S D T A A P V R L  
 T I I S P S A D S A V K R  
 Y E S S S N N V E I I T R A K K T S V L L S E N D Y P G V I R  
 A T T I V Y E G T N P E M K R  
 E V V K I  
 I F V D D Q D Y T V V S I  
 E T  
 P L P Q Q V K L T A K P S F A T R I A Y S E G S E E M E R  
 K E A V P I W I D A G E E E G V I L  
 Q R A P A S H V R L A Q H G V A R Y V V R A G A D A V T R H  
 S A G V K R  
 V P Q R V V E V V G P G T D P S  
 R Q K V S I I Y D K D G V A L D S I  
 Q Q A A L L V S P G P A P M R E T  
 V V Q T  
 Y S G A T R I V R A A R D A R A L K T  
 K Q A I T Y A V S E S T S P V V G V  
 N A A T K I C V T P G N P A G R K  
 A L G R S V A L I V A P G T E P E T A T  
 V L R R  
 L V D E G D F Q A V K L  
 V I G K G A S E T E R N  
 V A C N V K S P V I S V  
 K R G Q K Y R I R I S  
 D K E S D A V K I I  
 A S I L I D K E D F E G I H I  
 E L V R N G A S D Y C I V I A N D T R P V V S N  
 S R L W L P V F N G N K G E  
 K R G Q K Y R I R I S  
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 K L T L S E T K V T G A V Q L A S T N S P P D I Y I D P D D S V S V V R  
 P G V R R  
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 V R V L V D D G D F P A V H R  
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 A A I L I D A E A D P A V Q R  
 V D A G D D V A V R R  
 Q A E K T I T I A C D P A E E Q V V Q T  
 G D H P G V V R  
 H I V N I A I D K E A R V V Q I  
 V G I  
 A A T L V V A P G T E P T V A A  
 Q A V I L Y D K E G S P L D S I  
 R K G N A Q L Y V D E Q D E V V K K  
 K D V T V V I N D S E E Q V V H T  
 I I V D H E D F E G I R I  
 Q L A S N T T A P A V W V A Q N E P V G V L R  
 T S I V Y P K D N K E M Q Q  
 A P T I I T D A K D A E V V H I  
 P S S K A V V C F D G K D E I V V R  
 Y A Q I N L V E N A K S N Y Q I I V V S K R A T N L E R K  
 E A A T L V V D V S A E K S L L T  
 A N L P G A F P L A D G S K V A P V Y V D E K E E K V V H I  
 I V V D A D D H I V H I  
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 V A C D N T E V V Q T  
 T  
 L P Y P K Q I N S V G L P F E L N P S V T I S L D K N S D Q D K F  
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 A L I Q K G R P A A V Y I D A N A N P A V R H  
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UniRef90_UP100040C171A	S E L I K K G I L R T S D H E N Y V I	T V T R E H H P R L I I A G S D M R G T	
UniRef90_UP10003B48749	A G V P S S V L K S P S G E G Y T L	R V S A D G R R V T I Y A I G R D E R G C	
UniRef90_D9T1B8	N A A A E T A R L G A L G D E G Y L L A R V D G	V T V V L A D A P A G L	
UniRef90_E8RV92	T K L A K A A G V D P L A L K G A W E R Y G R V Q G K T Y V L V	Y G S D R R R G T	
UniRef90_C6Y1M7	L A A A M N A T G T Q A G K E G F S I T Y A K N R N	L V I E G T D P S G A	
UniRef90_Q8A103	K K L G E E G Y A I K I T	D R V A I S A P T P T G L	
UniRef90_G3JB45	A A A A T G A S A Y G L A A D G Y V L A A G Q Y N G Q P T V V L N G V N V R G T		
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UniRef90_B8G600	L R H G S D G D F G V R I A D E H G L T L I G E G P R G L		
UniRef90_T1W906	D R L A R E G R I D T T A L E G Y L I Q T V R N G V A R A L V V A G S D K R G T		
UniRef90_W0RQH3	A L R R L P N D S A V A G D A Y A I R V R R D S I I L A S A T P P R G V		
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UniRef90_UP100047035D6	D K L V A S N K I D K N G W E Q Y I I K V V E K G V D K A L I I A G C D R R G T		
UniRef90_R7DX64	Q L L R D Q G K I D L T Q I E G K W I T T T V E G Y D N A L V I A G S D K R G T		
UniRef90_G0RNU2	L S R N L P T A V P E F K P E G F R V V T E K S G N A T M V W I G A D A R G L		
UniRef90_C6VTG5	R L V L D G K M S G D E G Y T L S C N Q K G V T I K G R T P A G V		
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UniRef90_L0G1P6	R R C G D A A L G S D G F V I C R S G S D V I A G D T V R G T		
UniRef90_A4JQK5	D Q L V A K G K L Q D L Q G D G Y L I K H D A D I G E A W V I V G A N H R G A		
UniRef90_UP1000360B777	L K R L K A G S P D G L P S G G Y V L A S G R S H G R A V L A L S G A D S T G T		
UniRef90_UP1000380C2C2	Q S F S E A T T P K Q E A W E S Y T L K L V K P K S K N A L V I A G A D A R G T		
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UniRef90_UP1000380D52B	A E Q G I C L D R L Q G K H E G F L L K V L G V G N K Y R L V I A G S D K R G T		
UniRef90_UP100040194F4	D I L S L G S T D T G L T E G Y A L S V T D K V V I T A Q D D R R G A		
UniRef90_UP1000371C392	Q R L G P I D S I S A K K D A F F I S V L G R A S K K Q L F I V G S N G R G A		
UniRef90_W4UMR8	I H L G P G T D S L G K E G Y R L T V N N K N I L L R A S E G N G A		
UniRef90_UP100036941E8	A A L A R S N A S A D D Q A E G Y T L A S I G S G A G G L I T L A G H D A D G L		
UniRef90_F3X3G3	R V R E E I R K L P V I N A E G F K L L V I P E T K A V F V V G K D A R G I		
UniRef90_F8EB00	D R I V R D H R I D T G G V E G Y Y L L Q V V D R G I D R A L L V V V G A D R R R G T		
UniRef90_E6WX35	A V L N E E G K I K L T K E G G I W A K T T L Q G E E E V I V I A G S D V Q G F		
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UniRef90_Q2TXR6	K K A G V D L S A E K L K Y D G F V V R L A G D R L V L T G A L E R G P		
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UniRef90_Q0C8L0	D R L L V Q S G T L D V R D I E A F V V Q T V I A N G V A E A L V I V G S D K R G A		
UniRef90_UP1000288F4E3	N Q L V K K G K I D A K Q L Q G K W E K F T T Q G V V K K A L V I V G S D K R G T		
UniRef90_UP100047BA125	D Q L V R D G K I N A S Q L N G K W E K F T T Q G I K K A L V I A G S D K R G T		
UniRef90_UP1000478BD22	D R I V A V A A H G I D T T G V E A Y Y L L Q V V E R G I D R A L L V V V G A D R R R G T		
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UniRef90_A0A059E619	D K L V A S G R L D V S E V A G R W E A S V T Q G V D R A L L V V V G S D R R R G T		
UniRef90_D8I8X2	A D Y G I D T S V L S N K Q K A F L L T V S A E G K L V I A G S D K H G T		
UniRef90_A7LT42	D G L V R S G K L D V T G V V R G R R W L Q T V V D G V E Q A L V I A G S D P R G T		
UniRef90_D6KBG3	D Q F I S N K N L D V S Q V K G K W A N P D N K Q G K I L L A G S D R R R A T		
UniRef90_W7YIK9	D K F I K E G K I D R G K S E K Y I T F V G R Q L V I A G S D R R R G A		
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UniRef90_A0A031HVU3	D K K L I K G N F S N Q W E S Y L Y K T I L N P N K K I F V I A G T N P R G T		
UniRef90_UP10004791111	D K L V A K N K L D A L E N E S F L I E V V R N G V N K A L V V V G S D R R R G T		
UniRef90_F7M3Z1	E E Q F I A I K D I Q E L K E E A F L V S V K D N H L I I L G S D K R G T		
UniRef90_R6V6Y1	D Q L V S D G K L D V S L I E G Y V S R I V E N P F P N V L V V A G S D R R R G T		
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UniRef90_I8U9G5	D Q L V S D G K L D V S L I E G Y V S R I V E N P F P N V L V V A G S D R R R G T		
UniRef90_Q8A8W6	D Q L V K T N K I N S W E R Y G Y F L V A N P H K N D Q A L V V V G S D R R R G T		
UniRef90_UP1000255ABF9	N K L A A R N K I D A G G W W E R Y L I E K V S N G V K N A I V I A G S D R R R G T		
UniRef90_UP100046A867B	E Q F D N D G F L I K T A A A N K I F I Y G Q N E Q A T		
UniRef90_UP100029A6764	E A L E Q S G K L D F S A V R G R R W I Q R P F P G V E E A L V I A G S D P R G T		
UniRef90_L0FZS5	K K I I Q S E N G L R D L T G E T F T I C L V D R G V K K A L V I C G S D K R G L		
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UniRef90_E9F8V3	D W L V E E G K L D Q G G W E R F I V R T I E D G V K R A I V V A G S D R R R G T		
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UniRef90_R7CW76	A K Y T S K T K P D A D D D S F T Y K T E G D N L Y Y G G S Q R G T		
UniRef90_D1PXM7	D S L I A S K K I D V S A T K G K W E S F T S Q G C S S A L L V I A G S D P R G T		
UniRef90_F7W6L5	Q A A D T G A D L T A L D D E R Y L L R S R R D P A R R Y L I A G S D D Q R G A		
UniRef90_W0A1W4	K K L G K E G Y T V K V T D R I L L T A P E S I G V		
UniRef90_Q64YD5	A S D T A G L A E D G F R L R T Q D G V L R I S S G G D K G A		
UniRef90_I3YNN0	S R T G I D V S A L K G K K Q A F L L S V S P E G K V L I V A G S D K H G T		
UniRef90_R6J7K1	A E K D I K I D Y E E L L G E N G V T V N T K G N C V Y V A G A T E N G T		
UniRef90_R7G0A6	L E Q M G I K G P D A L K D E G Y V V L A S S S K G K N Q I V L A G K D T T G T		
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UniRef90_G8NVJ3	D R L I K N A K L L Q G K H E K F I I T L I D G Q L V I A G S D R R R G T		
UniRef90_R6XAJ0			

130                    140

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UniRef90_D9T1B8	L Y G M F H V V R L
UniRef90_E8RV92	I Y G V T D L S R E L
UniRef90_C6Y1M7	L Y G C M E L A D E I K T G K L P E K I A L T D Q P
UniRef90_Q8A103	Y W S T R T L L Q L A E Q N Q S L P Q G T I R D Y P
UniRef90_G3JB45	F Y A A A Q T L R Q L V G D K H G V P G V R V R D W P
UniRef90_UPI0003665581	F H A V Q T L R Q L V R G G E V A G V A V R D W P
UniRef90_G3AVU1	I F G A Y D I S E Q I
UniRef90_B8G600	L Y A V Y H L L E T L G W R
UniRef90_T1W906	I F G L Y T L S E Q I
UniRef90_W0RQH3	L F A A Y D L L E R L G C
UniRef90_K7RFY6	I F G T F E I S E Q M
UniRef90_W4QHC3	I F G I Y D F S E K I
UniRef90_UPI00047035D6	F Y G I Q T L R K S L P V Q T N L P A V D A D A P R
UniRef90_R7DX64	A Y G T F T L S E A M
UniRef90_G0RN02	I F G T Y S L S E Q I
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 V V H D Q D T T L G L  
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 A F V L Q A G R A A G V E L S P S E K P V V H T  
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UniRef90_A6L2B9	A A E E L Q Q A A F E A M S G V R V P I F N E N E K D A V L A D G G P Y P R A V L
UniRef90UPI0002DA1048	L A E E L L A H R I G T A A G K D T K V F A G N F R V R D G I
UniRef90_W0JC08	V A E K I Q K D I E L V T G V A P K I C D A M P E G Y S I I P G T I G K N P V I
UniRef90_F8ENJ2	T A D V L I T E L K E E F G I T A K I A S N P S G N S I I
UniRef90_R1GRG0	I A Q A L Q S D Y Q E M F G K V L T V T S R K P Q P G D I V I G S I K D N
UniRef90_R7CAU0	K S V S L T D D V R R V T G Q D L K A Q A E V S A R Y A I I V G T A G K S A W I
UniRef90UPI000382320A	S A R H L Q Q D I A K V S G K T L A L I Q D A S Q G T A V I M G T I G K S A L I
UniRef90_R6CPB7	A L D M F T G D M K Q V T G V L P Q K T H T G N T A I K I V Q L D K N R S A L K
UniRef90_R6URB2	A A R D L R A E W Q T R L G Q N L P D A A G T G V A V T V G T L A D P A L
UniRef90_B3PDB0	T A D F L A T F I K E M T G T E V R V S D K E K G S N A I I I L A V D T T M T
UniRef90_R7KY04	V A D T L A D D L R A A G H G T V P V V S G G A R A G D I V I
UniRef90_H8GT28	N A E F L A Q Y I R E V T G Q V S T T T S K S K N A
UniRef90_R5RYR6	A L D L F S R D C Y Q A V F S A P L Q R S K K G N I I I G T A G K S S L L
UniRef90UPI000289FB6B	A A R N L S D D I I A K I T N K T P P V C S E H I T S P C I I L G S L R C S R F I
UniRef90_L7F7M8	N A K F L A G Y I L E E Q T G K E L Q V T D K S V D R N A I I L S T G
UniRef90_D1W5A8	I A R M L A D D C N T L F N H T P Q I V E G K G K K G D I I L
UniRef90UPI00037D1659	T A R L F F A E D I R N V T G K R I A L S D K Q K A A A Y V I I G T I G Q N R T I
UniRef90_Q0UC30	A I D M F R E D I Q Q V T G R L P Q S V S I D D A T I R I I Q L D N T D I P I K
UniRef90_R6MN15	A E A L A R C L E G T L L G S V P F A D E A T G N N G I S L N L C D S T V V P
UniRef90_R7NVY3	A A S D F V T D I Q Q V T G A K V T T T T N P G K Q A P I I V G T L G K S S L I
UniRef90_K9DV18	U n i t e d   S t a t e s   o f   A m e r i c a
UniRef90_K9EP31	U n i t e d   S t a t e s   o f   A m e r i c a
UniRef90_W0ERE9	U n i t e d   S t a t e s   o f   A m e r i c a
UniRef90_K9H939	U n i t e d   S t a t e s   o f   A m e r i c a

90                    100                    110                    120

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UniRef90_D6XCB5	D R L A A Q G R L L D V S R V K G R W E A S V T Q G I D R A L V I A G S D R R G T			
UniRef90_R6Z1K8	D S L A A Q G K I D S G K R E C Y R I Q V V E Q P T K R A I V I A G S D K R G T			
UniRef90_E8WA13	R A L R A P E R A D L P S G G Y R L A V G E T G G R P V I A L D G V G E D G L			
UniRef90_V2XWA0	T S L V D A G K L N V S A I E G F T S S V V D G L G S R A L V I V G S D K R G T			
UniRef90_C7PF15	Y T S S L Y P E K L K G E G F L I A T G K Q D I Y K G G T G K G I			
UniRef90_A7LY60	N E T G I D L S A L K N K K Q A F L L T V S Q D G K L V V A G S D S H G T			
UniRef90_V4NVS3	G K I A R D A D L A V L K G E R Y F V R S K R N P Q Q G Y L L I A G S D T R G T			
UniRef90UPI0004723F4D	P S S M Q S D R M A P I G K D G F K L L V Q P D D K T I V I V G R D A R S V			
UniRef90_D2QLM8	S A K G P K L G A E G Y T L T V S P K Q I V I T A E Q P K G F			
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UniRef90UPI0003B64910	D A L A G T T P D T N A E G Y T L T V A P L A N T I T L A G H D A D G L			
UniRef90_B2AD18	R D L S S Q G V I N V S D I R G F K T T T V R L L S G R P A L V I A G S D K R G V			
UniRef90UPI000362AEFF	A A A L Q Q A G P D D L K D E G Y V L A S S D T S G K P K I V I L A G K T T L G T			
UniRef90UPI00047D8B9C	K T D S L A K E G Y T I S S K D K K I S I I G N D A S G A			
UniRef90_R0IPD2	D D L I A S G K L D V S G V E A Y V S A V V Q N A G N E A L V I A G S D R R G A			
UniRef90_R6X2F4	D K L V K Q G K L N A K G W E Q Y L V Q V V K N G I D E A L V I A G S D K R G T			
UniRef90UPI00036DDE61	A V L I G A E G Y T L D V S P K Q I L I T A A Q P Q G F			
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UniRef90_R8BMD7	D N L I S A G K I D V T A T I Q G Q W I V S S P V A G E K A L V I A G N D K R G T			
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UniRef90_Q8A3J6	E Q A G I D I S A L K N K K Q A F M L A V S E D G K L V V A G S D S H G T			
UniRef90_C1F7Z3	E S A N L K F E P A M K A E G Y V L L A T P G R V T V C G S A T A A G V			
UniRef90_B9XH28	D W L E A E R K I I D V S S I R G R W I Q V V P H G V A Q A L V I C G S D K R G T			
UniRef90UPI00046F61E6	N K L V T E K K V N I S T I K G K W E S W T M Q G V K Q A L V I I G S D R R R A T			
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UniRef90_V4PUJ1	D G L V R D G K L A D I S G E G Y V Q Q V V T G G I P M A L V I T G S D P R G A			
UniRef90UPI0004700854	D K L I L K K K L D T L K D E S F H I E V V R N G V K K A L V V V G S D R R G T			
UniRef90_R7NM18	Q L G G S S E N P E G Y Q L K V T D A N V V I S S G P T E A G V			
UniRef90_K9DYW3	A K T G V D I S A L N G Q K Q A F L L T V L P D G K L L I A G S D Q H G T			
UniRef90_C7Z8C0	D K L I E D G R I D V S K I E G K W I E D P M N G T A R A L V V V G S D P R G T			
UniRef90UPI0003B49323	Q A A T A Y H A T P A P G K E G F T I T S A D K N N V L I S G T D N S G V			
UniRef90_N0CM13	R A L R A P D R A D L P T G G Y R I A S G Q V A G R A T V V A L D G L G E D G L			
UniRef90UPI00047DF758	D Q L A K A G K I N A A E L T G K W E K F T T Q N I K R A L V I A G S D K R G T			
UniRef90UPI000288E7D7	D P L L R A W G V S A K A V E G F R I C E A S R N G E R A L F V V G S D P R G T			
UniRef90_T0KVV2	Q R L E K D G K L D R G K W E S F L T A P V T D G C R K A L V I A G S D K R G A			
UniRef90_R5NYR1	E K T G A D D A L E G R K Q A F L L S V L P D G R L L V V A G S D S H G T			
UniRef90_S7ZYS7	D G L I A K G D L D V S K I N G T W E S Y T T T G I H K A L L I I A G S D K R G T			
UniRef90_D3HXB4	K G L N L G D G Y R V Q S I G C T G S Y S A T V S A S T E A G L			
UniRef90_G2X469	Q A L E R A N K V D V E G L R G K W V K D P L P G V Q H A L V I A G S D M R G A			
UniRef90UPI00037CCF30	K A L R A G E M P A E L P A E G Y A V A G R A A P G G G S I V L A G A D S D G T			
UniRef90_A0A024GY98	D A A I R S G K L D A L K D E G F L V S V V D D V L Y L V G T D R R G T			
UniRef90UPI0003A6FB22	R A L R V P E R A D L P R G G Y R I G T G R I A G R D T V V A V D G V G A D G L			
UniRef90_R7FXU7	E K S G I T V D E K A L T E D G A R I V T K G K N I I Y L F G G S E Y G A			
UniRef90_D2QTP8	T I Q F L P I T D A A L G E E G Y R I N I T E K R V T L E A V N P R G F			
UniRef90_A0A016Q258	D S L I D E G L I D V V S K I E G K W E S F V S Q L V K D A L V I A G S D P R G T			
UniRef90UPI0004793F63	E S L S E R G D L D A I K N E V Y L F Q T I D A G V D Q A L V I A G S D K R G T			
UniRef90_R7C512	D M L E S A G K L E L S G R E V Y L F Q V V E E G V K S A L V I A G S D K R G T			
UniRef90_X5DX26	D Q L I R S E K I N V A D I E S E W E R S L T Q G V V K K A L V L A G S D K R G T			
UniRef90_D1PQX4	K K L I R L G E G Y R I I A K R K G T S Y E A A V H A S R P G L			
UniRef90UPI0003603618	E E A G R A D E W E L L P D E G Y V V V S R L M E D G T H W I I T G R E R R G T			
UniRef90_R7DUR8	D E L V K K N K L N E N G W E Q Y V I K V L D K G V D R A L I I A G G C D R R G T			
UniRef90_C9L9I4	E L L F P D S Q K H S D T D D E Y H I E V S K G N G H I Y G S N S R S V			
UniRef90_Q8XM09	M E N T L E D T S S L S K D E G Y V L V T D E N E G N K I V I R G N D E T G T			
UniRef90UPI0002559FDA	H K E K L L D E T K G L E K Q S F L L K S V A K N T D N V L S V V G S D P L G A			
UniRef90UPI00047A6262	D Q L A Q K G K I D K N E L Q G Q K W E K F T T Q G I K K A L V I A G S D K R G T			
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UniRef90_B1ZRX5	D R L A A E K K L D A L V G E S F V I A V V H T G V E R A L V I A G S D R R R G A			
UniRef90UPI000370E66C	A K I I A R G K I D V S S I Q G K W E T T I E Q G V K R A F V I A G S D Q R G T			
UniRef90_U6RER9	D C Y L S D W N I P A G K W E A F K I K V V E R K D V Q Y L L V L G S D A R G T			
UniRef90_K4INT9	N S A V R N D D L T P L E D E G F T L Q V V D G T L Y V V G T D R R G T			
UniRef90_A0A010S571	D S L I K A Q K L N T S E V E G Q W E S F V S Q G C P R A L V I A G S D P R G T			
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UniRef90_W0JC08	L K H G L D A G A D N L P P E G F R I V T R G N H L L I A G R D E R G T			
UniRef90_F8ENJ2	N F V T G K D A K L G E E G Y L L E I T P K R I V I T A E Q P K G F			
UniRef90_R1GR0	K S L V D A G K I D V S A I E G Q W V D S P V E G V A R A L V I A G S D K R G T			
UniRef90_R7CAU0	D E M I A A N G K L N V S Q L D G Y T I C L V D G D K V I A G T E T V A T			
UniRef90UPI000382320A	L T K K G I S R K V G V E G Y H L F V V D H K L L T I K A E S S T G L			
UniRef90_R6CPB7	SL G N E G Y K I S I G R T V N E A P T A Q G V			
UniRef90_R6URB2	D A L T A K K K I D A G G G W E R Y M I E T V D N G I K K A I V V V G S D R R G T			
UniRef90_B3PDB0	D R L I A E G E L D V S D I D A Y H V Q V L K N H I K Q A L V I A G S N K R G T			
UniRef90_R7KY04	E L L K Q D M P V D S L K K D A F F I K V T E S S N N K Q L L V V G S D G R G T			
UniRef90_H8GT28	A A K V K A A G L S A S G P E G Y A L W V E A G G A Y V V V G A D A R G A			
UniRef90_R5RYR6	UniRef90UPI000289FB6B	A R A L R K L H A P A L P A E G Y V L A S G K R T L A L A G V D T T G T		
UniRef90_L7F7M8	D V A P E R T A L G A E G Y E L R A G A R L S V T G A T E R A A			
UniRef90_D1W5A8	I T L S L N K K M K E E E G Y V I T V T N K G I S V A G K T P P N G I			
UniRef90UPI00037D1659	E R Y I D D V A V L V K G K K Q A F L L K V L P D N R L L I V V G S D K H G T			
UniRef90_Q0UC30	Q Q L V S S S G K L H I S E I E E K W I V D A P W D G T R A L V I T G S D K R G T			
UniRef90_R6MN15	L D D K N K E A Y H L K V I G K Q L I R L Q G A S A A G V			
UniRef90_R7NVY3	S L K K D K S L G Q E G Y A I R V T D R I E L T A P K A I G V			
UniRef90_K9DV18	D R F V R E G K L D R N G W E Q Y I I Q T L D N G I Q K A L V I A G C D R R G T			
UniRef90_K9EP31	D L Q K R G V P V D K L K R D A F Y I T V S K R Q L L V I V G G D A R G T			
UniRef90_W0ERE9	E A E G Y R L E I G K K G V T L S A S T E A G L			
UniRef90_K9H939	D A I V N S T G L D V S N I Q G F L S R E V Q N G I S S A Y V I I G A D K R G T			

130                    140

UniRef90_W4LZY4	I Y G V Y A F L K K I G L R
UniRef90_D1W132	F Y G I Q T L R K S L A I H Q D F P A V E D D E P R
UniRef90_D6XCB5	V Y G I Y D T S E R I
UniRef90_R6Z1K8	I Y G I Y H I S E L I
UniRef90_E8WA13	F H G V Q T L R Q L V K D G T V A G A V V R D W P
UniRef90_V2XWA0	I F G T Y T L S E Q L
UniRef90_C7PF15	L Y G V Y T L L
UniRef90_A7LY60	A Y G I L E I S R L L
UniRef90_V4NVS3	V W G V I D L T R E M
UniRef90_UP10004723F4D	L Y G I G R L L R K A Q L R
UniRef90_D2QLM8	F Y G V Q S L M Q L M
UniRef90_UP1000255D9F1	S Y G L M E L S K R I
UniRef90_UP10003B64910	F H A V Q T L R Q L V P H T T L P A L T R D H P
UniRef90_B2ADI8	I F G L H T L A E Q S G Q S P
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UniRef90_UP100047D8B9C	L Y G C M D I S A I K D N K K L P D I N T T E K P
UniRef90_R0IPD2	L Y G I Y D L S E Q I
UniRef90_R6X2F4	A Y G I L N I S E K M
UniRef90_UP100036DDE61	F Y G V Q S L M Q L M
UniRef90_X8J4G1	I Y G L Y E L S E Q I
UniRef90_R8BMD7	I Y G L Y D I S E Q I
UniRef90_G4MX61	I Y G I Y D V S E Q I
UniRef90_UP10003A3C520	F Y G I A T L V Q L L R A Y Q E L P A V L I T D Y P Q
UniRef90_Q8A3J6	A Y G I L E I S R L L
UniRef90_C1F7Z3	F Y G V Q T L K Q M L S T S A Y L A L G T R D W P
UniRef90_B9XH28	I Y G I Y E L S E Q M
UniRef90_UP100046F61E6	A Y G I L E L S R M M
UniRef90_UP1000370A300	V F G S Y E L S E A M
UniRef90_V4PUJ1	V Y G T Y D I S E K M
UniRef90_UP10004700854	A Y G L F S I S E S I
UniRef90_R7NM18	F Y G I Q T L R K S I P M D A L P A V E S D Y P R
UniRef90_K9DYW3	A Y G I M E L S R F L
UniRef90_C7Z8C0	I Y G I Y D I S E Q I
UniRef90_UP10003B49323	L Y G C L E L A E Q V K A Q G K I E K L A V K E Q P
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UniRef90_UP100047DF758	I Y G M Y D L S N Q I
UniRef90_UP1000288E7D7	A Y G V L E L S R L L
UniRef90_T0KVV2	I F G S Y T L S E Q I
UniRef90_R5NYR1	A Y G L M E V S R L L
UniRef90_S7ZYS7	I Y G A Y D L S E Q I
UniRef90_D3HXB4	L Y G A F E L L R L Q N T R
UniRef90_G2X469	M F G V Y T L S E Q
UniRef90_UP100037CCF30	Y Y A A Q T L R Q L A G R Q R I A A V S V V D Y P
UniRef90_A0A024Y98	I Y A I Y D F
UniRef90_UP10003A6FB22	F H G A Q T L R Q L A V N G T V P G V A V R D W P
UniRef90_R7FXU7	L Y A V Y D F L
UniRef90_D2QTP8	F Y A V Q T L Y Q L L P P G A L D I
UniRef90_A0A016Q258	I Y G I Y D V S E Q I
UniRef90_UP10004793F63	I Y G L F H L S E L M
UniRef90_R7C512	I Y G L F Y L S E K L
UniRef90_X5DX26	I Y A M L N L S R E M
UniRef90_D1PXQ4	L Y G A Y D L L R M Q N S G H A N T A V D K V E R P
UniRef90_UP10003603618	L Y G V Y A F L E N L
UniRef90_R7DUR8	A Y G T F A L S E A M
UniRef90_C9L9I4	L L G I Y K Y L T L L G C R
UniRef90_Q8XM09	F Y G V K S L K Q L I K K E D N L D E V V I K D E P
UniRef90_UP10002559FDA	V Y G I Y E I S E R I
UniRef90_UP100047A6262	I Y G I Y D L S S Q I
UniRef90_R7DW89	A Y G I L E L S R L
UniRef90_B1ZRX5	I Y G C Y E V S A A I
UniRef90_UP1000370E66C	I Y G A Y D L S R N I
UniRef90_U6RER9	A Y G V L E L S R I M
UniRef90_K4INT9	I Y G I Y A L S R A I
UniRef90_A0A010S571	I Y G I Y D V S E Q I
UniRef90_10KBJ1	F Y G T Q T L L Q L V P T E Q P V P A V Q I D Y P R
UniRef90_UP10003B32152	I Y G M F R L S E M
UniRef90_Q0V5Z4	I Y G I Y D V S E Q I
UniRef90_UP1000465B36F	F H A V Q T L R Q L L G A D G E L P G V A V R D W P
UniRef90_A6L2B9	A Y G I M E L S R R L I
UniRef90_UP10002DA1048	F H A V Q T L R Q L V G T G R E V P G V V V R D W P
UniRef90_W0JC08	L Y G A L A F L
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UniRef90\_UPI00036BFC8  
UniRef90\_UPI000368061D  
UniRef90\_L8PLM0  
UniRef90\_L7FCP4  
UniRef90\_L1QKG9  
UniRef90\_UPI0003B74623  
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UniRef90\_W3WJG0  
UniRef90\_B1C496  
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UniRef90\_R6YEQ2  
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UniRef90\_C6LL97  
UniRef90\_R6K661  
UniRef90\_UPI00036C1690

90                    100                    110                    120

D K L V   K D R K   L D V S K I   L K G K   W E S F   V S Q G T A E A   L V I   A G S D P R G T	D Q M I   A K K K   L D P L   K D E S Y   L V Q   L V R N G   V D K A   L V I   V G S D R R R G A	K A I R K F A R Q   P N Q K E G Y Y   L S I   N Q K E   I I L   A G N D E R G T	I K F T S K K N S S G   L K G E G Y A   L K S D K N G   V E   T G N S P I G T				
K S L A Q E G K   I D K L   E D E S Y   V I   E V V K D R   I K R A   L V I   Y G S D K R G A	K S L N R N D D   I T A L   K K D G T K   F T   K D K T   V Y   I G G E Q S G V	K S L N R N D D   I T A L   K K D G T K   F T   K D K T   V Y   I G G E Q S G V	K S L N R N D D   I T A L   K K D G T K   F T   K D K T   V Y   I G G E Q S G V				
A L G S E V E   N P E S Y   Q L   K V T D Q G   V T   T A P T E A G V	D R L V A E G R   L D V S S   I R G R R W   Q T V V D G V E R A   L V I   A G S D Q R G T	K A T S A Y Q P   L K K L   P D E G F S I   S S S K Q Q N   I I V I   S G I   D N S G A	D E Y E Y N T E   I S T D K   D E G Y Y   V L N V D E E   K N T I   A   L G N D D A G V				
K K L G D E G Y A   I Q I   K D R V   I L   T A P T T K G L	D Q L I A Q K K   L D V K D   I K G T   W E S F   V T T T   D G N L   V I   A G S D K R G T	D K L V S E G R   L N R G G W E Q Y   A V E   V V E R G   I R K A   L V I   A G S D R R G T	D K L V S E G R   L N R G G W E Q Y   A V E   V V E R G   I R K A   L V I   A G S D R R G T				
R A L G   A A D R A D   L P   S G G Y   R L   A T G R I   A G R A   V V A   L   D G A G G D G L	R A L G   A A D R A D   L P   S G G Y   R L   A T G R I   A G R A   V V A   L   D G A G G D G L	A A G E   L G L   P D P E   L G R A G F   V I Q S   H G E A   L V   A G N N G   L A T	A A G E   L G L   P D P E   L G R A G F   V I Q S   H G E A   L V   A G N N G   L A T				
A A A L A R S G T   L D G H   A E G Y T   I A S   L A   I G R G S   L I   T L   A G H   D T D G L	L R T L G A P A A G D   L P   K G G Y   R L   A S G Q   L D G R P   A V A   L   A G V   D D D G L	L R T L G A P A A G D   L P   K G G Y   R L   A S G Q   L D G R P   A V A   L   A G V   D D D G L	L R T L G A P A A G D   L P   K G G Y   R L   A S G Q   L D G R P   A V A   L   A G V   D D D G L				
R A P V K K E S F T   I N A V K Q   Y I   T   K G G D A S G T	N R L I K G W E A H Q I   Y T N K E R I   I   L   N G A D M R G T	A E L E G A G   L L D N G K R E   V F   M M E T A E Y K G K R   I L   V I   A G S D K R G T	A E L E G A G   L L D N G K R E   V F   M M E T A E Y K G K R   I L   V I   A G S D K R G T				
A K T A K I   D D S Q   L T K K E G F   Q   I R T   Q K N F   I Y   E G T   D A T G A	G K N L   P K P K S P E F Q   P E G F R   I   V W E D N   V L W   I   G A D S R A V	G K N L   P K P K S P E F Q   P E G F R   I   V W E D N   V L W   I   G A D S R A V	G K N L   P K P K S P E F Q   P E G F R   I   V W E D N   V L W   I   G A D S R A V				
A E L E A K G   L V Q H   P H P   Q S Y   T I   A C   L P   Q R N M R I   A   V I   S G A D E S G V	N Y R K R   I P   Q   P K G   I   N P E G Y   Q   D   V   N S R   H   V I   N G N S E A G V	N Y R K R   I P   Q   P K G   I   N P E G Y   Q   D   V   N S R   H   V I   N G N S E A G V	N Y R K R   I P   Q   P K G   I   N P E G Y   Q   D   V   N S R   H   V I   N G N S E A G V				
K K L G A E G Y R   R M S   V S   D R A   V   L   D A P   T P   T G V	D D L V K A Q K   L N V S E   V D G K   W E A   F V   S Q G   C   S R A   L   V V   A G S D P R G T	V L D R T A V V S S P   E G Y R   R L   K V   G K R D   I   T   T G S   S E A G I	V L D R T A V V S S P   E G Y R   R L   K V   G K R D   I   T   T G S   S E A G I				
R S L V Q S G K   I N R G Q   W E S Y   Q I   Q L   V S E   G V   S S A   L   V V   A G A D K R G S	R S L V Q S G K   I N R G Q   W E S Y   Q I   Q L   V S E   G V   S S A   L   V V   A G A D K R G S	G S L V N D G R   I D V S S   I E G Q   W E A   Y S T Q G   I D Q A F   V I   A G S D R R G T	G S L V N D G R   I D V S S   I E G Q   W E A   Y S T Q G   I D Q A F   V I   A G S D R R G T				
P K L   G S E G Y   T   L   Q V   T   P   R   Q   V   V   A A N Q   P   A G L	D R M V K E K K   L D K   I D E S   F   L   E   I   D   S   N   I   N   R   A   L   V   C   G S D   P   R G T	D L L N R S S A F G R   I P   A E G Y   Q   I   T   T   G   S   L   R   G   R   A   G   V   L   L   A G K   D   T   D   G   V	D L L N R S S A F G R   I P   A E G Y   Q   I   T   T   G   S   L   R   G   R   A   G   V   L   L   A G K   D   T   D   G   V				
G K Q A S A G E   D G F   L L   K   T   T   A   N   E   Q   L   Q   I   S   S   G   G   D   K   G   A	R Q V A A D A R   I D   L   A   A   L   D   G   Q   W   E   R   Y   R   V   R   G   R   S   Y   L   L   I   A   G   S   D   P   R   G   A	D G L V V A A G R   L   D   A   S   G   L   E   A   F   R   Q   V   V   V   E   R   N   V   P   R   A   L   V   V   V   G   S   D   R   R   G   A	D G L V V A A G R   L   D   A   S   G   L   E   A   F   R   Q   V   V   V   E   R   N   V   P   R   A   L   V   V   V   G   S   D   R   R   G   A				
L R H G A A G   D G F   V   R   F   A   D   E   H   G   L   V   V   G   E   G   P   T   G   L	L E L E E R Q R   I N R G K   R E   V   F   L   F   Q   V   I   D   E   G   V   E   K   A   L   V   V   A   G   S   D   K   R   G   T	D A L R V P A R   L   D   L   P   R   G   G   Y   R   L   A   T   G   R   L   Q   G   R   D   T   V   V   D   G   V   G   E   D   G   L	D A L R V P A R   L   D   L   P   R   G   G   Y   R   L   A   T   G   R   L   Q   G   R   D   T   V   V   D   G   V   G   E   D   G   L				
Q   V   G   S   V   N   G   E   G   Y   Y   L   L   T   R   Q   D   N   N   L   Q   I   H   V   G   N   S   P   A   G   V	D A L V S K Q K   I   T   V   T   D   V   K   G   Y   K   I   Q   L   I   E   N   A   I   K   K   A   L   V   V   V   G   S   D   R   R   A   T	D G   P   A   G   P   Q   L   A   A   Q   Q   Y   R   L   Q   A   E   G   S   R   D   V   S   R   I   W   V   V   G   G   D   P   L   G   L	R Y   A   V   R   E   D   E   L   A   D   R   P   E   A   F   G   Y   R   F   K   E   E   R   S   R   L   C   H   M   V   G   S   D   D   L   G   I   L	L E L S D D E R   I   P   A   S   E   E   G   Y   Y   V   L   S   V   R   P   A   G   V   T   I   A   A   R   G   E   A   G   L   L	D D L I   A   A   Q   K   L   N   T   S   E   V   E   G   Q   W   E   S   F   V   S   Q   G   C   S   R   A   L   V   V   A   G   S   D   P   R   G   T	N K E G   Y   Q   L   E   V   T   S   E   N   I   H   L   V   Y   G   R   H   G   Q   G   V   V   I   H   V   G   N   S   P   A   G   V	Q   N K E G   Y   Q   L   E   V   T   S   E   N   I   H   L   V   Y   G   R   H   G   Q   G   V   V   I   H   V   G   N   S   P   A   G   V
K Q   G   E   E   G   Y   R   M   K   I   T   D   R   V   T   I   S   A   P   T   A   Q   G   V	R T L E N Q E   V   L   E   E   P   G   K   E   G   F   Y   I   A   T   L   P   G   N   L   I   V   V   S   G   G   N   D   T   G   A	D V D P A R T   A   L   G   A   E   G   Y   E   L   R   S   G   D   T   L   A   V   T   G   A   T   E   T   G   A	D V D P A R T   A   L   G   A   E   G   Y   E   L   R   S   G   D   T   L   A   V   T   G   A   T   E   T   G   A				
Q S K V F K K E   L   S   H   Q   W   E   K   F   S   I   K   K   E   K   D   N   L   L   V   V   V   G   S   D   V   R   G   T	Q S K V F K K E   L   S   H   Q   W   E   K   F   S   I   K   K   E   K   D   N   L   L   V   V   V   G   S   D   V   R   G   T	D R L A R E G K   I   D   A   G   K   V   S   G   F   A   L   Q   T   V   E   N   G   V   D   Q   A   L   V   V   F   G   S   D   K   R   G   T	D R L A R E G K   I   D   A   G   K   V   S   G   F   A   L   Q   T   V   E   N   G   V   D   Q   A   L   V   V   F   G   S   D   K   R   G   T				
D A C A A A G   D   S   A   A   D   Q   R   E   S   Y   R   I   E   T   L   R   D   E   L   D   R   C   V   L   V   T   G   S   D   R   R   G   T	D A C A A A G   D   S   A   A   D   Q   R   E   S   Y   R   I   E   T   L   R   D   E   L   D   R   C   V   L   V   T   G   S   D   R   R   G   T	D   I   K   P   S   D   R   S   L   G   A   E   G   Y   E   L   R   S   G   A   R   L   S   V   T   G   A   T   E   T   G   A	D   I   K   P   S   D   R   S   L   G   A   E   G   Y   E   L   R   S   G   A   R   L   S   V   T   G   A   T   E   T   G   A				
R F E S A K G   D   K   L   G   A   E   G   Y   A   L   R   V   T   P   K   Q   V   I   S   A   E   K   P   Q   G   F	K S V K S Y A K K   I   P   A   H   A   E   G   Y   Y   L   H   V   D   K   G   I   V   V   A   G   Y   D   E   R   G   T	K S V K S Y A K K   I   P   A   H   A   E   G   Y   Y   L   H   V   D   K   G   I   V   V   A   G   Y   D   E   R   G   T	K S V K S Y A K K   I   P   A   H   A   E   G   Y   Y   L   H   V   D   K   G   I   V   V   A   G   Y   D   E   R   G   T				
K S V K S Y A K K   I   P   A   H   A   E   G   Y   Y   L   H   V   D   K   G   I   V   V   A   G   Y   D   E   R   G   T	V V D V D   P   D   E   S   R   Q   L   G   A   E   G   Y   E   L   T   S   G   K   R   I   E   T   G   A   A   E   T   G   A	V A V V N H   T   Q   L   D   V   S   S   V   E   S   F   M   T   K   L   V   K   N   G   V   S   Q   A   Y   V   V   G   A   D   K   R   G   T	V A V V N H   T   Q   L   D   V   S   S   V   E   S   F   M   T   K   L   V   K   N   G   V   S   Q   A   Y   V   V   G   A   D   K   R   G   T				
D T L A A A G   K   L   G   D   L   S   D   E   S   F   L   V   D   S   P   V   A   G   C   K   K   A   L   V   V   A   G   S   D   P   R   G   T	D T L A A A G   K   L   G   D   L   S   D   E   S   F   L   V   D   S   P   V   A   G   C   K   K   A   L   V   V   A   G   S   D   P   R   G   T	L   Q   Q   E   T   D   A   D   C   Y   E   G   F   T   L   A   A   T   R   E   T   I   A   V   Q   A   A   T   A   R   G   L	L   Q   Q   E   T   D   A   D   C   Y   E   G   F   T   L   A   A   T   R   E   T   I   A   V   Q   A   A   T   A   R   G   L				
F S L S K P   D   E   Q   L   G   D   E   G   Y   T   M   S   I   G   N   T   V   S   I   A   A   P   T   A   K   G   V	F S L S K P   D   E   Q   L   G   D   E   G   Y   T   M   S   I   G   N   T   V   S   I   A   A   P   T   A   K   G   V	Q   L   G   P   E   A   Y   T   L   T   R   Q   G   N   Q   L   T   I   T   G   G   D   A   R   G   L	Q   L   G   P   E   A   Y   T   L   T   R   Q   G   N   Q   L   T   I   T   G   G   D   A   R   G   L				
K N Q K N G   E   I   P   G   G   Y   Q   L   E   I   T   P   V   V   G   G   D   E   A   G   V	C D   L   A   V   N   G   H   I   D   I   S   D   I   E   G   K   W   I   K   P   A   P   S   N   G   Q   A   L   V   V   V   G   S   D   K   R   G   T	K N Q K N G   E   I   P   G   G   Y   Q   L   E   I   T   P   V   V   G   G   D   E   A   G   V	K N Q K N G   E   I   P   G   G   Y   Q   L   E   I   T   P   V   V   G   G   D   E   A   G   V				
D T   L   G   R   S   K   A   F   T   S   L   P   P   E   G   Y   Q   V   T   T   G   T   L   D   G   H   T   G   V   L   L   A   G   A   D   G   D   G   V	D T   L   G   R   S   K   A   F   T   S   L   P   P   E   G   Y   Q   V   T   T   G   T   L   D   G   H   T   G   V   L   L   A   G   A   D   G   D   G   V	D T   L   G   R   S   K   A   F   T   S   L   P   P   E   G   Y   Q   V   T   T   G   T   L   D   G   H   T   G   V   L   L   A   G   A   D   G   D   G   V	D T   L   G   R   S   K   A   F   T   S   L   P   P   E   G   Y   Q   V   T   T   G   T   L   D   G   H   T   G   V   L   L   A   G   A   D   G   D   G   V				
I K L   A   L   D   K   K   A   A   Q   A   E   G   Y   T   I   R   V   T   A   K   E   V   E   L   T   R   Q   G   N   Q   L   T   I   T   G   G   D   M   R   G   A	D G L V S A N K   I   D   V   S   A   T   A   G   K   W   E   S   Y   V   S   Q   L   V   K   E   A   L   V   V   A   G   S   D   R   R   G   A	D K M I   N   A   G   R   L   D   V   R   G   I   A   G   R   W   E   T   S   L   E   Q   G   V   R   R   A   F   V   V   A   G   S   D   Q   R   G   T	D G L V S A N K   I   D   V   S   A   T   A   G   K   W   E   S   Y   V   S   Q   L   V   K   E   A   L   V   V   A   G   S   D   R   R   G   A				
D K   L   I   S   S   K   L   L   D   V   S   A   I   R   G   K   W   I   T   S   P   I   P   G   C   P   K   A   L   V   V   A   G   S   D   P   R   G   T	D K   L   I   S   S   K   L   L   D   V   S   A   I   R   G   K   W   I   T   S   P   I   P   G   C   P   K   A   L   V   V   A   G   S   D   P   R   G   T	N Q   L   A   K   D   G   K   I   D   V   S   G   L   E   G   Y   L   V   K   V   V   D   K   G   V   D   K   A   L   V   V   A   G   S   D   K   R   G   T	N Q   L   A   K   D   G   K   I   D   V   S   G   L   E   G   Y   L   V   K   V   V   D   K   G   V   D   K   A   L   V   V   A   G   S   D   K   R   G   T				
E F T T Q G   N   R   W   M   T   D   A   A   H   R   V   F   V   E   P   T   G   N   D   A   Y   L   V   L   V   L   Q   G   S   D   M   R   G   A	E F T T Q G   N   R   W   M   T   D   A   A   H   R   V   F   V   E   P   T   G   N   D   A   Y   L   V   L   V   L   Q   G   S   D   M   R   G   A	A P   T   L   F   V   V   R   K   K   A   Q   S   A   A   E   G   Y   Q   L   R   V   T   P   S   V   I   S   A   A   N   D   A   P   G   F	A P   T   L   F   V   V   R   K   K   A   Q   S   A   A   E   G   Y   Q   L   R   V   T   P   S   V   I   S   A   A   N   D   A   P   G   F				
A A A L   K   T   K   P   P   S   G   L   P   A   G   G   Y   A   L   A   A   G   R   R   A   G   R   A   L   V   V   A   S   G   D   E   A   G   L	A A A L   K   T   K   P   P   S   G   L   P   A   G   G   Y   A   L   A   A   G   R   R   A   G   R   A   L   V   V   A   S   G   D   E   A   G   L	A K   A   L   K   K   A   P   P   T   G   L   P   S   G   G   Y   T   L   A   T   G   K   G   T   I   A   L   S   G   V   D   A   T   G   T	A K   A   L   K   K   A   P   P   T   G   L   P   S   G   G   Y   T   L   A   T   G   K   G   T   I   A   L   S   G   V   D   A   T   G   T				
M   D   T   F   L   T   S   L   G   K   E   G   A   E   G   Y   V   L   A   S   K   Q   D   E   G   K   I   T   I   E   G   T   D   E   V   G   T	M   D   T   F   L   T   S   L   G   K   E   G   A   E   G   Y   V   L   A   S   K   Q   D   E   G   K   I   T   I   E   G   T   D   E   V   G   T	A   V   Q   A   N   P   K   K   T   K   A   K   E   G   Y   E   L   V   A   H   Q   G   N   Y   L   Y   Y   G   G   S   G   K   G   I	A   V   Q   A   N   P   K   K   T   K   A   K   E   G   Y   E   L   V   A   H   Q   G   N   Y   L   Y   Y   G   G   S   G   K   G   I				
Q   A   I   L   A   R   A   S   L   D   D   L   S   G   E   V   Y   R   R   F   V   V   R   D   G   A   A   T   Y   V   V   I   A   G   S   D   L   R   G   A	Q   A   I   L   A   R   A   S   L   D   D   L   S   G   E   V   Y   R   R   F   V   V   R   D   G   A   A   T   Y   V   V   I   A   G   S   D   L   R   G   A	E   S   L   I   K   K   R   K   I   E   V   K   D   L   V   G   K   W   I   Q   V   I   E   K   K   V   E   R   A   L   V   I   V   V   G   S   D   K   R   G   T	E   S   L   I   K   K   R   K   I   E   V   K   D   L   V   G   K   W   I   Q   V   I   E   K   K   V   E   R   A   L   V   I   V   V   G   S   D   K   R   G   T				
D E   L   V   A   S   G   K   I   N   S   V   G   Q   K   W   E   S   Y   V   Q   Q   G   I   K   E   V   E   L   T   R   Q   L   I   E   D   D   G   A   E   K   L   V   I   A   G   T   E   T   I   A   T	D E   L   V   A   S   G   K   I   N   S   V   G   Q   K   W   E   S   Y   V   Q   Q   G   I   K   E   V   E   L   T   R   Q   L   I   E   D   D   G   A   E   K   L   V   I   A   G   T   E   T   I   A   T	T K   W   E   E   K   K   I   E   V   K   D   R   D   L   S   G   E   F   T   C   R   R   E   D   G   R   T   T   V   S   A   A   G   A   A   G   L	T K   W   E   E   K   K   I   E   V   K   D   R   D   L   S   G   E   F   T   C   R   R   E   D   G   R   T   T   V   S   A   A   G   A   A   G   L				
L   S   W   Q   Q   K   R   E   S   R   P   I   G   Q   G   E   Y   S   V   T   S   L   G   R   G   T   H   K   T   I   L   I   S   A   A   S   E   R   G   E	L   S   W   Q   Q   K   R   E   S   R   P   I   G   Q   G   E   Y   S   V   T   S   L   G   R   G   T   H   K   T   I   L   I   S   A   A   S   E   R   G   E	R   V   L   A   P   D   A   R   D   G   R   I   G   D   Q   G   F   R   V   S   V   S   P   D   Q   V   L   I   E   E   G   N   T   R   I   G   V	R   V   L   A   P   D   A   R   D   G   R   I   G   D   Q   G   F   R   V   S   V   S   P   D   Q   V   L   I   E   E   G   N   T   R   I   G   V				
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 UniRef90\_UPI00046234B4  
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 UniRef90\_UPI000470C9B1  
 UniRef90\_R5GFZ1  
 UniRef90\_R6D9M2  
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 UniRef90\_R5U3L1  
 UniRef90\_M7STL9  
 UniRef90\_L1ML10  
 UniRef90\_UPI000479651D  
 UniRef90\_A5FCJ1  
 UniRef90\_UPI000369EA8E  
 UniRef90\_UPI0004640860  
 UniRef90\_H1Y8C7  
 UniRef90\_X5E1S0  
 UniRef90\_UPI000364F3F3  
 UniRef90\_J9CT83  
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 UniRef90\_N4VOA1  
 UniRef90\_M2PLP9  
 UniRef90\_M4FS19  
 UniRef90\_F2KTV6  
 UniRef90\_I0I6T5  
 UniRef90\_R5EQG8  
 UniRef90\_J9DB76  
 UniRef90\_UPI00036ADC2A  
 UniRef90\_UPI000464DEEA  
 UniRef90\_R6S858  
 UniRef90\_A6KY08  
 UniRef90\_UPI000364098C  
 UniRef90\_UPI000365EDFE  
 UniRef90\_R5PP79  
 UniRef90\_W0EYT1  
 UniRef90\_UPI00047C0976  
 UniRef90\_F8QA73  
 UniRef90\_R5UNH2  
 UniRef90\_M1WH04

50            60            70            80

This figure displays a multiple sequence alignment of UniRef90 proteins. The alignment is 100 columns wide and 20 rows high. Columns 50, 60, 70, and 80 are labeled at the top. A color scale from blue (conservation) to red (divergence) is used. Yellow boxes highlight specific residues or motifs.

90 D Q L V A R N K L D K H G W E Q Y V I T I V N N G V E K A L V I A G C D R R G T

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UniRef90\_J9D6M9  
UniRef90\_UPI000361B4A3  
UniRef90\_UPI0003A1948F  
UniRef90\_M5S6S8  
UniRef90\_V4P890  
UniRef90\_C7Q1E2  
UniRef90\_W4PVN1  
UniRef90\_A0A024Q8I7  
UniRef90\_R4LRX9  
UniRef90\_G1VDJ6  
UniRef90\_H1HMK4  
UniRef90\_E8RS99  
UniRef90\_E8RV40  
UniRef90\_A0A010R9N3  
UniRef90\_D6TTH0  
UniRef90\_R5CB31  
UniRef90\_N2B967  
UniRef90\_T1W6J3  
UniRef90\_W4BMU5  
UniRef90\_UPI00037D7D4B  
UniRef90\_M7SGC4  
UniRef90\_K0J4X5  
UniRef90\_10BL3  
UniRef90\_R5K4E9  
UniRef90\_UPI0003645F13  
UniRef90\_UPI000427F43F  
UniRef90\_J9G2I2  
UniRef90\_R6Z390  
UniRef90\_I3WJE2  
UniRef90\_A0A031IY6  
UniRef90\_D9RWZ2  
UniRef90\_UPI000371DE30  
UniRef90\_F9Z4T8  
UniRef90\_B8MLN7  
UniRef90\_C6XZW3  
UniRef90\_R6ZZF8  
UniRef90\_UPI00034A988C  
UniRef90\_C6XSX0  
UniRef90\_D6D774  
UniRef90\_UPI00046ACFFC  
UniRef90\_G7W2H7  
UniRef90\_R6VZH9  
UniRef90\_J9FRU7  
UniRef90\_B5HDK1  
UniRef90\_Q0CPM9  
UniRef90\_J9GP57  
UniRef90\_U1PVJ7  
UniRef90\_E6MP6L  
UniRef90\_UPI00047AE674  
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UniRef90\_R5GZF1  
UniRef90\_R6D9M2  
UniRef90\_W0RSF1  
UniRef90\_D2Q4H7  
UniRef90\_H1V430  
UniRef90\_C6VTM3  
UniRef90\_R5U3L1  
UniRef90\_M7STL9  
UniRef90\_L1ML10  
UniRef90\_UPI000479651D  
UniRef90\_A5FCJ1  
UniRef90\_UPI000369EA8E  
UniRef90\_UPI0004640860  
UniRef90\_H1Y8C7  
UniRef90\_X5E1S0  
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UniRef90\_N4VOA1  
UniRef90\_M2PLP9  
UniRef90\_M4FS19  
UniRef90\_F2KTV6  
UniRef90\_I0I6T5  
UniRef90\_R5EQG8  
UniRef90\_J9DB76  
UniRef90\_UPI00036ADC2A  
UniRef90\_UPI000464DEA  
UniRef90\_R6S858  
UniRef90\_A6KY08  
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UniRef90\_R5PP79  
UniRef90\_W0EYT1  
UniRef90\_UPI00047C0976  
UniRef90\_F8QA73  
UniRef90\_R5UNH2  
UniRef90\_M1WH04

100 N P E A Y E L K V A G E G V T V K G A T E E A G V

L R A L G A A P T G D L P S G G Y R L A V G R T G G R D V V A L D G A G E D G

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

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

A Q L G I D S A A I A G K W E A Y S Q T V V R K A G G Q L L V I A G A D P R G T

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

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

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

G S Y G D E G Y R L A L A G T A T T I S G S T T A G V

E N E E G Y V I T I K A N T I T I E G K T P R G V

T L K L N A K V E Q E E G Y V I T V K A K G T I T E G K T P R G V

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

D A L I K A G K L D R I K D E C S L T A V V P K G V E R A L I I V G S D R R R G A

Q R L E Q D E K L S R G K W E S F V I D Q P L P G V Q K A L V I A G S D K R G A

I Q L V L D P Q Q E G H E Q G Y Q L Q V T S K A I T L T A R T P V G L

K A V R K Y A R L I P S K A E G Y Y L K V G K N E I V I A G A D A R G A

H L S V D K S I S N P E G Y R L T V T P E G I E I A G A S E A G V

A L G K E G Y Q L S V T P K L V T K A N T G A G L

G R L I A E R R L D V V A A I E G Y R L Q I I E Q G V E R A L V V A G S D K R G T

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

D D L V N A G K L D I S A I D G K W E S F T T Q G S S K A V V I A G S D A R G T

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

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

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

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

R T L R T P E R G D L P V G G Y R I I A A G Q V A G R D T V A V D G L G E D G L

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

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

D R L A A A G T I D V A D V E A F A V Q T V A H G V A E A L V I V G S D K R G A

N E E G Y V I T V K G K N I I V I E G K T P R G V

P P A R D G K K F P E N Q P E G F R I I G A D S R A V

R L S L D K S L K K L S E E A Y R L E V T G Q G V R Q G A S E K G I

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

V D S L G D E G Y T L I A N A K G V T S G K K A H G V

T L G K P D E T L G D E G Y R M D I R N E V T I E A P T S K G V

A S L D L P F D L V N N Q T D G L M L T T V R S G Q V P L L V I S G N G S A G V

F R E G G I T N F E A H L L T T A E H A G H K A V V L Q G A D T R G T

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

S L G L E S E N P E A Y Y Q L K V E G N G T G P T E A G V

D S L I A E D R L D V S G R E T T Y M I R V L E R E L D K A V V I A G S D K R G T

A E T D D A R I S A L G N E G Y I D V N E T A N F A F T S K G L

V R P E S Y Q L N V S K N G T G P T E A G V

R A L R A P E R D D L P S G G Y R L A V G R V G D R D T V A L D G V G D D G L

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

K A L G K E G Y E R I D E R I E L T A P T T T G V

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

K I A G K E A Y R T V T Q K Q V T I A G S T A A G V

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

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

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

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

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

D A L V A A G K L D V R G V E F V V T I V A D G V P R A V V V A G S D R R G T

L E V A S P S G L P T E G Y Y V L A A G T S G R R H H V V L A G V D T D G T

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

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

K S V R K Y N K L I P N H E E G Y Y L L A V N D K E I I L A G N D E R G T

K R L V Y E S K I D V S E I E G E W V K S P L P G I D S A L V I A G S D R R G T

K G F S P E G Y R L R I D S A T V S A A S T K A G A

E Q H A L T G A V A E L P D E G Y I L R V D S D T V V V A G K D Q R G A

K N A K S A D D S K L T K K E G F Q I R T Q N N I I Y I E G T D A S G A

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

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

Q K E G Y Y H L A I L G N K G I Q L T G N N E A G V

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

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

H P E A Y R I R S N S E I I W L D G A S P A G L

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

D T I V N R T K L D V S S I I D G F M A R E V K N G V S S A Y V I I G A D K R G T

R Q I T S S G A L S L T D I E G R W F K T S V V Q N D N A L V I A G S D K R G T

I T L K L N A K I E N E E G Y V I T V K A K G I T V E G K T P R G V

G A V L A V T P S A T T H P Q G Y Q L A I T K E A L H I A S T T P A G L

A D L T F D I K P D T I G L E G Y R L V S N D Y G T K I T A S D T K G L

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

G K V V E P I L K E D L P P E G Y A L S A S P E G I W L A A D A D G A

D R I V R E K H I D T G G V E A Y Y L Q V V D N G I E R A L L V A G A D R R G T

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

G N P R L E A A R S S I R H D G F F I S T Q E G I L R L G K E G N G T

I E L L F I D P D S S A A E G Y T L E I I G D R A I I I G A D E A G L

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

I R L V L D K K V S G E E A Y T I M V D K K G V T I A G N T P K G V

Q Q L A T D K K I D Y S P L A G K W V A S P I A G Y D N G L V I V G S D K R G A

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

A Q V I N Q T N L D V S S I I D G F M T K V V S N G V D S A Y V I I G A D R R G T

130                    140

UniRef90_I9FIC2	S Y G   L F S I   S E T I
UniRef90_J9D6M9	F Y G I   Q T L R K S L   P □ N □ S □   P A V D □   K D A P R
UniRef90_UPI000361B4A3	□ F H A A Q T L R Q L   A T G R S L   R G V V V R D W P
UniRef90_UPI0003A1948F	F Y G I   Q T L R K S I   A T G A D I   P A G E   K D E P R
UniRef90_M5S6S8	□ F G V Y A F L
UniRef90_V4P890	I Y G T Y D I S A R M
UniRef90_C7Q1E2	F H G V   Q T V R Q L L V G A K   L Q D G T   I T D H P R
UniRef90_W4PVN1	F Y G I Q S   L R K A M N A E   □ S □   P A V E I   I N D Y P R
UniRef90_A0A024Q8I7	Y Y A T Q T F E Q L I   Q E G R N V   P S V A I   I D W P
UniRef90_R4LRX9	F Y G T Q S   L L Q M L   K Q D R S L   P R G T A T D A P
UniRef90_G1VDJ6	F Y G V Q T L R K S L   P L E K A F P A A R   I V D Y P R
UniRef90_H1HMK4	F Y G V Q T L R K S L   P L E Q A F P A A R I   V D Y P R
UniRef90_E8RS99	Y Y A A Q S   L R Q I   V A Q G R F P A L T   S D Y P
UniRef90_E8RV40	A F G V Y D   S R T L
UniRef90_A0A010R9N3	□ F G A Y T L   S E Q I
UniRef90_D6TTH0	F Y A V   C T L   I Q L L   Q R G R A L   P C L A   I L D W P
UniRef90_R5CB31	Y Y G V Q T L   A Q L L   T L P K   L P L V E   V T D Y P
UniRef90_N2B967	F Y G V Q T L R K S I   P M N □ E L   P A V T I   I N D Y P R
UniRef90_T1W6J3	F Y G V Q S F   L Q L I   A S K E L   I E G V E   I T D Y P K
UniRef90_W4BMU5	I Y G M Y A   I S E L
UniRef90_UPI00037D7D4B	F Y G V Q S L   L Q L
UniRef90_M7SGC4	I F G V Y D I   S E Q I
UniRef90_K0J4X5	I Y G G L   F H L   S E K L
UniRef90_10BL3	L Y G C   E L   A R R I   A A G R □ P D D □   A Y G D A P Q
UniRef90_R5K4E9	I Y A I   Y T F S
UniRef90_UPI0003645F13	F Y G T Q S   L L A   L L   P L E
UniRef90_UPI000427F43F	F H A V   Q T L   R Q L   I R G G S   V A G A T   V R D W P
UniRef90_J9G2I2	F Y G V Q T F L   Q L   A S Q P E   V M Q V E   V K D Y P
UniRef90_R6Z390	F Y G I   Q T L   R K I   G T T P S L   P A V E I   I S D Y P R
UniRef90_I3WJE2	F Y G T R S   V S Q M L   R Q G Q T   L P A G T   V A T K P K
UniRef90_A0A031I2Y6	□ Y G A Y D L   S R I I
UniRef90_D9RWZ2	F Y G V Q T L   R K S L   P L E K A F P A A R   I V D Y P R
UniRef90_UPI000371DE30	□ F G I G E L   L R H M K S G K F   L E N L D I   I S T S P Q
UniRef90_F9Z4T8	F Y G I   Q T L   L Q L L   P V E □ T   V P G V Q   I E D Y P R
UniRef90_B8MLN7	□ Y G I   Y S L   S E H I
UniRef90_C6XZW3	F Y G A Q T L   Y Q L L   V K G K N   P A V K   □ A D K P R
UniRef90_R6ZZF8	F W G T R T L   L Q M I
UniRef90_UPI00034A988C	L N G   V R T L   I R E I G T   G Q A L L   A T T   □ A D L P
UniRef90_C6XSX0	I Y A I   Y T F S
UniRef90_D6D774	V Y G V   V T L   L E Q
UniRef90_UPI00046ACFFC	F Y G I   Q S L   R K S L   P I D   V L P   A V D   □ K D Y P R
UniRef90_G7W2H7	□ Y G L   Y H I   S E L I
UniRef90_R6VZH9	□ Y G I   I T I   L Q
UniRef90_J9FRU7	F Y G I   Q T L   R K S I   P V E Q G L A   A A V D   □ K D A P R
UniRef90_B5HDK1	F H G V   Q T L   R Q L   V K E G T   V A S V V V   R D W P
UniRef90_Q0CPM9	□ Y G L   Y D I   S E Q I
UniRef90_J9GP57	Y W G T R T L   L Q M A E   Q Q K A   H P A
UniRef90_U1PVJ7	Y Y G V   Q T L   R Q L   V K D G K L   Y H A T   V R D W P
UniRef90_E6MPL6	F Y G I   Q T L   R K A L   P V A T S L   P A V Q   A D A P
UniRef90_UPI00047AE674	□ F G G L   G E L   L R T   F A K G Q F   L D Q L   D F A S S P K
UniRef90_R6B5K0	F Y G C   Q T L   R K S I   A Q G A D I   P A G S   □ K D E P R
UniRef90_UPI00046234B4	□ F A M Y D   H S E Q
UniRef90_E6MSG8	Y W A T R T L   L Q L L   E Q H H A   L P R G E   I R D T P
UniRef90_UPI000420FDC3	□ Y G V   A T F R Q L   I A □ G G A I   P A C E   I S D K P
UniRef90_UPI000470C9B1	I Y G I   Y S   I S E R I
UniRef90_R5GZF1	F Y G M A R L   L R K
UniRef90_R6D9M2	Y W S T R T L   L Q I Q T T   D H Q L   P K G T   □ R D Y P
UniRef90_W0RSF1	A F G V   L E   L S R Q I
UniRef90_D2Q4H7	Y Y A A Q T F   A Q L   V R G E R   L P G V E   □ R D W P
UniRef90_H1V430	M F G V   Y T   L A E   Q S G Q S   P
UniRef90_C6VTM3	Y Y G V   Q T F   L Q L V   K A G P   Q L   P E G E   I T D W P
UniRef90_R5U3L1	Y Y A I   Q T F   A Q L   L K E G K   L P E V E   I K D Y P
UniRef90_M7STL9	□ Y G L   Y D   I S E Q I
UniRef90_L1ML10	F Y G I   Q T   L R M T   K T G K A   □ P G V D   □ N D A P R
UniRef90_UPI000479651D	F Y G L   Q S   L R C L   L S E E D   F K G A V I   I R D W P
UniRef90_A5FCJ1	□ Y G A L E   E L   T D K I   A S G K   □ P S E I   N I   I D D S P P
UniRef90_UPI000369EA8E	F Y G V   Q T   L R Q L   Q A E Y A   L P   L V A   I T D A P
UniRef90_UPI0004640860	A Y G V   Y E L   S R R I
UniRef90_H1Y8C7	F Y G L   Q T L   Q L M Q K R   □ N I   P G G N   I T D Y P R
UniRef90_X5E1S0	F Y G M Q S   I W Q L L   T A G T T   L P   C M D   I T D Y P R
UniRef90_UPI000364F3F3	T W G   V   D   L T R E L
UniRef90_J9CT83	F Y A V   Q T F   R K A L   P   G   T   I   P S V E   I K D Y P R
UniRef90_UPI00047C8566	F Y G V   Q T L   L Q L L   Y Q H K Q L   P S C K   I D Y P R
UniRef90_N4VOA1	□ F G A Y T L   S E Q I
UniRef90_M2PLP9	I Y A I   Y D   H S E Q
UniRef90_M4FS19	I F G V   Y T   L S E   Q C   G Q S   P
UniRef90_F2KTV6	F Y G I   Q T L   R K S L   P L E   Q D F   P A V R   I A D Y P R
UniRef90_I0I6T5	F Y G V   Q T L   R Q L   Q C G R Q I   P A L R   C H   D W P
UniRef90_R5EQG8	F Y G L   Q T F   R Q L   I T S Q N N   I P F V E   I A D S P K
UniRef90_J9DB76	L I A V   Y R F   L
UniRef90_UPI00036ADC2A	F W A V   Q T L   K Q L   I R   L T   D D   V P E   I Y   □ R D Y P
UniRef90_UPI000464EDEA	A F G L   Y E L   S R R I
UniRef90_R6S858	F Y G I   Q T L   R K V A   Q G A N   I P A V E   □ N D E P R
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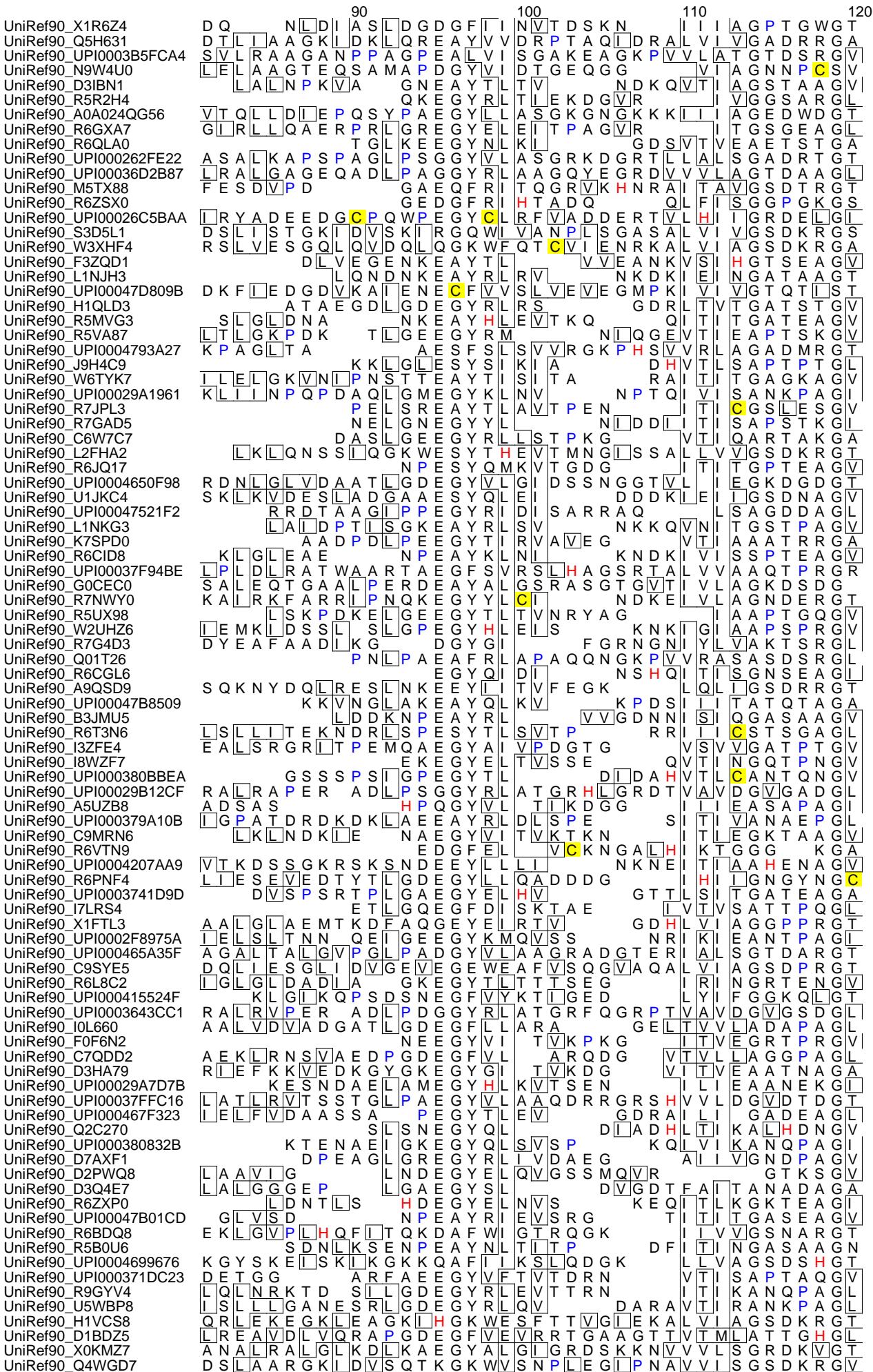
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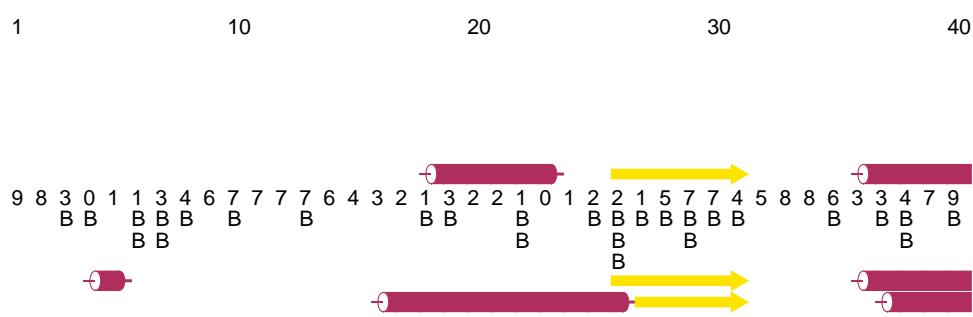
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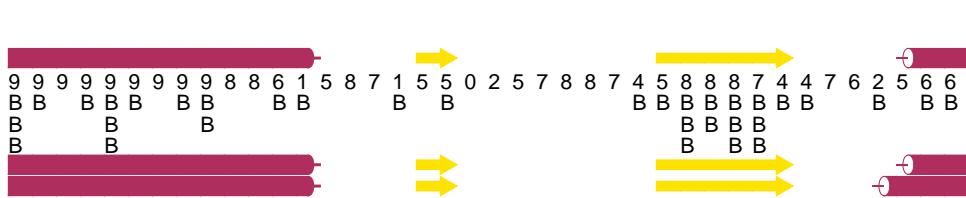
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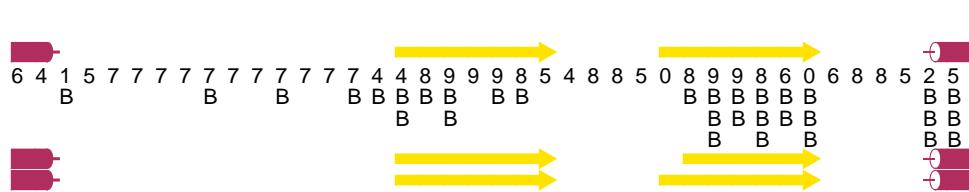
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