

**S2 File. The gene model for *RcPIP2;5*.** **A**, The coding region of the longest transcript is marked with uppercase letters, under which is its deduced amino acids. The transcribed untranslated regions, including 5' UTR, intron and 3' UTR sequences, are marked with lowercase letters. The start and stop codons are blacked. **B**, Diagrammatic presentation of four putatively alternative splicing transcripts.

**(A)**

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1  tgatcacgcctccgccatggttacgccatTTTTacagTTtaagaagTtaaactctcaga
61  cttcatttctcttaaaaaatttcaacaaaaacaagaaaaagTtaaacagttatctct
121 atggttgTgacaatccgtgagcatgcagctgtagtatccttctTTTTgtcatctacaata
181 gagagaaataacaaagaaacaattaaaagaataaggtaatTaaATGGCTGGTGATCAAG
1  M A G D Q D
241 ATAGACAGGTAGAAGAAGAAGAGGAGGAAAGTGACGGAAAGGACTACGTGGAGCCACCAC
7  R Q V E E E E E S D G K D Y V E P P P
301 CAgttcattgTtgcacttggcagagctgaaggaatgggctTTTTacagAGCTTTAATTGC
27  S F N C
361 GGAATTACTGCAACGCTTCTCTTTCTTTATGTGTCAGTAGCTACTGTTATCGGCCACAAG
31  G I T A T L L F L Y V S V A T V I G H K
421 GCTCAAATCTCTCCATGTGATGGTGTGGCATTCTTGGCATTGCTGGGCTTTTGGTGCC
51  A Q I S P C D G V G I L G I A W A F G A
481 ATGATTTTCGTTCTGTCTATTGCACTGCTGGGATTTCTGgttggtacttcacatgatca
71  M I F V L V Y C T A G I S G
541 cccatcaagatecataacctTTTTgttcttcttcttaataccatagacgtaggatttggcttt
601 ctgttttctataaaaacttggaaatgcaataacagattcatttttgtctggtttattatt
661 tatttctacaaaactttagttactatttcttctctgagtttaatacaaaaagggttaatt
721 gtctatatggccttgaaaaccgcttgcagGAGGGCACATCAACCCAGCAGTGACATTCGGG
85  G H I N P A V T F G
781 CTGCTGGTGGCGAGGAAGGTGTCACTGGATCGTGCAGTTTCTTACATGATATCGCAGTGC
95  L L V A R K V S L D R A V S Y M I S Q C
841 CTTGGAGCAATATGTGGCGTAGGGTTAGTGAAGGCATTCATGGAGCATGACTATATTAAT
115 L G A I C G V G L V K A F M E H D Y I N
901 ATTACACTTGGTGGTGGCGAAACTCTGTGCAACTGGTTACTCAAAAGGTGCTGCTTTG
135 I T L G G G A N S V A T G Y S K G A A L
961 GGTGCTGAGATTGTGGGTACTTTCGTTCTGTGTACACAGTCTTTCCGCCACTGATCCT
155 G A E I V G T F V L V Y T V F S A T D P
1021 AAGCGAAAAGCCCGGACTCCCATGTTCCCTgtaagtataactagtagtaaaacaaataa
175 K R K A R D S H V P
1081 ctaaaactgaattttttattaatctctctctccttggcaatccgggttaaatacttghta
1141 gaaagcacatcaggaatgtaatgctcaggctgatgcaggagagggttaacttaccattgc
1201 caacaaggagacacccttgactgttaatgaaagaaaataataataattataataataata
1261 ataagagatgcataaaatggacttctctatTTTggagattctgatggggtgaggataaat
1321 gatttcagATACTGGCTCCTTTGCCAATTGGATTTGCTGTTTTCGCTGTGCATTTGCCA

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185 I L A P L P I G F A V F A V H L A T  
 1381 CAATCCTATTACTGGTACTGGCATAAATCCTGCCAGGAGCCTTGCTGCTGCTATTATTT  
 203 I P I T G T G I N P A R S L A A A I I Y  
 1441 ACAACACTCGGAAAGTTTGGGAAGAACATgtatgtccattttcctctttcatctattata  
 223 N T R K V W E E H  
 1501 caaacatatgccaaagacaaagaacaataaacgaattatgctgtaaatcatgtattcaat  
 1561 tatcagtatctcacatgaaataaacaatcaattcataattctacgaagggtagaaattt  
 1621 aaaaatataacttgctaaataagtgattttttatttttattttaaaaaataacttatat  
 1681 atagatattaatatttttttttacacgctaaatcgatatataagttttatataatttatta  
 1741 atattaaataatataatagTGGATTTTCTGGGTGGGGCCATTAGTTGGAGCACTACTAGCA  
 232 W I F W V G P L V G A L L A  
 1801 GCAGTGTACTACCAGTACGTGATCAAAGGAGGAGCCATTAATCTTTGGGATCATTCCGC  
 246 A V Y Y Q Y V I K G G A I K S L G S F R  
 1861 AGCAGCAACCTTATGTGAaggagacaccaattatctataataacttttagtcattcgtctg  
 266 S S N L M \*  
 1921 ttaatttaggaacttccttcaatcttattgctgtactgctttgagtttagacattttggt  
 1981 tctaatttttaagatcactctgctactttcatcatctttgtagtataggaataatgcta  
 2041 caagtggtctgtaaattttatatttagtttcattttgattatgtaactttttttttttg  
 2101 ttcaattagtcaatctctaattatattttatttaatcatatttgcaaatgaaaaaataa  
 2161 taaataaaaaagagaatatataa  
 1981 t

**(B)**

