

Table S1. Species names and NCBI accession numbers (or references) corresponding to multiple sequence alignment abbreviations.

| Abbreviations | Species | NCBI accession numbers/ References |
|---------------|----------------------------------|------------------------------------|
| Mro | <i>Macrobrachium rosenbergii</i> | SRP049917 |
| Cqa | <i>Cherax quadricarinatus</i> | AWK57536.1 |
| Pva | <i>Penaeus vannamei</i> | Torfs et al., 2001 |
| Ham | <i>Homarus americanus</i> | PRJNA300643 |
| Spa | <i>Scylla paramamosain</i> | ALQ28575.1 |
| Csa | <i>Callinectes sapidus</i> | Hui et al., 2012 |
| Cbo | <i>Cancer borealis</i> | Saideman et al., 2007 |
| Nvi | <i>Nezara viridula</i> | Predel et al., 2008 |
| Aga | <i>Austrophasma gansbaaiense</i> | B3A0D7.1 |
| Lma | <i>Leucophaea maderae</i> | P13049.3 |
| Lmi | <i>Locusta migratoria</i> | P85867.1 |
| Dme | <i>Drosophila melanogaster</i> | AAF62876.1 |

Table S2. List of amino acid sequences corresponding to multiple sequence alignment abbreviations.

>*Leucophaea maderae* PK1

QTSFTPRLG

>*Drosophila melanogaster* PK1

SVPFKPRLG

>*Locusta migratoria* PK1

QDSGDGWPQQPFVPRLG

>*Locusta migratoria* PK2

QSVPTFTPRLG

>*Nezara viridula* PK1

FYAPFSPRLG

>*Nezara viridula* PK2

QLVSFRPRLG

>*Nezara viridula* PK3

SPPFAPRLG

>*Austrophasma gansbaaiense* PK1

SPPFAPRLG

>*Austrophasma gansbaaiense* PK2

DPPFSPRLG

>*Austrophasma gansbaaiense* PK3

SSGGGEGSGMWFGRG

>*Macrobrachium rosenbergii* PK1

DFAFSPRLG

>*Macrobrachium rosenbergii* PK2

SPFSPRLG

>*Macrobrachium rosenbergii* PK3

VTTAFIPRLG

>*Scylla paramamosain* PK1

DSAFSPRLG

>*Scylla paramamosain* PK2

LYFAPRLG

>*Scylla paramamosain* PK3

TSFAFSPRLG

>*Cherax quadricarinatus* PK1

ADFAFSPRLG

>*Cherax quadricarinatus* PK2

ADFAFNPRLG

>*Cherax quadricarinatus* PK3

ADFAFRPRLG

>*Penaeus vannamei* PK1

DFAFSPRLG

>*Penaeus vannamei* PK2

ADFAFNPRLG

>*Callinectes sapidus* PK1

TNFAFSPRLG

>*Homarus americanus* PK1

GDGFAFSPRLG

>*Homarus americanus* PK2

GADFAFSPRLG

>*Homarus americanus* PK3

SDFAFSPRLG

>*Homarus americanus* PK4

AYFSPRLG

>*Homarus americanus* PK5

SLFSPRLG

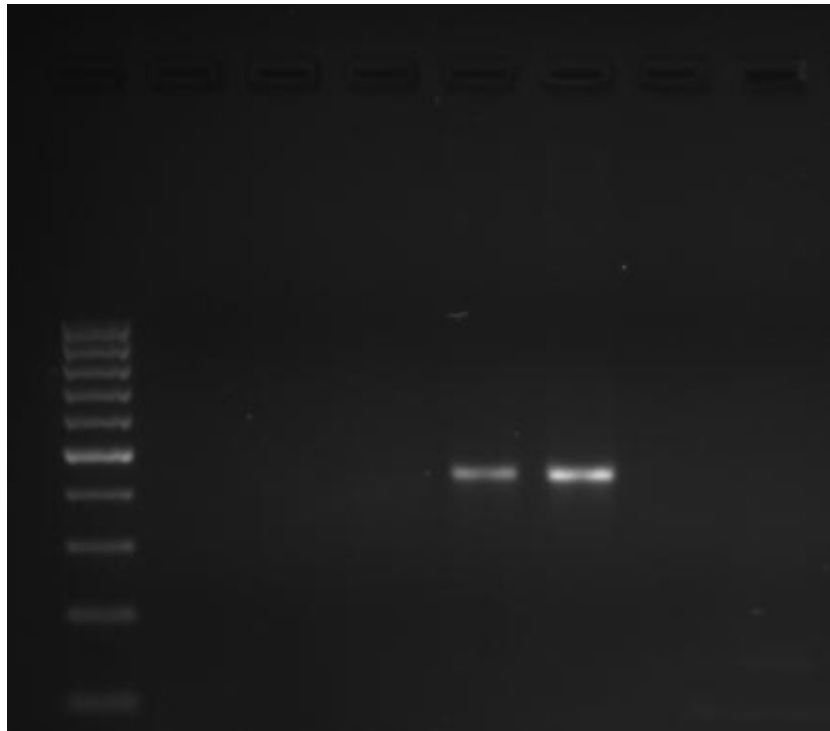
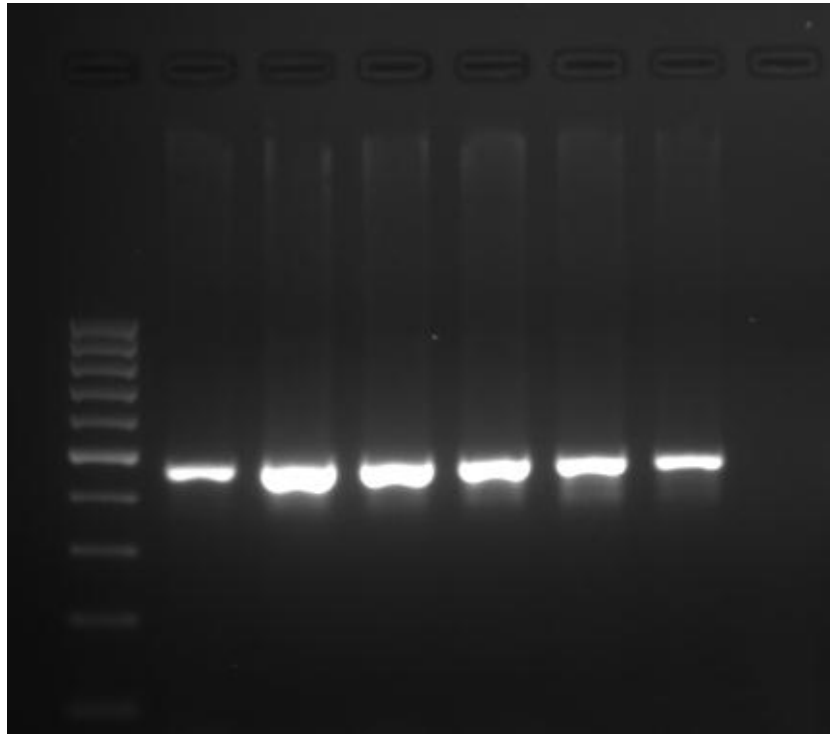
>*Cancer borealis* PK1

TNFAFSPRLG

>*Cancer borealis* PK2

SGGFAFSPRLG

MroPK



Beta-actin

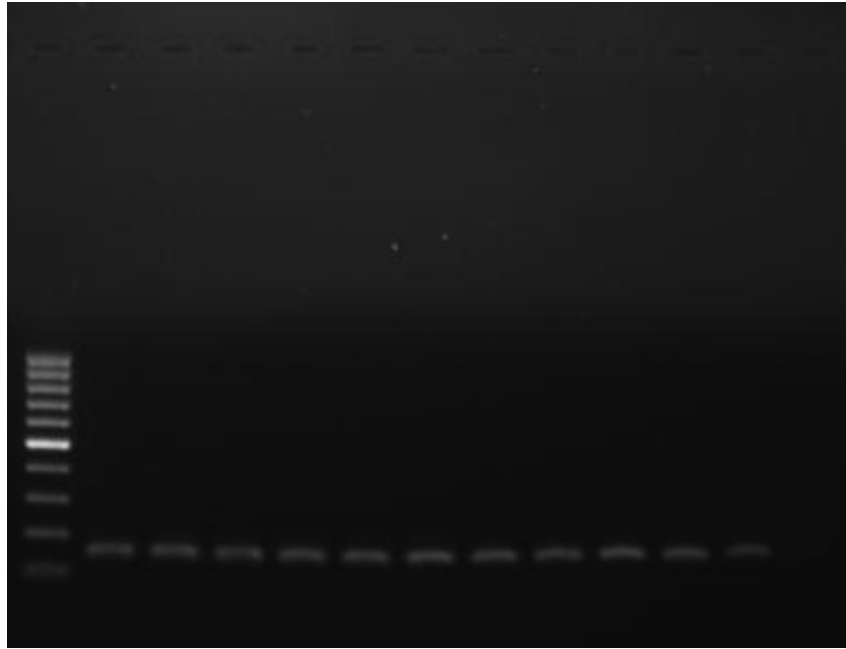


Fig. S1. Full images of agarose gel showing tissue-specific expression of *MroPK* and *beta-actin* gene.