

SUPPLEMENTARY MATERIAL

Table S1. *Drosophila* lines used in this study.

Strain	Description	Source
VK13	Expresses phiC31 integrase under the control of <i>vasa</i> . Contains an attP docking site in the 3rd chromosome.	IMBB flyroom stock
HR-GAL4	Bears HR-GAL4 transgene (marked with miniwhite) at P-element insertion site in 2 nd chromosome. Drives the reporter gene expression in the larval midgut, Malpighian tubules and fat body.	Daborn et al., 2012
ELAV-GAL4	Neuronal cell-specific driver. Drives the reporter gene expression in embryonic glial cells and mitotically active cells.	IMBB flyroom stock
MYO-GAL4	Drives the expression in midgut cells.	
<i>yw</i> ; TM3 <i>Sb e</i> / TM6B <i>Tb Hu e</i>	Balancers for 3rd chromosome (TM3 with Stubble marker. TM6B with Tubby and Humoral markers)	
UAS_ABCC2	Bears <i>SfABCC2</i> transgene under UAS at the attP insertion point at 3 rd chromosome.	This study
UAS_ABCC2_GYdel	Bears <i>SfABCC2</i> transgene with the GY deletion at position 788-789 under UAS at the attP insertion point at 3 rd chromosome.	This study
UAS_ABCC2_P799K	Bears <i>SfABCC2</i> transgene with the P799K substitution under UAS at the attP insertion point at 3 rd chromosome.	This study
UAS_ABCC2_combo	Bears a <i>SfABCC2</i> transgene with the GY deletion and the P799K substitution under UAS at the attP insertion point at 3 rd chromosome.	This study

Table S2. List of primers used in this study.

Primer name	5' sequence 3'	Use
ABCC2_F	GCAAGATGAGCGTGAAGTCC	Plasmid construction, sequencing
ABCC2_R	ATTCAGGACCAGCACGGAGG	
M13/pUC F	CCCAGTCACGACGTTGTAAAACG	Plasmid construction
M13/pUC R	AGCGGATAACAATTTCACACAGG	
ABCC2_Seq (F)	ATGCTAATGTGGGACGCCAG	Sequencing
ABCC2_WtDel	AACCAGGTGGACGGCTAC	Specific screen for integration
ABCC2_P799K	CCAGAGGGCGAGAGCAAG	
ABCC2_GYdel	GACCAACCAGGTGGACATTCAG	
3xP3_RFP_F	CCAAC TGGGGTAACCTTTGA	Screen for integration
VK13_R	ATTCTTTCCGCTGATTGTGC	
SV40_F	CCCCCTGAACCTGAAACATA	

ABCC2_GYdel

GTACGGTTACCCACCAGATCCACTACCTGAAGGCCGCCGATTTTCATCGTGCTGCTGA
ATGAGGGCAGCGTGGAAAACATGGGCAGCTACGATGAGCTGATGAAGACCGGCACCG
AGTTCTCCATGCTGTTGAGTGATCAGGCCAGCGAGGGCTCCGATACCGATAAGAAAG
AACGCCCAGCCATGATGCGCGGCATCAGCAAGATGAGCGTGAAGTCCGATGATGAAG
AGGGCGAAGAGAAGGTGCAGGTCCTGGAAGCCGAAGAACGTCAAAGCGGCAGCCTGA
AGTGGGATGTGTTGGGCCGCTACATGAAGTCCGTGAACTCGTGGTGTATGGTGGTCA
TGGCCTTTCTGGTGCTGGTCATTACACAGGGTGCCGCCACCACCACCGATTACTGGC
TGAGCTTCTGGACCAACCAGGTGGACATTCAGACACTGCCAGAGGGCGAGAGCCCCA
ATCCAGAGTTGAATACCCAAGTGGGCCTGCTGACCACCGGTCGTAC

ABCC2_P799K

GTACGGTTACCCACCAGATCCACTACCTGAAGGCCGCCGATTTTCATCGTGCTGCTGA
ATGAGGGCAGCGTGGAAAACATGGGCAGCTACGATGAGCTGATGAAGACCGGCACCG
AGTTCTCCATGCTGTTGAGTGATCAGGCCAGCGAGGGCTCCGATACCGATAAGAAAG
AACGCCCAGCCATGATGCGCGGCATCAGCAAGATGAGCGTGAAGTCCGATGATGAAG
AGGGCGAAGAGAAGGTGCAGGTCCTGGAAGCCGAAGAACGTCAAAGCGGCAGCCTGA
AGTGGGATGTGTTGGGCCGCTACATGAAGTCCGTGAACTCGTGGTGTATGGTGGTCA
TGGCCTTTCTGGTGCTGGTCATTACACAGGGTGCCGCCACCACCACCGATTACTGGC
TGAGCTTCTGGACCAACCAGGTGGACGGCTACATTCAGACACTGCCAGAGGGCGAGAG
GCAAGAAATCCAGAGTTGAATACCCAAGTGGGCCTGCTGACCACCGGTCGTAC

ABCC2_GYdel_P799K

GTACGGTTACCCACCAGATCCACTACCTGAAGGCCGCCGATTTTCATCGTGCTGCTGA
ATGAGGGCAGCGTGGAAAACATGGGCAGCTACGATGAGCTGATGAAGACCGGCACCG
AGTTCTCCATGCTGTTGAGTGATCAGGCCAGCGAGGGCTCCGATACCGATAAGAAAG
AACGCCCAGCCATGATGCGCGGCATCAGCAAGATGAGCGTGAAGTCCGATGATGAAG
AGGGCGAAGAGAAGGTGCAGGTCCTGGAAGCCGAAGAACGTCAAAGCGGCAGCCTGA
AGTGGGATGTGTTGGGCCGCTACATGAAGTCCGTGAACTCGTGGTGTATGGTGGTCA
TGGCCTTTCTGGTGCTGGTCATTACACAGGGTGCCGCCACCACCACCGATTACTGGC
TGAGCTTCTGGACCAACCAGGTGGACATTCAGACACTGCCAGAGGGCGAGAGCAAGA
ATCCAGAGTTGAATACCCAAGTGGGCCTGCTGACCACCGGTCGTAC

Figure S1. Sequences ordered as gBlocks to be used for the generation of the constructs for *Drosophila* transformation. The GY deletion is colored with green and the P799K substitution is colored with red.