

Tick salivary proteins metalloprotease and allergen-like p23 are associated with response to glycan α -Gal

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20 Supplementary Information

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22 **Supplementary Table 1.** Oligonucleotide primer sequences and annealing temperatures used for
23 analysing mRNA expression levels of different gut zebrafish (*Danio rerio*) immunity and allergy
24 biomarkers by quantitative reverse transcription polymerase chain reaction (RT-qPCR).

Target (NCBI accession no.)	Amplicon (bp)	Oligonucleotide primers (5'-3') Forward (F) & Reverse (R)	Annealing temperature	Reference
<i>ctss2.1</i> NM_001024409.2	115	F: CGGGTTTATGAGTGACGCCT	60 °C	[1]
		R: ACGCTGGGATGAACTGTAGC		
<i>prkdc</i> XM_009303401.2	115	F: GCCTGGCTTGTGACGTTGAC	60 °C	[1]
		R: ACTGCCACTGTGTCTTGGCT		
<i>tnfa</i> BC165066.1	170	F: GCTTATGAGCCATGCAGTGA	57 °C	[2]
		R: TGCCCAGTCTGTCTCCTTCT		
<i>il4</i> NM_001170740.1	190	F: GTGAATGGGATCCTGAATGG	55 °C	[2]
		R: TTCCAGTCCCGGTATATGCT		
<i>c3a</i> NM_131243.1	264	F: ACGCTCTCTGGATTGAAACA	56 °C	[2,3]
		R: TGCCTTCTTGCATGGCAATC		
<i>tlr2</i> NM_212812.1	169	F: TGAATGGGTCGAGGAGATTC	56 °C	[2,3]
		R: CACAAAGTGCTCCGACAGAA		
<i>il1b</i> NM_212844	189	F: GCATGTCCACATATGCGTCG	59 °C	[2,3]
		R: GCTGGTCGTATCCGTTTGA		
<i>ifn1</i> NM_207640.2	258	F: ATGAGAACTCAAATGTGGAC	50 °C	[3]
		R: TTACACTCGAGGATTGAC		
<i>gapdh</i> NM_001115114.1	259	F: CGTGGTGCCAGTCAGAACAT	59 °C	[1,3]
		R: AGTCAGTGGACACAACCTGG		
<i>actb1</i> NM_131031.1	155	F: AAGCTGTGACCCACCTCACG	62 °C	[1,4,5]
		R: GGCTTTGCACATACCGGAGC		

25 *ctss2.1*: cathepsin S, ortholog2, tandem duplicate 1; *prkdc*: protein kinase, DNA-activated, catalytic
26 subunit; *tnfa*: tumor necrosis factor alpha, TNF superfamily, member 2; *il4*: interleukin 4; *c3a*:
27 complement C3a, tandem duplicate 2; *tlr2*: toll-like receptor 2; *il1b*: interleukin 1, beta; *ifn1*: interferon
28 phi 1; *gapdh*: glyceraldehyde-3-phosphate dehydrogenase; *actb1*: beta actin 1.

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