

G7-2 1 -----
 Liv1 1 -----
 Liv5 1 -----
 G1-4 1 -----
 G7-4 1 -----
 LHS 1 ggcacatcttcttctaacaccctggaagagacagacacctcgagtttatcatcatcctttattg
 Lar4 1 -----
 Liv4 1 -----
 G4-1 1 -----
 Skin 1 -----

G7-2 1 -----
 Liv1 1 ----- tttccaaacgcaccga
 Liv5 1 ----- tttccaaacgcaccga
 G1-4 1 -----
 G7-4 1 -----
 LHS 61 agagaaacagttgtgactcatcaggaagttggtgatctttctcttttcggaaacgcaccga
 Lar4 1 ----- tttccaaacgcaccga
 Liv4 1 ----- tttccaaacgcaccga
 G4-1 1 -----
 Skin 1 -----gtgactcatcaggaagttggtgatctttctctgtttccaaacgcaccga
 5'1 GGAAGTTGTTGATCTTTCTCT 5'2 CACCGA

G7-2 1 ----- ACCAGCAAGAGCAGCGGCAAAGACGGCAGCAGACG
 Liv1 17 gctaaacaaaagtgagaATGGACGCACCAGCAAGAGCAGCGGCAAAGACGGCGGCGGACG
 Liv5 17 gataaacaaaagtgagaATGGATGCACCAGCAAGAGCAGCGGCAAAGACGGCAGCAGACG
 G1-4 1 ----- ACCAGCAAGAGCAGCGGCAAGACGGCAGCAGACG
 G7-4 1 ----- ACCAGCAAGAGCAGCGGCAAAGACGGCAGCAGACG
 LHS 121 gctaaacaaaagtgagaATGGACGCACCAGCAAGAGCAGCGGCAAAGACGGCAGCGGACG
 Lar4 17 gctaaacaaaagtgagaATGGACGCACCAGCAGAGAGCAGCGGCAAGACGGCGGCGGCGG
 Liv4 17 gataaacaaaagtgagaATGGACGCACCAGCAAGAGCAGCGGCAAGACGGCGGCGGCGG
 G4-1 1 ----- AGCGCAGAAAGCGGCAAGGCTTGCGGCGGCGG
 Skin 49 gctaaacaaaagtgagaATGGCGGCGGCGGCAAGGCGGCGGAGGCGGCGGCAATGGCGG
 GCTAAACAAAAGTG
 Deg1 ACAAAGTGAGAATGGAYGG
 Deg2 GAGAATGGAYGGNGARACNCC

G7-2 36 CGTTGGCTGCGGCGAAGAAGACGGCGGCGGACGCTGCGGCTGCGGCG
 Liv1 77 CGAAGGCTGCGGCGGCAAGACGGCGGCGGACGCTGCTAAGGCGGCGGCAAG
 Liv5 77 CGTTGGCTGCGGCGAACAAGACGAAAGGCGGACGCTGCTGCGGCGGCGGCAAGACG
 G1-4 36 CATTGGCTGCGGCGAACAAGACGGCGGCGGACGCTGCTGCGGCGGCGGCAAGACG
 G7-4 36 CGTTGGCTGCGGCGAACAAGACGGCGGCGGACGCTGCTGCGGCGGCGGCAAGACG
 LHS 181 CGAAGGCTGCGGCGGCAAGACGGCAGCGGACGCGTTGGCTGCGGCGAACAAGACGGCGG
 Lar4 77 CGAAGGCTGCGGCTGAGAAGACGGCGGCGGACGCTTTGGCGGCGGCGGAGGCTACGAAGG
 Liv4 77 CGAAGGCTGCGGCGAGAGAAGACGGCAGCGGACGCTTTGGCGGCGGCGGAGGCGACTGCGG
 G4-1 33 CGGCGGCTTTGGCAGCGAAGACGGCGGCGGACGCTGCGGCGAAGGCGGCGGCGATTGCGG
 Skin 109 CGGCAATGCGGCGGAGGCGGCGGCAACGAAGGCGGCTGATGCGGCTGCGTCTGCGGCGG

G7-2 84 ----- GCGGCTAAATAAttgg -----
 Liv1 130 ----- TCTGCTAAATAAttgt -----
 Liv5 133 ----- GCTGCTAAATAAttgg -----
 G1-4 92 ----- GCTGCTAAATAAtttag -----
 G7-4 92 ----- GCTGCTAAATAAtttag -----
 LHS 241 CGGCGGCAAGGCGGCTGCTAAATAAttgg -----
 Lar4 137 CAGCAGCTGCTAGAGCTTAG -----
 Liv4 137 CAGCAGCTGCTAGAGCTTAG -----
 G4-1 93 CAGCAGCTGCTAGTGTAG -----
 Skin 169 CTGCGGCTATTGCGGCTATTGCGGAGGCGGCGGAGGCGGCGGAGGCGGCAACGAAGT

G7-2 189 -----tatgatttgtccctgcttaattcttaatccct-----
 Liv1 224 -----tatggttggctctatgcttaattcttaatccctgatggtgctgacccaactc
 Liv5 247 -----tatggttggctctatgcttaattcttaatccctgatggtgctgacccaactc
 G1-4 178 -----tatgatttgtccctgcttaattcttaatccct-----
 G7-4 178 -----tatgatttgtccctgcttaattcttaatccct-----
 LHS 353 -----tatggttggctctatgcttaattcttaatccctgatggtgctgacccaactc
 Lar4 218 -----
 Liv4 233 ----aatttatggttggctctatgcttaattcttaatccctgatggtgactgacccaactc
 G4-1 254 -----
 Skin 491 ttgggaatttatggttggctctatgcttaattcttaatccctgatggtgctgacccaactc
3'2 CTACAACGACTGGGTTGAG

G7-2 -----
 Liv1 275 agtgtggtgcttgtttatggtgctgaatatcacaggttattaatacgtaaattcaagtat
 Liv5 298 agtgtggtgcttg-----
 G1-4 -----
 G7-4 -----
 LHS 404 agtgtggtgcttg-----
 Lar4 218 -----
 Liv4 288 agtgtggtgcttttttttttttg-----
 G4-1 254 -----
 Skin 551 agtgtggtgcttgtttatggtgctgaatatcacaggttattaatacgtaaattcaagtat

G7-2 -----
 Liv1 335 ggaacacacattttattttgttggttgtgagaaaatgtattgtgcctatatactcgggtactc
 Liv5 311 -----
 G1-4 -----
 G7-4 -----
 LHS 417 -----
 Lar4 218 -----
 Liv4 310 -----
 G4-1 254 -----
 Skin 611 ggaacacacatggttattttgttggttgtg-----

G7-2 -----
 Liv1 395 aaggacacaaccatcaggatgcaactcgacaactttaataatacttcttctcacacggtat
 Liv5 311 -----
 G1-4 -----
 G7-4 -----
 LHS 417 -----
 Lar4 218 -----
 Liv4 310 -----
 G4-1 254 -----
 Skin 639 -----

G7-2 -----
 Liv1 455 atcacaacatcatatatcagtgcgccctcaactggccatagccggccactacaagaaaca
 Liv5 311 -----
 G1-4 -----
 G7-4 -----
 LHS 417 -----
 Lar4 218 -----
 Liv4 310 -----agaaaca
 G4-1 254 -----
 Skin 639 -----agaaaca

G7-2 -----
Liv1 515 **catgcaatcaaacaaaaagcatcttgagacgctcctggttggaatcagtttaaatcaattt**
Liv5 311 -----**tcaaacatatagcatcttgagacgctcctggttggaatcagtttaaatcaattt**
G1-4 -----
G7-4 -----
LHS 417 -----**tcaaacaaaaagcatcttgagacgctcctggttggaatcagtttaaatcaattt**
Lar4 218 -----**tcaaacaaaaagcatcttgagacgctcctggttggaatcag****cat****cat****caattt**
Liv4 317 **catgcaatcaaacaaaaagcatcttgagacgctcctggttggaatcagtttaaatcaattt**
G4-1 254 -----**tcaaacaaaaagcatcttgat****acgctcctggttggaatcagta****taaatcaattt**
Skin 646 **catt****caatcaaacaaaaagcatcttgagacgctcctggttggaatcagta****taaatcaattt**

G7-2 -----
Liv1 575 **aaatgtgtgggttaaaaaccgctgcttagatctcataacaaagaaatgtttttacagccc**
Liv5 364 **aaatgtgtgggttaaaaaccgctgcttagatctcataaccaa****a****aaatgtttttacagccc**
G1-4 -----
G7-4 -----
LHS 470 **aaatgtgtgggttaaaaaccgctgcttagatctcataaccaagaaatgtttttacagccc**
Lar4 273 **aaatgtgtgggttaaaaaccgctgcttagatctcataaccaagaaatgtttttacagccc**
Liv4 377 **aaatgtgtgggttaaaaaccgctgcttagatctcataaccaaga****cat****gtttttacagccc**
G4-1 309 **aaatgtgtgggttaaaaacc****tgctgcttagatctcataaccaagaaatgtttttacagccc**
Skin 706 **aaatgtgtgggttaaaaact****ca****ctgctta****a****atctcataaccaagaaatg****c****ttttacagccc**

G7-2 -----
Liv1 635 **gggaaaagtgaacctccacaaagatctttcttta**-----
Liv5 424 **gggaaaagtgaacctccacaaagatctttcttta**-----
G1-4 -----
G7-4 -----
LHS 530 **gggaaaagtgaacctccacaaagatctttctttagagcta****atgtagtagcttaagatct**
Lar4 333 **gggaaaagtgaacctccacaaagatctttcttta**-----
Liv4 437 **gggaaaagtgaacctccacaaagatctttcttta**-----
G4-1 369 **gggaaaagtgg****ac****ctccacaaagatctttctttg**-----
Skin 766 **gggaaaagtgaacctccacaaagatctttctttagagcta****atgtagtagcttaagatct**
CTCGATTACATCATCGAATTC 3'1

G7-2 -----
Liv1 -----
Liv5 -----
G1-4 -----
G7-4 -----
LHS 590 **catcagtgttgatgagcaaagtcggttggaacaaactgtacctcttttaaaaactttttg**
Lar4 -----
Liv4 -----
G4-1 -----
Skin 826 **catcagtgttgatgagcaaagtcggttggaacaaactgtacctcttttaaaaacg****ttttg**

G7-2 -----
Liv1 -----
Liv5 -----
G1-4 -----
G7-4 -----
LHS 650 **aagg****tcagaccggagctaaaactccc****a****at****ttatctccatctggttattgagaaatg****ttgt**
Lar4 -----
Liv4 -----
G4-1 -----
Skin 886 **aag****tcagaccggagctaaaactccc****-****at****ttatctccatctggttattgagaaatg****ttgt**

G7-2 -----
Liv1 -----
Liv5 -----
G1-4 -----
G7-4 -----
LHS 710 **gatttgggtgatttggatgaattaaaagaacctctataaacaaaaaaaaa**
Lar4 -----
Liv4 -----
G4-1 -----
Skin 945 **gatttgggtgatttgggtgaattaaaagaacctctataaacaaaaaaaaa**