

Table S7: Negatively selected sites detected for *Pvmmsp-7* genes taking recombination into account.

	SLAC	FEL	REL	IFEL
<i>m</i> sp-7 <i>C</i>	103, 112 and 125	38, 52, 57, 65, 70, 71, 96, 102, 103, 112, 122, 123, 125, 176, 195, 202, 225, 230, 248 and 254	38, 39, 52, 53, 57, 65, 68, 70, 71, 76, 96, 97, 98, 100, 102, 103, 112, 121, 122, 123, 125, 126, 139, 142, 164, 176, 188, 195, 202, 209, 213, 215, 221, 222, 224, 225, 226, 229, 230, 247, 248, 254 and 263	52, 65, 70, 71, 96, 102, 103, 112, 122, 123, 125, 176, 195, 225 and 230
<i>m</i> sp-7 <i>H</i>	44, 47, 69, 97, 101, 144 and 146	25, 37, 44, 47, 56, 57, 69, 73, 79, 85, 97, 101, 105, 111, 122, 124, 129, 144, 146, 147, 204, 255 and 296	25, 44, 47, 69, 97, 101, 129, 144, 146, 147, 204 and 255	44, 47, 53, 69, 97, 101, 129, 144, 146, 147, 204, 255 and 296
<i>m</i> sp-7 <i>I</i>	14, 85, 257 and 265	14, 37, 47, 85, 87, 111, 112, 127, 257, 265, 302, 358 and 359	14, 85, 87, 112, 257, 265, 302	14, 37, 47, 85, 87, 111, 112, 257, 265, 302, 358 and 359

Numbers according to the reference Sal-I protein sequence *Pvmmsp-7C*: XP_001614132.1, *Pvmmsp-7H*: XP_001614137.1 and *Pvmmsp-7I*: XP_001614138.1.