

Dispersal vs. retention: correspondence of species-specific reproductive cycles and settlement periods in a blue mussel hybrid zone

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Appendix 1. *Mytilus* spp. Allele frequencies of *M. edulis* specific alleles at the *Glu* gene of primary spat (250 to 500 µm shell length) from each collection date and location in 1998. Sample sizes are shown underneath the allele frequency. Significant *G*-values showing temporal variation among cohorts are labeled with an *. Dates where allele frequencies differ significantly from those of other collections at the same location are also marked by an *. Dashed lines represent collections that included <5 primary spat. E: *M. edulis*; HZ: hybrid zone; G: *M. galloprovincialis*. For station locations see Fig. 1 in main article; NA: data not available

1998	May 22	Jun 8	Jun 23	Jul 1	Jul 23	Aug 9	Aug 21	Oct 6	G
MC	1.000 191	1.000 94	0.996 121	1.000 48	– –	– –	1.000 11	– –	3.54
DM	0.981 27	1.000 32	1.000 54	1.000 7	– –	– –	– –	– –	0.38
HS	–1.000	–	1.000	–	–	–	–	–	2.89
G-value	1.7	1.4	0.3	1.0	NA	NA	NA	NA	
E-p pooled	0.998 218	1.000 143	0.997 175	1.000 67	1.000 10	– –	1.000 11	– –	6.77
WB	0.926* 54	0.909* 93	0.981 130	1.000 42	– 63	1.000 31	0.968	–	23.10*
LS	–	–	–	–	1.000 17	0.981 53	0.972 18	–	0.16
HB	–	0.974 38	0.982 54	0.983 89	0.991 58	1.000 11	–	–	1.64
PB	–	–	0.955 22	0.970 67	0.970 84	0.917 12	–	–	1.59
MP	–	0.965 86	0.988 205	0.991 214	0.948* 77	0.921* 38	0.991 57	–	20.3*
MM	–	–	–	–	0.853 17	0.861 72	0.828 32	–	0.25
G-value	NA	6.8*	2.3	2.8	11.5*	26.2*	19.7*	NA	
HZ-p pooled	0.932 59	0.944 223	0.982 420	0.986 418	0.959 266	0.938 251	0.948 143	–	41.9*
PT	–	–	–	–	–	0.167 9	– 63	0.048	2.91
TV	–	–	–	–	–	–0.217 30	0.143 28	0.000* 31	14.50*
NQ	–	–	–	–	–	0.046 11	0.063 8	0.040 100	0.11
PQ	–	–	–	–	–	0.132 19	0.069 51	0.000 6	1.31
G-value	NA	NA	NA	NA	NA	4.5	2.4	1.7	
G-p pooled	–	–	–	–	–	0.159 69	0.061 82	0.041 88	14.9*

Appendix 2. *Mytilus* spp. Allele frequencies of *M. edulis* specific alleles at the *Glu* gene of primary spat (250 to 500 μ m shell length) from each collection date and location in 1999. Sample sizes are shown underneath the allele frequency. Significant *G*-values showing temporal variation among cohorts are labeled with an *. Dates where allele frequencies differ significantly from those of other collections at the same location are also marked by an *. Dashed lines represent collections that included <5 primary spat. E: *M. edulis*; HZ: hybrid zone; G: *M. galloprovincialis*. For site locations, see Fig. 1 in main article; NA: data not available

1999	May 19	May 28	Jun 13	Jun 29	Jul 11	Jul 29	Aug 10	Aug 29	Sep 10	Sep 25	Oct 21	<i>G</i>
MC	1.000 46	1.000 36	1.000 128	1.000 40	0.981 26	1.000 11	-	-	-	-	-	3.19
DM	-	-	0.986 35	1.000 11	1.000 39	1.000 15	-	-	-	-	-	0.96
HS	-	-	0.990 49	1.000 10	1.000 14	1.000 48	-	-	-	-	-	1.82
<i>G</i> -value	NA	NA	1.1	1.3	0.5	1.2	NA	NA	NA	NA	NA	
E-p pooled	1.000 50	1.000 40	0.995 212	1.000 61	0.994 79	1.000 74	-	-	-	-	-	0.75
WB	0.898* 187	0.981 162	0.969 161	0.951 132	1.000 14	0.990 52	1.000 51	-	-	-	-	38.20*
LS	-	-	-	0.925 106	-	0.978 23	0.962 13	-	-	-	-	2.42
HB	-	-	0.941 17	0.964 28	-	0.908 38	-	-	-	-	-	0.89
PB	-	-	-	0.850 10	0.750 12	0.907 43	-	-	-	-	-	3.76
MP	-	0.846 65	0.842 187	0.918* 141	0.864 66	0.878 123	0.931* 29	-	-	-	-	11.95*
MM	-	-	-	0.833 9	-	0.912 17	0.938 32	0.944 9	-	-	-	1.82
<i>G</i> -value	NA	27.8*	35.4*	5.4	5.5	19.3*	5.4	NA	NA	NA	NA	
HZ-p pooled	0.909 165	0.937 237	0.902 382	0.930 427	0.885 104	0.918 304	0.966 131	0.974 19	0.700 5	0.944 9	-	25.42*
PT	-	-	-	-	-	-	-	-	-	0.043 35	-	
TV	-	-	-	-	-	-	-	0.167 12	0.000 9	-	-	1.46
NQ	-	-	-	-	-	-	-	0.038 105	0.011 47	0.000 8	0.125 8	4.74
<i>G</i> -value	NA	NA	NA	NA	NA	NA	NA	5.1*	1.2	0.13	NA	
G-p pooled	-	-	-	-	-	-	-	0.051 118	0.009 56	0.034 44	0.100 10	6.1

Appendix 3. *Mytilus* spp. Allele frequencies of *M. edulis* specific alleles at the *Glu* gene of primary spat (250 to 500 μ m shell length) from each collection date and location in 2000. Sample sizes are shown underneath the allele frequency. Significant *G*-values showing temporal variation among cohorts are labeled with an *. Dates where allele frequencies differ significantly from those of other collections at the same location are also marked by an *. Dashed lines represent collections that included <5 primary spat. E: *M. edulis*; HZ: hybrid zone; G: *M. galloprovincialis*. For site locations, see Fig. 1 in main article; NA: data not available

2000	May 16	Jun 1	Jun 15	Jun 29	Jul 16	Jul 27	Aug 17	Aug 30	Sep 12	<i>G</i>
MC	1.000 24	0.968 78	1.000 14	–	1.000 49	1.000 10	–	–	–	1.86
DM	1.000 28	1.000 22	–	–	1.000 15	1.000 47	–	–	–	0.58
HS	1.000 43	1.000 53	–	–	1.000 16	1.000 25	1.000 8	–	–	2.12
<i>G</i> -value	0.20	1.70	NA	NA	0.96	1.01	NA	NA	NA	
E-p pooled	1.000 95	0.984 153	1.000 19	1.000 5	1.000 80	1.000 82	0.900 10	–	–	10.33
MT	–	–	–	–	–	1.000 24	–	–	–	
WB	0.956 34	1.000 23	1.000 5	1.000 27	1.000 8	1.000 6	1.000 8	–	–	2.58
LS	–	0.917 6	0.813 8	–	–	–	–	–	–	0.60
HB	–	1.000 8	0.889 9	0.964 28	0.955 11	–	–	–	–	1.19
PB	–	–	–	–	0.833 9	0.875 8	1.000 10	–	–	1.61
MP	0.917 18	0.967 45	0.985 68	0.903 31	0.982 28	0.963 41	1.000 13	–	–	9.13
MM	–	–	–	–	–	–	0.571 7	–	–	
<i>G</i> -value	0.63	1.18	10.05*	4.04	4.79	3.06	12.77*	NA	NA	
HZ-p pooled	0.946 56	0.976 85	0.961 90	0.957 94	0.958 60	0.972 89	0.927 41	1.000 5	–	5.00
PT	–	–	–	–	–	0.084 77	0.094 16	0.000 5	–	0.00
TV	–	–	–	0.600 5	–	0.250 30	0.333 6	0.000* 9	0.000* 6	13.70*
NQ	–	–	–	0.315 92	0.200 5	0.279 68	0.120* 46	0.100* 15	0.030* 33	40.7*
PQ	–	–	–	–	–	0.105 19	0.773 22	–	–	40.5*
<i>G</i> -value	NA	NA	NA	3.33	NA	22.90*	66.70*	0.32	0.57	
G-p pooled	–	–	–	0.330 97	0.125 8	0.180 194	0.289 90	0.052 29	0.026 39	59.4*