

## E-9

### Reproductive cycle of Pacific Oyster, *Crassostrea gigas* (Thunberg) from different depths of suspended culture in Gosung Bay, Korea and its relation to parasite, *Marteilioides chungmuensis*

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#### **ABSTRACT**

The reproductive cycle of Pacific oyster, *Crassostrea gigas* was studied from three different depth levels of the suspended culture in Gosung Bay, Korea from January to December 2000. The results showed that there were no significant differences in temperature, salinity and chlorophyll *a* at depth level. Oysters started gametogenesis as early as December and spawning season extended from late spring to early autumn with two marked spawning peaks in June and August. Gonadal development in oysters in the Bay seemed to be strongly affected by seasonal changes in water temperature and the effect was more pronounced among oysters at deeper depth than in the shallow ones. Prevalence and infection intensity of parasite *Marteilioides chungmuensis* seemed to be correlated with temperature and also reproductive activity of female oysters. Several oysters collected in November and December erratically carried large quantity of ripe but *Marteilioides*-infected eggs, suggesting that the infection also leads spawning failure by delaying spawning, as well as destruction of ripe oocytes.