

Worldwide distributions of tuna larvae: revisiting hypotheses on environmental requirements for spawning habitats

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Supplement 1. References consulted to estimate the spatial distribution of spawning areas. Available literature on tuna larval occurrences

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Supplement 2. Details of satellite data acquisition

Average seasonal values of sea-surface temperature (SST) and eddy kinetic energy (EKE) were calculated using data for 9 yr (2001 to 2009) provided by the CoastWatch OPeNDAP server, part of the U.S. Department of Commerce, National Oceanic and Atmospheric Administration Satellite and Information systems (www.nesdis.noaa.gov/), CoastWatch Program (<http://coastwatch.noaa.gov/>).

The latitudinal and longitudinal components of the geostrophic velocities (U and V) provided by the CoastWatch Program were inferred from the sea-surface height. Full description of data attributes of the satellite product ("Aviso zonal geostrophic current is inferred from sea-surface height deviation, climatological dynamic height, and basic fluid mechanics.") can be found at: <http://coastwatch.pfeg.noaa.gov/erddap/griddap/erdTAgeomday.das> Monthly means of U and V were provided at 0.25 degrees spatial resolution. The U and V values were then used to calculate the EKE values that were then averaged into $5^\circ \times 5^\circ$ cells using the Matlab software. EKE values for each cell were averaged from 3 mo periods to obtain seasonal means.

The monthly averages of SST provided by the CoastWatch Program were obtained from the advanced very high resolution radiometer. A full description of data attributes of the satellite product (SST, Pathfinder Ver 5.0, Day and Night, Global, Science Quality, Monthly Composite) can be found at: <http://coastwatch.pfeg.noaa.gov/erddap/griddap/erdPHsstamday.das>.

Monthly means of SST were provided at a 0.05° spatial resolution. SST values were averaged into $5^\circ \times 5^\circ$ cells using the Matlab software. Values for every cell were averaged from 3 mo periods to obtain seasonal means.