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VIMS Ferry Pier Ambient Water Monitoring Data, Salinity and Temperature, Daily Summary 1947-2003

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Abstract
Bulk water parameters of Temperature and Salinity were measured at the VIMS Ferry Pier from 1947 to 2003. Initial methods were undocumented but likely automated with an instrument and chart recorder since the data consists of a daily high and low measurement from which a mean value was derived. Beginning in 1971 an automated instrument recorded continuously from which 2-hour measurements were made and daily minimum and maxima were derived. Beginning in 1986 an Inter-Ocean CTD instrument placed at mid-depth was interfaced to a digital data logger (Campbell Scientific CRJ) that recorded data every six minutes, resulting in 240 measurements per day. The Ferry Pier station was discontinued after the Pier was destroyed by Hurricane Isabel in September 2003. Files are provided in Text (.csv) and MS Access format.

Spatial Data
From Google Earth -
37.246564, -76.500332 Ferry Pier

37 14.8’ 76 30.0’ Adjacent Tide Station (Boon, et al.)

Files | Description
Digital files of daily min, mean and max observations are provided for ambient water temperature from 1947 to 2003 and ambient water salinity from 1971 to 2003.

- **README.txt**: Data dictionary providing parameters, number of observations per year, algorithm to calculate salinity from conductivity and water temperature.
- **vims_temperature.csv:** Daily mean, minimum, maximum temperature, 1947-2003 .csv text format
- **vims_salinity.csv:** Daily mean, minimum, maximum salinity, 1947-2003 .csv text format
- **vims_temperature.mdb:** Daily mean, minimum, maximum temperature, 1947-2003 .mdb Access format
- **vims_salinity.mdb:** Daily mean, minimum, maximum salinity, 1947-2003 .mdb Access format

FILES ARE AVAILABLE AT: https://doi.org/10.25773/j6es-ym72

See also:
Anderson, Gary F., 2021. VIMS Ferry Pier Ambient Water Monitoring Data, Salinity and Temperature, Six-minute data 1986-2003. Data. William & Mary. https://doi.org/10.25773/c7cw-zd28

Keywords
Water salinity, water temperature, York River, Virginia, Chesapeake Bay, Monitoring, Climate change, Long term dataset

Associated Publications
Austin, H. M. 2002. Decadal oscillations and regime shifts: A characterization of the Chesapeake Bay marine climate, American Fisheries Society Symposium 32: 155–170.

Pyke, Christopher R., Raymond. Najjar, Mary Beth. Adams, and Chesapeake Bay Foundation. Climate Change and the Chesapeake Bay State-of-the-science Review and Recommendations / a Report from the Chesapeake Bay Program Science and Technical Advisory Committee; Coordinating STAC Members: Christopher R. Pyke and Raymond Najjar; Contributing Authors: Mary Beth Adams...[et Al.]. Annapolis, MD: Chesapeake Bay Foundation, 2008. STAC Publication; 08-004 http://www.chesapeake.org/stac/Pubs/climchangereport.pdf (accessed 4/12/21)

Boon, J. D., Brubaker, J. M., & Forrest, D. R. (2010) Chesapeake Bay Land Subsidence and Sea Level Change : an evaluation of past and present trends and future outlook. Special report in applied marine science and ocean engineering; no. 425. Virginia Institute of Marine Science, William & Mary. https://doi.org/10.21220/V58X4P

Sobocinski, Kathryn L., "Fishes in Seagrass Habitats: Species Composition, Trophic Interactions, and Production" (2014). *Dissertations, Theses, and Masters Projects.* Paper 1539791566. William & Mary. Cf. Page 62. https://dx.doi.org/doi:10.25773/v5-h572-d662

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