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Education:

Ph.D., 1988, Joint Program in Oceanographic Engineering, MIT/WHOI.

S.M., 1985, Department of Civil Engineering, Massachusetts Institute of Technology.

B.E.(Hons), 1982, Department of Theoretical and Applied Mechanics, School of Engineering, University of Auckland, New Zealand.

Professional appointments:

2001-: Assistant/Associate Professor, Marine and Coastal Sciences, Rutgers University

2000-2001: Research Scientist, NIWA, Auckland, New Zealand.

1998-1999: Senior Lecturer, School of Environmental and Marine Sciences, University of Auckland, New Zealand.

1990-1997: Senior Research Scientist, CSIRO Division of Marine Research, Tasmania, Australia.

1988-1990: Scientist, DSIR New Zealand Oceanographic Institute, Wellington, New Zealand.

Publications:

(a) Last 3 years:

Cahill, B., O. Schofield, R. J. Chant, J. Wilkin, E. Hunter, S. Glenn, and W. P. Bissett, 2008: Dynamics of turbid buoyant plumes and the feedbacks on near-shore biogeochemistry and physics.

Geophysical Research Letters, **35**, L10605, doi:10.1029/2008GL033595.

Hofmann, E. E., J.-N. Druon, K. Fennel, M. Friedrichs, D. Haidvogel, C. Lee, A. Mannino, C. McClain, R. Najjar, J. Siewert, J. O'Reilly, D. Pollard, M. Previdi, S. Seitzinger, S. Signorini, and J. Wilkin, 2008: Eastern U.S. Continental Shelf Carbon Budget: Integrating Models, Data Assimilation, and Analysis. *Oceanography*, **21**, 86-104.

Haidvogel, D., H. Arango, W. P. Budgell, B. Cornuelle, E. Curchitser, E. DiLorenzo, K. Fennel, W. R. Geyer, A. J. Hermann, L. Lanerolle, J. Levin, J. C. McWilliams, A. J. Miller, A. M. Moore, T. M. Powell, A. F. Shchepetkin, C. R. Sherwood, R. P. Signell, J. C. Warner, and J. Wilkin, 2008: Ocean forecasting in terrain-following coordinates: Formulation and skill assessment of the Regional Ocean Modeling System. *Journal of Computational Physics*, **227**, 3595-3624, doi:10.1016/j.jcp.2007.06.016.

Castelao, R., S. Glenn, O. Schofield, R. Chant, J. Wilkin, and J. Kohut, 2008: Seasonal evolution of hydrographic fields in the central Middle Atlantic Bight from glider observations. *Geophysical Research Letters*, **35**, L03617, doi:10.1029/2007GL032335.

Choi, B.-J. and J. L. Wilkin, 2007: The effect of wind on the dispersal of the Hudson River plume. *Journal of Physical Oceanography*, **37**, 1878-1897.

- Edson, J., T. Crawford, J. Crescenti, T. Farrar, N. Frew, G. Gerbi, C. Helmis, T. Hristov, D. Khelif, A. Jessup, H. Jonsson, M. Li, L. Mahrt, W. McGillis, A. Plueddemann, L. Shen, E. Skyllingstad, T. Stanton, P. Sullivan, J. Sun, J. Trowbridge, D. Vickers, S. Wang, Q. Wang, R. Weller, J. Wilkin, A. Williams III, D. Yu, and C. Zappa (2007), The Coupled Boundary Layers and Air-Sea Transfer Experiment in Low Winds, *Bulletin of the American Meteorological Society*, 88(3), 341-356.
- Fennel, K., J. Wilkin, J. Levin, J. Moisan, J. O'Reilly and D. Haidvogel, 2006: Nitrogen cycling in the Middle Atlantic Bight: Results from a three-dimensional model and implications for the North Atlantic nitrogen budget, *Global Biogeochemical Cycles*, 20,GB3007, doi:10.1029/2005GB002456
- He, R., and J. L. Wilkin, 2006: Barotropic tides on the southeast New England shelf: A view from a hybrid data assimilative modeling approach. *Journal of Geophysical Research*, 111, C08002, doi:10.1029/2005JC003254.
- Wilkin, J., 2006: The summer time heat budget and circulation of southeast New England shelf waters, *Journal of Physical Oceanography*, 36(11), 1997-2011.
- Wilkin, J., and W. Zhang, 2006: Modes of mesoscale sea surface height and temperature variability in the East Australian Current, *Journal of Geophysical Research*, 112, C01013, doi:10.1029/2006JC003590.

(b) Other publications related to proposal

- Wilkin, J., and L. Lanerolle, 2005, Ocean Forecast and Analysis Models for Coastal Observatories, In An Integrated View of Oceanography: Ocean Weather Forecasting in the 21st Century, Springer.
- Wilkin, J.L., H. G. Arango, D. B. Haidvogel, C. S. Lichtenwalner , S. M. Glenn, and K. S. Hedström 2005, A Regional Ocean Modeling System for the Long-term Ecosystem Observatory, *Journal of Geophysical Research*, 110, C06S91, doi:10.1029/2003JC002218.
- Chiswell, S., J. Wilkin, J. D. Booth and B. Stanton, 2003, Trans-Tasman Sea larval transport: Is Australia a source for New Zealand lobsters? *Marine Ecology Progress Series*, 247, 173-182
- Griffin, D., J. Wilkin, C. Chubb, A. Pearce and N. Caputi, 2001, Ocean currents and the larval phase of Australian western rock lobster, *Panulirus cygnus*, *Marine and Freshwater Research*, 52, 1187-1200.

Synergistic activities:

- 2008-present: Chair, Modeling Subcommittee, National Federation of Regional Associations (NFRA)
- 2006-present: Member, Modelers Caucus for Data Management and Communications (DMAC) and Modeling and Analysis Steering Team (MAST) of the Integrated Ocean Observing System (IOOS)
- 2000-present: Editor of the journal *Ocean Dynamics*, Springer Science
- 1997-present: Member, NASA Science Working Team for TOPEX/Jason Ocean Surface Topography Mission
- 1993-1995: Member, World Ocean Circulation Experiment Numerical Experimentation Group