



Due to technical problems, there is a delay in posting the full text version of articles. We hope to have this resolved soon.
In the meantime please see the PDF version of articles.

Abstract View

[Volume 3, Issue 1 \(January 1973\)](#)

Journal of Physical Oceanography

Article: pp. 57–60 | [Abstract](#) | [PDF \(270K\)](#)

A Theory of Large-Amplitude Kelvin Waves

John R. Bennett

Marine Studies Center, The University of Wisconsin, Madison 53706

(Manuscript received May 11, 1972, in final form September 20, 1972)

DOI: 10.1175/1520-0485(1973)003<0057:ATOLAK>2.0.CO;2

ABSTRACT

A simple nonlinear model of the generation of Kelvin waves is presented and applied to internal Kelvin waves in Lake Michigan. It is shown that a Kelvin wave which has a wavelength longer than the Rossby radius of deformation steepens. This may explain “warm fronts” in records of nearshore temperature in Lake Michigan.

Options:

- [Create Reference](#)
- [Email this Article](#)
- [Add to MyArchive](#)
- [Search AMS Glossary](#)

Search CrossRef for:

- [Articles Citing This Article](#)

Search Google Scholar for:

- [John R. Bennett](#)

[top](#) ▲

