

Journées de Modélisation des Vagues à Phases Résolues

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Titre: Hyperbolicity study of the modulation equations for the Benjamin-Bona-Mahony equation.

Résumé: A complete study of the modulation equations for the Benjamin-Bona-Mahony (BBM) equation is performed. In particular, the boundary between the hyperbolic and elliptic regions of the modulation equations is found. When the wave amplitude is small, this boundary is approximately defined by $k = \sqrt{3}$, where k is the wave number.