1037-35-121 **Alex Alexandrou Himonas\*** (`himonas.1@nd.edu`), Department of Mathematics, University of Notre Dame, Notre Dame, IN 46556. *Non-uniform dependence of the CH equation solution map.*
Using approximate solutions we show that the solution map for the periodic Camassa-Holm (CH) equation is not uniformly continuous in Sobolev spaces with exponent greater or equal to one. This extends earlier results to the whole range of Sobolev exponents for which local well-posedness of CH is known. (Received January 28, 2008)