

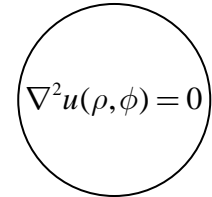
系所：_____ 班級：_____ 學號：_____ 姓名：_____

國立台灣海洋大學河海工程研究所 BEM 2007 第 11 次作業

Please run BEPO2D program for the solution $\nabla^2 u(\rho, \phi) = 0, u(1, \phi) = \cos(5\phi)$

Some discussions:

- (1) Number of nodes and elements ?
- (2) Boundary layer effect for u and $\partial u / \partial x$ near $(1,0)$?


$$\nabla^2 u(\rho, \phi) = 0$$

$$u(1, \phi) = \cos(5\phi)$$

References:

1. J. T. Chen, BEPO2D program, 2007.
2. J. T. Chen, H.-K. Hong and S. W. Chyuan, 1994, Boundary Element Analysis and Design in Seepage Problems Using Dual Integral Formulations, Finite Elements in Analysis and Design, Vol.17, No.1, pp.1-20.
3. J. T. Chen, M. T. Liang and S. S. Yang, 1995, Dual Boundary Integral Equations for Exterior Problems, Engineering Analysis with Boundary Elements, Vol.16, pp.333-340. (SCI and EI)