1014-34-105   **Ding Ma*** (`Ding_Ma@baylor.edu`), Department of Mathematics, One Bear Place 97328, Baylor University, Waco, TX 76798-7328. *Uniqueness Implies Uniqueness and Existence for Nonlocal Boundary Value Problems for Fourth Order Ordinary Differential Equations.*

For the fourth order ordinary differential equation, $y^{(4)} = f(x, y, y', y'', y''')$, it is shown that uniqueness of 5-point nonlocal boundary value problems implies uniqueness of 4-point and 3-point nonlocal boundary value problems. Then, it is shown that k-point, $k = 3, 4, 5$, nonlocal boundary value problems in fact have solutions. (Received July 26, 2005)