

**Math 170B: Numerical Analysis, Winter quarter, 2006**

**Homework Assignment 7**

**Due Wednesday, March 8**

1. Given the points  $(0, -1)$ ,  $(1, 0)$ ,  $(2, 2)$ ,  $(3, 4)$ ,  $(4, 3)$ . Find the corresponding linear and quadratic least-squares approximation. (You can use Matlab to solve the resulting system of linear equations.)
2. Solve Problem 1, Part (d), of Exercise Set 8.2.
3. Solve Problem 3, Part (d), of Exercise Set 8.2.
4. Solve Problem 7 of Exercise Set 8.2.
5. Solve Problem 11 of Exercise Set 8.2.
6. Solve Problem 14 of Exercise Set 8.2.