

**MATH 25A – PROBLEM SET #9**  
**DUE FRIDAY NOVEMBER 30**

1. PART A

- (1) Problem 3.1.8.
- (2) Problem 3.1.2.

2. PART B

- (1) Problem 3.2.8.

3. PART C

For this part of the homework, please read Example 3.2.1 in the book about linked rods. The configuration of such rods often turns out to be a manifold, but not always (see problem 3.2.7 for an example).

- (1) Problem 3.2.1.
- (2) Problem 3.2.2(a). Prove that  $X$  is a manifold.