

## Homework Assignment for Week 06

1. Section 14.2: Problems 41, 43, 48, 49, 51, 57, 61, 63, 67.

Hint for problems 61, 63: Read 'Changing Variables to Polar Coordinates'. on page 823. Note that in equation (1), page 823,  $r < \infty$  should be  $0 < r < \infty$  instead.

Hint for problem 49: Find two paths that pass through  $(1;1)$ .

2. Section 14.3: Problems 19, 21, 53, 60, 65, 67, 69, 81, 91.