Math 312 (Complex Analysis) – Week 2
Spring Term 2004
BUCKMIRE

Monday January 26 *Class 3*:

Polar and Exponential Form of Complex Numbers. Introduction of the `Arg` function. The Euler and De Moivre Formulas.
Reading:
Saff & Snider, (Section 1.3 and 1.4)
Homework: (**due Friday January 30**)
Saff & Snider, Section 1.3 # 2, 5, 6, 7(abc), 12, 13 **Extra Credit: # 22**
QUIZ #1

Wednesday January 28 *Class 4*:

Polynomial Equations of a Complex Variable. Roots (Fractional Exponents) of a Complex Variable.
Reading:
Saff & Snider, (Section 1.4 and 1.5)
Homework: (**due Friday January 30**)
Saff & Snider, Section 1.4 # 2, 4, 5, 8 **Extra Credit: #22, 23**

Friday January 30 *Class 5*:

Point Sets in the Plane. Introduction of various concepts associated with point sets: neighborhood, limit point, openness, closedness, connectedness, boundedness et cetera.
Reading:
Saff & Snider, (Section 1.6)
Homework: (**due Friday February 6**)
Saff & Snider, Section 1.5 # 3, 4, 5, 6, 10, 11, 15 **Extra Credit: #21**
Saff & Snider, Section 1.6 # 2,3,4,5,6,7,8