

## California State University Sacramento - Math 101

**Homework Assignment 11**

- 1) Problem 1 on page 270
- 2) Problem 2 on page 270
- 3) Problem 3 on page 270
- 4) Problem 4 on page 270
- 5) Problem 5 on page 270

**270*****Exercise 6*****Exercise 6****1. Solve**

$$a_n = 3a_{n-1} - 2a_{n-2},$$

given that  $a_0 = 2$  and  $a_1 = 3$ .

**2. Solve**

$$a_n - 6a_{n-1} + 9a_{n-2} = 0,$$

given that  $a_0 = 2$  and  $a_1 = 3$ .

**3. Solve**

$$a_n = \frac{1}{2}(a_{n-1} + a_{n-2}),$$

given that  $a_0 = 0$  and  $a_1 = 1$ .

**4. Solve**

$$a_n - 4a_{n-1} + 4a_{n-2} = 0,$$

given that  $a_0 = -\frac{1}{4}$  and  $a_1 = 1$ .

**5. Solve**

$$2a_n = a_{n-1} + 2a_{n-2} - a_{n-3},$$