**Chapter 1 –Extra Practice - SOLUTIONS**

**Arithmetic Sequences**

**1. a)** not arithmetic **b)** arithmetic; *d* = , *tn* = 1 + *n*

**c)** not arithmetic **d)** arithmetic; *d* = -3*x*2, *t*n = *x*2 -3*nx*2

**2. a)** 1, -3, -7, -11, -15 **b)** -6, 0, 6, 12, 18, 24

**c)** 5*m*, 5*m* + 3, 5*m* + 6, 5*m* + 9, 5*m* + 12 **d)** *c* + 1, 2*c* – 1, 3*c* – 3, 4*c* – 5, 5*c* – 7

**3.** **a)** *t*1 = 4, *d* = 3 **b)** *t*1 = 42, *d* = 2 **c)** *t*1 = -19, *d* = 7 **d)** *t*1 = 67, *d* = -5

**4.** **a)** 64 **b)** 56 **b)** 32 **d)** 28

**5.** *x* = 2

**Arithmetic Series**

**6. a)** 3 + 7 + 11 + 15 + 19 b) ; *d* = 4 c) S20 = - 470