1a. Complete the following table for ages of mothers of students in this course in 2004. [6]

1b.   Assuming   a   normal distribution of ages of mothers, the expected frequency, in 2004, is E(F[Age=x]) = 3.59 for the age group 16-20.   Write   a   data equation for this age group.

x	F(Age=x)	F(Age=x)/n	F(Age≤x)	F(Age<x)/n
18				4
23				19
28				40
33				52
38				55
43				55

_____ = _____ + _____   [3]
   Data value   Model value   residual

2. For each of the following decisions, (a) state the "no effect" or null hypothesis; (b) state the decision made relative to this hypothesis; (c) identify whether the decision is at risk of Type I or Type II error.

An agronomist concludes that a new fertilizer has no effect on growth of carrots.
(a)   [1]

(b)   [1]
(c)   [1]

The President of Memorial University closes MUN based on a blizzard forecast.
(a)   [1]

(b)   [1]
(c)   [1]