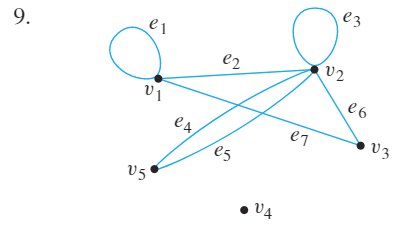
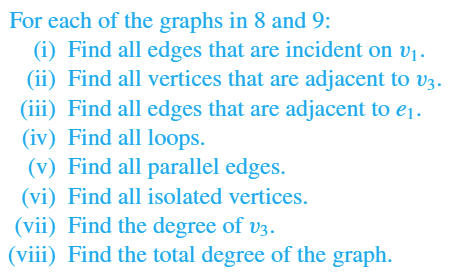
**Assignment 9 – Part 1  
Set 10.1 : 9, 27.b, 44 p668**



**9.i.)**

**9.ii.)**

**9.iii.)**

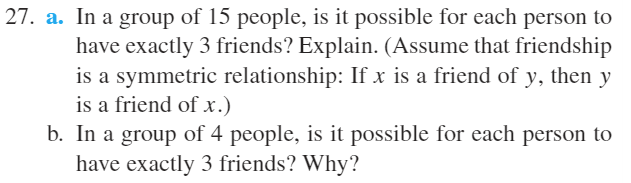
**9.iv.)**

**9.v.)**

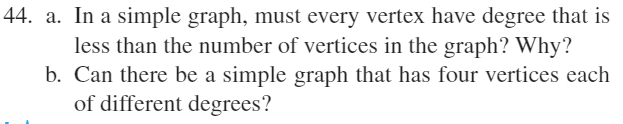
**9.vi.)**

**9.vii.)**

**9.viii.)**



**27.b.) Yes, a graph representing each person by a vertex and connecting two vertices by an edge if the corresponding people were friends. Such a graph would have 4 vertices, each of degree 3, for a total degree of 12. The total degree is even, which is what we need to show.**



**44.a.) Yes, the maximum degree will always be n-1, where n is the number of vertices in the graph.**

**44.b.) No**