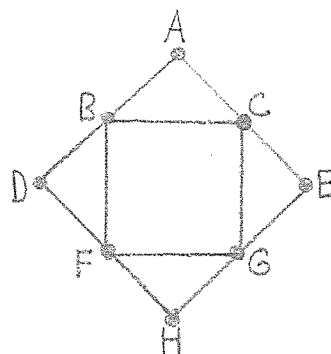
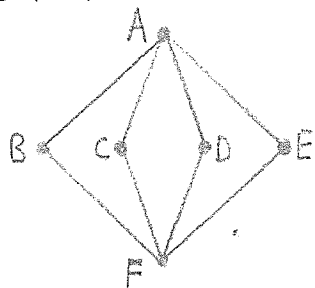
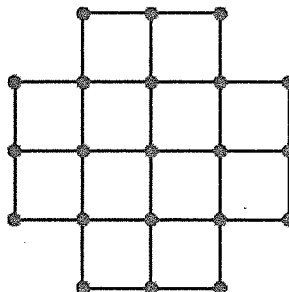
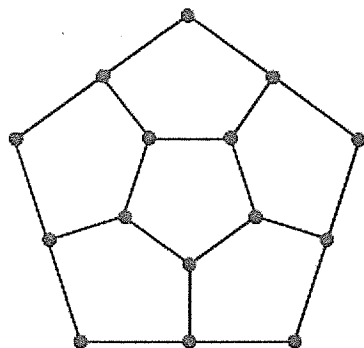
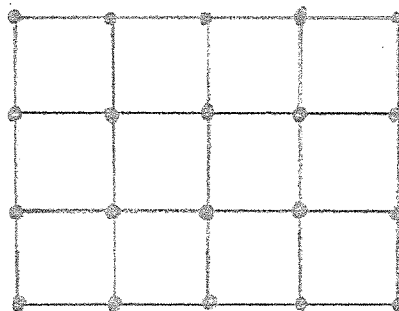
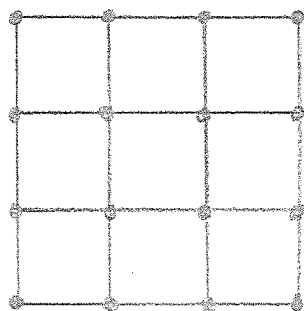
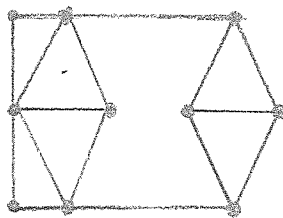
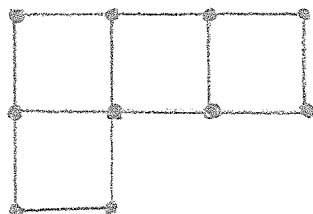


An Eulerian circuit of a graph is a list of vertices and edges that uses each edge exactly once so that consecutive vertices are adjacent (including the first and last). Find an Eulerian circuit in the following graphs (list the vertices starting with A).



Use Euler's Theorem to determine whether the following graphs have an Eulerian circuit. If not, solve the Chinese Postman Problem, determining the minimum number of edges that must be duplicated to Eulerize the graph. Draw the edges on the graph and explain why no fewer will suffice.



An Eulerian trail of a graph is a list of vertices and edges that uses each edge exactly once so that consecutive vertices are adjacent (NOT including the first and last). Determine which of the above graphs have an Eulerian trail.