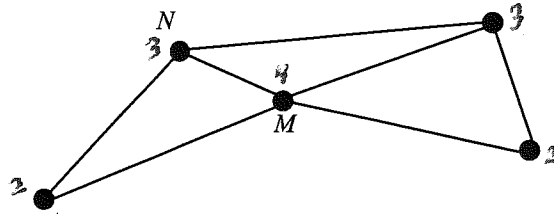


In a network, an edge is a straight or curved segment that connects two vertices. A vertex can be classified as either even or odd.

- A vertex is **even** if an even number of edges meet at that vertex.
- A vertex is **odd** if an odd number of edges meet at that vertex.
-

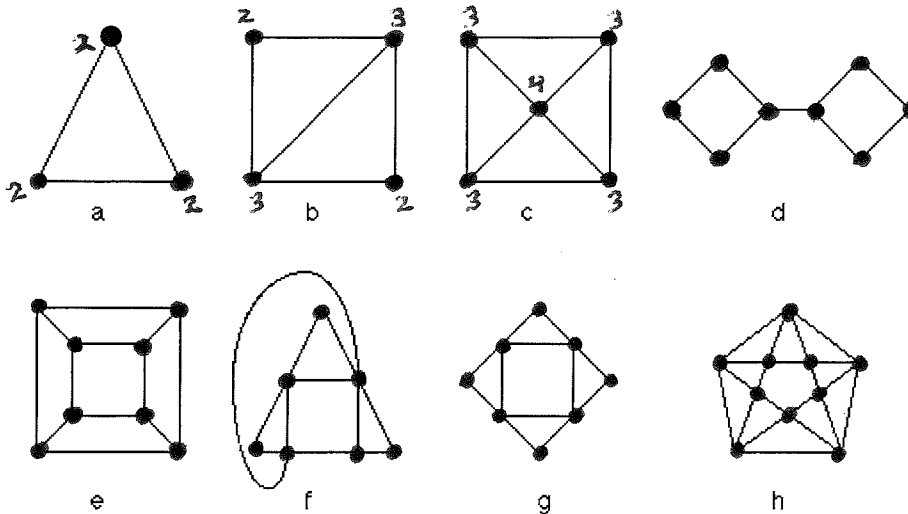
M is an **even vertex** since 4 edges meet at *M*.

N is an **odd vertex** since 3 edges meet at *N*.



In the following activity, you will see how Euler showed that there is no solution to the Konigsburg bridge problem. You will try to find a way to predict which networks are traversable and which networks are non traversable. You will also look for clues about the best place to start tracing.

- Place a point at each vertex. The first one is done for you.
- Circle all the odd vertices in the networks.
- For each network, count the number of odd vertices and the number of even vertices, then complete the table.



Network	# of even vertices	# of odd vertices	Traversable?
a	3	0	Yes
b	2	2	Yes
c	1	4	no
d			
e			
f			
g			
h			