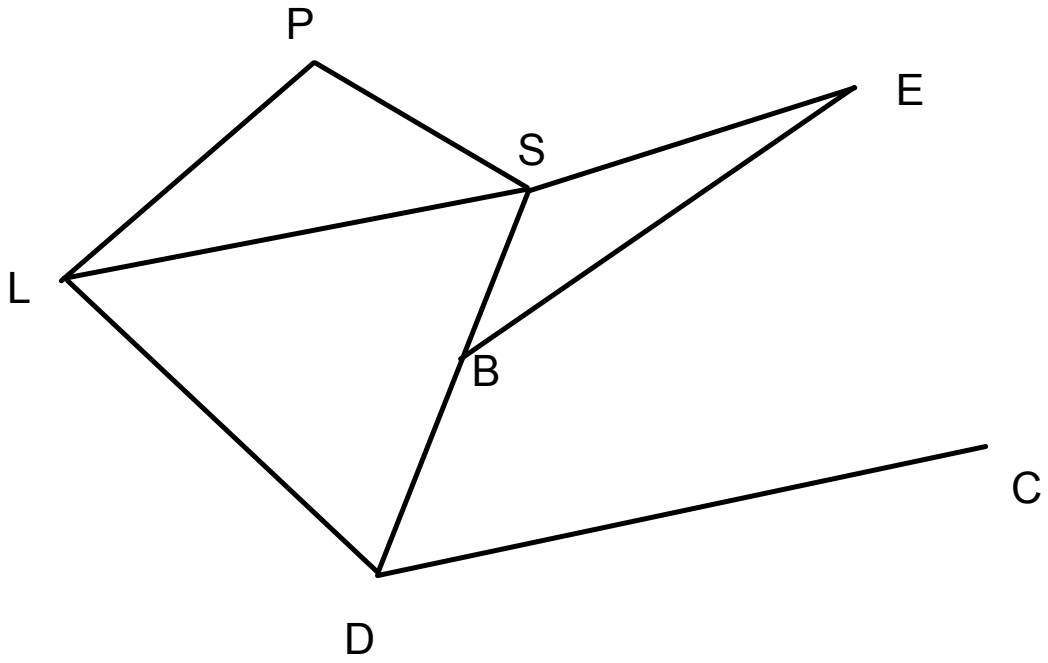
PATHS AND CIRCUITS
(CHAINS AND CYCLES)

Goal:

- to be able to identify a path or circuit
- to identify a simple path or circuit
- to identify a Hamiltonian path or circuit



1) EBSPLDC Not Euler path

HAMILTONIAN path

2) No

3) No Hamilton path starting in Santa Fe.

A *Hamiltonian path* passes through every **vertex** exactly once.

A *Hamiltonian circuit* starts and ends at the same vertex.

If the graph has any vertices with a degree = 1
you cannot have a Hamiltonian circuit.

A path or circuit is called *simple* if it does not repeat any edges.

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