



$$1. \quad \text{Graph with 2 nodes connected by a double-headed arrow} = 2 = 2$$

$$8. \quad \text{Graph with 3 nodes: one with self-loop and two others connected to it} = 2 \cdot 2 = 4$$

$$2. \quad \text{Graph with 3 nodes in a line, each with a self-loop} = 2 \times 2 = 4$$

$$9. \quad \text{Graph with 4 nodes in a square cycle, each with a self-loop} = 2 \cdot 2^2 = 8$$

$$4. \quad \text{Graph with 4 nodes in a line, the middle two each with a self-loop} = 2 \times 2^2 = 8$$

$$10. \quad \text{Graph with 5 nodes in a pentagonal cycle, each with a self-loop} = 2 \cdot 2^2 = 8$$

$$5. \quad \text{Graph with 3 nodes: one with self-loop and two others connected to it} = 2 \times 2 = 4$$

$$11. \quad \text{Graph with 4 nodes in a diamond shape, each with a self-loop} = 2^2 = 4$$

$$6. \quad \text{Graph with 3 nodes in a triangle, each with a self-loop} = 3! = 6$$

$$12. \quad \text{Graph with 4 nodes in a square cycle, the top-left node has a self-loop} = 2 \cdot 2 = 4$$

$$7. \quad \text{Graph with 3 nodes in a triangle, the top node has a self-loop} = 3! = 6$$

$$13. \quad \text{Graph with 5 nodes: one with self-loop and four others connected to it} = 2^2 \times 2 \times 2 = 16$$