

Updated Corrigendum/Explanation SFG 2025 Level 2 Test 14

Q.47) There was doubt raised in the Question regarding the final position of the drone.

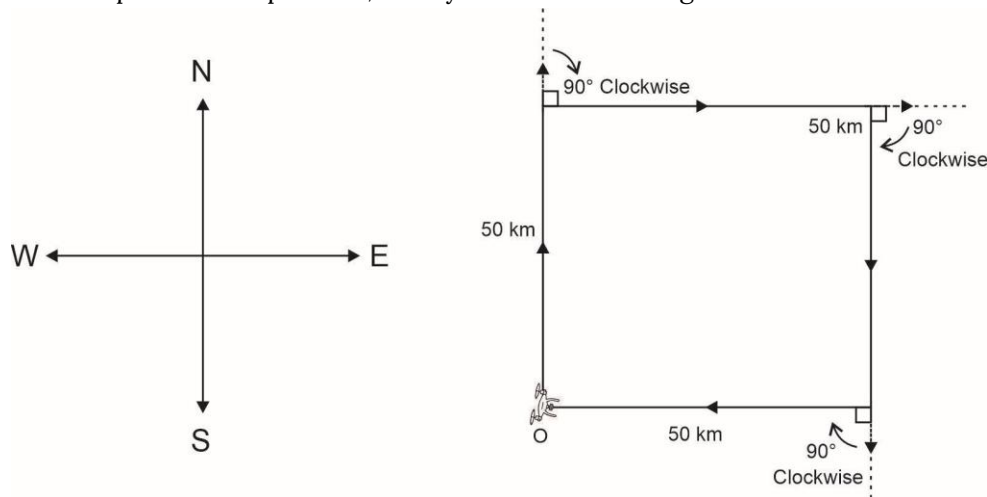
Exp) Option b is the correct answer. The Question gives the following manoeuvres for a drone facing east:

1. Flies 50 km due North
2. Turns 90° clockwise and flies 50 km
3. Turns 90° clockwise and flies 50 km
4. Turns 90° clockwise and flies 50 km

Drone facing east at point O does not mean here that the North with respect to the drone shifts east. A drone can face east or south and still fly north.

Cardinal Points i.e. (N-S-E-W) are taken as standard directions until given specifically in a question to consider otherwise.

With respect to the question, Kindly refer the below figure:



Initial Position (O): The drone starts at point O, facing East.

First Move: It flies 50 km North → New coordinates (0, 50).

Second Move: It turns 90° clockwise (East) and flies 50 km → New coordinates (50, 50).

Third Move: It turns 90° clockwise (South) and flies 50 km → New coordinates (50, 0).

Fourth Move: It turns 90° clockwise (West) and flies 50 km → New coordinates (0, 0), which is the starting point.

Conclusion:

- The drone returns to its original position.
- The straight-line distance from the starting point is 0 km.

Hence (b) Back at starting point (0 km away)