

Supporting File S7. Pre- and Post-assessment questions

Q1. p53 is considered a tumor suppressor protein because the action of this protein:

- a. facilitates progression to the next phase of the cell cycle.
- b. leads to cell cycle arrest.**
- c. activates DNA replication.
- d. causes mutations in DNA.

Q2. p53 is a transcription factor because it:

- a. is a signal.
- b. has a ligand-binding domain.
- c. has a DNA-binding domain.**
- d. can form a multi-subunit complex.

Q3. Which one of the following mutations that may result from inhaling Benzopyrene will NOT lead to a negative impact on cell division?

- a. Nonsense
- b. Missense
- c. Frameshift
- d. Silent**

Q4. Angiogenesis is important for metastasis of cancer cells because:

- a. it provides a mode of transport for the spread of the cells.**
- b. blood cells can become cancerous.
- c. it leads to the formation of new neural connections.

Q5. A mutation in CDK2 can affect its ability to:

- a. bind cyclin.
- b. phosphorylate Rb.
- c. bind E2F.
- d. A or B.**
- e. B or C.
- f. A or C.

Q6. A ----- mutation in the FAS receptor can affect its ability to -----.

- a. loss-of-function; activate exocytosis.
- b. loss-of-function; bind the death ligand.**
- c. gain-of-function; activate exocytosis.
- d. gain-of-function; bind the death ligand.

Note: Correct responses to the multiple-choice questions are in **bold**.