



Question Bank For PG Course

Zoology

Paper-7A

DEVELOPMENTAL BIOLOGY : PGZO-VIIA

Question 1

Where from *Drosophila* germ cells arise?

Question 2

Where the 'Nebenkern' structure is found?

Question 3

Which one is the major contributing gland or component in human semen formation?

Question 4

Mention the function of zona proteins.

Question 5

What is the cause of resting potential shift to positive level in egg membrane just after sperm entry?

Question 6

State two major limitations of IVF.

Question 7

Which gene product signal causes follicle cells to differentiate into dorsal morphology in *Drosophila* embryo?

Question 8

Give examples of two teratogenic drugs.

Question 9

What is 'spay-vac'?

Question 10

In absence of 20-hydroxyecdysone which protein binds to ecdysone responsive genes to prevent transcription?

Question 11

State an example of multipotent stem cells.

Question 12

Which maternal effect gene primarily express in a postero-anterior gradient to determine antero-posterior axis in *Drosophila*?

Question 13

What is the function homeotic genes in *Drosophila*?

Question 14

In which area of brain the neural stem cells exists?

Question 15

What are the transcription factors which maintain the characteristic pluripotency of inner cell mass (ICM) of mouse embryo?

Question 16

Where do primordial germ cells (PGC) migrate?

Question 17

In *Drosophila* sp. spermatogenesis which cell organelle form a dense ring surrounding nucleus during diakinesis?

Question 18

Where do we found poleplasm?

Question 19

Name one enzyme found in human semen which is produced in prostate gland.

Question 20

What is the function of ribonuclease in semen?

Question 21

Where the sperm mature and store in mammalian reproductive organ?

Question 22

What is the effect of 'resact' on sperm?

Question 23

In which phase mammalian sperm enter within the oocyte?

Question 24

Mention the year when first IVF baby was born.

Question 25

Which cells produce accessory egg membrane?

Question 26

Give example of an antimetabolic drug which has teratogenic effect.

Question 27

From where thyrotropin releasing hormone (TRH) releases?

Question 28

What is stadium?

Question 29

Give example of a terminally differentiated cell.

Question 30

In which part of Drosophila embryo do we find minimum hunchback gene expression?