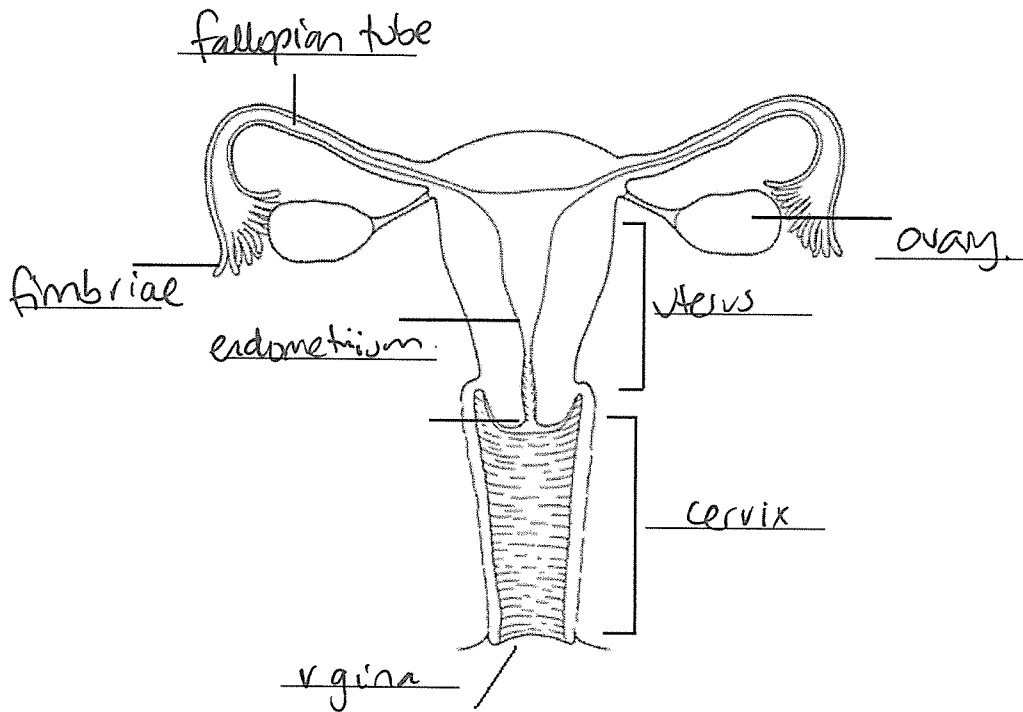


Name: Answer key

Mark: /93

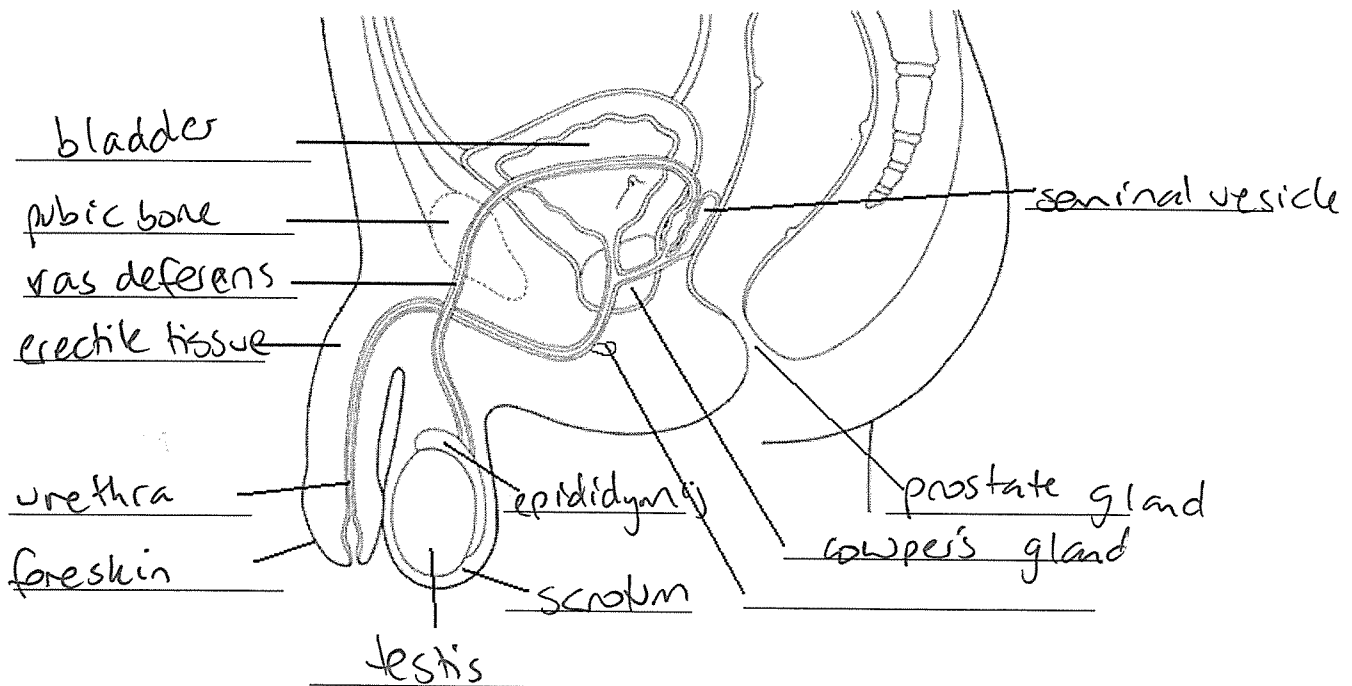
1. Label the diagram below.

(3 marks)



2. Label the diagram below.

(6 marks)



3. Fill in the table below.

(8 marks)

Structure	Function
Ovary	
Fimbriae	
Fallopian tube (oviduct)	
Uterus	
Vagina	
Testes	
Epididymis	
Urethra	

4. Fill in the table below on semen production

(8 marks)

Organ	Produces	Function of substance
Testes	Sperm	sex cell of male - fertilises egg
Seminal vesicle	fluid rich in sugars	gives sperm nutrients
prostate gland	Milky alkaline fluid	helps to activate sperm
cowper's gland	clear mucus	Acts as lubricant

5. Fill in the table below.

(6 marks)

	Number of gametes produced by meiosis	Do hormones cause meiosis to begin?	When does meiosis occur?
Oogenesis	1	Yes	While in foetus then pauses at prophase I and continues once puberty begins
Spermatogenesis	4	Yes	once puberty begins

6. What are polar bodies?

(1 mark)

cells with not enough cytoplasm

7. How do oogonia increase in number?

(1 mark)

mitosis

8. Where do the spermatids mature?

(1 mark)

epididymis

9. In what part of the body do embryonic stem cells differentiate into spermatogonia?

(1 mark)

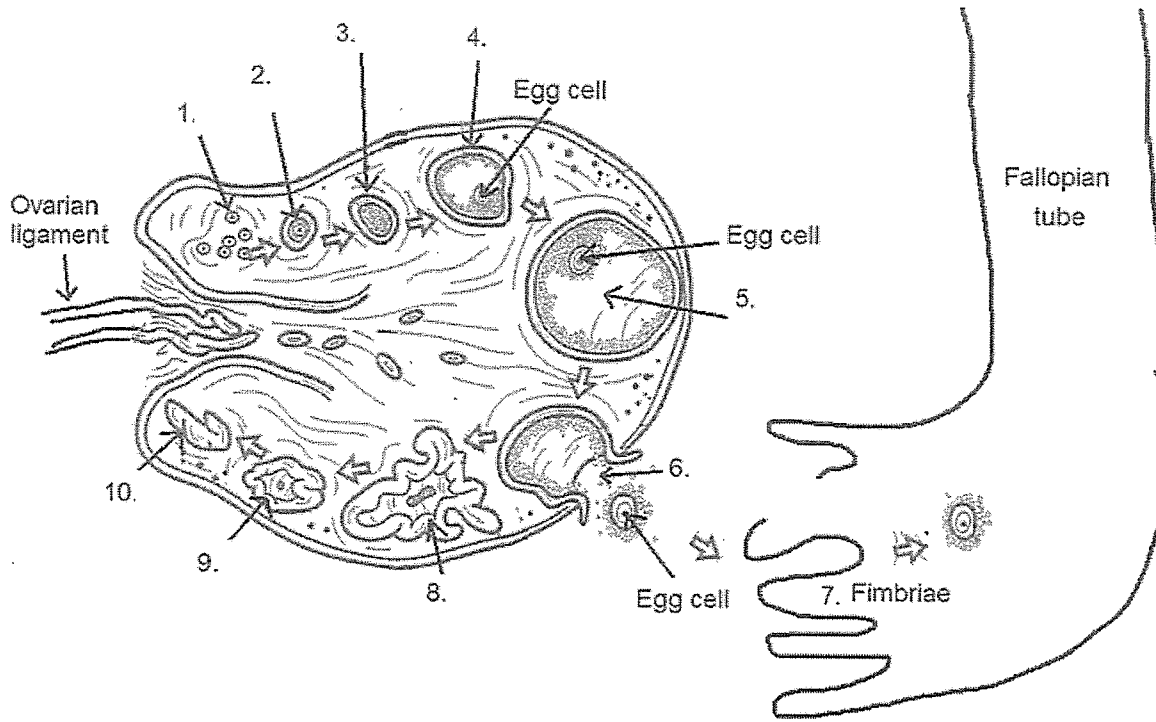
testes

10. Fill in the table of the menstrual cycle.

(15 marks)

Stage	Days	Events
menstruation	1-4	<ul style="list-style-type: none"> > uterine bleeds > shedding of endometrium
pre-ovulation phase	5-12	<ul style="list-style-type: none"> > endometrium repairs itself > Development of ovarian follicle <u>OR</u> Endometrium starts to thicken.
ovulation	13-15	<ul style="list-style-type: none"> > Rupture of mature follicle > Egg is released
secretion	16-20	<ul style="list-style-type: none"> > endometrium secretes watery mucus as well as fallopian tubes cervix > movement breakdown of unfertilised eggs <u>OR</u> Development of corpus luteum
pre-menstruation	21-28	<ul style="list-style-type: none"> > corpus uterum breaks down > Deterioration of endometrium

12. Using the diagram below, answer the following questions.



- What is the name of the structure labelled 2? Cell (1 mark)
- What is the name of the structure labelled 3? Primary follicle (1 mark)
- What is the name of the structure labelled 5? Mature follicle (1 mark)
- What process is occurring at label 6? ovulation (1 mark)
- What is the name of structure 8? corpus luteum (1 mark)
- What is the name of structure 9? corpus albicans. (1 mark)

13. List three secondary sexual characteristics that occur in females during puberty. (3 marks)

enlargement of breasts, growth of pubic hair, pubic hair becomes thicker, darker, curlier, hips broaden, voice becomes deeper, increased perspiration

14. List three secondary sexual characteristics that occur in males during puberty. (3 marks)

enlargement of penis, scrotum, prostate gland, growth of pubic hair, facial & chest hair, pubic hair becomes thicker, darker, curlier, shoulders broaden, deeper voice, increased perspiration, increased muscular development

15. What is the layer of follicle cells that surround the mature egg known as? (1 mark)

corona radiata

13. Fill in the table below.

(30 marks)

Full name of hormone	Where it is secreted from	In male or female?	Target organ	Effect of hormone
Follicle Stimulating Hormone	pituitary gland	both	seminiferous tubules of testes follicles of ovaries	<ul style="list-style-type: none"> > production of sperm > maturation of ovarian follicles
Human Chorionic Gonadotropin	placenta	female	corpus luteum	<ul style="list-style-type: none"> > maintenance of corpus luteum during early stages of pregnancy.
Luteinising hormone	pituitary gland	both	testes cells of ovaries	<ul style="list-style-type: none"> > stimulates secretion of testosterone > stimulates secretion of oestrogen & progesterone.
Oestrogen	ovarian follicle & corpus luteum	female	puberty changes.	<ul style="list-style-type: none"> > development of female reproductive system > development of secondary sexual characteristics
Progesterone	corpus luteum	female	uterus placenta breasts	<ul style="list-style-type: none"> > maintenance of endometrium > development & maintenance of placenta > development of milk secreting glands
Testosterone cells in testes testes	cells in testes.	male	puberty changes	<ul style="list-style-type: none"> > development of male reproductive system > development of secondary characteristics