

GUJARAT TECHNOLOGICAL UNIVERSITY**BE - SEMESTER-IV • EXAMINATION – SUMMER • 2014****Subject Code: 140301****Date: 23-06-2014****Subject Name: Life Science - II****Time: 10:30 am - 01:00 pm****Total Marks: 70****Instructions:**

1. Attempt all questions.
2. Make suitable assumptions wherever necessary.
3. Figures to the right indicate full marks.

- Q.1** (a) Explain the process of formation of urine. **07**
(b) Explain structure and function of skin. **07**

- Q.2** (a) Describe the anatomy of gastrointestinal track. **07**
(b) What is the composition of saliva? **07**
What are its functions?

OR

- (b) What is set point for temperature control and how the body temperature regulates in human body? **07**

- Q.3** (a) Name the phases of deglutition. **07**
Explain any one of them.
(b) Explain the movement of small intestine. **07**

OR

- Q.3** (a) What are the functional divisions of the cerebellum? **07**
Describe their functions with relevant connections.
Explain the signs of cerebellar dysfunction.
(b) Classify sensory receptors. **07**
Explain the properties of receptors.

- Q.4** (a) Describe the structure and functions of vestibular apparatus. **07**
(b) Explain the structure and function of muscle spindle. **07**

OR

- Q.4** (a) Explain the structure of male reproductive system. **07**
Q.4 (b) What is gametogenesis in female? **07**
Describe the function of placenta.

- Q.5** (a) Explain the anatomy of female reproductive system. **07**
(b) Explain the stages of spermatogenesis and factors influencing it. **07**

OR

- Q.5** (a) What is a hormone? **07**
Discuss its types, chemistry and control of secretion.
(b) Give clinical features and treatment for any five diseases caused due to abnormalities of thyroid secretion. **07**
