## SARDAR PATEL UNIVERSITY Programme: BSC (ZOOLOGY)

**Semester: IV** 

Syllabus with effect from: November 2012

Paper Code: USO4EZOO01	Total Credit: 2
Title Of Paper: Chordates, Physiology, Immunology & Ecology	Total Credit: 2

Unit	Description in detail	Weighting (%)
1	Type Study of Shark (Excluding Endoskeleton Arterial system & Venous	
	system)	
2	Human Reproduction:	
	Human male & Female reproductive organs	
	Spermatogenesis	
	Oogenesis	
	Puberty	
	Menstrual Cycle	
	Fertilization and devlopment	
3	Immunology:	
	Fundamental concepts, Innate & Cognate immunity, non specific immune	
	response. Cells of immune system - structure & functions.	
	Structure & functions of antibodyClasses & subclasses	
	Organization & structure of lymphoid organs	
4	Ecology & Environmental biology:	
	Ecosystem, Structural components of an ecosystem, Abiotic factors (Brief)	
	Temperature as abiotic factor detail (Temp. range, thermal stratification, temp.	
	tolerance, cold blooded and warm blooded animals, Effects of temp. on animals,	
	Adaptations to meet extreme of temp.	

## **Basic Text & Reference Books:**

- > Chordate zoology R.L. Kotpal
- > Chordate zoology H.C. Nigam
- > Chordate zoology Jordan & Verma
- > Textbook of physiology A.K.berry
- > Textbook of physiology vermal Aggrawal Tyagi
- > Immunology by Qube
- > Animals ecology M.P.Arora
- Ecology Verma, Agarwal
- Ecology P.D.Sharma

