

Department of Veterinary Parasitology, College of Veterinary Science & A.H., Junagadh Agricultural University, Junagadh is going to organize a **Five Days Vocational Training** on “**New Approaches and OMICS Tools for Identification and Control of Ticks and Tick-Borne Diseases**” during 18th – 22nd November, 2019. The training is being organized under aegis of Institutional Development Plan, Indian Council of Agricultural Research, New Delhi. Around 140-145 delegates and students from host institutes, teachers and faculties are to be expected to participate in the event which shall focus on “advance diagnosis and control of ticks and tick-borne diseases (TTBDs)”. The TTBDs are considered as great threat to animal and human health in changing global climate. Recent reports of tick-borne disease, Crimean-Congo Hemorrhagic Fever (CCHF), outbreak in Gujarat especially peripheral district of Junagadh warn us to be ready to tackle the problem. The programme shall also have the feature of hands-on-training, practical demonstrations, videos, problem-solving and panel discussion by experts with students on various areas of “ticks and tick-borne pathogens management”. Eminent speakers from National institutes like ICAR-IVRI, Izatnagar; ICMR-NIRTH, Jabalpur; TANUVAS, Chennai; GADVASU, Ludhiana; KVASU, Kerala; MAFSU, Nagpur and other SAU’s from Gujarat will deliver talks on issues related to the theme during the training.

### **Programme List**

Five Day Vocational Training on  
**“New Approaches and OMICS Tools for Identification and Control of Ticks and Tick-Borne Disease”**

Under **Institutional Development Plan**

**18<sup>th</sup> to 22<sup>nd</sup> November, 2019**

Department of Veterinary Parasitology, College of Vet. Science & A.H., J.A.U. Junagadh- 362001

18-11-2019	Registration and Breakfast: 8:00 to 9:00	
	Inaugurated Function : 9:00 to 10:30	
	10:30 to 11:00 Tea Break	
	11:00 to 12:30	Importance of ticks and possible strategy for the sustainable control of ticks on domestic animals in Indian situation.
	12:30- 14:00 Recess	
	14:00 to 15:30	Application of OMICS tools and techniques in identification and characterization of ticks.
	15:30 to 15:45 Tea Break	
	15:45 to 18:00	Global distribution of ticks with special reference to India and its morphological identification.
19-11-2019	09:00 to 10:30	Different kinds of acaricides, its doses, mechanism of actions, methods of application and limitations.
	10:30 to 11:00 Tea Break	
	11:00 to 12:30	Acaricide resistance, mechanism and methods of investigation.
	12:30- 14:00 Recess	
14:00 to 15:30	Herbal acaricides: past, present and future research and development	

		prospects and use at field level.
		15:30 to 15:45 Tea Break
	15:45 to 18:00	Hands-on training on: Isolation of DNA, its quantification and analysis through spectrophotometer and electrophoresis
20-11-2019	09:00 to 10:30	Integrated control of ticks with special reference to anti-tick vaccine
		10:30 to 11:00 Tea Break
	11:00 to 12:30	Tick-borne diseases of livestock and its diagnosis through PCR techniques
		12:30- 14:00 Recess
	14:00 to 15:30	Demonstration of various methods (LPT, AIT and PCR) for the detection of acaricide resistance in ticks.
		15:30 to 15:45 Tea Break
	15:45 to 18:00	Hands-on Training: Polymerase chain reactions (PCR) for the identification of ticks and tick-borne pathogens.
21-11-2019	09:00 to 10:30	Application of sequencing techniques and OMICS tools in identification and control of diseases
		10:30 to 11:00 Tea Break
	11:00 to 12:30	Application of qPCR/Real time PCR in research and diagnosis of Parasitic Diseases
		12:30 to 14:00 Lunch box
	14:00 to 15:30	LAMP test: a field based low cost molecular diagnostic assay for haemoprotozoan parasites
		15:30 to 15:45 Tea Break
	15:45 to 18:00	Demonstration of LAMP test for the diagnosis of tick-borne pathogens
22-11-2019	09:00 to 11:00	Visit of biotechnology laboratory
		10:30 to 11:00 Tea Break
	11:00 to 12:30	Parasite diagnostic and vaccine design: Current state of the art and future of genome-enabled technologies
		12:30 to 14:00 Lunch box
	14:00 to 16:30	Demonstration of Real Time PCR for the diagnosis of tick-borne diseases
		16:30 to 17:00 Tea Break
	17:00 to 18:00	Feedback and Plenary Session