



## **MAHATMA GANDHI INSTITUTE OF MEDICAL SCIENCES, SEVAGRAM**

### **Activities of Students exposed to learning resources such as Laboratories, Animal House & Herbal Garden**

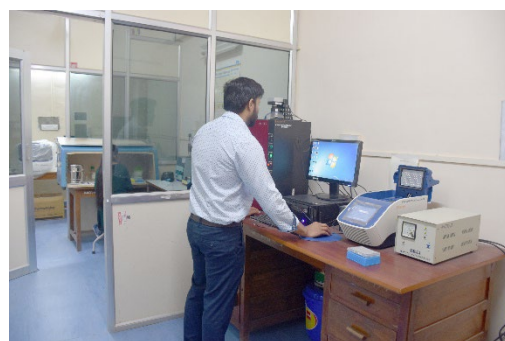
All students have access and exposure to laboratories of their assigned subjects where they are posted as per guidelines of the regulatory bodies. Practical sessions are built in to the time table. All laboratories are modern, state-of-the-art and consist of all equipment required for teaching and research.

#### **LIST OF LABORATORIES:**

##### **Undergraduate Student practical laboratories:**

1. Dept of Anatomy
2. Dept of Physiology
3. Dept of Biochemistry
4. Dept of Pathology
5. Dept of Microbiology
6. Dept of Pharmacology
7. Dept of Forensic Medicine and Toxicology
8. Dept of Community Medicine

##### **Dept of Anatomy**



## Dept of Physiology



## Dept of Biochemistry



## Dept of Pathology



## Dept of Microbiology



## Dept of Pharmacology



## Dept of Forensic Medicine and Toxicology



### Specialized laboratories accessible to Postgraduate students and students conducting research projects

Each postgraduate student is exposed to different laboratories on rotation basis as per University guidelines. Besides these, they carry out their dissertations in specialized laboratories. PhD students from our institute and external candidates also come to use our research laboratories

Sr. No.	Department	Specialized laboratories
1	Dept of Anatomy	Cytogenetics laboratory
		Histology laboratory
		Molecular laboratory
2	Dept of Physiology	Clinical Physiology laboratory
		Haematology / Amphibian Laboratory
		Mammalian / Sports laboratory
		Reproductive Biology Laboratory
		Neurophysiology Laboratory
		Sleep Laboratory

3	Dept of Biochemistry	Clinical biochemistry laboratory
		Research Laboratory
		Student Practical Laboratory
4	Dept of Pathology	Histopathology Laboratory
		Cytology Laboratory
		Hematology Laboratory
		Coagulation and Serology Laboratory
		Research laboratory
		Clinical Pathology Laboratory
5	Dept of Microbiology	Bacteriology Laboratory
		Mycobacteriology (TB )Laboratory
		Mycology Laboratory
		Serology /Parasitological/Immunology laboratory
		Virology / BSL3 Laboratory
		PG Laboratory
		Student laboratory
6	Dept of Pharmacology	Research Laboratory
		Pharmacy Laboratory
		Experimental Pharmacology Laboratory
		Clinical Pharmacology Laboratory
7	Dept of Forensic Medicine and Toxicology	Toxicology Laboratory
8	Dept of Community Medicine	Public Health Laboratory
9	OPD	Common Collection Central Laboratory
10	Dept of ENT	Temporal bone dissection Laboratory
11	Dept of Obst & Gynaecology	Central Lab

## ANIMAL HOUSE

The Animal House in the Department of Biochemistry is home to the National Repository for Filarial Parasites & Reagents, a facility supported by the Department of Biotechnology, Ministry of Science & Technology, Govt of India. This facility includes rare filarial animal models: mastomys & jirds, maintained in a CPCSEA registered animal house, an insectarium for breeding and maintenance of Aedes aegypti mosquito vector.

**1. Available Area in sq.ft:** 1175 sq.ft.

**2. Available Facilities:**

It consists of one complex with 3 rooms housing three animal species Mastomys and Jirds which are used as a model for maintaining filarial B. malayi infection and also for testing vaccine and drug candidates. BALB/c mice are being used as a model for auto-immune and other diseases. One room as insectariums where B. malayi larval infection cycle is maintained in mosquitoes and one room each for general purpose and storage. Building is equipped with



centralized cooling for animals, room heaters and electricity and water facility is provided by the institute. Sterilization facility required is also provided by the institute.

**3. Name of available Instruments:** Two dissection microscopes and one Bayer's apparatus.

4. Records of Stock book: Maintained regularly.

5. Records of work carried out: Maintained regularly.

Students of Biochemistry, Microbiology and Pharmacology who are working on animal models in research use these facilities.

## **HERBAL GARDEN**

Arogyadham is an integrative health care and research project of Kasturba Health Society created on the medical campus for promotion of positive health. It has a naturopathy / yoga treatment –cum- propagation centre and is supported by the Central Council for Research in Yoga & Naturopathy, Dept. of AYUSH.

The centre takes care of preventive and curative aspects of health care in chronic ailments such as hypertension, back pain, bronchial asthma, diabetes etc. with naturopathy and Yoga. Arogyadham also has Kasturba Nisargopchar Kendra equipped with nature cure facilities with specialization in holistic life style management, walkways, cottages for short stay, canteen with vegetarian health food, yoga and pyramid meditation hall, spiritual library with number of health and spiritual books and magazines, audio-visual and recreation facilities for the benefit of residents. In addition, nature park with accu-pebbles walk track with serene herbal garden, simple cottages with solar water heaters for comfortable stay have been established. Nature cure facilities namely hydrotherapy (steam bath, spinal bath & spray, hip bath, packs etc.), massage, vibratory massage, mud therapy, colour therapy with chromothermoleum, yoga therapy, acupressure, diet therapy etc. have been well established at the Arogyadham campus in 24 cottages constructed with financial support from Smt. Aparna Ben Trivedi.

Work of the wasteland development of about 220 acres behind the institute was started on 2 Oct 2002 and developed into Arogyadham with Herbal Garden (Aonla – Medicinal plants), with the help of Jain Charities through JISL. Water is brought by a 5-6 Km pipeline from Pawnar river. Presently medicinal plants such as aonla (22000), ritha (50), karanj (103), neem (292) in addition to ashoka (155) and custard apple (105) plants are grown. A team of 26 investors from USA, UK, Canada etc. visited the Herbal (Aonla) Garden, Arogyadham, MGIMS on November 18, 2010 and also a rural village nearby Sevagram. The intercrops in between aonla plants will help in prevention of growth of weeds and thus easy maintenance of Aonla medicinal plants. Pre monsoon cotton and onion seeds are taken as intercrops in between Aonla plants. This year, 50 Nagpur mandarin orange saplings have been planted.