

Raipur (Chhattisgarh)

This field unit was opened in 2006 with the following objectives:

- Role of malaria in pregnancy
- Study of malaria transmission dynamics
- Clinical drug trials
- Geographic Information System (GIS) for planning malaria control

Background

Chhattisgarh state was created in 2000 out of the erstwhile Madhya Pradesh state. The state is divided into 16 districts and has a population of about 20.8 million of that about one-third are tribals. About 45% of the land is under tropical moist deciduous and tropical dry deciduous forest on the Eastern Plateau. The central plateau is mainly plain interspersed with rivers and rivulets. Main crop is paddy, cultivated during the monsoon season. Primarily due to its large tribal population the state has historically not been a part of the mainstream and has therefore remained underdeveloped. Critical indicators for education and health have remained low and the tribals have poor perceptions about malaria.

Due to varied ecological conditions and geography, the problem of diseases like malaria has been show-



Fig. 1: Dr. Krishnamurthy Bandhi, Hon'ble Health Minister, Govt. of Chhattisgarh inaugurating the IDVC field unit at Raipur

ing a distinctive pattern and bulk of the burden is borne by the tribal forested area in the North and the South. Malaria has been the major health problem in the state. In 2005, Chhattisgarh contributed 10% of the total malaria cases and 18% of *P. falciparum* cases reported in the country. As per the available data on malaria from 2001 to 2005, the central part of the state, represented by eight districts (61% of the state's population) report low to moderate incidence of malaria.

There is very little information on the transmission dynamics of malaria in Chhattisgarh. A field unit of IDVC project under the administrative control of NIMR, Delhi has been opened at Raipur, Chhattisgarh in consultation with the Directorate of NVBDCP. The unit was inaugurated by the Hon'ble Health Minister of Chhattisgarh on 2nd April 2006 in presence of the Director General, ICMR, Director of the National Institute of Malaria Research and state government officials (Fig. 1).

Raipur unit will conduct epidemiological studies to understand the dynamics of malaria transmission and develop appropriate intervention strategies. It is also proposed to undertake studies on hemoglobinopathies, role of nutrition in malaria. A comprehensive action plan would be developed for mothers and children so as to reduce infant mortality rate due to malaria. Mapping of malaria vectors and drug resistance, evaluation of antimalarial combination therapy, development of early warning system, monitoring of insecticide quality and vector susceptibility, etc. would be undertaken on priority.

The field unit will also provide support in malaria situation analysis, planning and evaluation of the ongoing vector-borne disease control programme, training of staff and generating community awareness through information, education and communication activities.

Mandate

1. Malaria transmission dynamics in the forested and plain ecosystems of Chhattisgarh state.
2. Studies on the role of genetic markers in malaria in various tribal communities in the forested areas of Chhattisgarh state.
3. Geographical reconnaissance of mosquito breeding habitats in Raipur City with particular reference to vectors of malaria, filariasis and dengue and develop an effective mosquito control action plan.
4. Stratification of Chhattisgarh state for planning situation-specific malaria control.
5. Evaluate and develop appropriate interventions against malaria and other vector-borne diseases.
6. Clinical trials with new antimalarial or combination drugs.
7. Study of the role of malaria in pregnancy.
8. Monitoring of antimalaria activities at various levels (village, PHC, CHC and district) and evaluation of efficacy of ongoing vector control activities — indoor residual spraying of insecticides and insecticide treated mosquito nets.
9. Assistance in training and IEC activities.

