Empowering Health Workers Using Health Information System Project (HISP)at Community Level : A Challenge – A Case From Indian Scenario

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Background Information - HISP

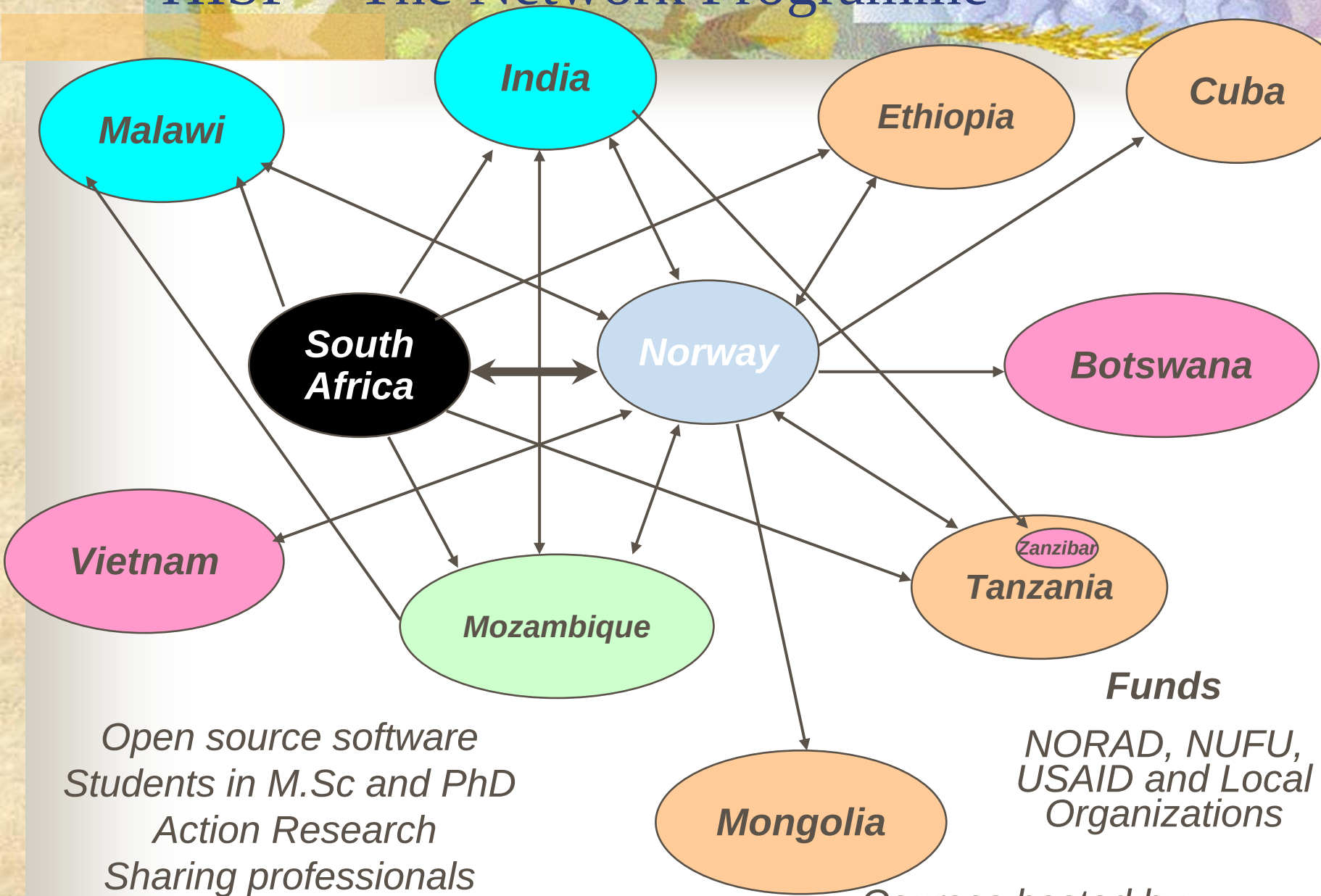
- **Genesis of HISP**

›1994 - Started in South Africa by a group of researchers at Dept of Informatics, University of Oslo,in collaboration with Universities of South Africa and health authorities.

› 1998 - Initiated in Mozambique, Malawi, Tanzania, Cuba, Mongolia and Ethiopia.

› 2000 – HISP in India

HISP – The Network Programme



Open source software
Students in M.Sc and PhD
Action Research
Sharing professionals
HMIS courses for health workers

Funds

NORAD, NUFU, USAID and Local Organizations

Courses hosted by local Universities

Rationale for initiating HISP in India and in other developing countries…

- The delivery and management of health services to deprived communities and regions is a truly complex task.
- Health Sector is highly hierarchical and bureaucratic
- Health Workers who are mostly females at the cutting edge level are marginalised with little or no opportunities for accessing IT learning.
- More pressure on HWs for large volume of data collection
- No feedback from higher authorities resulting in redundant, poor quality of data, no indicators and no information culture.
- Result: Deterioration in functioning of PHCs

Justification for HISP in India

- To strengthen information management practices within the Primary Health Care (PHC) sector with the goal to improve more effective health delivery to the rural community.
- Rationalization of data collection, computerization of information flows from the PHCs to Districts to State,
- Developing tools for analysis,
- Creating an Information Culture(use of information)
- Training of health care workers (women) on computers, DHIS SW, Use of Information etc.

Favorable context for introducing HISP in India and in state of Andhra Pradesh.

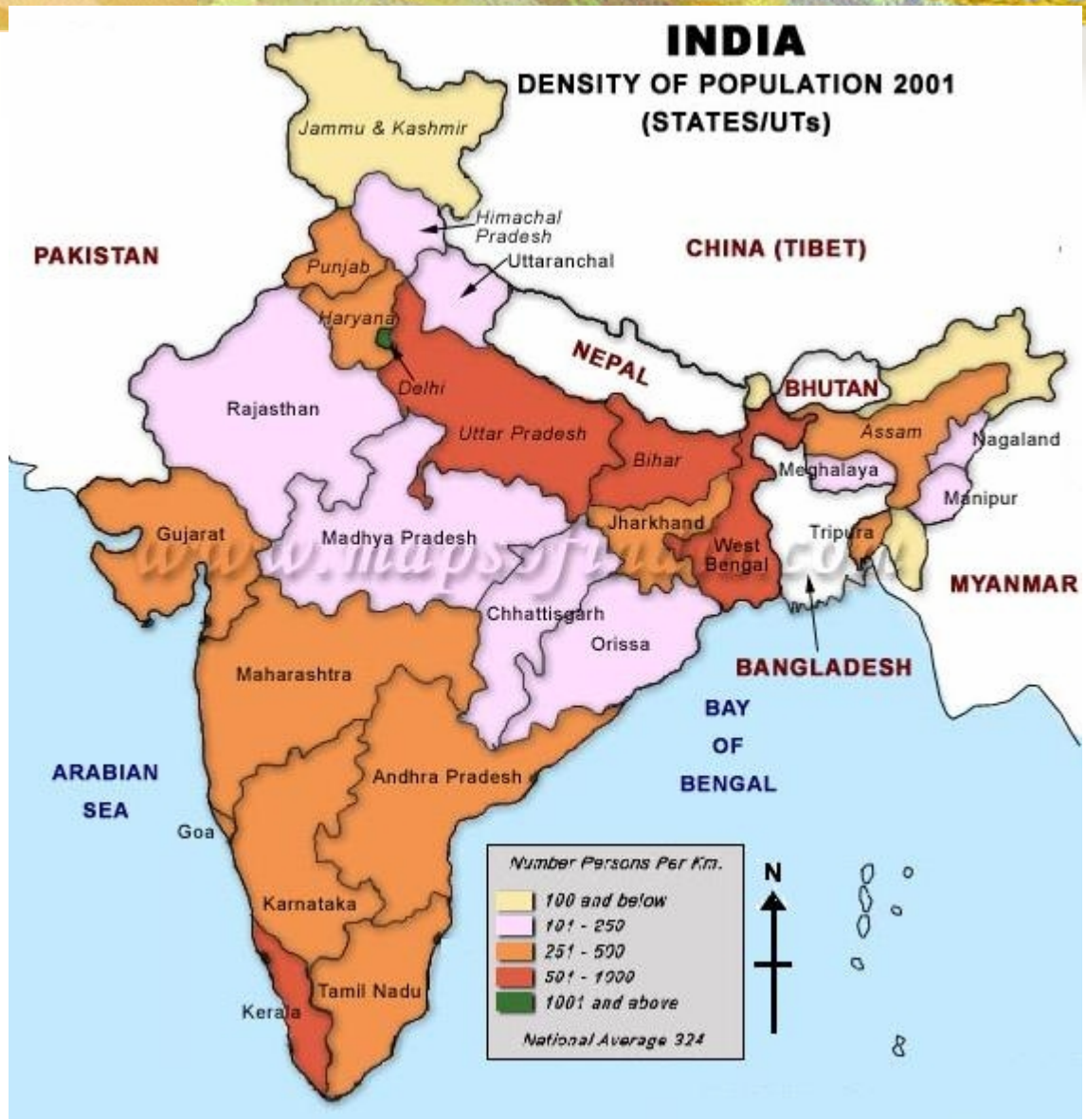
- The ICT policies initiated in 1980s provided a favourable clime for the states to take a proactive role in the growth of IT industry

- Policies focused on the key issues of infrastructure, electronic governance, IT education

Favorable context for introducing HISP in India and in state of Andhra Pradesh (contd..)

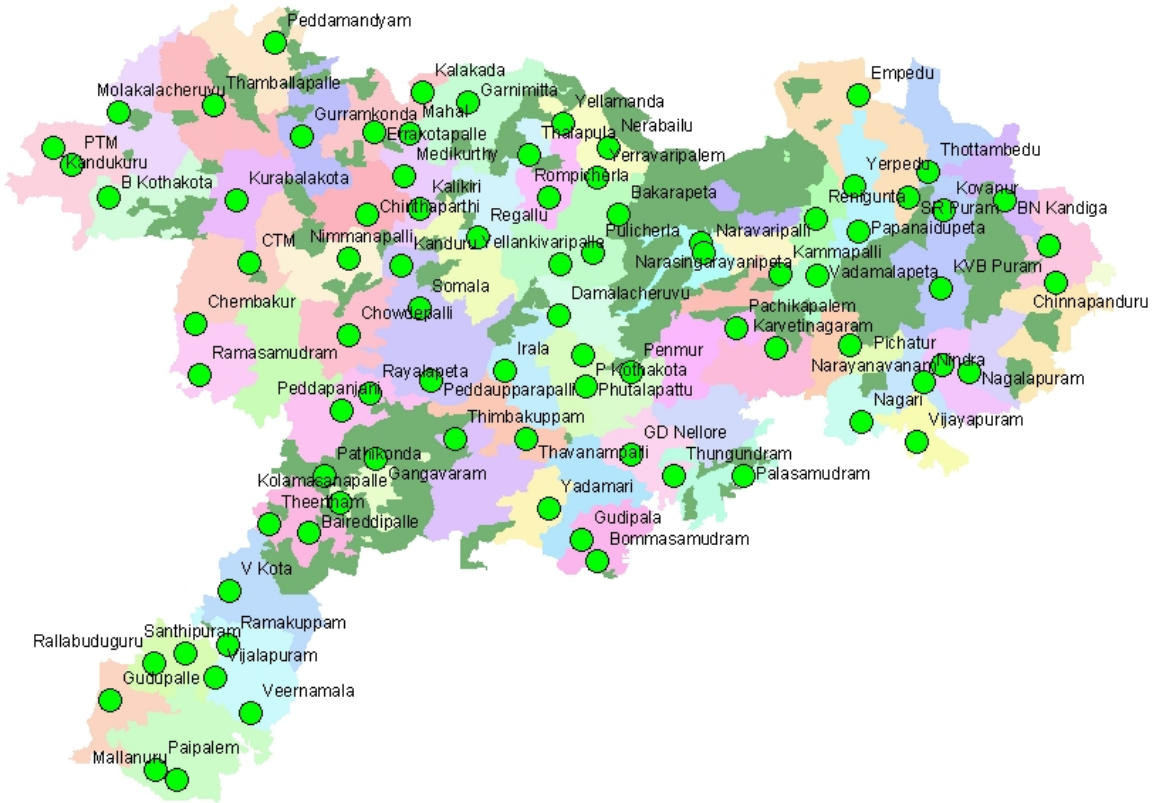
- HISP was initiated in the broad context of “e-governance” that was on-going in Andhra Pradesh, India.

- As a result of it HISP was integrated with on-going e-governance initiatives in AP –TWINS,CARD,APSWAN etc


INDIA
DENSITY OF POPULATION 2001
(STATES/UTs)
Jammu & Kashmir
Himachal Pradesh
Uttaranchal
PAKISTAN
CHINA (TIBET)
Punjab
Haryana
Delhi
NEPAL
BHUTAN
Rajasthan
Uttar Pradesh
Bihar
Assam
Nagaland
Meghalaya
Manipur
Jharkhand
Tripura
Gujarat
Madhya Pradesh
West Bengal
MYANMAR
Chhattisgarh
Orissa
Maharashtra
BANGLADESH
BAY
OF
BENGAL
ARABIAN
SEA
Andhra Pradesh
Goa
Karnataka
Tamil Nadu
Kerala
Number Persons Per Km.
100 and below
101 - 250
251 - 500
501 - 1000
1001 and above
National Average 324
N

Andhra Pradesh

Chitoor District



Implementation of HISP in Andhra Pradesh,India

- 2001 –Situation Analysis

a. Primary Health care sector is the main interface between community & health sector is:

»Fragmented,no cohesion between various health departments

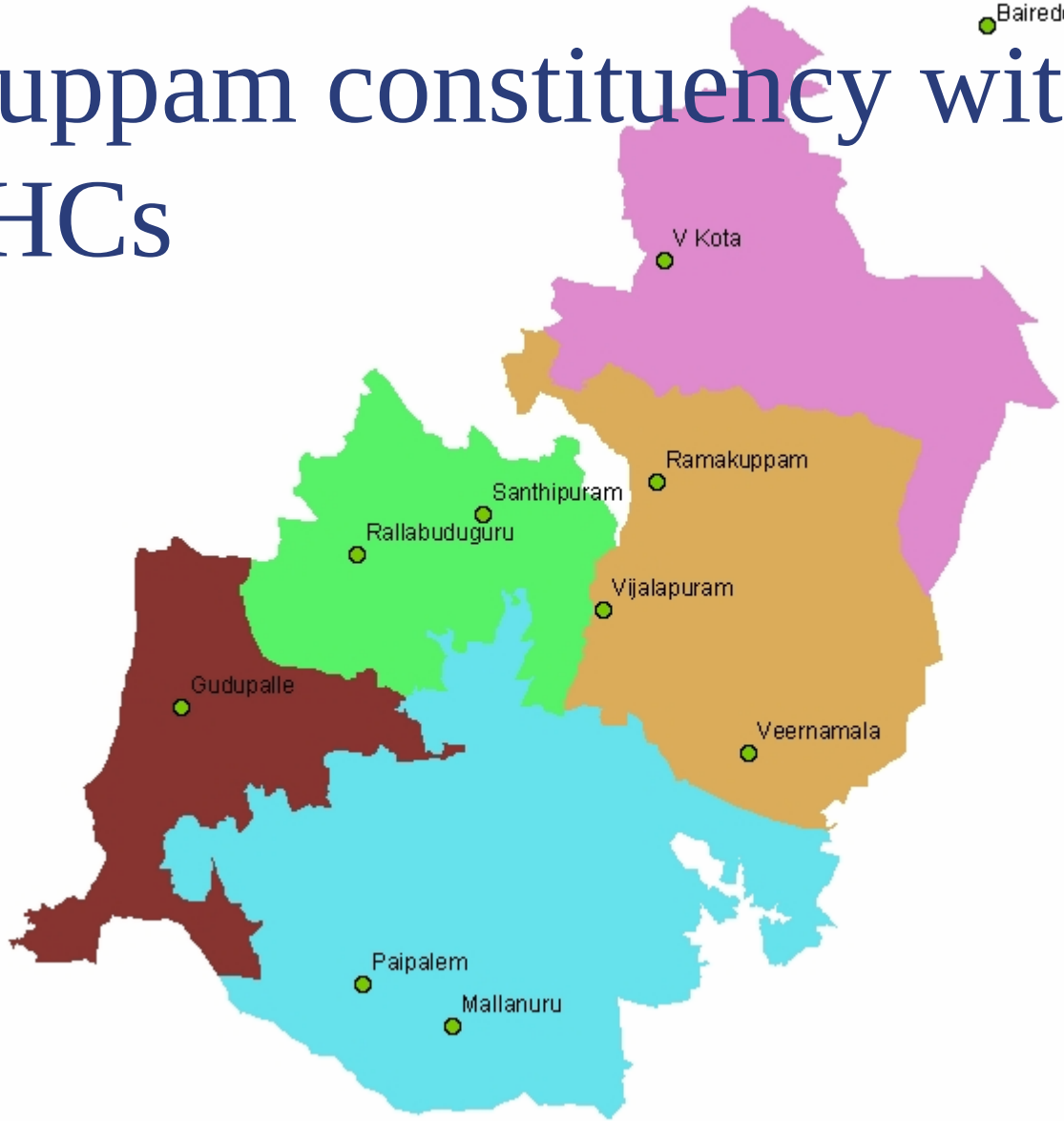
» Extensive, duplicate,redundant and poor quality data collected by frontline health workers sent vertically upwards.

» Data is aggregated at all levels thus masking the conditions at the peripheral areas

» No analysis, information is used minimally and no feed back from higher authorities.

» Health workers are under heavy pressure for achieving irrational targets relating to important Performance Indicators- neglect their prime duty(providing health care) and no means to enhance or equip with addl technological skills.

Kuppam constituency with 9 PHCs



Health Workers Entering Data in Registers Manually Before Using ICT

HISP Implementation –Andhra Pradesh Pilot Phase(Sept 2001-Aug2002)

- 9 PHCs were selected in Kuppam
- Main targets of training – MPHAs at the grass root level along with medical officers and other para professional health staff.
- Training – An iterative Process
- On-site & off-site training strategies
- Training on use of information
- Training - Participatory Process
- Data entry by MPHAs and MPHS(mostly women)

What is Empowerment?

- (i)Creating an environment through positive economic and social policies for full development of women to enable them to realize their full potential

(ii) Women's equality in power sharing and active participation in decision making, including decision making in social, economic and political process at all levels will be ensured for the achievement of the goals of empowerment.

(contd..)*What is Empowerment?*

- **iii)** Equal access to women to health care, quality education at all levels, career and vocational guidance, employment, equal remuneration, occupational health and safety, social security and public office etc.
- **(iv)** Strengthening legal systems aimed at elimination of all forms of discrimination against women
- **(v)** Changing societal attitudes and community practices by active participation and involvement of both men and women.

Empowerment – One of the Objectives of HISP

- Improving the processes of health Information transactions and the development of capacity of Health Workers to deal with information and computers can help to provide a sense of empowerment and commitment to the health workers.

- This in the long run will no doubt contribute towards improving the quality of health delivery to the community.

Strategies Adopted for Empowering HWs in ICT

- On-Site Training
- Off-Site Training
- Use of Information

Multipurpose Health Assistant(ANM) learning to work on Computers and on DHIS

Health Staff undergoing Training on Computers and on DHIS

Training for Health Workers on Data Analysis and Use of Information.

Training for Health staff on Use of Information

Institutionalisation of HISP in Kuppam

- Based on the initial success,enthusiasm and interests of health staff permission was granted from Commissioner of FWD to institutionalise HISP in Kuppam.
- Health staff got trained both to enter health data in the DHIS application and make use of the information.
- Routine reports were computerised for generating from DHIS Software.
- Training was imparted to health staff on generation of reports .

Health Staff Entering Monthly Data and Generating Reports Using DHIS

Health staff along with medical officer generating reports using DHIS

Challenges in sustaining the interests and active participation of Health Workers in ICT

- *Social Reasons:* Caste, Gender,Age, Social & internal politics, power dynamics
- *Economic Reasons*: Class
- *Political & Bureaucratic Issues:*Constant transfer of the staff, lack of infra-structure, camps & targets, inadequate staff, remoteness & distance, Parallel system(FHIMS), political complexities, lack of attention to the information needs

Multi-Purpose Health Supervisor based at PHC working on DHIS

In-spite of all the challenges, is the process sustainable?

- No compulsion on computerised reports & as a result parallel system exists (manual reporting)
- FHIMS initiated by GoAP is made compulsory for data entry - Political complexity
- Data Processing officers are temporarily appointed for FHIMS making HWs take a back seat in using computers.
- Social and internal politics along with power dynamics thwarts the process of empowering grass root HWs who are mostly women.
- Health staff at PHCs have to report the targets (16 performance Indicators) achieved which in reality were irrational.
- Challenge of generating reports with the actual data entered in DHIS

Contd….

- Manipulation of data was impossible in DHIS.
- No option to generate empty formats of the reports from DHIS so that figures could be filled manually.
- Refused to face the wrath of higher authorities and bring down the rank of their institutions in evaluation.
- Higher authorities refused to change and fix the targets(PIs) based on reality.

Stark realisation of health staff…

- Computerised reports designed with their participation did not allow them to manipulate the data as they had been accustomed to doing.
- As a result, number of health staff generating reports using DHIS dwindled
- Motivation is continuing from implementation team for users to use the application and support their demand with the information for higher authorities to reset the targets.

Motivation by HISP Team Members to Health Staff

Implications

- While users at the grass root level enjoyed the benefits of using computer & DHIS application by their participation in the programme.

- Users at the higher levels of the health system did not participate in the implementation of Health Information System programme by not joining in the common understandings of fixing rational targets related to performance Indicators and not completely accepting /owning the system

Implications….

- DHIS mainly meant to mainstream the IS was not able to fulfill its objective

- The staff at the field level have reverted back to manual systems of collecting, collating and creating manual reports.

Health Workers Collating Data Manually

Dilemma….

- *How to overcome the political and social challenges that pose as threat or constraints while implementing the ICT programmes and need solutions for making the above programmes sustainable?*