Parallel Cross-sectoral Working Groups

Framing the Context: ICT-enabled Health Systems

-- a Luxury, an Option, or a Necessity?

Experience from Bangladesh

UHC Indicators?
Digital Health Strategy?

Manila, December 2

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We are here

Not because

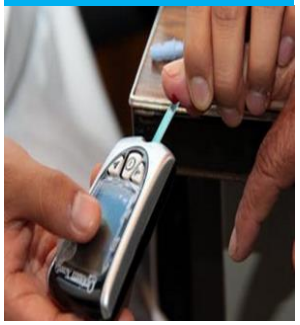
We are not using ICT in our health sector

We are here

Because

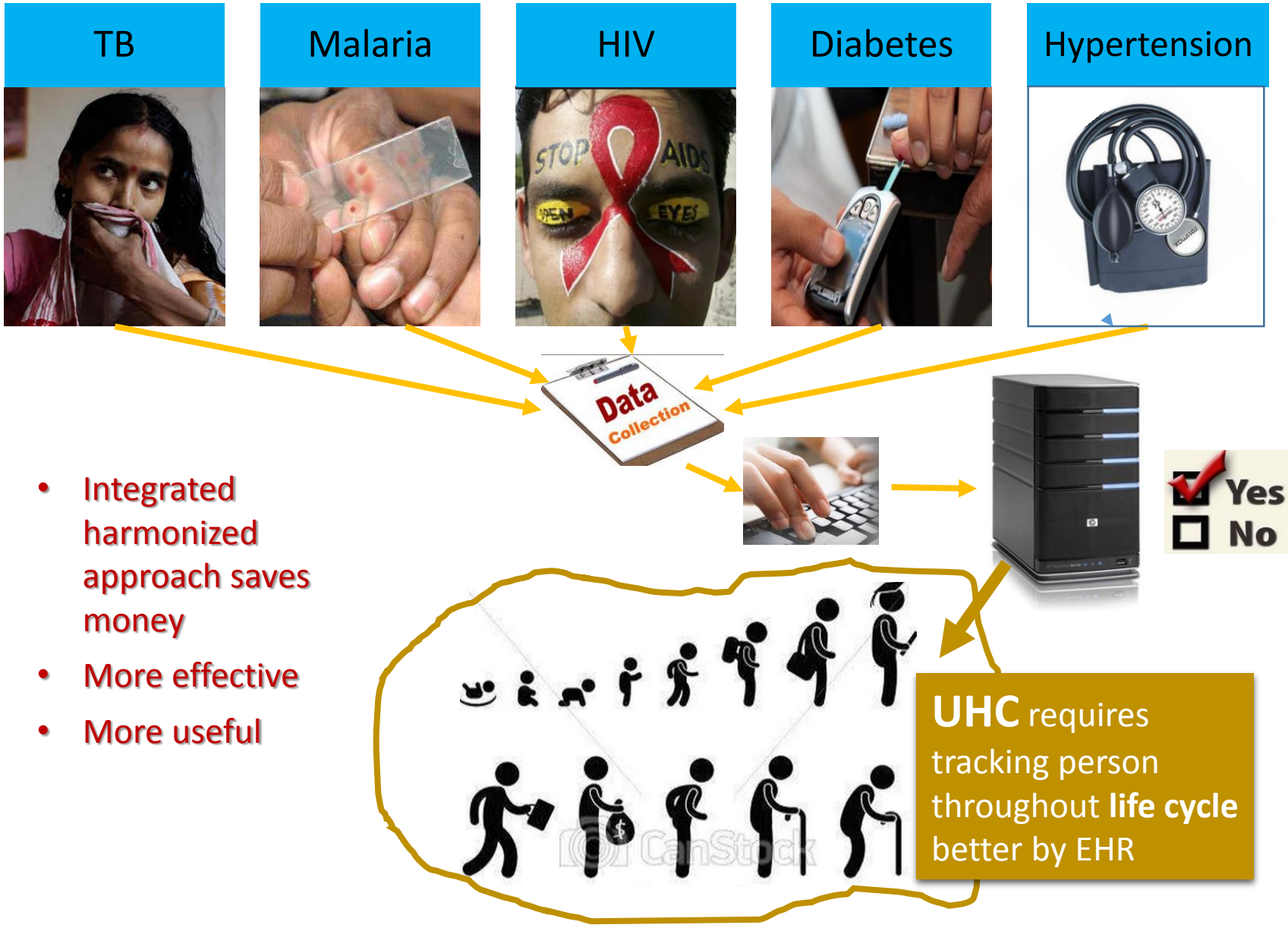
We want to know whether widespread ICT use in health sector will be much costlier than benefits

The problem – we probably invested in vertical ICT systems

TB	Malaria	HIV	Diabetes	Comorbidity
				
				
				

Vertical systems:

- Causes unnecessary wastage of scarce resource
- Does not help to understand relationship between diseases



- Integrated harmonized approach saves money
- More effective
- More useful

ICT is a necessity

Global NCD Monitoring Framework 2013-25

9 Targets / 25 Indicators

2015 MILLENNIUM DEVELOPMENT GOALS

CRVS

MAKE EVERY LIFE COUNT

Universal Health Coverage

Towards Post-2015 development agenda

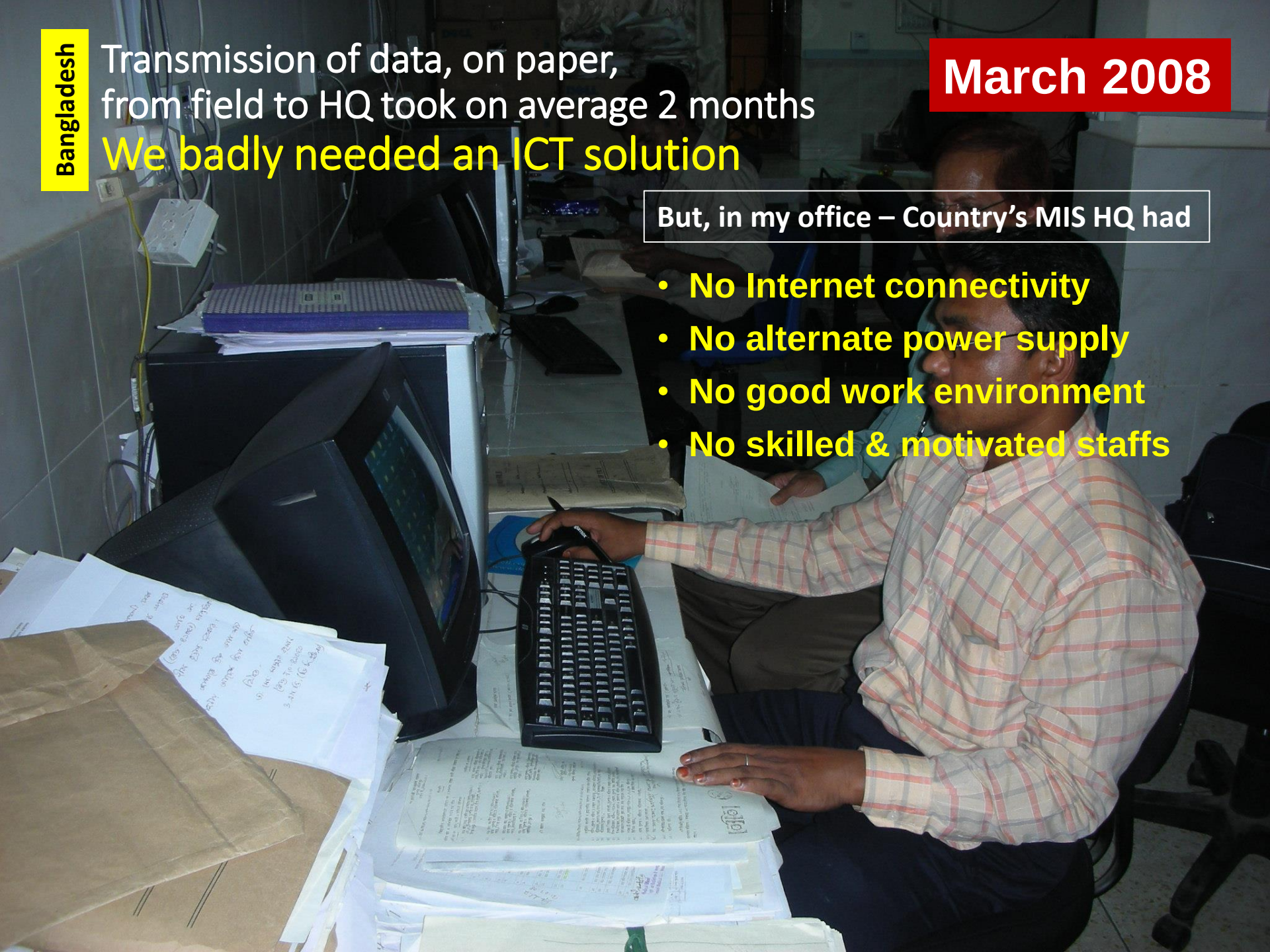
What future do you want?

EVERY WOMAN EVERY CHILD

COIA

11 Indicators

These **GLOBAL** initiatives demonstrate an urgency to establish electronic tracking system of each individual of every nation for health & social development indicators


Bangladesh
Transmission of data, on paper,
from field to HQ took on average 2 months
We badly needed an ICT solution
March 2008
But, in my office – Country's MIS HQ had
• No Internet connectivity
• No alternate power supply
• No good work environment
• No skilled & motivated staffs

We changed the situation

Frontline health workers, clinics, hospitals, institutions & administrative offices – **all connected**

24,000

~13,500

~1,000

DHIS2 >> OpenMRS

Cloud

Standards
Inter-operability

eRegistries

Geo-location
Facility
HWF
Client

Source & stakeholders

- Public (all vertical programs)
- Private (DPs, NGOs, Private)

Electronic form

- **Individual tracking:** Pregnant women, U5 children –CoIA, SCANU, MPDR; Indoor disease profile)
- **Aggregate:** Administrative data, public health interventions

Telemedicine
Health education
eLearning

Client's Grievance System

SHR/ EHR/ OpenSRP

What made them possible?

We felt compulsion of systematic ICT use – so started in any way

Digital Bangladesh Vision 2009

Response of MOHFW with Digital Health Program

We --

- Learned from failures elsewhere
- **Chose key areas of interventions:** improve health systems efficiency; bridge urban-rural digital divide; reach citizens
- Moved gradually

Our Solutions

1. Simple
2. Low cost
3. Innovative
4. Locally appropriate
5. Visible
6. Scalable

Global Recognition

2010

WHO Landmark Publication

2011

UN Digital Health for Digital Development Award 2011

2014

December

framework
for monitoring UHC in Bangladesh

UHC Indicator Set

- Total **43** indicators -- **11** financial protection indicators
- **Data source:** Surveys, Routine HIS, Other records

3 dimensions

- Financial risk protection
- Service coverage
- Equity

Indicators characteristics

- Impact indicators adapted mostly from MDGs
- Cover all **6** building blocks of health systems
- Spread across 4 main areas
  - access to health services
  - protection against financial risk
  - population coverage
  - quality of service

List of 43 UHC monitoring indicators

INPUT & PROCESS (14)

Health Workforce (3)

1. Number of doctors per 10,000 population
2. Number of Nurses & midwives per 10,000 population
3. District/UPZ hospital and below have 1 Obs/Gynae + 1 anaesthologist

Infrastructure (1)

1. Number of Hospital beds per 10,000 population

Medicines (2)

1. Availability of essential medicines in public facilities
2. Median drug price ratio for tracer drugs

Health Information & Research (1)

1. Health Facilities having electronic health records (EHR)

Healthcare Financing (7)

1. Public spending in health (per capita, as a % of TEH)
2. Social HI contribution (per capita as % of TEH)
3. Other health insurance (ex. Employer-supported health insurance) (per capita as % of TEH)
4. Share of health spending in total government expenditure
5. Health expenditure per capita
6. Health expenditure as % of GDP
7. OOPS for health (per capita as % of THE)

OUTPUT (3)

Service access and readiness (2)

1. Index of service readiness & Availability
2. Proportion of health facilities offering EOC & IMCI services

Service quality and safety (1)

1. % clients expressing satisfaction with health facilities

OUTCOME (13)

Service delivery/ Coverage of Intervention (6)

1. % of pregnant women attending 4 ANC visits
2. % of institutional deliveries
3. TB treatment success rate
4. ITN (Insecticide treated bed net) coverage among HH of endemic area
5. % of children under one year with 3rd dose Pentavalent vaccine
6. Case fatality rate among hospitalized ARI cases

Risk factors and Behaviours (5)

1. % of HH with access to safe water
2. % of HH have access to improved sanitation
3. Incidence of Drowning
4. Contraceptive prevalence rate
5. Tobacco prevalence rate

Healthcare Financing (2)

1. OOPS for health in total household consumption expenditure
2. Share of population (%) lack adequate healthcare due to financial hardship

IMPACT (13)

Improved Health Status (11)

1. Life expectancy at birth
2. Neonatal mortality rate
3. Infant mortality rate
4. Total fertility rate
5. Population growth rate
6. Maternal Mortality Ratio
7. % of underweight among under 5 children
8. % of stunted among under 5 children
9. Prevalence of HIV among MARP
10. TB prevalence rate
11. % of diabetic & hypertension receiving treatment

Health Security (2)

1. Share of population (%) fall into poverty due to OOPS
2. Share of households (%) facing catastrophic health spending


Thank You!