



**Committee for Economic and Commercial  
Cooperation of the Organization of Islamic Countries**

# **Maternal and Child Mortality in OIC Countries: Progress Towards 2030**

**Lessons Learnt from the Selected Case Studies and the Policy Options**

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BLOOMBERG SCHOOL  
*of PUBLIC HEALTH*

# Case-country studies

- Four countries
  - Bangladesh
  - Cote d'Ivoire
  - Indonesia
  - Iraq



# Selection criteria

- Country's **track record of progress in maternal and U5 mortality** reduction.
- The selected countries **represent both stories of success as well as the lack of accomplishments**
- Country's absolute **numbers of maternal and U5 deaths are high**
- **Availability of national data** for conducting analyses
- High inequity in health care and mortality rates
- At least **one is a Francophonic country**
- At least **one Middle East country** with poor MNCH indicators



# Methods

- Desk reviews
- Quantitative data analysis
  - Demographic and Health Surveys (DHS)
  - Multiple Indicator Cluster Surveys (MICS)
  - Global Health Expenditure Database (GHED)
- Qualitative study
  - In-depth interviews of stakeholders
    - government officials (Ministry of Health, Ministry of Planning and Financing), UN Organization officials (UNICEF/UNFPA), donor agencies, NGO and public health research organizations/institutions, and faculty/scientists at universities who are experts in MNCH field

# Bangladesh

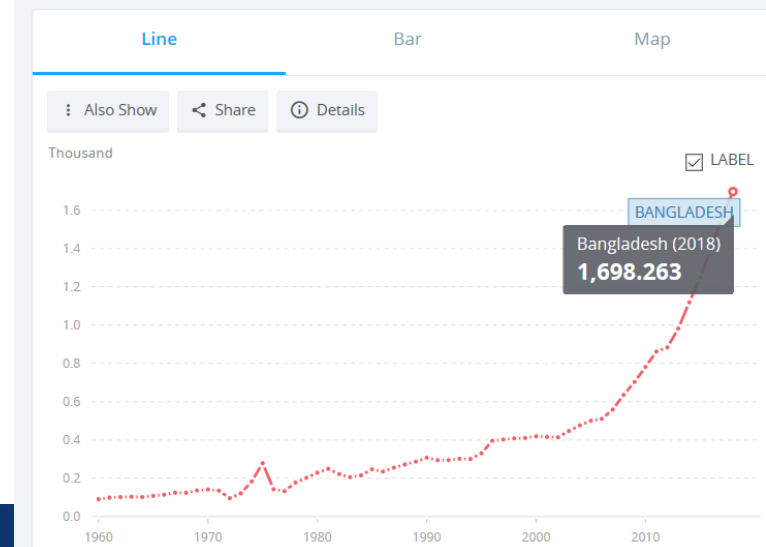
- 8<sup>th</sup> largest populous country in the world with 1140 peoples per square kilometer
- One of the highest population densities in the world
- Maternal mortality has reduced from 322 deaths per 100 000 live births in 1998–2001 to 194 deaths per 100 000 live births in 2007–10, amounting to a 5.6% reduction per annum compared to the global figure of 2.6%.
- U5 mortality rate has declined from 94 deaths per 1000 livebirths in 1999-2000 to 46 deaths in 2014.



## GDP per capita (current US\$) - Bangladesh

World Bank national accounts data, and OECD National Accounts data files.

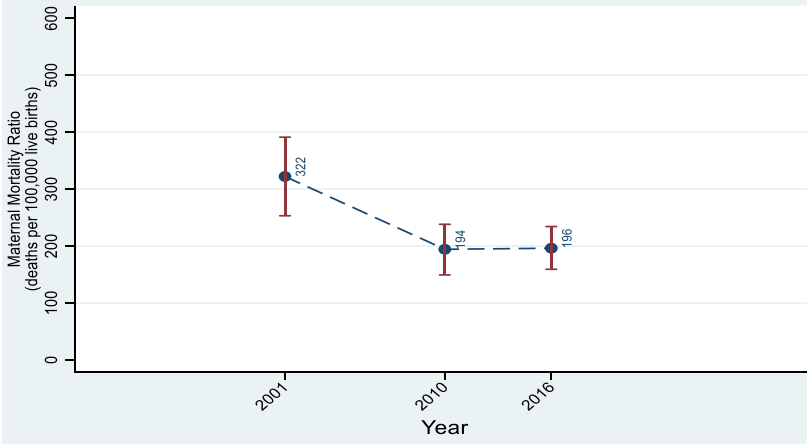
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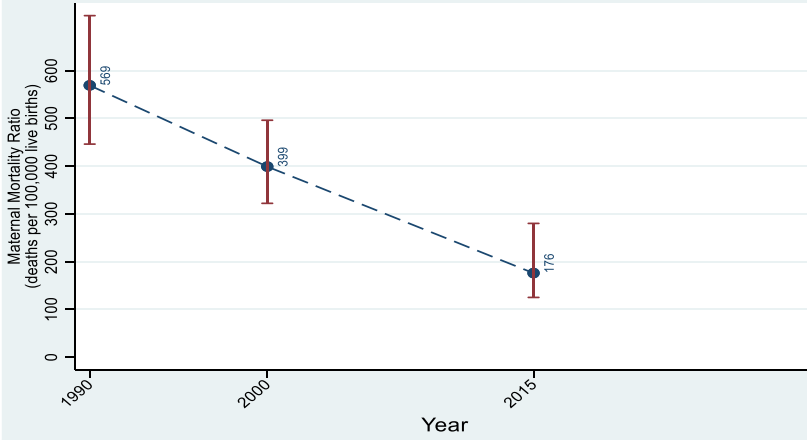
# Maternal mortality

## Under-five child mortality

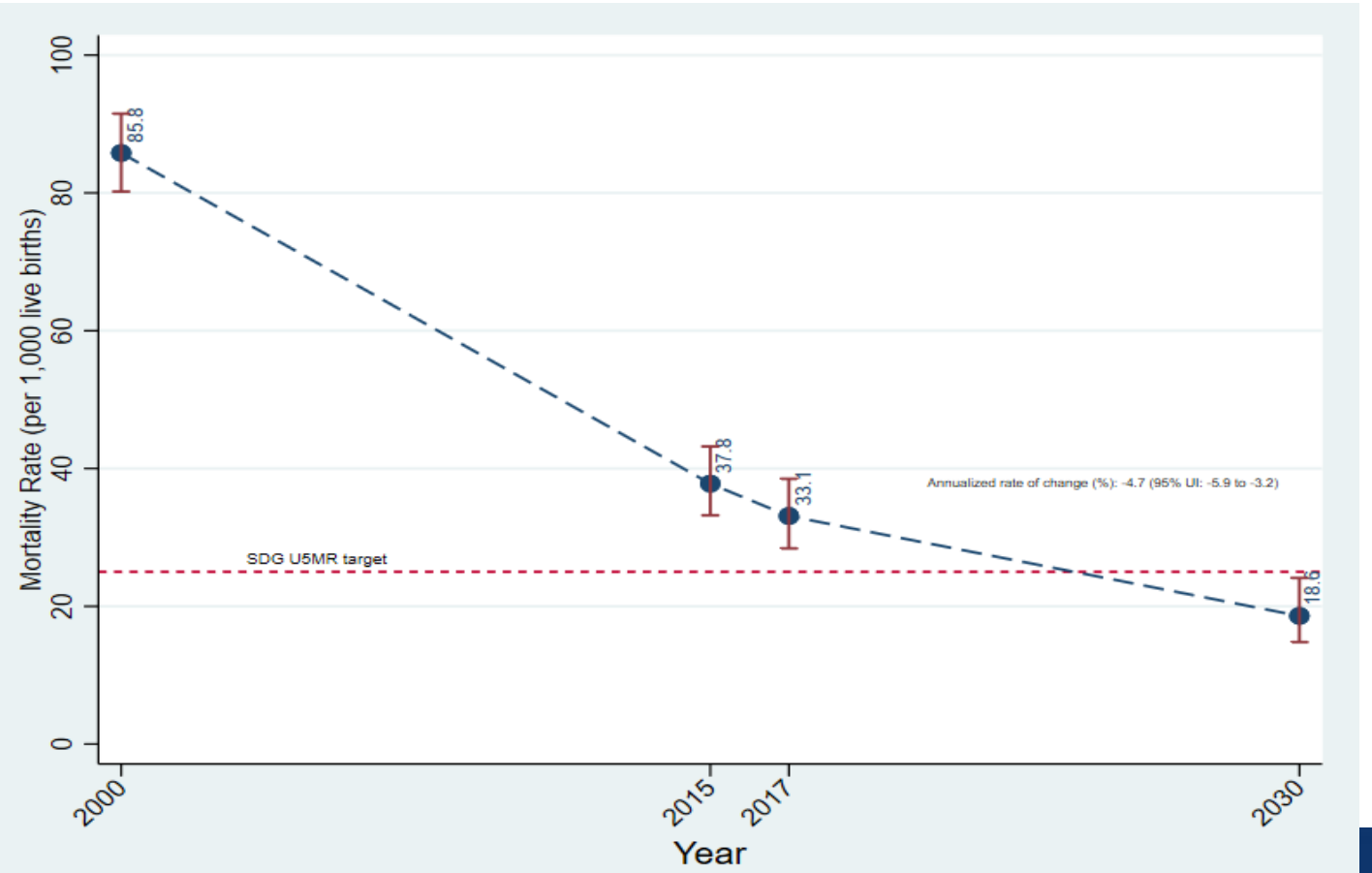
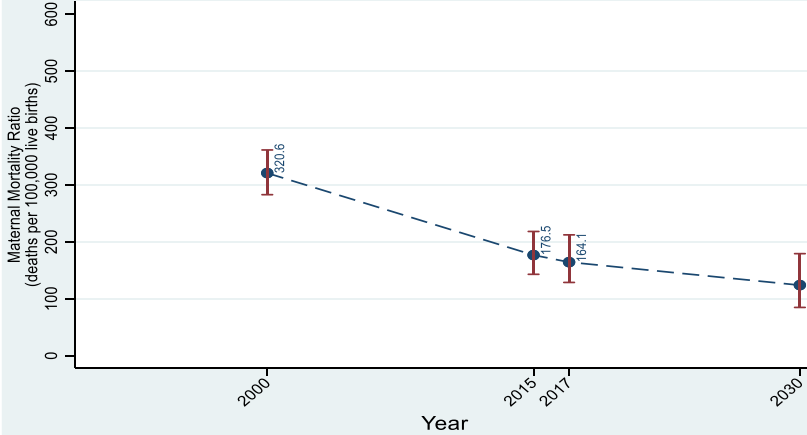
BMMS estimates



MMEIG/WHO estimates

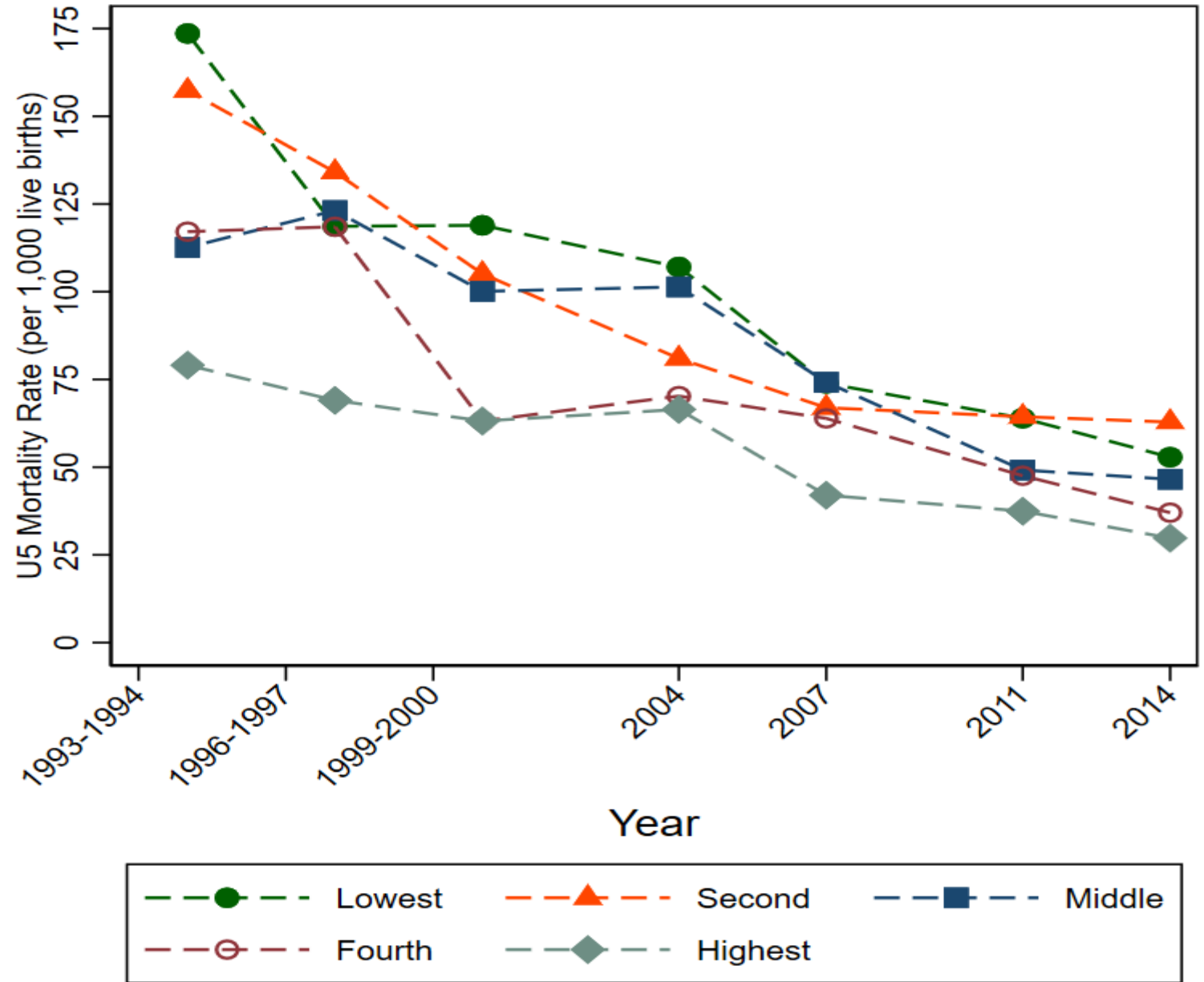


Global Burden of Diseases (GBD) estimates



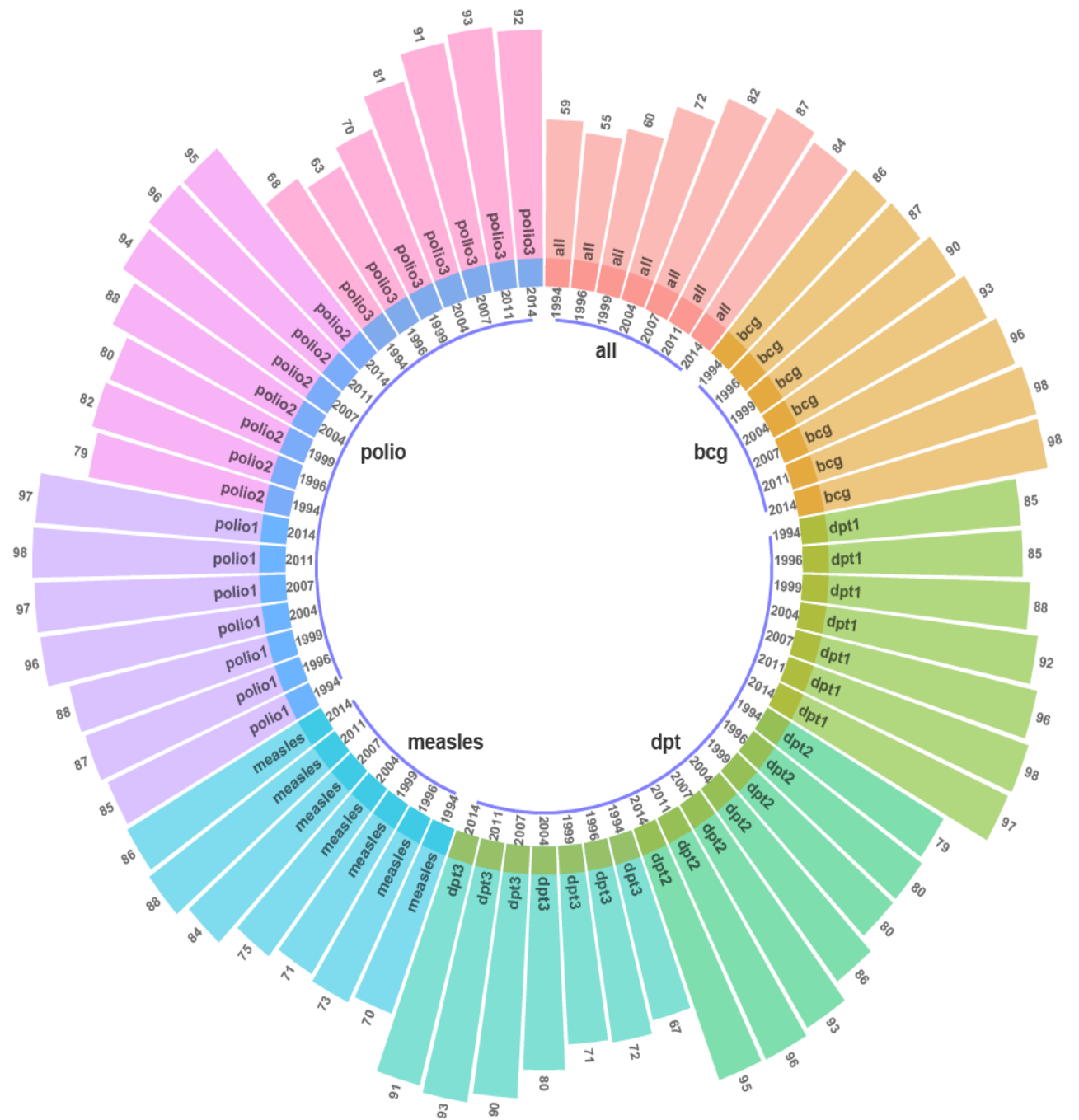
# Under-5 Mortality

Reduced inequity in child mortality





Immunization coverage has increased impressively



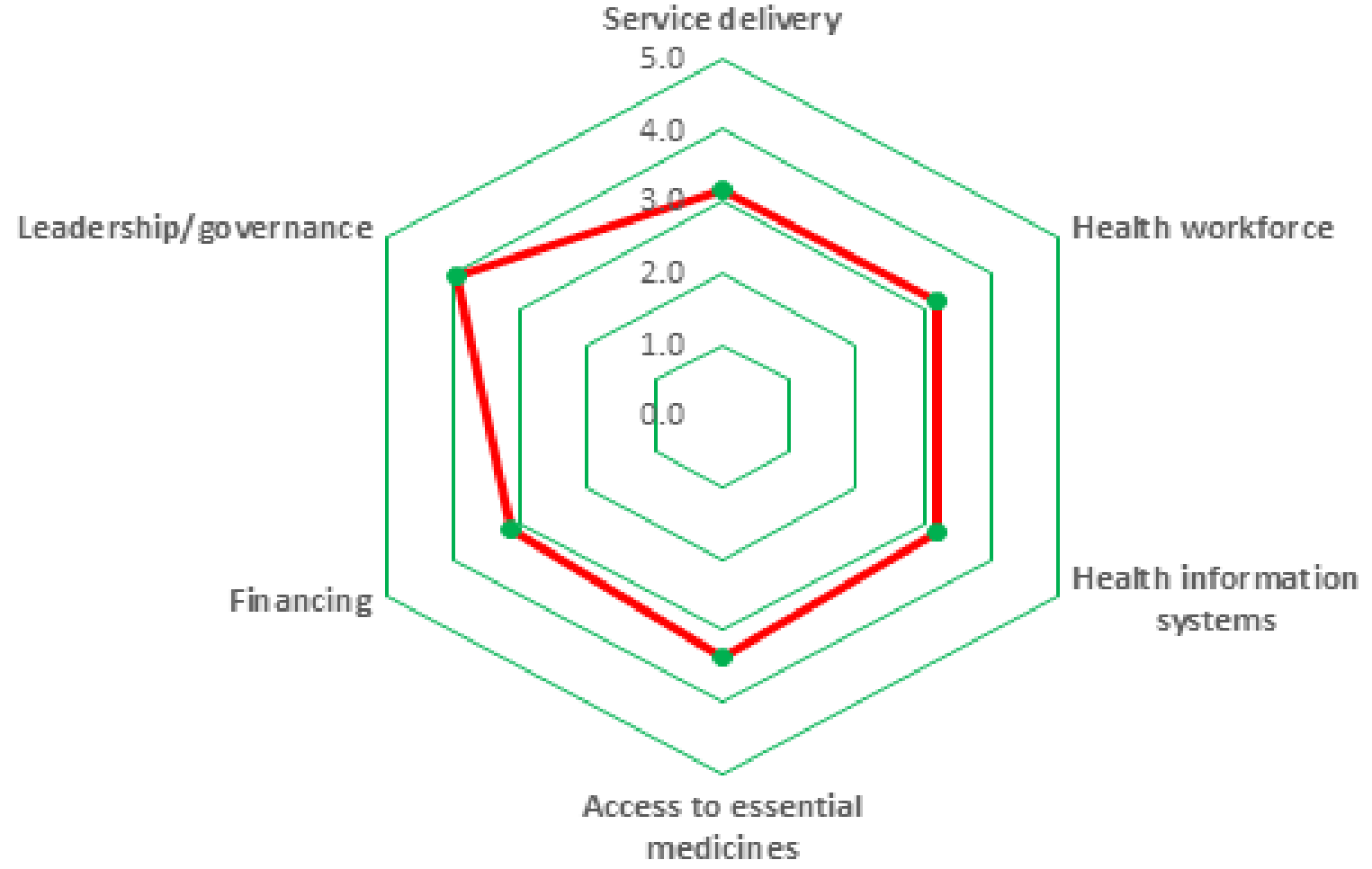


# Results from In-depth Interviews

## Perceived least functional health system building blocks, Bangladesh

(Score: 1= Best functioning; 2= Better functioning; 3= functioning well; 4= Somewhat functioning; 5= worst / not functioning)

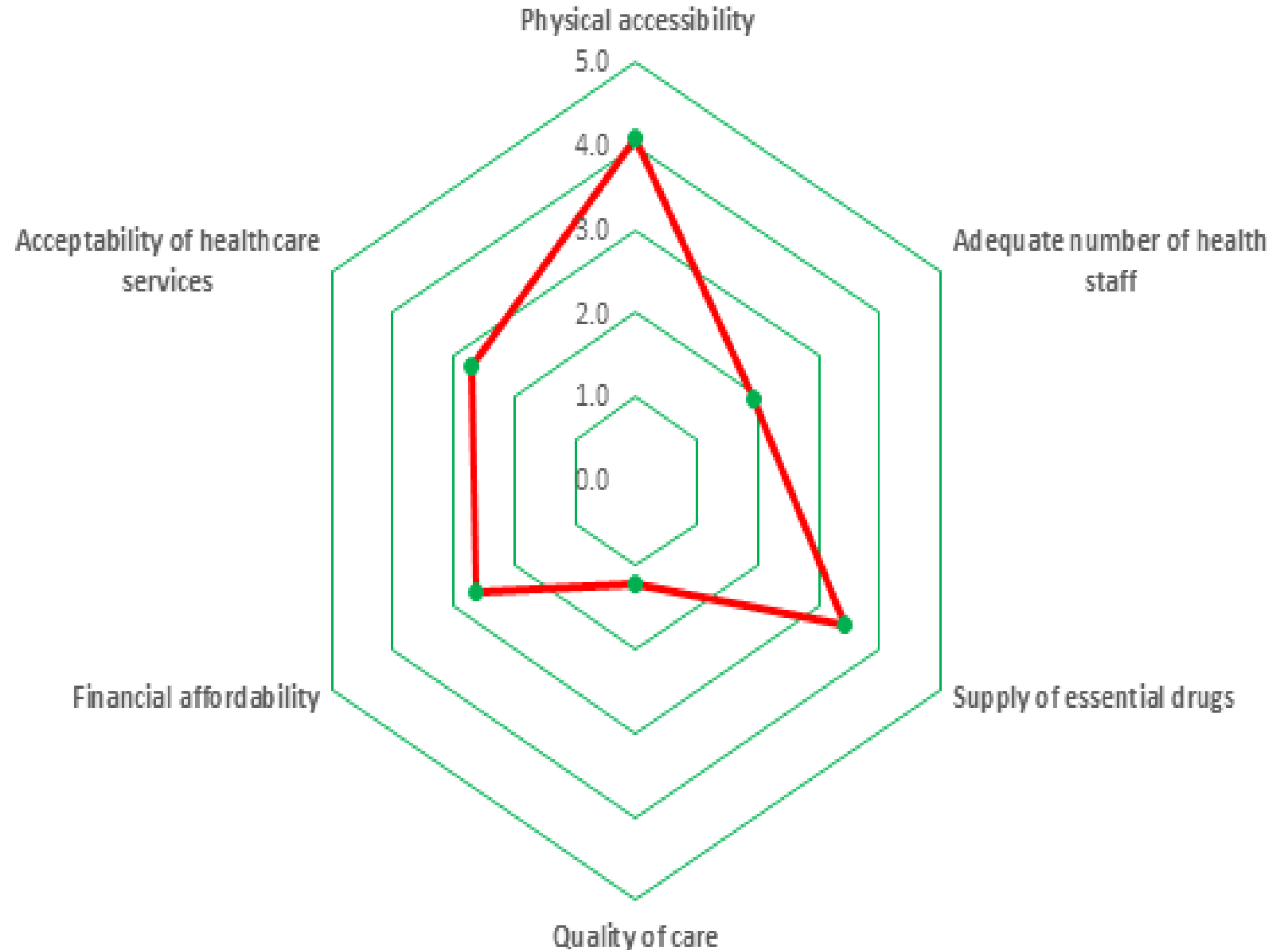
Bangladesh: Perceived least functional WHO building blocks



# Barriers to accessing MNCH services, Bangladesh

(1= Most significant barrier;  
2= Second most significant barrier;  
3= Moderate barrier;  
4= Somewhat of a barrier;  
5= Not a barrier)

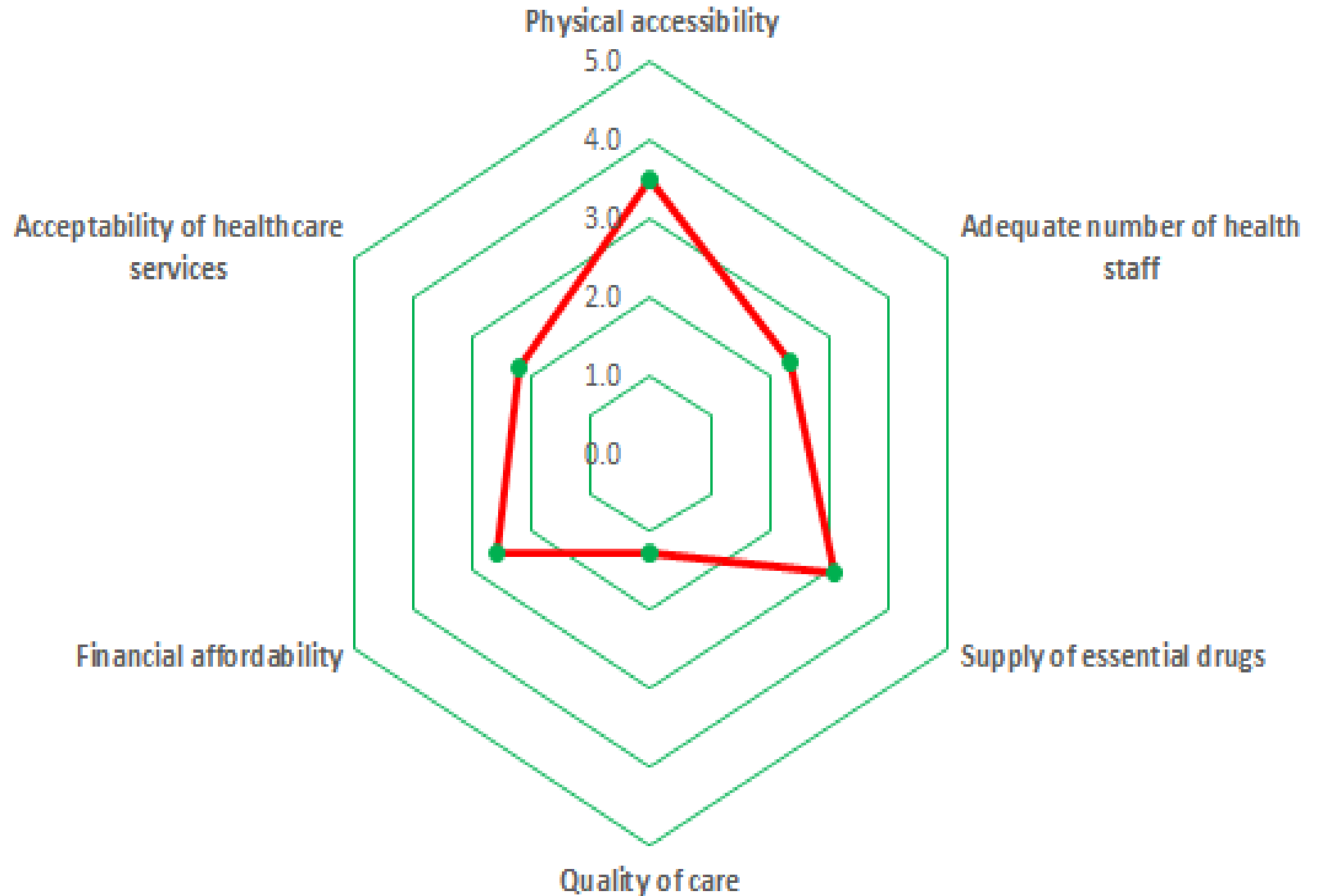
Bangladesh: Barriers to assessing MNCH services



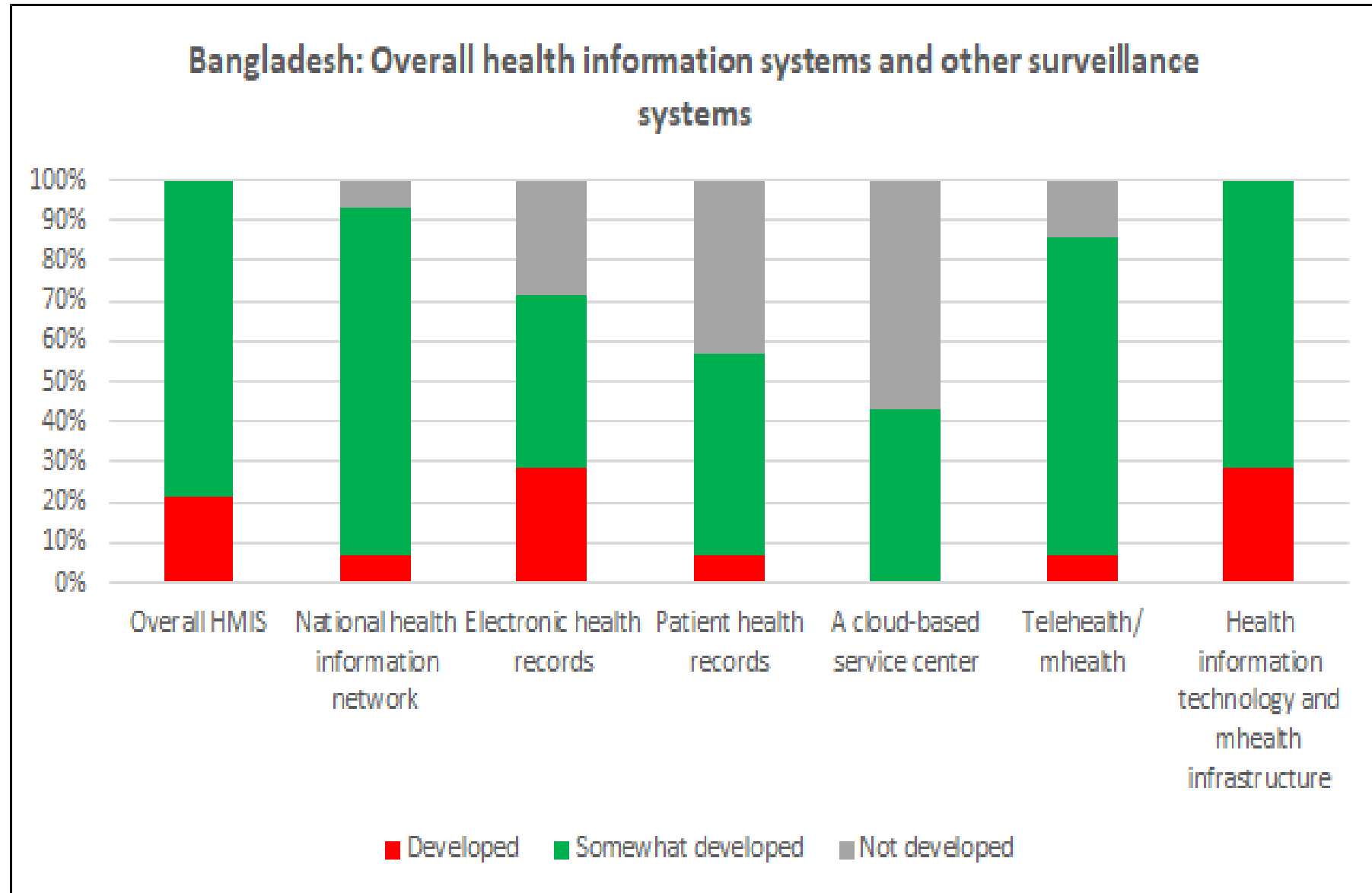
# Barriers that prevent families from seeking delivery care from SBA or facility, Bangladesh

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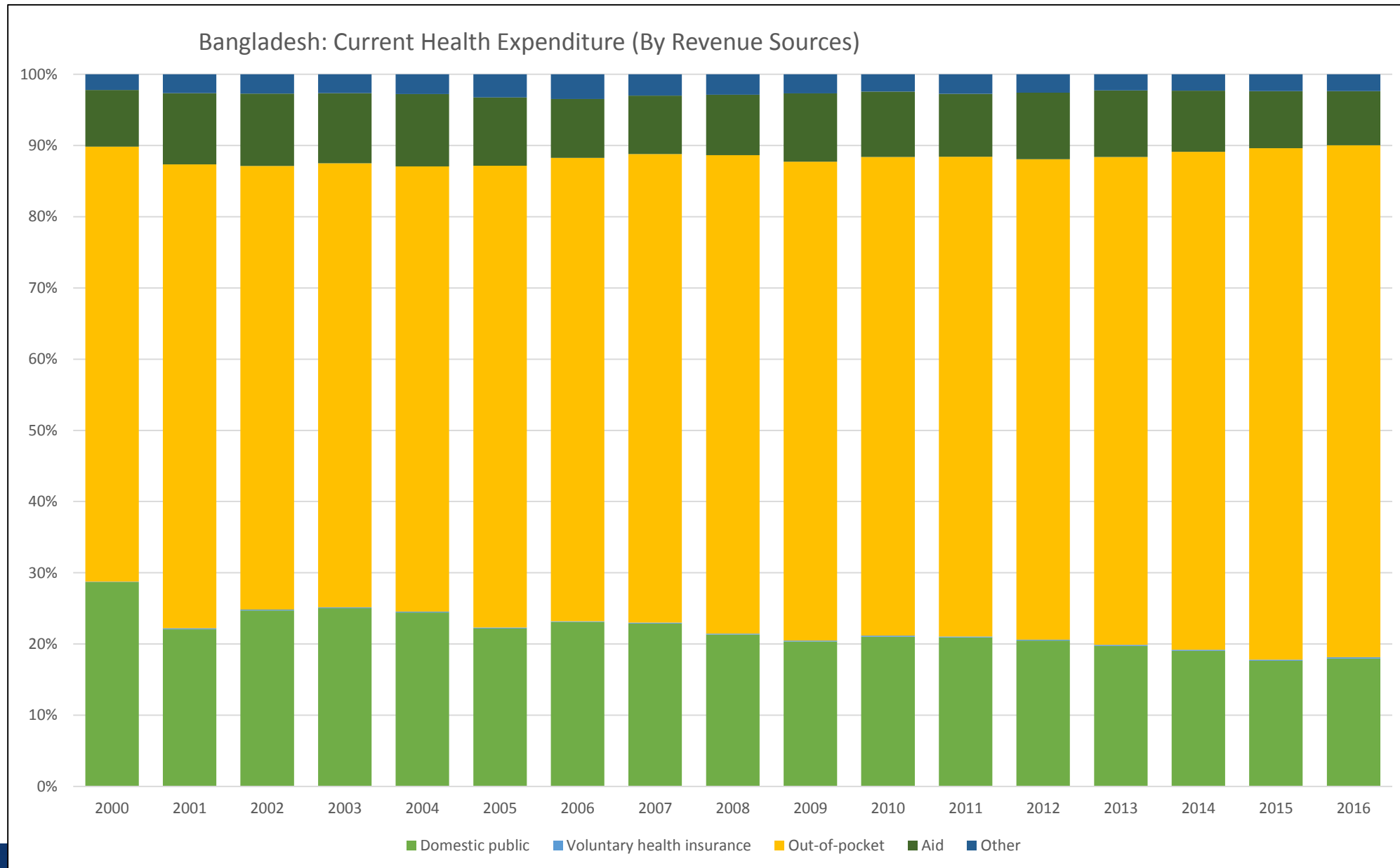
## Bangladesh: Barriers that prevent families from seeking delivery care from SBA or facility



# Overall health information systems and other surveillance systems, Bangladesh



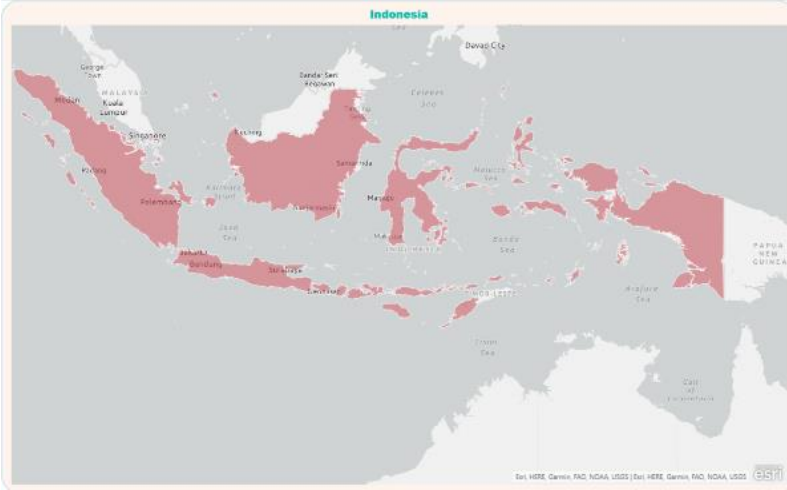
# Current health Expenditure by revenue sources



Out-of-pocket  
expenses  
increased

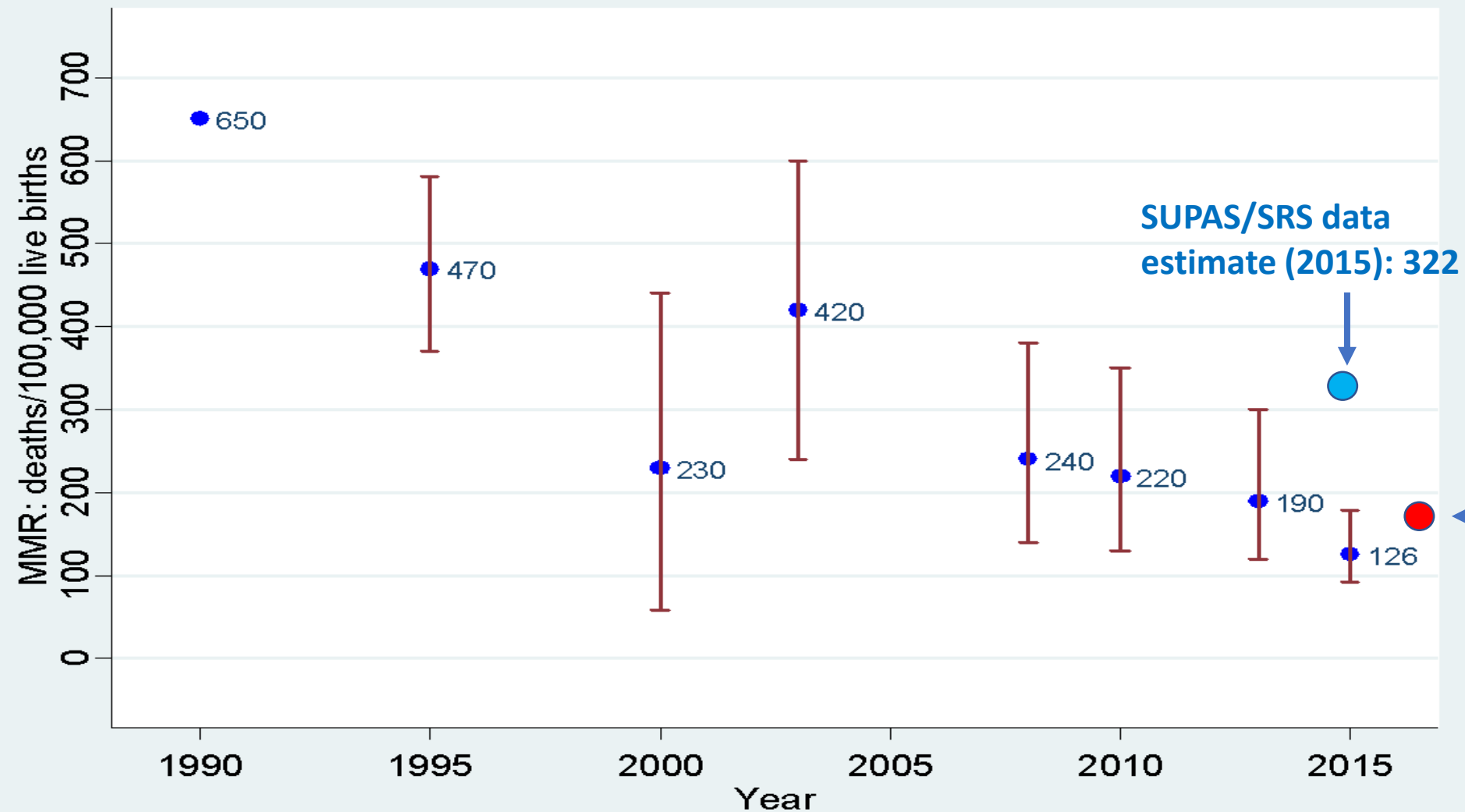


# Indonesia



- Indonesia has made remarkable progress in improving economic, social, and many health indicators in recent years:
  - Gross domestic product increased from US \$440 billion to \$970 billion between 1990 and 2015, with almost 5% annual growth rate;
  - The female literacy rate is 98%
  - Skilled birth attendance rate increased to 83% by 2012
  - The total fertility rate reduced from 5.57 to 2.45 between 1970 and 2015.
  - The poverty level (\$1.90 per day) reached an all-time low of 6.8% in 2016
- **Indonesia has one of the highest maternal mortality ratios in Southeast Asia**

# MMEIG/WHO estimates of maternal mortality ratios in Indonesia

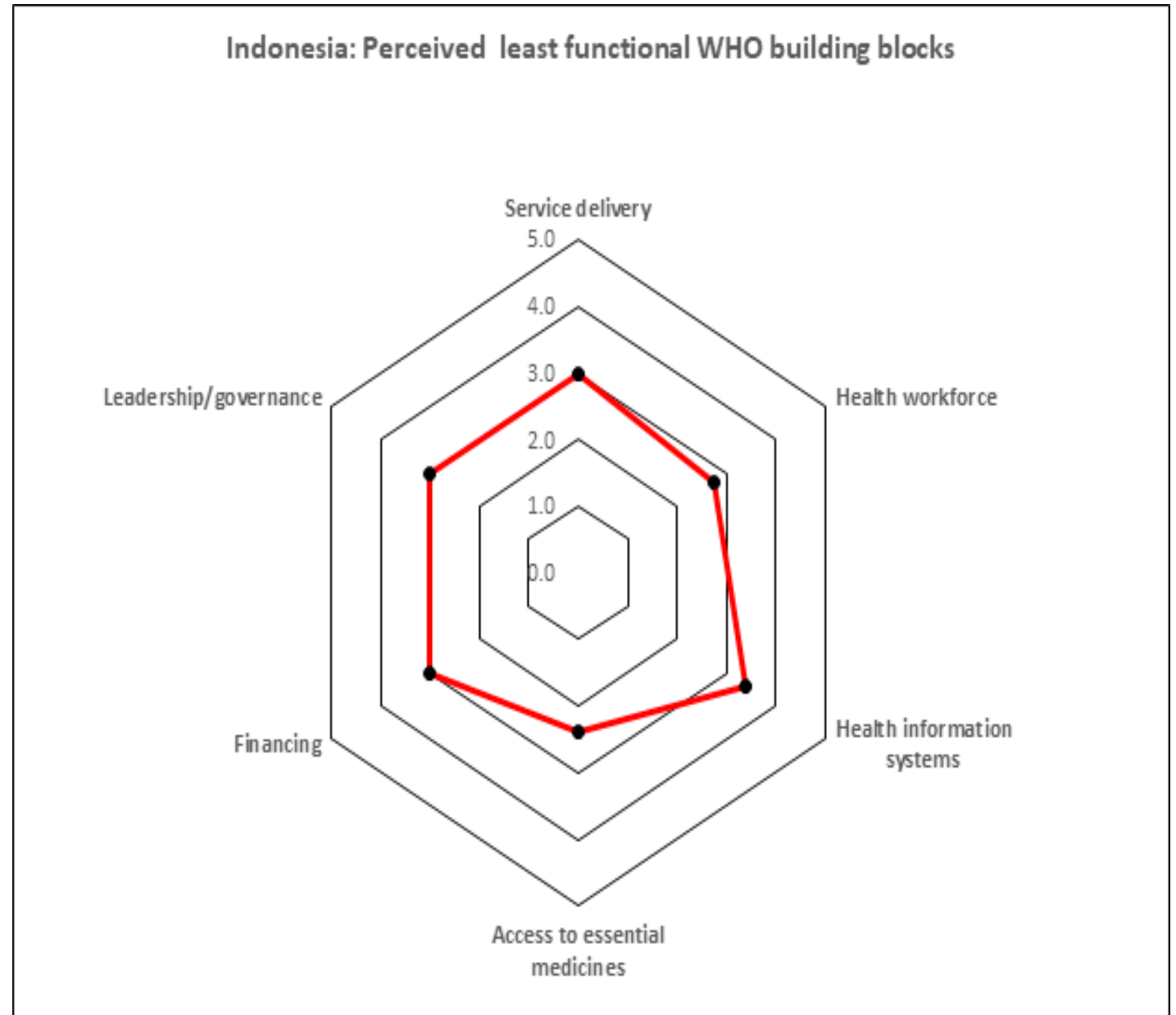


The most recent MMEIG/WHO report (September 19, 2019) has revised the MMR estimate in Indonesia to 177 in 2017



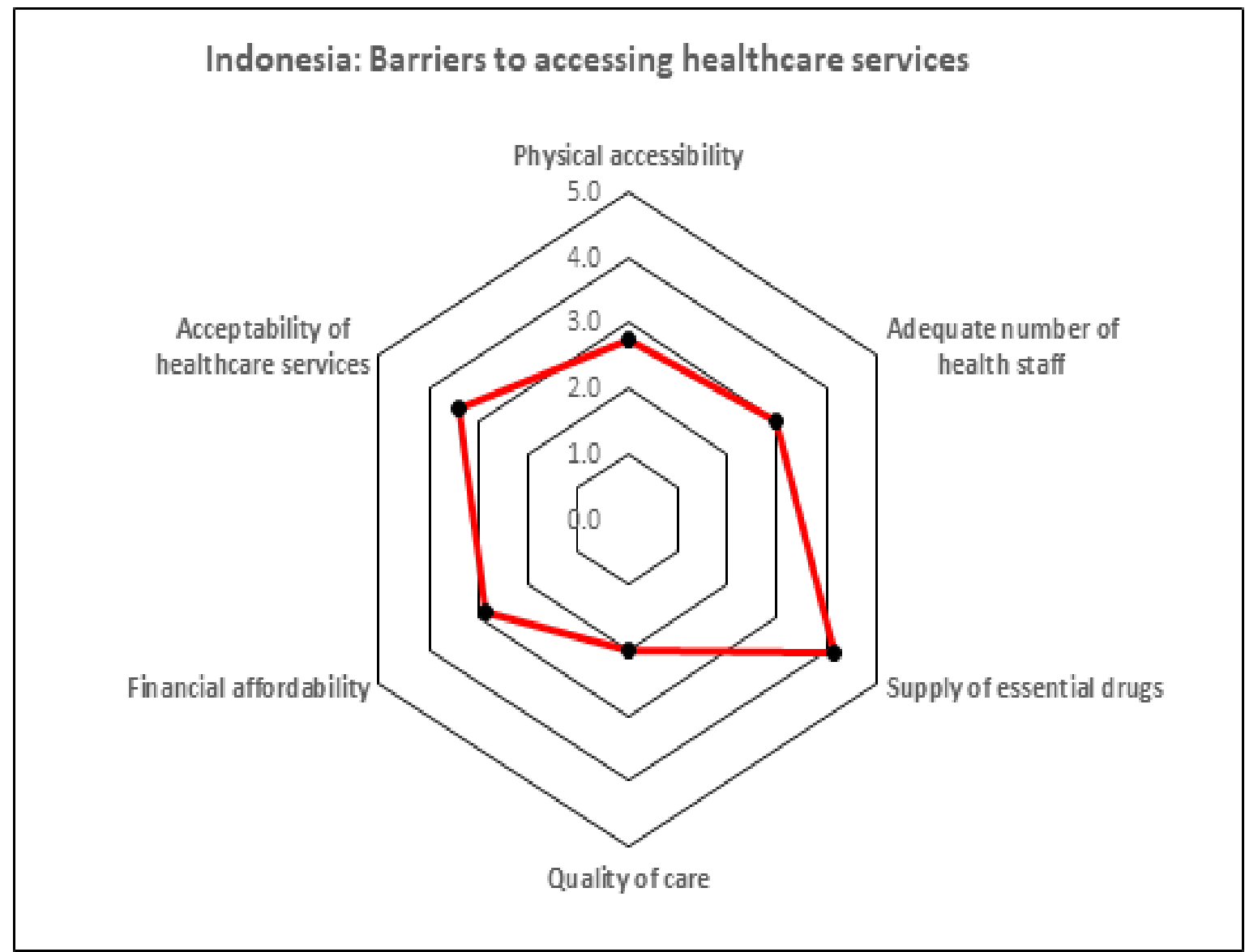
# Stakeholders' perceived least functional health system building blocks, Indonesia

(1= Best functioning;  
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# Barriers to accessing healthcare services, Indonesia

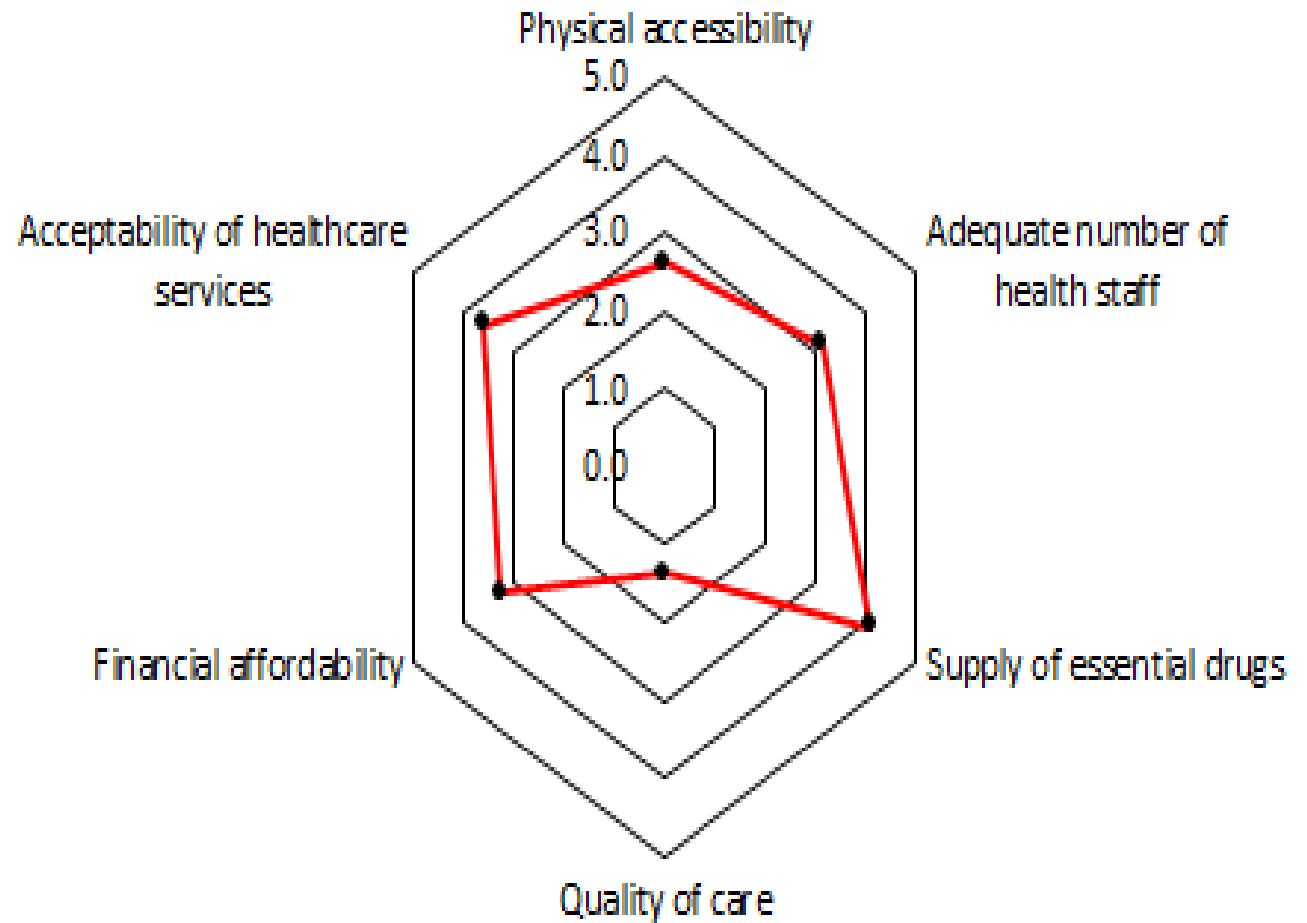
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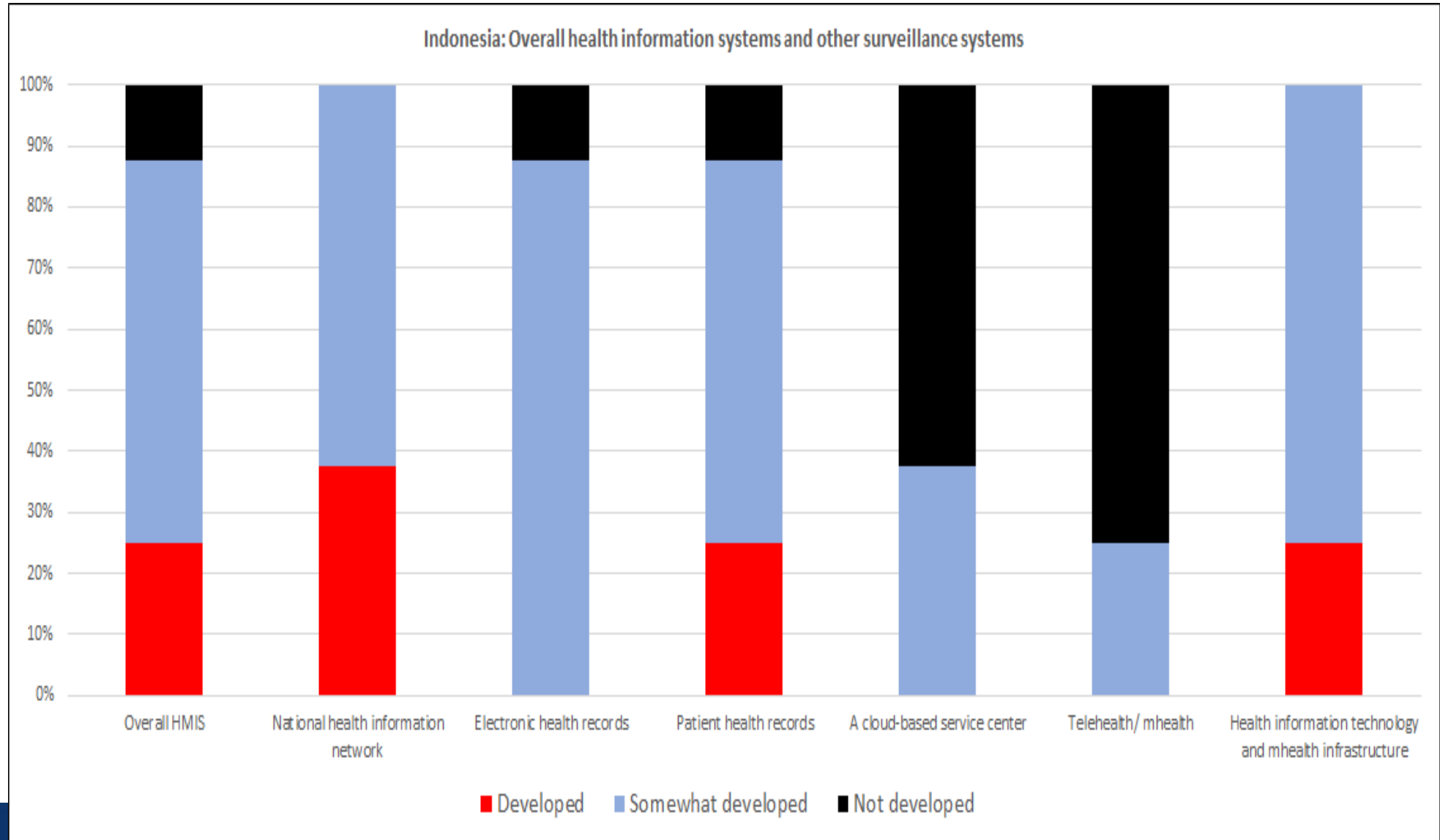
# Barriers to assessing MNCH services, Indonesia

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## Indonesia: Barriers to assessing MNCH services

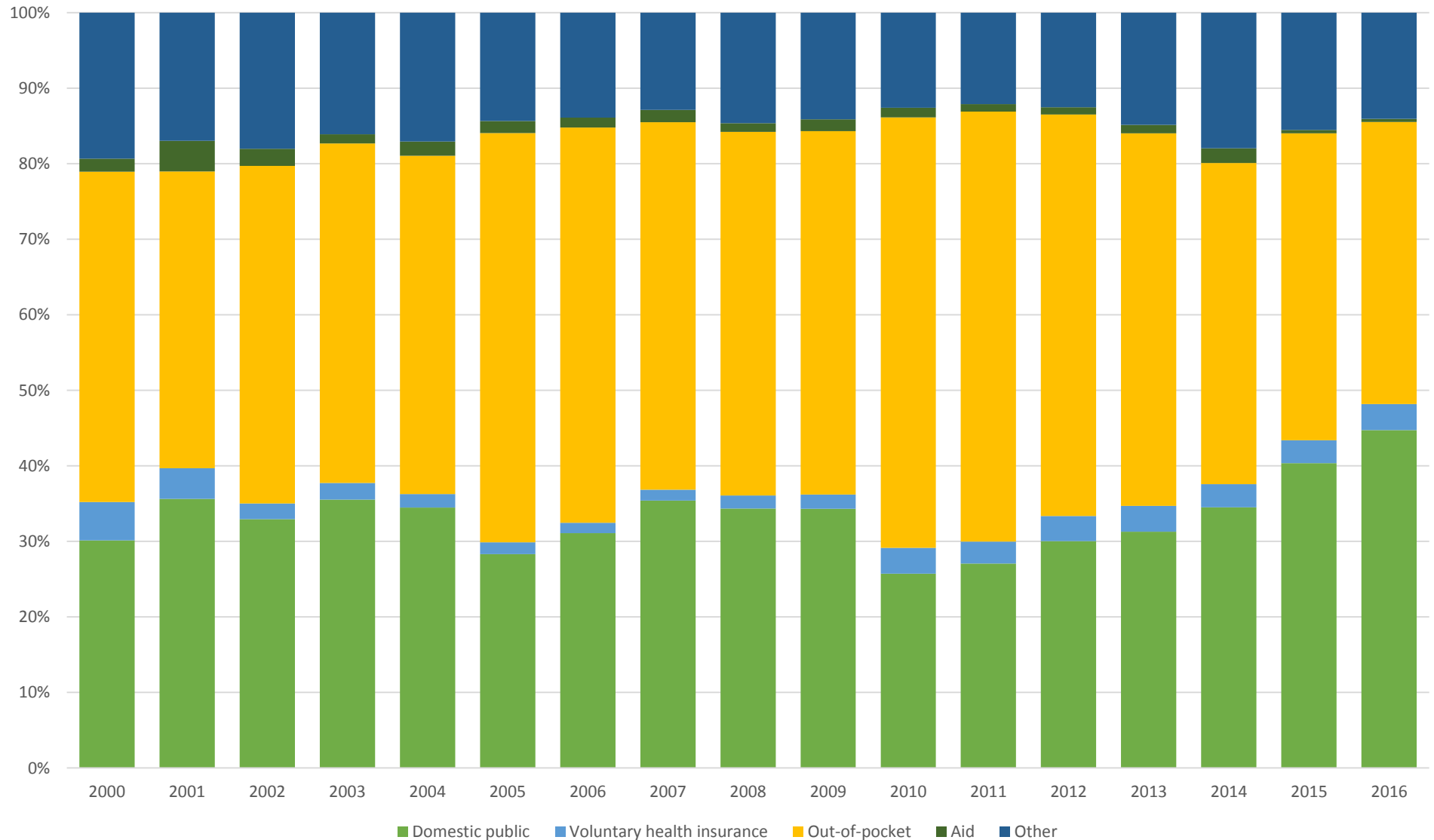


# Overall health information systems and other surveillance systems situation in Indonesia



# Current health Expenditure by revenue sources

Indonesia: Current Health Expenditure (By Revenue Sources)



Out-of-pocket expenses decreased in recent period





# Cote d'Ivoire

- The country was **ranked 170 out of 189 countries in the 2017 Human Development Index.**
- In 2014, the total population of the country was approximately 22.7 million
- The population is very young with 41.8% aged 0-14 years.
- The **adult literacy rate** among the female population 15+ years slightly **decreased from 38.6% in 2000 to 36.8% in 2014.**
- The use of modern contraceptives remains relatively low: **25.0% of women use contraceptives to space or limit births and 21.0 % use a modern method.**
- The **Total Fertility Rate**, or the average number of children per woman over the course of her lifetime **reduced from 6.6 children in 1990 to 5.1 children per woman in 2015.**

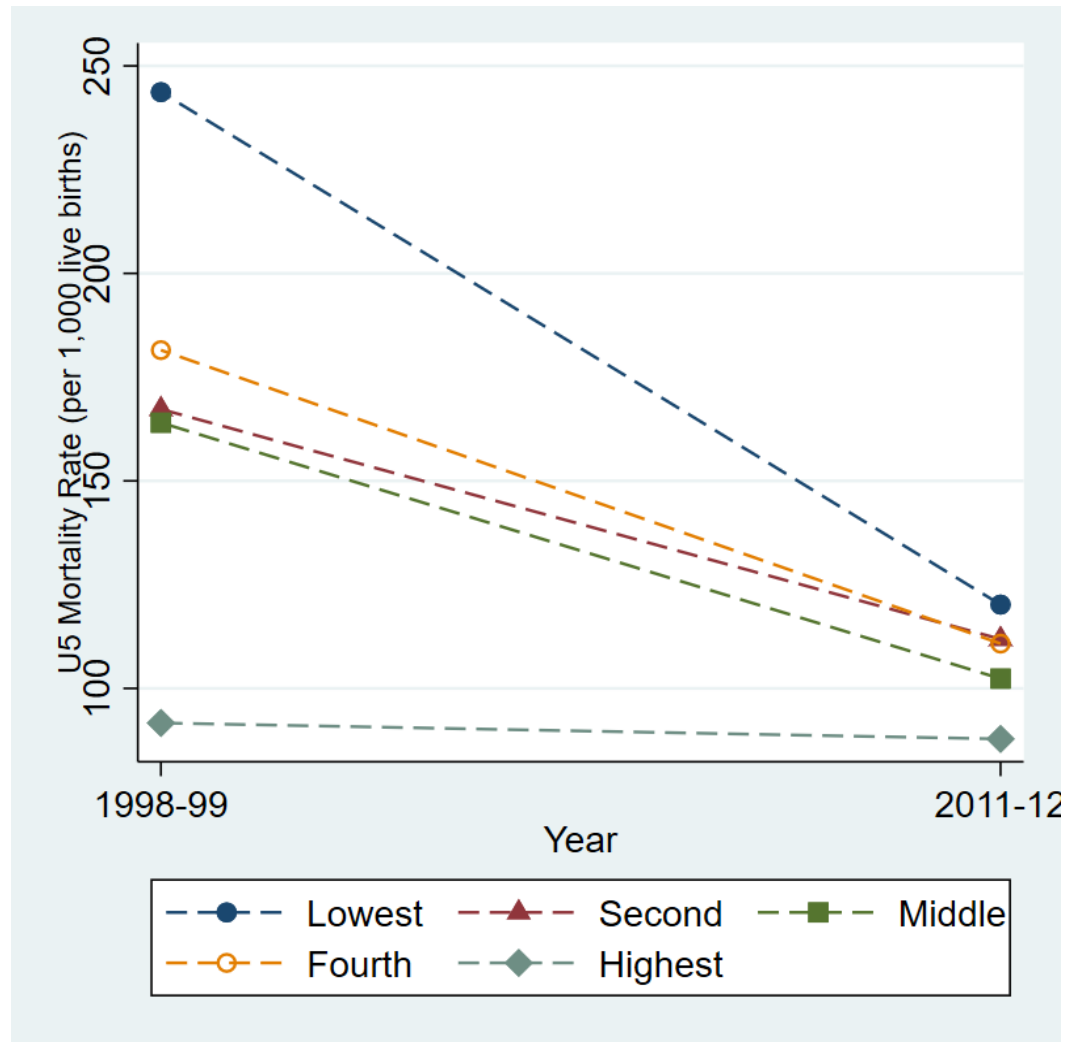
# Maternal mortality

- The country has made little progress in combating maternal mortality
- MMR reduced from 745 in 1990 to 645 deaths per 100,000 live births in 2015,
  - an improvement of 13.4% in 25 years compared to 44% worldwide (during the same period)
- The newly released MMEIG/WHO estimate (September 19, 2019) shows MMR of 617 in Cote d'Ivoire for 2017.

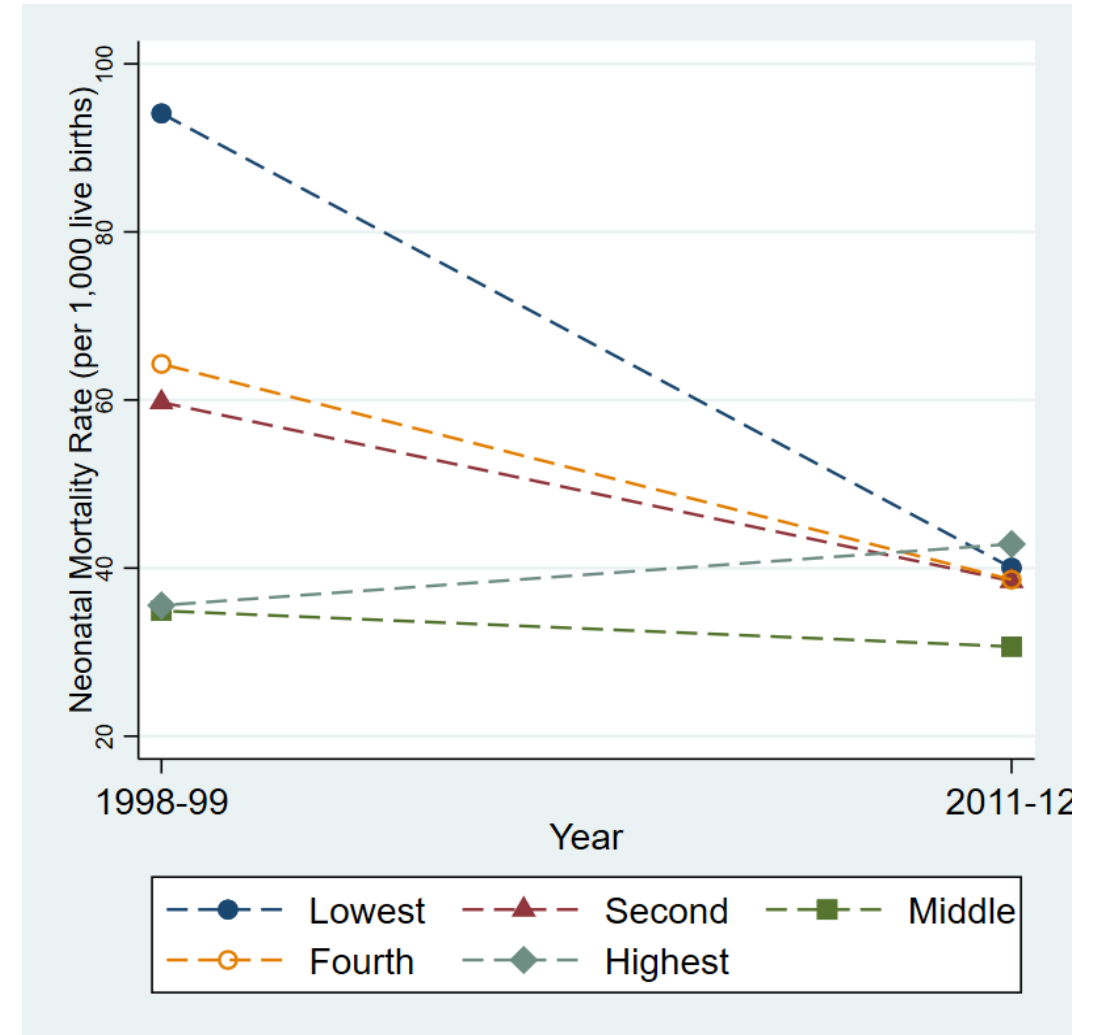




# Under-5 mortality

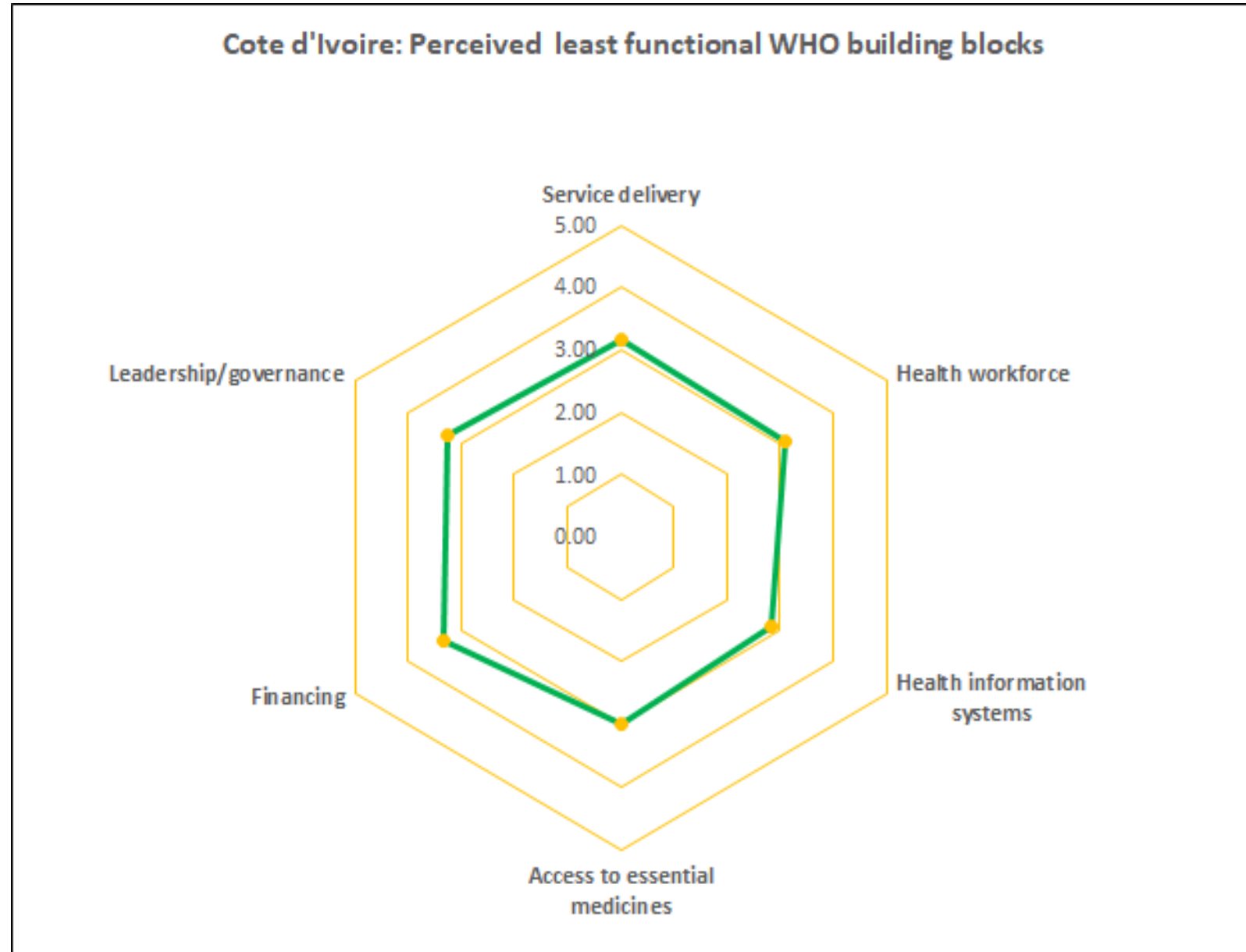


# Neonatal Mortality



# Perceived least functional health system building blocks, Côte d'Ivoire

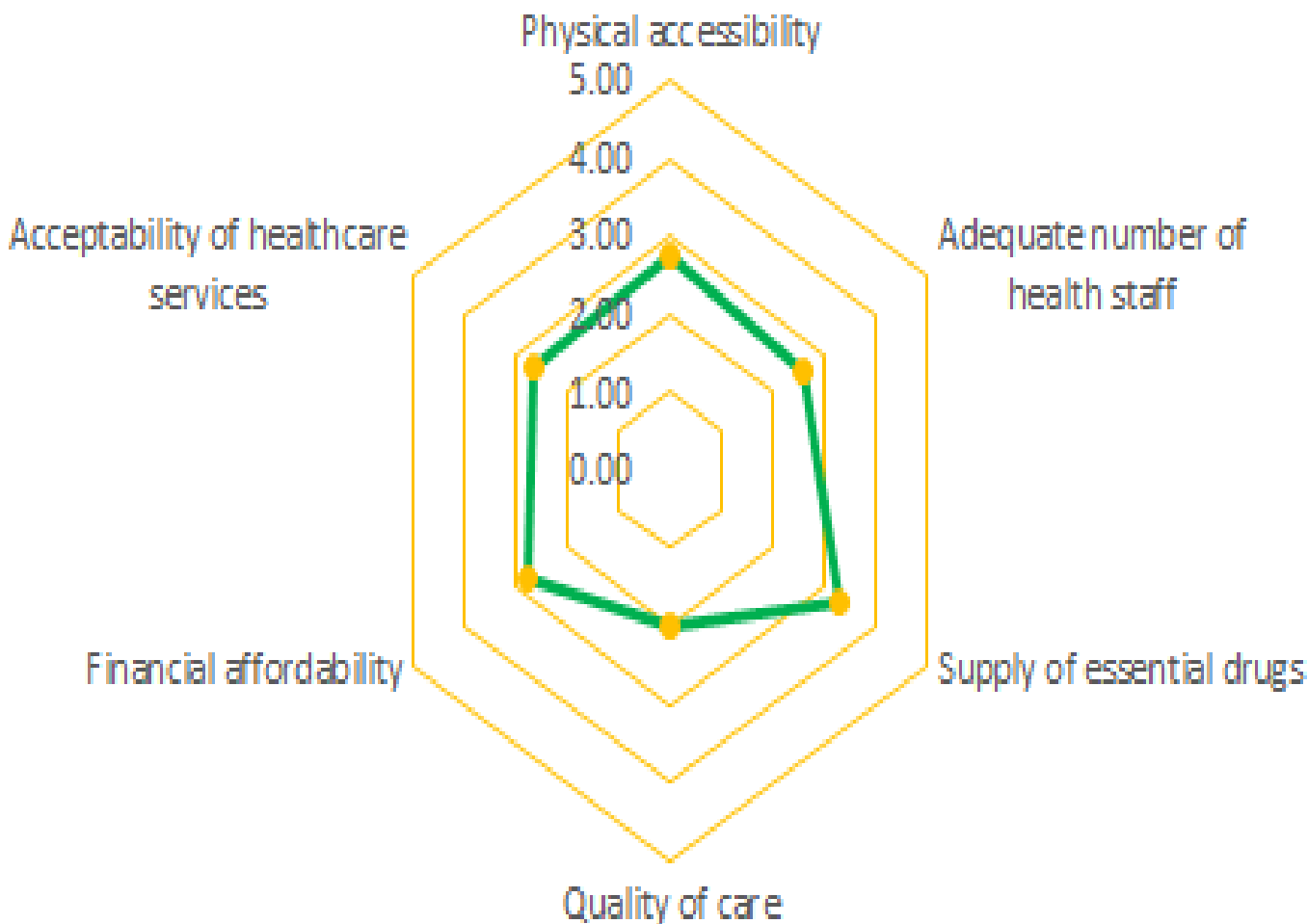
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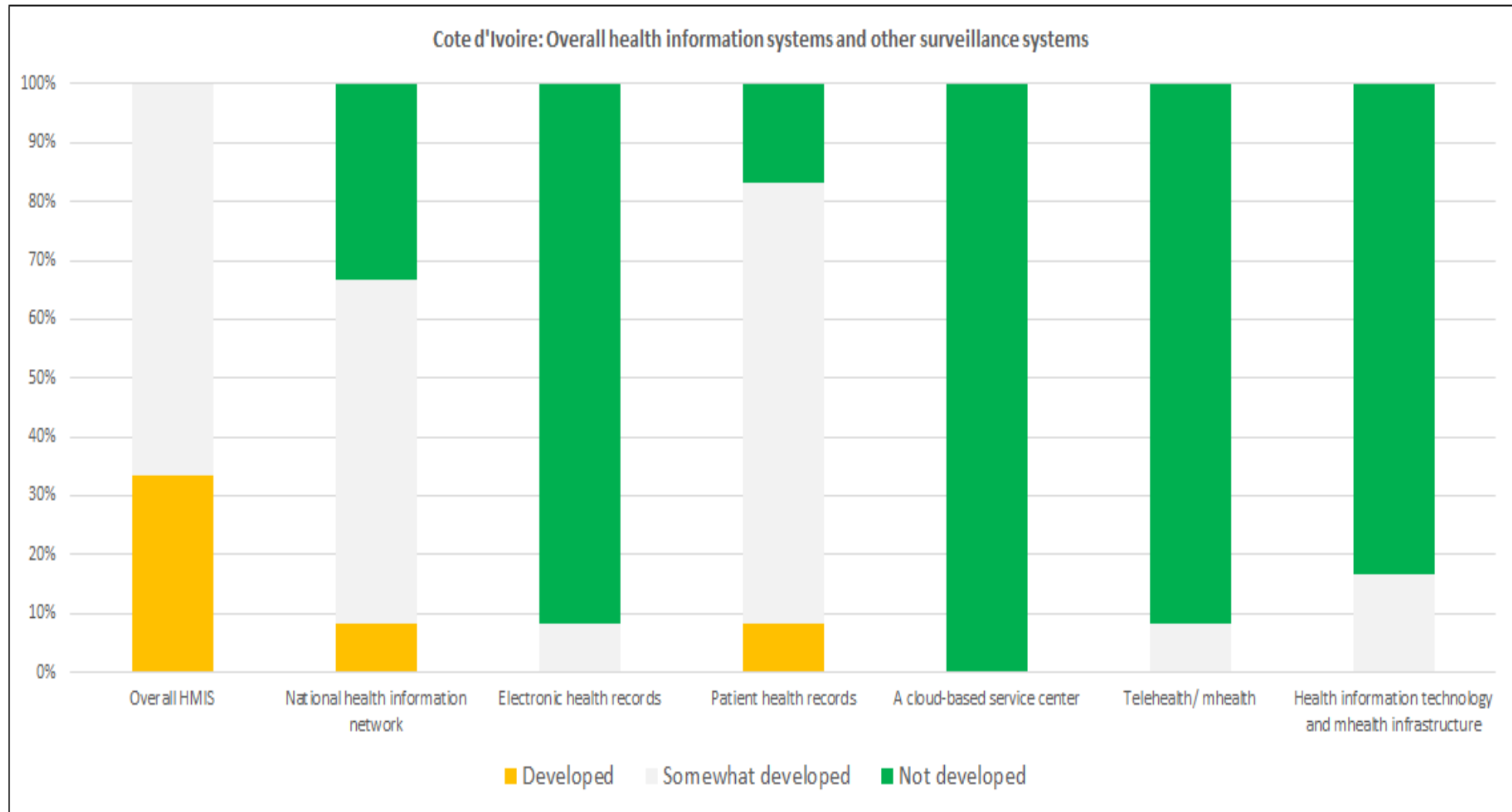
# Barriers to accessing MNCH services, Côte d'Ivoire

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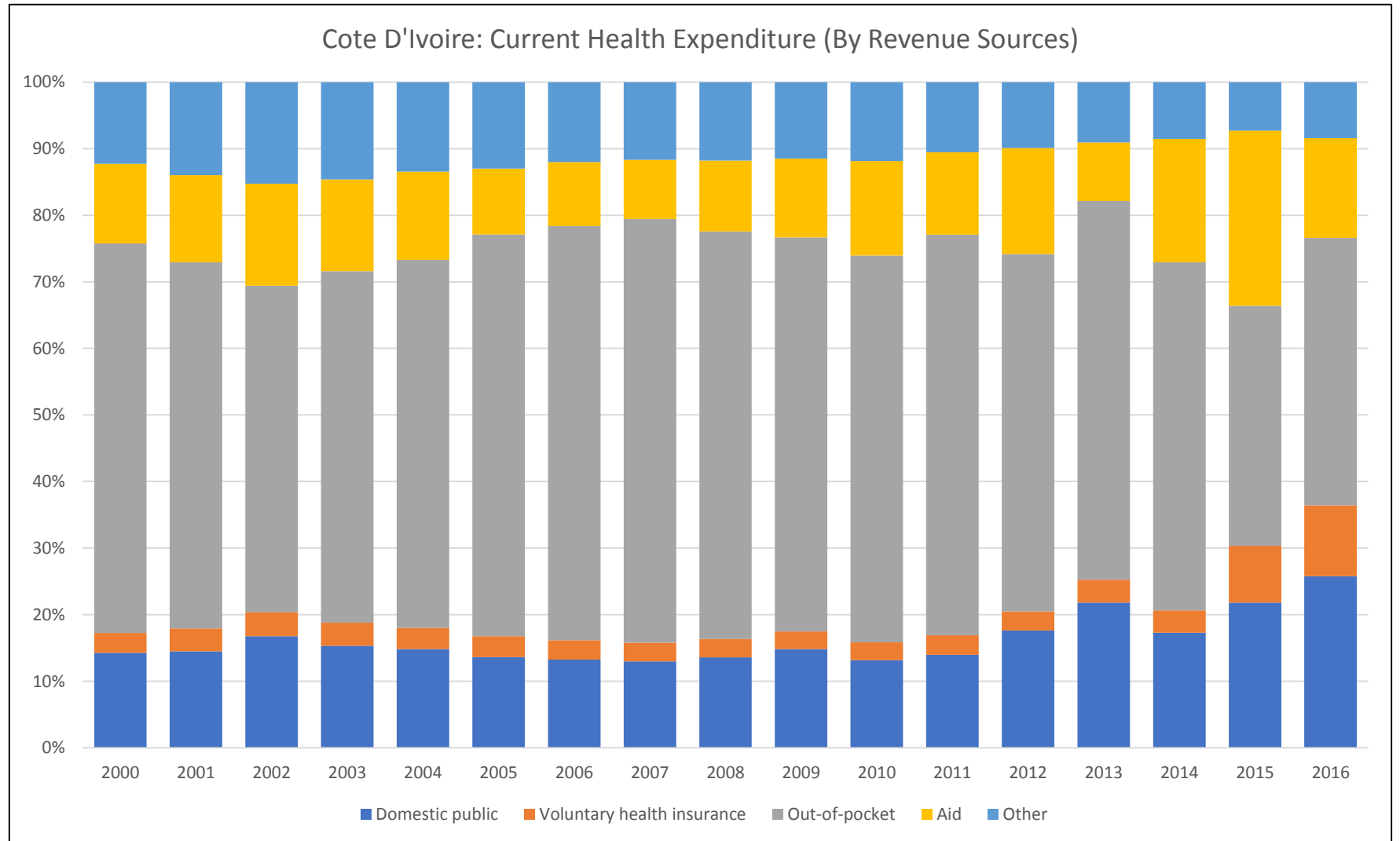
## Cote d'Ivoire: Barriers to assessing MNCH services



# Overall health information systems and other surveillance systems situation in Côte d'Ivoire



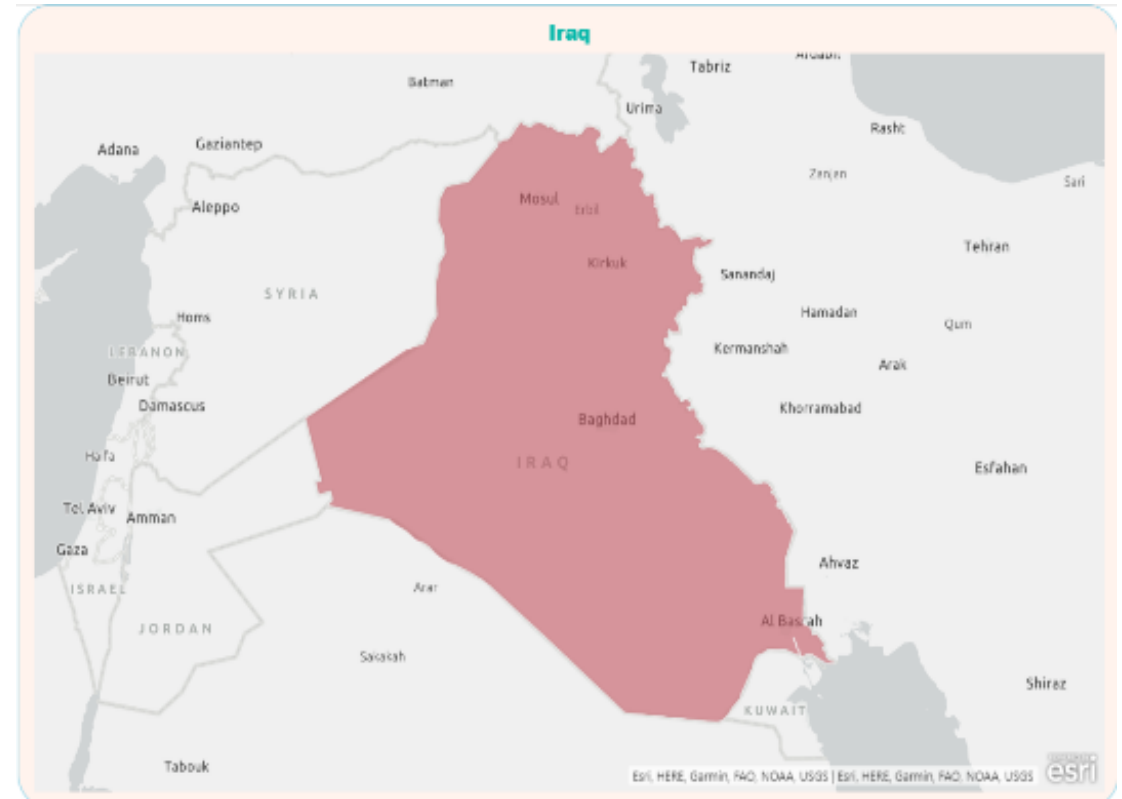
# Current health Expenditure by revenue sources



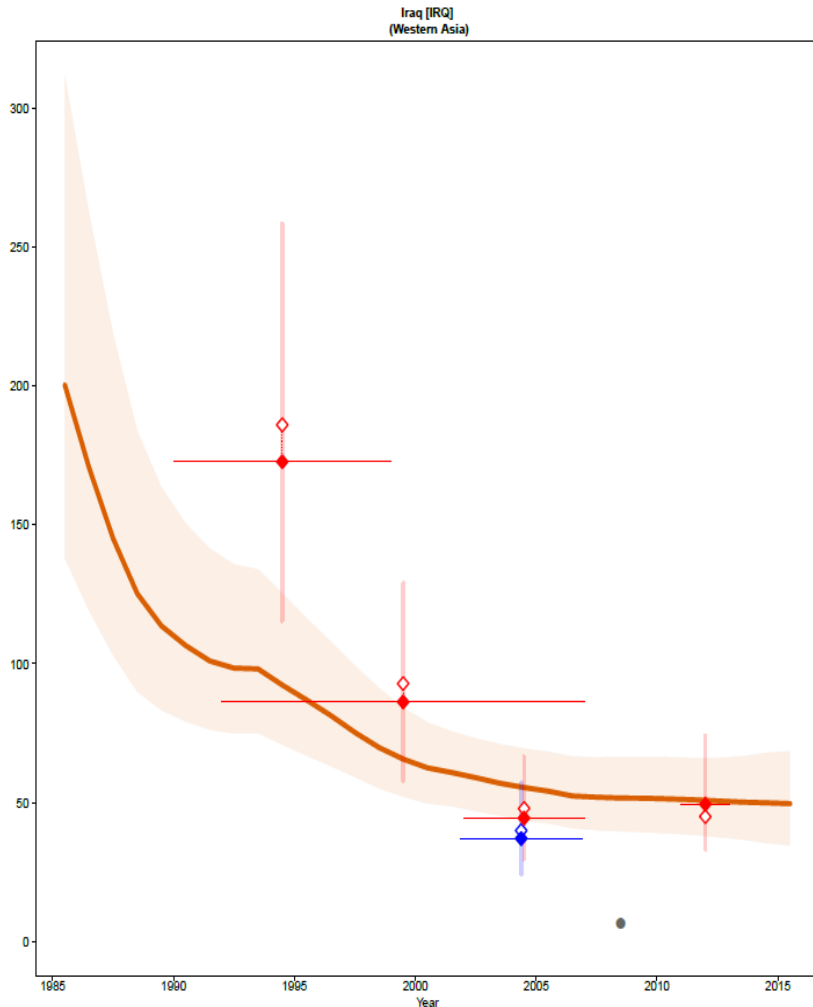
- Government spending increasing
- Health insurance increasing
- Out-of-pocket expenses for health care is decreasing

# Iraq

- Among all Middle East countries, Iraq has one of the lowest GDP level
- However, the country is resilient:
  - Child mortality is relatively low



# Maternal mortality ratios



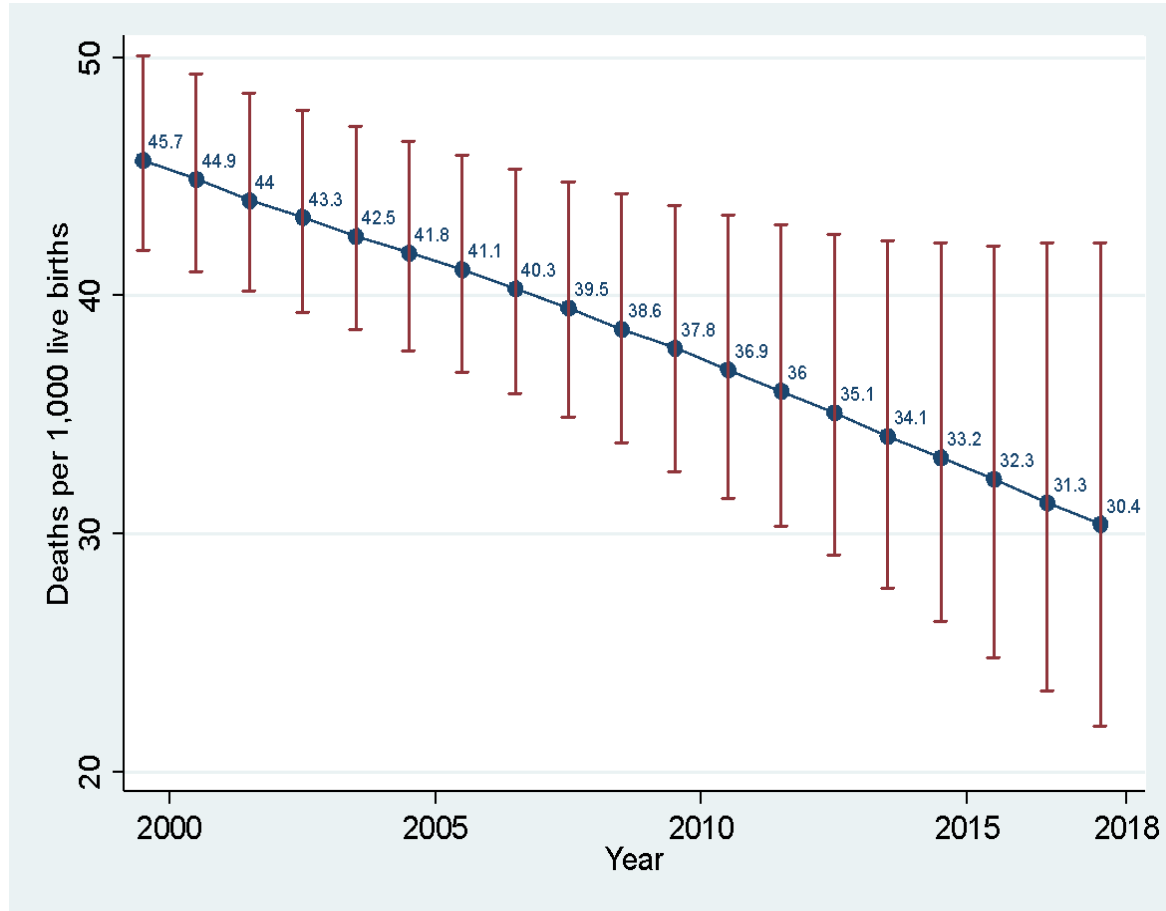
- Estimates -
- MMR Database 2015 —
- ◇ Observed Data
- ◆ Adjusted Data
- Data type -
- ◆ DHS
- ◆ Misc. studies
- Excluded VR data (data quality issues)

The most recent MMEIG/WHO estimates (September 19, 2019), suggest that maternal mortality has not reduced in Iraq between 2000 and 2017.

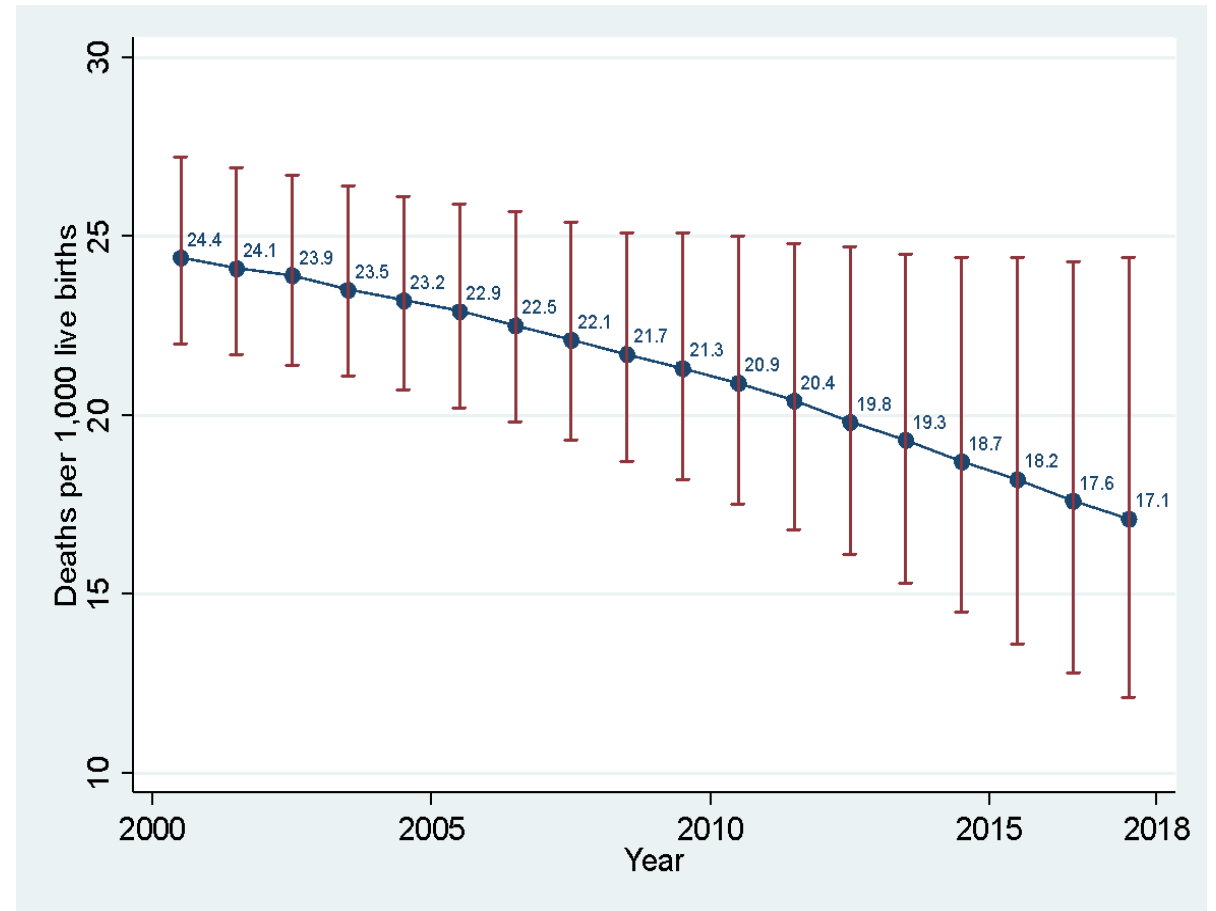
**The estimated MMRs:**  
**79 in 2000,**  
**127 in 2005,**  
**83 in 2015,**  
**79 in 2017.**



# Under-five mortality rates

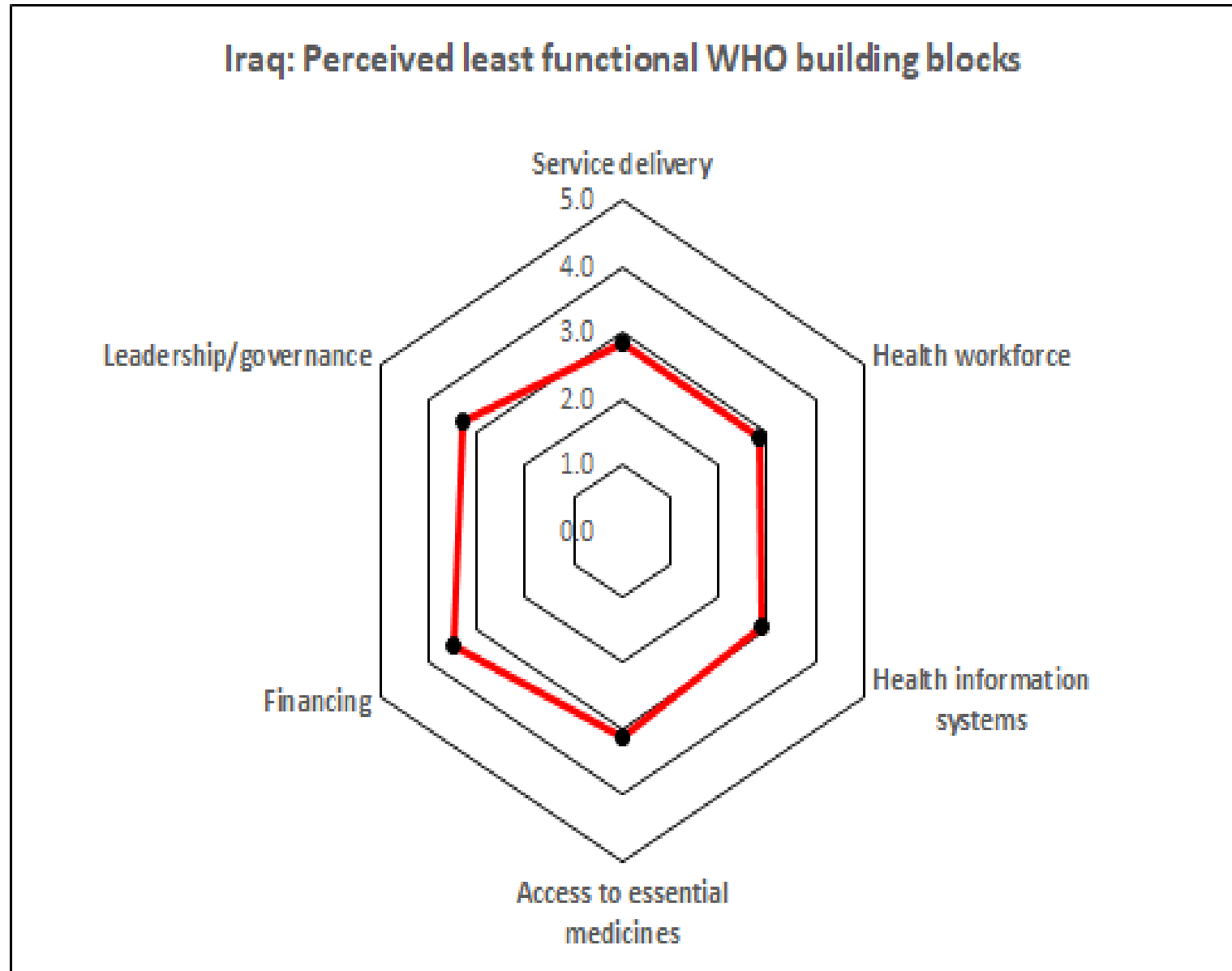


# Neonatal mortality rates



# Stakeholders' perceived least functional health system building blocks, Iraq

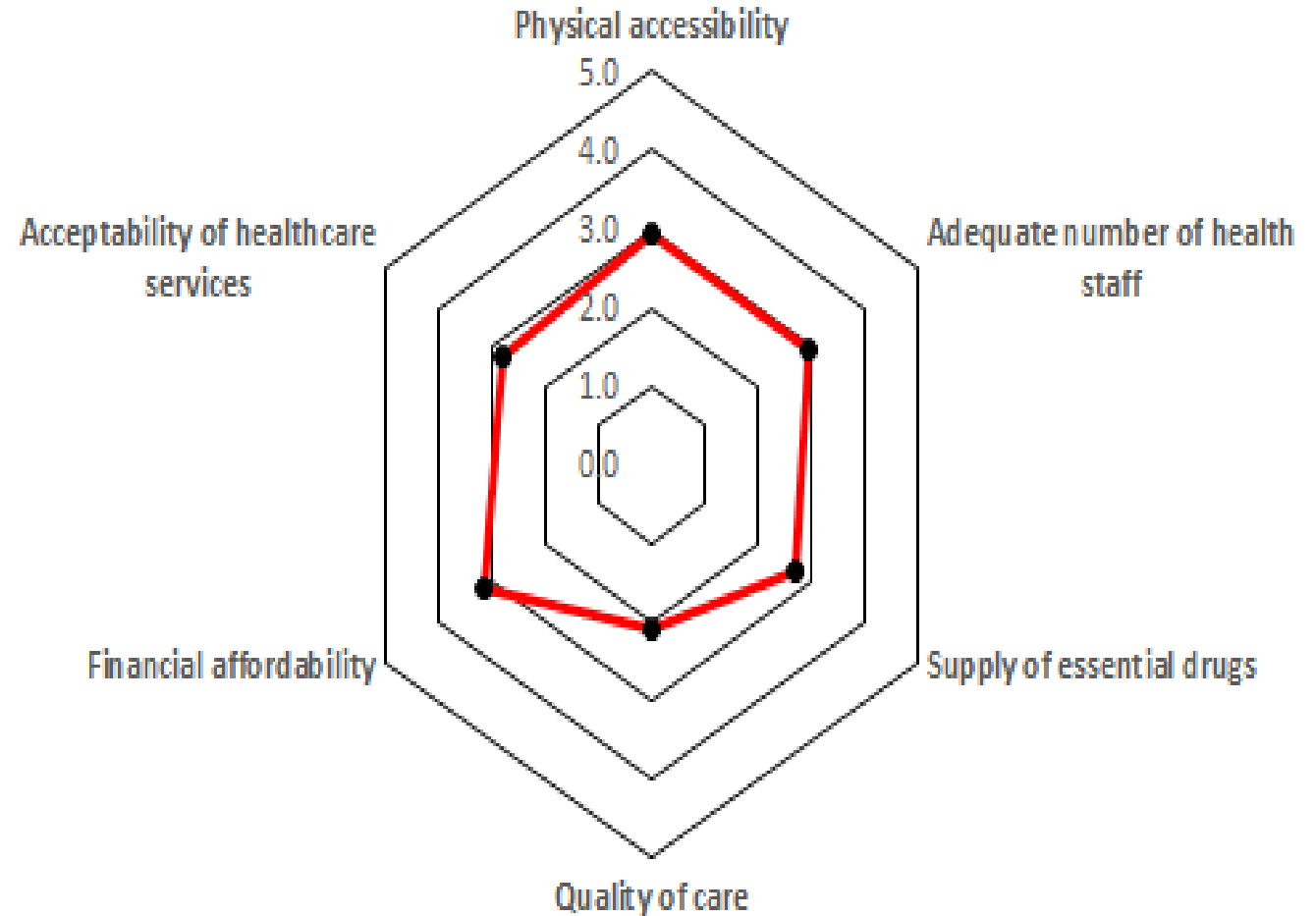
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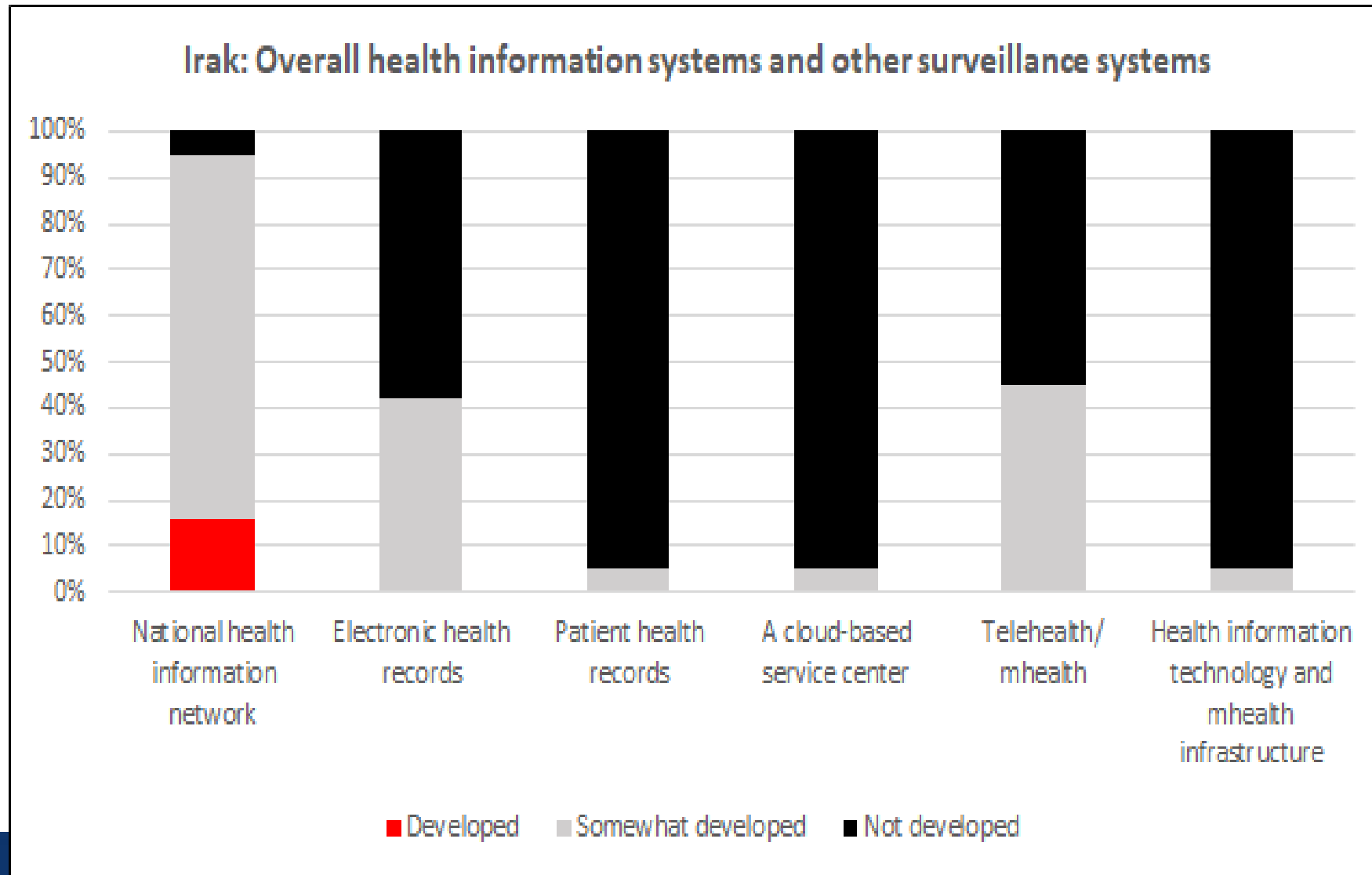
# Barriers that prevent families from seeking delivery care from MNCH services, Iraq

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Iraq: Barriers to assessing MNCH services

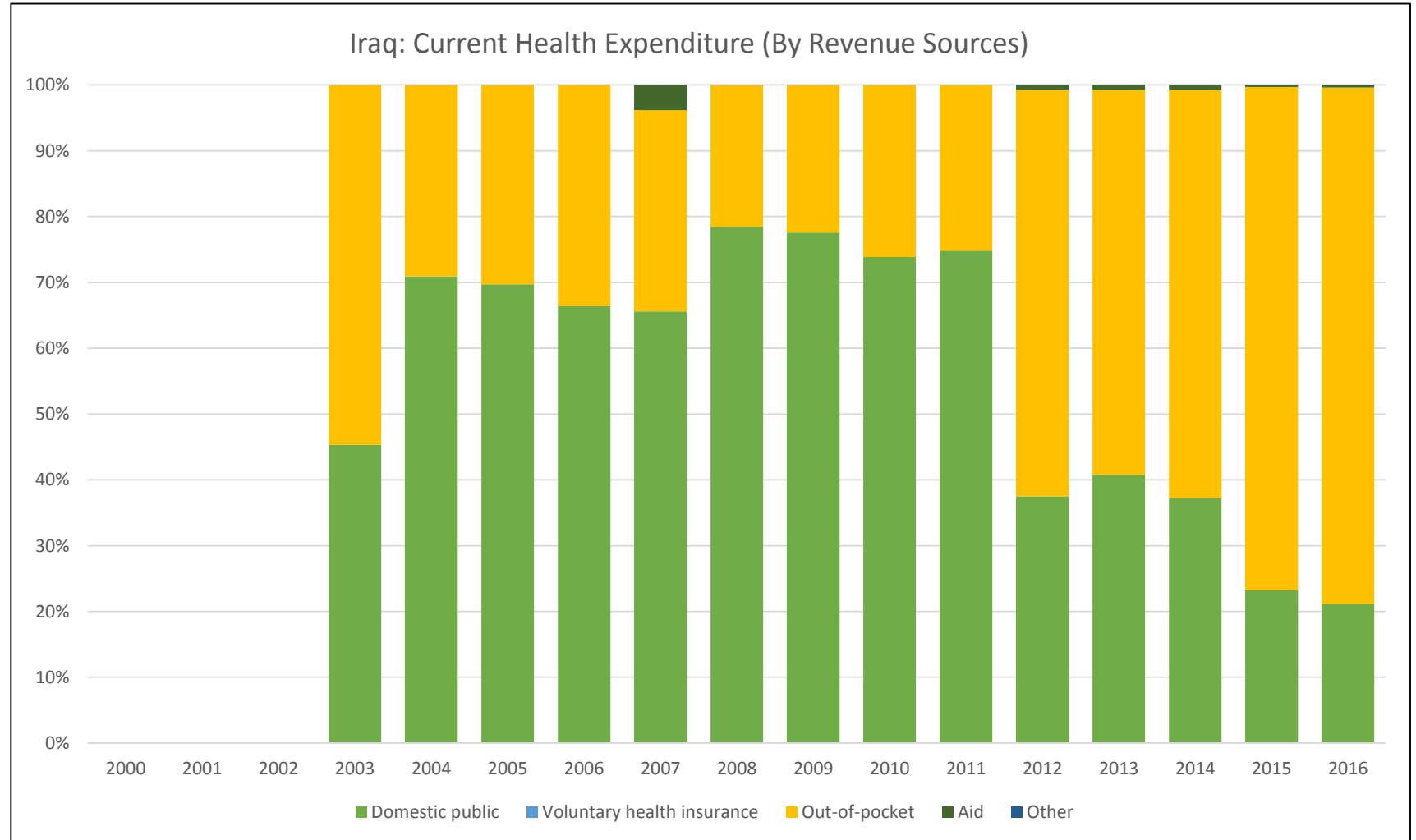


# Overall health information systems and other surveillance systems situation in Iraq

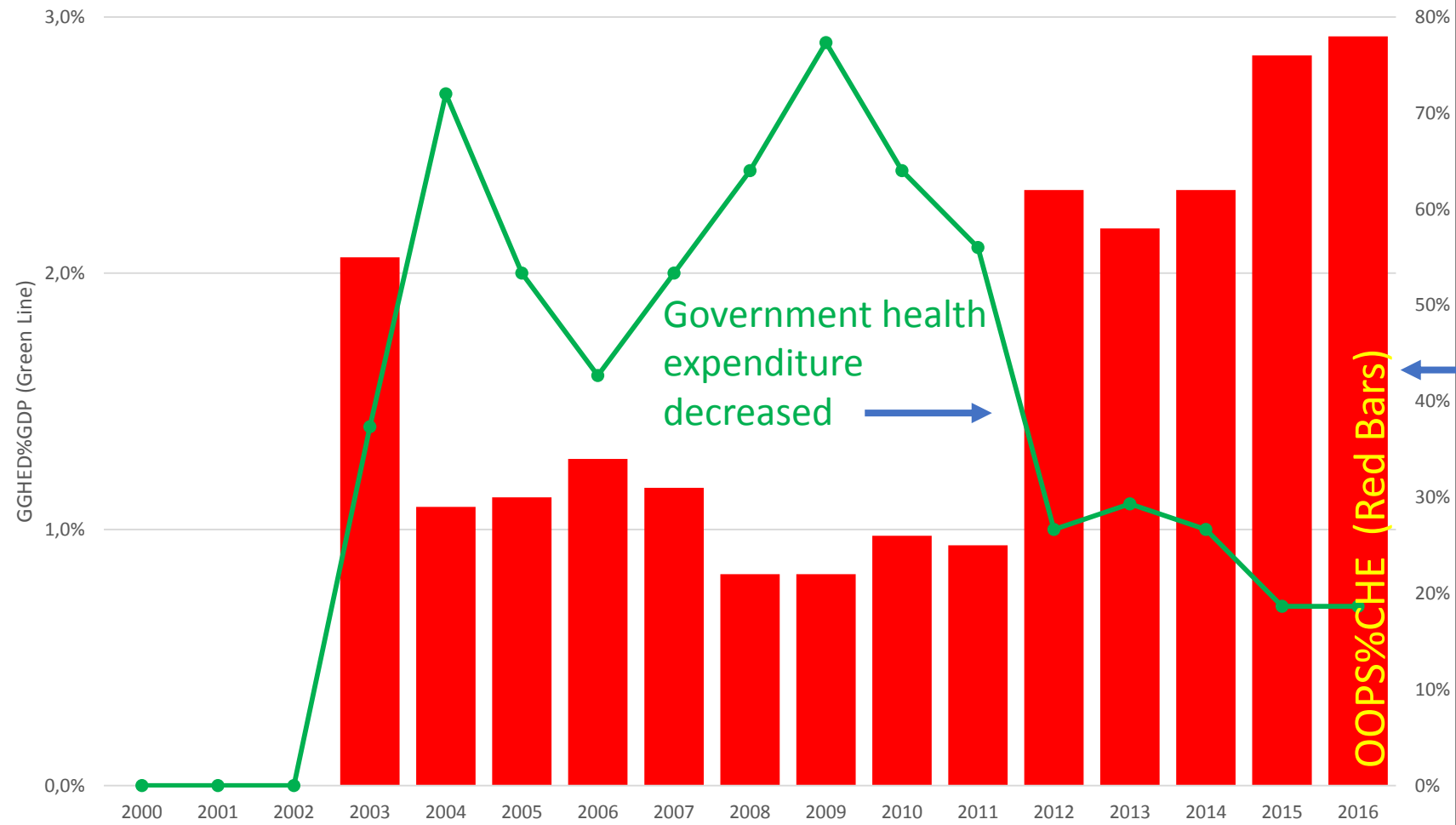


# Current health Expenditure by revenue sources

Out-of-pocket expenses have increased dramatically in Iraq



# Iraq: Domestic Government Expenditure and Out of Pocket Spending (GGHE-D%GDP and OOPS%CHE)



Out-of-pocket expenses have increased dramatically

# Lessons learned

- **MNCH care inequities are very high** in many OIC countries
- **Quality of Care is considered a major problem** and a prominent barrier to accessing healthcare services
- While leadership is strong and policies have been enacted to improve MNCH, **governance to monitor and enforce the policies seems to be lacking**
- Adequate governance and monitoring of health centers and hospitals are **needed to keep providers accountable**
- **Health information systems** are in place and functional, but the **coverage and data utilizations are low**





# Recommendations

- **Improve health system functioning and quality of care** through accountability, training, practice of recommended standard of care protocols, regular monitoring of standards, and good governance.
- **Reduce inequity in maternal and child health care and reduce barriers to accessing care** through targeted intervention programs for reaching vulnerable, poor, less educated and rural populations. Health insurance programs also help in reducing out of pocket expenses and may increase access to care
- **Improve FP access and contraceptive use** through an integrated approach, especially in sub-Saharan African OIC countries, where maternal and child mortality levels are high despite high rates of facility deliveries. These countries have low contraceptive prevalence rates.
- **Improve health information management systems** through investment and appropriate policies on improving routine data collection, systematic timely reporting, full coverage and data utilization



Questions?