# REGIONAL UNIFIED HEALTH RESEARCH AGENDA 2017-2022

# AUTONOMOUS REGION IN MUSLIM MINDANAO

National Unified Health Research Agenda 2017-2022

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## REGIONAL UNIFIED HEALTH RESEARCH AGENDA 2017-2022 Autonomous Region in Muslim Mindanao

### Introduction

The Philippines is at a turning point where it is slated to reap the benefits of health research investment towards the country's economic, social, and scientific growth (Philippine National Health Research System, 2018). Research has a huge role in the competitive edge of the country to boost its health economy local and abroad. There is huge potential in expanding innovation, health services in the country, and production of health goods, as well as in building the capacity of highly qualified Filipino healthcare managers and researchers. Setting a research agenda is essential to maximize the impact of investments and is regarded as key in strengthening health research systems.

The Philippine National Health Research System, with its goal to enhance health status through health research, generates the National Unified Health Research Agenda (NUHRA) as one of its core areas, alongside ethics, utilization, resource mobilization, system monitoring and evaluation, and capacity building. While the NUHRA serves as the country's template for health research and development efforts, previous evaluations revealed that the Regional Unified Health Research Agenda (RUHRA) was still perceived as more important as it was more relevant to regional problems and gave direction at the regional level (Ramos-Jimenez et al., 2015).

In the development of NUHRA 2017-2022, the Regional Health Research and Development Consortium (RHRDC) of each region was included in the identification process of health research priorities through the conduct of a consultation with other relevant stakeholders. Their inputs, together with technical papers and situationers defining the national and regional status of health research, were considered as important contributions in the formulation of the NUHRA and RUHRA (Philippine National Health Research System, 2018). The RUHRA presents the identified health research priorities and a contextual analysis of each and should guide researchers and funders alike in the development of more relevant health research in the region for the next six years.

Beyond research agenda setting, there is a challenge in equipping health professionals and researchers with good opportunities in an academic environment of innovation and research. Each region should also consider strengthening capacity in the implementation of RUHRA, management of research, and ultimately generating research outputs that can compete in local and global markets.

Health research has been vibrant and largely fueled by independent efforts of the academe. Studies on the improvement of health service delivery and discovery of new medicines and drugs were given focus. The challenge, however, was the local dissemination and application of the knowledge generated by health research (Abamo et al., 2017). This document outlines the methods undertaken in the development of RUHRA and the health research priorities identified for the Autonomous Region in Muslim Mindanao (ARMM).

## **Regional Consultation**

The regional consultation for ARMM was held on 18-19 April 2017 facilitated by the Alliance for Improving Health Outcomes, Inc. in coordination with the Philippine Council for Health Research and Development Central Office and the ARMM Health Research and Development Consortium. There were a total of 22 participants, ten of which are from the academe, nine from government organizations, two from hospitals, and one from a non-government organization (NGO) (Annex A). The consultation defined the health needs and concurrent research priorities of different institutions through their representatives.

Each participant was provided with a regional consultation package, which included the consultation design and the program. Technical papers were presented to provide a context on the research and policies of government and multinational agencies. A regional situationer, which described the stakeholders, health research context, and health challenges, issues, gaps, and threats in the region, was also presented.

The research priorities and perceived needs of each representative were raised through small focus group discussions, with participants grouped into two: academe and non-academe. Each group was given metacards and asked to write down potential research topics. Both groups proposed possible research topics, which were presented to the plenary by a representative from each group. The suggested topics were grouped under fourteen general themes.

These themes were prioritized using criteria with designated scoring weights established by the stakeholders, ensuring that the final list of priorities is attuned to the Regional Development Plan 2017-2022 of the Regional Economic and Development Planning Board Technical Secretariat. The participants were given metacards where they wrote down suggestions for the criteria. After discussion and finalization, the following criteria was used:

- Impact (31%): relevance of research efforts as indicated by the perceived potential impact that the topic would have, including addressing emerging health problems, reducing the disease burden, improving nutrition and wellness, and reducing morbidity and mortality rates
- Alignment to the Regional Development Plan (28%): research efforts should be in support of the attainment of regional goals and priorities
- Practicality or feasibility (21%): research efforts should be implementable given the regional capacities and within the specified time frame, including cost considerations and technical research capacities
- Cultural sensitivity (20%): research efforts should be responsive to the unique characteristics of the region being a predominantly Muslim area with various ethnolinguistic communities comprising its demography, including considerations for indigenous knowledge and practices relative to health and health-seeking behavior influenced by culture and religion



A summary of the score generated per topic is provided in Annex B.

### Health Research Priorities of the Region

The research priorities for ARMM comprise of 14 themes, namely: (1) environmental health and sanitation; (2) Halal in health; (3) family health; (4) health and climate change; (5) health in emergencies; (6) nutrition studies; (7) studies on health systems; (8) non-communicable diseases; (9) mental health; (10) health-seeking behavior; (11) communicable diseases; (12) studies on cultural/indigenous practices affecting health; (13) health and digital technology; and (14) emerging and re-emerging diseases. Some of the themes have corresponding specific research topics. These themes and topics are presented below, together with a brief situational analysis or data specific to the region.



#### Environmental health and sanitation

Research on challenges in urban sanitation, access to potable water, and access to sanitary facilities

As of 2015, 52.5% of households in the region were reported to have poor access to safe water supply, while 74.0% do not have sanitary toilets (Department of Health, 2015). Researchers should seek to address the region's challenges in urban sanitation, access to potable water, and access to sanitary facilities. Specific research topics include:

- a. Knowledge, attitudes, and practices on solid waste management
- b. Improving practices in the use of toilets and promoting zero open defecation
- c. Behavioral research affecting waterborne diseases like typhoid fever and diarrhea
- d. Water contamination, pollution
- e. Stray dogs (rabies)



#### Halal in health Research on building and institutionalizing the Halal industry

The Halal industry is an emerging need of the region brought about by the felt need to improve the way of life of Muslims in the region. As the Halal industry largely covers and designates food and drink and matters of daily life, health-related research can be done to help build and institutionalize this industry in the region. Specific research topics include:

- a. Benefits and effects of Halal food, pharmaceuticals and lifestyles
- b. Promote Halal product development and community practices, like hygiene, sanitation, and wellness



Family health Research to promote healthy families and healthcare for children and adolescents

The reduction of infant and maternal deaths in the region is included as targets of ARMM's Health, Education, Livelihood, Peace and Governance, and Synergy (HELPS) program. Research should aim to promote healthy families, decreased infant and maternal deaths, and healthcare among children and adolescents. Specific research topics include:

- a. Maternal health
- b. Adolescent health, e.g. teenage pregnancies: increased birth and maternal mortality among young mothers (risk factors affecting maternal health especially in teenage mothers)
- c. Child health
- d. Family planning
- e. Indigenous people



#### Health and climate change

Research on environmental health issues and climate change impacts on health

Researchers should aim to address the knowledge gap on environmental health issues and climate change impacts on health. Specific research topics include:

- a. Study the effects of climate change to health
- b. Build community resiliency to climate change
- c. Build the capacity for food production amid environmental challenges



#### **Health in emergencies**

Research for a more disaster resilient health system

Research should be geared towards having more disaster-resilient health systems. Specific research topics include:

- a. Studies that will build community resiliency to man-made and natural disasters that often plague the region
- b. Ramification of disasters to health
- c. Build capacities of the region to respond to emergencies, that would include accidents, emergency birthing, and other health emergencies



### **Nutrition studies**

Research to improve nutrition for all

Research should aim to effectively improve nutrition for all and increase availability of healthy food options. Specific research topics include:

- a. Development of functional food
- b. Health seeking behavior promoting nutrition
- c. Family practices related to food preparation
- d. Development of appropriate nutrition programs to address malnutrition in the region



#### **Studies on health systems**

Research on health infrastructure and processes at all levels

The ratio of a barangay health station to the number of barangay it serves in the region is 1:6, far from the ideal 1:1. While the deployment of various health personnel had improved since 2012, there is still an uneven distribution among the provinces, and health personnel to population ratio have not reached the ideal levels (Department of Health, 2015). Research should explore health infrastructures and processes at the community, municipal, provincial, and regional levels. Specific research topics include:

- a. Research to address human resources for health gap (doctors, professionals, experts, health practitioners)
- b. Impact evaluation studies of government service delivery (e.g. RxBox, eHatid, conditional cash transfer
- c. Health facilities (research for health service delivery improvement and strengthening)
- d. Health information system: data management (reporting and documentation)
- e. Health economics
- f. Health governance



#### Non-communicable diseases

Research on predisposing factors related to non-communicable diseases prevalent in the region

In 2012, hypertension was the second leading cause of morbidity in the region with 9,214 reported cases (Department of Health, 2012). Research should aim to study the predisposing factors, such as cultural or behavioral, relative to non-communicable diseases prevalent in the region. Specific research topics include:

- a. Diabetes
- b. Hypertension
- c. Persons with disabilities
- d. Cancer
- e. Renal disease



#### Mental health

Research on psychological and psycho-social factors that affect the mental health of the community

With the recent passage of the Mental Health Bill, the topic is increasingly gaining traction. This research theme covers psychological and psycho-social studies among the population and vulnerable groups. Specific research topics include:

- a. Conflict-affected areas
- b. Drug abuse-related
- c. Other substance abuse



#### **Health-seeking behavior**

Research on behaviors and practices of locals in the region

Health behaviors and practices are reflections of an individual's health beliefs and may be defined as any action taken towards achieving good health. Research should aim to investigate the behaviors and practices of locals in the region. Specific research topics include:

- a. Why locals go to other regions for treatment
- b. Why people delay seeking health assistance and care
- c. Factors affecting both the demand and supply side of the health continuum



#### Communicable diseases

Research to improve service delivery and address the problem of notifiable and communicable diseases

Of the ten leading causes of morbidity in the region, eight are communicable diseases, including tuberculosis (TB) and pneumonia (Department of Health, 2012). Research should aim to improve service delivery and address the problem of notifiable and communicable diseases. Specific research topics include:

- a. TB
- b. Dengue
- c. Pneumonia
- d. Leprosy
- e. Human immunodeficiency virus or acquired immunodeficiency syndrome
- f. Sexually transmitted infections



### Studies on cultural and indigenous practices affecting health

Research on health needs and behaviors of indigenous peoples

ARMM is home to diverse ethno-linguistic peoples, including the Tausug, Yakan, Maranao, Sama, Teduray, Iranun, Tagalogs, Ilocanos, Bisayans, among others. Researchers should aim to determine the health needs and behaviors of indigenous peoples (IPs) in the region. Specific research topics include:

- a. Find proper interface between traditional and modern health practices
- b. Indigenous knowledge and practices
  - i. Maternal
  - ii. Neonatal
  - iii. Breastfeeding
  - iv. Circumcision
  - v. Trauma management
- c. Health benefits or ill-effects of some traditional practices like betel nut chewing, diet of IPs, and others



### Health and digital technology

Research on technology innovations and healthcare services

Research should aim to contribute to bridge the knowledge gap on technology innovations and healthcare services. Specific research topics include:

- a. Maximize the use of digital technology in promoting healthcare and wellness
- b. Development of digital technology-based health service delivery, information system, and health equipment



#### Emerging and re-emerging diseases

Research on prevention of emerging and re-emerging diseases

Cholera outbreak hit Sitio Tukamarur in Bongo Island, a remote village in Parang, Maguindanao in April of 2013, affecting more than 60 individuals and resulted to the death of one person. While this may have been an isolated case, it highlighted the major health challenge faced by the region since 2012 - water and sanitation-borne and other common preventable diseases (Abamo et al., 2017). Researchers should aim to continue monitoring and studying the prevention of emerging and re-emerging diseases, such as cholera or bird flu viruses, to prevent its spread and ultimately place it under control.



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## Annex A: Participants of regional consultation

Name	Position	Affiliation		
Julie Maliga	Program Coordinator	Bangsamoro Development Agency		
Michael Macion	Chief of Hospital	Datu Blah T. Sinsuat District Hospita		
Abdulhalik Kasim	Assistant Regional Secretary	Department of Health (DOH) ARMI		
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Erna Duma	Research Staff	MSU Maguindanao		
Cynthia Filipina	Research Coordinator	MSU Marawi		
Fema Abamo	Research Director	MSU Marawi		
Nursidar Mukattil	Professor	MSU Sulu		
Magna Anissa Hayadunni	Associate Professor	MSU Sulu		
Hannah Farinah Lidasan	Nutrition Officer III	National Nutrition Council		
Forante dela Cruz		Office of the Southern Cultural Communities		
Ahme Dee Sendad	Planning Officer	Regional Planning Development Office		
Marlon Garrigues	Health Research Div-Head	Upi Agricultural School		
Charlimagne Astrologo	Nutrition Dietician	Wao District Hospital		

## Annex B: Results of priority scoring

Rank	Торіс	Impact (31%)	Alignment of Regional Development Plan (28%)	Practicalit y or feasibility (21%)	Cultural sensitivity (20%)	Final score
1	Environmental sanitation	9.5	9.6	8.8	9.0	9.2
2	Halal in health	9.0	9.1	8.8	9.3	9.0
3	Family health	9.0	9.2	8.9	8.8	8.9
4	Health and climate change	8.5	8.8	8.5	8.4	8.5
5	Health emergencies	8.4	8.7	8.3	8.1	8.3
6	Nutrition	8.1	8.3	7.7	8.0	8.0
7	Studies on health systems	7.4	7.4	7.2	7.1	7.2
8	Non-communicable diseases	7.3	7.3	6.8	6.7	7.0
9	Mental health	7.3	6.6	6.7	6.5	6.8
10	Health seeking behavior	6.5	6.3	6.1	6.7	6.3
11	Communicable disease	5.9	6.5	6.0	6.0	6.0
12	Studies on cultural and indigenous practices affecting health	5.7	5.6	5.2	6.0	5.6
13	Health and digital technology	5.8	5.2	5.5	5.4	5.4
14	Emerging and re-emerging diseases	5.2	5.7	5.3	5.1	5.3

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