

# Research in Health Manpower Development

By

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Progress in Health Manpower Development (HMD) and HMD research (HMDR) has been very slow in spite of attempts and contribution by many wise people. Lack of progress in HMD and HMDR has contributed to currently existing health care crisis, which is a serious problem to be discussed later. Genuine attempt should be made to understand the underlying etiology and to try to remedy **the HMD illness**.

## **Trap of Strong Conservative Field Force**

There is a contradiction between health and HMD. **While health is a dynamic interaction system, HMD is disciplines and professions based which is rather isolated and static.** Health is complete physical, mental, social, spiritual and ecological well being ; these health determinants are interactive and dynamic and make health multicausal. But the prevailing medical science paradigm is based on biological model only. According to this model health is monocausal. This concept of health has led to disease-oriented approach, emphasis on technical interventions, limitation of the role of cure to experts who possess the technical skill, dominating roles of the medical professions and institutions. Medicine has thus become institutionalized with power to determine how health personnel are to be taught. **The making of health personnel has therefore fallen into a very strong conservative field force of professionalism and institutionalism.** This is why HMD is very conservative and static in the face of dynamic changes. The 20<sup>th</sup> century sciences, such as Einstein's Relativity, Quantum Physics, Principles of Uncertainty, Chaos, Complexity, Emergence and Self Organization, for examples, have brought a new understanding of reality which is dynamic interconnectedness of everything. But the concept of modern medicine is based on the old science of the 17<sup>th</sup> century which views things in isolation and fragmentation. HMD is thus trapped in a strong conservative field force consisting of archaic view of health, professionalism and institutionalism. This is then not surprising why HMD is not readily amenable to change. However, the lack of capability to change in the stream of changes leads to crisis.

## **Health Care Crisis**

### **Health Care Reform-HMD Reform**

Highly advanced technology has been increasingly used in health care. This has brought many miracles in medicine. But the rising cost of health care is bringing crisis to the system. In U.S., health care expenditure constitutes 12-14 percent of the national income. This is the highest health expenditure in the world, both in proportions and in real term. But American society does not receive proportionally high health return. Thirty-seven million Americans are without health insurance of any kind. And when sick, these unfortunate Americans do not dare to go to the hospital, but wait until the condition becomes critical. The high cost of medical care makes economy less competitive, contributing to unemployment and consequential problems such as the homeless people, crimes and violence. Patterns of health care in other countries are following the footsteps of the American.

Thus there is a need for health care reform. HMD cannot be done in isolation, but should be inter-related to changing health care system. HMD consists of planning, production and management. In the past health manpower production is rarely coordinated with utilization. Health care system and health manpower production system usually operate in isolation. Production is technic and professions oriented but not system oriented. In the face of the inevitable health care reform; HMD should be inter-relatedly reformed. Health care reform-HMD reform should go hand in hand.

## **HMD Research**

### **Two Big Questions**

In order that HMD be knowledge-based HMD research is needed. The desirability for HMD research has been expressed for quite some time but the progress has been very slow due to inherent difficulties in this type of research. The critical issues in HMD research are what are the research questions and how to carry out the researches.

Two big questions in HMD research are :

1. **What is the New Education for health personnel?**
2. **How can HMD be inter-related with health system development?**

These two issues are briefly discussed as follows.

## **The New Education for Health Manpower**

In the rapidly changing world there is a need for the New Education for health manpower. First of all there is a need for changing from teaching to learning. Transmission of finished knowledge must transform to dynamic learning

process. Learning how to learn will enable health personnel to be able to learn continuously in their working. This is to prevent one from becoming a finished product or dead-ended, unable to learn and unable to change. New concept of health is needed to be developed to replace the existing archaic one as discussed earlier. Reconceptualization of health will bring about new vision of health and health system and transformation of health care. Reconceptualization of health should be an important component of HMD research. New health personnel should have systems perspectives and skills to deal with complex and changing health system. Critical thinking and research capability to create necessary new knowledge should be required. Human and cultural understanding and skills will be increasingly required in the futures.

Above are examples of composition of the New Education for health personnel. Researches are needed to answer the questions : (1) What is the New Education for health personnel and (2) How to carry out the New Education, What is the result and how to improve it.

### **Joint Health System Development-Health Manpower Development**

Health system development (HSD) and HMD should be knowledge-based, i.e.. research is needed to generate knowledge at every inter-related step as summarized in Fig.1.

Researches are needed to understand health transitions (Step 1) in term of epidemiological, technical, population and social, and economical or health care financial aspects. Good health should be defined (Step 2), and indicators to monitor it developed. These two steps will help better understanding of the need for health care reform (Step 3), or development of the most cost-effective health care system. From character of the new health care system, it would be possible to define HMD needs (Step 4). Evaluation of existing HMD situation (Step 5) will contribute toward identification of HMD mismatches (Step 6). HMD mismatches correction options must be analysed in term of comparative cost-effectiveness (Step 7). This analysis will help sound policy decision (step 8). Implementation of the decision (Step 9) must be guided by knowledge generation in the process. Evaluation of the result of implementation (Step 10) will feed back to definition of HMD needs.

If every step is based on knowledge generation the HSD-HMD wheel should rotate constructively. However, it can be realized that the HSD-HMD researches are very involving and very difficult. They need multidisciplinary team approach, requiring, in addition to health scientists, epidemiologists, social scientists, economists, systems experts, educationists, policy makers and administrators. Skill in research management is very crucial for success.

Since this HSD-HMD research is extremely difficult, an area-based trial should be carried out. A district or provincial health care reform modeling should be carried out. It will provide an opportunity for joint health care system-health manpower development research. This is to be participatory action research and this kind of research will uplift every party concerned, intellectually, spiritually and management-wise.

### **Management Mechanisms for HMD Research**

Effective management mechanisms are very crucial for HMDR to happen. From the above discussion it should be very obvious that HMDR is too difficult for any researcher to dare to do it. HMDR is a system research, while most researchers have experiences in single disciplines researches. In addition HMDR involves going-on operations in the conservative power field as discussed earlier. Those involved in HMD operations will not be exactly happy to have some outsiders to research on what 'belong' to them. **'Interactive learning through action'** by all stakeholders are necessary for this kind of research. Management used in single disciplines research will not do. Suitable management mechanisms for HMDR should be understood and promoted.

In Thailand research management exists in the Ministry of Public Health (MOPH) in the universities and in the National Research Council (NRC) in which a Division of Medical Science is equivalent to MRC (Medical Research Council). None of the above has been able to manage significant HMDR. Recently three innovative research management organizations have been established by laws. All three use government's budget, relatively large amounts, but, as prescribed by laws, do not operate by bureaucratic rules. Flexibility and efficiency lead to remarkably rapid progress. The three innovative research management organizations are the Thailand Research Fund (TRF), National Science and Technology Development Agency (NSTDA) and the Health System Research Institute (HSRI). TRF, NSTDA and HSRI are in a position to support large research programs. It is hoped that with such powerful research supporting organizations HSR-HMDR research can be carried out in due time.

Recently a Thai Forum for Health Research and Development (TFHRD) has been formed to help coordinating national health research prioritization and promoting health researches and development. Members of the core group of TFHRD consists of Natth Bhamarapravati and Charas Suwanwela representing MRC, Aree Valyasevi representing the National Health Foundation, Yongyuth Yuthavong representing NSTDA, Vicharn Panich representing TRF, Somsak Chunharas representing HSRI and Prawase Wasi representing the King's Anandamahidol Foundation's Division of Medicine. With strong leadership of the core members it is hoped that TFHRD will be able to coordinate processes for participatory health development and research. Joint health system development-

health manpower development research should be high on the national health research agenda.

A national health research and development forum with strong leadership among the members represents a key mechanism for national health research promotion and support. In difficult HSD-HMD research, financial support alone is not adequate but there is a need for intellectual, psychological and social support. A national forum for health research and development with strong national leadership is in a position to provide intellectual, psychological and social support while connected with funding organizations. It is hoped that these mechanisms will be able to help HSD-HMD research to take off.

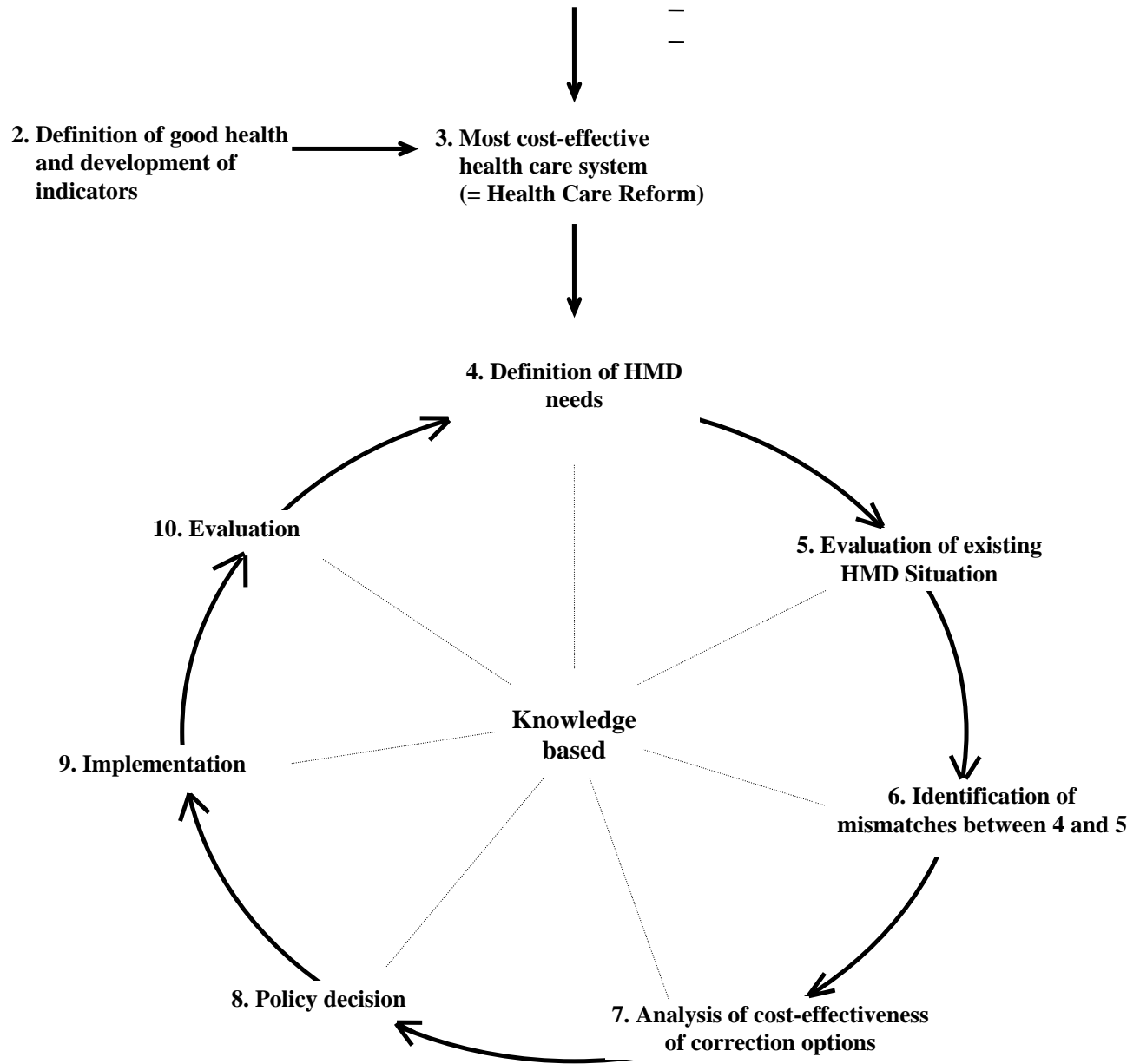
In each country suitable mechanisms to support HSD-HMD research should be found. A national forum for health research and development is one forum that can be started with. The World Health Organization with its wide spread infrastructure, interest and expertise in HMD research may promote development of national mechanisms for health research and development in each country. Other international organizations may choose to work with some selected countries to develop models of health care reform in conjunction with health manpower development reform through participatory action research and development. Partnership and alliance both within countries and internationally are keys to make the most difficult task of HMDR possible. Health system reform and health manpower development reform, although extremely difficult to carry out, are inevitable.

### **The Role of Civil Society and Social Accountability**

All having been said above, it is still extremely difficult to carry out HMD and HMDR, because HMD is trapped in the strongly conservative structures discussed at the beginning. Professionalism is too strong and powerful that even the government cannot make it to budge. The role of the civil society must be encouraged. Research results should be transformed from academic expression to a popular one to empower the public. Frames, rules and laws should be developed so that social accountability of health organizations can be measured and reported to the public.

The role of the civil society and social accountability of health organizations should significantly contribute toward making health system and health manpower development innovations possible, hence stimulating health manpower development research and utilization of research results.

- 1. Health Transitions** {
- Epidemiological
  - Technological
  - Population and social
  - Economical



**Fig . 1 Knowledge-based HSD-HMD cycle. Research is needed to generate knowledge at every inter-related step so that the HSD-HMD wheel rotate constructively.**