



# Primary Health Care: The Foundation of the Health System

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## Abstract

The Health care service delivery in various countries around the world is affected by many health care challenges that require immediate action. Such could include the entire reform of the health care services in those countries. To respond effectively to all those challenges while aiming at disease prevention, raising the health standard of the nation and ensuring universal health coverage, there is a need to adopt a suitable health care system. A system that is ought to be acceptable, professionally sound, able to respond to the peoples' needs and most important cost-effective i.e. less expensive than secondary and tertiary care. Family medicine is the solution for health care challenges that are facing almost every country in the world and PHC service should be the foundation of any successful health system.

**Keywords:** Primary health care; Family medicine; WHO; Health care challenges

## Introduction

The Health care service delivery in various countries around the world is affected by many health care challenges that require immediate action. Such could include the entire reform of the health care services in those countries. These challenges might deter any effort made for delivering optimal health care services to the public. The World Health Organization in highlighting such problem has specified some of these challenges that include: The insurgence of sudden endemic and pandemic diseases such as the recent COVID-19 disturbing the regularity of service delivery; around the world a great number of people still do not have access to essential health services (>400 million) [1]; countless individuals (around 6% of the total population) in the low and middle income countries, are pushed further into poverty because of out of pocket spending on health services (29 million lack access to health services); the number of illiterate individuals are high which plays a major role in health deterioration (in the Arab world 65 million of adults are still illiterate of whom two-thirds of them are women) [2]; One in 3 people globally do not have access to safe drinking water [3]; increased prevalence of Non-Communicable Diseases (NCDs) that lead to serious health implications and negative impact on the socioeconomic development (NCDs Kill 41 million people/year which is anticipated to increase to 52 million by the year 2030) [4,5]; maternal mortality rate in the EMRO region is still very high (around 350 maternal deaths per 100,000 live births) [6]; and the continuous sharp increase in the number of elderly population who exert marked constraints on the health services (In Bahrain for example the anticipated percentage will reach to 15% of the total population by the year 2025 and 25% by the year 2050) [7].

Moreover, the severe shortage in the number of health care workers worldwide and in particular within the EMRO region which could be an obstacle against the provision of optimal health services, leading to more deterioration in health (WHO reported that the Low and lower-middle income countries need 18 million more health workers if they are to achieve universal health coverage) [8].

To respond effectively to all those challenges while aiming at disease prevention, raising the health standard of the nation and ensuring universal health coverage, there is a need to adopt a suitable health care system. A system that is ought to be acceptable, professionally sound, able to respond to the peoples' needs and most important cost-effective i.e. less expensive than secondary and tertiary care. Experiences from around the world have indicated that these goals can only be achieved by adopting strong Primary Health Care (PHC) and Family Medicine (FM) services.

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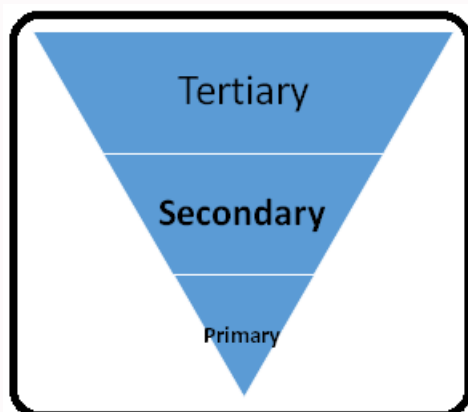
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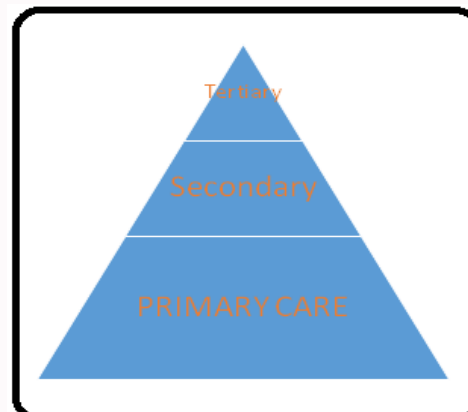
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**Figure 1:** Deteriorations of people's health are most probably happening because many countries adopt an upside-down pyramid of the health care system.



**Figure 2:** A strong and sustainable health system is usually built upon an impregnable and solid foundation of PHC that is resistant to crumbling in any catastrophe.

FM, which is the sixth specialty in medicine, is the specialty of primary care that plays an important role in delivering community-oriented primary care. It is not a new concept to be implemented but has been practiced centuries ago by our ancestor physicians who adopted a holistic approach while caring for their patients whether in the clinic or the home. From its name, FM is the specialty that provides care to all the family members of both genders from birth till death. It is built upon nine interrelated elements that cannot be dissociated: It is Primary, Continuous, and personal care for the individual within the concept of a family that has a preventative and curative responsibility. Moreover, the provided care is comprehensive and extended to integrate the biological, clinical, psychological and behavioral aspects of the illness. The service is coordinated, collaborative and community-oriented that is centered on a long-lasting, caring relationship with the patients and their families [9].

The instant aim of FM is to treat medical problems while its long goals are to promote health, to prevent diseases to decrease health burden and reduce the complication of the existing illnesses.

PHC on the other hand is considered to be the foundation of any health pyramidal services, with no doubt a strong foundation is required for a good health outcome.

Deteriorations of people's health are most probably happening because many countries adopt an upside-down pyramid of the health care system. These countries are mostly occupied by expanding the secondary and tertiary health care services while limiting or ignoring the PHC ones. Such policies with no doubt have played a major role in weakening the health system making it frail and susceptible to collapse at any disaster (for example such as the recent COVID-19 pandemic) (Figure 1).

While a strong and sustainable health system is usually built upon an impregnable and solid foundation of PHC that is resistant to crumbling in any catastrophe (Figure 2).

Despite that fact, many countries, at least in the EMRO region, have unfortunately failed to fully implement the PHC concept and as a system, it has not yet taken its full-fledged responsibility.

While aiming at raising the health standard of the nation, FM also thrives at decreasing the cost of health services. FM is not just cost-effective but provides distinguished quality services. It thwarts

the negative impact of the expensive health care on the health of poor nations, enabling them to have a greater economy in the usage of their resources [10,11]. Studies have indicated that PHC-oriented health systems are more effective in achieving better health and at a lower cost than a health system that is more disease-oriented [12]. There will be marked improvement of the health outcomes, decrease the load on the secondary health care services, as reflected in less hospitalization (inpatient admissions is reduced by around 6% and outpatient visits by 5%), reduce surgical procedures by over 7% and burden on other health services, reduce the patients' visits to accident and emergency units (by around 10%), and more people will be attracted to use the PHC facilities. Ultimately, PHC & FM will help in life-saving by improving the health of the individual and the whole community.

Overall, PHC systems ensure equity leading to better health distribution throughout the populations [13-15]. Hence, it ought to be adopted by all nations worldwide whether poor or rich.

Since prevention of illnesses is one of the major goals of PHC, It was found that each US dollar spent in preventive care is equal to 7 US\$ in curative [16].

Many successful practical experiences were reported from various countries after embracing PHC as a method of service delivery; Brazil in 1990 decided to build its health services system based on a strong PHC. During a period of seven years (from 1990 to 2007), there was much improvement on many health indicators in Brazil such as:

- Major reductions in post-neonatal and under-5 mortality rate.
- Infant mortality declined by 40% between 1990 and 2002. Moreover, there was a decrease in absolute rich-poor differences in infant and child mortality across different areas. (It was reported that a 10% increase in primary care coverage is associated with an average of 4.6% decline in infant mortality).
- Overall decrease in hospitalizations by over 5% annually and a large decline in hospitalizations for chronic diseases by 25% to 30% (especially cardiovascular diseases, asthma, hypertension and stroke) [17,18].
- While the provision of PHC in the United States of America was shown to be able to improve health more in the socially disadvantaged populations [14]. Seniors living in areas with

more primary care doctors were less likely to be hospitalized with any preventable disease and had lower death rates [19]. Similar experiences were obtained in Thailand after health reforms in 1990 and the implementation of PHC. It was found that the under-5 mortality rate was markedly improved [20].

Nonetheless, strong PHC services cannot be provided without leadership from well-qualified Family Doctors (FDs) supported by an experienced PHC team. Various reports have indicated that FDs who ought to be sufficiently trained in FM can manage more than 80% of the health problems that affect human being at all age groups and in both genders. However, to achieve a high standard of PHC there should be good numbers of qualified FDs. The 2008 evidence report of the American College of Physicians, while highlighting how important family medicine to the USA population, has accentuated the issue of the shortage in the number of PHC physicians. The report recommended that “The USA has yet to implement comprehensive strategies to recognize, support, and enhance primary care to the degree necessary to reverse a worsening primary care shortage” [21].

The relationship between the number of FDs and the health outcomes is strong. It has been found that a good supply of qualified FDs is associated with: Better quality of care and lower cost, better population health improvement in health indicators and an increase in the peoples’ life span and expectancy [22,23].

Studies have indicated that each additional FD per 10,000 people is associated with a 5.3% reduction in mortality [16]. A study in the USA after controlling for income inequality, education, unemployment, racial/ethnic composition, urban/rural location, percentage elderly, the percentage living in poverty and/or low income, found that an increase of every one PHC doctor per 10,000 population (approximately a 15% increase) is associated with 1.44 fewer deaths per 10,000 population, 2.5% reduction in infant mortality and 3.2% reduction in low birth weight [24,25]. The US states with higher ratios of FDs to the population have better health outcomes (including decreased mortality from cancer, heart disease, or stroke), and are more likely to report good health than those living in states with a lower ratio [26,27].

The World Health Organization while advocating for universal health coverage put down a recommendation that the optimal number of FD per population should be 1.3 family doctors for each 10,000 population. And for a good service outcome, each FD should care for not more than 1600 to 1800 people in the society. While the late Barbara Star field who was a strong advocate for FM stated that 50% of the physicians’ workforce in any country should be constituted of FDs [16].

## Conclusion

In conclusion family medicine is the solution for health care challenges that are facing almost every country in the world and PHC service should be the foundation of any successful health system. Primary healthcare-oriented health systems are more effective in achieving better health at lower costs than is the case for systems more oriented to disease management and specialty care. The WHO with several other international agencies has reflected the recent widespread acceptance of the people to the PHC concept. And they admire that PHC improves health and makes a considerable contribution to the reduction in the adverse impact of social inequalities on health [28].

The late Barbra Star field stated, ‘Family Medicine should shape

the reform of any health system and not *vice versa*’. FDs have to be at the forefront of any health care reform [29].

Due to the severe shortage of medical personnel, we do recommend that the medical schools in the region adopt a policy to graduate more doctors who are PHC oriented and who will pursue their post-graduate training in FM.

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