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## The Physician as Public Health Officer

The majority of the Public Health Officers (PHOs) in West Virginia are in private practice, ranging from family medicine, to pediatrics, and to surgery. Some have had formal training in public health; others have not. Only two are full-time PHOs. Yet, there are some fundamental commonalities. As physicians, all are trained in taking histories, completing physical exams, interpreting tests, making diagnoses and prescribing medicines – all a part of the art and science of healing. State Licensing Boards require physicians to graduate from an accredited school, pass certain exams, and conduct themselves accordingly, but what about the PHO? What are PHO standards? What is fair for the public to reasonably expect from their PHO?

In 1994, a collaborative of public health related groups defined more clearly what public health should do, and how it should do it; these efforts led to establishing the 10 Essential Public Health Services (10 EPHS).<sup>1</sup> These 10 EPHS are what every citizen should be able to reasonably expect from their Local Health Department. If these 10 EPHS, then, have come to be seen as a set of standards, how do we translate those standards for a physician who is now granted the title “PHO?”

### **Essential Service # 1. Monitor health status to identify community health problems.**

As clinicians, we learn very early the importance of monitoring specific vital signs of our patients. We gather subjective impressions from the patient through good history-taking, and we combine this with good objective information acquired through the physical examination and laboratory tests – this combination of subjective and objective information provides us with an overall assessment of our patient’s health.

As PHOs, vital signs become key vital statistics that tell us something about the health of our communities – e.g., teen birth rate, infant mortality rate, and deaths due to motor vehicle accidents associated with alcohol use. We combine these objective data with subjective impressions of the population, assessing strengths and problems of communities from their perspectives; we also look deeper into the underlying determinants of health. We formulate all of this as a community health plan, in contradistinction to the medical record for the individual patient.

### **Essential Service # 2. Diagnose and investigate health problems and health hazards in the community.**

Diagnosing is the critical element that sets physicians apart from other providers. As clinicians, we take key signs and symptoms, draw on a thorough history and review of systems and put the various pieces together until we have a unified diagnosis. Why? Because without a proper diagnosis, we don’t know what we are treating. This is the classic role of the PHO.

### **Essential Service # 3. Inform, educate and empower individuals in communities about health issues.**

As clinicians, one of our most important roles is to educate. We tell our patients that smoking can lead to cancer and cardiovascular disease; excessive weight makes managing hypertension and diabetes all the more complicated.

The PHO educates the entire community; e.g., the PHO becomes a leading advocate for schools to remove soda vending machines and reinstate physical education and activities. If we know the implications of unhealthy behaviors for the individual patient, we must understand how to inform and empower communities in ways that will lead to improvements in behavior.

### **Essential Service # 4. Mobilize community partnerships to identify and solve health problems.**

Even in our most clear-cut roles as clinicians in diagnosing and treating, we rarely do this in isolation. The surgeon doesn’t work without someone passing instruments, and the prescriptions we write require pharmacists to dispense the medications.

The PHO recognizes this connectivity and inter-dependency by supporting community partnerships and systems to identify and solve health problems.

### **Essential Service # 5. Develop policies and plans that support individual and community health efforts.**

As a physician, you develop your own policies. Some of our own policies regarding personal

medical care become a part of Best Practice Guidelines, such as the stepwise approach to treating hypertension or to treating a newly diagnosed diabetic. In the same way, the public health officer advocates for policies that protect the health of the individual and the public and support a community health improvement plan.

**Essential Service # 6. Enforce laws and regulations that protect health and ensure safety.**

Whenever a physician obtains written consent for a procedure, completes a physical examination form for a certified commercial truck license, or even provides a privacy notice to a patient as a part of HIPAA compliance, the physician is enforcing laws and regulations that impact individuals. Public health officers can help develop, review, revise and enforce laws and regulations that are aimed at populations. For example, the PHO has a very important role to play in the establishment of laws that eliminate or limit second-hand smoke in public places and laws requiring seat belts and bicycle and motorcycle helmets because such laws clearly lower mortality and morbidity risk.

**Essential Service # 7. Linking people to personal health services in assuring the provision of healthcare when otherwise unavailable.**

If, as a primary care physician, you have a patient needing specialty care, you know how to make those connections. You can get a burn patient to the Shriner's Hospital in Cincinnati and an elderly patient, who has recently had a hip replacement, into physical therapy - you are masters at linking, at times finagling and bartering for patients to obtain the services they need.

The public health officer looks at populations with the same view in mind, partnering between public and private sectors to identify and address medical care gaps at the

community level, for example, improving access to prenatal care for low-income women or dental care for children on Medicaid.

**Essential Service # 8. Assure a competent public and personal healthcare workforce.**

Every physician should be committed to lifelong learning - and we are often required to show evidence of this through Continuing Medical Education. We want our nurse assistants to be certified nurse assistants. We want our nurses who work with our diabetic patients to be certified diabetologists and we ourselves strive to be Board certified not just Board eligible.

The public health officer then has the same level of concern about the entire public health workforce. What are the opportunities for staff to enroll in courses while on the job? What are the opportunities for staff to participate in formal public health training?

**Essential Service # 9. Evaluate accessibility and quality of personal and population-based health services.<sup>2</sup>**

How many of us as clinicians would start a patient on a new anti-hypertensive and never attempt to see the patient in follow-up? Or if we do attempt, and the patient doesn't show up, how many of us would just ignore this? Would any of us work up a patient for cardiovascular disease and then purposely ignore the test results?

It should stand to reason that as a PHO the need to evaluate the effectiveness, efficiency and/or impact of the work of public health is just as great as the physician rechecking a blood pressure after starting a new medicine. This essential service, focused on evaluation, is perhaps one of the greatest challenges, not just for the health officer but for all of public health. The PHO should continuously be asking: What have

we done? How well have we done it? How much have we done? How effective have we been?<sup>2</sup>

**Essential Service # 10. Research for new insights and innovative solutions to health problems.**

As clinicians in private practice the vast majority of you will never participate in what we think of as classical research - such activities as a double-blind, placebo controlled trial. Occasionally, we may enter a patient into a multi-site chemotherapy trial for a new cancer regime.

If there is no clinical corollary, what does this essential service mean to a PHO? First we need to expand our definition of research beyond the double-blind, placebo controlled trial mentality to one of systematic, organized inquiry. The PHO shouldn't lose the opportunity to explore why a particular illness or condition is being newly identified in his or her own geographic area. We should even turn the research questions on us - how do we know that PHOs make a difference?

To conclude, understanding the 10 EPHS provides a framework for the private-practicing physician to think and act as a PHO, caring for populations and communities as opposed to individuals and families. This is a starting place to build towards that higher performance of the 10 EPHS that every citizen should have access to at the local level. The PHO's responsibility is to understand this, and through meeting the EPHS, fulfill the obligations the public has bestowed.

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**References**

1. Public Health Functions Steering Committee. Public Health in America. Available at: <http://www.health.gov/phfunctions/public.htm>. Accessed 01/26, 2007.
2. Centers for Disease Control and Prevention. Practical Evaluation of Public Health Programs. Available at: <http://www.cdc.gov/eval/workbook.PDF>. Accessed 09/06, 2007.