The Power of Prevention: Prevention and Preparedness in Public Health

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INTRODUCTION

The crises that preceded and exacerbated the COVID-19 pandemic- social and racial injustice, the opioid epidemic, climate change - laid bare the myriad of ways public health must intervene to improve the level of health experienced by individuals, families, and communities, not only on a day to day basis but also to be prepared for the next pandemic. We already have many of the blueprints Preventive Medicine physicians can use to support a strong public health system that connects the dots between all aspects of public health as a form of individual, community, and national preparedness. Below we describe how we can move toward preparedness with the best components of these approaches, while also improving in areas Preventive Medicine has particular expertise.

THE ROLE OF GOVERNMENT IN PUBLIC HEALTH

Federal, state and local governments play a critical role in public health. Often, healthcare players look to governmental public health officials for guidance and direction in healthcare priorities. Here we outline 2 key governmental public health initiatives that serve as models on which to build the future of public health: Public Health 3.0 and the National Prevention Strategy.

Public Health 3.0 — Launched in 2016 by the Department of Health and Human Services — emphasized cross-sectoral collaboration, community engagement and the social determinants of health.1 Health, fundamentally cross-sectoral, must be addressed with collaborative, integrative approaches that combine clinical care, community engagement and social intervention.

The key role in Public Health 3.0 is the Community Chief Health Strategist2; however, the strength and training of health officers who serve in this role vary greatly. Programs and training to develop physicians with the experience and skill set needed to run a local or state health department and train others to do so are lacking both at the federal level and in physician training at the institutional level.

Preventive medicine training can add great value as health system leaders. As the only specialty specifically devoted to training physicians with the skills to lead local and state health departments, with residency rotations based in public health settings, Preventive Medicine physicians are well suited to assume the role of Community Chief Health Strategist in order to achieve the goals of Public Health 3.0.

Drawing on the experience of 72 accredited Preventive Medicine training programs, the practice of Preventive Medicine has the opportunity to lead and collaborate with other organizations, including the Association of State and Territorial Health Officials (ASTHO) and National Association of County and City Health Officials (NACCHO), to develop training solutions and opportunities for public health officers at local and state health departments across the country. In this way, the specialty of Preventive Medicine may serve as the epicenter for broader changes to the way medicine and public health are practiced to meet the healthcare challenges of the future.

As part of the Affordable Care Act, the National Prevention Strategy (NPS) created a framework to support health through prevention across the lifespan. It integrated all aspects of health, including physical, mental, and social wellbeing into this model, consistent with the WHO’s expanded definition of “health” as “a state of complete physical, mental and social well-being and not merely the absence of disease and infirmity.” Recognizing the important role social determinants and lived environment play in health, the NPS prioritized healthy

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and safe community environments, the elimination of health disparities and clinical and preventive services. The NPS incorporated full partnerships to achieve and prove that there is power in prevention. However, despite its central position in the NPS, the concept that prevention is a critical aspect of health, happiness, well-being, and prosperity has not been fully embraced by the American public.

In the wake of the COVID-19 pandemic, the public is primed for an emphasis on preparedness. Preventive medicine as a field must seize the moment behind prevention-focused efforts to address health disparities, climate change, the opioid crisis and other key healthcare challenges.

Preventive Medicine physicians are well-positioned in their communities to serve as key ambassadors in the discussion of these topics. At the policy level, they can lead an analysis of the National Prevention Strategy and Public Health 3.0 to identify what specific components worked, what should be scaled-up, and what pieces need re-engineering.

**INSTILLING CONFIDENCE IN VACCINATION – A FUNDAMENTAL AND ESSENTIAL PREVENTION TOOL – ACROSS THE LIFESPAN**

A strong provider recommendation is one of the most successful strategies to increase vaccine uptake. This can be paired with system interventions to improve access and decrease barriers to vaccination, which have a greater potential for impact than interventions to address thoughts and feelings on vaccination. In their position at the intersection of clinical providers and public health systems, Preventive Medicine physicians must be leaders in the efforts of the public health community to increase vaccination, both as it pertains to COVID-19, and in routine vaccinations for influenza, measles, and other infectious diseases.

Confidence in vaccination is tied to confidence in governmental public health agencies and scientific institutions. Systemic racism impacts trust in some of these institutions. The infodemic - rapid misinformation and disinformation spreading online - contributes to low vaccine confidence. Separating vaccine facts from myths will require both high health literacy and skills in identifying misinformation in the general public.

ACPM and preventive medicine physicians are uniquely positioned to serve as the trusted source of vaccine information for clinicians and community organizations, who can then be the trusted messengers for their patients and communities. Preventive medicine physicians can work within their public health agencies and healthcare systems to develop policies and interventions that improve access to vaccines and address systemic racism. Preventive Medicine physicians can develop strategies to address the health literacy chasm across the lifespan and strategies to teach the American public the skills needed to identify misinformation.

**PUTTING PREPAREDNESS AND RESILIENCE AT THE HEART OF OUR RESIDENCY TRAINING**

A focus on prevention as preparedness can begin with the approximately 350 preventive medicine residents in training every year, and the next cohort of medical students soon to join them. Having lived through the COVID-19 pandemic, today’s generation of students at all levels have seen firsthand the need for preparedness and resilience. These students are tomorrow’s residents. We can use lessons learned from the COVID-19 experience to train them in strategies to better prepare for the next pandemic.

**POWER THROUGH SUSTAINABLE FUNDING**

State and local health departments have been chronically underfunded. Between 2010 and July 2020, they experienced a drop in spending of 16% and 18% respectively. The public health workforce lost 38,000 jobs between 2008 and 2020. A strong public health system capable of implementing the above recommendations will require improved, sustainable funding. The ongoing training of physicians in the specialty of Preventive Medicine will similarly require sustainable funding, yet faces similar funding challenges. In the academic year 2020–2021, 357 residency positions were funded and filled, less than half of the 679 accredited positions available.

Addressing this chronic funding insufficiency will require collaboration from across the Public Health spectrum, in addition to cross-sector partnerships with health systems, insurers and others. In order for Preventive Medicine physicians to serve as the preeminent voice and face of public health, public health funders and key decision-makers must be aware of the value to health and well-being a well-funded Preventive Medicine and public health workforce has, and the opportunity costs associated with failures to address prevention and the social determinants of health. ACPM has the opportunity to partner with the National Academies of Sciences, Engineering, and Medicine (NASEM) to identify the causes of underfunding for public health agencies and propose national solutions for states. This can be further built on to a culture of shared leadership between the public and private sectors to communicate to all public
health partners that health, prevention and preparedness are intertwined and essential.

**CONCLUSIONS**

The goal of public health is to protect and promote health in people and their communities. The better we are able to prevent chronic and infectious disease, support mental health, and address racial injustice, the more prepared we will be to face the next pandemic. Preventive Medicine physicians have the tools to address these problems, but success will require improved communication that prevention is preparedness, strengthened funding, and continued education and training.

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