

BACKGROUNDER

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America's Looming Doctor Shortage: What Policymakers Should Do

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Abstract

America is faced with the very real threat of a shortage of doctors to serve the needs of a growing and aging population. America's doctors are under stress, and many are demoralized, burned out, and looking toward an early retirement. Their problems have very little to do with actually delivering medical care to patients. They have much more to do with the non-clinical requirements imposed on them while running a medical practice. The laws, the rules, and the regulations that have interfered with the doctor-patient relationship have driven American physicians' morale lower, and encourage them to leave medical practice at precisely the time the American public needs them most. For policymakers in Washington and in the states, there is a serious lesson here: Any serious reform must shift the focus back to the patient-doctor relationship, unburden the practice of medicine, and let doctors be doctors.

Physicians are at the heart of the patient care team, yet must deliver care in an environment on which both federal and state policymakers impose innumerable laws and burdensome regulations. These burdens and distractions affect the practice environment for physicians as well as other members of the health profession.¹ Physicians also must cope with policy changes that often are complex and confusing. A notable recent example is the legal requirements of the Affordable Care Act (ACA).² Beyond that, the health care markets themselves are changing, reflecting new pressures on the medical profession imposed on third-party payers, the financial limits on medical spending, and the increasing consolidation of hospital and health care delivery systems.³

This paper, in its entirety, can be found at http://report.heritage.org/bg3343

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KEY POINTS

- A physician shortage is emerging that threatens the doctor-patient relationship. The projected number of physicians just a decade from now is insufficient to meet the medical demands of America's growing population.
- The population is growing and aging—if current trends continue, its medical needs will not be met by today's ossified structures of physician recruitment, training, deployment, and practice environment.
- With a growing patient population living longer with more complicated medical problems, any decrease in the supply of physicians can literally be a matter of life and death.
- Also concerning is the loss of morale among America's medical professionals and their perception that the medical profession is in a period of decline.
- Policymakers must address the unintended consequences of their laws and rules that have contributed to poor morale, burnout, and doctor shortages.

Key Decision Makers. The crucial doctor-patient relationship is burdened by the intervention of third-party payment arrangements, both public and private. Any health care policy proposal should strengthen—not weaken—it.

Today, a physician shortage is emerging that threatens the future of the doctor-patient relationship. The projected number of physicians just one decade from now is insufficient to meet the medical demands of America's population. The population is both growing and aging; if current trends continue, its medical needs will not be met by today's ossified structures of physician recruitment, training, and deployment.

Today's current and future doctors face a deteriorating practicing environment that is pushing doctors out of medicine altogether. To become a doctor, students face education requirements distorted by government policy. And, once a practicing doctor, physicians face difficulty delivering care due in no small part to the practice environment created and increasingly directed by today's large systems of third-party payment, which too often intrude on physician's decision making, impeding a doctor's ability to practice according to his or her best clinical judgment. These financing schemes are reinforced by regulatory requirements that stifle rather than encourage innovation in the training of new physicians and the provision of care.

The medical profession is being progressively demoralized and weakened; and, thus, it is contracting at the very time it needs to be expanding. In the context of a growing patient population, who are able to live longer with more complicated medical problems, any decrease in the supply of physicians can literally be a matter of life and death.

A Better Policy. Congress and state officials need to address and resolve the structural problems created by policies that are worsening the practice envi-

ronment and thus contributing to the impending shortage of American physicians. Specifically, they should take four key steps:

- Reform the current system of graduate medical education by tying the funding directly to the medical residents—rather than hospitals as they are today. This change will improve training, and will give states more flexibility to deploy newly minted residents where they are needed most.
- **2. Decrease obstacles to practice** by reforming state licensure laws and accreditation rules.
- **3. Provide alternatives to conventional third- partypayment** by allowing and promoting direct primary-care-coverage arrangements and the creation of stand-alone health accounts, vehicles legally separate and apart from health insurance.
- **4.** Reduce the administrative and regulatory burdens that plague medical practice, particularly in the Medicare programs.

While policymakers cannot solve all of the problems that are contributing to the emerging physician shortage, these four changes would dramatically improve the practice environment and increase the supply of doctors.

The Nature and Scope of the Looming Physican Shortage

In its 2018 report, the American Association of Medical Colleges (AAMC) projects a shortage of between 42,600 and 121,300 physicians by 2030.⁴ The AAMC report takes into account numerous possible conditions including early physician retirements, later physician retirements, increasing and changing demographics, growth in per patient

- 1. This *Backgrounder* focuses on the perspective of doctors, in part due to the author's own training and, more critically, due to government policies that affect physician supply. Many of the dynamics described in this *Backgrounder* also apply to other health care providers. For an example detailing this broader impact, see the comprehensive overview of the impact of Obamacare on the health professions by Amy Anderson, "The Impact of the Affordable Care Act on the Health Care Workforce," Heritage Foundation *Backgrounder* No. 2887, March 18, 2014, http://thf_media.s3.amazonaws.com/2014/pdf/BG2887.pdf.
- 2. Also known as Obamacare.
- 3. Karen E. Joynt, E. John Orav, and Ashish K. Jha, "Association Between Hospital Conversions to For-Profit Status and Clinical and Economic Outcomes," *Journal of the American Medical Association*, Vol. 312, No. 16 (2014), pp. 1644–1652, https://jamanetwork.com/journals/jama/fullarticle/1917437 (accessed August 24, 2018).
- 4. These numbers are an upward adjustment from the previous report released in 2017.

physician demands, increases in funding, and many others.⁵

As the population ages, older patients with more complicated issues will increase the demand for physicians' services, but the physician population is also aging—by 2030, 27.2 percent of today's doctors will be eligible for Medicare. Retirement decisions vary, and many doctors continue to work past the traditional retirement age, but the shrinking size of this cohort remains a vulnerability of American health care.⁶

Of particular concern to the medical community is the projected shortage in primary care: between 15,800 and 49,300 doctors by 2030.⁷ Primary care is a major concern because one of five physician office visits in the United States are with a patient's family doctor.⁸ Recruiting medical graduates into primary care is difficult because compensation is lower than for specialty care, the administrative burden is greater, and the professional prestige is lower.⁹ Furthermore, the current structure of education and graduate training tends to keep trainees centralized around the institutions where they have trained, rather than where they may be needed.¹⁰ Efforts to remedy this by rotating students and residents to outlying clinics has shown success, but it has been limited.¹¹

Specialties also face shortages. According to the AAMC, by 2030, the shortage in non-primary-care

doctors is expected to be between 33,800 and 72,700. For speciality surgeons, the shortage is projected to be between 20,700 and 30,500.¹²

A major factor in the impending physician shortage is the mass demand for medical services. America's population is expected to grow to almost 360 million by 2030. The population ages 65 and older is expected to increase by 50 percent, as the entire baby-boomer generation reaches retirement age. Typically, older persons have more medical problems and these are often more complex. Writing in *Health Affairs*, researchers report that average health care spending for those ages 65 and above was three times that for the average adult. Higher utilization—including higher emergency room use, increased office visits, and more specialists—is routine for older patients.

Burnout and Demoralization. Factors contributing to physician shortage include both recruiting new doctors and keeping current physicians interested in their practice. Physicians, by and large, go into medical practice to enjoy the profound personal and professional satisfaction of serving a patient, and restoring a patient back to health. The essential health care interaction occurs between the physician and the patient, and anything that interferes with that relationship makes the best practice of medicine

- 5. Tim Dall et al., *The Complexities of Physician Supply and Demand: Projections from 2016 to 2030 (2018 Update)*, IHS Markit Ltd., for the Association of American Medical Colleges, March 2018, https://aamc-black.global.ssl.fastly.net/production/media/filer_public/85/d7/85d7b689-f417-4ef0-97fb-ecc129836829/aamc_2018_workforce_projections_update_april_11_2018.pdf (accessed August 24, 2018).
- 6. Michelle Pannor Silver et al., "A Systematic Review of Physician Retirement Planning," *Human Resources for Health*, Vol. 14, No. 67 (November 2016).
- 7. Dall et al., The Complexities of Physician Supply and Demand, pp. v-x.
- 8. John Meigs Jr., letter to John R. Graham, Acting Assistant Secretary, HHS, American Academy of Family Physicians, October 19, 2017, https://www.aafp.org/dam/AAFP/documents/advocacy/legal/administrative/LT-HHS-Draft2018-2022Framework-101917.pdf (accessed August 24, 2018).
- 9. Dawn E. DeWitt et al., "What Influences Career Choices Among Graduates of a Primary Care Training Program?" *Journal of General Internal Medicine*, Vol. 13 (1998), pp. 257–261.
- 10. Ernest Blake Fagan et al., "Family Medicine Graduate Proximity to Their Site of Training: Policy Options for Improving the Distribution of Primary Care Access," *Family Medicine*, Vol. 47, No. 2 (2015), pp. 124–130.
- 11. John R. Raymond et al., "Expanding the Health-Care Pipeline through Innovation: The MCW Model," *Transactions of the American Clinical and Climatological Association*, Vol. 128 (2017), pp. 91-107, and Howard K. Rabinowitz et al., "A Program to Increase the Number of Family Physicians in Rural and Underserved Areas," *Journal of the American Medical Association*, Vol. 28, No. 3 (1999).
- 12. Dall et al., The Complexities of Physician Supply and Demand, p. 7.
- 13. Ibid., pp. v-x.
- 14. National Institute on Aging, "Talking With Your Older Patient: Supporting Older Patients with Chronic Conditions," https://www.nia.nih.gov/health/supporting-older-patients-chronic-conditions (accessed August 7, 2018).
- 15. Micah Hartman et al., "U.S. Health Spending By Age, Selected Years Through 2004," Health Affairs, Vol. 27, No. 1 (2008), pp. w1-w12.
- 16. Michael F. Pesko et al., "Spending Per Medicare Beneficiary Is Higher in Hospital-Owned Small- and Medium-Sized Physician Practices," Health Services Research Research Brief, September 21, 2017, and Dall et al., The Complexities of Physician Supply and Demand, pp. v-x.

harder. The legitimate demands of patient care alone are a stressor endemic to the vocation, but adding the constant, intrusive interference of medical practice by third parties is corrosive, and can manifest itself in the job-killing phenomenon of "burnout."

Burnout, a term first coined in 1970, is a subjective experience of stress related to "helping professions," typified by doctors and nurses. A Physicians Foundation survey reveals that 49 percent of doctors feel often or always burned out. The survey found that 58.3 percent of physicians primarily complained about the regulatory and paperwork burden, and the second-most and third-most common complaints were "erosion of clinical autonomy" (31.8 percent of physicians) and "inefficient EHR [electronic health records] design/interoperability" (26.8 percent), respectively. Profession of clinical autonomy (31.8 percent), respectively.

A Medscape survey also found that the largest proportion of physicians, 56 percent, felt that "too many bureaucratic tasks (e.g., charting, paperwork)" contributed to burnout; 39 percent pointed to being overworked; 26 percent pointed to lack of respect from administrators, employers, colleagues, or even staff; and 24 percent pointed to the increased computerization of medical practice in the form of EHRs.¹⁹

Conversely, when asked what would reduce burnout, 31 percent said more manageable work hours and 27 percent said decreased governmental regulations. This suggests that the extra one to two hours of personal time doctors spent on documentation is having a serious and negative impact on the morale of the physician workforce.²⁰

Physicians experiencing burnout use more sick days.21 In addition, one study found that only about one-third of hospitalists, the backbone of a hospital's physician staff, who were at risk for burnout intended to continue to practice in the same manner for more than the next 10 years. Forty-four percent of hospitalists who met burnout criteria intended to practice for fewer than four more years.²² Conversely, of those physicians not experiencing burnout or at risk of experiencing burnout, only 6.4 percent considered leaving practice within the next four years. Of concern to federal and state policymakers is that less than 10 percent of these hospitalists were ages 50 or older, about a quarter had completed residency training within the past five years, and only approximately half had been in the hospitalist job for more than two years.²³ This is a serious problem in an emerging practice environment in which health care delivery trends are favoring hospitalists and hospital-employed physicians as opposed to physician-owned private practices.24

The essential health care interaction occurs between the doctor and the patient, and anything that interferes with that relationship makes the practice of medicine harder.

Burnout also has a negative impact on patient care. A study of physicians in the Netherlands found

^{17.} PubMed Health, "Depression: What Is Burnout?" January 12, 2017, https://www.ncbi.nlm.nih.gov/pubmedhealth/PMH0072470/ (accessed August 7, 2018).

^{18.} The Physicians Foundation, 2016 Survey of America's Physicians, Practice Patterns & Perspectives, 2016, pp. 7–17, https://physiciansfoundation.org/wp-content/uploads/2018/01/Biennial_Physician_Survey_2016.pdf (accessed August 24, 2018).

^{19.} Carol Peckham, "Medscape National Physician Burnout & Depression Report," Medscape, January 17, 2018, p. 13, https://www.medscape.com/slideshow/2018-lifestyle-burnout-depression-6009235 (accessed August 29, 2018).

^{20.} Christine Sinsky et al., "Allocation of Physician Time in Ambulatory Practice: A Time and Motion Study in 4 Specialties," *Annals of Internal Medicine*, December 6, 2016, http://annals.org/aim/article-abstract/2546704/allocation-physician-time-ambulatory-practice-time-motion-study-4-specialties (accessed August 24, 2018).

^{21.} Carolyn S. Dewa et al., "How Does Burnout Affect Physician Productivity? A Systematic Literature Review," *BMC Health Services Research*, Vol. 14 (2014), p. 325.

^{22.} Ibid., and Timothy Hoff et al., "Thriving and Surviving in a New Medical Career: The Case of Hospitalist Physicians," *Journal of Health and Social Behavior*, Vol. 43 (March 2002), pp. 72–91.

^{23.} Ibid.

^{24.} Dall et al., The Complexities of Physician Supply and Demand, pp. v-x, and The Physicians Foundation, 2016 Survey of America's Physicians, Practice Patterns & Perspectives, pp. 7–17.

that burned-out doctors felt they were unable to cope physically and mentally with the demands of their work.²⁵ A Spanish study found that physicians who felt low burnout solved problems more efficiently than those who experienced higher burnout.²⁶ Furthermore, physicians with higher burnout recorded more diagnoses per visit, which could suggest clinical imprecision; more diagnoses require more testing, examinations, and time and resources overall.²⁷ Furthermore, imprecise diagnoses may delay or miss the identification and treatment of the underlying condition. If physicians experiencing more burnout are ordering more tests, studies, and services, their practice would represent an additional and unnecessary strain on medical resources.

The Physician's Foundation found that 53.9 percent of respondents reported pessimism about the current state of medicine, and 62.8 percent reported pessimism about the future of medicine. When asked whether physicians would recommend medicine as a career for their own children, nearly half, 49.2 percent, responded that, no, they would not recommend young people enter medicine. Medicine, like many other professions steeped in tradition, often recruits from the offspring of those currently practicing. That approximately half of doctors are not recommending medicine as a career for any young people, and young people are looking at other careers, is a serious problem for the profession.

Accelerating Retirement. Barriers to physician supply are further complicated by the proportion of doctors who are considering an early or accelerated retirement; 46.8 percent of survey respondents are considering an early retirement for reasons unrelated to age or physical health.²⁹

The decision of whether to accelerate or delay retirement may have the largest impact on the physician workforce, as over a third of practicing physicians will be at retirement age within a decade.³⁰ Of the current workforce, 13.5 percent is 65 and older, and 27.2 percent are between the ages of 55 and 64. Combined, these two groups make the entire physician workforce vulnerable to conditions that could incentivize early retirement.

According to the Physicians Foundation, nearly half of physicians are considering accelerating their retirement plan for reasons related to changes in the health care system, including 41.2 percent of physicians younger than 45, 50 percent of those 46 and older, 47.7 percent of male physicians, and 45.2 percent of female physicians.³¹ The survey also found that 14.4 percent of respondents would retire in three years. Even if a physician decides to continue practicing, there are many who are considering reducing work hours, which would reduce the number of full-time-equivalent physicians; 21.4 percent of physicians surveyed reported their intention to reduce working hours within the next three years.

The decision to practice longer is often linked to flexibility in work hours, career satisfaction, career opportunities, financial incentives, and positive interpersonal relationships. In a review of 65 studies about physician retirement planning, researchers found that doctors able to conduct more preferred tasks or otherwise practice in their own way were more likely to practice longer. Continuing practice was driven by purposefulness, responsibility to patients, and intellectual stimulation. Physicians with more clinical freedom were able to focus on the parts of medicine they found most meaningful and purposeful. In principle, there is no reason why policymakers cannot do their part to create the conditions in which physicians would want to practice

^{25.} Dewa et al. "How Does Burnout Affect Physician Productivity?" and Martijn Ruitenburg et al., "The Prevalence of Common Mental Disorders Among Hospital Physicians and Their Association with Self-Reported Work Ability: A Cross-Sectional Study," *BMC Health Services Research*, Vol. 12 (2002), p. 292.

^{26.} Oriol Yuguero et al., "Cross-Sectional Study of the Association Between Healthcare Professionals' Empathy and Burnout and the Number of Annual Primary Care Visits Per Patient Under Their Care in Spain," BMJ Open, Vol. 8, No. 7 (2018), https://www.ncbi.nlm.nih.gov/pmc/articles/PMC6067329/ (accessed August 24, 2018).

^{27.} Dewa et al., "How Does Burnout Affect Physician Productivity?"

^{28.} The Physicians Foundation, 2016 Survey of America's Physicians, Practice Patterns & Perspectives, pp. 7-17.

^{29.} Ibid.

^{30.} Dall et al., The Complexities of Physician Supply and Demand, pp. v-x.

^{31.} The Physicans Foundation, 2016 Survey of America's Physicians, Practice Patterns & Perspectives, pp. 29-33.

^{32.} Pannor Silver et al., "A Systematic Review of Physician Retirement Planning."

^{33.} Ibid.

longer, since factors such as regulatory burdens and bureaucratic requirements undercut that goal.

The Policies that Slow Down the Entry of New Physicians into the Profession

The process of systematizing medical education grew out of the desire to protect patients from quack doctors who were all too common before the turn of the 20th century. Gatekeepers have their place in raising up new physicians, but over time their tight control on the training pipeline has created a rigid bottleneck at a time when flexibility and innovation are needed.

Broken Graduate Medical Education. The process for becoming a practicing physician requires a student to pass through a multitude of accrediting, licensing, and examining bodies. A fully licensed physician must have graduated from four years of medical school and completed a residency program lasting between three years and seven years, and in that entire seven-to-10-year span, complete a fourpart standardized test of the United States Medical Licensing Exam (USMLE) that is sponsored by the National Board of Medical Examiners-and, in order to practice in most places, pass board certification by the American Board of Medical Specialties (ABMS).³⁴ To obtain a residency position, senior medical students must apply through the National Resident Matching Program for programs that need to be accredited by the Accreditation Council for Graduate Medical Education (ACGME) for Doctor of Medicine (MD) programs, or the American Osteopathic Association (AOA) for Doctors of Osteopathic Medicine (DO) programs, although these two accrediting bodies are in the process of merging programs.35

These accreditation organizations arose initially as the field of medicine began to standardize in an effort to provide rigorous care, and weed out sham schools and shoddy practitioners. While these organizations have all staked out a niche on the physician-training pipeline, and each serves a vital role

in licensing and certification, these safeguards are becoming a bottleneck. These organizations are becoming monopolistic, especially with the merger of the ACGME and the AOA. This has both increased the costs of training physicians, and has also severely limited the number of physicians that can be trained.

By tying funding to a hospital, Congress has created a system that meets the needs of the sponsoring institution, rather than the broader needs of a state or community.

Accreditation requirements include a plethora of items that drive up the costs of sponsoring a residency program for activities that may not further the needs of all hospitals. Rural areas, in which 19 percent of the U.S. population lives, have only 10 percent of the practicing physician population.³⁶ Hospitals in these areas have to treat a disproportionate number of patients relative to urban facilities where money and resources are often concentrated, so asking rural-area hospitals to take on academically focused accreditation criteria would severely burden their already stressed resources. For instance, ACGMEaccredited programs must involve a research component with residents regularly participating in grand rounds, journal clubs, or conferences. Standing up a research department could be costly and largely unimportant for the institutional goals of an outlying community hospital program that is trying to extend care as broadly as possible, as opposed to a large academic hospital that has an interest in cutting-edge procedures and techniques.³⁷

The federal government predominantly funds graduate medical education through Medicare and sends the funding to certain hospitals, rather than

^{34.} Board certification for a specialty, including primary care concentrations, such as family medicine and internal medicine, is a de facto requirement, as most hospitals and insurance companies will only work with board certified physicians and most residency programs require board certification for graduation.

^{35.} Accreditation Council for Graduate Medical Education, "Frequently Asked Questions: Single Accreditation System," May 2017, http://www.acgme.org/Portals/0/PDFs/Nasca-Community/FAQs.pdf (accessed August 24, 2018).

^{36.} Muhammad Ali Chaudhary et al., "Differences in Rural and Urban Outcomes: A National Inspection of Emergency General Surgery Patients," Journal of Surgical Research, Vol. 218 (2017), pp. 277–284.

^{37.} Accreditation Council for Graduate Medical Education, "Common Program Requirements," 2017, p. 5, https://www.acgme.org/Portals/0/PFAssets/ProgramRequirements/CPRs_2017-07-01.pdf (accessed August 24, 2018).

individual students. Hospitals receive these funds to offset the costs of the residencies they sponsor; funds are based on the number and costs of Medicare patients they treat. By tying funding to a sponsoring hospital, Congress has created a system that results in meeting the needs of the sponsoring institution, rather than the broader needs of a state or community.³⁸

The AAMC has repeatedly called for increased funding for graduate medical education (GME) through existing channels, but increased funding alone will not provide enough physicians to address the problem.³⁹ For example, the Resident Physician Shortage Reduction Act,40 which has been introduced in the U.S. House of Representatives, would increase the funding for a number of residency positions. Even accounting for the passage of the bill, the AAMC still projects that the increased residency slots will be unable to fulfill physician needs by 2030.41 The AAMC estimates that the bill would result in an additional 3,750 new physicians each year beginning in 2023, which should add 26,250 physicians to the pool of doctors-and which still falls short of even the low-end estimates of a shortage of 42,600 physicians.42

Untapped Potential. A small portion of medical graduates each year do not match into a residency program. This is typically around 6 percent of allopathic (MD) applicants, which constitutes approximately 1,000 graduates, and around 20 percent of

osteopathic (DO) applicants, which constitutes about 600 graduates. Many of these graduates will apply again to the match, but only about half will succeed in subsequent matches. 43 Frequently, this is due to a lack of available slots, but sometimes it is due to their application, such as poor performance on the USMLE Step 1 exam, which is a single standardized test with an arguably outsized impact on the residency application process. Medical graduates, who hold an MD or DO degree, can be subject to a single point of failure that essentially precludes them from using their hard-won training. 44

This means that this trained population includes some whose skills will go underused. Employing them via provisional licensure and allowing them to practice under supervision would allow them to use their medical education, recapture the value of their degrees, and help to alleviate the emerging physician shortage. As states already control medical licensure, they would have a range of powers to address their state's unique needs.⁴⁵

Yet, both the American Medical Association (AMA) and the AOA reject legislation allowing these types of licenses, suggesting that medical school graduates will be unqualified to practice and be a danger to patients.⁴⁶ Properly executed, however, the provisional physician would be practicing at a level incrementally greater than that of a medical school senior or equivalent to a first-year resident. As these provisional physicians become more

^{38.} Ibid.

^{39.} Indeed, Medicare GME funding was originally meant to be temporary "until the community undertakes to bear such education costs in some other way." Rather, it is now the largest federal investment in developing the health care workforce.

^{40.} Resident Physician Shortage Reduction Act of 2017, H.R. 2267, 115th Cong. 1st Sess., Section 2.

^{41.} Dall et al., The Complexities of Physician Supply and Demand, pp. 14-16.

^{42.} Ibid.

^{43.} National Resident Matching Program, "Results and Data: 2018 Main Residency Match," April 2018, pp. 4 and 5, http://www.nrmp.org/wp-content/uploads/2018/04/Main-Match-Result-and-Data-2018.pdf (accesed August 24, 2018).

^{44.} Christine A. Sinsky et al., "Professional Satisfaction and the Career Plans of US Physicians," *Mayo Clinic Proceedings*, Vol. 92, No. 11 (2017), pp. 1625–1635, and Delece Smith-Barrow, "Map: Where to Find the Newest Medical Schools," *U.S. News & World Report*, July 11, 2016. https://www.usnews.com/education/best-graduate-schools/top-medical-schools/articles/2016-07-11/map-where-to-find-the-newest-medical-schools (accessed August 7, 2018).

^{45.} There are four states that have issued provisional licenses: Arkansas, Kansas, Missouri, and Utah. These initial programs are generally burdened with restrictions on practicing. For instance, one must have graduated within four years to be eligible in Arkansas; and in Kansas, only graduates from one medical school in the state may apply. Provisional licenses are still relatively new, with some of these laws passing in 2015, so outcome data are difficult to find and conclusions are difficult to draw.

^{46.} American Academy of Pas, "American Medical Association House of Delegates Rejects 'Assistant Physician' Concept," June 12, 2014, https://www.aapa.org/news-central/2014/06/american-medical-association-house-of-delegates-rejects-assistant-physician-concept/ (accessed August 7, 2018), and The DO, "AOA Convenes Coalition to Address Assistant Physician Legislation," April 10, 2016, https://thedo.osteopathic.org/2016/04/aoa-convenes-coalition-to-address-assistant-physician-legislation/ (accessed August 7, 2018).

experienced, the different medical practices could expand their scope of permitted practice as they see fit; the contracting details should be between the provisional licensee and the attending physician, with the physician having responsibility for supervising the licensee's work similar to how a residency currently works.

How Regulation Distracts Doctors from Their Patients

The practice of medicine involves interaction between the patient and the doctor, much more so than between the doctor and a computer screen. Today, however, America's existing third-party payment system, both in the public and private sectors, drags doctors away from the exam room, into an office to satisfy the increasingly burdensome administrative requirements imposed by third-party payers. A landmark study in 2016 found that reporting requirements for quality alone took up *more than 15 hours per physician per week*, adding an estimated \$15.4 billion annually to the nation's health care bill.⁴⁷

To obtain payment, physicians must document care, often on paper as well as through electronic health records (EHRs), and comply with different requirements. Last year, an average 21 percent of physicians' time was spent on paperwork, which is the equivalent of 168,000 full-time doctors working on non-clinical activities, or 46,700 more full-time doctors than even the high-end AAMC projections of physician shortages.⁴⁸

Documentation requirements are likely to be unavoidably entrenched to some degree in practicing medicine, but the current approach is an undesirable component of practicing medicine today. Policymakers should, therefore, examine how these requirements have contributed to the problem in order to reduce the unintended consequences of their laws, rules, and regulations, especially as the imposition of excessive administrative or bureaucratic burdens can drive down physician morale, and drive physicians out.

Physicians in an ambulatory setting often spend twice as much time on their computers as with their patients.

Administrative Burdens. Physicians alone do not, of course, absorb the impact of these external administrative and regulatory pressures; these pressures also directly affect patients. Based on the Physicians Foundation survey data, 86 percent of physicians felt they did not have adequate time to provide quality care to each of their patients. For example, physicians in an ambulatory setting often spent twice as much time on their computers as with their patients.⁴⁹

Administrative burdens come in many forms, such as via prior authorizations, quality-reporting measures, and the superfluous details required in the documentation of clinical encounters—either on paper or through the added burden of electronic records. ⁵⁰ Compliance requires numerous physician and staff work hours. Having played a significant role in creating and imposing these burdens, the Centers for Medicare and Medicaid Services (CMS) has a role to play in reducing them.

Prior Authorizations. Prior authorizations are forms that must often be approved by a third-party payer before a therapy or therapeutic device can be delivered to the patient.⁵¹ An AMA study found that on average, a small three-physician practice

^{47.} Lawrence Casalino et al., "US Physician Practices Spend More Than \$15.4 Billion Annually to Report Quality Measures," *Health Affairs*, Vol. 35, No. 3 (2016), pp. 401-406.

^{48.} Dall et al., The Complexities of Physician Supply and Demand, pp. v-x, and The Physicians Foundation, 2016 Survey of America's Physicians, Practice Patterns & Perspectives, pp. 7–17.

^{49.} Sinsky, et al., "Allocation of Physician Time in Ambulatory Practice: A Time and Motion Study in 4 Specialties."

^{50.} Administrative burdens have also been detrimental to physician morale and patient care by driving practices to consolidate. Physicians in smaller practices—who felt they had more autonomy—often had lower burnout scores than physicians in larger practices, and outcomes tend to be better. Furthermore, patients of smaller practices tend to have between 27 percent and 33 percent fewer preventable hospital admissions. See Lawrence P. Casalino et al., "Small Primary Care Physician Practices Have Low Rates of Preventable Hospital Admissions," *Health Affairs*, Vol. 33, No. 9 (2014), pp. 1680–1688.

^{51.} John Meigs Jr., letter to President Donald Trump, American Academy of Family Physicians, January 31, 2017, https://www.aafp.org/dam/AAFP/documents/advocacy/campaigns/LT-Trump-RegulatoryBurden-013117.pdf (accessed August 28, 2018).

may complete over 100 prior-authorization forms per week. On the issue of prior authorizations alone, the AMA has proposed several measures to reform the process, including standardizing forms, requiring payers to be up-front about requirements for approval, requiring insurers to be explicit about why a prior authorization is rejected, and eliminating the administrative requirement of a prior authorization in the event of an emergent health situation. The loss of time and waste of effort to shoulder such administrative or regulatory burdens adds nothing to the patient's health, and, in fact, may detract from it. The loss of time and waste of effort to shoulder such administrative or regulatory burdens adds nothing to the patient's health, and, in fact, may detract from it.

Medicare, for example, requires physicians to recertify durable medical equipment (DME) for chronic conditions, such as insulin pumps for patients with type 1 diabetes, every year. Because these patients are completely unable to produce their own endogenous insulin, their condition is not expected to change from year to year. Logically, this makes the annual recertification of their DME unnecessary.⁵⁴

Documentation Burdens and the Special Role of Electronic Health Records. The employment of modern information technology holds great promise in the collection and transmission of vital health care and patient information. Doctors, however, have found EHRs to be time consuming, and feel they often divert time from caring for patients to keep the EHRs up-to-date. 55 According to the Physicians Foundation survey, 89 percent of physicians do not feel that implementation of EHR has resulted in better patient interactions; 60 percent feel that EHRs have actually detracted from their patient interactions. It is exactly these patient interactions that a large majority of physicians cite as the most satisfying aspect of medicine—the part of medicine that keeps

them practicing.⁵⁶ The intervention of a computer screen may have benefits for the health care system, but its current implementation causes unnecessary hindrances to patient care.⁵⁷

This situation is the result of a series of policies that have contributed to the creation—and required use—of products that are suboptimal to the practice of medicine. To be reimbursed by Medicare, doctors must (1) document care they provide according to Evaluation and Management (E/M) guidelines and codes⁵⁸ written by the CMS, and (2) submit documentation and requests for payment via an EHR. E/M guidelines were written in 1995 at a time when paper charts were still the primary form of documentation and were written to reflect the needs of the health care back-end, billers and coders, rather than to reflect the necessary clinical information to communicate patient health from one provider to another.

Given these dynamics, EHR vendors have necessarily tailored their products to address the needs of the CMS first, and the physician second. This has resulted in the bizarre situation in which the United States, a country known for technological innovation, has created EHR systems (which have become physicians' third-most common complaint), in order to handle physicians' number one complaint, the regulatory and paperwork burden associated with medical practice.⁵⁹ There is a great deal of interest by tech companies to innovate in this area, but ultimately, the underlying problem is that the E/M guidelines from the mid 1990s require tech companies and physicians alike to take a paper and pen paradigm that was always ill suited to the practice of medicine and shoehorn it into a mouse and keyboard interface.

Moreover, EHR systems often cannot share information, further increasing an already heavy administrative burden. There is a multitude of EHR plat-

^{52.} American Medical Association, "Prior Authorization and Utilization Management Reform Principles," January 25, 2017, https://www.ama-assn.org/sites/default/files/media-browser/principles-with-signatory-page-for-slsc.pdf (accessed August 27, 2018).

^{53.} Meigs Jr. letter to President Donald Trump.

^{54.} Meigs Jr. letter to John R. Graham, Acting Assistant Secretary, HHS.

^{55.} The Physicians Foundation, 2016 Survey of America's Physicians, Practice Patterns & Perspectives, pp. 7-17.

^{56.} Ibid.

^{57.} Ibid.

^{58.} Physicians can bill for multiple levels of intensity, with higher levels resulting in higher reimbursement and lower levels for simpler cases resulting in lower reimbursement. This has had a pernicious effect on health care, and today, doctors often document visits in a manner to justify payment for a higher intensity level, shaping the way visits occur, decreasing the quality of patient interactions, and likely increasing health care spending.

^{59.} The Physicans Foundation, 2016 Survey of America's Physicians, Practice Patterns & Perspectives, pp. 7-17.

forms and the task of integrating data from different sources is an area of research in itself.⁶⁰ Hospital systems are able to communicate and transmit data from hospital to clinic. However, if a clinic and a hospital use two different systems, the patient information often needs to be printed out and faxed—which usually requires information release forms signed by the patient. The sharing of patient information can in fact require multiple faxes back and forth, tying up resources and staff in two different locations.⁶¹

Sixty percent of doctors feel that EHRs detract from their patient interactions. It is exactly these interactions that physicians cite as the most satisfying aspect of medicine—the part that keeps them practicing.

Finally, practices face a financial burden due to Medicare requirement that all participating medical practices must use EHR to be eligible for full Medicare payment. Under certain criteria, a clinic may apply for a hardship exemption for such things as low patient volume or poor connectivity, but these still assume that a practice should spend the money to purchase a system, regardless of the practice's need for a costly EHR system. 62 These systems are expensive to implement and support, and thus many practices were initially hesitant to switch to EHRs because of the considerable amount of capital required.63 For example, an average practice of five physicians in north Texas spent \$162,000 to start using an EHR system and \$85,500 for maintenance in the first year. The average per physician cost was \$46,659 in the first year.⁶⁴ The

capital requirements for implementing and sustaining an EHR system is substantial, especially for smaller practices that see fewer patients.

What Policymakers Should Do

The emerging shortage of physicians is a multifaceted problem. The factors involved are well documented in survey research and academic analyses: the loss of professional autonomy and independence; the intrusion of large third-party payment systems, both public and private, into the practice of medicine; and the frustration of wrestling with reams of regulations, guidelines, and bureaucratic paperwork that adds little or nothing to—and detracts from—the quality of patient care. Moreover, and perhaps most concerning, is the loss of morale among America's medical professionals and their perception that the medical profession itself is entering a period of decline.

Public policy cannot solve all of these problems. Nonetheless, policymakers at the federal and state level can take concrete steps to improve the practice environment, which will make the profession itself more attractive and fulfilling. Failure to do so is dangerous to the health and welfare of the American public.

Reform of Graduate Medical Education (GME) Funding. Congress has authorized the current organization and structure of funding for GME, the program of funding for medical residents, through the Medicare program.

The current law is inflexible. It is impossible for states and communities to shift funding around to best fit their needs, even though their needs have changed since 1997 when Congress reauthorized and froze funding for the program. Although residency positions have been added through other funding sources, growth has been slow, and areas that ought to be training physicians have trouble obtaining that funding.

^{60.} Hong Sun et al., "Semantic Processing of HER Data for Clinical Research," Journal of Biomedical Informatics, Vol. 58 (2015), pp. 247-259.

^{61.} American Medical Association, "Prior Authorization and Utilization Management Reform Principles," undated, https://www.ama-assn.org/sites/default/files/media-browser/principles-with-signatory-page-for-slsc.pdf (accessed August 24, 2018). Addressing this problem is less of a policy issue, and more one best resolved by technical engineers and private business. For an example of technology companies addressing the situation, see Heather Landi, "Amazon, Google, IBM, and Other Tech Giants Pledge to Remove Barriers to Interoperability," Healthcare Informatics, August 14, 2018, https://www.healthcare-informatics.com/news-item/interoperability/amazon-google-ibm-and-other-techgiants-pledge-remove-barriers (accessed August 24, 2018).

^{62.} Centers for Medicare and Medicaid Services, "About Exception Applications," https://qpp.cms.gov/mips/exception-applications (accessed August 21, 2018).

^{63.} David Gans et al., "Medical Groups' Adoption of Electronic Health Records and Information Systems," Health Affairs, Vol. 24, No. 5 (2005), pp. 1323–1333.

^{64.} Neil S. Fleming et al., "The Financial and Nonfinancial Costs of Implementing Electronic Health Records in Primary Care Practices," *Health Affairs*, Vol. 30, No. 3 (2011), pp. 481–489.

Congress should make the following key changes to improve the GME program:

- Attach Medicare funding not to institutions, but to the trainees, such that the state level or community level can benefit from recruiting residents to areas where more doctors are needed. 65 This would substantially lessen the burden for a community hospital to run a residency program since the majority of the resident's salary would come with him or her. If licensure and board certification exams are otherwise unchanged, the quality of physicians graduating from residency should not appreciably change, either.
- Reform the calculation for Medicare GME funding. The current system assumes that residents are treating a certain, large number of Medicare patients, which is an unrealistic and unreasonable calculation since many patients whom a resident physician will treat are not Medicare beneficiaries. Although it seems fair to tie Medicare GME funding to the number of Medicare patients a resident treats, Medicare GME has become the largest funding source for residency programs, so this money should be focused on the resident's training for all patient populations.
- Fix accreditation in order to expand opportunities for medical practice. Today, many organizations and associations act as "gatekeepers" between a first-year medical student and a graduating resident. Each organization serves a purpose, but they also have a bottleneck effect on America's physician training pipeline.

Congress must play a role in easing this situation, as it has contributed to its creation, and should take three key steps:

1. Break the monopoly that current accrediting bodies hold over graduate medical education. Current regulations define an approved medical GME program as one approved by the ACGME and the AOA. As the ACGME and the AOA are

merging, the resultant entity will have a monopoly on accreditation. Thus, it is imperative that policymakers remove existing barriers and prevent new barriers to allow new accreditors to innovate and adapt.

- 2. Allow flexibility in allocating GME funds to slots where need is high. Current statute impedes smart allocation of Medicare GME funds by assigning and limiting residency slots to hospitals. Congress should make it easier for funds to flow to areas of high demand for residents by keeping the money with the resident rather than the institution. Such a change would allow smaller community hospitals, where shortages are more severe, to receive this allocation of federal funds. This would allow small programs that cannot necessarily afford traditional accreditation to establish an affordable program in a manner best suited to the community.
- 3. Establish provisional licensing, and expand practice opportunities for medical students. The medical community can act without Congress to ease the bottlenecks they have created in America's physician training pipeline by allowing alternate pathways for medical graduates to obtain GME, such as through apprenticeships or less-formal hospital resident physician programs that do not have to conform to ACGME accreditation rules.

In the absence of such voluntary action, state legislators can also take steps to expand the use of provisional physician licensing. States today determine physician licensing requirements. Allowing provisional physicians a limited scope of practice under the supervision of an attending physician would help to employ the 5,000 medical graduates who did not match into a residency program. By establishing a provisional licensing system, the measure would offer them an apprenticeship training experience that may help them later on to match into a residency program and ultimately full licensure.⁶⁶

^{65.} John S. O'Shea, "Reforming Graduate Medical Education in the U.S.," Heritage Foundation *Backgrounder* No. 2983, December 29, 2014, https://www.heritage.org/health-care-reform/report/reforming-graduate-medical-education-the-us (accessed August 24, 2018).

⁶⁶ For another discussion of this concept, see Kevin Dayaratna, PhD, and John O'Shea, MD, "Addressing the Physician Shortage by Taking Advantage of an Untapped Medical Resource," Heritage Foundation *Backgrounder* No. 3221, May 30, 2017, http://report.heritage.org/bg3343.

Streamline Medicare Statutes and Regulations. The Medicare program today is governed by tens of thousands of pages of rules, regulations, and administrative guidelines. Previous attempts have promised consequential regulatory reform, but they have invariably failed. Today, there are grounds for optimism. HHS Secretary Alex Azar has announced that the Trump Administration intends to remove unnecessary government regulation, noting that so far in 2018 alone, the CMS has pared back rules estimated to reduce more than 4 million hours of paperwork.⁶⁷ Moreover, Congress has also launched an initiative to provide regulatory relief to Medicare providers.⁶⁸ Although there has been some progress, Congress should focus legislative efforts in these ways:

- Ease policies driving administrative burdens in the form of paperwork requirements both on paper and electronically, quality-reporting measures, certification and prior authorizations for medical equipment and treatment, and other forms that physicians must fill out in order to remain in compliance with medical payers.
- Ease documentation requirements for clinical visits. The CMS should revise the E valuation and Management or E/M code that dictates how clinical encounters and office visits are to be documented in order to be compensated by Medicare. The codes should better reflect clinical workflow.
- Rescind the mandate to use EHRs in order to receive full compensation by Medicare. EHRs have a place in modern practice, but market forces—combined with more appropriate policies as outlined below—not the government, should generally drive medical practices to adopt EHRs. The current mandate's downsides are significant: The capital required to implement a system, and the overhead required to maintain it, is a force that is

driving hospitals and doctors' offices to consolidate, which limits choice and potentially worsens health outcomes.⁶⁹ The cost of an EHR system is very likely preventing many small practices from opening and keeping physicians out of smaller, less-dense communities.⁷⁰

■ Respect and support the role the private sector has to play in developing products that meet doctors' needs. For example, the American Academy of Family Physicians has suggested that EHR vendors, physicians, and workflow engineers work together to streamline the process of documentation.

These changes would significantly reduce the amount of deskwork and administrative duties a physician must undertake. Deskwork is the single biggest driver of physician job dissatisfaction, burnout, and intention to leave medical practice. A serious cut in the amount of bureaucracy associated with medicine will likely keep more physicians delivering better care and working more hours for a longer period of their lives.

Innovative Payment Models Beyond Conventional Third-Party Payment. As deskwork is the most common physician complaint, the administrative requirements for receiving reimbursement from third-party payers play a large role in detracting from medical practice. If patients were able to control all, or most, of their own health care spending, patients would have the primary say over the payment of their physicians' treatment plans. As such, Congress should allow stand-alone, tax-preferred health accounts completely separate from insurance arrangements. Today, these type of accounts are tied to specific insurance plans that meet terms set by Congress. This new option would not only restore market power to the patient, it would also recover the power over clinical decision making from actuaries and insurance officials and give it directly back to the physicians.

^{67.} Alex M. Azar II, "Remarks to the American Hospital Association on Value-Based Transformation," U.S. Department of Health and Human Services, May 9, 2018, https://www.hhs.gov/about/leadership/secretary/speeches/2018-speeches/remarks-to-the-american-hospital-association-on-value-based-transformation.html (accessed August 24, 2018).

^{68.} News release, "Brady Highlights 'Medicare Red Tape Relief Project," House Ways and Means Committee, July 24, 2017, https://waysandmeans.house.gov/brady-highlights-medicare-red-tape-relief-project/ (accessed August 24, 2018).

^{69.} Lawrence P. Casalino et al., "Small Primary Care Physician Practices Have Low Rates of Preventable Hospital Admissions," *Health Affairs*, Vol. 33, No. 9 (September 2014), pp. 1680–1688, https://www.healthaffairs.org/doi/abs/10.1377/hlthaff.2014.0434?url_ver=Z39.88-2003&rfr_id=ori%3Arid%3Acrossref.org&rfr_dat=cr_pub%3Dpubmed (accessed August 24, 2018).

^{70.} Winston R. Liaw et al., "Solo and Small Practices: A Vital, Diverse Part of Primary Care," Annals of Family Medicine, Vol. 14 (2016), pp. 8-15.

Removing Barriers to "Direct Primary Care."

Direct primary care, a subscription-type service in which a monthly fee entitles a patient to a physician's services, is a growing and promising business model that allows physicians to directly contract with patients. The simplicity of paying for these services would eliminate virtually all of the complaints most commonly expressed by physicians themselves, and it would allow them to practice in a manner they see fit. If the patient becomes dissatisfied, the patient has the ability to simply contract with another direct primary care provider without involving an insurance company first.

Current obstacles to the direct primary care model exist at both state and federal levels.⁷¹ At the state level, the question is whether to treat this business as an insurer. State legislators must review any laws that affect these arrangements and rewrite or repeal any laws that encumber this type of practice.

At the federal level, HHS Secretary Azar has declared support for such a reform:

Contracting arrangements like direct primary care have generated tremendous interest from both patients and providers. They can offer the opportunity for seniors to receive convenient, accessible primary care from a physician they know at a predictable and affordable cost. Better access to primary care, as we all know, can prevent more serious and costly ailments.⁷²

There are several places to start: HHS should include direct primary care as part of alternative payment models, such as for the "patient-centered medical home."⁷³ The direct primary care model offers patients more access to physicians so their physicians will be better able to coordinate care. Also, Medicare and Medicaid should allow patients to use direct primary care arrangements and services. The patient

beneficiary would control where the money goes and the direct primary care model would bypass much of time-consuming issues over delayed or insufficient payments. Finally, Congress should allow funds from health savings accounts (HSAs) to be used for broader direct primary care arrangements.

Conclusion

Health care reform very often—understandably—focuses on providing coverage for the sickest among us, and better choices at lower costs. Presidential and congressional proposals, from the failed Clinton plan of 1994 to the troubled Obamacare of 2010, focus on broad sweeping changes. Policymakers in Washington and elsewhere tend to think of health care in terms of the one who receives it, and only rarely do they pay much attention to the ones who provide it.

Washington's approach should change. Today, America is faced with the very real threat of a shortage of medical professionals to serve the needs of a growing and aging population of patients. America's physicians are under stress, and many are demoralized, burned out, and looking toward an early retirement. Their problems have very little to do with actually delivering medical care to patients. They have much more to do with the non-clinical requirements imposed on them while running a medical practice. The survey data is quite clear: The laws, the rules, and the regulations that have interfered with the doctorpatient relationship have driven American physicians' morale lower, and encourage them to leave medical practice at precisely the time the American people need them more and need them most. For policymakers in Washington and in the states, there is a serious lesson here: Any serious reform must shift the focus back to the patient-doctor relationship, unburden the practice of medicine, and let doctors be doctors.

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^{71.} Daniel McCorry, "Direct Primary Care: An Innovative Alternative to Conventional Health Insurance," Heritage Foundation *Backgrounder* No. 2939, August 6, 2014, https://www.heritage.org/health-care-reform/report/direct-primary-care-innovative-alternative-conventional-health-insurance.

^{72.} Azar II, "Remarks to the American Hospital Association on Value-Based Transformation."

^{73.} Patient-centered medical homes are a form of accountable care organization and care delivery model that coordinates different services around the patient's need.