Special Report

Physician Burnout: Causes, Consequences, and (?) Cures

Herbert L. Fred, MD, MACP Mark S. Scheid, PhD "[D]issatisfaction among physicians with how their time and skills are used is widespread and growing." 1

"The highly trained U.S. physician. . . has become a data-entry clerk, required to document not only diagnoses, physician orders, and patient visit notes but also an increasing amount of low-value administrative data."

"More than half of U.S. physicians are now experiencing professional burnout." ³

"Physician burnout is reaching crisis proportions in the United States." ²

urnout in physicians is characterized by emotional exhaustion, finding work no longer meaningful, feelings of ineffectiveness, and a tendency to view patients, students, and colleagues as objects rather than as human beings. Associated manifestations include headache, insomnia, tension, anger, narrow-mindedness, impaired memory, decreased attention, and thoughts of quitting.³⁻⁵ In certain situations, physical exhaustion and moral distress are prominent features.⁶⁷

Career burnout is not limited to physicians.^{3,5} Results of studies in 2011 and 2014 showed that burnout indicators among the general United States working population remained steady at around 28%.³ During those years, however, the percentage of physicians suffering burnout increased from 45.5% to 54.4%.³ Because burnout by its nature is cumulative, that percentage is probably higher today.

Physicians in specialties at the front line of care—emergency medicine, family medicine, and general internal medicine—are at greatest risk of burnout. And although higher levels of education and professional degrees seem to reduce the risk of burnout in workers outside the field of medicine, an MD or DO degree increases the risk.

Key words: Burnout, professional/epidemiology/ prevention & control; delivery of health care/history; documentation/methods: electronic health records/ organization & administration; medical records systems, computerized/trends/ utilization; patient-centered care/trends; physicians/ psychology; practice management, medical/organization & administration; time management; workload/ psychology

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Causes

Aside from the often-mentioned external influences, the physician's makeup always plays an important role: depth of commitment, upbringing, role models, expectations, moral values, level of stress tolerance, and resiliency. Nevertheless, in the current medical environment, even the best among us can be overwhelmed by the following external factors.

Loss of Autonomy

Especially for physicians trained during the "high-touch" era (from approximately 1950 to the mid-1970s), 8.9 the profession has lost much of its human context. Not too long ago, patient management required use of one's brain and senses, sometimes followed by consultation with a colleague. Today, physicians have become micromanaged cogs in a machine:

Autonomy is the basic ability of individuals to exercise their judgment in terms of how to spend their time, attention, and resources. In the domain of medical care,

this could include the ability to decide when to see each patient, how much time to spend with each patient, what questions to ask them, when to see them next, what kinds of tests to perform, and what kinds of treatments to try out and for how long. This view of autonomy is almost in direct opposition to the current practice of medicine. The current procedures in medical reimbursement policies and technological advances are constantly moving physicians in the direction of less time spent with each patient and greater floods of information (for example, related to a given patient or general medical information) to manage or master.¹⁰

In essence, the practice of medicine has become a "fixing-people production line." ¹⁰

Treating the Data, Not the Patient

Abraham Verghese recently wrote a telling vignette of his experience as a patient in the era of the electronic health record (EHR):

The nurse came in regularly, but not to visit me so much as the screen against the wall. Her back was to me as she asked, "On a scale of 1 to 10, with 10 being great difficulty breathing...?" I saw her back 3 more times before I left. My visit recorded in the EHR would have exceeded all the "Quality Indicators," measures that affect reimbursement and hospital ratings. As for my experience, it was OK, not great. I received care but did not feel cared for.¹¹

Verghese's experience illustrates the modern practice of focusing on the monitor rather than on the actual patient.

A World of Rules

Physicians from the "high-touch" era⁸ aren't the only ones stressed by today's high-tech emphasis. Young physicians, taught in medical school the traditional Oslerian philosophy of focusing on the patient, often experience stress as they adjust to a new environment and learn the business aspects of medicine, 12 which include rules from government, insurance companies, and hospitals that limit the time physicians can spend with a patient. Those rules also require that the visit comply with the Health Information Portability and Accountability Act (HIPAA), Accountable Care Organizations (ACOs), quality indicators, and other standards. 13

An adverse effect of another absolute rule merits attention. Compliance with the mandated work-hour limits for trainees across all specialties necessitates relentless monitoring and diligent enforcement by program directors. This intense pressure, along with the associated fear of losing accreditation, puts these directors at substantially increased risk of early burnout.¹⁴

The hospital and other medical-practice owners also pressure physicians to remember that clicking the correct boxes on the EHR will enable "upcoding"—billing at the highest level for each encounter.¹¹

For all these reasons, internal and external, more than 50% of medical students, residents/fellows, and early-career physicians are already burned out.¹²

Asymmetric Rewards

Because physicians have chosen a life of service, they don't necessarily think of "insufficient reward" as an important factor in career satisfaction.⁴ Ariely and Lanier, however, highlight this stressor's special impact on the practice of medicine:

In our personal and professional lives, when we do what is expected of us, we receive, at most, a bit of praise. But, when we make a mistake, we are likely to be punished strongly. And although this asymmetry is true across the globe, it is particularly substantial in the medical profession.... As if the asymmetry of reward and punishment is not sufficiently harmful by itself, the explosion of information about each patient, each treatment, and each disease exacerbates this harm.¹⁰

Sense of Powerlessness

Especially for physicians who work with populations in poor socioeconomic situations,^{6,7} the inability to do anything about the root causes of their patients' medical issues leads to a different cause of burnout: futility.

To many people, the white coat and the prescription pad represent the highest form of individual agency, the very picture of social power. But, eventually, a physician will encounter patients whose health problems derive from a wicked, multigenerational knot of poverty and marginalization, and even the most astute, excellent physician may well find herself outmatched. Facing patients' adverse social circumstances as an individual clinician is a recipe for disillusionment: the physician who believed she was maximizing her individual agency comes to feel utterly powerless. No longer the lone hero—just alone.⁷

Electronic Health Record Woes

"There is building resentment against the shackles of the present EHR; every additional click inflicts a nick on physicians' morale." ¹⁵

For many physicians, the EHR has become the final straw. Although intended to overcome the flaws inherent in a paper-based system, the EHR has produced its own set of problems, perhaps the most important of which is the absence of social and behavioral factors fundamental to a patient's treatment response and health outcomes.¹⁵

Instead of being a mere replacement for paper records, EHRs have evolved into data-collection devices for HIPAA and other government regulations.¹³ Consequently, they focus more on processes than on outcomes, adding to the physician's workload while not improving patient care.¹³ In that light, 2 recent studies are noteworthy.

One study involved ambulatory care in 4 specialties (family medicine, internal medicine, cardiology, and orthopedics) in 4 states (Illinois, New Hampshire, Virginia, and Washington). For every hour the physicians spent facing their patients, they spent nearly 2 additional hours facing the computer, entering data. They also spent one to 2 hours working at home each night to "keep up." 1

The other study involved 142 family medicine physicians in Wisconsin who spent more than half their workday, nearly 6 hours, interacting with the EHR. Two thirds of that time was spent on clerical and inbox work.¹⁶

Worse, most EHRs are designed to facilitate billing, not patient care, leading the National Academy of Medicine to request that social determinants of health be included in future versions of EHRs.¹⁷ And, almost 10 years after the passage of the Health Information Technology for Economic and Clinical Health (HITECH) Act, health information technology (IT) developers still use hundreds of different communication and nomenclature standards,¹⁸ preventing a substantial percentage of records from being shared across the various competing EHR platforms.

In fact, the very point-and-click design of the EHR prompts the physician to click more boxes, even when they're not completely accurate. Thus, a one-legged patient can have a chart reading "pulses intact in both feet." 11

The ease of making a point-and-click error should be obvious to anyone who has ever used a computer. One of us, for example, has been urged by his insurer to consult with a specialist about his COPD (chronic obstructive pulmonary disease)—which he doesn't have—and to schedule his routine mammogram—which, as a male, he doesn't need. Clearly someone, somewhere, is clicking the wrong boxes.

Consequences

Physician burnout is not only expensive in monetary terms, but also leads to a constellation of other costs, including physical, spiritual, and emotional.

Leaving Medicine

Investigators estimate that, when physicians leave the field, the practice loses \$500,000 to \$1,000,000 of revenue. This loss is even greater in high-paying specialties. To recruit a replacement costs an additional \$90,000.

And the costs of college and medical school often leave physicians themselves with sizable debts, which can be harder to pay off in a nonmedical job.

Physicians who quit because of burnout have spent a substantial percentage of their lives in premedical courses, medical school, residencies, and practice. Those years are not entirely wasted, of course, but the specific curricula that prepare physicians to practice medicine do not necessarily train them to do anything else well.

Every physician who leaves the field adds to the work-load of other physicians. This has a cascading effect—causing more stress, leading to more burnout.

Remaining in Practice

Even when a burned-out physician continues to practice medicine, negative consequences can follow, such as the misuse of alcohol and drugs, broken relationships, and suicidal ideation.^{5,14} These repercussions, in turn, clearly diminish the quality of care delivered.^{5,14} Moreover, the fact that roughly half of U.S. physicians have symptoms of burnout suggests that the problem stems from environmental factors and the care-delivery system, not from elements within the individual.⁵

The litany of burnout characteristics—especially closed thinking, impaired memory, decreased attention, and viewing people as objects—can easily lead to medical error. And every year, about 250,000 patients die in the U.S. because of medical error: "the rough equivalent of, say, a jumbo jet's crashing every day." ¹¹

(?) Cures

Because of burnout's variable nature, there is no consensus for preventing, treating, or curing it. Most "cures" focus on stress-reduction training rather than on the systemic factors that produce burnout.⁵

Methods suggested to help physicians in their struggles against burnout include organizing a community of practice for mutual support⁴ or for political action⁷ and the use of cognitive behavioral therapy.⁴ Scribes may reduce the data-entry workload of physicians, increase physician satisfaction with patient visits, improve chart quality and accuracy, and not detract from patient satisfaction.¹⁹

Clearly, changes to the EHR are necessary. The EHR was created almost 10 years ago (an eon in computer time) to satisfy the requirements of hospitals and insurers rather than physicians. ^{2,11} There was no associated nationwide directory or regulatory infrastructure. ¹³ In addition, the EHR has not "kept pace with technology widely used to track, synthesize, and visualize information in many other domains of modern life." ¹⁵

Re-engineering current EHRs will be difficult. In fact, Zulman and colleagues¹⁵ concluded that, in many clinical situations, patient care could be improved simply by "deimplementing" the EHR.

Most authors point out that EHRs can never live up to their potential without true cross-platform compatibility: the capability for medical data to be shared widely across the many competing versions of the EHR. 13,16,18 However, the for-profit IT developers who create and sell the current EHRs operate in a highly competitive field and are usually reluctant to cooperate in areas where proprietary information might be shared with a competitor. And it is not just a matter of getting 2 or 3 to work together. According to the U.S. government, in 2017 no fewer than 186 different certified health-IT developers were supplying heathcare software to non-Federal acute care hospitals alone, and 684 developers were supplying EHRs to ambulatory care professionals. 20

And because a hospital or insurer usually requests alterations of an off-the-shelf software platform to conform with business practices already in use, it's not unusual for physicians to find that they "can't reliably get a patient record from across town, let alone from a hospital in the same state, even if both places use the same brand of EHR." ¹¹

Some argue—hopefully, perhaps—that inter-EHR data-sharing could be encouraged by asking the government to streamline its EHR certification standards to focus more on outcomes, to tie EHR certification to interoperability, and to provide financial incentives to the private sector to develop standard interfaces for all aspects of patient care.¹³ Others argue, however, that the time has come for a total rethinking of the EHR, beginning with the underlying principles of patient care rather than with compliance and finances.²

The creation of a new physician- and patient-centered EHR would be a great improvement. But would the government, the insurers, and the medical community be willing to admit that the first attempt was a failure and simply write off the hundreds of millions of dollars spent on it? We doubt it.

Conclusion

To sum up: a loss of autonomy, overreliance on computer data, onerous rules, an asymmetric reward system, a sense of powerlessness, and EHRs that are not designed primarily for patient care have produced a climate in which more than half of all members of the field, from medical students to senior practitioners, are burned out. As a result, physicians are quitting in large numbers, further increasing the stress on those still practicing. Those burned-out physicians who remain are less able to give appropriate patient care. There appears to be no easy solution to these problems. Sorry.

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