DOCTORS' ORDERS

The Making of Status Hierarchies in an Elite Profession

TANIA M. JENKINS

Columbia University Press
New York

Columbia University Press
Publishers Since 1893
New York Chichester, West Sussex
cup.columbia.edu

Library of Congress Cataloging-in-Publication Data
{to come}

Columbia University Press books are printed on permanent and durable acid-free paper.

Printed in the United States of America
Add cover/jacket credit information

To Maman Louise

Contents

Introduction

I met Trevor on his very first day of residency, at the start of three years of practical, on-the-ground training in internal medicine following medical school.[1] He was of medium height with a closely shaven head and a strong build. Trevor was especially fond of white button-down shirts with sleeves rolled up to his elbows, revealing olive-toned forearms. He wore his stethoscope slung over one shoulder—like a purse—and even as a first-year resident (intern), he possessed a quiet calm that was appealing in a doctor.

Trevor had known he wanted to go into medicine from a young age. After going to private elementary and high school in Michigan and graduating from the University of Michigan, he applied to only three medical schools—all in Southeast Asia. It made sense to him financially: "I thought about going to the Caribbean but cost-wise, you know, I was going to be paying US prices. My four years in [Southeast Asia], including housing, tuition, a car, all the miscellaneous costs, it probably cost me in the ballpark of maybe 80K for four years." Tuition and living expenses for medical school in the United States or the Caribbean averaged about three to four times that amount, so Trevor reasoned he had made a sound financial choice.

He was picky, however, about which medical schools he applied to in Southeast Asia. He applied only to programs that would allow him to do clinical rotations in the United States, knowing that he eventually wanted to come back to the United States for residency. "I wanted to have more exposure to the US system, whether it be rotations or just [learning] how medicine is practiced [here]," he explained, adding "I think a lot of [residency] programs—especially for us foreigners—they like it when we have US clinical experience." I remember being startled by his expression: "us foreigners." Trevor was born and raised in

Ann Arbor. When I pointed this out to him, he shrugged and said, "Actually, in terms of residency, everyone is kind of split up by either US grad or foreign grad, so whether I was born here or not, they would still classify me as a foreign grad. . . . [We're American] in every aspect except for how the medical field views us basically."

Every year the United States relies on thousands of medical graduates like Trevor to fill postgraduate residency positions because it does not produce enough doctors to meet its own needs. In 2019, nearly 19,000 American allopathic medical school seniors (USMDs) vied for over 32,000 first-year residency positions.[2] Nearly 94 percent of them were successful, but even if 100 percent had "matched" to a residency, there would still have been more than 13,000 positions left over. That means the United States does not graduate enough MDs by about a third every year. In fact, since the advent of modern residency training in the 1950s, the United States has produced 20 to 45 percent fewer MDs than are needed to staff residency positions nationwide.[3]

To fill the gap, the United States depends on doctors trained in other countries and traditions. In 2019, nearly 10 percent of first-year residency positions were filled by US citizens who were international medical graduates (USIMGs).[4] These are Americans, like Trevor, who take a nontraditional route into medicine by studying overseas (most often in the Caribbean) and coming back to the United States to complete their required residency training. Most USIMGs complete roughly two years of classroom instruction abroad and then finish the last two years of their clinical education in the United States, preparing them for residency positions in the US health care system. Around 55 percent of USIMG applicants successfully matched to residency positions in the United States in 2019.[5]

Another 13 percent of first-year residency positions were filled by international medical graduates who are not US citizens (IMGs).[6] These individuals complete at least undergraduate medical training abroad before deciding to pursue graduate medical education in the United States.[7] Some come to the United States as fully trained, experienced physicians, but all must still complete residency training in the United States before becoming eligible to practice independently.[8] A little more than half (53.4 percent) of all IMG applicants were able to match to a residency program in 2019.[9]

Finally, another 16 percent of first-year residency positions were filled by US-trained osteopathic physicians.[10] Compared to a Doctor of Medicine (MD), a Doctor of Osteopathic Medicine (DO) espouses distinct philosophical principles that emphasize a holistic approach. Both types of doctors can practice medicine in the United States, but DOs maintain their own medical schools and affiliated hospitals. Previously, they also maintained their own residency programs, but as of 2020, all MD and DO programs have merged under a single accreditation system.[11] Despite the previous separation, from the 1990s until 2019, DOs were able to apply to allopathic (or MD-based) residencies for a chance to work in a more diverse set of hospitals and specialties.

While DOs are US-trained doctors, the medical profession often treats them similarly to IMGs because they have taken a nontraditional path to medical school. (I will further describe the history of DO schools later.) Like IMGs, DOs match to residency positions at comparatively lower rates than USMDs do—only 81.5 percent over the past five years compared to 94 percent for USMDs, 55.6 percent for USIMGs, and 53.4 percent for IMGs.[12] Residency therefore is hardly a given for non-USMDs while it is all but guaranteed for USMDs.[13] For these reasons, I refer to all international and osteopathic medical graduates (USIMGs, IMGs, and DOs) jointly as *non-USMDs* in order to contrast them with USMDs.[14] The non-USMDs in each category have distinct histories, trajectories, and perspectives, but what all three groups have in common is this: they are systematically relied upon to fill gaps in the US health care system, yet the medical profession views and treats them differently than USMDs.

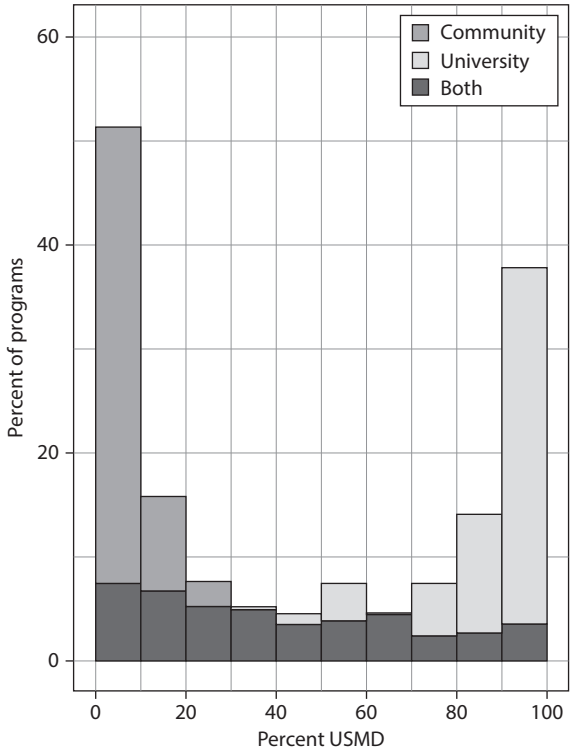
Despite representing a sizable chunk of new resident physicians each year, non-USMDs often do not end up in the same specialties as USMDs. Highly prestigious and sought-after fields, such as otolaryngology (also known as ear, nose, and throat) and orthopedic surgery are almost exclusively staffed by USMDs while less prestigious areas like pathology, family medicine, and internal medicine are dominated by non-USMDs.[15]

Even within the specialties that they dominate, non-USMDs often do not match to the same kinds of programs as USMDs,[16] although mean licensing exam scores—one of the biggest predictors of residency placement—are virtually identical between matched USMDs and at least matched international graduates. In fact, on one particularly critical test—Step 1 of the US Medical Licensing Exam (USMLE)—non-US citizen international medical graduates (IMGs) actually outperform US-citizen MDs (i.e., USMDs and USIMGs) and DOs.[17] Furthermore, for the same

exact test scores, non-USMDs generally have a much lower probability of matching to their preferred specialty than USMDs do.[18]

Still, USMDs tend to congregate in higher-status hospitals while non-USMDs fill positions in lower-status ones, often in less desirable geographic areas. In some cases, this has resulted in heavily segregated training environments. On the one hand, there are highly prestigious programs staffed mostly by USMDs in university hospitals, which tend to have lower patient-to-nurse ratios, higher procedure volumes, and state-of-the-art equipment and care processes. On the other, there are "DO- or IMG-friendly" programs, as they are known in the blogosphere, which tend to be in smaller community hospitals with lower patient volumes, older technology, and fewer resources than university hospitals.[19] This segregation is so widespread that nationwide, USMDs make up 90 percent or more of the housestaff at over 37 percent of all internal medicine university programs and less than 10 percent of the housestaff at over 51 percent of all internal medicine community programs (see figure I.1).[20] Indeed, the exceptions are the integrated programs, which comprise only about 16 percent of internal medicine residency programs across the country.[21] IMG-friendly programs also have lower American Board of Internal Medicine exam pass rates after graduation compared to USMD-dominated programs, even though international medical graduates have virtually the same average Step 1 scores prior to residency—one of the biggest predictors of Board passage—as USMDs. Thus, not only are USMDs and non-USMDs segregated during residency training; their training may not be equal, at least as measured by Board pass rates.[22]

The distribution of USMDs and non-USMDs need not look this way, however. In fields like computer science, engineering, and physics, where highly skilled foreign workers make up significant proportions of the US workforce, individuals are distributed across specialties and institutions more or less equally, with little concern for citizenship or origin of degree.[23] A survey of graduate programs in science, technology, engineering, and mathematics found that students in some of the nation's most prestigious graduate programs are disproportionately international students.[24] A similar trend exists among university faculty; in natural science and engineering departments, a significantly higher proportion of foreign-born faculty work in high-prestige research (R1 or R2) and doctoral institutions compared to US-born faculty, who are more likely to work in comprehensive or liberal arts colleges.[25]



I.1 Distribution of USMD concentration by program type (2017–2018). Proportion of USMDs in community- and university-based internal medicine programs nationwide for 2017–2018.

Source: American Medical Association, Fellowship and Residency Electronic Interactive Database (FREIDA).

These trends beg the question: What is happening in medicine, such that the United States imports nearly one-third of its workforce every year—including some of the world's "best and brightest"[26]—but USMDs do not appear to be competing with these workers (or even with domestically trained DOs) for the most prestigious positions, although such competition is the norm in other fields? After all, whereas law is highly jurisdiction-specific, medicine involves portable skills that should be translatable across contexts; it is what makes organizations like Médecins Sans Frontières possible. Top-notch non-USMDs should be able to compete with USMDs on this basis, especially because after graduation,

they have repeatedly been found to offer care that is equal to or even higher in quality than that provided by USMDs.[27]

Yet they decidedly don't compete. In fact, even the slightest hint of competition among USMDs and non-USMDs has provoked alarm within the US medical community. In 2013, nearly six hundred USMDs failed to match to a residency program, prompting talk of a crisis within the profession. The Association of American Medical Colleges (AAMC), which represents US medical schools, was reportedly "troubled" by this trend but never questioned the quality of these unmatched USMDs.[28] Instead, the expectation was that "new US graduates will simply displace many graduates of foreign medical colleges"[29]—who may well be of higher quality—rather than compete with non-USMDs for residency positions, which remain limited in number due to a congressional cap on federal funding for these positions imposed in 1997.[30]

To add to the puzzle, there are no policies requiring hospitals or residency programs to accept a certain proportion of USMDs or even to consider USMDs before non-USMDs. Despite threats to the contrary in the 1980s, Medicare funding, which pays for residency training, still does not vary based on the kind of medical graduate hired. In fact, unlike nations such as Canada and Australia, the United States lacks any formal mechanism for requiring IMGs to *train* in medically underserved areas, although some policies require them to work in such areas for a period of time after graduation.[31] Australia, for example, explicitly requires that internationally trained graduates be given lower priority than domestic medical graduates in awarding residency positions, thereby ensuring that the former will be funneled toward underserved or undesirable areas rather than competing with Australian doctors for the most preferred spots.[32] No such policies exist, however, in the United States. In fact, if they did, it's likely that they would be vigorously opposed by the profession. Professional bodies, like the American Medical Association (AMA), have been very successful at fighting off government interference and would likely balk at efforts to regulate the profession in this way. Besides, the general cultural ethos in the United States is one of meritocracy, where hard work and talent are supposed to be key mechanisms for allocating that opportunity—not policies.[33]

So, on the one hand, the United States relies on non-USMDs to fill much-needed residency positions. On the other, it does not want non-USMDs creating competition for its own medical graduates, even though such competition exists in other high-skilled fields where the United States relies on foreign workers.

How does this work? How does the medical profession ensure that non-USMDs fill undesirable positions without creating additional competition for USMDs? Even US citizens who trained internationally as MDs (USIMGs) or domestically as DOs aren't on an equal footing with USMDs. Recall Trevor's words: "us foreigners." When it comes to trajectories into graduate medical education, the primary deciding characteristic, more than citizenship, seems to be USMD or not.

How do such segregated patterns within graduate medical education emerge? If they're not the result of formal policies, then what are the largely *informal* practices, beliefs, social forces, and prejudices that sustain a system whereby residency programs exclude some of the world's best talent? Officially, The Residency Match promises to be "100 percent objective, 100 percent accurate, and 100 percent committed to a fair and transparent process."[34] Upon closer inspection, however, these patterns of segregation suggest that far more unofficial mechanisms of social stratification are at play. After all, The Match algorithm is only as objective as the inputs it receives from applicants and programs (see the next section, "A Brief History of Graduate Medical Education in the United States," for more on The Match).

This book offers a rare window into those informal mechanisms. It explores how status hierarchies are created among putative equals: trainees within the same specialty, internal medicine. Using ethnographic data from two internal medicine residency programs—one staffed almost exclusively by non-USMDs and the other staffed almost exclusively by USMDs—I explore how this phenomenon of segregation occurs from the residents' and the programs' perspectives. Specifically, I rely on data from in-depth interviews, focus groups, and intensive observations to address four aims: First, I examine how these two programs came to be so segregated, and, second, I trace the impact that segregation has on the residents' training. Third, I follow the trainees longitudinally throughout residency to illustrate how their career trajectories compare at graduation. Finally, I ask how these residents make sense of the status hierarchies among residents from different educational backgrounds, and I consider why non-USMDs would consent to taking on lower-status positions. As one IMG put it, "What the hospitals and the universities here in the States are doing with IMGs is filling the. . . gap." Given this point of view, why would non-USMDs—still members of an elite profession—be willing to serve such a gap-filling function?

I argue that these residents experienced what I call *status separation*, a social process by which those in a seemingly homogenous profession get hierarchically

differentiated by pedigree into various strata according to their social worth (status), creating horizontal stratification (or differences in prestige) among trainees in the same specialty. Amidst a widespread and pervasive emphasis on *individual merit* in medicine, I found that largely *structural* advantages and disadvantages, often dating back to childhood differences in social class, are frequently misidentified as differences in individual achievement and motivation among medical graduates, helping USMDs float to the top of the status hierarchy while pushing non-USMDs toward the bottom. I also found that the role of merit is complicated by unequal training structures within the profession. USMDs and non-USMDs are sorted into different training programs—ostensibly on the basis of merit—where they enjoy very different advantages and opportunities. The result is a kind of self-fulfilling prophecy, with USMDs (who are widely assumed to be better from the beginning) becoming stronger residents in large part because of the amount of structural support they receive along the way. In this way, early structural advantages have a way of translating themselves into actual differences in merit and achievement in medicine.

More concretely, I argue that USMDs receive systematic support starting in early life from their parents and eventually from the profession. Once in medical school, they benefit from what I describe as a kind of implicit professional "social contract": in return for successfully "playing the game" of getting into US medical school—involving years of hard work, debt, and deferred gratification—they are nearly guaranteed success in the profession. This social contract makes it almost impossible for USMDs to fail, affording them special "rights" to elite positions within medicine. In this way, USMD leaders elevate those within their ranks and stigmatize those whom they have rejected. In addition to stigma, non-USMDs face systematically harder rules of the game, such that they are often required to do more to reach lower-status (and lower-quality) training positions, even though positions are supposed to be open to everyone equally. And by training in lower-resource environments, non-USMDs, in turn, receive poorer training and less supervision than USMDs, generally making them weaker residents (as measured by pass rates on the American Board of Internal Medicine Certification Examinations and fellowship match rates) compared to USMDs. Still, these non-USMDs consent to such inequality. They readily agree to take on lower-status positions—in part because they feel they have rightfully earned them and in part because they know they are among the lucky few non-USMDs to have matched to residency.

By revealing the subtle, informal, and often unspoken mechanisms that help sustain a myth of uncomplicated meritocracy in medicine, I show how educational institutions—even those at the apex of broader social and professional status hierarchies—can serve to perpetuate broader social processes of inequality along class, race, and nativist lines.[35] This book joins a larger sociological corpus of work that casts doubt on the power of education (even professional education) as a great equalizer,[36] and it illustrates how beliefs in hard work, dedication, and merit, which educational institutions so effectively inculcate into students, can also help make them complicit in their own subordination.[37] That the medical profession is creating an underclass of physicians—and relying on non-USMDs to fill it—suggests that similar processes of othering and subordinating immigrants and minorities, which are found in sectors of the labor force like service and farming, may also be happening in elite professions like medicine. Even the goal is similar: filling jobs Americans don't want. And by studying the inner workings of medicine, I provide insight into similar processes happening in other elite professions—like academia and law—where distinctions are also being drawn between putative equals.

A BRIEF HISTORY OF GRADUATE MEDICAL EDUCATION IN THE UNITED STATES

To understand the current situation in graduate medical education, it is useful to trace how medicine has become both more open and more exclusionary over time as it has balanced the dual goals of protecting its elites and maintaining just the right supply of doctors.

Prior to World War I, postgraduate medical education was uncommon. One-year internships or so-called house pupil or house officer positions were "haphazard," optional, and generally quite rare.[38] After the war, however, hospitals saw growing demand for medical services as advancements in treatments (e.g., antibiotics) and diagnostic equipment (e.g., X-rays) proliferated.[39] Around the same time, private and public sources were investing large amounts of money in hospitals, and specialties began emerging, all of which added to the growing need for round-the-clock staffing in hospitals.[40] In the 1920s and 1930s, internships became more formally distinct from full-fledged (multiyear) residencies and were now mandatory to become a fully licensed physician in any field. Then, in

the 1950s, with the advent of specialty certification boards, a multiyear residency became the only acceptable route to specialization, leaving one-year internships for those who preferred to remain generalists. The free-standing internship was eventually abolished in 1975, making a multiyear residency required for all medical graduates.[41] Residency therefore went from being viewed as a *privilege* to effectively becoming a *right* for US physicians, without which they could not practice independently as clinicians.[42]

These changes left the profession with a conundrum: how to increase the supply of physicians in order to meet growing demand while still protecting the profession's inner elite core of USMDs from added competition?

From Sponsored Mobility to Contest Mobility

Prior to 1952, protecting the elite was relatively straightforward, as internship and residency positions were mostly allocated through unofficial "sponsorship" arrangements between applicants and individual clinicians.[43] This was especially true of coveted specialist positions, whereby new recruits would be "directly" sponsored by "one of the inner fraternity" through an apprenticeship model.[44] Elite status in the profession was therefore thought to be a product of "elaborate social machinery rather than . . . a freely competitive milieu"[45] and was transmitted through *sponsored mobility*, whereby trainees for elite positions were chosen "on the basis of whether [elites] judge the candidate to have those qualities they wish to see in fellow members."[46] Unsurprisingly, as a result, the medical elite strongly mirrored the social elite and often excluded women and racial and ethnic minorities.

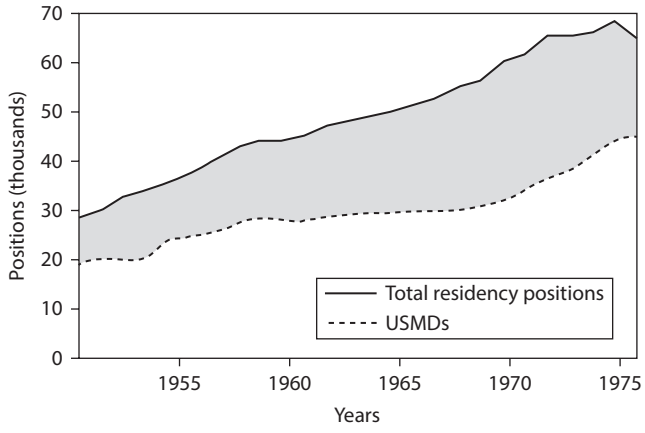
After World War II, however, as the demand for house officers increased, so did competition between hospitals for good candidates. Students were being asked to make increasingly early commitments to programs (sometimes even on the spot), which prompted much dissatisfaction and stress among trainees.[47] In 1952, that changed with the advent of the National Resident Matching Program (NRMP), better known as The Match—a centralized clearinghouse for residency applications nationwide. The idea was to allow applicants to rank-order their preferences, get hospitals to do the same, and then find a "match," providing the applicant with a single offer from the highest-ranked program that wanted to hire them. The Match was thus designed to level the playing field and do away with both exploding offers and informal sponsorship arrangements, thereby

"democratizing" graduate medical education and making it open to any qualified candidate.[48] Traditional barriers based on religion, gender, and race/ethnicity were reduced, and residency positions were distributed more equitably.[49] In this way, The Match theoretically marked an important shift in the medical profession from sponsored to *contest* mobility, whereby "elite status is the prize in an open contest,"[50] with The Match promising "a process that is fair, efficient, transparent, and reliable" and ostensibly open to anyone who is qualified.[51]

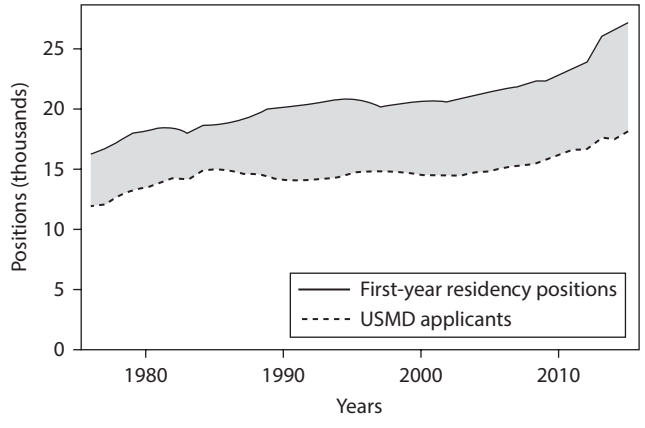
Of course, the question of who was qualified was still entirely determined by the profession itself. As much as graduate medical education became more open after the introduction of The Match in the 1950s, the medical profession was still careful about who it allowed into its ranks, using external closure mechanisms like licensure to protect itself from encroachment on its jurisdiction.[52] DOs were a case in point. Despite having made impressive strides in increasing the standards of osteopathic medical education in the 1940s and 1950s, DOs remained shunned by MDs, who maintained formalized control over medical matters. Prior to the 1960s, DOs were prohibited from serving as physicians in the military or holding public health office and were even banned from working in allopathic hospitals in certain states.[53] They were eventually forced to merge into a single (MD) profession in California in 1961, thereby losing their distinctive professional identity.[54] That same year the AMA considered whether to allow "'voluntary' relations of its members with 'osteopaths'" but ultimately decided that "there cannot be two sciences of medicine or two different yet equally valid systems of medical practice."[55] DOs were also prohibited from training in allopathic residency programs, forcing them to form their own parallel graduate medical education system. It wasn't until 1991 that DOs could complete their residency in an allopathic program.[56] Thus, while The Match represented a step forward in terms of "democratizing" the profession, that openness was strategic and mostly reserved for MDs who, once again, viewed residency as their "right."

Balancing Supply and Demand

At the same time, there was still the outstanding problem of a shortage of doctors. The growing demand for trainees still far outweighed the supply of US-trained physicians—a reality that persists to this day (see figures I.2 and I.3). This was particularly true in community hospitals, where some programs struggled to recruit



I.2 Number of residency positions and USMD residents nationwide (1950–1977).
Number of residency positions and USMD residents nationwide from 1950 to 1977.
Source: Irigoyen and Zambrana (1979).



I.3 Number of first-year residency positions and USMD applicants nationwide (1976–2016).
Number of first-year residency positions and USMD applicants for residency nationwide from 1976 to 2016.
Source: National Resident Matching Program (2016).

even a single intern in some years.[57] The profession could not completely close itself off to outsiders, given the growing demand for medical care.

The solution embraced by many hospitals was to recruit IMGs, effectively opening the nation's doors to the world's best and brightest.[58] Their influx, however, was carefully controlled through centralized governmental policies such as visa restrictions and licensing laws, which helped protect USMDs from competition. Depending on the perceived supply of USMDs at any given moment, policies have either increased or decreased the number of IMGs allowed into the United States to practice medicine.

The first evidence of efforts to regulate the influx of foreign-trained doctors came in 1938, when the AMA required all IMGs to obtain US citizenship prior to being licensed—a rule that was implemented by many state licensing boards until the late 1960s.[59] The increasing specialization of doctors, however, as well as the rising need for medical care, made citizenship an impractical requirement. The Smith-Mundt Act of 1948 extended exchange visitor (J) visas to IMGs for the first time, allowing them to pursue postgraduate training in the United States on the condition that they return to their home country for at least two years prior to applying for legal permanent residency in the United States. The number of eligible IMGs, however, was severely limited. In the 1950s and 1960s, the AMA and the AAMC published a very short list of "acceptable" foreign schools that were believed to operate according to US standards, but this list was highly incomplete and included mostly European schools.[60]

By the early 1960s, the US Department of Labor determined that a doctor shortage was looming, so new laws were passed to waive the two-year home residency requirement for IMGs.[61] By 1965, doctors were exempt from national quotas that limited the number of migrants from certain countries.[62] Preference categories for skilled workers were created in the Immigration and Naturalization Act of 1965, encouraging the immigration of professionals who could help fill gaps in the US economy.[63] By 1970, IMGs could simply exchange their J visas for regular work (H-1B) visas to facilitate their application for permanent residency.[64] Unsurprisingly, the supply of IMGs increased considerably during that period.

Concerns about a shortage of doctors, however, were quickly replaced with fears of an oversupply from the 1970s until the 1990s[65]—fears largely attributed to an overabundance of IMGs.[66] Around this time, offshore medical schools began emerging, raising concerns that USMDs would be crowded out by Caribbean graduates.[67] Because Caribbean graduates were typically US citizens, immigration

policies would do little to stem their influx into the United States. USMD numbers were also rising domestically around that time, with a nearly 45 percent increase in the number of medical schools operating during this time period.[68]

Osteopathic medical education was also expanding during this era—a sign of slow, yet growing acceptance of DOs in the profession. In 1968, the AMA finally permitted DOs to become members of the association. By 1973, all fifty states allowed DOs to practice as fully licensed physicians, and as a result of increased public funding, the number of osteopathic medical schools grew from five to fourteen by 1980.[69] Still, DOs were not allowed to train in allopathic residency programs until 1991, which protected USMDs somewhat from osteopathic competition for residency positions.[70]

The result, starting in the early 1970s, was an estimated *surplus* of anywhere from 35,000 to 70,000 doctors.[71] Panic ensued. Scholars wrote about the threat of unemployment for junior doctors and warned of a "grim" outlook awaiting USMDs applying to residency.[72] In response, the government passed the Health Professions Educational Assistance Act of 1976 and the Health Services Extension Act of 1977, which reinstated the two-year foreign residency requirement for J visa holders and required new IMGs to have their visas approved by the US Department of Labor.[73] For its part, the medical profession—much like other elite professions keen on keeping immigrants out[74]—introduced a series of new licensing examination requirements for international graduates, curbing the influx of IMGs by as much as 80 percent.[75]

In the 1980s, there were also (largely unsuccessful) attempts in Congress to limit the number of both IMGs *and* USIMGs allowed to practice in the United States. These included calls for quotas to limit the number of foreign-trained doctors (both IMG and USIMG) that hospitals could hire and threats to cut government funding to any hospital hiring more than the allotted number of IMGs.[76] While these initiatives did not become law, the Higher Education Act of 1992 did manage to restrict federal loans to only a handful of Caribbean schools, thereby limiting government support for USIMGs.[77]

The Current Policy Climate

Based on the policies from the late 1970s to mid-1990s, which aimed to squeeze IMGs out of the health care system, many expected the nation to become less dependent on IMGs over time, eventually preferring to hire US-trained

personnel over foreign doctors.[78] Yet self-sufficiency has hardly come to pass. Since the mid-1980s, the proportion of residency positions filled by non-USMDs has risen steadily from 25.5 percent in 1985 to 39.6 percent in 2019, but the *average match rate* for USMDs has remained almost constant (around 93.6 percent).[79] So, while the number of non-USMD trainees has increased, their larger numbers do not seem to be posing additional competition to USMDs, nearly all of whom are still matching to residency, predominantly in their preferred specialties.

These trends are particularly interesting, given the current policy climate, which, compared to the 1970s and 1980s, is relatively open toward noncitizens wanting to practice and stay in the country. Depending on the residency program, IMGs can be sponsored for either H-1B or J visas, with the option of waiving the two-year home residency requirement by working in an underserved area upon graduation. Besides, visa restrictions are ineffective against non-USMDs who are US citizens, such as USIMGs and DOs, whose numbers have increased substantially in recent years, despite the lack of federal loan support for most offshore schools. The number of Caribbean schools catering to US citizens has exploded since the 1970s, with twenty-four new schools built in the early 2000s alone, making a total of around thirty-five universities as of 2014.[80] The number of osteopathic medical schools in the United States has also grown from five in 1968 to thirty-seven in 2013, and the allopathic Accreditation Council for Graduate Medical Education (ACGME) joined forces with the American Osteopathic Association to offer a single graduate medical education accreditation system, overseen by the ACGME, as of 2020.[81]

And even as the formal prerequirements for residency have become more stringent, they have also been applied more uniformly across medical graduates, without specifically disadvantaging non-USMDs. Since 1992, IMGs and USIMGs have been required to take the same USMLEs that USMDs are, not the more difficult exams historically designed to keep IMGs out.[82] All credentials (transcripts and diplomas) must be verified by the Educational Commission for Foreign Medical Graduates (ECFMG) before applying for residency, but the ECFMG's list of approved foreign schools (now contained in the World Directory of Medical Schools) is far more inclusive than the previous list maintained by the AMA and the AAMC in the 1950s and 1960s.[83] Approximately 57.2 percent of all applicants since the mid-1980s have secured ECFMG certification after passing the USMLEs and getting their credentials verified.[84] All this vetting means that only those IMGs who can meet or exceed US standards are permitted to even *apply* for residency.[85]

Residency training itself has also become more uniform in recent years, thanks to centralized efforts to standardize graduate medical education and improve learning outcomes. In the early 2000s, the ACGME moved to evaluate and accredit programs based not only on their structural characteristics (like number of faculty) but also on their residents' abilities to master certain skills and competencies.[86] Thus, by overseeing graduate medical education nationwide, bodies like the ACGME ostensibly help ensure a reasonable degree of standardization across programs—and thus comparability among trainees.

So more than ever, non-USMDs and USMDs *should* be competing on a level playing field as supposed equals in the competition for residency positions. The Match promises contest mobility to ever-larger numbers of non-USMDs. Applicants are objectively assessed and are now largely comparable, thanks to standardized examinations. DOs and MDs are training in accredited programs that ensure minimum quality standards across institutions. And despite failed attempts in the 1980s, there are still no policies requiring hospitals to prioritize USMDs or US citizens. Given these developments, we might expect USMDs and non-USMDs to compete with one another for residency positions, resulting in a heterogeneous distribution of medical graduates in different fields. Instead, what we find is marked segregation along the lines of medical pedigree. How does this happen?

SOCIOLOGY OF THE MEDICAL PROFESSION

Unfortunately, sociological theory about the medical profession does not yet have a good answer to the question of how such segregation arises. With a few notable exceptions, medical sociology has traditionally conceptualized physicians as a largely monolithic group vis-à-vis-patients and other professionals, often overlooking informal status distinctions *within* the profession and certainly within specialties. To understand this homogenizing tendency within the discipline, we need to take a historical look at how sociological scholarship on the medical profession has developed by juxtaposing the progression of ideas with macrosocietal changes. This chronological approach is necessary to fully appreciate the evolution of the theories and to understand why they are insufficient today. (Readers less interested in theoretical debates may want to turn to the section entitled "Studying Status Separation.")

A Community of Equals

Early medical sociology had its roots in the functionalist tradition, which sought to understand why professions work and cohere as a unit.[87] Sociologists of that era therefore conceptualized professions as harmonious groups of individuals sharing similar interests, attitudes, and education—"a community of equals."[88]

The so-called golden age of doctoring (1945 to 1965) prompted scholars to consider how medicine became so successfully professionalized that doctors were effectively unopposed when it came to health matters. In *Professional Dominance*, Freidson argued that health services were organized around the dominance of a single profession—physicians—with paramedical workers subordinated not only by a "body of special knowledge and skill" but also by bureaucratic (legal) authority.[89] This legal protection, he argued, was offered to the medical profession in exchange for providing high-quality and esoteric professional services that no one else could offer.

At around the same time, in the 1970s and 1980s, sociologists within the broader discipline were concerned with how to define a profession and how to make sense of professional divisions of labor.[90] Their writings usually looked at how various professionalization projects were used to uphold jurisdictions and boundaries. Abbott, for example, theorized about professions relationally as systems in which dominant factions ruled over subordinate ones, resulting in "jurisdictional disputes."[91] He argued that to understand these disputes, we must look at the work itself and see how it is being "claimed" as part of a jurisdiction. This framing led, for example, to analyses of how psychiatrists—overwhelmed with demands for mental health care—eventually deskilled psychotherapy, yielding its "jurisdiction" to social workers and psychologists.

These studies, however, were rather narrowly focused on how professionals maintained their dominance over intruders—be they governments or other workers. This was partly done for simplicity's sake—i.e., to be able to explain how professions secure power and authority over outsiders.[92] The result, however, was the unintentional obscuring of the medical profession's inner battles for status and power. It also didn't help that most empirical analyses of hospitals and doctors were single-center studies, which only reinforced the impression that the medical profession and medical education were largely uniform.[93]

Only limited work from the 1960s to the early 1980s hinted at stratification within the medical profession. Some scholars distinguished between at least

two "lines of authority" within hospitals—administrative and medical—although little was known about how these lines emerged to begin with or how they managed to coexist.[94] Others noted the existence of status hierarchies across specialties[95] or between "town" and "gown" physicians in community and university hospitals.[96] Freidson and Rhea problematized the notion of professions as "companies of equals" by showing that rules, hierarchy, and supervision existed within a clinic to keep fellow physicians (putative equals) in line.[97] For their part, Bucher and Strauss advocated a "process" approach to professions, emphasizing conflicting interests and change. This marked a significant departure from functionalist perspectives, where internal distinctions were considered to be deviations from professional cohesion or to be merely temporary. Bucher and Strauss understood the medical profession to be divided into smaller "segments" that could come into conflict with each other over areas such as the profession's mission, work activities, methodology, and clients. They believed that segments could form across and within specialties, reflecting specific interests, beliefs, and identities, and that each segment had its own missions, organizational forms, and tactics for exerting power, which could create (status) divisions within the profession.[98] Their "process" approach to professions, however, remained marginalized, and sociologists' broader assumption of professional homogeneity persisted until the 1980s.

Professional Decline

As pressure from the state, corporations, and patients began undermining the golden age of doctoring,[99] sociologists became increasingly interested in how professions responded to instability coming from both outside *and* within.[100] The advent of state-sponsored and private insurance meant that corporate and governmental actors came to play an ever-growing role in the dispensation of health care.[101] Sociologists finally began to take notice of "ferment at the core and tensions at the periphery" of medicine as internal fragmentation along specialty lines increased.[102] The community of equals model was no longer tenable.

The eighties saw a flurry of research grappling with the declining status of physicians in society, which threatened the professional dominance perspective. Several competing theories emerged, accompanied by fierce debate. Freidson, the primary proponent of *professional dominance*, maintained that as long as doctors held sole control over their gatekeeping functions (such as deciding

who could become a doctor and who should be admitted to a hospital), they would continue to exert dominance over paramedical professionals and patients—despite incursions from nonmedical sources.[103] In response, scholars criticized Freidson for being out of touch with the massive macrosocietal changes happening in the health care system and instead proposed their own theories of professional decline.

One of the more serious challenges to Freidson's professional dominance theory came from the *proletarianization* thesis. Proponents heavily criticized Freidson's contention that the medical profession was impervious to the considerable socioeconomic changes happening around it. These scholars contended that increasing bureaucratization (especially the shift from self-employment to hospital employment) was creating a proletarianized profession, with formerly self-employed practitioners becoming constrained by bureaucratic controls within hospitals.[104] They predicted that, as medical practice became increasingly bureaucratized and specialized, physicians would become mere salaried employees, lose control over the terms and conditions of their professional work, and thereby become proletarianized.

In turn, Freidson strongly criticized proletarianization theorists for overstating physicians' loss of independence.[105] He rejected the notion that simply by joining a bureaucratic organization like a hospital, "[doctors] become mere cogs in a machine of production."[106] He pointed to other professionals, like engineers and professors, who have long worked in bureaucratic organizations without having their knowledge and skill "expropriated" by nonprofessional superiors,[107] and he noted that even with increased government and organizational control, physicians look nothing like typical alienated blue- or white-collar workers.[108]

While there is no doubt that some aspects of proletarianization have materialized (for example, Medicare, rather than physicians, largely dictates reimbursement rates for specific diagnostic codes), for the most part Freidson remains correct that doctors continue to control the processes of entry and the content of their professional work, suggesting that the professional decline forecast by so many sociologists in the 1980s has not come to pass.[109]

A Formal Elite and a Rank and File

The countertheories to professional dominance eventually led Freidson to modify his own theory to account for the persistence of medical dominance

in spite of growing regulation within medicine. In the twenty years since the end of the golden era, capitation payments emerged, governments began to assume responsibility for the health care costs of the poor and the elderly, private insurance carriers proliferated, and doctors suddenly had to become cost-conscious when making treatment decisions. At the same time, lawyers, judges, and bioethicists were increasingly interfering in medical decision-making as physicians saw their decisions being preemptively questioned in the courts for the first time.[110] Freidson was forced to recognize that these changes posed a considerable threat to medicine's ability to regulate its own affairs, but he also maintained that physicians remained dominant over those affairs—a seemingly paradoxical assertion.

To reconcile these points of view, Freidson proposed a new theory. He argued that the medical profession has had to restructure itself internally, creating a formal elite and a rank and file in order to maintain its dominance in the face of these incursions.[111] This internal reshuffling made it possible for the medical profession to maintain its critical credentialing, gatekeeping, and technical decision-making power in light of external incursions into medicine's core by appointing elites to manage these essential tasks.

Freidson never gave his new theory a name, leaving his contemporaries to generate their own, including *professional subordination*,[112] *reprofessionalization*, *reorganization*,[113] and the more commonly used term *restratification*.[114] Freidson contended that restratification within the profession resulted in three broad categories of physicians: a knowledge elite that creates guidelines, an administrative elite that enforces them, and a rank and file that follows them.[115] He emphasized that these elites were themselves professionals (not outside managers, as predicted by proletarianization theorists) who shared similar basic professional training with the rank and file but who pursued specialized postgraduate training and career trajectories that led them to elite positions where they governed legitimately over the rank and file. Freidson emphasized that the elite and the rank and file were distinguished not merely by a subtle difference in prestige but also by a formal distinction—like that between manager and employee—established through *separate* specialized training for clinician-scientists and physician-managers.[116] Therefore, the profession vested elite practitioners with the bureaucratic authority necessary to establish the standards of medical work, which the rank and file then had to follow.

Freidson, however, also viewed such formal restratification as a potential source of instability within the profession. He predicted that the rank and

file might abandon elite professionals due to a lack of shared interests.[117] A decade later Hafferty and Light echoed similar concerns.[118] In this way, restratification theory presents a paradox: on the one hand, these elites are deemed necessary for maintaining professional autonomy, but on the other, the distinction between professional worker and professional leader could potentially lead to a "deep split," or infighting and instability within the profession.[119]

STATUS SEPARATION: A THEORY OF THE INFORMAL ELITE AND THE RANK AND FILE

Formal restratification does not account for the patterns we see today. Yes, the medical profession is experiencing fragmentation due to the rise of the "medical-industrial complex," including the continued gender typing of certain specialties, for example. Still, these formal *vertical* divisions, like those between specialists and generalists, cannot explain the informal *horizontal* status distinctions we find among USMD and non-USMD trainees.[120]

In fact, these informal horizontal patterns more closely resemble the processes of gender inequality in medicine that were documented in the 1980s but were never incorporated into Freidson's contemporaneous theory of formal restratification. In her 1984 book *Women Physicians*, Lorber observed that growing numbers of female physicians were entering medical school with qualifications that were the same as, if not better than, those of their male colleagues and were performing just as well on licensing exams but were often excluded from leadership positions in the upper echelons of the profession.[121] She noted a similar absence of formal discriminatory policies against women and instead urged scholars to look more carefully at the *informal* organization of the profession. She concluded that there was strong evidence of informal sponsorship and patronage structures built into medical education that privileged male physicians, giving them higher status in the profession.

In the nearly four decades since Lorber's work, however, few scholars have continued examining such informal stratifying processes within the profession. Indeed, by focusing so intently on professional autonomy, medical sociologists have tended to overemphasize knowledge-based or role-based divisions of labor rather than more informal status-based distinctions among supposed equals, which are often not the product of established official pathways.[122] The former deal with formal vertical authority over subordinates, while the latter refer to

prestige differentials between individuals studying in the same field: horizontal stratification in medical education.[123] Hierarchies in status, defined as collective understandings of social worth or prestige, such as those between USMDs and non-USMDs, remain highly informal, as do the processes for climbing the ranks. In fact, as I will argue, it is precisely this informality and the accompanying belief that anyone can become part of the elite with enough work and dedication that allow such status distinctions to persist.

Furthermore, the "deep split," or instability, that Freidson feared has not come to pass. He and his contemporaries viewed the rise of administrative and knowledge elites as evidence of the increasing rationalization of medicine, which inevitably meant the rank and file would be at odds with elites who increasingly identified with corporate interests. However, these dreaded rifts have not materialized, not even between the formal elite, like physician-executives, and the doctors they manage.[124] Nor have deep tensions emerged between the informal elite and the rank and file, which is especially puzzling. That non-USMDs are willing to take on lower-status positions is evidence that physicians have come to some sort of agreement about how an informal USMD elite can emerge among supposed equals in the absence of formal authority supporting this. This leaves us with two broad questions: How do pedigree-based status distinctions emerge among internal medicine residents, and how are they understood, maintained, and reproduced?

This book picks up where sociologists of the medical profession left off in the 1980s by examining the emergence of informal status differences among USMD and non-USMD internal medicine residents in a process I term *status separation*. Weber coined the term *status order* to describe the distribution of social honor within a community,[125] but little is known about how pedigree determines this distribution in medicine. While prestige differentials between USMDs and non-USMDs may seem obvious, sociologists have yet to theorize about the construction of informal horizontal status distinctions between these different graduates, perhaps because so little has been written in sociology about non-USMDs in the US workforce.[126]

I therefore propose the term *status separation* to describe the informal process by which residents get stratified by pedigree in internal medicine. In chemistry, separation refers to the process of reducing a mixture to its component parts, either through the application of external forces such as centrifuge or via natural processes like gravity (as with oil and water). In this book, I tease out the *social*

forces that push USMDs to the top while pushing non-USMDs to the bottom, thereby separating them in status, according to pedigree, within a seemingly homogenous profession. The colloquialism "the cream of the crop" is often used to describe the best of a group, and meritocracy is often assumed to be the process that separates out the elite. I complicate that assumption by showing how informal social forces, such as (1) broader class inequality; (2) sponsorship; (3) status beliefs, bias, and stigma; (4) structural inequality among training programs; and (5) eventual differences in merit resulting from these inequalities, contribute to status separation in medicine.

In so doing, this book engages in a broader conversation with an emerging body of ethnographic work outside of medical sociology that sheds light on the making of elites by similarly showing how structural advantages (often misidentified as merit) can help ensure elite reproduction. Khan's ethnography of St. Paul's, a prestigious boarding school in New Hampshire, explores how an elite education helps groom future generations of elites by instilling in students an "ease of privilege," leading them to assume that their success is a function of what they have accomplished rather than who they are.[127] He argues that this myth is distinctive of a new class of elites who justify their position using meritocracy rather than traditional methods, such as blood or birth order. Similarly, Rivera's ethnography of recruitment in elite professional service firms uncovers analogous processes of structural inequality somewhat later in the elite life course by examining why students from the most elite universities tend to get the most prestigious jobs after graduation when emphasis on equal opportunity in the workplace is at an all-time high.[128]

These books offer rare insights into the social construction of privilege, power, and prestige, but they only detail half of the process—the *elite* half—and thus overlook how an informal professional rank and file simultaneously emerges. By exploring how *both* halves of this process work, we can learn not only how elites rise to the top but also how nonelites are pushed toward the bottom and how they may be unintentionally facilitating the process. As elite professions become increasingly stratified, with the proliferation of temporary lawyers, for example, or the growth of contingent faculty in academia, understanding how status separation mediated through professional education can create an underclass of professionals is of timely importance.[129]

Undercurrents of status separation are found in other social processes of stratification, including biases based on class, gender, minority status, and

immigrant status, but none of these classic axes of inequality is sufficient to fully explain the current situation in medicine, where USIMGs, IMGs, and DOs are being subjugated in status to USMDs. Status separation also brings together both structure and agency. For structure, it brings to light the combination of hidden informal mechanisms (such as professional stigma and stereotyping) and more open formal mechanisms (such as institutional policies) that regulate status differences among these actors. For agency, it sheds light on the ways that participants in this field navigate unequal opportunity structures, eventually parlaying structural inequality into individual differences in merit, ability, and achievement. It also involves how they make sense of their status differentiation. Indeed, because so much of status separation is invisible and informal, participants cannot easily identify the underlying operant structures, and, thus, they rely on explanations that tend to focus more on individual shortcomings than on structural considerations. Even for those who merge individual responsibility with a recognition of structural constraints, I will show that there is still a provision of consent, in which participants still buy into the profession and its ways of creating status distinctions.

STUDYING STATUS SEPARATION

This book reveals that segregation and inequality exist between USMDs and non-USMDs, but its primary focus is to examine *how* that inequality gets produced and perceived within the profession. These "process" and "implication" questions require a research method that is well suited to understanding the intricacies and inconsistencies of individuals' beliefs, actions, and decisions as they navigate, produce, and resist broader social structures. Comparative ethnography is ideal for examining these processes because the construction and consequences of status are multiply sited. As I have argued, to examine just one hospital would be to overlook half of this puzzle and potentially obscure broader social structural forces that extend beyond the confines of a single institution.

To this end, this book extends the sociological tradition of hospital ethnography, which was so dominant from the 1960s to 1990s,[130] to compare the internal medicine residency programs in two hospitals in the Northeast: Legacy Community Hospital (a small, DO- and IMG-friendly program) and Stonewood University Hospital (a large, elite program). I use pseudonyms to refer to these

two institutions in the book and will often refer to them as Legacy and Stonewood for short. Internal medicine is the ideal residency for this study because it is composed of nearly equal numbers of USMDs and non-USMDs and offers graduates the opportunity to either remain generalists after residency or subspecialize in one of nearly a dozen medical specialties.[131] I can therefore gauge the extent to which status inequalities during residency can impact physicians' broader professional trajectories. It is also a residency with roughly equal numbers of men and women, making gender inequality somewhat less of an obvious determinant of social status than in other highly masculinized fields, such as surgery.[132]

I rely on a mix of qualitative methods, including participant observation, in-depth interviews, focus groups, and content analysis to capture the informal social processes leading to segregation among residents from 2011 to 2014 (for more detailed reflections on the methods, see the appendix).

SETTINGS

I chose Legacy and Stonewood as field sites because of their status as a community and a university hospital, respectively, as well as the composition of their internal medicine *housestaff* (a collective term for residents).[133] They are good examples of the broader national trend of segregation in graduate medical education described at the beginning of this introduction.

As table I.1 shows, the internal medicine residency program at Stonewood University Hospital was three times the size of the program at Legacy, and its three-year (categorical) and primary care track programs were almost exclusively staffed (98 percent) by USMDs.[134] Legacy Community Hospital's internal medicine residency program, in contrast, had only a small proportion (less than 10 percent) of USMDs, all of whom were "prelims," or interns enrolled in a one-year preliminary program in internal medicine before going on to residencies in specialties like radiology and dermatology. The other 90 percent of Legacy residents were non-USMDs enrolled in the full three-year (categorical) internal medicine program. About 45 percent of Legacy residents were USIMGs, and another 10 percent of its residents were American DOs. Altogether, with the preliminary USMDs, US citizens made up about 65 percent of the housestaff at Legacy. The other 35 percent were IMGs, some of whom had been fully trained as physicians in their home countries prior to moving to the United States.

TABLE I.1 Hospital Characteristics: Internal Medicine Residency Programs

	Legacy Community Hospital	Stonewood University Hospital
Program type	IMG- and DO-friendly	Elite academic
Hospital type	For-profit	Not-for-profit
Number of beds[a]	*x*	4.5*x*
Patient population	Elderly, Medicare/Medicaid	All ages; safety-net hospital
Attending physician structure	Community-based attendings	Hospital-based attendings
Percentage of non-USMD attendings	55	<5
Number of residents[a]	*y*	3*y*
Percentage of USMDs[b]	10[c]	98
Percentage of non-USMDs		
USIMGs[b]	45	0
DOs[b]	10	0
IMGs	35	2
Percentage of male residents	66	60
Percentage of nonwhite residents	50	25

[a] To protect the hospitals' identity, I do not disclose the actual number of beds or the size of the housestaff.
[b] US citizens.
[c] All were preliminary (one-year) interns.

Aside from the housestaff, there were other important differences between these two programs. Legacy was a small community hospital catering to a mostly elderly clientele who lived in the surrounding area—a lower-middle-class neighborhood with a high proportion of European immigrants. Patients were generally insured (mostly through Medicare), and many came to the hospital from nursing homes and assisted living facilities. This meant that Legacy dealt primarily with bread-and-butter medicine: congestive heart failure, pneumonia, and chronic obstructive pulmonary disease. Complex cases were few and far between: "There's all sorts of stuff . . . that we can't give our residents experience with here," conceded one Legacy program official. That included exposure to surgical subspecialties such as trauma, OB-GYN, and neurosurgery, as well as some medical subspecialties like interventional cardiology, which is used to treat certain kinds

of heart attacks.[135] Patients requiring these types of services were transferred to other hospitals like Stonewood.

As a hospital, Legacy looked and smelled just *ordinary*. A faint odor of sickness hung in the air, usually alongside an unpleasant combination of runny eggs and bodily odors, only mildly diluted by antiseptics. Legacy consisted of a single building with several wings that spanned four floors and were connected by long corridors. The average patient census was generally low, such that it was not uncommon for entire wards of the hospital to be closed off, sometimes for months at a time, as they waited to be filled with people. The general medical wards consisted of several brightly painted hallways of two- to three-person rooms, each with a shared bathroom and beds divided by standard-issue curtains. Private rooms were reserved not for VIPs but for patients needing isolation from infection.

Legacy did not have many of the resources of larger medical centers. Basic infrastructure, such as an in-person translation service for non-English-speaking patients and reliable computer hardware, was lacking.[136] Of the four computers in the residents' lounge, only two reliably had access to the hospital's electronic order entry system. (Legacy did not have a full-fledged electronic health record at the time of my fieldwork, which meant that residents could order labs and medications on the computer but charting was done using old-fashioned pen and paper.) Other computers lacked essential software, like Microsoft Word. As one resident complained angrily one day, without exaggeration, "There's like a 30 percent probability that the computer you choose will work for whatever you need!" The machines bore stickers that read "Donated by [local] University," which hinted at some of the hospital's financial difficulties. Toward the end of my fieldwork, Legacy was acquired by a holdings company, changing its not-for-profit status. When Legacy became a for-profit institution, its trainees lost their eligibility for loan forgiveness from the federal government, but none of them left the program.[137]

Legacy was not always this resource deprived, however. Historically, Legacy was affiliated with Stonewood University (SWU) Medical School, a middle-tier medical school, as was Stonewood University Hospital, and it had a thriving training program that shared resources with the university hospital. Then, around the mid-1990s, Stonewood University Hospital was designated as the primary teaching affiliate for SWU, and there was pressure to abandon Legacy as a satellite hospital. This left Legacy scrambling to find another medical school.

Carter Medical College (located in another state) fit the bill, as it was roughly equally ranked to the SWU Medical School and it offered a degree of prestige to the small community hospital. The relationship between Legacy and Carter Medical College, however, was highly pro forma. Despite wearing badges with the Carter Medical College logo, the Legacy housestaff had virtually no contact with the medical school. Rarely did Carter Medical College physicians come to Legacy for talks or visits. The residents could not easily rotate at the medical school's other affiliated hospitals, and they did not have access to the university's library resources. For most intents and purposes, Legacy was a teaching hospital untethered to a medical school.

The result was an internal medicine residency program that was characterized by a loose structure that prioritized a "humane" residency experience. The low patient census and a relaxed call schedule (Q7, or every seven days) meant that almost everyone described Legacy's program as "laid-back."[138] Even the program leadership was relatively hands-off. This was partly due to the tenure of an interim program leader who agreed to take the job only temporarily after their predecessor was asked to leave due to financial troubles. A permanent replacement was only found four years after the interim program leader had accepted the interim position. "I agreed to do it on an interim basis for one year. And now we're three years later and I'm still doing it," the program leader told me with a shrug one afternoon. Also, the broader program leadership did not work for the program full-time—they had clinical duties of their own, spending three to five half-days per week in private practice. Running the residency program was something they did on a part-time basis.

Stonewood University Hospital, in contrast, was the quintessential academic medical center. It was a massively complex institution, housed on a sprawling urban campus with dozens of buildings. It was so big that when the telltale code bells went off signaling an emergency, the housestaff could sprint for up to ten minutes before reaching the patient's bedside, depending on the location of the emergency. Compared to Legacy, Stonewood's buildings strived to be *extraordinary*, often resembling hotels more than hospitals. Grand lobbies with tasteful art displays awaited patients and visitors, and patients were each assigned private rooms on the teaching floors. Flat-screen televisions dotted the walls, and on the back of the hospital menus distributed to patients before each meal was a list of Stonewood's accomplishments, like being the first hospital to acquire some new scanner. Somehow Stonewood

did not even smell like a hospital, even though its patients were often sicker than those at Legacy were.

Stonewood was a safety-net hospital, making it the primary regional caretaker for refugees, the uninsured, and other medically vulnerable populations.[139] Compared to the patients at Legacy, those admitted to Stonewood usually had more complex medical problems requiring coordinated care between medicine and other subspecialties such as neurology and orthopedics. Stonewood's array of offerings included a transplant service, extracorporeal membrane oxygenation, interventional cardiology, and experimental medicine. This made Stonewood a hub for complicated patients transferred from nearby hospitals. Cases were often so complex that residents would frequently recite the mantra "common things being common" to remind themselves to look for proverbial horses, not zebras, when they heard "hoofbeats."[140] Adding to the complexity were the patients' social situations. Patients admitted to the wards came from all walks of life, such that on the same floor one could find a homeless person, a former university president, and a convict awaiting sentencing.

Unlike Legacy, which still relied on paper charts, Stonewood had a full electronic health record available on reliable computers located in every patient room, as well as in common work areas. A laundry service was available to the housestaff, whereas at Legacy a resident whose parents owned a dry-cleaning business would sometimes offer to clean his colleagues' white coats. Even residents' lunches were paid for by Stonewood's Graduate Medical Education Department, which refused corporate sponsorship. In contrast, Legacy relied on lunches purchased by pharmaceutical representatives to make good on its promise of free meals for the housestaff.

Stonewood also had a very stable and dedicated leadership team that maintained order centrally. The five members of the program directorship worked exclusively on running the program, with only a minority still dabbling in very small private practices. They spent two to three months per year working on the wards to maintain a clinician-educator relationship with their residents. As one program official explained, "As much as I complain about having too much on my plate, I *have* to be on the wards, I *have* to be on the consult service . . . [because it] it enables me to understand the challenges that the residents go through" (emphasis in original). They were also actively involved in didactic conferences and one-on-one mentorship with the housestaff. This meant that in comparison to Legacy's program, Stonewood's was both more tightly structured

and more intense, with more complex cases and a more demanding call schedule (Q4, or every four days). Unlike Legacy residents, who trained almost exclusively at Legacy Community Hospital, Stonewood residents also rotated at other clinical sites—including community hospitals—as part of their curriculum, but the central leadership headquartered at Stonewood directly oversaw the training at these sites.

Despite the obvious differences between these two hospitals, they still had several important things in common. First, their training programs had a clear clinical focus. Unlike more research-intensive programs, like that at Stanford, which aim to produce clinician-scientists, the programs at both Legacy and Stonewood were in the business of training clinicians. That makes the differences in training approaches between the two programs all the more stark, given that residents in both places were primarily being trained as knowledge *consumers* rather than knowledge *producers.* Also, because both Stonewood and Legacy were affiliated with middle-tier medical schools, they represented neither the very top nor the very bottom of residency programs—in fact, one-fourth of internal medicine residency programs in the country are not even affiliated with a university.[141] They were far more average than that, perhaps making them more comparable than if they were ultraelite or bottom-of-the-barrel programs. As a result, both programs were eminently concerned about their institutional status, with neither one being so entrenched in its status as elite versus nonelite that it was unconcerned by external perceptions.[142] Finally, recall this nationwide comparison: USMDs make up 90 percent or more of the housestaff at over 37 percent of all internal medicine university programs and less than 10 percent of the housestaff at over 51 percent of all internal medicine community programs. Legacy and Stonewood are therefore examples of this much broader phenomenon of segregation in residency training between community and university hospitals nationwide.

PLAN OF THE BOOK

The chapters that follow take the reader through the construction and consequences of professional status distinctions at these two hospitals before, during, and after residency. In chapter 1, I explore how trajectories into residency differed between USMDs and non-USMDs and finds that distinctions among physicians

often had their roots in early life. I show how broader social structures sorted individuals into different training pathways by impacting how well they could "play the game" of getting into medical school, which, in turn, determined their opportunity structure within the profession as a whole. I also show that USMDs received far more professional support once they entered medical school, thanks to the "social contract"—an unspoken agreement that the profession would sponsor USMDs through their training toward elite careers.

In chapter 2, I scrutinize the residency recruitment process from the program directors' perspective. I find that segregation in graduate medical education is the result of complex decision-making processes that are deeply imbued with notions of merit, when, in reality, The Match was not an open competition. By contextualizing recruitment practices at these two hospitals within the broader field of residency programs, it becomes apparent that recruitment decisions—and their segregated outcomes—were at least partly shaped by the programs' social positions within that field and by their desire to maximize prestige while minimizing risk.

In the next two chapters, I investigate the impact of segregation on the residents' training. In chapter 3, I examine how approaches to medical education differed between the two hospitals. I find that Legacy's hands-off approach meant that residents were primarily viewed as *laborers* who were expected to get the job done first and then to attend to learning in their considerable spare time. In contrast, the supervisory structure at Stonewood meant that residents were first and foremost considered *trainees* who only secondarily worked for the hospital. I conclude that these differences in education had important implications for both the residents' training and patient care. In chapter 4, I examine how differences in professional development between the two programs can help explain why status hierarchies between USMDs and non-USMDs persist after residency. At Legacy, much of the residents' professional development was contingent upon them forging their own paths rather than upon the program structuring opportunities for them. I argue that this hands-off approach produced residents who were self-starters in some respects but more complacent in others, sometimes leading them to act unprofessionally. In contrast, professional development at Stonewood was an integral part of their approach to residents as trainees (the social contract in action). Thanks to its relative abundance of resources, Stonewood prioritized its residents' success, thereby producing residents who were more motivated but also more smug. In this way, I show that

structural inequalities in residency training not only created differences in learning opportunities (chapter 3) but also led to different kinds of professionalism. These differences contributed, in turn, to very different postresidency outcomes.

In chapter 5, I trace how USMDs secured choice positions after graduating from residency, thanks to longtime supportive structures that helped make them stronger residents. For their part, non-USMDs were typically excluded from those same positions, both because of differences in merit resulting from the structural inequalities in training and because of stigma and bias associated with their pedigree.

Finally, in chapter 6, I explore how residents made sense of status hierarchies between USMDs and non-USMDs. After examining the belief system underlying status separation within internal medicine, I find that USMDs believed they were more deserving of better opportunities and that non-USMDs often agreed with them—despite clear structural inequalities. Non-USMDS ended up consenting to lower-status positions not only because they feared being replaced by a reserve army of other qualified doctors but also because many believed they *deserved* lower-ranking positions in the profession.

I conclude by summarizing the findings from the previous chapters and offering possible future directions for research. I argue that USMDs rely on non-USMDs to fill less desirable positions within the profession, but in the absence of clear policies directing non-USMDs toward underserved populations and undesirable positions, the profession relies on—and reinforces—*informal* status hierarchies. I theorize about the process of status separation, which helps the US medical profession make good on its promises to USMDs, who have come to expect a certain return on their investment in a medical career. I further find that the absence of formal policies prioritizing USMDs helps secure consent among non-USMDs to fill lower-status positions because it allows for the persistence of American Dream–like beliefs in agency, such that with enough work and dedication, anything is possible. I finally conclude with implications for the medical profession and beyond.