

Health Case Study

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Paving the Way for a Future in Family Medicine: New Residency Program Aligns with Strategic Vision and Generates Enthusiastic Response

Case Study of John Muir Health

Background

John Muir Health (JMH), located in Contra Costa County, California, was established by the 1997 merger of John Muir Medical Center and Mount Diablo Medical Center. It is a nonprofit hospital network consisting of the two largest medical centers and a behavioral health center in Contra Costa County, though its service area also includes parts of Solano County. The John Muir Physicians Network is one of the largest in Northern California, owning and operating additional primary care, outpatient specialty care, and urgent care locations throughout Contra Costa County. Physicians in the network belong to John Muir Medical Group or to Muir Medical Group IPA. John Muir Medical Center, Walnut Creek, is a 554-bed acute care hospital and the county's only designated trauma center. It currently hosts pharmacy, chaplaincy, and nursing residency programs, and it was an affiliate of a U.S. Veterans Affairs Graduate Medical Education program that ended in the early 1990s. John Muir Medical Center, Concord, is a 244-bed acute care hospital. The JMH Behavioral Health Center is a 73-bed psychiatric hospital offering inpatient and outpatient services. In July 2017, JMH opened a family medicine residency program accredited by the Accreditation Council of Graduate Medical Education. The program, primarily based out of John Muir Medical Center, Concord, consists of eight residents per year, and it graduated its first class in 2020. Though the Centers for Medicare & Medicaid Services cap will not be set for JMH until 2022, the number of current residents is 24.

Contra Costa County is located in the northeast region of the San Francisco Bay Area and is primarily suburban, with more than 1 million residents. In all, 65 percent of residents are White, with 25 percent being of Hispanic or Latino ancestry; 10 percent are African American; and 18 percent are Asian. Roughly 8 percent of the population lives in poverty. The unemployment rate is about 3 percent, and education and health services are the largest industries.

Program start-up

In 2011, there was a change in the governance of JMH that included hiring a new CEO and electing six new doctors to the John Muir Physicians Network Board of Directors, three of whom were family medicine physicians. Although the founder and president of the John Muir Medical Group had wanted to start a GME program at JMH for many years, many of the other principal leadership team (including the then JMH CEO) had different priorities. The incoming CEO, however, came from a large community health system that had successfully implemented several residency programs and was interested in starting one at JMH. The JMH chief medical officer also had teaching experience and interest. With the addition of the new John Muir Physicians Network Board members, who also had interest and teaching experience, starting a new residency program became feasible.

The new leadership assessed the long-term strategic priorities of JMH, including finding ways to

provide more cost-effective care, expand service to the Medi-Cal population, and help to alleviate the substantial physician shortages in the region. In the late 1990s, JMH had dropped its Medi-Cal contract, but, with the passage of the Affordable Care Act, working in the Medi-Cal market became a necessity for the long-term strategy of the health system. JMH leaders realized that creating a residency program would enable them to serve Medi-Cal patients in a more cost-effective way and also help expand primary care access and potentially reduce downstream costs, such as emergency department visits and hospital readmissions. A needs assessment showed a deficit of 175 primary care physicians in JMH's region. For the long term, it was in the strategic interest of the health system to create its own pipeline with quality doctors who already knew the system. Furthermore, this strategy would help mitigate continually rising recruitment costs, which currently total more than \$100,000 per physician.

With this in mind, JMH's leadership decided to invest in the future and in primary care. The leaders knew that it was an investment and not a money-making proposition, and they saw that they could innovate care in the community with a forward-thinking, ambulatory-based residency program. They decided on family medicine because

“We had a discussion around ‘is this the time to really demonstrate a commitment to primary care and the work that primary care doctors do?’ Health systems are notorious for investing in cardiovascular institutes and surgical institutes and all the things that we do. They are all important, but if we live up to our word, and we believe that primary care is the future of health care and the future of medicine, then what about primary care? And why can’t we have a primary care institute? Why can’t we make investments in primary care that elevate the presence and the importance of that service line?”

—John Muir Executive

most internal medicine graduates become hospitalists or subspecialists, and JMH wanted to increase the number of office-based primary care physicians. JMH also wanted to create an environment that primary care doctors are proud to be a part of—that is, one that expands the scope of family medicine in ambulatory care settings and promotes social justice and health equity.

Creating a governance structure

JMH's leaders spent time looking at strategy and governance and then conducted an economic analysis and developed a business plan, much like any other start-up, beginning four years before the program launched. They determined in what areas they already had expertise and either acquired or hired people with the expertise they lacked. There were a lot of decisions that had to be made right away, from organizational structure to facilities planning to labor, all of which have their own complexities given state, federal, and Accreditation Council of Graduate Medical Education regulations. They developed a proposal and then a pro forma in house, which was then approved by the executive team and taken to the JMH Board of Directors for approval. The pro forma allowed for understanding of all the financial pieces, including what the government would subsidize and what expenses would be incurred. From this, they created a consolidated budget to show how all the dollars would be spent. With the recommendation of the board's finance committee, JMH accepted the proposal as part of its long-term strategic plan. The leaders then went to the JMH Foundation to begin marketing and fundraising.

After the board approved, JMH created an executive position, the executive director for GME, whose sole focus was to get the program up and running. JMH hired a consultant from a family medicine residency in Oregon to help find the balance between profitability and health equity and to figure out how to get the right mix of patients for the residents. The group formed a separate GME Board consisting of all of the operational and financial stakeholders so that consensus could be reached in one place, and they reached out to similar health systems in other states to better understand operations, success

factors, and lessons learned. And, in perhaps their most important accomplishment, they hired an experienced program director who aligned with their vision for the residency program.

Developing the faculty

After hiring the program director, JMH began designing the actual program and developing the faculty. It wanted to design a program that was different yet complementary to the existing public hospital residency. It also figured out how to differentiate itself among family medicine residency programs, which is important for resident recruitment. JMH wanted an outpatient-focused residency with an integrated behavioral health component as part of the treatment plan. It developed an affiliation with the University of California, San Francisco, which provided faculty, faculty training, and additional consulting on curriculum design. Curriculum design was based on Thomas Bodenheimer's 10 Building Blocks of High-Performing Primary Care. JMH also set up a brand new clinic two years beforehand to ensure the residents had an adequate number and variety of patients to learn from.

Meanwhile, the JMH CEO and the new director of GME, as well as other advocates, spent time networking and communicating with different specialists to generate support. They didn't just want passive agreement—they actively sought participation in the process. They engaged opponents in the planning process to ensure their criticisms were addressed. They tailored their approach to their audience, repeating several messages: the residency would not be a threat to jobs, the residency would feed into specialty practices, the residency would give a home to Medi-Cal patients, and JMH would not become an academic medical center and would remain a community hospital focused on patient care.

JMH decided to invest in the initial faculty and faculty development to ensure a quality program upfront. Before the program started, it held faculty development sessions to go over how to work with residents, learning different personality styles, and effective communication. The program director hired

an associate program director and two assistant program directors to form a leadership team within the residency. At least one of the assistant program directors attended a national workshop to acquire additional training. The program director also brought in a consultant to help clarify financial and accreditation issues during the start-up. These issues included recognizing the standards JMH would be held to, clearly identifying what challenges still existed, and holding mock accreditation site visits.

Developing a financial plan

Accounting for any residency program is complicated, and this one was no exception. Because of this, though JMH was able to do most of the financials and planning on its own, it consulted with the accounting firm Moss Adams to ensure everything was legal and to maximize reimbursement. Three JMH entities are involved in the accounting: the Concord and Walnut Creek medical centers as well as the clinic, which resides in the physician network. JMH had to decide at which hospital it should base the residency for the purposes of the Centers for Medicare & Medicaid Services cost report. One issue that came up after JMH had begun preparing for the residency was that no one remembered that there had been residents at the Walnut Creek facility, potentially triggering their Medicare cap. JMH had to scramble with affiliation agreements and reporting to ensure it didn't lose any Centers for Medicare & Medicaid Services funding. Ultimately, it chose to host the residency at the Concord facility because of a more favorable payer mix. Though the residents rotate through all of the facilities, JMH can reclassify most of the expenses to Concord. The biggest major board decision in the early period was deciding that the hospital would transfer funds to the physician network so that John Muir Physicians Network wouldn't carry all of the losses. Doing so stabilized the program and allowed for clarity on faculty costs, productivity, and all the other things that had to be done.

After deciding how to set up and account for the program, JMH had a better idea of how program financials looked on paper. It used community benefit dollars to offset many of the expenses associated with

caring for the underserved, including Medi-Cal shortfalls and facilities expenses. It also took advantage of grants, such as from the state Song-Brown program, to help with start-up costs and claimed that being a start-up allowed for more grant opportunities. JMH has been selective about which grants to accept, however, as some require more work and, it believes, aren't worth the challenges of administration. As the program has reached its full complement of residents, JMH has been able to apply some economies of scale and hopes that after five years of operation, the residency will become a neutral investment.

One area in which JMH was very effective was in using its foundation to secure philanthropic funding. It solicited donations for the residency program as it would for any other major initiative, such as a new cancer center. It showed how the residency would help with the underserved community through its vulnerable population curriculum, specifically targeting the message to local donors and foundations. Almost all of JMH's fundraising came from regional philanthropic donors, and it was able to raise \$5 million in regional philanthropic funding.

Commitment to ongoing improvement

Since launching its residency program, JMH has continued to evaluate and make improvements through a collaborative process that engages faculty and residents. For example, through a process called the Annual Program Evaluation, residents and faculty identify three areas for improvement. Then the faculty, staff, and residents identify high-priority areas and work collaboratively to make the improvements. Respondents reflected that the department has been quick to make changes to the curriculum and other areas needing improvement. According to executives and staff, the collaborative continuous improvement process gives residents a sense of ownership of their program because they helped create it. There is continual education and communication with physicians, faculty, nurses, and other hospital staff. The family medicine residents can attend JMH's interprofessional conferences, which provide the opportunity to connect with residents in other teaching programs at JMH.

“I think it's also nice to feel like you're a part of something that's constantly changing, that you're creating something, and that your feedback is going into the improvement of various aspects of the residency.”

—Family Medicine Resident

A focus on family medicine

JMH has maintained a focus on its one family medicine residency program rather than expanding its GME program to include other specialties or additional family medicine programs in other locations. Although the system's Designated Institutional Official supported pursuing additional residencies in other specialties, particularly general surgery and psychiatry, these other specialties lacked support from within the specialty. In other words, they did not have GME champions who were willing to do the hard work of starting a new GME program. Surgeons, for instance, were worried that a new residency would infringe on their time in the operating room. JMH also considered expanding the existing family medicine program or adding an additional one based out of Walnut Creek, but the reimbursement would be smaller, and the program would end up losing more money, taking away resources from other strategic priorities and programs. Being new to running a residency program, JMH was also concerned about overcommitting and sacrificing quality for quantity.

Implementation challenges

JMH identified the most substantial barriers to starting the GME program to be making the case to finance the program, obtaining the buy-in of the physician staff to participate in a residency program, and establishing an OB/GYN rotation for the family medicine residents.

Hospital executives described making the financial case for the health system to invest in a family medicine residency program as the greatest overall challenge to starting the program. In particular, financial analysis showed the residency program

would not be profitable and might never break even over the long run. In fact, even though John Muir received substantial financial support to offset the start-up costs of the program, hospital executives still anticipated million-dollar losses for the first few years of the program. Because of the significant financial investment required, respondents emphasized that other hospitals starting a GME program must consider GME to align with their overall strategic goals and to take into consideration the benefits that come along with training residents, such as the potential to reduce the need to recruit new physicians, the additional primary care capacity, and the boost to the morale and enthusiasm among physician staff who want to teach.

Another major challenge was gaining buy-in of some physicians and getting them on board with the idea of starting a residency program. Although some physicians supported GME, one respondent explained that many other physicians had misconceptions about how a GME program would affect them, including fears that the culture of John Muir would change from being a community hospital to that of an academic medical center with more bureaucracy and less clinical autonomy for individual providers. Physicians in some specialties also expressed concern that the GME program would lead to changes in the payer mix of the hospital and create a large influx of Medi-Cal patients in the system. Finally, some physicians, particularly specialists, were resistant to the idea of having to spend additional time teaching residents and expressed the desire to be compensated at high rates for any time they would be spending teaching.

“These are by and large physicians who went into private practice because they want to see a lot of patients. They want to have their own environment. They don’t like layers of bureaucracy, and I think [when they first heard about a GME program], they just would fill in the dots and say, ‘That’s what GME means. It means you’re an academic medical center.’”

—John Muir Executive

Respondents also emphasized challenges related to developing OB/GYN rotations for the family medicine residents. For example, an underlying challenge is that some OB/GYNs do not feel that family medicine physicians are qualified to deliver babies, and, therefore, they do not want to invest in training family medicine residents. An added layer of complexity is that OB/GYN nurses tend to be heavily involved in OB/GYN care and protective of their patients and therefore inclined to limit the role of residents in delivering babies. In addition to those difficulties, respondents explained that, at times, the volume of babies being delivered can be low at the hospital, which limited residents’ exposure and opportunity to gain hands-on experience in the delivery room.

“One of the biggest challenges has been that OB nurses are so heavily involved in their patients’ care and often see themselves actually as their patients’ primary provider...I think that nurses can feel very protective of the patients.... because of that, [they] want to sometimes limit their resident’s involvement.”

—John Muir Administrator

Program facilitators

Overall, respondents identified three major factors that facilitated the development and success of the GME program: support from executive leadership, the presence of some engaged and enthusiastic physician staff, and the resources and location of JMH, which helped attract strong applicants to the residency program.

Respondents described having supportive, knowledgeable, and experienced leadership as one of the biggest contributors to successful implementation of the GME program. In particular, respondents emphasized that having a strong program director with prior GME experience was critical to gaining buy-in of leadership and physician staff because he brought a lot of credibility to the program; other leaders and physicians trusted his wisdom and experience. Another important component was the

presence of other engaged leaders, including a new chief medical officer—which was especially impactful because John Muir is a small community health system. Having the support of the medical foundation also helped gain buy-in from physicians and raise funds to support the program.

Although some physicians did not support GME at first, respondents generally agreed that the presence of several physician champions—who supported the idea of GME and could bring other physicians on board with it—was critical for gaining enough physician buy-in to move forward and for managing the organizational changes that came along with adding the residency program. Respondents also pointed out that having strong physician champions within the family medicine department was partly why the hospital pursued that specialty; by comparison, other specialties lacked physician champions, and respondents felt this was partially why John Muir did not end up pursuing residency programs in the other specialties.

One serious challenge to starting a new program is the possibility that it won't attract quality applicants, and this was certainly an initial concern at JMH. In the first year, however, it received hundreds of high quality applicants for its first class of eight residents. Respondents noted several reasons for the success in drawing quality applicants. First, the program director was diligent about investing in planning and faculty as well as designing a curriculum around social justice. In addition, several respondents attributed initial success in recruiting residents to John's Muir's strong reputation for clinical quality—including high rankings in U.S. News & World Report—and its affiliation with University of California, San Francisco, another highly ranked institution. Some respondents commented that John Muir's location in the San Francisco Bay Area has been helpful in attracting residents because of the region's favorable weather, cultural offerings, and other quality-of-life factors. Respondents also explained that John Muir had strategically built a new outpatient clinic two years before starting the residency program to give future residents the opportunity to learn from a sufficient number of patients; respondents felt the

clinic was another factor that helped draw strong applicants to the program.

Program benefits

The program is still new, having graduated only one class to date, but JMH has seen many benefits from the residency program so far, many of them non-financial. Through the marketing efforts of the foundation, community support and enthusiasm has increased, which has led to an increase in the reputation of JMH. Several respondents noted increased morale and enthusiasm in the hospitals themselves, as young and excited learners have transferred that energy to others. Teaching has kept the older doctors sharp, raising the knowledge base for everyone. The residency has allowed new service lines to open up, such as the mobile health clinic or the home-based hospitalization program. JMH's leaders believe that they have been successful at instilling a drive toward high quality, providing efficient care in the community, and training the next generation of physicians in the ethos of JMH.

The program is still new, but it has already had financial benefits as well. Though the program continues to operate at a loss, administrators reported that JMH has lost less money than initial projections. Even with the COVID-19 pandemic, the residency has lost progressively less money each year (last year being the first with a full complement of residents). One executive suggested that factoring in offsets to recruitment costs could show a net financial benefit. For example, JMH has already retained 50 percent of the residents from the first graduating class. Another executive indicated that the residency has increased referrals to specialists within the JMH system, which helped boost revenue.

“We have sort of the old guard in a lot of ways here that have been here for a long time like me and are stuck in their ways. And I have just found the residents to be incredibly refreshing from the standpoint of serving their community. I think that that's become really clear.”

—John Muir Executive

Lessons learned

Respondents identified several key lessons from their experience designing the residency program that might offer helpful insight for other hospitals considering launching GME programs.

1. **Identify organizational priorities and design the GME program to fit within those.** One John Muir executive emphasized the importance of understanding the hospital or health system's strategic goals for the future and then creating the residency program with that strategic vision in mind. For example, John Muir elected to create a family medicine residency program because the organization considers investing in primary care to align with their long-term strategy. Another program leader explained that it's important for an organization considering starting a GME program to identify clear goals for the program and to delineate what they hope the program will achieve. Doing so provides a compass for implementing a residency program and helps program leaders measure progress in meaningful ways. Also important is knowing the overall state of the health system and where it faces challenges to ensure that a new residency program can help to alleviate, and not exacerbate, those challenges.
2. **Consider GME a long-term investment.** Some respondents from John Muir explained that to make the financial case for investing in a GME program, it is critical to think beyond the first few years of the program and to consider the costs and benefits over a longer timeline, such as 5 to 10 years. In particular, it is important to measure progress toward program goals over the long term and not to focus too closely on progress made during the first year, when new residency programs are overcoming many different challenges and making the initial (and often largest) financial investments to get the program up and running. Key considerations for understanding the long-term net cost of a residency program include whether the hospital is profitable at Medicare rates and the cost of physician recruitment. Because GME financing can be complicated, one executive suggested assigning someone to work

on the finances from the very beginning to ensure a successful long-term plan.

“If the CFO is worried about the next quarter financials, starting a GME program is not going to interest them that much; this is a long-term play.”

—John Muir Respondent

3. **Invest in strong faculty and program leaders.** Multiple leaders from John Muir described investments in strong program leaders and physician faculty as essential for creating a successful GME program. Hiring leaders with prior experience running GME programs and who understanding what a well-run program should look like is vital. Another critical component is investing in strong faculty members with a passion for teaching and a desire to help build a strong program from the ground up.

“The faculty is your biggest spend; it's your biggest investment. If you go cheap on it, you will have a rotten program and suffer and for a long, long time, and so that was key in that we really had to build a strategy around a rapid upswing in our residency practice, because we built a brand new practice.”

—John Muir Executive

4. **Educate and engage stakeholders about the benefits of GME.** John Muir executives described engaging with many different stakeholders to help them understand the benefits of having a GME program and to dispel misconceptions that it would negatively affect the culture of JMH. Respondents emphasized the need to meet with all involved parties, including each department, the hospital's board of directors, and physician staff as well as the need to explain that GME is compatible with a community hospital environment and would be beneficial to the broader Contra Costa County community. Executives stated that enlisting the aid of the hospital foundation to tell the

story and generate interest led not only to financial contributions but also to a general excitement within the community. The continuous marketing of residency progress and successes has also been important for sustained community support.

5. **Communicate continuously.** Most respondents emphasized the need for clear and constant communications before the program starts but particularly as they launched the program. Several cited the need to develop a system that was easy for people, whether doctors, nurses, residents, or staff, to be able to voice their concerns so that those concerns could be addressed early and not escalate. One executive suggested that a

lot of fear and anxiety can build up as a program is being developed, particularly before the first class begins, so using communication to engender psychological safety is also important.

“I think it’s just like any relationship; it takes work, it takes maintenance, and just because you get over that first sort of critical path element, it doesn’t mean you’re done. You need to go back and make sure to continue to revisit and continue to educate and educate and be consistent.”

—John Muir Executive