


A medical professional, likely an endoscopist, is shown in a clinical setting, possibly an endoscopy suite. The professional is wearing extensive personal protective equipment (PPE): a light blue surgical gown, blue nitrile gloves, a blue surgical mask, and a clear face shield. The professional is holding a long, flexible endoscopic instrument. In the foreground, the back and shoulder of a patient lying on a table are visible. In the background, a monitor displays a close-up view of internal tissue, likely from an endoscopic procedure. The room is dimly lit with a blueish tint. The text "THE RIGHT PLACE AT" is overlaid in white, bold, sans-serif font, with "PLACE" being significantly larger than the other words.

THE RIGHT
PLACE AT



Dr. Fritz Francois (left) explains how the esophagus can become inflamed to Xingchen Mai, Class of 2014. The patient in this picture was undergoing an endoscopy in Bellevue Hospital's colonoscopy suite.

THE RIGHT TIME

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FIRST-YEAR
MEDICAL STUDENTS
ARE NOW
INTERVIEWING
PATIENTS AND
PRACTICING
CLINICAL SKILLS

BY GARY GOLDENBERG

PHOTOGRAPHS BY
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THE INK ON XINGCHEN MAI'S NYU SCHOOL OF MEDICINE ACCEPTANCE LETTER WAS BARELY DRY WHEN HE STARTED VISITING BELLEVUE HOSPITAL'S 10TH FLOOR OUTPATIENT ENDOSCOPY SUITE TO GET A FIRST-HAND LOOK AT THE PRACTICE OF MEDICINE.

Soon he was interviewing patients, practicing clinical skills, and observing procedures.

Although it might seem like Xingchen (Xing for short), Class of '14, was getting a little ahead of himself, he was doing exactly what is now expected of every first-year NYU medical student. In 2010 the School of Medicine launched an early clinical immersion program in which aspiring doctors are paired with practicing physicians and—in an innovative twist—asked to follow a small group of patients over the course of a year, wherever their illnesses may take them.

“In addition to shadowing physicians, which our students have done in the past, they're also shadowing patients,” says Jennifer G. Adams, MD ('99), clinical instructor in medicine and director of the new program, known as PLACE, for Patient-based Longitudinal Ambulatory Clinical Experience.

“The idea is for students to see the evolution of disease and the resolution of disease, rather than seeing a patient just once,” Dr. Adams says. “By following patients over time, they will get a much more comprehensive understanding of the disease process, the health-care system, and the psychosocial aspects of patient care.”

DOCTORING 101

PLACE has captured the attention of prospective students. “One of the things that attracted me to NYU was that I would get to the wards so early,” says Xing on a cold mid-February afternoon at Bellevue, his second monthly PLACE session. “When you're in class, learning the basic sciences, medical school can seem like a continuation of your undergraduate studies. But not when you're in PLACE. This is doctoring 101.”

Xing's first patient of the day is Kevin (not his real name), a 48-year-old man with a long-standing HIV infection, complaining of gastrointestinal distress. Today he's scheduled for a colonoscopy, which is to be performed by Xing's preceptor, Fritz Francois, MD ('97), assistant professor of medicine and assistant dean for academic affairs and diversity. Following Dr. Francois' lead, Xing dons a surgical gown, gloves, and facemask so he can observe the procedure from the bedside. The test is inconclusive;

there is more medical sleuthing to be done.

Back in the recovery area, Xing begins delving into Kevin's medical history. “In the last few days, what two symptoms have bothered you the most?” Xing asks, calling on interviewing skills he learned in class in recent weeks. “What medications are you taking?” “Has your stress level changed in recent months?” “Tell me about your parents' health.” If the budding physician is uncomfortable in his new role, it doesn't show.

After a half-hour, Xing gingerly presses his stethoscope to the patient's chest, listening carefully for abnormal heart sounds, fulfilling the goal of this month's PLACE session. In each session students are expected to practice at least one new skill they've learned in weekly seminars in the Practice of Medicine course, such as taking a blood pressure reading, conducting a medical interview, or practicing communication skills—part of a curriculum-wide effort to better integrate classroom and clinical learning in the preclerkship years.

Xing's about to wrap things up when Dr. Francois, one of 94 PLACE preceptors, drops by to demonstrate how to palpate an abdomen, explaining how differences in the pitch of sounds emanating from the intestines can help reveal the diagnosis. Xing gives it a try.

“What else did you notice about the patient?” Dr. Francois asks.

“He's thin and frail,” Xing notes.

“Good,” Dr. Francois responds. “Even though you're doing an abdominal exam, you're always looking for signs of other abnormalities. You look at the skin, the sclera, the dentition. Whenever you talk with a patient, you can use that as an opportunity to assess his speech, his movement, his ability to interact.”

LEARNING HOW TO GAIN THE TRUST OF PATIENTS

Kevin's case won't be solved today—disappointing news for the patient, but good news for Xing. He has found a new patient to follow, which does not happen every session since it can't be predicted what patients will come in on a given day or whether they will agree to participate.

“From here,” Dr. Francois says, “Xing can examine the biopsy tissue with the pathologist, if he's interested, and then he can follow the patient back to his primary care doctor. Over the next few weeks or months, he'll get to see all the pieces of the clinical picture.”

Dr. Francois has no illusions about transforming first-year students into wizened clinicians overnight. “It's not like Xing's going to know all the diagnoses and treatments,” he



First-year medical student Xingchen Mai performs a preliminary examination of a patient under the watchful eye of Dr. Francois. As part of the PLACE program, students follow patients to gain a more comprehensive understanding of the disease process, the health-care system, and the psychosocial aspects of patient care.

acknowledges. “This is about developing a level of comfort with assessing patients through history and physical examination. Doctors must quickly gain the trust of their patients, and a critical part of being a good doctor is about putting patients at ease, regardless of gender, language, religion, or age. This is a skill that can be learned.”

When asked whether he had this type of experience as a novice student, Dr. Francois rolls his eyes. “I wish,” he says with a laugh. “It was almost like it was taboo to be on the wards in the first year of school. The very first time I interviewed and examined a patient extensively was as a third-year clerk. I was terrified. I got through it all right, but I felt like I had a lot of catching up to do.” (Before PLACE, two programs offered first-year students an opportunity to have some contact with patients: The Patient Narrative, introduced in the early 1990s, and Physician, Patient, and Society, which began in 2001. Dr. Francois graduated from NYU School of Medicine before these programs were offered.)

Dr. Adams also sees PLACE as an early opportunity for students to practice how to be humanistic caregivers. “Empathy and compassion are instrumental to caring for patients,” she says. “Some students have an innate ability to manage these complex emotions and behaviors, but not others. But everyone can get better at them. I interview patients daily; it’s second nature to me. But I still tape my patient interviews on occasion

to reflect on how I’m interacting with patients and how I can do it better.”

TEACHABLE MOMENTS

In the Bellevue endoscopy suite, the student and preceptor gown up once again, this time to perform a colonoscopy on a 50-year-old Hispanic woman. Colorectal cancer is one of the central pillars of the medical school’s new curriculum. As the test proceeds, Xing, who has already seen a half-dozen colonoscopies, points out various anatomical landmarks, such as the opening to the appendix and the triangular configuration that signals the start of the transverse colon.

“These structures look very different in a cadaver,” says Dr. Francois, as he surveys the twists and turns of the large intestine. “Seeing the anatomy of a living patient reminds you of why

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When Dr. Francois mentions that he’s found an abnormality, Xing immediately points out two tiny, almost invisible polyps on the video monitor. “He’s got a good eye,” says Dr. Francois. “The first

Tze-Jung Su, MD, supervises medical student Di Zhou as she examines a patient at Gouverneur Healthcare Services, on New York's Lower East Side, as part of the new curriculum's PLACE program.



time I pointed out a polyp, he said, 'What are you talking about?'"

Loath to pass up a teachable moment, Dr. Francois describes how the location as well as appearance of polyps can vary dramatically from

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one ethnic group to another—one of many mini-lessons in patient diversity that Xing is certain to learn in PLACE. The effect is intentional. Some PLACE sessions are based in public health facilities in New York City, such as Baruch Family Health Center, Gouverneur Healthcare Services, and the Charles B. Wang Community Health Center, to expose students to as wide a range of patients as possible. In addition, students shadow physicians and patients in private practices.

For Xing, it's been a productive afternoon, but the session isn't officially over. Within 24 hours, he will have to write up his cases on a confidential, encrypted website, offering him opportunities to reflect on his day's work and to query his preceptor. The patient logs also allow Dr. Francois to keep tabs on his students' progress.

EMPHASIZING THE HUMANISTIC ELEMENTS OF MEDICINE

As Dr. Francois sees it, PLACE is a much-needed corrective in medical education. In the century since the 1910 Flexner report, medical schools have put more and more emphasis on a standardized diet of basic science in the first half of the curriculum, delaying significant contact with patients until the third year. "Standardization was necessary," he elaborates, "but somewhere along the way, we moved too far away from the hands-on and humanistic elements of medicine. That's not the best model for learning. Nothing opens your eyes like seeing it firsthand. If a picture is worth a thousand words, then how much is the interaction with a patient worth over the course of his or her treatment?"

Of course, only time will tell. So far, the feedback from students and preceptors has been overwhelmingly positive, Dr Adams says. "We'll have a better sense of how PLACE is working in a couple of years, when the students start their clerkships. As we continue to integrate PLACE with Practice of Medicine, those clinical experiences should become even more rewarding."

In the meantime, Xing is looking forward to his next PLACE session. "I've learned so much talking with patients and interacting with the doctors and nurses," he says. "It's an amazing experience." ●

NYU3T The new curriculum teams student doctors and nurses.

Emily Odermatt, 19, a second-year nursing student, and Darien Sutton-Ramsey, 22, a first-year medical student, might one day have expected to encounter each other performing their roles in an operating room or attending to a patient in an exam room. Instead, they're meeting each other in a new one-year combined curriculum designed to teach future doctors and nurses to work together before they ever lay hands on a patient.

"It's not unusual for students to be unaware of the other person's role," says Terry Fulmer, PhD, the Erline Perkins McGriff Professor and Dean of the College of Nursing, who created the new curriculum with Marc Triola, MD ('98), director of the Division of Educational Informatics. "We believe that by giving them this important new content in the curriculum," says Dr. Fulmer, "there will be better communication and, ultimately, improved patient care outcomes when they practice."

Launched February 2, 2011, NYU3T is shorthand for "Teaching, Technology & Teamwork," which for the first time brings together 332 NYU medical and nursing students in a joint learning setting. The project is funded through a four-year grant from the Josiah Macy Jr. Foundation.

"The students love it," Dr. Triola says. Professional collaboration across disciplines is "increasingly becoming not only the norm, but a necessity."

And good communication within those collaborations aims to improve patient care, notes Jennifer G. Adams, MD ('99), clinical instructor in medicine, a member of the team that developed the curriculum. The team included Fritz Francois, MD ('97), assistant professor of medicine, Adina Kalet, MD, associate professor of medicine



NYU medical and nursing students gather around a bed with a simulated patient to learn communication and team-building skills they can draw upon later as professionals.

and surgery, Sabrina Lee and So-Young Oh, of the Division of Educational Informatics, and Maja Djukic, PhD, RN, assistant professor at the College of Nursing.

"Many medical errors are the result of poor communication among team members," Dr. Adams says. "For optimal patient care, you want a good team, so it's important to start early and emphasize the importance of communication. We really think it will make a difference."

Now in their first semester of the program, the students watch video vignettes online and listen to dialogue about them with their team members. Nursing student Odermatt says she recently learned a new perspective from a team exercise involving a vignette of a physician who excused himself to take a phone call during a patient consultation with colleagues.

When the student teams were asked to respond to the pros and cons of the vignette, "one of the medical students had written that he thought it was rude of the doctor to take a phone call in the middle of the meeting," she says. "I had been thinking that everyone gets pulled in every direction as a natural course because of patient demands. But the

medical student who noticed the disruption was more aware of the need for time management skills. And he was right."

Next semester the students will focus on skills practice, managing virtual "cases" online and in a simulation lab. "They'll make decisions and order medications as a team," Dr. Triola says. "There's also an exercise with full-body robotic humans simulating acutely ill patients. Faculty members play the role of attending physicians, so that we can see how they're using these skills."

During clinical assignments, both nursing and medical students shadow professionals in other disciplines. Odermatt says the process has already helped her communicate better. "I'm more concise because I can determine what information is pertinent and to whom."

Building relationships with coworkers is key for her team member, medical student Sutton-Ramsey. "What I'm really learning is to gain a respect and understanding of everyone's role. I thought it was just, 'you do your job, I'll do mine.' It's inspired me to see how, for all of these people, what they all have in common is treating the patient."

—Aubin Tyler