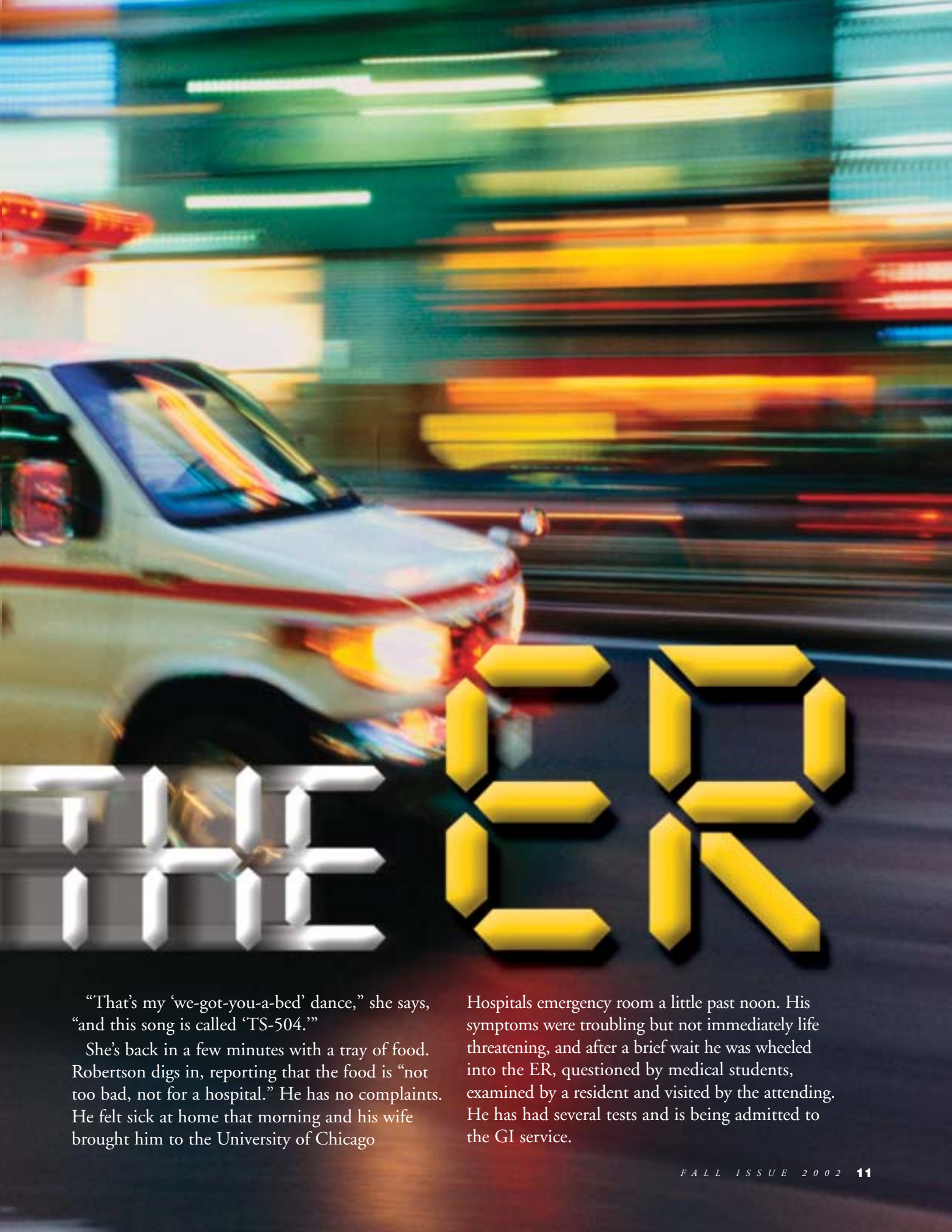


PHOTO OF MOVING AMBULANCE BY PHOTODISC

*Story by John Easton
Photographs by David Joel*

IT'S SIX O'CLOCK ON A FRIDAY EVENING WHEN AN EMERGENCY ROOM STAFF MEMBER SLIPS INTO BAY three doing a little dance — part samba, part shuffle — for patient Fay Robertson.

“What’s all that about?” asks Robertson, 79, a distinguished-looking gentleman with gray hair and a gastrointestinal problem.



THE

ER

“That’s my ‘we-got-you-a-bed’ dance,” she says, “and this song is called ‘TS-504.’”

She’s back in a few minutes with a tray of food. Robertson digs in, reporting that the food is “not too bad, not for a hospital.” He has no complaints. He felt sick at home that morning and his wife brought him to the University of Chicago

Hospitals emergency room a little past noon. His symptoms were troubling but not immediately life threatening, and after a brief wait he was wheeled into the ER, questioned by medical students, examined by a resident and visited by the attending. He has had several tests and is being admitted to the GI service.

Sometimes you have to wait a lot longer than this,” says Robertson, a man familiar with hospitals. With his immediate future mapped out, he relieves his wife from duty for the evening and settles back to wait for a transporter to take him to his room.

“This has been a typical Friday,” reports David Howes, MD, associate professor of medicine and the faculty member overseeing the ER this evening. “A little zoey, but not too bad.”

People who watch TV shows about emergency care are bombarded with images of gurneys ramming through swinging doors, physicians shouting orders and bleeding patients writhing in pain. There are certainly moments like that — for example, UCH handles about 700 pediatric trauma cases a year, half of which require hospitalization. But this evening, like most evenings, consists instead of a relatively quiet yet utterly relentless parade of patients with ailments much less



Attending ER physician David Howes (second from right) reviews the board during a shift change.

through. Beside him is a gentleman in his 60s who probably has had a mild heart attack. And next to him is a 27-year-old woman with pale skin, no hair, bright pink fingernails and complications following her stem-cell transplant for Hodgkin’s disease.

“We got right in once we got here,” reports her mother, “but it took us two hours to drive here from Mount Prospect.”

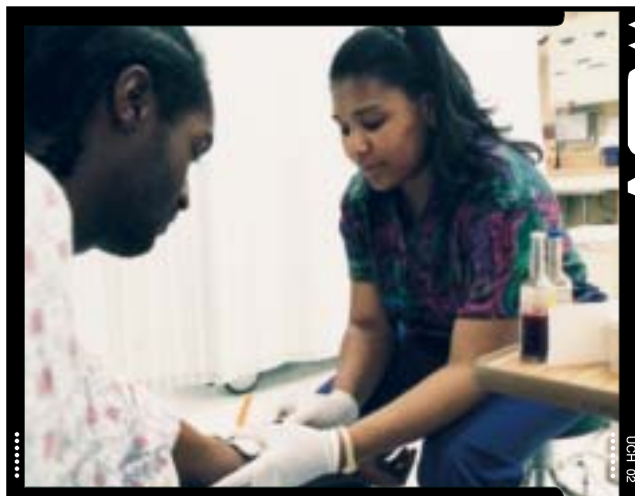
“This is where the doctors want her,” explains the patient’s grandmother, “so this is where she goes.” Then, looking around the room, she adds, a little amazed, “This is a very busy place.”

There are 15 bays in the adult emergency room, plus two isolation rooms. This Friday evening they are all full. They have been full since midmorning. Across the hall in the pediatric ER, there are four beds and five private exam rooms. They are full. The Express Care clinic, set up to expedite care for minor ailments, is full. The waiting rooms are full.

Although Fridays usually produce more discharges than admissions, most of the 576 beds throughout UCH are filled, especially those reserved for the sickest patients. Seven out of eight burn unit beds are occupied. There is one cardiac intensive care bed free, and two of the 34 medical intensive care beds are empty. The neurointensive care unit and the surgical



Six to nine nurses are scheduled for a typical ER shift. Here, 20-year veteran Mark Haseman (center) reviews a patient chart while Jenny Visak prepares a syringe.



Nurse Resa Tetebaum draws blood from Gereard Reese, 30, who arrived at the ER with chills and a slight fever. Reese has been coming to the Hospitals since age 4 because of a cardiac abnormality.



Nurse Jennifer Prather and third-year resident Holly Holmes calm an anxious ER patient.

apparent than those produced by a bullet wound or car crash, but often just as severe.

Robertson has a rectal bleed. In another bay, a young woman 16 weeks pregnant with twins can’t seem to get comfortable and wants to know why she’s leaking fluid; she suspects that her water has broken and her unborn children are at risk. Next to her is a much older man who was found on the floor of his garage four days after suffering a stroke. Nearby, a 42-year-old man with dreadlocks and an Oakland Raiders cap is recovering from asthma, treatment he can snooze

intensive care unit are both 10 for 10. Oddly, there are five pediatric ICU beds open, but in the neonatal intensive care unit, all 56 beds are taken.

Emergency rooms all over the country are crowded. Eight percent of the emergency rooms in the United States closed between 1994 and 1999, and hospital bed counts fell nearly twice as fast. On the South Side of Chicago these scarce resources are stretched just a little farther. ER visits at UCH have increased about 5 percent each year over the past 10 years, with a sudden bump whenever a nearby hospital closes.

Ten years ago there were three hospitals in Hyde Park. Then Chicago Osteopathic on 53rd Street closed — it's now condominiums — and in 1999 Doctors Hospital on Stony Island closed. Reports in the Chicago papers claim that at least two more South Side hospitals are in financial trouble.

Last fiscal year, 76,669 patients — 47,639 adults and 29,030 children — came to the UCH emergency room, making it one of the busiest ERs in Chicago, second only to Cook County Hospital. That's about 210 patients a day. And more than 10,000 of those patients were sick enough to be admitted.

The current emergency room, which opened as part of the Bernard Mitchell Hospital in 1983, provided a state-of-the-art setting for teaching and for the number of patients seeking emergency care in the early 1980s. Now, 20 years later, there are more, sicker and older patients. "On a bad day we could easily fill a room twice this size," said Jim Walter, MD, professor of medicine and section chief of emergency medicine.

"All of the ER staff are committed to caring for our ill and injured patients," Walter said. "But when volume keeps climbing, when the space fills up, when we can't move sick patients out of the ER and into hospital beds and free up a bed to see the next patient, we can find ourselves in a kind of clinical gridlock."

by UCH has attracted enough new nurses to open another 30 beds, which takes some pressure off of the ER, "but doesn't nearly eliminate the problem," Walter said.

"All big urban emergency rooms are struggling with this increase in demand" and looking for innovative solutions, he said. In the past two years, for example, UCH has opened a short-stay unit to take ER overflow, set up a small holding unit within the ER, dedicated transportation personnel to emergency care and doubled staffing for the Express Care

All of the ER staff are committed to caring for our ill and injured patients. But when volume keeps climbing, ...we can find ourselves in a kind of clinical gridlock.

— *Jim Walter, Section Chief of Emergency Medicine*



Chest pains brought Coleman Lawton, 49, to the ER.



In the ER, the charge nurse and all physicians carry portable phones. Second-year resident Mark Bellazini takes a call during his shift.

Part of the problem is increasing demand and part is supply — the nationwide shortage of nurses. The UCH emergency room fortunately has an experienced team of loyal nurses, but hospitals all over the country are now competing with each other to recruit nurses for their inpatient floors from a continuously shrinking pool. There simply aren't enough to go around. Nursing school enrollment has dropped 20 percent since 1996, and an estimated 168,000 nursing positions currently are unfilled, according to the American Hospital Association. This year a concerted effort

clinic, which cares for patients with minor, quickly treatable ailments, about 20 percent of ER visits.

"This has helped, somewhat," said Jeff Finesilver, UCH vice president who oversees administrative details for the ER. "People with the most and the least urgent needs are now seen quickly, but those in the middle, too sick for the fast track and not sick enough to be urgent, can wind up waiting for quite a while."

Where all these patients come from is a little unclear. Many, from all over the region, are under the care of faculty

New rules curb “extreme” shifts for residents

Sometimes it helps not to have such a long tradition.

Residents in more established fields such as surgery or internal medicine historically have worked 100 or more hours a week with frequent 36-hour shifts.

But in the comparatively young specialty of emergency medicine “excessive work hours are just not an issue,” insisted David Howes, MD, director of the emergency medicine residency program at the University of Chicago Hospitals.

Shifts took on new importance when the Accreditation Council for Graduate Medical Education (ACGME), which oversees the training of 100,000 residents in the nation’s 7,800 programs, announced this past June new regulations covering resident hours.

Taking effect in July 2003, the new rules limit residents to 80 duty hours per week with no more than 24 hours on call and at least one day off each week.

hours for handing off patients or attending lectures — “is a big, big change,” she said.

The new regulations will be an even bigger challenge for small but time-intensive programs such as neurosurgery, said Loch Macdonald, MD, associate professor of surgery and director of neurosurgery house staff education.

“We can petition for an increase to 88 hours,” he said, “and have fellows take call. But if the residents work fewer hours they will have less operative experience, so we are considering extending the training program by one year.”

Seven years ago, however, the directors of emergency medicine residency programs around the country established far more civilized guidelines, limiting residents to no more than 60 clinical hours per week and at most 12 consecutive hours in the ER.

“With 24-hour attending physician supervision and teaching of residents, it doesn’t take a hundred hours per week to train outstanding residents in this field,” Howes said. “A well-rested resident who has time for study and educational opportunities — not to mention adequate nutrition, physical fitness and the occasional social interaction — learns faster, provides better care and brings personal balance to the profession.”

Begun in 1972, the UCH emergency medicine residency program is one of the oldest in the country. It’s also one of the most sought-after, in part because residents get to spend the last two years flying with UCAN — the University of Chicago Aeromedical Network.

“Being affiliated with U of C makes it such a great experience because we get to work with the best and brightest residents and faculty from every specialty,” said David Williams (pictured on cover), MD, a second-year emergency medicine



UCH coordinates ambulance traffic on Chicago’s South Side. First-year resident Ethan Booker in the telemetry room responds to a call from the field.

Even specialties like internal medicine that already adhere to an 80-hour workweek will have to adjust. UCH residents often work up to 38 hours at a time to be able to provide follow-up care and attend educational programs, according to Holly Humphrey, MD, who oversees the program. The 24-hour limit — even though it allows an additional six



The University of Chicago Aeromedical Network, or UCAN, on the Hospitals’ rooftop helipad. This twin-turbine helicopter carries specialized life support equipment for the acutely ill and injured from accident scene responses and for inter-hospital transfers.

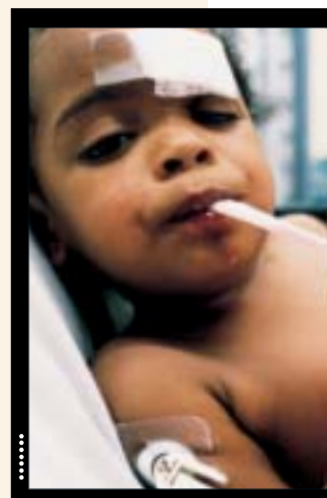
“We’re ahead of the curve, 20 hours below the ACGME regulations,” Howes said. “We don’t have to change any of the emergency medicine guidelines in order to adhere to the new rules.”

During three years of training, UCH emergency medicine residents spend an average of 42 to 47 hours a week in the ER, typically in eight-hour or 12-hour shifts.

resident. “The acuity of our patients along with the diverse pathology we see on a daily basis also adds to the experience. No other program in the country, much less the city, can match the experience we get here.”

“We do have a tradition,” Howes said. “It’s an enlightened one.”

— J.E.



physicians and come to the ER when they have a sudden flare up. Many more, often from the neighborhoods around Hyde Park, have limited access to medical care, even primary care, especially at off hours. “They have no place else to go,” said Mark Haseman, RN, who has worked in the adult ER for 15 years, “and some friend has told them we were good. So here they are.”

“Almost all of these people chose to come to the ER appropriately,” Walter said. “On the whole, they tend to be quite sick, with real and often complex medical problems. Primary care offices aren’t set up to deliver the acute episodic care that they need. On the other hand, it’s very difficult for us to provide the sorts of public health and educational services that a primary care office should, to educate patients about their asthma or hypertension or alcohol use. We try, but an

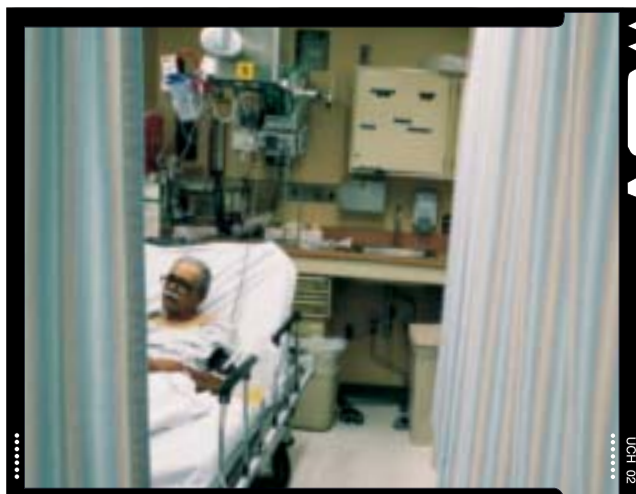
up quicker, compounded by an upswing in activity through the hospital. Monday is a popular day for elective surgeries and other routine admissions.

On a typical Monday morning, for example, the children’s ER may start slowly, with just a few patients — wait until afternoon — but the adult side can start to back up well before noon. One particularly heart-rending patient found in the ER this Monday morning is Laura Larson, a dainty 34-year-old woman with a rare cancer, alveolar soft part sarcoma. Larson normally spends her weekdays home schooling her seven children — the oldest is 12 — plus five more neighborhood kids, but by 8:30 this morning she has been in the emergency room for seven hours. After multiple surgeries and unsuccessful chemotherapy and radiation, she was referred to UCH cancer

Weekend nights in an emergency room are expected to be boisterous, even a little “zooney.” What few people outside the field realize is that weekdays are just as hectic, if not more so. In fact, Mondays tend to be busier than weekend days.



Isaiah Sherman, 2, received stitches on his forehead after falling out of bed.



Neil Gurwara, 58, waits for test results after coming into the ER because of “heart palpitations.”



Avery Rennick, brought in for tests because he wasn’t eating, is about to be released. His mom, Kirsten Lindberg, a third-year medical student at Chicago, tries to comfort the 2-month-old.

emergency room is not the optimal setting — especially if the patient in the next bay is a little belligerent.”

Belligerent patients, the press of humanity, heart attacks, strokes and cause for celebration when a bed opens up: Weekend nights in an emergency room are expected to be boisterous, even a little “zooney.” What few people outside the field realize is that weekdays are just as hectic, if not more so. In fact, Mondays tend to be busier than weekend days; the relentless flow of suffering and disease starts earlier and backs

specialists Michael Simon and Christopher Ryan for treatment of metastases from her original cancer to her skull, lumbar spine and femur. She has an appointment to see them later in the week, but her pressing problem this morning is pain and numbness caused by the spinal tumor.

A friend drove her in late last night from the far northern suburbs. They arrived at 1:30 in the morning. “I expected chaos,” she reports, “but we spent a quiet night here.” After multiple scans to look for tumor progression, she is being

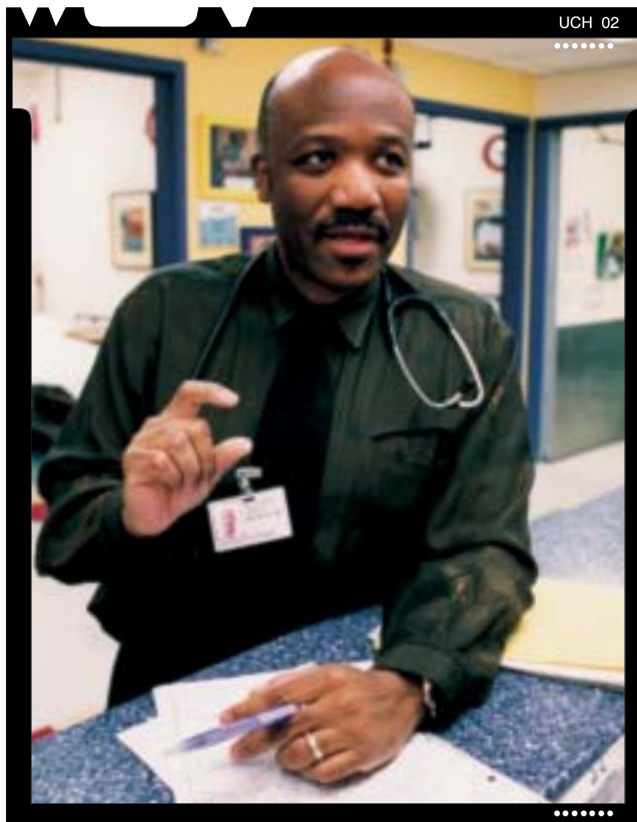
sent home, for now, with something to reduce the inflammation that's causing the numbness. She still plans to see Simon's team later in the week, but for today she has her students to attend to at home. "It keeps me going," she explains.

Across the hall from Larson this morning is palpitation row — three patients side by side with cardiac abnormalities. One, a dapper 58-year-old Indian gentleman from the western suburbs has an irregular heartbeat, probably caused by his anti-seizure medications. Next to him, an older black woman with long-term heart failure complains of "jumpy pains" in her chest that come and go and move around. She also feels "a little woozy about the head." She called her doctor's office this morning but when she seemed dizzy and confused on the phone they sent an ambulance for her. In the bay next to her is a 49-year-old black man with known high blood pressure, congestive heart failure and a new symptom, chest pain, which quickly draws teams of experienced and fledgling cardiologists.

When gridlock sets in and patients can't pass through quickly, medical care comes to them, which makes the emergency room a stimulating, if somewhat crowded, setting for teaching. A good example — one that also illustrates why Mondays can be so busy — is Bruce Lambert from Chicago's South Side, a man with thick gray hair and an impressive mustache who came to the emergency room with chest pain Monday afternoon.

The pain had begun three days earlier, he says, at 3:30 p.m. the previous Friday. It was "the worst pain," he tells his doctors, "I ever had." It hurt all day Saturday and on into Sunday, then went partially away while he slept that night. On Monday afternoon, once he felt more like it, he called an ambulance, which brought him to the emergency room. Flagrantly pale and still complaining of chest pain, he breezes right through triage and into a bed.

A series of tests confirms the expected, a myocardial infar-



Third-year resident at Cook County Hospital, Jean-Daniel Pierrot works his pediatrics rotation at the University of Chicago Children's Hospital.



Following a heart attack, Bruce Lambert, 64, listens as his doctor explains the treatment options.

What are you looking for on the EKG? What could this be in addition to an MI? Did you notice anything when you listened to his heart?

— Heart Failure Specialist Allen Anderson, quizzing residents

tion, and sets in motion a chain of therapeutic and pedagogic events. After the ER team makes a tentative diagnosis, a team from the cardiac catheterization lab comes down to confirm their suspicions, consider his options and confer with the patient, who has improved enough to feel a little hesitant about consenting to aggressive treatment. “You’ve had a heart attack,” emphasizes the team’s leader, Neeraj Jolly, MD, an interventional cardiologist. “You understand what that means, don’t you?” Then the team walks him through his options again.

Soon after Jolly’s team is finished, a second cardiology team, led by heart failure specialist Allen Anderson, MD, arrives. A different intern and resident go over the patient’s test results, ask him similar questions, listen to his heart, pull back to consult with each other, then return to the bedside to review the options once again and answer his questions. He has obvious heart damage, they explain. All agree he needs angioplasty to reopen the blocked artery, but there is some debate over the timing. Sooner, they eventually agree, is better, and before long, off he goes. They will open his plugged right coronary artery, and he will go home two days later after an uncomplicated recovery.

Even after the patient has left the room, Anderson and his team are still in the ER, where he quizzes his residents on

issues this patient raised. “What are you looking for on the EKG?” he asks his intern, Deepica Ganta, MD. “What could this be in addition to an MI? Did you notice anything when you listened to his heart?”

“It sounded very distant to me,” she answers.

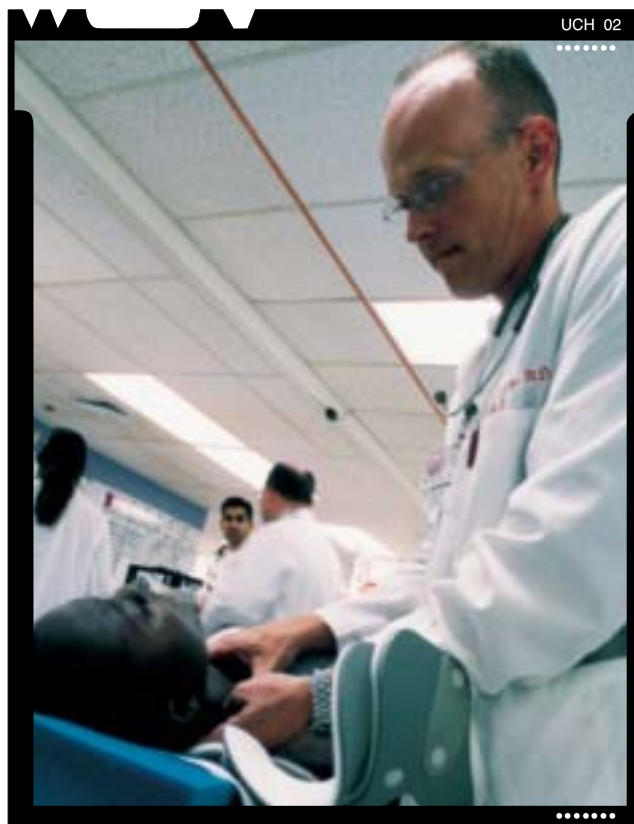
“Very good,” he lauds. That was the right answer. He carefully explains why, then the rapid-fire questions begin again as a new patient rolls into the newly vacated bay.

A few beds away, the staff member who danced into bay three the previous Friday evening is on the job again. But her “we-got-a-bed” dance is not to be repeated anytime soon, even with Lambert being wheeled out of the ER on his way to cardiac catheterization. Though her Friday night caper deserved points for style, her celebratory samba turned out to be no more effective than a tribal rain dance. Fay Robertson, the patient who had inspired the dance, had confused the people who assign the coveted inpatient beds. They had him down as Faye Robertson and were sending him to a double room to be shared with a female patient. The ER staff detected the error, deleted the offending “e,” and recommenced their efforts to find him a room, while Robertson napped on his gurney.

It took three more hours, but they finally found him a bed for the night.



Third-year resident Kruti Acharya slips on a TB mask before entering an isolation room.



Second-year resident Joseph Peabody assesses a new arrival.



Second-year resident Julie Oyler checks out the patient board.