

+ Canada's first  
Command Centre

P8

+ How Rebekah Rimsay got  
her ballet career back

P16

+ Preparing kids (and their  
parents) for surgery

P20

+ Inside the Women's Centre  
of Excellence

P26

# HumberRiverHealth

**Skill. Innovation. Compassion. Teamwork.**

These are just some of the many reasons  
why Humber River Health is one of Canada's  
top surgical centres.



# Committed to innovation

Humber River Health (Humber) is proud to be an incubator for innovation. Humber's Wilson site opened in October 2015 as North America's first fully digital hospital and our innovative approach to healthcare has led to us becoming a national and provincial leader, with a history of many firsts. This includes our Department of Surgery that, for decades, has been at the forefront of innovations that enable us to treat more patients in less time and with better outcomes using robotic surgical technologies.

The first thing you may have noticed when picking up this magazine is our new name: Humber River Health. Earlier this year we went through a new strategic plan, reaffirming our commitment to innovation, while also introducing our new vision: Lighting New Ways in Healthcare. The statement speaks to our identity as a leader in healthcare innovation and our aspiration to address healthcare challenges with effective solutions. The name – Health instead of Hospital – reflects the growth of our organization into a truly integrated health system in our community.

Humber specializes in general surgery, bariatrics, vascular, orthopaedic, plastic and reconstructive surgery, ophthalmology, otolaryngology, oral maxillofacial surgery, urology, gastroenterology and gynaecology – all of which benefit from a range of advanced technologies. This includes the da Vinci Xi that allows for highly advanced robotic surgeries, the ROSA® Knee System for fully customized knee replacements and the Intellijoint

HIP® used for total hip replacements, the Acesa ProVu® system for minimally invasive gynaecological surgeries, among many others.

Our integration of these innovations results in significant patient benefits, including less blood loss, reduced pain and swelling and shorter hospital stays.

We are committed to working together to deliver innovative, safe and compassionate healthcare in our community, providing comfort to our patients and their loved ones. This includes finding new ways to mitigate pain while significantly reducing narcotic burden through methods such as SKiP and COIN that deliver a nerve-blocking local anaesthetic through a catheter. We are also proud of our unique Hug and Hold Child Life program, which helps our youngest patients prepare for surgery. We also place enormous value on keeping families and loved ones informed. As the first surgical program in Canada to use the STERIS RealView patient tracking system, family members anywhere can opt to receive text messages to their smartphones, updating them on their loved one's progress through the surgical journey.

Humber's advanced approach is why we see year-over-year growth in our surgical

activity. We are committed to patient safety, demonstrated through the 2021 Excellence in Patient Safety Award presented to Humber by the Canadian College of Health Leaders. Patients in our care have also rated their overall hospital experience nearly 10 per cent better than the provincial average. Our success comes from our commitment to embrace new technology and our compassionate, professional and respectful team that provides next-level, unmatched patient care at every stage.

We are proud to be a pioneer in revolutionizing the standard of care for surgeries across Ontario.

Join us on the journey of lighting new ways in healthcare.

**Michael Iacovelli**  
Chair, Board of Directors

**Barbara Collins**  
President and CEO

**Dr. S. Zaki Ahmed**  
Chief of Staff

**Dr. S. Zaki Ahmed**  
Chief of Staff

**Barb Collins**  
President and CEO

**Michael Iacovelli**  
Chairman of the Board



## EXECUTIVE TEAM

**Barb Collins**  
President and CEO

**Dr. S. Zaki Ahmed**  
Chief of Staff

**Peter Bak**  
Chief Information Officer

**Faith Forbes**  
Chief Financial Officer

**Mike Heenan**  
Executive Vice President,  
Chief Corporate Service  
and People Strategy

**Carol Hatcher**  
Executive Vice President,  
Chief Nursing Executive  
and Chief of Clinical  
Programs

**Jhanvi Solanki**  
Vice President, Clinical  
Programs

**Beatrise Edelstein**  
Vice President, Post Acute  
Care and Health System  
Partnerships

**Peter Voros**  
Vice President, Clinical  
Programs

**Jennifer Yoon**  
Deputy CNE, Vice  
President, Quality,  
Professional Practice  
and Risk

## BOARD OF DIRECTORS

Michael Iacovelli (Chair)  
Terry Leon  
Bruce Levitt  
Carole Malo  
Barbara Mason  
Eva Ryterband  
Joan Smart  
Bruce Teron  
Susan Wolburgh Jenah  
Gary Teelucksingh  
Joseph Quarin  
Serge Gattesco  
Celeste Iacobelli



# Transitioning to eReferral

The North Western Toronto Ontario Health Team and Humber River Hospital have partnered with the Ontario eServices Program, funded by Ontario Health, to bring you access to digital health tools, including eReferral.



Get started on  
eReferral today  
by scanning  
the QR Code



“

*It is integrated into my workflow making my life a million times easier. It shows the date for when the patient's appointment is booked and this is easy to see when I am talking with the patient.*

”

## Benefits of eReferral

### + Funded by Ontario Health

No cost to clinicians as part of the Ontario eServices Program

+ Patients can **confirm appointments online** and choose to receive email notifications

+ **Reduces administrative tasks**, such as the need to make follow-up calls

+ **Integration with most EMRs** allows you to send referrals quickly and receive updates

Check out the **HealthMap** to search for participating services





# The patient journey



Surgery goes smoothly thanks to the many steps Humber takes to put its patients at ease.

*By Glynis Ratcliffe*



Dr. Stephen Halman  
Chief of Surgery

“The goal of all our efforts, the surgical and anaesthetic techniques and technologies, is a bespoke surgical experience for the patient focused on safety, pain reduction, and swift return to function and health.”

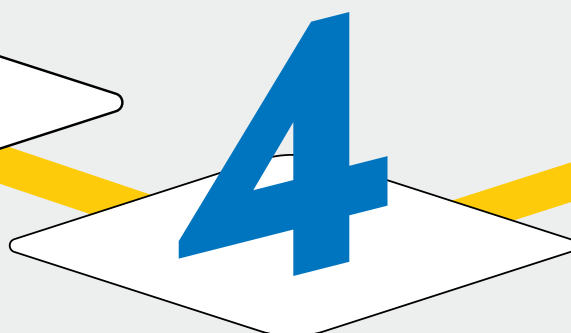


## Day of surgery

**Pre-op:** On the morning of surgery, the patient checks in and a STERIS tag is attached to their file. Final investigations are completed, an IV is inserted and a nerve block is administered if needed. A nurse explains what will happen before/during/after surgery.

**Surgery:** The team co-ordinates your procedural care in the operating room to ensure everything goes smoothly.

**Post Anaesthetic Care Unit (PACU):** Once surgery is finished, patients are moved to the PACU, where nurses monitor patients for complications and ensure a safe recovery from the procedure and anaesthetic.



## Getting home safely

The patient is transferred to surgical day care or the in-patient unit, where the care team ensures a safe recovery from surgery and facilitates a safe discharge home. The team provides education about post-surgical care, pain management, follow-up care and other aspects relevant to their condition.



# TECH TOOLS

An integral part of the patient's surgical journey is the technology that keeps hospital personnel and procedures running like clockwork. Here are some of the key elements.

## THE COMMAND CENTRE

Comprised of large monitors at the front of the Command Centre, the Wall of Analytics combines real-time data, early warning systems, machine learning and predictive analytics in an effort to alert staff of changes to patient status and potential risks.

## OR ASSIGNMENT TILES

These keep track of nurses, physicians and attendants working together, and which stage patients are in (pre-op, anaesthesia, surgery, etc.) to optimize patient flow and ensure all staff know what's coming next.

## STERIS REALVIEW TAG

Attached to each patient's file, the tag tracks them throughout their hospital journey so family can see which stage they are in (pre-op, surgery, recovery), in real time, either on waiting room monitors or via text updates.

### First visit

Every patient's journey starts with an initial doctor's appointment, either in their office or one of our central intake clinics at the hospital. Here, the clinician will assess your condition, take your medical history and build a treatment plan with your input. Your doctor will explain details about the procedure, possible complications and tests you need beforehand. Once you're ready, the procedure is booked.

### Surgical pre-screening

The doctor's office books the procedure, all documents are sent to the hospital. At this appointment – in person, by phone or video call – the team prepares you for the day of surgery. They explain what to expect that day, provide post-operative education and help build a plan to get you home and recovering faster.

### Surgical Day Care

### In-patient



# Humber's heart and soul

How nursing teams make surgery as stress-free as possible.

*By Anna Sharratt*

The operating room (OR) can be a lonely, anxiety-inducing place for patients. But thanks to the attentive care of Humber River Health's 340-plus nurses across the continuum of surgery – Pre-op, Operating Room, Recovery Room, Surgical Day Care, in-patient Surgery, Surgical Clinics, Acute Pain Service, Vascular Access Team and more – no surgery patient feels alone. From admission to discharge, the nursing staff makes the experience as stress-free as possible.

The nursing staff is involved in a patient's care from early morning briefings to the active participation of surgical nurses in the OR, says Galyna Breslavets, Humber's Manager, Operating Rooms. "They actually participate in sedation, intubation, the collection of specimens and ensuring patient records are completed," she says.

The nursing team co-ordinates efforts between the different units through a secure hospital group chat to keep everyone abreast of patients' movements. "It's a fast-paced environment, but we can easily disseminate information," says Sammy Adriatico, a resource nurse in the Post Anaesthetic Care Unit, adding that Humber has 26 operational ORs.

A digital patient-tracking program called STERIS RealView also helps the nurses improve how they keep patients' families and loved ones updated and

ensures the hospital runs smoothly. The program sends real-time alerts, so everyone always knows where the patient is, while improving OR efficiency by optimizing surgical start and turnover times.

Between the real-time alerts and Humber's family presence program, which allows a family member or loved one in the recovery room after surgery, the nurses constantly work to make the experience less stressful for patients.

Despite two years of disruption from COVID-19, Humber's nurses remain positive. Breslavets credits the flexible schedules, support programs and frequent briefings and debriefings for ensuring the nursing staff have the help they need. That's notable given a 2022 Statistics Canada report found that nine in 10 nurses in Canada (92 per cent) reported feeling more stressed at work during the pandemic. "I'm very proud of our nurses," she says.



**Galyna Breslavets (L),  
Nursing Manager, Operating  
Rooms, and Sammy Adriatico  
(R), Resource Nurse, Post  
Anaesthetic Care Unit.**



## RESTORING VISION

# Eyes on the prize

Humber's ophthalmology program is expanding.

By Diane Peters

The ophthalmology program at Humber River Health has two streams that deserve attention: general and comprehensive ophthalmology and paediatric ophthalmology.

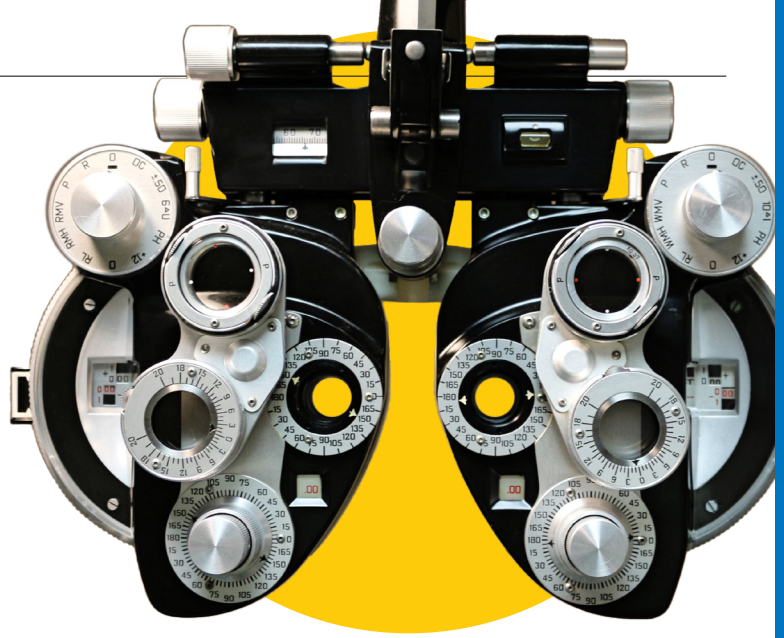
The former includes subspecialties like cataracts, glaucoma and oculoplastics, with most procedures performed offsite by many leading surgeons in the field, in co-operation with North York General Hospital. The latter began as a one-surgeon program that has grown into a team of three paediatric ophthalmologists in the last several years. This team screens all

hospitalized premature babies for an uncommon but potentially vision-threatening retinal problem called retinopathy of prematurity. This condition can require retinal treatment with laser and possibly surgery.

One of the ophthalmology department's specialties is paediatric strabismus – sometimes referred to as lazy eye. The paediatric eye team at Humber has partnered with the University of Toronto and SickKids to train fellows on location

in their paediatric strabismus program, something that's especially important given the shortage of paediatric ophthalmologists in Ontario.

Dr. Brent Weiser, Head of Ophthalmology at Humber, is excited about the growth in paediatric ophthalmology at the hospital and hopes to see it continue. "We continue to strive to keep up with the high demands of the community," he says.



## BRINGING THE BLACK BOX TO HUMBER

# Lifelong learning

Airplane-like black boxes collect valuable data from Humber surgeries.

By Glynis Ratcliffe

While black boxes are commonly associated with airplane crashes, they're also used in pilot training to evaluate skills and perform system diagnostics on the planes themselves. It makes sense, then, that a hospital constantly looking to improve patient outcomes would have a black box of its own.

In 2014, St. Michael's Hospital spearheaded the Black Box project to collect all kinds of operating room (OR) data from hospitals across the country. The idea is to share that data with project participants, of which Humber River Health is one, to improve surgical safety and knowledge.

Currently, OR Black Box systems, as they're called, are installed in three of

Humber's 20 operating rooms, where they record video of laparoscopic surgeries. Then, the intra-operative recordings are securely analyzed for surgical technique optimization, and surgeon training. This exercise is very helpful for new medical learners, building a culture of quality improvement with a consistent drive to improve surgical skills.

At the moment, Humber residents are using the video portion of the system as a way to enhance their training, but surgeons can also use it to improve their own efficiency and surgical safety. It's just one more way Humber is using technology to enhance residents' and fellows' education to help it stay at the top of its game.

## LOW IMPACT

# Improving sustainability

By Bryan Borzykowski

In August, Humber River Health was presented with The Stryker Environmental Excellence Award in Silver. This award recognizes exceptional performance in environmental sustainability, as well as in improving hospital quality through medical device reprocessing. In total, the hospital diverted 1,117 pounds of waste from the landfill.

Humber also participates in the PVC 123 initiative, which is a program focused on decreasing medical waste by recycling oxygen masks, oxygen mask tubing and intravenous fluid bags, the bulk of which are used in hospital operating rooms around the world, and where ORs generate approximately 30 per cent of all hospital waste.





CUTTING WAIT TIMES

# Inside Humber's Command Centre

Using technology to optimize care and improve patient outcomes.

By Mark Brown

Humber River Health's state-of-the-art Command Centre allows staff to keep a constant watch on patients – even when the patients are the ones on the move. In the Command Centre, a specialized team scans real-time data that's displayed across a wall of video monitors, known as tiles. Each tile is dedicated to a specific aspect of hospital or patient data, including emergency room wait times and NICU patient vitals, to assess patient risk. All of the data collected by the Command Centre is fed back to the medical teams across different platforms, including their handheld devices, to ensure patients receive better, faster and safer care.

## PATIENT MANAGER NEW FOR 2023

To optimize discharges and patient care plans, the patient manager tile compiles information from every patient on site and distills the most important information down to each department or care team. At a glance, the care team can understand the patient's care journey, identifying barriers to care progression by flagging patient surges or delays in care such as lab work, diagnostic imaging specialty consults and more.

## SURGICAL TUBEMAP/ PACU BOARDERS

These digital tiles provide a real-time display of patient movements, from pre-op to surgery unit discharge, to help the Command Centre and in-patient unit optimize hospital resources. They track the surgical patients' journey from the moment they enter the hospital. To keep things moving, the Post Anaesthetic Care Unit (PACU) section of the tile ensures those awaiting discharge or waiting for an acute or ICU bed are processed as efficiently as possible.

PHOTOGRAPHY: COLIN SNYED (COMMAND CENTRE), DR. RAEWYN SEABERG (COURTESY OF HRH (DR. ANIL KATYAL))





## IMPROVING CARE

# Ahead of the rest

Humber's ENT program offers more than most community hospitals.

By Diane Peters

Most people don't think twice about their ability to hear, smell or swallow, but completing these simple bodily functions can be a challenge for many Canadians. Some people may be hearing impaired, for instance, or could have trouble swallowing following cancer treatments. There's also ear infections, allergies, sleep apnea, and the list of conditions that fall under otolaryngology – better known as ear, nose and throat (ENT) – is long.

In some cases, issues can get so severe that patients need otolaryngology surgery, which is one of Humber River Health's specialties. "We have one of the larger ENT groups for a community hospital," says Dr. Anil Katyal, an ENT surgeon who practices alongside six other surgeons.

Like his colleagues, he sees patients in his community clinic and at the hospital, which offers otolaryngology surgeries around the clock. Humber's team often performs thyroid, parathyroid and neck tumour surgeries, plus procedures to treat hearing, balance and voice problems.

Because it offers such a wide range of surgeries, Humber also serves as a teaching hospital, mainly for University of Toronto medical students going through their ENT rotations, says Dr. Katyal.

### TREATING KIDS CLOSE TO HOME

While many centres focus on adult-related ENT issues, the program also offers paediatric services, including tonsil and adenoid removal, myringotomy tubes, and surgery for sleep apnea in babies and children to name a few procedures performed.

The group includes top physicians in paediatric subspecialties, but it's also backed by a strong support staff, says surgeon Dr. Raewyn Seaberg. "We have a good team here that includes paediatric



Dr. Raewyn Seaberg  
Surgeon, Department  
of Otolaryngology



Dr. Anil Katyal  
Otolaryngologist

nurses both in the perioperative environment and on the in-patient floor," she says, which means kids in need of surgery in the community can get the same level of care closer to home. "It's a huge difference to not have everybody travel downtown for care."

### INNOVATIVE TECH

It helps that Humber is investing in innovative ENT-related technologies. Over the last year, for instance, the group has been offering intraoperative parathyroid monitoring, which helps with the removal of diseased parathyroid glands. The testing of hormones in real time – which requires the surgical team to sync up with the lab – allows surgeons to find out

if they've gotten all the cancerous glands while the procedure is still going on.

"You want to remove only the ones that are diseased," says Dr. Seaberg, adding that the parathyroid impacts the bones, as well as the kidney and the heart, so it's best to have as much of your body's natural hormones intact as possible.

### REDUCING COMPLICATIONS

The department is also investing in an image-guided system for sinus surgery. "I couldn't believe it when I used it as part of a trial. I thought I could see everything well, but this is like night and day," says Dr. Seaberg, who notes the nasal cavity is a very small space to work in, and better imaging makes a big difference.

Such investments – more are planned, including a dye system to help surgeons locate parathyroid glands, which are tricky to find – lead to more efficient surgeries with a smaller margin for error. "The better your surgeries, the less complications there are; that's good for everyone," says Dr. Seaberg. Safer care – closer to home. ♦

### CLINICAL DETERIORATION

This tile alerts care teams to subtle changes in patients' conditions in real time to support early intervention. An algorithm analyzes patients' blood oxygenation, temperature, heart rate and level of consciousness to spot early signs of complications, such as post-operative bleeding and sepsis. Since its implementation, Humber has seen a 45 per cent reduction in code blues and a 10 per cent drop in sepsis mortality across the hospital.



From the top down:  
Dr. Steven MacLellan,  
Dr. Chloe McAlister,  
Dr. Herpreet Sohi,  
Dr. Alexander Iskander,  
Dr. Melinda Maggisano,  
Dr. Joseph Sadek,  
Dr. Lazar Klein,  
Dr. David Starr,  
Dr. Quoc Huynh,  
Dr. Jensen Tan





# TINY INCISIONS CRITICAL SURGERY

Surgery and recovery that's as safe and speedy as possible. That's what Humber brings to the operating table by pushing the limits of keyhole techniques.

*By Wendy Haaf*

**T**he status quo is never good enough for Humber River Health's Department of General Surgery. By putting innovation at the core of everything they do, they're constantly pushing the envelope to improve the quality and efficiency of the care they deliver to patients. At the same time, "the hospital administration has been behind us all the way every time we've tried to do something new," says Dr. Lazar Klein, one of Humber's general surgeons. And as a result, Humber has some of the lowest surgical wait times in the GTA, despite being its busiest acute care centre.

Despite the name, general surgery itself

is actually a specialty, and its practitioners not only treat a wide range of conditions (including diseases of the digestive tract, abdominal organs, breast and skin), they also care for patients before and after surgery. Humber's general surgeons sub-specialize even further, largely focusing on using "keyhole" techniques rather than large incisions to radically reduce patients' pain and their length of stay in hospital.

Humber's renowned bariatric surgery program – the first non-U.S. institution to be accredited by the American College of Bariatric Surgery as a Centre of Excellence – is a case in point. When Dr. Klein was originally recruited to


expand the minimally invasive surgery program, he started with this operation. At the time, only one surgeon in Canada was performing laparoscopic bariatric surgery, inserting tiny instruments mounted on long, thin arms through very small incisions while viewing the surgical field via video.

Many patients with obesity were viewed as unsuitable candidates for the then-standard operation due to a relatively high risk of complications such as blood clots and infection of the large incision. Those who did undergo open surgery went into the operating room with an IV, and came out with six tubes, including a catheter in the lower back to deliver potent opioid pain medications, explains Dr. Klein. Not only does this type of pain control require extra nursing care, but patients also had to be monitored in hospital for six to eight days.

"Now, they leave the OR with no tubes other than an IV, and most of our patients go home the next day on plain Tylenol," he adds.

## LEADERS IN LAPAROSCOPY

Dr. Klein and his colleagues have made similar strides in other types of surgeries,



# A CULTURE OF COLLABORATION AND LEARNING IS ANOTHER MAJOR CONTRIBUTOR TO THE TEAM'S ENVIABLE TRACK RECORD.

too. “We’re able to remove 95 to 99 per cent of colon cancers through these tiny incisions,” notes general surgeon Dr. Melinda Maggisano.

The general surgery team also helped bring an operation for difficult-to-treat rectal cancers to Canada. Known as transanal total mesorectal excision (TATME), it’s designed to preserve intestinal function, so people don’t end up with a permanent colostomy, which is a special opening for stool to leave the body via the abdomen.

Reconstructive surgery to treat giant abdominal wall hernias, which cause a disfiguring, mobility-limiting bulge in the abdomen, is another of the Department of General Surgery’s success stories. “These people are often afraid to go out in public, and a lot of times they go to multiple centres and get turned down [for surgery] because it’s pretty complicated,” notes Dr. Quoc Huynh, the Division Head of General Surgery at Humber. Drs. Steven MacLellan and Jensen Tan also lead robot-assisted approaches to complex hernia operations.

“The techniques for that operation have changed dramatically, and we’ve been right at the forefront,” adds Dr. Klein, noting that there’s a high patient satisfaction rate for these operations because they can dramatically improve their quality of life. Last year, Drs. Klein and Huynh took robot-assisted surgery to a new level, expanding it to patients with rectal cancer, thereby improving access and visualization in the abdomen. Innovation in general surgery at Humber is a quest for continuous improvement in surgical techniques, patient outcomes and experience.

But adopting the latest laparoscopic and robotic techniques is far from the

only factor that has gone into improving efficiency and patient safety, helping establish Humber as a leading centre for general surgery.

## **SUPERB CARE SYNCHRONIZATION**

Patient education and carefully planned care pathways for each specific type of surgery play a key role in getting patients in and out of hospital as quickly as possible. “If you give patients realistic expectations, you can minimize the amount of pain medication they require,” notes Dr. Huynh. He also points to Humber’s enhanced recovery after surgery (ERAS) protocols, which get patients home sooner. For example, following bowel surgery, “we encourage people to eat and mobilize right away, which minimizes any drains and tubes,” Dr. Huynh explains.

Since protocols are specific to each type of operation, the surgical team has each procedure down to an art, according to Dr. Maggisano. “Nurses and physiotherapists are trained on what to expect and what to do from a post-operative perspective. It’s not just us as surgeons, but everybody working together that allows us to do a high volume of quality work.”

A culture of collaboration and learning is yet another major contributor to the team’s enviable track record. “If you’re in the middle of a challenging case, colleagues offer help, support and guidance,” says Dr. Maggisano. “That’s very different from other places I trained.”

It’s innovations like these – whether they’re procedure-based or technology-driven – that make Humber the hospital of choice for many of its medical professionals, including Dr. Maggisano. “I would send a family member or anyone I cared about here in a heartbeat.”+

# NURTURING NEXT- GENERATION SURGEONS

Humber River Health’s reputation for excellence in education for general surgery can be traced back to Dr. John Hagen. A pioneer in laparoscopic surgery who recently stepped back from OR work after 37 years of practice, Dr. Hagen has received numerous awards. The most prestigious, for which he was selected out of a field of more than 10,000 deserving nominees, was the 2014 Mentor of the Year Award – Region 3 (Ontario and Nunavut) from the Royal College of Physicians and Surgeons of Canada.

“That was quite an honour,” Dr. Hagen says of the accolade, which recognizes those who have had a significant impact on the career development of students, residents or fellows, in addition to being excellent role models.

Still, Hagen is humble about these accomplishments. He credits the fact that Humber is a highly sought-after placement for residents and medical students due to its high volume of laparoscopic surgery. “We probably do more than anywhere else in the city,” he says.

However, Humber has now established the John Hagen Teaching Award, ensuring subsequent generations of physicians will remember his contributions as an exemplary teacher and mentor.

“It was a retirement gift to me,” he explains. “I was very touched by that. Last year, it went to Dr. Vincent Brienza, who is an amazing emergency room doctor. The residents and medical students all loved him.”



# Fixing facial deformities around the world

Dr. Marco Caminiti, a top oral and maxillofacial surgeon, takes his expertise to Ethiopia.

By Glynis Ratcliffe

**D**r. Marco Caminiti may not have MacGyver's blond locks, but the Humber River Health surgeon has the same ingenuity as the '80s action star. As the head of Humber's Department of Oral and Maxillofacial Surgery – which specializes in facial deformity correction, such as fixing cleft lips and palates and improving jaw function – Dr. Caminiti spends much of his time taking apart and reconstructing the bones in patients' faces. Generally, that involves removing part or all of the jaw and replacing it with a metal plate, both of which require tools like drills, screws and saws. "I'm cutting bone, [metal] plates and screws – I'm often pulling a MacGyver," Dr. Caminiti explains.

Whether it's correcting a cleft lip and palate (a split or opening in a baby's upper lip and mouth) or a hemifacial microsomia (a condition where one side of the face is underdeveloped), Dr. Caminiti's specialty is unique enough that some parts of the world – and even areas in Canada – don't have access to physicians like him. It's why he makes quarterly trips to smaller cities in northern Ontario like Thunder Bay and Sault Ste. Marie, as well as annual trips to Addis Ababa, Ethiopia, to perform tricky surgeries and train residents and fellows to follow in his footsteps.

Usually, Humber residents accompany him on his northern Ontario trips, spending a day or two providing

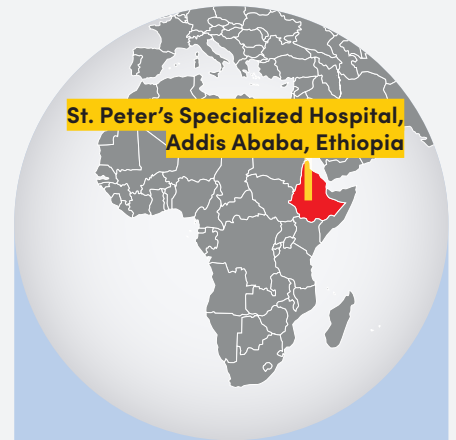


Dr. Marco Caminiti  
Division Head, Oral Surgery

pre- and post-surgery consultations to patients who can't travel to Toronto. In Ethiopia, Dr. Caminiti performs surgeries and also lectures and trains local residents from Addis Ababa University for two weeks as part of the Toronto Addis Ababa Academic Collaboration (TAAAC), a partnership with the University of Toronto and Face the Future Foundation. "They get a ton of trauma and acute injuries, which local doctors are very good at," he says. "But when it comes to reconstruction and deformity correction, they don't have good mentorship – our goal is to provide that guidance."

It's in Addis Ababa where Dr. Caminiti has faced scenarios that involve the type of quick thinking and problem-solving MacGyver was famous for. In one case, a young woman with a large tumour in her jaw needed reconstructive surgery using a stainless steel plate, a metal that's notoriously hard to drill and cut through. "The hospital doesn't supply the metal plates," he notes. "The patients have to get it themselves."

Unable to cut the plate with the tools he had, Dr. Caminiti asked a resident to borrow a hacksaw from the construction crew working in the hospital. When even the hacksaw couldn't cut through the metal, an idea struck him. "I remembered as we were driving to the hospital, they were laying pipe on the roads," he explains. "So I



## 123M+

Ethiopia's population



## 250

Current number of dentists in Ethiopia

got them to go out to the construction crew and get me the pipe grinder."

The new tool was perfect for the job, but the electrical cord didn't fit the hospital plug. Undeterred by the challenge, Dr. Caminiti stripped the cord and manually connected it to the hospital's power, successfully completing the surgery.

While the surgeries are the most dramatic part of his work, whether he's at Humber, in Thunder Bay or Addis Ababa, it's ultimately the residents – and the idea of helping people to help others – that keep him going. "You need six hands to do these types of surgeries," he says. "I'm teaching them, and on the flip side, I can't do it without them." ♦



# Pain prevention

Humber's innovative pain management programs are preventing long-term, post-surgery opioid abuse.

*By Michele Sponagle*

**O**n the list of painful operations one can recover from, joint replacement surgery is near the top. It can take weeks for all of the swelling, inflammation and bruising to subside, which makes doing daily tasks nearly impossible. Naturally, many physicians prescribe pain medications to help their patients feel more comfortable, but that comes with its own challenge: potential opioid dependence. One McGill University study found that six per cent of surgical patients become opioid users post-surgery, while 70 per cent of unused tablets are at risk of being sold to others.

Physicians across the globe are trying to find new ways to mitigate pain without the use of medications, to varying degrees of success. However, there is one newer approach that looks promising – the Continuous Outpatient Interscalene Nerve Block (COIN). The program, a first in Canada and developed at Humber River Health in 2018, uses a nerve-blocking local anaesthetic to numb post-shoulder surgery pain.

With shoulder replacement surgery, for instance, a catheter is inserted just above the joint before surgery, which then administers the nerve-blocking medication continuously for three days. Patients are discharged the same day with the catheter still attached, with minimal pain and without opioids. The anaesthesiologist calls the patient daily to ensure everything is in working order, and at the end of the three days

when the nerve block is finished, it can be removed at home, without a follow-up appointment.

Working with orthopaedic surgeons, the department also developed blister packs to organize oral medications, like anti-inflammatories, into separate capsules to help patients manage their recovery at home. “We were the first in the GTA to use nerve blocks to facilitate same-day discharges,” says Dr. Joseph Koval, Humber’s Chief of Anaesthesia. “They provide excellent pain control post-surgery. Once the catheter is removed, patients can manage with just oral medications.”

Dr. Kyle Waldman, an anaesthesiologist at Humber, saw one patient who, under a different physician’s care, became addicted to opioids after a shoulder replacement surgery. The patient, who came to Humber for a second surgery, was nervous about potentially relapsing. Dr. Waldman alleviated the patient’s fears after speaking with him about COIN.

“Using COIN fully transformed the experience for this patient,” he explains. “He did not use one milligram of

opioids after his surgery. COIN really provides the best of both worlds for patients – getting the top-line medical care with the benefit of recovering comfortably at home.”

Thanks to the innovation of COIN, only 20 to 30 per cent of Humber patients are now using opioids to manage pain one month after surgery, compared to the 80 to 90 per cent of patients who typically need medication after surgery, according to provincial data.

Three years after the introduction of COIN, the Department of Anaesthesia created SKiP, a similar program but for those undergoing knee replacement surgery. Like COIN, it delivers a nerve-blocking local anaesthetic through a catheter, says Dr. Koval.

Given that according to the Canadian Centre on Substance Abuse, Canada is the second-largest consumer of opioids per capita in the world, Humber’s pain mitigation measures will play a crucial role in stopping post-surgical opioid dependence. “These really reduce the need for narcotics,” says Dr. Koval. “And that allows patients to have a much better recovery.” ♦



**Dr. Joseph Koval**  
Chief of Anaesthesia



**Dr. Kyle Waldman**  
Anaesthesiologist



# Catching cancer early

State-of-the-art diagnostics mean shorter wait times for treatment for patients with gastrointestinal cancers.

By Jane Langille



Dr. Sinziana Avramescu  
Anaesthesiologist

## Adopting greener practices in anaesthesia

Finding eco-friendly solutions is an ongoing hospital-wide endeavour at Humber River Health. For the Department of Anaesthesia, it means reducing the use of inhalation gasses containing volatile organic compounds, which contribute to global warming, and cutting back on single-use plastics and recycling IV tubing to lessen the amount of material that ends up in landfill sites.

"We absolutely have to do as much as we can to be more environmentally friendly," says anaesthesiologist Dr. Sinziana Avramescu. "There's a real opportunity for us to be a leader in this area. Humber participates in the Planetary Health Group and continues to spearhead sustainability initiatives with an appetite to expand these programs beyond the operating room. I think we're already ahead of the curve."

**T**ime is of the essence when it comes to a pancreatic cancer diagnosis. According to the Canadian Cancer Society, the disease has a five-year survival rate of about 10 per cent, the lowest of all cancer types. It's also expected to be the third-leading cause of cancer deaths in Canada in 2022. But despite how devastating this disease can be, most people don't realize that if it's caught and treated early enough, people can live a long, cancer-free life.

Johns Hopkins Medicine reports that up to 10 per cent of patients who receive an early diagnosis can become disease-free, while patients diagnosed before the tumour grows or spreads live for another three to three and a half years, on average. "At Humber, we're trying to shorten time to treatment to give patients the best chance for a positive outcome," says Dr. Ilan Medad. "Patients' first questions are often 'What's next?' and 'When can more tests be scheduled?' when they learn they have pancreatic cancer. I tell them, 'I understand you're worried, but I'm your quarterback.'"

Catching pancreatic cancer early has long been a priority for Humber and its gastroenterology department, which treats all kinds of gastrointestinal issues, such as celiac disease, colorectal cancer, among other cancers, inflammations and more for both children and adults. With pancreatic cancer specifically, the department has implemented innovative technologies to help its surgeons detect the extent of the disease as quickly as possible.

Endoscopic ultrasound (EUS), for instance, is a minimally invasive test that determines cancer stage and guides treatment decisions. A gastroenterologist inserts a thin, flexible tube through the throat and stomach to the pancreas to view a pancreatic tumour. High-frequency

sound waves visualize the size and depth of the tumour and whether the cancer has spread to lymph nodes. EUS, first used in Ontario by Humber doctors, also allows the physician to take small samples of affected lymph nodes for lab testing. Tiny tumours can be removed with surgery alone, while more invasive cancer may require chemotherapy, targeted therapy or radiation – before or after surgery.

Another advanced test, called endoscopic retrograde cholangiopancreatography (ERCP), can be performed together with EUS. It allows the doctor to see small bile ducts in the pancreas and even insert a stent to open a blockage caused by a tumour to restore flow. Humber was the first hospital in Canada to pioneer ERCP, and even today, most hospitals don't use these two procedures to diagnose pancreatic cancer, notes Dr. David Fishbein, Chief of the Department of Medicine at Humber. "These technologies, together with the collaboration between our medical endoscopists and surgeons, significantly shorten the time between diagnosis and treatment for our patients," he explains.

As important as these technologies are for speeding up time to treatment, Humber's multidisciplinary approach also helps. As soon as a diagnosis occurs, Dr. Medad consults with other specialists on the digestive care team to co-ordinate the next steps. "Humber patients are not just referrals sitting in an inbox," he says. "I walk across the hall or text colleagues, sharing digital images so they can plan follow-up diagnostic tests for determining the best treatment strategy. As a result, patients are typically scheduled for follow-up tests and consultations within a week, sometimes even the same day."

"By speeding up next steps, patients with pancreatic cancer get treated much sooner," he adds. "That goes a long way to alleviating patients' worries." ♦



Dr. Ilan Medad  
Physician Director,  
Endoscopy &  
Gastroenterology



ORTHOPAEDICS

LEA



PHOTOGRAPHY: JOHN WEIGHT



# AP OF FAITH

National Ballet of Canada dancer Rebekah Rimsay was certain her hip injury would end her career. Then she met with surgeons at Humber River Health.

By Glynis Ratcliffe

**A**s far back as she can remember, Rebekah Rimsay's entire life was ballet. From the age of five, when she accompanied her mother to ballet performances, to age 11, when she beat out thousands of other children for a place in Canada's National Ballet School (NBS), to age 18, when she was hired directly into the National Ballet of Canada company after graduating from NBS, dancing has been her life for the last 30 years. "I think it's the magic, really," Rimsay says. "I love the magical aspect of these stories and I love the human element as well. So it really was about telling stories and what dance can communicate."

Rimsay, who has been dancing with the National Ballet since 1990 and has won several awards, has been rewarded for her hard work, moving from corps de ballet to second soloist to first soloist to principal character artist, which has been her position for the last 10 years. She has

performed lead roles in everything from *The Sleeping Beauty* to *Washington Square*. Being part of the ballet "has been a dream come true," she says.

Like most professional dancers, Rimsay has experienced her share of injuries – "ankle injuries, torn ligaments, wear and tear," she reveals, adding that she's had a litany of surgeries to fix her many physical ailments. Each time, though, she's quickly bounced back. That is until November 2019, when one wrong move during a performance of *The Nutcracker* nearly ended her career.

## A DIFFERENT KIND OF ATHLETE

Ballet dancers are notoriously hard on their bodies, spending six to eight hours a day in rehearsals and performing eight times a week when a show finally opens. It's physically demanding artistic work that often requires multiple operations for various injuries over the course of a single career. According to one study, between 67 and 95 per cent of dancers in professional ballet companies suffer at least one injury annually.

"Ballet is not a contact sport," explains Dr. Sebastian Rodriguez-Elizalde, one of Humber River Health's orthopaedic surgeons, "but the toll it takes on the body, despite the incredible athleticism of the people dancing, there is a lot of pressure on the ankles, the feet, and on the hips."

When Rimsay twisted slightly in the midst of a routine move during that fateful *Nutcracker* performance, she initially felt nothing, but the following morning the pain in her right hip was excruciating. "I thought I had torn my psoas," she says. A visit to her physiotherapist was inconclusive, and soon she and the ballet company

were going on tour. Rimsay taped her entire pelvis with athletic tape and relied on prescription anti-inflammatories to continue performing. It was almost a relief when the pandemic hit and she was forced to stop dancing, she says.

## THE POINT OF NO RETURN ... TO DANCE

Despite several months of steroid injections, cortisone treatments and physiotherapy, she and her healthcare team were no closer to managing the problem and the pain was simply too much to bear. Even simple everyday activities like picking up her then two-year-old son's Lego left her in agony. "There were Legos everywhere," she says. "I had to buy a sweeper so I wouldn't have to bend over."

Soon, Rimsay began to wonder if her career as a ballerina might be over. "I knew the writing was on the wall for me," she explains. "I was reaching out to colleagues, trying to figure out what my prospects were in terms of my employment. I knew I couldn't dance the way I was."

After researching her options, which included experimental injections and hip joint resurfacing, Rimsay's sports medicine doctor referred her to Dr. Rodriguez-Elizalde for a consult.

"She had basically complete bone-on-bone arthritis in her hips," Dr. Rodriguez-Elizalde says, going on to explain that the hyaline cartilage that normally lines the ball-joint socket of the hip and acts as a kind of Teflon to protect the bones had worn away completely. If she hoped to return to even a normal range of motion without pain, she would require a hip replacement.

"He could see how nervous I was," she

says. “It was terrifying to read about the possibility of hip dislocation [post-surgery], so I asked a lot of questions about the limitations of my new hip, and thankfully, there were very few restrictions.”

During that first appointment at Humber, Rimsay went as far as to demonstrate some of the positions she would need to do if she were to return to dancing, certain the surgeon would say no to at least a few of them. He nodded affirmatively after each one, to her surprise. “It was one of those funny moments where I remember thinking, ‘Oh my god, I just did the choreography for Baba from *The Nutcracker* in my doctor’s office,’” she says, laughing.

“Rebekah is pretty young and not someone you typically think of as needing a hip replacement, but her X-ray showed significant degeneration in her hips,” Dr. Rodriguez-Elizalde explains. “Being a ballet dancer, the range of motion necessary after surgery that she was hoping for far exceeded anything that most of us would need.”

#### A DIFFERENT APPROACH TO JOINT REPLACEMENT

Ultimately, she put her trust in Dr. Rodriguez-Elizalde and the Humber team, opting for a total hip replacement. The entire process, from being admitted to getting discharged, took just one day, with the surgery itself lasting an hour.

Rimsay was right to trust their expertise. Humber was the first hospital in the Greater Toronto Area to utilize a surgical hip replacement technique that leads to faster recovery times and less post-operative pain – the direct anterior hip replacement. While surgeons can approach the hip joint from the side, back or front and perform the surgery successfully, the front or “anterior approach,” allows the surgeon to avoid cutting through muscles and tendons by going between the muscle layers to get to the hip.

In order to perform this type of hip replacement, Dr. Rodriguez-Elizalde used the Hana table, a patient table designed specifically for anterior hip replacements. Unlike normal operating tables, the Hana splits into two smaller leg supports in the middle, which can be raised, lowered and rotated in any direction. The patient’s legs and feet are secured, and the ability to move them to better expose the hip joint makes the surgery far easier than performing it on a regular table. “Basically, it facilitates the surgery from the point of view of being able to get the right surgical exposure so you can see what you’re doing,” Dr. Rodriguez-Elizalde explains.

In addition, major advancements by Humber’s Department of Anaesthesia have allowed a more targeted

approach to pain management both during and after surgery, using a spinal anaesthetic similar to an epidural in combination with nerve blocks placed around the hip. Now, patients have a catheter – a tiny tube that goes around the nerve – that administers local anaesthetic continuously for three days. “This helps bridge that intense pain period,” notes Dr. Justin Chang, another orthopaedic surgeon at Humber.

The nerve blocks helped Rimsay, who had her surgery in June 2021, not only get home the same day, but also get up and walking under a physiotherapist’s supervision several hours after her hip replacement; she even climbed a set of stairs to test her range of motion.

Maggy Duong, an Orthopaedic Care Navigator at Humber, was there to help Rimsay navigate her surgical journey, co-ordinating care with the hospital’s interdisciplinary team and providing resources and education to ensure a smooth recovery and transition from hospital to home. “I essentially work closely with anyone that is within the patient’s circle of care,” Duong explains.



Dr. Sebastian Rodriguez-Elizalde  
Orthopaedic Surgeon



Dr. Justin Chang  
Orthopaedic Surgeon



Dr. John Townley  
Head, Division of Orthopaedics

## “AT HUMBER,

we are all about helping patients get back on their feet and back to their lives, providing comprehensive sport, upper and lower extremity foot and ankle care. We already run one of the largest and busiest orthopaedic surgery departments in Ontario, now we’re using our technology and innovative surgical techniques to challenge the status quo to deliver faster and cost-effective solutions that improve patient experience and outcomes. These efforts extend well beyond the operating room. Patients with moderate to severe hip/knee pain or shoulder pathology can be referred by their family physician to our Rapid Access Clinic, and our orthopaedic program sees patients with joint, bone and soft tissue injuries. We are doing our part in reducing the surgical backlog to provide the best care in the timeliest fashion.”

#### BACK TO THE STAGE

After two weeks of initial recovery, Rimsay’s pain subsided, and for the first time in a long time, she let herself think about a potential return to dancing. “Right away I had really good range of motion. I couldn’t believe it,” she says. “I thought I would be stiff and I really wasn’t. I was surprised.”

Three months post-surgery, she joined rehearsals as the National Ballet prepared to re-open its doors for performances in fall 2021. Ironically, her first role back was the same one in which she injured her hip – Baba, in *The Nutcracker*. Dr. Rodriguez-Elizalde made sure to attend one of Rimsay’s performances. “One of the benefits of being an orthopaedic surgeon is you get to restore quality of life,” he says. “It’s always nice to see patients do well and get back to the things that they want to do. It’s incredibly rewarding.”

Now, Rimsay is back to her former dancing self, albeit with a newfound appreciation for the little things. “Every day, I’m grateful – to Dr. Rodriguez, to science, to medicine and to Humber,” she says.

“Pure gratitude all the time. Even when I’m picking up my son’s Legos.” ♦





# Blasting stones (and tumours) to bits

Humber's arsenal of lights and lasers is making complex urology procedures faster to finish and less painful for patients.

By Bryan Borzykowski

**D**r. Kevin Leung loves talking about lasers. It's not that he's a science fiction fan, the Humber River Health surgeon uses them to blast kidney stones and prostate tissue into oblivion. "We've got this green laser," he says, with a hint of excitement in his voice. "We essentially use it to vaporize tissue."

Over the past several years, lasers and other high-tech robotic innovations have become staples in urology departments across the globe. They're typically used to zap cancerous tumours, shrink enlarged prostates and shatter painful stones, but no other hospital in Canada uses these tools in quite the same way as Humber. Whether it's green lasers, blue energy-emitting lights or devices with *Star Wars*-like names – the Holmium Laser, for instance – all have dramatically changed how Humber treats prostate-related problems. "Most other places that have these robots are only limited to doing prostate cancer," says Dr. Leung,

who, unlike most surgeons, went to school specifically to learn about robotics. "But we can do anything you can think of."

## CUTTING-EDGE TECH

Humber's embraced urology robots because they allow surgeons to conduct complicated surgeries in sensitive areas of the body more precisely and without making painful incisions. The GreenLight Laser, for instance, has made it much easier for the hospital's physicians to treat enlarged prostates, which left untreated can choke off blood flow to the bladder. Doctors typically fix this issue by going into the urethra where they slowly shave away part of the prostate. That process often causes bleeding and uncomfortable overnight stays at the hospital. With the GreenLight Laser, the tissue gets vaporized – there's no bleeding and patients can go home the same day. "It's always been useful to do outpatient procedures, but it's particularly useful now with the strain on the system," says Dr. Luke Fazio, Humber's Chief of Urology.

The hospital was also the first centre in Canada to employ Blue Light Cystoscopy, an innovative technology that makes it easier for doctors to detect cancerous blad-

der tumours. Previously, physicians had used a regular light to look into the bladder, but they could only see larger tumours. Now, doctors insert a liquid into a patient's bladder, and then turn on a blue light, which makes everything in the bladder blue except for the cancer, which turns red. "It's like a black light on *CSI*," says Dr. Fazio.

Then there's the Holmium Laser, which doesn't have a colour, but uses high-intensity energy to turn kidney stones into dust.

Because it can target very specific points, it's used to eliminate larger stones that can't naturally pass through the urethra. Not only does it eliminate the need for surgery, but patients can pass that dust without any pain, says Dr. Leung. Humber is currently adding to their lineup of state-of-the-art lasers to treat stones, benign prostatic hyperplasia (BPH) and upper tract cancers.

For Dr. Leung, having all of these devices at his disposal means he can confidently provide the best care for his patients, he says, while Humber patients can get treated in whichever way suits their situation. "We can tell patients we are trained to do the most cutting-edge technological techniques," he says. "Other places only use robotics for traditional open surgery, but we can give patients what they want and what they need." ♦



Dr. Luke Fazio  
Chief of Urology



Dr. Kevin Leung  
Surgeon



# A family affair

How Humber's Paediatric surgery unit works together to help kids and their families through surgery.

By Diane Peters

Camaya Francois, decked out in her favourite jammies, is drawing a picture of “rainbow water” at a low table in the surgery wing of Humber River Health. This curious three-year-old hasn’t had anything to eat or drink since last night. “I didn’t eat this morning either. Too many nerves,” admits her mother, Latoya Arthur. When Camaya was one, she had an infected dermoid cyst removed – they’re common in babies and often need to be removed if there’s a risk of infection spreading. She’s now having a second procedure to remove any remaining cyst wall and inject the area with scar-reducing medicine.

When the family arrived at 10 a.m., Alex Christofides, a child life specialist at Humber River Health, was there to greet them. She’s now sitting beside Camaya in the pre-op room where mother and daughter have been since their arrival. Just around the corner stands Pepper, a kid-sized humanoid robot who can explain surgery details, play games and is a pretty good dancer, while a mini Tesla is standing by for Camaya to drive to the operating room (OR).

This is not your typical pre-op wait for families. It’s all part of Humber’s unique Child Life Program, which Christofides and two other trained professionals deliver to every child who’s having surgery and their family. It’s a start-to-finish program that helps kids and patients feel informed and empowered during what can be a scary process – whether the surgery is for something life-threatening or a routine procedure.

“I’m going to show you all the things that are going to happen today,” says Christofides, pulling out a Curious George stuffie. Camaya gamely touches and tries on devices such as an anaesthesia mask and a pulse oximeter so she can learn what will go on her body when she arrives in the OR and what she’ll see when she wakes up. (George assists as a model.) The preschooler chooses to be asleep for the surgery – “Everyone picks that!” says Christofides – and have the gas in her mask flavoured with strawberry. She also opts to drive the kid-sized Tesla, instead of pedalling a trike or being carried, among other choices – most kids leap at this option, too. “Can you do all the things you need to do today?” Christofides asks Camaya. She nods.

After meeting the surgeon and the anaesthesiologist, Camaya is ready for her drive to the OR. When she reaches the room, the door opens and everything changes: the OR is huge, loud, chilly and filled with machines.

Latoya must tell herself to breathe to stay calm while she and Christofides help Camaya onto the surgical bed. As Latoya wraps her hands around her daughter’s head in a process Christofides has taught her called Hug and Hold, Camaya allows her mask to be put on. The two women utter slow and comforting words – Latoya was given guidance around how to do this – while two little brown eyes start to flutter and eventually close.

“This whole process really helps you understand what is going on,” says



Children undergoing surgery at Humber can drive their own pint-sized Tesla into the OR.


## Collaborating for better care

In 2018, Humber came together with SickKids to offer paediatric general surgery much closer to home. This partnership allows surgeons from SickKids to use Humber’s operating rooms for everything from complex gastrointestinal surgery to, most recently, paediatric urology. Not only does this reduce travel time for families in the community, it helps tackle the paediatric surgery backlog in the Greater Toronto Area.

Humber is also part of the Kids Health Alliance, a network that aims to advance excellence and expertise in paediatric healthcare in Ontario.



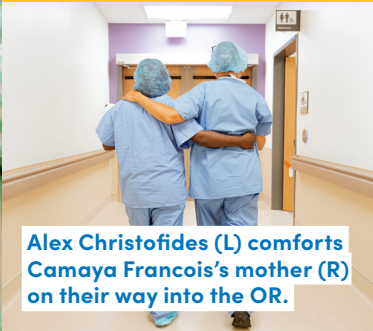





Pepper the humanoid robot interacts with children to teach them about their surgery, play games and even dance.

**"We have the whole spectrum of ages that can be quite anxious going into procedures."**

DR. LARA HART



Alex Christofides (L) comforts Camaya Francois's mother (R) on their way into the OR.



Camaya Francois burns off her nervous energy by wheeling around the hospital before going into the OR.

Latoya, who's grateful to have information and coaching before the surgery and to be allowed in both the OR and the recovery room mere minutes after her daughter wakes up – plus the task of Hug and Hold. "It's better to have a job instead of just standing there," she says.

The time Christofides and her colleagues spend supporting families leads to markedly different outcomes, says Dr. Sharifa Himidan, the surgeon who operated on Camaya. Paediatric surgeries at other sites are often cancelled because kids refuse anaesthetic or parents panic when they can't go into the OR. Humber's program, which began in 1998, but has been refined over the years, allows for more integration between child life specialists, surgeons and anaesthesiologists – the latter now use gas instead of an IV to initially put kids to sleep as a result of getting feedback from the Child Life Program – plus Pepper joined the team in 2016. Other centres have child life specialists, but at Humber, every eligible patient gets time with one, and they use medical teaching tools to let kids touch equipment in advance, plus they explain procedures in detail, not just amuse kids and help them with stress control. Since launch, Humber has had no families cancel surgery on the day for emotional reasons.

"You'd think it'd be only the younger kids," says Dr. Lara Hart, paediatric gastroenterologist at Humber. "We have the whole spectrum of ages that can be quite anxious going into procedures." The Child Life Program is offered for kids under 18 and adults with developmental disabilities. In the case of the latter, Dr. Himidan, who performs general surgery at other hospitals, had a patient a few years ago who had a hernia. After three failed tries to fix it, she brought him to Humber. "He didn't blink," she recalls.

"It's about giving care that doesn't lead to trauma," says Dr. Himidan, who's also seen surgeries upset families deeply, with the effects lingering for years. "It makes my job a lot easier," she adds, as the complete care offered by the program supports everyone before and during the healing process afterwards.

After her procedure, Camaya is sent home to rest with her mom, dad and two siblings. Her "boo-boo," she says, has now been "fixed." Latoya says finding so much support at Humber has made getting through the surgery so much easier. "You never have a question that no one can answer. Everyone is so very helpful." ♦



# We are innovators

A long-standing commitment to technological advancement is dramatically improving patient outcomes at Humber.

*By Anna Sharratt*

➔ Maureen Spitz can now relax after minimally invasive robotic surgery helped treat a debilitating kidney infection.





PHOTOGRAPHY: COLIN SNYED (MAUREEN SPITZ), REGINA GARCIA (DR. QUOC HUYNH)

**M**aureen Spitz had suffered from recurring kidney infections for years when a doctor urged her to see a specialist. “I would have four or five extremely painful infections a year,” says the 65-year-old Toronto retiree, episodes that led to chills and fatigue and required countless rounds of antibiotics. The constant cycle left Spitz frustrated and anxious. “It became a bigger and bigger problem as I got older,” she says.

After an MRI, Spitz was diagnosed with hydronephrosis, which prevents the kidney from draining urine, leading to swelling and possible kidney damage or failure. Her GP referred her to Dr. Luke Fazio, Humber River Health’s Chief of Urology. “We had a long discussion and he gave me the option of having the surgery or staying on antibiotics,” she recalls. By the end of their conversation, Spitz knew what decision she would make: take the surgery.

Not long ago, staying on meds and dealing with the pain might have been a preferred option. Surgery can be complicated and often requires a few days, if not weeks, of recovery at the hospital. Over the past several years, though, Humber’s invested in high-tech robots that enable physicians to conduct procedures without having to make large incisions. Small robotic hands, controlled by doctors, also allow for more accuracy and shorter surgery times. With these innovative tools, patients can go home, with minimal pain, on the day of their surgery.

“Robotics allows us to improve the care that we’re giving patients and it reduces the chances of open surgery,” says Dr. Andre LaRoche, Humber’s Chief of Obstetrics and Gynaecology and Director of the Maternal Child program. “It reduces the risk of complications as well, and it helps people get back to work faster.”

After Spitz’s physicians told her about Humber’s robotic program, and how minimally invasive surgery with a few days of bed rest would be her best bet, she knew she was making the right choice. Doctors performed a robot-assisted pyeloplasty, a surgery that repairs the area where the kidney joins the ureter, restoring the flow of urine. The procedure, which involved making five small incisions in her abdomen, took four hours to complete. Her kidney function returned to normal soon



**Dr. Quoc Huynh**  
Head, General  
Surgery



## ROBOTICS

after and now she's no longer hampered by any pain. "After the operation, it was wonderful," she says, adding that she can now travel without feeling anxious about coping with a debilitating kidney infection. "I don't have to worry anymore."

### BETTER OUTCOMES WITH ROBOTICS

Robotic surgeries are now the norm at Humber, which has invested heavily in all kinds of minimally invasive technologies. Thanks to these devices patients can get discharged from the hospital often after a day or two, allowing them to recover quickly at home. This is particularly relevant to the high-needs community Humber serves, which includes individuals who can't afford to be off work for weeks at a time. Because surgeries are shorter and people are quickly in and out of the hospital, those who struggle with access to care can now get medical help more readily thanks to faster turnarounds.

Minimally invasive surgeries also help prevent complications. Before robotics, 80 per cent of open surgeries required blood transfusions, says Dr. Jack Barkin, a surgeon who is one of the hospital's tech pioneers. Surgeons couldn't see every artery with their own eyes, resulting in some getting severed during the operation. With robotic surgeries allowing physicians to view what they're doing on a screen, blood transfusions are only needed in about one per cent of all cases. "In the last 10 years I have not had to transfuse one patient," he notes.

As well, because of reduced complications and the lack of large incisions, patients don't need heavy narcotics for pain relief. "They often just take a Tylenol," says Dr. Lazar Klein, a surgeon at Humber. This helps prevent post-surgery opioid addictions.

As Spitz quickly learned, having robotic surgery was the way to go. "I was in hospital from Friday to Sunday and then discharged," she says, adding that she had no complications during her six-week recovery at home. She no longer has to go in for checks on her kidney and isn't experiencing any more kidney infections.

Robotic surgery, in particular, was transformational in Spitz's case, says Dr. Fazio. "Maureen had an especially complex issue, and being able to use the robot was extremely helpful in terms of optimizing her outcome," he says. Spitz agrees, saying the robotics program improved her quality of life. "I would do robotics any time," she laughs.



## TRANSFORMATIONAL TECH

Robot-assisted surgery is helping both surgeons and patients at Humber.

One of the key tools in Humber's robotic arsenal is the da Vinci robot, which is named after the famous artist and engineer and his groundbreaking work studying human anatomy. Humber deployed the robot in 2012 – one of the first community hospitals to do so – and it's still one of just 29 used in Canada. "We are the innovators," says Dr. Barkin, adding that the da Vinci, which was the robot used in Spitz's operation, is most often used in urological, abdominal, gynaecological and orthopaedic procedures.

The imposing robot, which looks a bit like something out of a science fiction movie and is now in a newly upgraded operating room, has four arms that are controlled using a camera connected to a computer, allowing doctors to make very deft movements within the patient's body. For instance, the robot instantly allows Dr. Barkin to switch from one arm to another. "I can only turn my hand 90 degrees as a surgeon," he explains. "With robotic instruments, I can turn them 360 degrees in very small spaces."

At the same time, the robot's camera guides the surgeon

throughout the procedure, providing a 3D look inside. "There's a huge benefit to having the camera over the naked eye," adds Dr. Barkin. "It's much more magnified – a much more precise view."

Dr. Fazio agrees. "This is especially useful in pelvic and prostate surgery. It also allows us to suture and reconstruct tissue more accurately and rapidly," he says. "It's also helpful in partial nephrectomy procedures where the blood supply to the kidney has been clamped and repairing the kidney after tumour removal is time-sensitive."

Not only is da Vinci helping patients recover faster, but it's also put Humber on the map as a forward-thinking, tech-savvy centre, says Dr. Quoc Huynh, Head of General Surgery. "Humber has a long history of a commitment to innovation and technology, and it's still doing things that are currently on the forefront," he explains. "We were one of the first community service programs to have a robot and Humber continues to support us, wanting us to do more and push the frontier of what we can do to help patients."✦





The image shows the Intellijoint HIP robotic system, which consists of a large, white, circular overhead gantry with four robotic arms. Each arm is labeled with a number (1, 2, 3, 4) and has a surgical instrument attached. The system is mounted on a central vertical column. A blue arrow points from the text to the left side of the system.

### Intellijoint HIP

Added to Humber's robotic arsenal in 2022, the Intellijoint HIP is a surgical navigation system also used by the division of orthopaedics during a total hip replacement. Its precise measurements improve joint positioning and implant placement, which results in faster patient recovery times, better outcomes and shorter hospital stays.



The image shows the Da Vinci Xi robotic system, which features a large, white, circular overhead gantry with four robotic arms. Each arm is labeled with a number (1, 2, 3, 4) and has a surgical instrument attached. The system is mounted on a central vertical column. A blue arrow points from the text to the right side of the system.

### Da Vinci Xi

The latest model of the robotic surgical system allows for minimally invasive surgery across a wide range of operations, ensuring that patients at Humber get the best possible outcome and the lowest risk of complications. The robot can prevent two common surgical challenges that hinder surgeons: hand tremors and their inability to rotate 360 degrees within the body cavity. The precision of the robotic arms also prevents unnecessary cuts within the body, which protects organs, nerves, tissues and arteries.



The image shows the ROSA Knee System, which consists of a white robotic arm with a blue base and a blue screen. The arm is labeled 'ROSA' and has a surgical instrument attached. The system is mounted on a central vertical column. A blue arrow points from the text to the right side of the system.

### ROSA Knee System

Used during total knee replacement surgery by the orthopaedics team, ROSA helps during surgical planning and execution by combining enhanced imaging and robotically guided tools. The result is a more customized knee replacement for the patient, leading to fewer complications and a greater range of motion.





WOMEN'S HEALTH

# FROM BIRTH THROUGH THE AGES



Humber River Health's comprehensive OBGYN team takes women's healthcare to a new standard of excellence.

*By Elizabeth Chorney-Booth*

**A**nyone accessing gynaecological or obstetric care knows it can be a stressful experience. Discussing the details of menstruation, fibroids, infertility, menopause, and even a healthy and incident-free childbirth is still largely seen as taboo. Even when they do approach their family physician with concerns, women are often told their pain is just part of having a uterus or are shuttled off to unfamiliar specialists that can only be seen after a lengthy wait.

This culture of taboo and misunderstanding of reproductive health has caused countless people to suffer in silence as their quality of life deteriorates or life-threatening conditions are left untreated. This is not an acceptable scenario for the thoughtful team of OBGYNs at Humber River Health. Led by Dr. André LaRoche, Humber's Chief of Obstetrics and Gynaecology, the hospital's Women's Centre of Excellence (WCOE) allows patients to visit the same collaborative team for all their gynaecological needs, starting with treatment for heavy periods or contraception as youths, leading toward fertility treatments, childbirth and obstetrics, surgery for fibroids and other uterine issues, cancer screening, and eventually, health concerns related to menopause and post-menopause.

#### **LIFELONG OBGYN CARE**

Dr. LaRoche calls the WCOE "something that's continuously evolving and growing," but the basic idea is that by offering a one-stop-shop for OBGYN care, patients will save valuable time by not having to be constantly referred to specialists throughout the GTA. In addition, they will feel more at ease discussing various gynaecological issues in a comfortable and friendly setting, likely with a doctor they have already seen for contraception or obstetrics care. With 16 OBGYNs on deck, as well as a team of midwives and knowledgeable nurses and specialty physicians, Humber's aim is to address all of a patient's needs throughout life's various physical transitions.

"As the head of the department it was important to develop a well-rounded team that covers all our bases," Dr. LaRoche says. "We have people who are surgically strong, but also have a lot of people that do colposcopies. We have a menopause specialist, we have high-risk pregnancy specialists. We have all the little niche areas covered so that if one doctor can't perform what's needed, someone else on the team will be able to take care of it."

**16** ←  
**OBGYNS**  
**ON HAND**

**THE TEAM ALSO INCLUDES  
KNOWLEDGEABLE NURSES  
AND SPECIALTY PHYSICIANS.**

**18** ←  
**MIDWIVES**  
**AT THE READY**

# 4,000+

Babies are born at Humber every year.



## DELIVERING BABIES AND PEACE OF MIND

Many women's first point of access to the hospital system is through obstetrics and childbirth, and Humber and the WCOE do everything in their power to ensure that experience blossoms into a long-term hospital-patient relationship. Childbirth can be terrifying, even for patients who don't have any high-risk complications. Humber has earned a reputation as one of the safest and most comfortable hospitals to have a baby in all of Ontario. In fact, many expectant parents now intentionally seek out care at the hospital.

A patient's obstetrics journey may include visits with the Maternal Fetal Medicine Clinic, offered in partnership with St. Michael's Hospital, allowing them to access specialized high-risk pregnancy care right at Humber. Once it's time to deliver, Humber patients are all granted single-occupancy rooms (a rare luxury) at no extra cost, while obstetricians and nurses utilize the hospital's technology to keep full tabs on patients' and babies' vitals, which is part of what accounts for that stellar safety record. Post-birth, patients have access to lactation consultants, mental health services and a suite of outpatient services, should they become necessary.

"Our emphasis on patient safety and quality of care runs throughout the whole unit," says Dr. Lesley Hawkins, an OBGYN who has been with Humber since 2019. "We're able to take care of everything at Humber. Which is wonderful for patients since they don't have to leave their own community and can get all the care they need in the hospital they're familiar with."

## INNOVATIVE CARE

Procedures such as hysteroscopies may sound intimidating to some patients, but the team at Humber's WCOE makes the surgery as easy and comfortable as possible. Not to be confused with a hysterectomy, which is the removal of the uterus, a hysteroscopy is a procedure that entails inserting a thin tube equipped with a camera into the uterus through the vagina to investigate for fibroids, polyps and other irregularities.

With its weekly hysteroscopy clinic, an initiative that uses alternative locations, the doctors at the WCOE are able to not only evaluate the interior of the uterus, but actually remove abnormalities at the same time, something that typically requires invasive surgery and significant wait times. The WCOE's outpatient procedure is performed with only light sedation and most patients fully recover within 48 hours.

"The hysteroscopy suite is brand new, and is reducing wait times and making the patients very happy," says Dr. Grace Yeung, who was enticed to Humber in 2020 so she could work with the hospital's cutting-edge surgical tools. "It's also much more efficient in terms of cost. Humber has really become a leading example of a community hospital that can provide advanced-level care in a setting that's close to home."

# A NEW WAY TO TREAT UTERINE FIBROIDS



Uterine fibroids are the most common benign tumour in women, affecting

up to 70 per cent of women during their reproductive years. Although most patients with fibroids are asymptomatic, approximately 30 per cent become symptomatic, experiencing abnormal menstrual bleeding, pelvic pain and pressure, urinary problems and difficulty getting pregnant.

In the past, the most common approach to treatment has been a more invasive surgical removal of the uterus, referred to as a hysterectomy, or myo-

mectomy, removal of the fibroids.

Humber is one of two centres in Canada offering the Acessa ProVu system. It was designed to preserve healthy uterine tissue by delivering heat (radiofrequency) directly into a fibroid to destroy the proteins of the fibroid tissue. Once broken down into small fragments through coagulative necrosis, it is reabsorbed by the surrounding normal tissue, and the treated tissue softens and shrinks over time. As the procedure is minimally invasive and recovery pain is typically mild, narcotics are rarely used post-operatively and patients are able to return to normal function quickly.

Humber's Chief of Obstetrics and Gynaecology, Dr. Andre LaRoche, performed the first procedure in Ontario. "The Acessa ProVu is part of the technology that helps guide us and makes sure we are able to view, identify and specifically target uterine fibroids in a safe manner," explains Dr. LaRoche. "Humber is always looking to deliver innovative healthcare and be the frontrunner in advancing technology and services for our patients. When the Acessa ProVu system became available in Canada, Humber was quick to jump at the opportunity of being one of the first to offer this in the country."



## CURBING CANCER

The other “-oscopy” Humber’s OBGYN team deals with is colposcopy, an examination of the cervix and lower genital tract to diagnose and treat abnormalities found on routine pap smears. The hospital recently acquired a new CO2 laser to allow doctors to vaporize abnormal cells without affecting the healthy tissue surrounding the problem spot.

The WCOE also improves cancer outcomes through patient consistency – once a patient is in Humber’s system, it’s easier for OBGYNs to schedule routine screening and checkups. The doctors also have access to the hospital’s da Vinci surgical robot, which Drs. LaRoche and Yeung use to efficiently operate on uterine cancers as well as other surgeries for higher-risk patients, including those with an elevated BMI.

“The robotics allows patients with BMIs over 40 to access minimally invasive surgery that otherwise they would not be a candidate for,” says Dr. Yeung. “This technology allows them to be treated just like every other woman.”



## LATER LIFE CARE

As patients leave those child-bearing years and transition into menopause, the WCOE continues to serve them. While all of the OBGYNs on staff have the knowledge to treat later-in-life gynaecological issues, Humber also has the advantage of having Dr. Lynn Sterling in the house – she specializes in menopause and vulvar skin disorders, which can become a problem in post-menopausal patients.

This continuity of care and the passion and empathy of the people who provide it are what make Humber and its WCOE such a key part of the community it serves. Dr. LaRoche believes that as long as the Women’s Centre of Excellence lives up to its name – that is, by providing truly excellent care delivered by friendly healthcare professionals who put patients at ease – Humber will continue to attract patients even if they live closer to other medical centres.

“If you advertise a standard of excellence but patients don’t have a good experience, they’re not going to come back or recommend you to their friends,” Dr. LaRoche says. “It’s not only about having these services available but having the right teams in place to make sure that the patient’s journey is a good one.”✦

**“It’s not only about having these services available but having the right teams in place to make sure that the patient’s journey is a good one.”**



**Dr. Andre LaRoche**  
Chief of Obstetrics and Gynaecology

**“Humber has really become a leading example of a community hospital that can provide advanced-level care in a setting that’s close to home.”**



**Dr. Grace Yeung**  
Obstetrician and Gynaecologist

**“We’re able to take care of everything at Humber. Patients don’t have to leave their own community and can get all the care they need.”**




**Dr. Lesley Hawkins**  
Obstetrician and Gynaecologist

VASCULAR

# A RACE AGAINST

# TW





Humber's vascular  
surgeons are always on call  
for life-saving surgeries.

*By Diane Peters*

**F**or more than a year, Ron Gillespie felt not quite right, with bouts of low energy that would come and go. No one knew what was wrong with him. One doctor told him he had low blood pressure and to eat more salt. “That’s not my style,” says Gillespie, who’s now 78 and still works as a visual artist under the name Ron Giii.

One day in July 2022, his symptoms worsened dramatically – he had no energy at all and felt on the verge of collapse. He went to his doctor, who found his blood pressure had plummeted to unsafe levels. “Get to emergency right away,” he was told.

At Humber River Health, doctors ordered blood tests and a computed tomography (CT) scan. Those tests showed he had an aneurysm in his aorta – a bulge in the wall of the main artery that carries blood from the heart to the rest of the body.

## A FATAL DEVELOPMENT

The aneurysm wasn’t just affecting blood flow – particularly to his spleen because of its location – it was so bad it looked to be on the cusp of bursting. There was a good chance his aorta would rupture within 24 hours, causing serious internal bleeding. The aorta is like a huge pipe, and any leak is a life-threatening situation.

“If patients have a ruptured abdominal aneurysm in the community, 90 per cent of them will die before they even make it to the hospital,” says Humber River vascular surgeon Dr. Luis Figueroa. For many, the experience is quick and dramatic: one minute, they feel fine, and the next, they pass out.

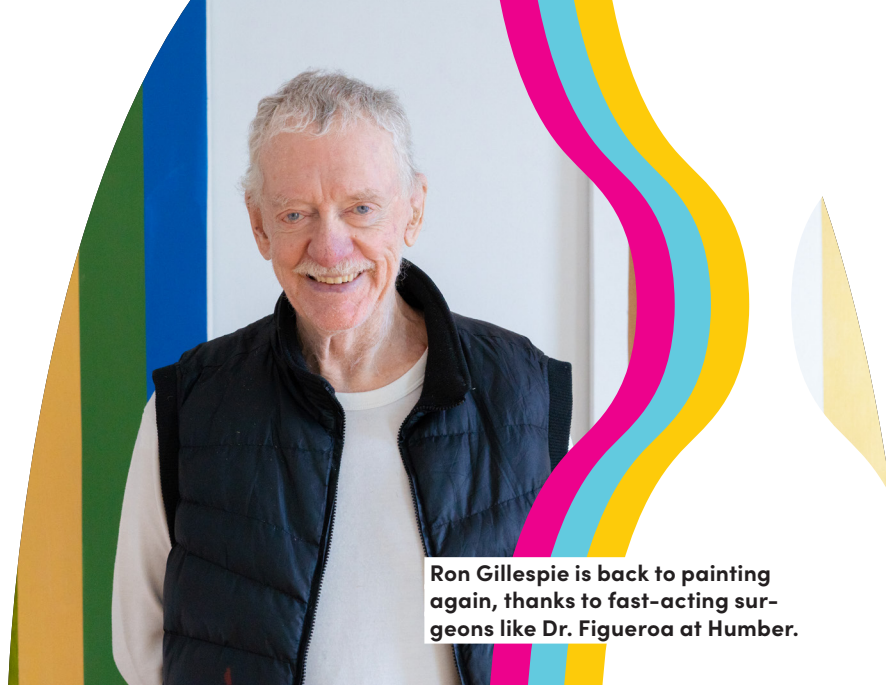
Of those who make it to an operating room equipped with staff and equipment for vascular surgery, only 50 per cent survive. “Your chances increase if you are close to the hospital,” says Dr. Figueroa, so every minute counts. “If you wait until the next day for surgery, the survival rate is zero.”

Dr. Figueroa operated on Gillespie that night, staving off the rupture and repairing the aneurysm by patching it with a special stent shaped like a tube, effectively saving his life.

“If I had a million dollars, I’d give half to Dr. Figueroa,” wisecracks Gillespie.

## MULTI-TASKING SURGEONS

To support patients like Gillespie who have a vascular illness, Humber has a team of four surgeons who are always on call to handle both routine and emergency surgeries. They have access to an interventional radiology suite, plus specially trained staff, so they can perform traditional open surgeries or, when possible, minimally invasive endovascular surgery using guided imagery.



**Ron Gillespie is back to painting again, thanks to fast-acting surgeons like Dr. Figueroa at Humber.**

Humber also has unique expertise in performing surgery on people with vascular artery disease – where the delicate arteries of the legs need to be repaired, which can happen to people with diabetes, which affects circulation.

“When I repair these small blood vessels, it takes hours and hours, but the results only last for two to three weeks. I didn’t heal the patient’s diabetes, the underlying issue that destroys these blood vessels,” says vascular surgeon Dr. Asem Saleh. So, in addition to his regular surgical duties at Humber, he attends diabetes clinics all over the community, helping with wound care and education to try to help patients avoid needing surgery at all. “We can prevent a new wound from happening,” notes Dr. Saleh, who estimates his efforts have saved more than 30 Humber patients’ legs from being amputated over the last two years.

## IMPROVED RECOVERY TIMES

While Gillespie gave his permission for open surgery before he went under anaesthetic that night last July, he was fortunate Dr. Figueroa was able to make an incision in his groin, use a special catheter to reach his chest and put in the stent, instead of opening up his chest to access the aorta.

Gillespie was in the hospital for just five days. In contrast, Dr. Figueroa says those who go through open surgery tend to stay in the intensive care unit for a few days,

move to a normal room for a week or two and then need another six to eight weeks in a rehabilitation facility to fully recover. “The difference for the patient is huge,”

he says, noting that both surgeries can repair aortas successfully, but surgeons may have no choice but to use open surgery for large aneurysms.

Gillespie was incredibly fortunate that his aneurysm was caught in time. Healthcare professionals screen longtime smokers and people with a family history by giving them ultrasounds and CT scans once they are over age 60. Sometimes, aneurysms are caught by accident when patients get tests for other reasons, such as having a gallbladder problem.

If a professional sees an aneurysm in advance, they’ll track it with regular testing, and surgeons will operate if it grows and looks at risk for rupture.

Early detection and being lucky enough to get care at a place such as Humber River

Health, which has the equipment and the expertise to successfully treat aneurysms, can make all the difference.

Three weeks after his surgery, Gillespie was back to work on his paintings. He was able to finish enough pieces to be ready for a show that opened in October in Toronto. While he’s not yet back to swimming, his preferred form of exercise, he feels better after surgery than he did before it. “After the surgery, I felt immense relief,” he says. “I feel pretty good.” ♦



**Dr. Luis Figueroa**  
Vascular surgeon



**Dr. Asem Saleh**  
Vascular surgeon



# Reconstructive rock stars

Humber's plastic and reconstructive surgeons defy perceptions of plastic surgery.

*By Elizabeth Chorney-Booth*

**C**ontrary to popular belief, plastic surgery goes beyond aesthetics. Humber River Health's top-tier plastic surgeons are essential to many aspects of its surgery program, taking care of surgeries like post-cancer breast reconstruction, lymphedema surgery, hand and upper extremity surgery, microsurgery, skin cancer reconstruction and aesthetic surgery. Beyond the basics, though, the team is also making waves in the operating room with some highly innovative microsurgical procedures.

Dr. Thomas Constantine has vast experience performing breast reconstruction surgery, but in 2016 he also brought a rare and highly technical surgery to Humber to fix the effects of lymphedema. Lymphedema is often a side-effect of breast cancer treatment or another trauma to the lymphatic system, resulting in potentially debilitating swelling of the limbs. After undergoing two years of specialized training, Dr. Constantine began offering supermicrosurgery using delicate instruments to bypass and reconstruct damaged lymphatic pathways.

"This is new not just for our hospital, but also for Canada," Dr. Constantine says. "We weren't able to do these lymphatic surgeries for many decades because we couldn't achieve a level of magnification in the ER that was small enough and we also didn't have the equipment. The instruments are very



**Dr. Thomas Constantine**  
Surgeon

small, and we had to get them from Japan, where the surgery originated."

Another area of plastic and reconstructive surgery where Humber excels is hand surgeries, particularly those that repair ligament injuries. Dr. Olubukunola Ayeni specializes in hand microsurgeries, addressing chronic conditions like carpal tunnel syndrome as well as sudden traumatic injuries. He treats elite athletes suffering from sports-related issues, in addition to regular people who may have sliced themselves while, say, cutting an avocado or carving a pumpkin. Dr. Ayeni uses high-tech surgical techniques to restore hand function and get his patients back to full speed within a matter of weeks, compared to traditional surgery, which can have a months-long recovery time.

"We use a fluoroscopy machine, which is a high-powered X-ray within the operating room," he explains. "I can directly visualize the repair and use the fluoroscope to guide me to repair the ligament as if it was never torn."

Drs. Constantine and Ayeni's specialties are just two examples of a wide range of cutting-edge plastic surgery procedures that benefit patients who may have never considered they'd one day need the services of a plastic surgeon.

"People often think plastic surgery is what you see on TV," Dr. Ayeni says. "But ultimately, we have a lot of training in different areas that allows us to have a very broad scope of practice." ♦



**"There's a collective energy within Humber of wanting to help patients. And everybody's on the same team so you never feel like you're alone, despite it being one of the largest community hospitals in North America."**



**Dr. Olubukunola Ayeni**  
Surgeon

# The city's hospital

Why more and more patients are choosing Humber.

By Glynis Ratcliffe

Survey after survey show that patients rate Humber River Health higher than provincial averages, whether they're talking about hospital experiences, communication with nurses and doctors, or even cleanliness. Jhanvi Solanki, Vice President, Clinical Programs, and Carol Hatcher, Executive Vice President, Chief Nursing Executive and Chief of Clinical Programs, explain what makes the hospital so special.

## WHAT SETS HUMBER APART AS A COMMUNITY HOSPITAL?

**JHANVI SOLANKI:** We prioritized the patient experience to keep wait times lower while still handling high patient volumes. Because of that high volume, we're able to introduce new ideas, techniques and concepts much sooner than a lot of community hospitals. Our patient experience scores are higher than both the provincial and national averages, and we attribute that to our efficiency and flow throughout each patient's surgical journey.

## HOW IS HUMBER USING INNOVATION TO IMPROVE PATIENT CARE?

**CAROL HATCHER:** Humber uses evidence-based practices to drive clinical innovation and improve bedside care. We use the principles of high reliability as a constant driver to improve the care we deliver to our community. Our 2023-2026 Strategic Plan outlines how we are taking our vision of Lighting New Ways in Healthcare and making it a reality. Looking ahead to the next three years,

we will be guided by four strategic directions: embrace equity, diversity and inclusion; advance the empowerment of our people and patients; deliver comprehensive, quality care closer to home; and foster innovation, research and academics.

**SOLANKI:** Innovation is at the core of everything we do because our goal is always to improve patient outcomes and care. The robotic technologies we use have contributed to more precision-based surgery, allowing for lots of efficiencies from both a length of stay perspective and a patient outcome perspective. Minimally invasive surgery results in shorter recovery times, fewer complications, less pain and even less rehab for patients.

## HOW CAN PATIENTS CHOOSE HUMBER?

**SOLANKI:** The patient always has a choice in terms of the provider they choose. They can certainly go to their family doctor and tell them they want to have their care at Humber, and their family care provider can send in a referral to our physician team. The Ocean eReferral portal is another way to refer to Humber, and patients can get real-



**Carol Hatcher**  
Executive Vice President,  
Chief Nursing Executive  
and Chief of Clinical  
Programs



**Jhanvi Solanki**  
Vice President  
Clinical Programs

time updates on the status of their referral. Finally, many of our patients come into our clinics through our emergency department as well.

## WHAT DOES THE FUTURE OF HUMBER LOOK LIKE?

**SOLANKI:** What's nice at Humber River Health is that we're working with our teams to take what we've learned in terms of these efficiencies, introducing technology, and sharing that with other hospitals. We're looking at automating and digitizing a lot of types of processes as well and working with our physician teams to continue to bring innovation to the forefront. In the interim, we're happy to do our part and help assist with the surgical backlog in Ontario – taking more referrals and supporting

our patient community and helping them get their procedures done. ♦





## Surgical subspecialties:

General Surgery

Vascular

Orthopaedics

Urology

Gynaecology

Otolaryngology

Oral-Maxillofacial

Metabolic and Bariatric  
Centre of Excellence

Plastics & Reconstructive

Ophthalmology

Anaesthesia

Gastroenterology

Paediatric Surgery  
(partnership between  
HRH and SickKids)

### GENERAL SURGERY AND UROLOGY

**24**

operating  
rooms

**25,000+**

surgeries performed  
annually



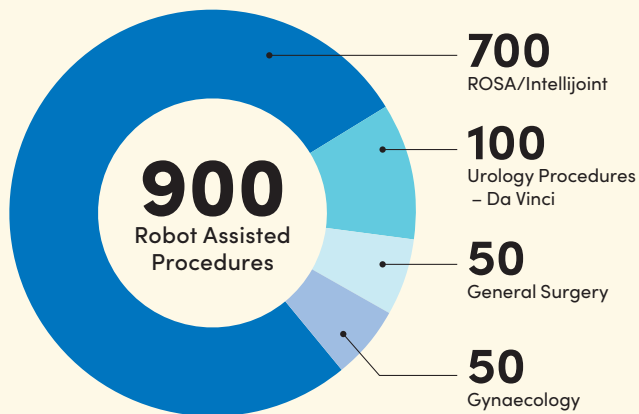
lowest wait times  
in the province

**65%**

of surgeries are  
same day

(STATS FROM APRIL 2022 TO MARCH 2023)

### ROBOTICS



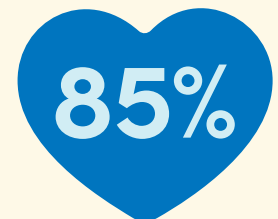
### AWARDS

2022

**Stryker Environmental  
Excellence Award**

Recognizing exceptional  
performance in environmental  
sustainability.

### PATIENT EXPERIENCE



Patients who would recom-  
mend Humber River Health  
to family and friends,  
compared to the Ontario  
average of 70%.



Patients who say they  
experience excellent commu-  
nication with doctors – 12%  
higher than provincial and  
national averages.





## Humber River Hospital Foundation

Lighting New Ways  
in Healthcare™

# Spark the future of healthcare



At Humber River Health, our innovative surgeons are utilizing state-of-the-art surgical robots like the ROSA® and da Vinci to perform less invasive surgeries, helping thousands of people get back to their lives faster. Now it's time to go even further. Together with our donors, we're embarking on a journey to raise \$10 million to expand our Robotic Surgery Program and change the standard of Canadian healthcare for the better.



**Scan to  
Donate Now**

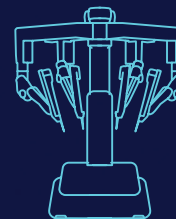
### ROSA® Knee System

Personalized knee replacement surgery with greater implant precision and accuracy, reducing pain and recovery time.



### da Vinci Xi Surgical Robot

The most versatile surgical robot on the market allows us to perform minimally invasive surgeries for certain cancers with greater precision and success.



**The future of healthcare is now. The light to shine the way is in your hands.**

[hrhfoundation.ca](http://hrhfoundation.ca)

For more information, contact  
Dave Welbourn at [dwelbourn@hrh.ca](mailto:dwelbourn@hrh.ca)