





ENROLMENT

October 13, 2017 Volume 25, Issue 2 Publication Mail Agreement #40065156

U OF S FALL CONVOCATION Close to 1,000 students will be

awarded degrees when the University of Saskatchewan holds its annual Fall Convocation ceremonies on Oct. 28 at TCU Place. In this edition of OCN, we take a look at the major award winners, our honorary degree recipients and we profile a pair of outstanding young graduates.

SUSTAINABILITY

PAGES 8-9.

ACCREDITATION 5



JNIVERSITY OF <u>Saskatchewan</u>

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On Campus News aims to provide a information and opinions about events and issues of interest to the

The views and opinions expressed by writers of letters to the editor and viewpoints do not necessarily reflect those of the U of S or On Campus News

We acknowledge we are on Treaty 6 Territory and the Homeland of the Métis. We pay our respect to the First Nation and Métis ancestors of this place and reaffirm our relationship

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UNIVERSITY OF SASKATCHEWAN MARKETING AND COMMUNICATIONS G16 THORVALDSON BUILDING **110 SCIENCE PLACE** SASKATOON, SK S7N 5C9

Total Rewards a one-stop shop for staff

ZAHEED BARDAI

On Sept. 12, the University of Saskatchewan unveiled its newest online resource, My Total Rewards, making it easy for faculty and staff to learn more about the pay, benefits and other rewards available to them and their families, in an easy-to-understand format.

Employees can now view up-todate, personalized information in the Employee Channel within PAWS. Before the launch of the My Total Rewards website, university employees had to search through multiple websites and collective agreements, and perform their own calculations to get the full picture of their "total rewards."

"We want faculty and staff to be able to easily view and appreciate the total value they receive as part of their employment relationship with the university," said Timothy Beke, director of My Total Rewards within the People and Resources portfolio at the U of S.

"One way to do this is to create a one-stop shop where employees



Timothy Beke heads the new My Total Rewards program.

can get a holistic view of what their salary, pension, professional development, health and dental care, and insurance benefits are worth," said Beke. "It's also about giving visibility to the sometimes overlooked services and amenities available to faculty and staff, like access to veterinary services at WCVM, the on-campus pharmacy, or the employee and family assistance program."

The university engaged an external vendor to develop the My Total Rewards site and provide ongoing support. To date, close to 1,800 employees have accessed the site and early feedback has been positive. However, some concerns were raised about the requirement for employees to accept extensive terms and conditions in order to access the site.

📸 ZAHEED BARDAI

According to Beke, these types of terms and conditions are quite common with many online services, software, or mobile apps that we might use daily. For some faculty and staff, these requirements to access My Total Rewards seemed excessive and unnecessary.

"This feedback was very valuable to us as it identified an unintended barrier that was preventing some employees from accessing their total rewards information," said Beke.

In response, the team has worked closely with the university's internal legal team and the vendor to eliminate the requirement for employees to accept terms and conditions to access the site, while still informing employees of the privacy protections in place to safeguard any personal information.

"Ultimately, our goal is to increase awareness and utilization of the various programs that support the health and well-being of faculty and staff," said Beke. "It's part of the Mission, Vision and Values of our university and a strategic goal of People and Resources to provide programs, supports and services that help to create a rewarding employment experience at the university."

> Zaheed Bardai is a communications specialist in Human Resources at the U of S.

For more information, log in to PAWS and locate My Total Rewards in the Employee Channel. Detailed information is also available online in Knowledge Base.

IN CASE YOU MISSED IT

A lot happens at the U of S during the weeks when On Campus News isn't published. Here are a few of the top stories from news.usask.ca:

Indigenous health Law launches chair announced

The University of Saskatchewan appointed researcher Dr. Alexandra King as the inaugural Cameco Chair in Indigenous Health on Sept. 27. King, an internal medicine specialist who will be based at the College of Medicine for a five-year term, will lead work to improve health care outcomes in Indigenous populations in Saskatchewan and the North. King is from the Nipissing First Nation in Ontario.

Nunavut program

The U of S College of Law held a first-year welcoming ceremony in Iqaluit, Nunavut on Sept. 11 to officially welcome 25 students into the new Nunavut Law Program. The ceremony officially launched the partnership program between the U of S, Nunavut Arctic College and the Government of Nunavut, establishing a law degree program there for the first time in over a decade.

St. Thomas More renewal complete

St. Thomas More College at U of S held the grand opening of its new North Addition Renewal Project on Sept. 15. The \$5-million project, which broke ground in May of 2016, included additions and renovations to the research library, increased facility energy efficiency, expansion of the cafeteria, a new lounge and student services hub, along with the installation of a five-storey elevator to ensure accessibility.

Boland joins team at CLS

Mark Boland has started a new dual role at the U of S: machine director at the Canadian Light Source (CLS) and associate professor in the Department of Physics and Engineering Physics. At the CLS, Boland will provide strategic leadership in the development and operation of the most complex scientific instrument in Canada. He received the 2014 Fulbright Professional Scholarship in Nuclear Science and Technology.

FOR MORE UP-TO-THE-MINUTE NEWS, VISIT: news.usask.ca 🖪 🎔 @usask



Chelsea Willness has been appointed the new chair of the President's Sustainability Council.

HENRYTYE GLAZEBROOK

Willness new sustainability chair

HENRYTYE GLAZEBROOK

The concept of sustainability has made great strides in recent years, with organizations large and small voluntarily opting in to new and exciting environmental initiatives to advance the cause locally and globally.

But if you ask Chelsea Willness, the associate dean, research and academic, in the Edwards School of Business at the University of Saskatchewan, we've now reached a time when it's not as simple as opting in or out.

"It's really not optional at this point," Willness said. "We must be concerned about environmental, social and economic aspects of organizations and communities. We must adopt a holistic view and recognize our interconnectedness. It's a really positive thing to see our university striving toward these goals authentically and creating a foundation from which we can live our stated values."

It's that passion and commitment to sustainability on campus which makes Willness proud to be the new chair of the President's Sustainability Council, an initiative founded in 2016 at the U of S under the guidance of President Peter Stoicheff, which provides guidance, seeks funding support for

student initiatives and recommends promotional initiatives for all things sustainability at the university.

"Sustainability is a core piece in the new Mission, Vision and Values, and will be one of the themes or principles in the upcoming campus master plan," Willness said. "These are prominent and compelling commitments by our institution. The president has consistently reinforced a commitment to reconciliation, which is a critical part of any conversation about sustainability, community and social justice."

Willness pointed to ongoing initiatives like Campus Sustainability Week (Oct. 9-13), as vital opportunities to build awareness at the U of S. She also emphasized the importance of the university's success in the STARS program, a transparent, self-reporting framework created by the Association for the Advancement of Sustainability in Higher Education, which measures achievement in sustainability and awards rankings.

"Earlier this year we achieved a silver rating through the STARS program-three years ahead of our goal—and we're already well on our way to achieving gold," she said, adding that the university's goal is

to reach the gold standard by 2020. "Only about half of the U15 institutions participate in this program, so it's great to see us achieving these important benchmarks and progressing so quickly, because of a strong commitment that we not only talk about, but commit to enacting as well."

Willness, who comes from a background in organizational psychology, said she was drawn to her role as the new chair as an opportunity to better understand the ways that environmental policies and practices can influence engagement in an institution as sprawling as the U of S. Looking forward, Willness said she's excited to start using her experience to strengthen ties between the U of S and groups both on and off campus, through sustainable programs and initiatives.

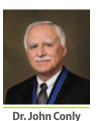
"We are looking at building a broader engagement strategy that is connected into the ecosystem of our community," she said, explaining that potential partnerships with the City of Saskatoon are just one idea that is being explored. "Community engagement is something that we will be focusing on, and I'm really looking forward to helping us move in that direction."



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MD'78

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Max FineDay BA'15









MD'67

Sherril Gelmon Physio'76



RA'97





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AWARDS GALA

Brian Towriss

BComm'78

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Province restores College of Medicine funding

RRIS FOSTER

The Government of Saskatchewan has restored \$20 million in funding to the University of Saskatchewan's College of Medicine for the 2017-18 fiscal year.

"The decision to restore this is critical to our ability to maintain the strong medical school that Saskatchewan deserves," said Tony Vannelli, U of S provost and vice-president academic. "We are grateful to the government for making a decision that is essential

to our success."

Vannelli said this financial commitment from the government sends a strong signal of support to, not only the U of S and the College of Medicine, but also to the people of Saskatchewan and medical education accreditors—namely, the Committee on the Accreditation of Canadian Medical Schools (CACMS) and its American equivalent, the Liaison Committee on Medical Education (LCME). "This is necessary for us to deliver high-quality medical education and research that is vital to the province," he said, adding that in combination with the hard work and focus of the College of Medicine faculty, staff and students, restoration of these funds will contribute to a successful accreditation review.

"This is a timely and positive decision that will also be significant to the accreditation review," the provost explained. "Accrediting agencies expect appropriate level of funding from government, so this restored necessary funding is a very encouraging outcome."

Vannelli said funding from the provincial government was the "final piece of the puzzle as we make final preparations for the review of our medical school by accreditors. This is the type of financial commitment accreditors want to see from government."

CACMS and LCME will visit



Vannelli

the college Oct. 29 to Nov. 1, and evaluate 12 standards of accreditation (subdivided into 93 elements) under which all medical schools must operate.

In October 2015, the College

of Medicine was taken off of probation as a result of a May 2015 site visit when accreditors evaluated progress on specific standards previously cited as deficient. Almost all standards were partially or completely compliant and since that visit the college has continued to address all standards in preparation for the upcoming review.

"Having a strong College of Medicine is critical to our university as a research-intensive member of the U15, but beyond that, it is critical to the province of Saskatchewan," Vannelli stated.

"We educate the medical professionals who look after the sick and injured, and we conduct research that improves treatment and cures disease."

Vannelli said the restored funding allows for "some predictability in our financial situation this fiscal year. It also means that we are partners in providing health care to the province of Saskatchewan."



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Dean Preston Smith said the university's College of Medicine is fully prepared for the upcoming accreditation visit to review the school's undergraduate medical education program.

DAVID STOBBE

Medical school ready for accreditation visit

🖉 KATE BLAU

The College of Medicine is preparing for a much-anticipated full-site accreditation visit this fall, Oct. 29 to Nov. 1, to review the school's undergraduate medical education (or MD) program.

Dr. Preston Smith, dean of medicine, said the school is feeling confident about improvements it has made and he anticipates a successful visit.

All programs in the school are fully accredited, although the undergraduate program had faced challenges that included being placed on accreditation probation twice—in 2002 and 2013. The 2013 probationary status was lifted in 2015. To address the challenges, the college broke away from its third integrated plan in 2013 to follow an intervening plan, *The Way Forward*, to guide the changes needed to address accreditation issues.

"We've followed *The Way Forward* and been very deliberate about that," Smith said. "Being a fully accredited medical school, a highly successful medical school, is what the university wants and needs. And while we've been on a journey to have a fully accredited, excellent undergraduate medical education program, we are focused on being an excellent medical school."

The college has worked across what Smith calls a "continuum," starting with "beefing up" admissions. Applicants to the MD program now must take the Medical College Admission Test (MCAT), an exam used by almost all U.S. and many Canadian medical schools. A highly successful Indigenous Admissions Program and a new Diversity and Social Accountability Program support accessibility and reflect Saskatchewan's population.

Extensive work has been done to improve the undergraduate medical curriculum, including a four-year transition to enhance clinical learning, as well as expanded learning across patient safety, clinical care research, and interprofessional and team-based settings. Improvements were needed to engage more medical doctors in teaching and research in the college.

"When I arrived in 2014, it was clear that we had less than half of the MD time, medical doctor time, here devoted to the medical school, compared to most medical schools our size," Smith said. "So we've gone to a one faculty model to more effectively bring together our full faculty complement across biomedical and community health scientists, and medical faculty."

Key to engaging more medical faculty in teaching in the college was detaching faculty appointment from payment methods. The majority of U of S-employed medical faculty members who had the choice in 2016 to move to a new form of engagement with the college through an Academic Clinical Funding Plan or other contract arrangement, chose to do so, and all new medical faculty joining the college since then also follow this approach. Results in just one year have been positive.

"We've actually gone from about 35 full-time equivalent of physician time engaged in teaching in the College of Medicine, to about 80 full-time equivalent, for the current academic year," Smith said.

The college has also been building capacity in medical research, investing in internal research awards to support faculty and graduate student success. In 2017, the college established two significant new chairs: the Saskatchewan Chair in Multiple Sclerosis Clinical Research filled in April by Dr. Michael Levin, and the Cameco Chair in Indigenous Health filled by Dr. Alexandra King, who starts Oct. 16.

Previous accreditation feedback also indicated the college needed to bolster its administrative infrastructure. College leadership now includes three vice-deans of medical education, research and faculty engagement, while assistant dean positions have been added in biomedical sciences and undergraduate medical education. New department heads have also joined the team, while administrative staff have been added in key areas, including student services and advancement.

"One of the successes in the last year that I'm very proud of as well is our new five-year strategic plan," Smith said. "We really came together as a college, and involved key stakeholders, to create this plan. Now we're shifting to follow it, with the bulk of the work of *The Way Forward* completed."

With the accreditation visit just around the corner, preparing for it is very much front and centre. Over the past year, students, faculty, staff and administrative leaders have worked extensively to submit more than 1,000 pages of documentation to the accreditation visitors in July. Since then, the focus has shifted to preparing for the visit, which will involve about 200 students, faculty and staff from the college and some external stakeholders.

The accreditation work was bolstered recently when the Government of Saskatchewan restored \$20 million in funding to the college for the 2017-18 fiscal year.

SEE COLLEGE, PAGE 15

Major NSERC grants nurture new research

JAMES SHEWAGA

Climate change research may not be what first comes to mind when discussing the field of mechanical engineering.

But as global temperatures rise, so too does the world-wide demand for more energy-efficient cooling systems. That is where University of Saskatchewan mechanical engineers like Carey Simonson come in.

Backed by \$423,465 in federal grants from the (NSERC), the U of S researcher will be studying ways to improve energy efficiency of heating, ventilation and air conditioning systems—commonly known as HVAC units.

"There are many people around the world working on improving the energy efficiency of HVAC systems and my research here at the University of Saskatchewan is unique, but it certainly is part of the global enterprise," said Simonson, who is one of 60 U of S faculty members and 27 graduate students and post-doctoral fellows who were awarded a total of \$10.7 million in NSERC research funding last month.

The major funding announcement was made on campus by Kate Young, Parliamentary Secretary to Science Minister Kirsty Duncan, part of a renewed federal commitment to fostering new research all across the country, including significant support for U of S initiatives.

"This major investment advances research in fundamental, high-quality science that is vital to building Canada's economic future and training the next generation of leaders," said Karen Chad, U of S vice-president of research.

For his part, Simonson will lead efforts to combat climate change at

home and in the workplace from an engineering perspective. Simonson notes that Canadians spend 90 per cent of their time indoors, with heating and cooling of homes and buildings accounting for up to 50 per cent of energy consumption and greenhouse gas emissions in developed countries. With rising temperatures, that consumption and demand continues to rise dramatically.

"The Intergovernmental Panel on Climate Change predicts that the global demand for cooling in buildings will increase 30 times over this century and that's due to climate change, but also due to increasing demand from developing countries," he said. "Temperatures are rising, but there is also a global demand for cooling for food security reasons as well. And as engineers, we need



Engineering professor Carey Simonson has received a HENRYTYE GLAZEBROOK two major NSERC federal research grants.

to come up with ways to do that, without intensive energy consumption."

Simonson's work on energy efficiency continues a history of nearly a century of research at the U of S, with the new NSERC funding building on that legacy.

"With respect to (applications for NSERC) Discovery grants alone, we have achieved record success this year, an almost 70 per cent success rate, our highest ever, up from about 54 per cent four years ago," said U of S President Peter Stoicheff, noting that the university has exceeded the national success rate of 64 per cent for landing NSERC Discovery grants. "This is exactly the direction that we want to go. We are seeing continuing increases in the numbers of U of S faculty holding NSERC funding, which is highly encouraging."

Simonson said the NSERC grants not only help fund research, but also help recruit and retain top students from around the world, who in turn help enhance Canadian innovation in the workforce.

"Three quarters of my (graduate) students come from other countries but most, about 85 per cent, remain in Canada after training," he said. "These students are our future leaders and they will make Canada a better place."



Lecture Series at the College of Law



All lectures are free and open to the public. Speakers and dates subject to change.



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2017 LECTURES

Negotiated agreements and Indigenous Peoples: opportunities and challenges

Ciaran O'Faircheallaigh Griffith University, Brisbane OCT. 13, 2017 12 PM MLT AIKINS Lecture Theatre (Room 150) College of Law, U of S



John A. Stack Memorial Forum A conversation with former Prime Minister Paul Martin

The Right Honourable Paul Martin, PC *Presented in partnership with the U of S Canada 150 Project.*



NOV. 9, 2017 3 PM MLT AIKINS Lecture Theatre (Room 150) College of Law, U of S



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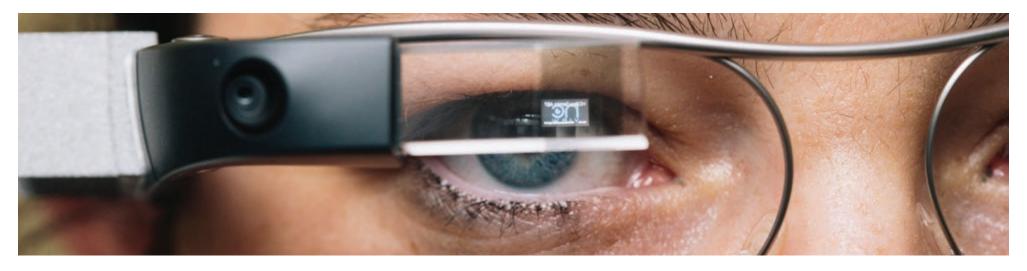
Janet Freeman Founder of the BC Law Matters Presented as part of Saskatchewan Access to Justice Week in partnership with PLEA.

OCT. 19, 2017 7 PM Frances Morrison Library



The Morris Shumiatcher Lecture on law and literature Imagination and identity: how stories form who we are

Yann Martel, author NOV. 10, 2017, 7 PM Artesian, Regina SK This event will take place in Saskatoon in early 2018.



Health care, anywhere

U of S researcher reaching remote communities with remote technology

LESLEY PORTER

Providing efficient, effective health care to remote communities isn't unlike travelling to Mars.

So says Dr. Ivar Mendez, unified head of the Department of Surgery at the University of Saskatchewan and Saskatoon Health Region.

Mendez, also a faculty member in the College of Medicine, recently travelled to Montreal to lend his expertise to the Canadian Space Agency. The organization's American counterpart, NASA, has been given the go-ahead to travel to Mars, and the two groups were looking for advice regarding using technology to provide health care from a distance-in this case, a pretty far distance-because even the youngest, healthiest astronauts are not immune to injuries or illness in deep space.

"What will happen if something that is serious, in terms of health care, happens?" he asked, adding that it takes 21 minutes to transmit data to and from the red planet. "Someone can have an appendicitis or somebody can break their leg. So how can we take care of them?"

ROBOTIC SUCCESS

Closer to home, Mendez is known for embracing technological innova-



Dr. Ivar Mendez is exploring new ways to use technology to help provide patient health care from afar.

tions to improve the patient experience, particularly for those in underserved and remote communities.

Not long after starting at the U of S in 2013, he spearheaded an initiative that brought remote sensing robots to northern communities in Saskatchewan. Controlled by a smartphone, the robots can

manoeuvre autonomously to perform a medical triage and determine patient treatment.

This, in turn, also provides relief to a centralized, overloaded health-care system, said Mendezand he has the numbers to back it up. Over the course of one year, the small community of Pelican

Narrows-population 1,700 and located a six-hour drive northeast of Saskatoon-saved approximately \$400,000 in costs associated with health care and travelling to larger centres for medical service.

The larger concept, labelled point-of-care diagnosis and treatment, calls for a decentralized medical system-that is, the clinician comes to where the patient is, albeit virtually. This area is of particular interest to Mendez, and was one of the main reasons he moved to Saskatchewan-a large, expansive province where medical practitioners aren't readily available to the most vulnerable citizens.

"I truly believe there are certain technological advances that will allow us to provide better care for our patients," he said.

THROUGH THE GOOGLE GLASS

Following the success of the remote sensing robots, Mendez turned his interest to another emerging technology: Google Glass.

Released by the tech giant in 2013, the head-mounted hardware resembles standard eyeglasses. The spectacles can connect to the Internet and contain a small camera that can feed to a monitor-essentially showing the user on the other end what they are seeing, at eye level, in real time. Seeing its potential beyond games and chatting, Mendez partnered with an American firm to pilot a specific type of glasses for telemedical purposes.

SEE MENDEZ, PAGE 15

2017 Fall Convocation

Tavares makes Canada home

HENRYTYE GLAZEBROOK

When Anna Tavares first came to the University of Saskatchewan from Brazil, it was only expected to be for one term as part of an exchange program.

But in coming to Canada, she discovered a sense of personal safety and well-being that opened her eyes to a new realm of possibility.

"Being in Canada, you're safe and you don't need to worry about small things—like if you forget to lock your door when you leave, it will probably be fine," she said. "Back home, it's not that way. That gave me space in my mind to think about other things, like what I wanted to do, what my aspirations are, what my hobbies are. I had been so busy at home worrying about being safe and being OK that I didn't really have the brainspace to think about those things before."

Relocating to Canada full-time was a lengthy process for Tavares, travelling back and forth between her new home and her country of birth several times before finally settling permanently in Canada in 2014. In the interim, she obtained an industrial engineering degree from Brazil's Universidade Federal de Minas Gerais, switched into the Edwards School of Business and will now attend U of S Fall Convocation after completing her commerce degree with top marks in her class.

The changeover was challenging, Tavares said, but she commended the university for helping during every step of the process—everything from having a recruiter on standby to answer her questions, to sending someone from the International Student and Study Abroad Centre to pick her up at the airport.

"When you're an international student going to a different country, there are already so many challenges that no one will be able to go through for you, like the language barrier or missing your family and friends," she said. "But everything the U of S could take care of for me, they did, so I could face those other challenges and take care of them by myself." Tavares proved an exceptional student of commerce, finishing with an average of more than 85 per cent and turning her co-op placement with the Saskatoon Regional Economic Development Authority into part-time work throughout her degree. But she holds her work with Young Women in Business (YWiB) among her biggest achievements.

YWiB is focused on bringing together emerging female leaders and young professionals, giving them a safe space where they can build skills, network and foster community. Tavares, inspired by their success, founded a Saskatoon chapter in 2016.

"I'm a big advocate for gender equality," she said, adding that bringing YWiB to Saskatoon secured her a nomination and finalist spot in the under-29 category of the YWCA's 2017 Women of Distinction Awards.

"I still don't think we have a level playing field, and if we want equal representation in the higher levels of companies or boards or



Transferring to the U of S has been a life-changing experience for Brazilian student Anna Tavares.

anywhere, really, we need to start way before," she said.

Tavares is now a vendor operations manager with Vendasta Technologies, happily stepping into the working world full-time after years of juggling classes, volunteering, a part-time job and squeezing in time for a social life. Scheduling everything was hectic, but she stressed that anyone can accomplish it, if they stay focused on the task at hand.

"You have to get it right at first, when you don't know if you'll have time to study before the midterm," she said, laughing. "Just being present, focus on learning, asking questions—it all helps so much. When you're at work, be there. When you're studying, focus there."



Vessey

Vessey finds his key to success at U of S

A HENRYTYE GLAZEBROOK

Growing up, Colton Vessey always dreamed of being a marine biologist. He wanted to wade into the ocean and find exciting, practical ways to help the environment.

But it wasn't until he got to the University of Saskatchewan that he realized there was a whole world of possibilities right in his backyard that captured the same spirit of sustainability that he'd always found so enticing.

"Being from Alberta, I was always in the mountains when I was in high school and as a kid," he said, explaining that his first-year geology course reminded him of his upbringing. "The content and material taught in that class, I found it really interesting learning the actual processes. I just fell in love with the program after first year. I felt like I could use that knowledge in a really practical way."

Vessey will graduate with his classmates in the U of S Department of Geological Sciences at Fall Convocation at TCU Place on October 28.

When he first came to the university, he planned only to stay a few short years, earning enough experience to branch out to a marine biology program elsewhere. Instead he discovered that the world of geology dovetailed nicely with his own aspirations for academia, and he opted to stay on at the U of S for the length of his bachelor's degree.

"When I first started out, I wanted to go into marine biology to help the environment," he said. "I always wanted to go in a waterscience direction in conservation and environmentalism, and it just worked out that geology has that field in it as well. Environmental geology is a large and growing field. It's becoming very important globally for mines and communities, and there's more jobs in it than there is for exploration geology." Vessey proved to be an ace geology student, securing the highest grade point average in his class (and posting an impressive overall 87.3 per cent average for all of his undergrad studies). He also served as treasurer for the Ore Gangue Geological Society and won numerous scholarships and awards during his time on campus, including the Dean's Scholarship, the Natural Sciences and Engineering Research Council Canada Graduate scholarship and the Undergraduate Leadership scholarship.



The University of Saskatchewan's Fall Convocation will be held Oct. 28 at TCU Place, with ceremonies scheduled for 9 am and 2 pm. In addition to the degrees received by students, the following awards and honorary degrees will be presented:



MARGRET ASMUSS

PRESIDENT'S SERVICE AWARD

A proud alumna who completed both her Bachelor of Arts in English and Master of Continuing Education degrees at the U of S, Margret Asmuss has served as sustainability co-ordinator for the past 13 years. She has helped develop the Office of Sustainability and helped implement the Campus Sustainability Plan, which provides a framework for integrating sustainability into university activities. Asmuss also plays a role in the Sustainability Living Lab, which provides students with project-based courses and offers professional development for faculty. Her combination of knowledge, expertise and readiness helps others achieve their sustainability goals.



CAREY SIMONSON

DISTINGUISHED GRADUATE SUPERVISOR AWARD

Carey Simonson earned his bachelor's, master's and a PhD in mechanical engineering at the U of S, where he has served as a professor since 2001. The Graduate Chair in the Department of Mechanical Engineering, Simonson received the NSERC Synergy Award for Innovation in 2015 and was awarded \$423,465 in NSERC grants in September. Winner of the U of S Graduate Students' Association Teaching Excellence Award in April, Simonson has supervised 50 graduate and postdoctoral students. Simonson is a Fellow of ASHRAE, the premier society in his research field, with more than 56,000 members from 130 countries.



ANDREW GROSVENOR

NEW RESEARCHER AWARD

Since joining the Department of Chemistry in 2009, associate professor Andrew Grosvenor has become a world-leading expert in the field of solid-state chemistry. In his research, Grosvenor uses X-ray spectroscopy and the synchrotron facilities located at Canadian Light Source (CLS) on the U of S campus to answer critical questions relevant to the energy and mineral sectors, and has taken an active leadership role at the CLS. In 2014, Grosvenor was recognized by his peers in the American Chemical Society as just one of 13 emerging investigators (and the only Canadian) in solid-state materials chemistry.



HAROLD CHAPMAN HONORARY DOCTOR OF LAWS

Harold Chapman has spent a lifetime committed to the co-operative movement as a builder and educator. Chapman, who was born in Saskatoon, graduated from the U of S with a Bachelor of Science in Agriculture back in 1943, spent decades helping develop farming, fishing, trapping and housing co-operatives in the province, and was the first director of the Co-operative Institute in Saskatoon. Since retiring in 1982, he has remained involved with the Centre for the Study of Co-operatives located at the U of S and celebrated his 100th birthday this year by being inducted into the Order of Canada.



MAUREEN REED

DISTINGUISHED RESEARCHER AWARD

Professor Maureen Reed has pioneered work on gender and forestry in the global north by incorporating feminist theory and gender-based analyses into studies of environmental governance in Canada. The assistant director, academic, in the School of Environment and Sustainability, Reed is internationally recognized for her work. She is now investigating how gender and culture affect the capacity of rural and Indigenous communities in Saskatchewan to respond to climate hazards. Reed previously received the U of S Distinguished Graduate Supervisor Award in 2015 and the YWCA Women of Distinction Award for Lifetime Achievement in 2016.



DR. ALI RAJPUT

HONORARY DOCTOR OF SCIENCE

Dr. Ali Rajput joined the U of S medical faculty in 1967 and has spent the past 50 years researching Parkinson's disease and treatments, becoming one of the world's leading authorities. A distinguished professor emeritus, he served as head of neurology at Royal University Hospital from 1985 to 2001. Rajput, who established the internationally renowned Saskatchewan Movement Disorders Program at the U of S in the 1960s, earned the university's Distinguished Researcher Award in 2002, the Saskatchewan Order of Merit in 1993, and was named an Officer of the Order of Canada in 1997. He was also named the SMA physician of the year in 2006.



CHELSEA WILLNESS

MASTER TEACHER AWARD

Chelsea Willness is an associate professor and associate dean, research and academic, in the Edwards School of Business, and has held two national research grants from the Social Sciences and Humanities Research Council of Canada. Willness is a passionate champion of community-engaged scholarship and teaching who has mastered the art of creating authentic and vibrant learning communities. Willness previously received the Provost's College Award for Outstanding Teaching (2014), the U of S Award for Distinction in Community-**Engaged Teaching and Scholarship** (2014), and the USSU Teaching Excellence Award (2016).



CAROL HENRY

GEORGE IVANY AWARD FOR INTERNATIONALIZATION

Carol Henry, an associate professor and assistant dean in nutrition and dietetics in the College of Pharmacy and Nutrition, will received the award for exceptional contributions of a faculty member or administrator toward the internationalization objectives of the university. An internationally recognized scholar-practitioner in community-engaged research, international development, and teaching and learning, Henry's work has enhanced the reputation of the U of S in Africa and the Caribbean. She has developed partnerships to recruit international graduate students to the U of S and supports student exchange programs.



Gamble doubles down on campus collaboration

MARG SHERIDAN

There's collaboration, and then there's collaboration on the scale that Dr. Jonathan Gamble and his team are working on.

Gamble, specializing in anesthesiology and pediatric critical care in the U of S College of Medicine, has been working with a group of doctors, researchers and veterinarians for the past two years on an extensive multidisciplinary hemodynamics study.

"The cornerstone to all acute care medicine is resuscitation," Gamble explained. "I think a lot of what is thought of resuscitation is what you see on TV. But resuscitation is actually a bigger process than that, and when we resuscitate people what we really are trying to do is ensure that we help the patient to circulate oxygen in the blood to the organs and make sure all of the tissues are functioning.

"But the cornerstone to the first part of this is what we call hemodynamic resuscitation, (and) that's



(From left) Drs. Jonathan Gamble, Jean Du Rand, Jayden Cowan, Barbara Ambros and Valentina Carrazzo.

often based upon a measurement of it's r blood pressure." clinic

Gamble said most physicians use that blood pressure measurement as a surrogate for cardiac output—how much blood is being pumped out of the heart—because

th Annual Michael Keenan Memorial Lecture

it's relatively easy to measure in a clinical setting. It can be measured non-invasively, and is often assumed to be an accurate reflection of cardiac output.

However, blood pressure may not be the best way to guide resusci-

2017 GUEST LECTURER:

Catholicism and Communication:

An internationally-known, and award-

winning lecturer on communication and

media, Dr. McLuhan has over 40 years'

closely for many years with his father, the late Marshall McLuhan, he has also

been deeply involved in exploring media

research and thinking published in books,

ecology and communications, with his

teaching experience. Having worked

B.Sc., M.A., Ph.D.

The Sensus Communis,

magazines, and journals.

Synesthesia, and the Soul

tation. It may be that cardiac output is the more accurate way of guiding resuscitation. And if that's the case, the medical instrument industry has a wide array of equipment designed specifically for measuring cardiac output.

That industry is the primary focus of this study: how accurate are the machines used to measure cardiac output being used by our physicians and hospitals?

"The medical device industry is quite robust," Gamble said. "So we're trying to determine how accurate these devices are that clinicians use to help measure cardiac output against a gold standard."

That gold standard is a machine called a peri-aortic flow probe, which has a small blue ring that sits around the aorta to monitor actual blood flow, but obviously needs to be surgically implanted and is therefore not something that can be used by most acute care doctors.

"This measures cardiac output in a very accurate way, but a very invasive way," Gamble said. "So this blue ring sits around the aorta, the vessel that immediately comes from the heart, so all the blood that comes from the heart goes past the aorta and it can measure (the) flow."

The second focus of the study is to assess how well blood pressure reflects cardiac output. This is done by comparing blood pressure measurements to peri-aortic flow probe. And both of these research topics bring us back to the collaborative portion of this project: the Western College for Veterinary Medicine (WCVM). To test both the machines and resuscitation, Gamble and his team-which includes physicians and researchers from anesthesiology, veterinary medicine, neurosurgery, general surgery, perfusion, neurophysiology, and the Department of Chemistry-turned to the WCVM for help.

The team is using a porcine model to test both projects at once: hooking up the machines to the subject to test their accuracy, and monitoring the blow pressure and flow as they run through different stress levels experienced during surgical procedures and illnesses, in order to monitor the hemodynamic resuscitation and tissue function.

"We don't know how much flow is enough, but we wanted to be able to actually measure function—or an indication of function—at the tissue level," Gamble said. "And the way I see the world, if we don't resuscitate the brain, there's no point resuscitating the individual. But it's hard to measure actual cellular function.

"But at the end of the day the cardiovascular system is designed to supply oxygen to the tissue, and the tissue absorbs that oxygen. If the tissue is not getting enough oxygen, it'll extract more oxygen and we can measure the saturation."

The eventual goal is to make it easier for anesthesiologists, critical care physicians and emergency medicine physicians to ensure adequate blood flow to avoid accidental tissue death by figuring out what the ideal blood flow indicator is, while also determining which of the top three industry-supplied medical devices is the most accurate.

ST. THOMAS MORE COLLEGE UNIVERSITY OF SASKATCHEWAN

Thursday, November 2, 7:30 pm. Fr. O`Donnell Auditorium, STM

The annual Keenan Lecture honours the memory and achievements of STM's first Dean, Dr. Michael Keenan.

Indigenous and international enrolment rising

HENRYTYE GLAZEBROOK

Enrolment at the University of Saskatchewan is up compared to last fall, highlighted by the number of self-declared Aboriginal students rising seven per cent this year.

The increase, which has been noted through data collection of first day enrolment, confirms a current total of 2,401 self-declared Indigenous students in the fall term.

"In keeping with the calls to action of the Truth and Reconciliation Commission, the university has articulated two significant goals in the area of Indigenous engagement: to become the most welcoming place we can be for Indigenous students and their communities, and to close the education gap between Indigenous and non-Indigenous degree holders," said Alison Pickrell, assistant vice-provost, strategic enrolment management.

"Results like these are why we get excited when we see increasing numbers of Indigenous students pursuing their degrees," she said.

The increase in Aboriginal students is part in an overall growth trend occurring across campus, which includes a 2.1 per cent rise in registered students for undergraduate and graduate classes and a 0.8 per cent climb in international student



Alison Pickrell is pleased with the continued increase in the number of Indigenous students on campus. 🗊 JAMES SHEWAGA ca

enrolment—bringing the total numbers up to 20,670 undergraduate and graduate students overall and 2,210 international students.

Pickrell emphasized that these figures are a preliminary comparison, and noted that there will be further growth in all areas as students who have not yet completed registration begin arriving on campus, late enrolment numbers start rolling in, and January intake takes place for many colleges.

Although some of the registration numbers appear smaller than those gathered at the end of the 2016-17 academic year, Pickrell said

it is anticipated that the U of S will meet or exceed the previous year's total annual enrolment—as well as other, more specific student diversity goals—by the end of the current academic year.

Despite positive growth, Pickrell said that the university is focused not simply on recruiting more students but also on ensuring the campus is properly equipped to support those new faces walking the halls.

"Colleges are actively interested in engaging in a dialogue about the size of our university and diversity of the student body," she said. "The concerns that accompany a conversation about growth range from classroom and lab capacity, to faculty complement, to student support and service provision, and quality of the student experience. That is why it is important to think about ways to grow strategically, rather than growth in itself as a goal."

Pickrell said university administration is already examining avenues to bring more students to campus moving forward, continuing to build the U of S as an attractive option for the bright young minds of tomorrow.

"As part of the current university planning process, we will renew our enrolment plan with strategic growth in mind," she said. "Together with college leadership, we will look at where we have high-quality applicants but not enough capacity to accept them all.

"We will work with colleges to explore and develop new academic programs that draw students who are looking for programs that we do not currently offer, we may consider revamping or revitalizing current programming, and there is also a potential for the U of S to expand its program offerings off campus and outside of the country."



Vessey returns for master's program

FROM PAGE 8

Working with assistant professor Matt Lindsay, Vessey spent his undergraduate research doing field sampling and analysis on reclaimed wetlands in the oil sands region, trying to better understand the capacity for protective clay layers to mitigate salt breakthrough, and the dire effects this process can have on the surrounding environment.

"The tailings underneath have a lot of sodium in them, which can be really toxic to plants in high concentrations, so we're worried about sodium coming up through the clay layer and infiltrating the wetland," he said. "It'll kill the plants."

Returning to the university this fall to work on a Master of Science, Vessey is already looking ahead to a possible doctorate in the future, based on the simple fact that he loves absorbing new details about his area of study. In the meanwhile, though, he had a bit of tongue-incheek advice for students hoping to duplicate his success.

"Listen, and don't skip class," Vessey said, with a chuckle. ■

Open textbooks lead to community contributions

MEGHAN SIRED

Had any cool geological experiences lately? University of Saskatchewan sessional lecturer Karla Panchuk hopes some of her students have, since she will soon be asking them to contribute to the class textbook by sharing photos and stories.

"I would really like one of my students to write about seeing a volcano for the first time: what the smells were, any vibrations they felt, how hard it was to get to the crater," said Panchuk, who specializes in geology and geochemistry. "I think stories make ideas stick far better than a list of facts."

Panchuk has learned that contributing to a textbook is a fairly seamless process if the book is classified as an open textbook, meaning it has an open copyright license

and is available online to be freely read by anyone. Since 2015 she has used an open textbook to teach her physical geology classes, and for the past six months she has worked on a large-scale revision and adaptation of the text, with the help of Joyce McBeth and Tim Prokopiuk in the Department of Geological Sciences.

Panchuk uploads a new version of the book once a chapter is completed.

"What I really like about open textbooks is that I have control of what's in there, and I don't have to cater to a publisher's timelines," said Panchuk. "I can make changes when I need to and I can easily fix errors, like typos."

If there are new discoveries or developments, Panchuk will add



Heather Ross said using open textbooks has saved U of S students close to \$800,000 since 2014.

those in, too.

"NASA is always discovering new exoplanets and Earthlike planets, and it's neat to be able to quickly update the textbook about the new information NASA announces," she said.

A graduate student is working with Panchuk and Indigenous communities to add stories about local geological events that have been passed down for generations.

"Geology textbooks do not have Indigenous points of view,



so we want to bring some of these Indigenous stories into the textbook, but we want to do it in a way that is respectful of their traditions," said Panchuk. "They're not our stories to tell, so we want to make sure that they're the ones telling the stories."

The act of students contributing to future learning material of a class is termed open pedagogy. According to Heather Ross, an educational developer at the U of S Gwenna Moss Centre for Teaching and Learning, research shows when students submit assignments that they know will be read by not only their instructor, the quality of their work goes up.

"Students now aren't only consumers, they're contributors," said Ross. "Research also shows that students do as well or better in courses that use open textbooks, likely because students can afford to read the resources they're assigned."

According to Ross, 4,000 students will use open textbooks at the U of S this academic year, which will result in a total savings of \$400,000, assuming that an average textbook costs \$100. Since Ross started tracking the use of open textbooks in the 2014-15 school year, instructors have saved their students close to \$800,000.

Ross hopes that soon classes within the university's online class search tool will show when a class uses an open textbook or if it is a Z-course. A Z-course, or zero

course, is a term that indicates there is no or minimal (under \$35) material cost for the class.

Panchuk and Ross have seen first-hand how pleased students are when they learn the class textbook is free.

"I've had numerous students express a great emotional relief that the textbook was open," said Panchuk. "It takes a bit of explaining sometimes. Some of them don't understand that it's just there online for them."

Ross acknowledges that it takes a lot of time for an instructor to switch to an open textbook, but there is financial support available to hire a graduate student or sessional lecturer to update ancillary resources, like a class PowerPoint presentation.

There's even an open textbook on making open textbooks.

"You only have to make it right for your course," said Ross. "It doesn't have to be a full textbook either, it can be a grouping of resources."

Instructors are encouraged to visit open.usask.ca for more information, or to register for an upcoming national conference. That event, entitled Teaching and Learning Today 2018, will be held in May on the U of S campus, focusing on open textbooks and indigenization and how they can complement one another.

> **Meghan Sired is a** communication co-ordinator with the Vice-Provost Teaching and Learning Portfolio.

Forever at rest at the U of S Halloween season revives old urban legends across campus

HENRYTYE GLAZEBROOK

It may be the lead-up to Halloween bubbling over with thoughts of ghouls and spirits, but in the past few weeks, employees at the Diefenbaker Canada Centre have had several encounters spurring on an urban legend concerning former Canadian Prime Minister John Diefenbaker.

Unexplained phenomenonalarms going off for no discernable reason or unexplained creaks and groans in seemingly empty roomsaren't uncommon at the centre, with claims of ghost sightings stretching back more than three decades, but some ghastly happenings are eerie enough to send a tingle up even the bravest of spines.

"Two of our docents were looking at the security cameras to check if there were any visitors in the gallery," said David Sparling, student docent and researcher at the Diefenbaker Canada Centre.

"In our replica Prime Minister's Office, one of my co-workers noticed a blurry, indistinct figure in the corner. She initially believed that this was just our iPad stand, but the other docent commented that it looked more like a person. Then, as they watched, the blurry figure vanished—as if a person had just left."

The answer to why the ghost of the revered former prime minister might be wandering the University of Saskatchewan may be found just around the corner from the main entrance to the centre, where he was laid to rest beside his second wife, Olive. The pair were buried there on Aug. 22, 1979.

Diefenbaker played an intimate role in planning his own funeral, arranging for a train-driven procession from Ottawa to Saskatoon, and garnering special approval from the provincial government and the U of S Board of Governors to establish the



Student docent and researcher David Sparling at the Diefenbaker gravesite on campus.



Sir Frederick William Gordon Haultain's ashes rest near the Memorial Gates.

on-campus gravesite.

The U of S, being Diefenbaker's alma mater, a Saskatchewan institution of great distinction and the place where he proudly served as the seventh university chancellor, was seen by the man as the perfect place

in which to end his rail-bound tour and rest for eternity.

"Diefenbaker was part of the first generation of students at the U of S, so he felt a deep connection because of that," Sparling said, adding that the former prime minister donated

HENRYTYE GLAZEBROOK

his estate to the university, contributing to the construction of the Diefenbaker Canada Centre in the process.

"Some of the steps that put him on the path to politics were first taken here; both getting his law degree and participating in the university's mock parliament as a student. He wanted to cement his legacy at the U of S, not just with the Diefenbaker Centre but also by being buried here and becoming something that people could pay their respects to for years and decades."

But problems arose when the time came to decide what flag would adorn his casket. Diefenbaker, a staunch defender of the Red Ensign which formerly represented Canada, was upset with the idea of cloaking his final resting place with the red and white Maple Leaf banner that

flies today-even after the decision was made to split the two half and half.

"Some claim that Diefenbaker did not approve of this pairing, that it caused his spirit to rest uneasily and that he still roams to this very day," Sparling said.

Diefenbaker is joined by Sir Frederick William Gordon Haultain, second chancellor of the U of S, as one of two people of historical influence buried on campus, with spooky tales cloaking their legacies.

Haultain, whose ashes were laid beneath a small bronze plaque near the Memorial Gates on Oct. 23, 1943, is said to sometimes walk the grounds near his resting place.

"Some people claim to have seen a lone, mysterious figure wandering around the gates late at night," Sparling said. "No one has managed to talk to this figure, because if they've ever approached, it has vanished."

In his roles as the first Premier of the Northwest Territories and Chief Justice of Saskatchewan, during which times he played a formative role in the founding of both Saskatchewan and Alberta, Haultain fought tooth and nail to keep partisan politics out of the Canadian west.

This staunch belief in bipartisanship—combined with a poor relationship with former Prime Minister Sir Wilfrid Laurier, who laid the cornerstone of the Peter MacKinnon Building-paints a vivid picture of why some believe Haultain's ghostly presence might roam around U of S grounds to this day.

"It's clear that his overall project of keeping partisan politics out of Saskatchewan was not successful," Sparling said. "Possibly that is a reason for his restless spirit to wander until such time as partisan politics are a thing of the past in Saskatchewan." 🔳



CONFERENCES

Current Options for Managing Pain and Addiction Conference

Oct. 27–28, 8 am–5 pm, Sheraton Cavalier Hotel. The Health Sciences Continuing Education Group is working with the College of Physicians and Surgeons of Saskatchewan to host a forum for all health-care providers and students to discuss the management of complex pain and substance use disorders. The recent rise in opioid related deaths and hospitalizations and growing prevalence of complex pain in the population requires clinicians to develop new skills to effectively prevent and manage those with these challenging conditions. For more information and to register, visit tinyurl.com/COMPAC2017.

SEMINARS/LECTURES

Gairdner Foundation Lecture – Putting the Brakes on Cancer Cells

Oct. 24, 3:30 pm, SaskTel Theatre, Royal University Hospital. Lynne Maquat, University of Rochester Medical Centre presents *Nonsense-mediated mRNA decay and human disease: Genome guardian and executor.* Maquat is renowned for her work on RNA decay pathways and their relevance to human disease. One of these pathways is nonsense-mediated mRNA decay (NMD). Her research has found that exposing breastcancer cells to a drug that inhibits NMD, then deleting the drug increases the rate of cancer cell death. For more information, email doreen.stumborg@usask.ca.

Indigenous food systems redefining food security: Lessons from community-based case studies from Manitoba, Africa and South Asia

Oct. 26, 3:30–4:20 pm, Room GB03 Health Sciences. Hosted by the Office of the Associate Dean, Research and Graduate Affairs and the Division of Nutrition and Dietetics and presented by Shailesh Shukla, Associate Professor and Graduate Program Chair in the department of Indigenous Studies at the University of Winnipeg. Shukla has collaborated with academic and research partners from Canada, Nigeria and South Asian countries on research projects on Indigenous knowledge systems and community-based resources management. This event is free and open to the campus community.

Department of Psychology's monthly colloquium series

Oct. 26, 3–4 pm, Arts 153. Natalie Dinsdale, U of S lecturer and PhD student at Simon Fraser University, will give a talk entitled *Bridging the Body & Mind: Applying Evolutionary Theory to Women's Health & Disease.* In this seminar, sex-specific factors in human evolutionary history that shape patterns of variation in personality traits and disease susceptibility will be examined. Because women experience three interpersonal reproductive contexts (sex, childbirth and breastfeeding), their bodies and minds face unique selective pressures relative to men. Members of the university community and the general public are welcome to attend. For more information, contact Peter Grant at 306-966-6675 or e-mail: peter.grant@usask.ca.

Twenty Years On: The UNESCO Recommendations on the Status of Higher-Education Teaching Personnel

Oct. 27, 9 am-5 pm, Room 1004, Education Building. The Humanities Research Unit with the support of the Harry Crowe Foundation presents Twenty Years On: The United Nations Educational, Scientific and Cultural Oraanization (UNESCO) Recommendations on the Status of Higher-Education Teaching Personnel. Learn more about this Canadian story and participate in discussions of where Canadian universities and college are now and where we need to go from here. Panelists include the current president of the Canadian Association of University Teachers and two past-presidents of this national organization, U of S colleagues recently and directly involved in UNESCO activities, Indigenous scholars, and student leaders. Free admission with reception to follow at the University Club. Contact len. findlav@usask.ca.

Urban river corridor: A challenge and an urban design opportunity

Oct. 27, 10:30–11:30 am, Room 2E83 Agriculture Building. The river in Saskatoon is under threat from the negative effects of gentrification. Paul Van Pul will present his view on an integrated river management concept, based on the European experience. For more information, visit usask.ca/~akkerman/geog346.

Dark Matter & Dark Energy Public Lecture

Nov. 2, 7 pm, Arts 241. Rainer Dick and Masoud Ghezelbash, Department of Physics and Engineering Physics present *Dark Matter & Dark Energy: How do we know they exist and why do we care?* All are welcome. For more information, visit artsandscience.usask.ca/news/

U of S Canada 150 Conversations with Former Prime Ministers on Canada's Future

Nov. 9, 3 pm, MLT Aikins Lecture Theatre (Room 150), College of Law. The U of S Canada 150 Project presents Chancellor Roy Romanow in conversation with former Prime Minister Paul Martin, as they talk about the past, present and future of Canada. Presented in partnership with the John A. Stack Memorial Forum.

COURSES/WORKSHOPS

College of Education Students' Society professional development workshops

These events are tailored to education students, but are open to everyone. There is a fee of \$4 for Education Students' Society members and \$6 for non-members. Please sign-up at the Education Students' Society office in Education Room 1009. For more information, visit education.usask.ca/ess
Oct. 20, 9 am-noon, Having Difficult Conversations. Learn about different techniques and strategies to engage others in constructive conversations involving difficult issues and emotional content.
Nov. 9, 4:30–6:30 pm, Relationship Building Workshop. This professional development session will allow students to learn about the importance of good student-teacher relationships and how these relationships can positively affect the classroom environment.

Copyright and your Thesis

Nov. 7, noon–1 pm, GSA Commons (Emmanuel and St. Chad). Join the university's copyright co-ordinator to learn and ask questions about copyright and your thesis. Topics discussed will include: using copyright-protected images in your thesis, using previously published text, how to find open materials, and how and when to seek permission from a copyright owner. RSVP to copyright.coordinator@usask.ca, and feel free to submit any questions or topics that you would like discussed.

THE ARTS

The U of S Jazz Ensemble

Oct. 14, 8 pm, The Bassment, 202 4th Ave N. Directed by Dean McNeill, the U of S Jazz Ensemble plays jazz standards and original compositions. Its members are students attending the university. Tickets can be purchased online at thebassment.ca. For more information, email dean.mcneill@usask.ca.

Power Houses and New Crown Land: Painting Canada (150)

Oct. 18, 4–6 pm, Arts 241. Artist Grant McConnell (BFA'83, MFA'94) will discuss the relationship between his art practice and the public institutions whose architecture, policies and pretensions he depicts trenchantly in his work. As someone who has been both a student and teacher at the U of S for decades, McConnell meditates on the privileges and limits of position, scale and status, and how power is embodied and distributed in Canada. This is the first of four talks sponsored by the Humanities Research Unit. For more information, visit: artsandscience.usask.ca/news/

Greystone Theatre presents: Girl in the Goldfish Bowl

Oct. 11–21 (no performance Oct. 15), 8 pm, Greystone Theatre, John Mitchell Building. The Governor General award-winning play *Girl in the Goldfish Bowl* is a satirical comedy that depicts the unstable political climate of 1960's North America while taking the audience on a philosophical journey of a young girl trying to grow up in an unstable environment. For tickets call 306-966-5188. For information, visit: artsandscience.usask.ca/news/

Movies that Matter: The Road Forward

Oct. 30, 7 pm, Broadway Theatre. *The Road Forward* connects a pivotal moment in

Canada's civil rights history—the beginnings of Indian Nationalism in the 1930s—with the powerful momentum of First Nations activism today. *The Road Forward's* stunningly shot musical sequences, performed by an ensemble of some of Canada's finest vocalists and musicians, seamlessly connect past and present with soaring vocals, blues, rock, and traditional beats. A tribute to the fighters for First Nations rights and a visceral call to action. Free admission. For more information, visit: artsandscience.usask.ca/news/

U of S Canada 150 Book Launch Series:

Nov. 6, 4:30 pm, Convocation Hall: The U of S Canada 150 Project is hosting a book launch event: *A Hero for the Americas, The Legend of Gonzalo Guerrero* by Robert Calder, U of S professor emeritus of English.

MISCELLANY

Drop-in Mindfulness Meditation

Each Monday until Dec. 18 (except Nov. 13), 3:30–4:30 pm, 2nd floor STM Chapel. Mindfulness is about learning to experience life fully as it unfolds moment by moment. While it does not eliminate challenges, it can help us meet and respond to life's pressures. Hosted by the Student Wellness Centre, these free sessions are offered to U of S students. For more information, visit: students.usask.ca/ articles/mindfulness-meditation.php

Sunday Mass at STM Chapel

Each Sunday until Oct. 22, 11 am–noon, join the campus ministry team for the celebration of the Eucharist. Come worship God in a welcoming environment with people from the campus community. For more information, visit stmcollege.ca.

School of Public Health Poster Fair

Oct. 20, 12:30–3:30 pm, Health Sciences D-Wing Atrium. The School of Public Health will host its annual poster fair showcasing its thesis students' research and the MPH student practicum projects undertaken in 2017. Visitors are welcome.

Johnson Shoyama Graduate School 10th Anniversary Gala

Nov. 9, 5–9 pm, Remai Modern, 102 Spadina Crescent East. The Johnson Shoyama Graduate School will host its 10-year anniversary gala dinner. The dinner will bring together students, alumni, faculty and partners to celebrate the school's achievements over the past 10 years. Presented in partnership with the U of S Canada 150 Conversations with Prime Ministers on Canada's Future project, the distinguished Right Honourable Paul Martin will discuss Canada's place in the world, with U of S Chancellor Roy Romanow. General tickets \$100, alumni \$75, students \$40. For more information, visit schoolofpublicpolicy.sk.ca

Next OCN: Friday, Nov. 10 Deadline: Monday, Oct. 30



INCIDENT REPORT:

The following is a list of incidents reported to U of S Protective Services in September. If you have any information about these, or any other incidents, please contact Protective Services at 306-966-5555.

Underage drinking:

Protective Services issued warnings to students in residence regarding underage drinking and alcohol in public, over the weekends of Sept. 2 and Sept. 9. Students are reminded that the legal age of consumption in Saskatchewan is 19, and that alcohol must be consumed in a licensed premises, or within one's private residence.

Stolen bicycles recovered:

Officers recovered two stolen bicycles during the week of Sept. 4. One bicycle was discovered abandoned on campus grounds, the other was in the possession of an individual. Protective Services made a lawful arrest of the individual and returned the bikes to their rightful owners.

Vehicles in bus mall:

City of Saskatoon Transit contacted the university to increase patrols of the bus mall due to a high number of private vehicles driving through the zone. The zone in front of Place Riel is marked for buses only, and additional vehicle traffic makes it difficult for buses and dangerous for pedestrians.

Stadium Parkade broken window:

Protective Services is looking for information regarding a broken window on the east side stairwell of the Stadium Parkade. The damage occurred roughly 30 minutes after midnight on Sept. 7, likely caused by a brick.

Theft from Health Sciences Building:

An individual damaged lockers and stole contents from at least one, on the 5th floor of health sciences B-wing on Sept. 9 or 10.

Griffiths Stadium damage:

Following the Huskies football game on Sept. 8, damage occurred to a tent, tables and chairs. The damage likely occurred between Sept. 9 and Sept. 11.

Arrest follows bike theft:

Officers witnessed the theft of a bicycle by two individuals on the morning of Sept. 16. Two individuals were caught and arrested by Protective Services for theft and possession of stolen property. Both were handed to the Saskatoon Police Service for processing.

Stranger in St. Andrew's Residence:

Protective Services received a call from a resident of St. Andrew's College, when he discovered a stranger in his room after leaving the room with the door unlocked for approximately 30 minutes. The individual left without issue, and the resident was advised to keep his room locked at all times.

Mendez makes most of technology

FROM PAGE 7

"I felt that for the next step, in terms of our ability to reach many more places, a wearable system that you can wear and communicate with is probably the next stage," said Mendez.

As with most gizmos and gadgets, the glasses' technology has evolved considerably since its debut, he added. Lag time, often an issue with real-time video, is mere milliseconds, allowing the viewer to perform intricate tasks like examining a wound. Mendez also touted the mobility of the product, which provides a higher degree of independence and flexibility for health-care practitioners.

"A paramedic or nurse or colleague can actually be using their hands without the need to hold anything," he explained. "You are in good communication with them, and you are seeing what they're seeing. At the same time, they have feedback of what they're showing you because they can look at the other screen."

Not surprisingly, Mendez has the same aspirations for the Google Glass project as he did with the robots, and hopes to see the two technologies working in tandem soon.

"These are not just isolated things that we're doing," he said. "We're doing this in a systematic manner to bring technology to the point that we will truly be able to take care of people wherever they are."

WHAT'S NEXT?

Mendez and his team will continue to apply technological breakthroughs to remote health-care issues. Currently, he and his team are developing a telepalpation device that will allow a surgeon to palpate an abdomen on a patient 1,000 kilometres away—in order to see the rigidity of the abdomen up close.

"We are really advancing on these peripheral technologies that will allow us to not only see the patient, talk to the patient, do an ultrasound, listen to their chest, but touch them," he said, adding that the technology is being developed in conjunction with the College of Engineering.

Another area of importance, he explained, is using virtual reality (VR) to create a richer reality environment for medical students. Most recently, he was part of a study with 80 medical students learning the complex anatomy of the human brain. Half of the students used traditional methods (lectures, textbooks and diagrams), while the other half used a VR brain structure to learn the intricate neuroanatomy.

"They could actually enter the brain and see the relationship with the different anatomical nuclei," he said.

Preliminary results showed that the students using the VR technology were able to retain the information to a greater degree. As an academic and a professor, embracing this dynamic technology for learning purposes is just as crucial for educating the next generation of physicians—and instilling the importance of technology in them.

"I think that's going to be a very important part of teaching, to be able to understand complex relationships in many dimensions," he said.

Back to the Canadian Space Agency, Mendez is exploring how technology can serve an astronaut in a voyage into deep space. One of the areas is going to be the issue of artificial intelligence in terms of constantly monitoring people.

"To be able to predict that you will have a heart attack in the next 24 hours, or to be able to control your sugars and have an algorithm that will determine the risk you have so that an intervention could happen and you can prevent a stroke, for example—those are the things that an astronaut will need some sort of autonomy and intelligence on," he said. "I think that's going to be part of the future."



U of S a hub of medical research

FROM PAGE 10

"(If) we can use our indicator to change, to intervene or not intervene, or escalate interventions based on actual tissue oxygen level (during surgery), we can fundamentally change how we look at resuscitation."

This has implications in terms of lives saved, as well as financial considerations, as the medical device industry is gigantic. Every time one of the monitors is used it costs at least \$200, which is significant, especially if the device isn't telling the physicians everything they need to know to make an informed decision.

And the University of Saskatchewan is one of very few places in Canada where research like this can logistically happen. With a medical school, veterinary college and chemistry department all in close proximity, the ability to carry out the testing is available to only one other university in Canada. And that ability to collaborate with so many specialists is almost as exciting to Gamble as the research itself.

"I think it's great that we're taking advantage of all of these features the University of Saskatchewan has at its disposal, and bringing them together."

Marg Sheridan is an online communications co-ordinator in the College of Medicine.

College bolsters student support

FROM PAGE 5

"The recent support of our government was needed and is greatly appreciated," Smith said.

Does all this mean the college is ready for accreditation? Smith thinks it does.

"We have changed dramati-

cally our approach to supporting students," he said. "We have a new curriculum that's fabulous. We have the structure now to continuously improve in these and other areas, and we are committed to doing this for our students long after the accreditors are gone. What UGME accreditation really wants to know: Are the people of Saskatchewan getting really well-trained doctors and are the students supported in that journey? And I feel that the work that we've done, it adds up to a resounding yes. Still, if you're not looking at the bigger picture, you'll always be in trouble on accreditation. So doing the work we've been doing to be an excellent school—the side effect is success in accreditation."

Kate Blau is a communications specialist in the College of Medicine.

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The Cancer Bomb



HAROLD E. JOHNS COLLECTION

October 1951

COBALT-60 THERAPY BEGINS

Nuclear medicine was a relatively new field when the world's first calibrated cobalt-60 therapy unit opened on campus in October 1951. The machine was designed by Harold Johns-Canada's first full-time cancer physicist and head of the physics department at the University of Saskatchewan—and built by John MacKay, owner of Acme Machine and Electric Co. in Saskatoon.

The machine used a radioactive source of cobalt and delivered it to patients using high-intensity radiation. The first patient, a 43-year-old mother of four, was treated for cervical cancer in November 1951, with a carefully calibrated dose of cobalt-60 radiation. She lived another 47 years.

Working alongside Johns was a bright scholar named Sylvia Fedoruk. During her esteemed research career, she developed the dosimeter, which allowed physicians to regulate the dose of radiation for each patient. She also developed a device that used radioactive iodine to determine if a patient's thyroid was cancerous.

Saskatoon's cobalt-60 therapy unit treated more than 6,700 patients until it was replaced in 1972, first by another cobalt radiotherapy machine, and later by a linear accelerator. By the 1960s, the cobalt-60 machine was standard equipment for radiation therapy worldwide. The technology has revolutionized cancer treatment and saved the lives of millions of cancer patients. By the end of the century, it was estimated that cobalt-60 therapy had helped more than 70 million people.

The original cobalt-60 machine is permanently housed at the Western Development Museum in Saskatoon.

