a place of mind
THE UNIVERSITY OF BRITISH COLUMBIA

UBC REPORTS

March 2011

3
UBC gets new eyes on Asia

5
HIV/AIDS and the forest connection

8
Celebrate Research: a week of discovery

Martin Dee Photograph

©istockphoto contour99

In the news

UBC REPORTS
VOLUME FIFTY SEVEN : NUMBER THREE
WWW.PUBLICAFFAIRS.UBC.CA/UBC-REPORTS

Executive Director
SCOTT MACRAE scott.macrae@ubc.ca

Editor
RANDY SCHMIDT randy.schmidt@ubc.ca

Design Manager
ARLENE COTTER arlene.cotter@ubc.ca

Public Affairs Studio
PING KI CHAN ping.chan@ubc.ca
AMANDA FETTERLY amanda.fetterly@ubc.ca

Photographer
MARTIN DEE martin.dee@ubc.ca

Web Designer
TONY CHU tony.chu@ubc.ca

Communications Coordinators
HEATHER AMOS heather.amos@ubc.ca
LORRAINE CHAN lorraine.chan@ubc.ca
JODY JACOB jody.jacob@ubc.ca
BRIAN LIN brian.lin@ubc.ca
BUD MORTENSON bud.mortenson@ubc.ca
BASIL WAUGH basil.waugh@ubc.ca

Advertising
PEARLIE DAVISON pearlie.davison@ubc.ca

Distribution
EMMY BUCCAT emmy.buccat@ubc.ca

Printer
TELDON PRINT MEDIA

Publisher
UBC Reports is published monthly by:
The University of British Columbia
Public Affairs Office
310 – 6251 Cecil Green Park Road
Vancouver BC Canada V6T 1Z1

Next issue: 7 April 2011

Submissions
UBC Reports welcomes submissions.
For upcoming *UBC Reports* submission guidelines: www.publicaffairs.ubc.ca/ubcreports/about.html. Opinions and advertising published in *UBC Reports* do not necessarily reflect official university policy. Material may be reprinted in whole or in part with appropriate credit to *UBC Reports*. Letters (300 words or less) must be signed and include an address and phone number for verification.

Submit letters to:
The Editor, *UBC Reports*
E-mail to publicaffairs@ubc.ca or
Mail to UBC Public Affairs Office (address above)

UBC NEWS ROOM
WWW.PUBLICAFFAIRS.UBC.CA/NEWS
Visit our online UBC News Room for the latest updates on research and learning. On this site you'll find our news releases, advisories, news extras, as well as a daily media summary and a real-time UBCNEWS twitter feed. You can also find resources including access to more than 500 faculty experts and information about UBC's radio and TV studios.

Website: www.ubc.ca/news
Tel: 604.822.NEWS (6397)
E-mail: public.affairs@ubc.ca
Twitter: @ubcnews

Publication mail agreement no. 40775044.
Return undeliverable Canadian addresses to circulation department.
310 – 6251 Cecil Green Park Road, Vancouver, BC Canada V6T 1Z1
Email: public.affairs@ubc.ca

a place of mind
THE UNIVERSITY OF BRITISH COLUMBIA
Public Affairs Office

Highlights of UBC media coverage in February 2011

Compiled by Heather Amos

UBC RESEARCH
Roasting coffee beans

United Press International, the ***Globe and Mail***, the ***Canadian Press***, the ***Vancouver Sun*** and others reported on a new study that suggests that roasting coffee beans creates antioxidants, which are believed to help protect cells from damage and premature aging.

"We found that the main contributor to antioxidant activity is the product of roasting," said lead author **Yazheng Lui**, a student at UBC's Faculty of Land and Food Systems who did the lab work as part of her master's thesis.

The work of Lui and her coauthor, professor **David Kitts**, also indicated that medium rather than the dark roast might be better if you want the maximum dose of antioxidants. The beneficial compounds created by the roasting process start to break down with excessive roasting at high heat.

Arctic fishing under-reported

Researchers with UBC's Fisheries Centre and Department of Earth and Ocean Sciences say Canada and other Arctic nations are not properly reporting their catch data to the United Nations. They estimate that 950,000 tonnes of fish were caught in Russian, Canadian and U.S. Arctic waters between 1950 and 2006, which is 75 times higher than reported.

The study by UBC's **Daniel Pauly** and **Drik Zeller** was reported by ***Reuters***, ***United Press International***, the ***Globe and Mail***, ***CBC***, ***CTV*** and others. The researchers explain that ineffective reporting has created a false sense of security about the state of Arctic waters.

"We now offer a more accurate baseline against which we can monitor changes in fish catches and to inform policy and conservation efforts," said Zeller.

Fewer big fish in the sea

A study by presented at the annual meeting of the American Association for the Advancement of Science (AAAS) by **Villy Christensen** of UBC's Fisheries Centre was reported by the ***Guardian***, ***Time***, ***ABC***, ***Agence France Presse*** and others.

It confirmed some previous indications that populations of predator fish at the top of the food chain have suffered huge declines, shrinking by around two-thirds in the past 100 years. It was also found that the total stock of "forage fish" has more than doubled over the past century. This study is the most comprehensive analysis ever of fish stocks in the world's oceans and how they have changed over the past century.

UBC EXPERTS COMMENT
Discussions on Egypt

UBC professors and students provided perspective on the uprising in Egypt for ***CBC***, ***TVO***, the ***Montreal Gazette***, the ***Province*** and others. They discussed the changing government, the role of social media and the role of women. Some members of the UBC community with ties to Egypt also spoke about their feelings about the protests and their support for their friends and family overseas.

"The key message is one of support for the people of Egypt," said **Tyseer Aboulnasr**, Dean of the Faculty of Applied Science at UBC. "Nobody knows who is driving this; it's not driven by a particular group. It is driven by people who have been waiting for this for a very, very long time."

Olympic legacies

One year after the Olympic and Paralympic Winter Games came to Vancouver, UBC experts provided insight on the lessons learned and legacies of the event for the ***Globe and Mail***, ***CBC***, the ***Vancouver Sun***, the ***Province*** and others.

Among the UBC researchers who provided expert commentary were **Tsur Somerville**, a professor in the Sauder School of Business, Faculty of Education's **David Anderson**, **Sid Katz**, a UBC professor and Olympic specialist, and **Joe Weiler**, a UBC law professor who has been studying the legacies of the 2010 Winter Games.

Laura Moss, director of the Canadian Studies Centre, talked about how the Games helped redefine us as a nation. "It was a significant event for community-building," she said. "Canadians' sense of confidence and assurance caught the international community by surprise."

Canada's man in Asia

When Joseph Caron was 21, he sewed a Canadian flag on his backpack and headed abroad looking for adventure.

by Basil Waugh

Before joining UBC, **Joseph Caron** served as Canada's ambassador to seven Asian countries, including China, India and Japan.

Martin Dee Photograph

After nearly 40 years in Canada's Foreign Service—where he served as Canada's top diplomat to Asia – it is fair to say Caron found adventure in spades.

Through major global events like the SARS outbreak, Caron has helped to manage Canada's complex relationship with Asia, where he served as ambassador to seven countries, including China, India, Japan and North Korea during his career.

In July, he joined UBC's Institute of Asian Research (IAR) after retiring from the Foreign Service. As a leading expert on Canada-Asia relations and international affairs, Caron now shares his expertise with students and researchers as an honorary professor.

Few Canadians have witnessed the rise of China, India, Japan and Korea as closely as Caron. The emergence of Asia furthers the globe's continuing evolution into "multi-polar world" of new and traditional powers, he says.

"America and Europe will survive their travails and remain powerful on the world stage," says Caron. "At the same time, China is on the path of superpower status, and India has great potential if it can harness its growing technological and economic might."

Caron's relationship with UBC began nearly 20 years ago when he collaborated with two of UBC's top experts on Asia—Paul Evans of IAR and the Liu Institute for Global Issues and Brian Job of UBC's Dept. of Political Science—on a plan for improved security collaborations between Canada and Japan.

"I feel like UBC has been part of my world forever," says Caron, who participated in the Vietnam cease-fire mission as a junior embassy official in the 70s. "I really cherished the opportunity to work closely with Canadian universities when I was abroad or visiting Canada."

"To really succeed you need to learn the language," says Caron, who speaks English, French, Japanese and some Mandarin and Hindi.

Today, instead of advising federal and provincial government and business leaders as ambassador, Caron shares his real-world experiences with the next generation of leaders.

"It is very rewarding to work with students," says Caron, who was also Canada's top representative to Mongolia, Bhutan and Nepal. "I hope my experiences can help to illuminate and clarify the theories that students explore in studies and research."

One of Caron's key messages to students is the importance of language in diplomacy and business.

"To really succeed you need to learn the language," says Caron, who speaks English, French, Japanese and some Mandarin and Hindi. "You need to be able to speak directly to people and read their newspaper and literature. That's what sets the pros apart from the visitors, and how you begin to truly understand a country."

Caron helped organize eight G8 summits and served as the main diplomatic staff for former Prime Minister Jean Chretien and former deputy Prime Minister John Manley at four Asia Pacific Economic Cooperation (APEC) summits.

Caron, who was born in 1947 and raised in Pain Court in Southwestern Ontario, says representing his fellow citizens is an unforgettable honour.

"As corny as it sounds, the opportunity to serve your fellow Canadians is truly satisfying," Caron says. "It is thrilling to operate in a milieu that is not your own. I've had a front row seat to the world and I've loved every minute of it." ●

Learn more about UBC's Institute of Asian Research at: www.iar.ubc.ca

"Since HIV can further impoverish those already poor, we expect HIV-affected households to depend more on forests."

Facts about Malawi

15
Million total population

11.9%
HIV prevalence among adults

68,000
Deaths/year from HIV/AIDS

90%
People living in rural areas

74%
People are living in poverty

53
Years life expectancy

90%
Subsistence farming

11,850,000
Hectares is the size of Malawi

CATERING BY
wescadia
superior servings. superior service.

Save 27%
on catering!

All Drop Deliveries & Full Service Catering on campus.

UBC Faculties and Departments are exempt from the HST & gratuities. Take advantage of this savings opportunity.
We accept JV / UBC Department Card / Visa / MasterCard / Debit
www.catering.ubc.ca 604.822.2018

A division of UBC Food Services

the point grill

A fully licensed restaurant with an upscale casual dining atmosphere on the south side of campus.
Wide screen HD TV's | fully licensed | convenient to-go service

HOURS:
To Go Counter: 9:30am - 10:00pm (M-F)
11:00am - 10:00pm (S&S)
Restaurant: 11:00am - 10:00pm (M-S)

Located at 2205 Lower Mall, Marine Drive Residence, Building #4
For hours of operation visit www.food.ubc.ca

UBC FOOD SERVICES

celebrate research 2011

March 4-11, 2011

A campus-wide showcase of public events on a variety of research topics and themes.

All members of the UBC community are welcome.

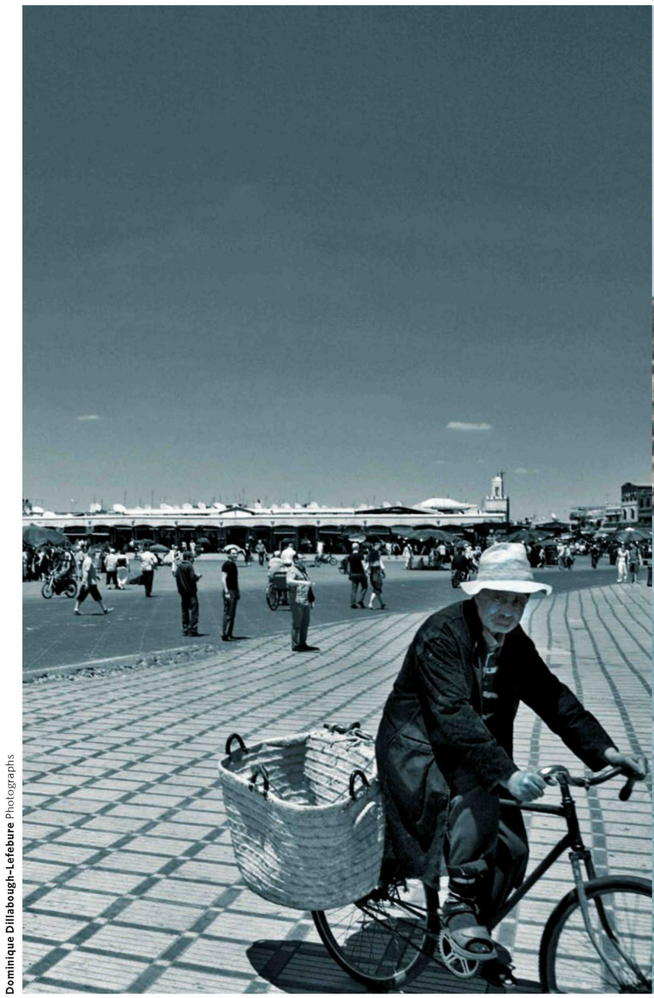
Visit our online calendar of events for more information.

celebrateresearch.ubc.ca

Vacation blues: Global tourism can harm communities

Jet setting to exotic destinations is fun for travelers, but one UBC researcher is looking at how tourism impacts local communities.

by Heather Amos



Dominique Dillabough-Lefebure Photographs

You've been riding a bus through a foreign country and arrive early in the morning in a town square. As you get off the bus, young boys approach you and start speaking to you. They try several languages—English, French, Italian, Arabic, Spanish, Portuguese—waiting for you to pick up on one of them.

The boys are offering to help you with your luggage and to direct you to a nearby hotel. If you let them, they will get a small sum of money from the hotel and maybe a tip. And according to Jo-Anne Dillabough, an associate professor in the Faculty of Education at UBC, tourist businesses like these are a growing problem.

These businesses keep boys out of school, so although they seem cosmopolitan and can speak five or six languages, they won't have fundamental skills, like reading and writing.

Dillabough studies the global tourist industry, where tourism develops from outside of a country and investors, such as a large North American hotel chains, can gain financial success with little benefit for the people who live there. This work emerged out of some earlier research on male youth subcultures, which Dillabough made into a book, Lost Youth Culture in the Global City: Class, Culture and the Urban Imaginary.

Today, she looks at how the global tourist industry has changed the dynamic of local communities in Morocco and what this means for the young boys growing up in the area.

Up to 40 per cent of working class male youth will leave compulsory elementary school to work in the tourist industry.

"You'll see very young boys, sometimes younger than nine years old, working in the tourist markets and in the hotels," says Dillabough, who is also the David Lam Chair in Multicultural Education. "They stop going to school and work to provide some income for their families."

Tourism took off in Morocco in the late 1970s as a result of government investment, which included a global advertising campaign, and after groups of hippies and celebrities like Cat Stevens and Jimi Hendrix had visited the area. Today, wealthy and influential developers from Europe and North America are developing rural villages into major coastal tourist destinations.

Up to 40 per cent of working class male youth will leave compulsory elementary school to work in the tourist industry, explains Dillabough. Most of these boys are from economically disadvantaged homes and many live in single-parent families and must work to provide for their families.

Dillabough and her colleagues at the University of Cambridge, in the U.K., have found that many of the young boys and men are thankful that tourists come to their towns but they cannot see the negative effects.

The tourist industry is keeping boys out of school and it undermines their hopes for education and employment in the future. Dillabough says this reality ultimately prevents the boys from imagining alternative futures, and tourism becomes the ultimate solution.

"It changes how the boys identify themselves as cultural actors," says the researcher. "It also changes the village because it changes the memories residents have of their own cultural traditions."

"Many of us are guilty of going on holiday and gazing 'exotically' at something that we imagine is different," she says. "But this practice shapes how local youth view their own cultural traditions and in many cases forces young people to refashion and market their 'exotic' identities in order to survive."

This issue is not unique to Morocco, and Dillabough thinks that international human rights groups and academic researchers need to pay more attention to the contradictions associated with global tourism and the constraints placed on these young men.

"The sociology of the global tourist industry is not as well developed as it could be," she says. "Particularly concerning is the position of economically disadvantaged young people." ●

Mobile school

In Morocco, where young boys often don't finish school in order to work in the tourist industry, Jo-Anne Dillabough, an associate professor in the Faculty of Education at UBC, is hoping to run a pilot program testing the success of a mobile school.

The school would allow both boys and girls to be educated about other forms of employment and about cultural and political life more generally while they continue to work in tourism. She also hopes to educate young people about some of the harms of global tourism, including providing information on the sex-trade and trafficking industry.

"The purpose is to assist in presenting young people with wider political and cultural images of their employment, as well as providing them with a landscape of possibilities that showcases multiple paths into the future," says Dillabough.

March 4 – 11 2011

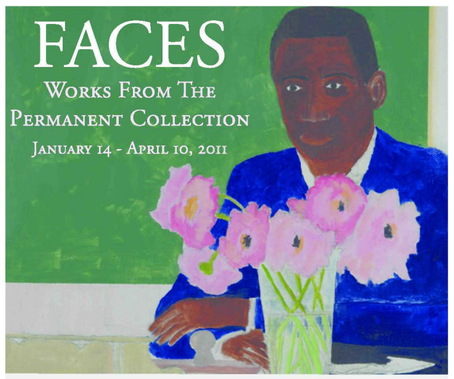
YEAR IN HEADLINES

a place of mind

BBC NEWS
CBS NEWS
THE CHRISTIAN SCIENCE MONITOR
THE CHRONICLE OF HIGHER EDUCATION
CNN
CTV
THE ECONOMIST
THE FINANCIAL TIMES
THE GLOBE AND MAIL
THE HUFFINGTON POST
INSIDE HIGHER ED
KELOWNA DAILY COURIER
LE MONDE
MACLEAN'S
THE MIAMI HERALD
NATIONAL GEOGRAPHIC
NATIONAL POST
NATIONAL PUBLIC RADIO
NBC TODAY
THE NEW YORK TIMES
NEWSWEEK
PC WORLD
THE PHILADELPHIA DAILY NEWS
THE PHILIPPINE STAR
PSYCHOLOGY TODAY BLOG
SCIENTIFIC AMERICAN
THE SEATTLE TIMES
THE SYDNEY MORNING HERALD
THE TELEGRAPH
THE TIMES
TSN
USA TODAY
THE VANCOUVER SUN
THE WALL STREET JOURNAL
WIRED

Last year, UBC's faculty researchers and students made international news headlines for their global advances. Their initiatives, innovations and insights are captured in the 2009|10 *Year in Headlines*.

ubc.ca/yih



Also presented:

Rebecca Belmore: The Named and the Unnamed
Satellite Gallery, 560 Seymour Street, Vancouver
until April 10

Official Portraits
Walter C. Koerner Library, 1958 Main Mall, UBC
until April 30

free admission

MORRIS AND HELEN **BELKIN ART GALLERY**
belkin.ubc.ca

4

10:00 AM – 11:30 AM
Early Child Development: From Cell to Society
Human Early Learning Partnership
Vancouver Campus
Library Processing Centre

12:30 PM – 4:30 PM
Creating Change, Creating Impact Symposium
Universities Allied for Essential Medicine/Neglected Global Diseases Initiative
Vancouver Campus
Life Sciences Centre

5:00 PM – 7:30 PM
For Better or for Worse: Women's Efforts to Promote Men's Health
School of Nursing
Off Campus
Café Scientifique/Juliet's Café

5

8:15 PM – 9:30 PM
UBC Excellence in Research Lecture
Vancouver Institute
Vancouver Campus
Woodward Instructional Resource Centre

6
1:00 PM

Algae are way cool

Beaty Biodiversity Museum
Vancouver Campus

7

10:00 AM – 12:00 PM
Recent Advances in Diabetes Treatment
Faculty of Pharmaceutical Sciences/ Canadian Diabetes Association
Vancouver Campus
Telus Studio @ the Chan Centre

10:00 AM – 12:30 PM
Nursing Research: Impacting Lives/ 2011 Research Day at Providence Health Care Research Institute
Off Campus
St Paul's Hospital, Vancouver

10:00 AM – 1:00 PM
UBC Pain Lab Open House
Department of Psychology
Vancouver Campus
Douglas Kenny Building

12:00 PM – 1:00 PM
Microfluidics: From Jell-O to diagnosing disease
Faculty of Applied Science
Vancouver Campus
Michael Smith Laboratories

12:00 PM – 1:00 PM
Roadmap to an integrated design and manufacturing of polymer composite products
Lunchtime Feature Presentation
Okanagan Campus
University Centre Ballroom UNC200

5:00 PM – 7:30 PM
Marketing in the Social Interest
Sauder School of Business
UBC Robson Square
Theatre

5:00 PM – 7:00 PM
Wyman Lecture: Diversity and Democracy
Faculty of Graduate Studies
Vancouver Campus
IKBLC Lillooet Room

5:00 PM – 7:00 PM
Chaucer and Multilingual Writing in Medieval England
Green Collage
Vancouver Campus
Green College Coach House

5:00 PM – 7:00 PM
For Better or for Worse: Women's Efforts to Promote Men's Health
Off Campus
Bohemian Cafe
525 Bernard Avenue, Kelowna

6:00 PM - 7:00 PM
Visioning low-carbon communities to build energy literacy
Faculty of Forestry/
Faculty of Applied Science
Off Campus
Vancouver Public Library

7:00 PM
Ghana: Digital Dumping Ground
Film screening and panel discussion
Off Campus
Rotary Centre for the Arts
421 Cawston Avenue, Kelowna

8

10:00 AM – 5:00 PM
Heart + Lung FEST 2011
James Hogg Research Centre
Off Campus
Sheraton Wall Centre, Vancouver

10:00 AM – 3:00 PM
Postdoctoral Showcase
Postdoctoral Fellows Office
Vancouver Campus
St. John's College

12:00 PM – 1:00 PM
Forestry Research Seminar
Faculty of Forestry
Vancouver Campus
Forest Science Centre

12:00 PM – 1:00 PM
The "livable" suburbanized city: post-politics and the influence of Vancouver
Faculty of Applied Science
Vancouver Campus
Kaiser Building

12:00 PM to 1:00 PM
Memory politics and digital media: a new chapter in Argentina's past
Lunchtime Feature Presentation
Okanagan Campus
University Centre Ballroom UNC200

3:00 PM – 5:00 PM
Postdocs in Medical Research
Child & Family Research Institute
Off Campus
Chan Centre for Family Health Education, Vancouver

7:00 PM – 9:00 PM
Move It! New Aspects in Mobility
Faculty of Medicine
Off Campus
St. Paul's Hospital, Vancouver

9

8:30 AM – 5:00 PM
Heart + Lung Health FEST 2011
James Hogg Research Centre
Off Campus
Sheraton Wall Centre, Vancouver

8:30 AM – 2:00 PM
Mutiple Sclerosis Workshop
endMS Research & Training Network, Western Pacific
Vancouver Campus
UBC Brain Research Conference Room

12:00 PM - 1:00 PM
When it comes to Biomechanics... is injury prevention the best medicine?
Faculty of Applied Science
Vancouver Campus
Kaiser Building

12:00 PM – 1:00 PM
Psychological ownership: dilemmas in knowledge sharing, innovation and change
Lunchtime Feature Presentation
Okanagan Campus
University Centre Ballroom UNC200

2:00 PM – 6:30 PM
Forestry Graduate Research Poster Showcase
Faculty of Forestry
Vancouver Campus
Forest Sciences Centre Atrium

3:00 PM – 5:00 PM
Health Care: Does Collaboration Make a Difference?
College of Health Disciplines
Vancouver Campus
Institutional Resource Centre

4:00 PM
Genomics and Medicine: Should you be afraid?
Expert presentation and short film screening
Genome BC
Okanagan Campus
Fipke Centre FIP140

5:00 PM – 7:00 PM
When efficiency trumps quality: discussions about what happens when health care is treated as a commodity
School of Nursing/CIHR
Off Campus
Roundhouse Café, Vancouver

5:30 PM – 6:30 PM
The Burgess-Lane Memorial Lecture
Faculty of Forestry
Vancouver Campus
Forest Sciences Centre

6:00 PM – 8:00 PM
Clean energy for the future
Faculty of Applied Science
Off Campus
Vancouver Public Library

10

8:00 AM – 5:00 PM
Heart + Lung Health FEST 2011
James Hogg Research Centre
Off Campus
Sheraton Wall Centre, Vancouver

10:00 PM – 5:00 PM
Sci Treck Tradeshow
UBC Supply Management
Vancouver Campus
Life Sciences Centre

12:00 PM – 1:00 PM
Future Delta: motivating climate change action grounded in place
Lunchtime Feature Presentation
Okanagan Campus
University Centre Ballroom UNC200

12:30 PM – 1:30 PM
CfIS Your Degree in Three
College for Interdisciplinary Studies
Vancouver Campus
C.K Choi Building

3:30 PM – 5:30 PM
Interactive Research Colloquium on Health and Occupation
Department of Occupational Science & Occupational Therapy
Off Campus
Vancouver General Hospital

5:30 PM – 8:00 PM
Celebrate Research Awards Gala
Office of the VP Research & International
Vancouver Campus
Old Auditorium

11

8:00 AM – 7:30 PM
Heart + Lung Health FEST 2011
James Hogg Research Centre
Off Campus
Sheraton Wall Centre, Vancouver

11
11:00 AM – 4:00 PM

School of Library and Archival Sciences Research Day

School of Library and Archival Sciences
Vancouver Campus
Irving K. Barber Learning Centre

12

8:00 AM – 5:00 PM
Heart + Lung Health FEST 2011
James Hogg Research Centre
Off Campus
Sheraton Wall Centre, Vancouver

For more information on these and other Celebrate Research events in **Vancouver, visit: celebrateresearch.ubc.ca.**

For more information on these and other Celebrate Research events related to the **UBC Okanagan Campus, visit: www.ubc.ca/okanagan/celebrateresearch.**

a place of mind

av system design & integration
digital signage
presentation webcast & capture
av equipment rentals & repair
audio-visual services
av supplies & equipment sales

Create.
Communicate.
Educate.

creative services
photography
video & media production
medical illustration/animation
graphic design
large-format printing
lamination

www.mediagroup.ubc.ca

Media Group

Woodward IRC Building, Room B32 • 2194 Health Sciences Mall
mediagrp@interchange.ubc.ca • T: (604) 822-5561

Berkowitz & Associates Consulting Inc.

Statistical Consulting

Research Design • Data Analysis • Survey Sampling • Statistical Education

Jonathan Berkowitz, Ph.D.
4160 Staulo Crescent, Vancouver, B.C. V6N 3S2
Office: 604-263-1508 • Fax: 604-263-1708
Email: witz1@interchange.ubc.ca

Your Conference Planning Partner at UBC

Hosting a conference at UBC? We can make it easy.

We offer full management and registration services and have experienced and knowledgeable staff. Let us help you customize a program to suit your needs and budget.

With UBC's unique venues and state-of-the-art facilities, your meeting at UBC will no doubt be a memorable success!

VANCOUVER
T 604 822 1060
E conferences@housing.ubc.ca
ubcconferences.com

OKANAGAN
T 250 807 8050
E conferences.ubco@ubc.ca
okanagan.ubcconferences.com

©istockphoto Slonov

How can parents prevent teenagers from dropping out of high school?

by Vivian Tran and Basil Waugh

New UBC research finds that the importance parents place on education at home can play a major factor on teens' decision to continue high school or drop out.

This key finding of a new UBC-Copenhagen Business School study raises new questions about how parents' education levels influence high school dropout rates.

Previous studies have shown that children are far more likely to drop out of high school if their parents are also high school dropouts. For example, recent data suggests boys whose parents dropped out of high school have a 16 per cent chance of dropping out of school themselves. That's compared to a dropout rate of less than one per cent for boys whose parents both have university degrees.

However, UBC economists Giovanni Gallipoli, David Green and Kelly Foley (who is now at the Copenhagen Business School) suggest that the family trait that matters most is not parental education, but how much parents value education.

To date, researchers have focused on two areas to explain dropout rates by family education levels: contrasts in cognitive (literacy, skills acquisition and problem-solving) and non-cognitive skills (self-esteem, motivation, efficacy, perseverance and initiative) of children.

The new study, released by the Canadian Labour Market and Skills Researcher Network (CLSRN), quantifies the influence of these skills on the dropout decision, but also explores the role of parental valuations of education, which they define as the social and economic importance of education that parents express to their children.

The researchers find that children with identical skill levels may be more or less likely to complete school depending on their parents' characteristics and inclinations. For example, children with median level skills are far less likely to drop out of high school if their parents place a high value on education.

Similarly, a boy whose parents never finished high school will be just as likely to drop out as another boy whose parents both have a Bachelors degree if those boys have similar skill levels and their parents place the same value on education.

"This suggests that the family trait that matters most is not parental education, but how much parents value education," says Gallipoli. "This is important because it shows that kids can still thrive in school if parents make education a priority around the house. A parent's education isn't as important as we previously thought."

According to the researchers, parents can express the importance of education in a variety of ways, including family discussions about educational opportunities and benefits, rewards for academic performance and college savings accounts. An ongoing study will help to determine which parental strategies are most effective.

The researchers argue that their results suggest dropout rates can be reduced in ways other than the slow, cross-generational process of raising parental education and early skill development, although parental valuations of education are also likely to be deeply ingrained and difficult to shift except over the very long run.

The authors also suggest governments can support parents by expanding mentoring programs and extending hours in school and publicly provided child care. ●

View the study here: clsrn.econ.ubc.ca

New protocols could transform telecommunications

For the past decade, the telecommunications industry has been researching ways to harness and pool energy from individual cell phones as a way to boost the entire network.

by Lorraine Chan

Such a system could use the existing hardware and signals for mobile communications.

UBC researcher Diomidis Michalopoulos has developed communication protocols that help to move wireless providers one step closer to this vision.

A postdoctoral fellow in the Dept. of Electrical and Computer Engineering, Michalopoulos focused on principles of fairness and efficiency to anticipate the ebbs and flows of energy usage.

"Similar to how geese fly in a V formation so they're stronger and more aerodynamic, my protocols will assess and select channels based on signal strength and energy level."

Michalopoulos has garnered international recognition for his discovery. In 2010, he was one of three scientists worldwide to receive a Marconi Young Scholar Award. The award recognizes scientists who have made a major impact in their field by the age of 27—Guglielmo Marconi's age when he made the first transatlantic radio transmission in 1901.

"Diomidis' work has a very clear application that can be commercialized to benefit society," says Panos Nasiopoulos, Director of the Institute for Computer, Information and Cognitive Systems (ICICS).

"Diomidis' ideas may lead to a major overhaul of the telecommunications industry," says Prof. Robert Schober, ICICS member and Michalopoulos's supervisor in the Dept. of Electrical and Computer Engineering.

Currently, wireless service providers have to set up a network of terminals to provide coverage.

"Similarly, if you have a network system where users will offer part of their resources to assist other users, the network can host considerably more users."

The signal is relayed from the source to destination terminals, supported by a network of relay terminals so that information reaches its destination—the user.

"Right now, telecommunications companies are scrambling to keep up with customers' appetite for mobile content, from text messages to video on demand," says Michalopoulos.

However, with a system where each cell phone user is acting as a mobile relay, the entire network is strengthened – resulting in fewer dropped calls and dead zones in areas such as basements.

"A network using the protocols like the ones I'm working on would increase coverage in low-signal areas and be able to re-route around obstacles," Michalapoulos says.

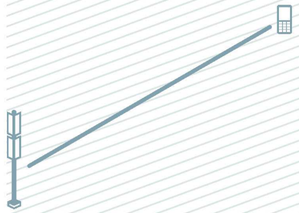
As well, mobile networks will be able to host a large number of users beyond the current saturation point of the existing infrastructure.

"Consider having to host a dinner," says Michalopoulos. "It's much easier to feed a large number of guests if you ask them to contribute to the communal food. Similarly, if you have a network system where users will offer part of their resources to assist other users, the network can host considerably more users."

By pooling resources, individual users and the network as a whole would consume less energy. Along with reducing transmission power, the cooperative energy model would lessen environmental impact since service providers wouldn't need to build fixed base stations.

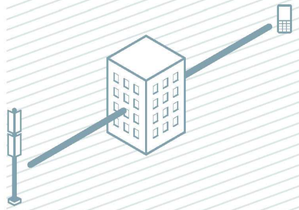
Michalopoulos points out that cooperative mobile communications presents an ideal model for China and India, where the penetration of wireless users is much higher than in North America.

"Given the population density of those regions and the number of cell phone users, those countries could use a different network structure than the one in the Western world." ●



1

The power transmitted by cellular subscribers is variable and depends on the distance—and generally the environment—between the user and network antenna.



2

If there is an obstacle between the user and the network antenna, the user requires extra power. Depending on the size of the obstacle, communication may be impossible due to dead zones.

3

With a cooperative communications model, users can assist each other to overcome dead zones and also reduce transmission distances, thus cutting down on the amount of transmission power required.

www.aplaceofmind.ubc.ca
A daily aggregation of content from the University of British Columbia

a place of mind
The University of British Columbia
The Media Group
Large Format Poster Printing
Guaranteed Next Day Service*
*extra day for lamination
Drop off your file in person
Email slides@interchange.ubc.ca
Upload www.mediagroup.ubc.ca/mg_upload_form.php
Questions? Call 604 822 5769
Woodward IRC Building – Lower Level
Room B32, 2194 Health Sciences Mall
Located north of UBC Hospital

West Coast Suites
Deluxe Hotel Suites, West Coast Style
EVERYONE CAN STAY WITH US
Contemporary, beautifully appointed, limited service deluxe hotel suite for visitors and business travelers to Vancouver.
- Centrally located on campus
- Fully-equipped kitchen and complimentary wireless internet
- Ideal for short or long term stays
- Available year round

Conferences & Accommodation Vancouver
T 604 822 1000
E reservations@housing.ubc.ca
www.ubcconferences.com

Copies Plus
COPY + IMAGING CENTRE
VOLUME PRINTING & COPYING
NEW LOWER PRICES
print more save more
• High Speed B/W & Full Colour • Lamination • Full Colour Posters
• Wide Format B/W Copies, Prints and Scans • Self Serve Copiers • Booklet making
• Coil, Cerlox, Velo & Wire-O binding • Folding ...
• Email your files or ftp your large files to us
Proudly Serving Since 1987 www.copiesplus.ca
1950 West Broadway 604-731-7868
Open 7 Days Mon-Fri 8am-9pm Sat-Sun 10am-6pm

Iona Pacific
Inter-Religious Centre
Discovering, modeling, and disseminating best practices in inter-religious research, teaching, and collaboration to address critical local and global issues.
www.ionapacific.ca
Iona Pacific 2011 Visiting Scholar: Dr. Amyn B. Sajoo
Course Offering, Faith and Modernity: Islam in a Secular Age
July 11-15, 2-5 pm
Public Lecture, Public Islam: Citizenship, Identity, Anxiety
Tuesday, July 12, 7 pm
Amyn B. Sajoo is a scholar at Simon Fraser University's Centre for the Comparative Study of Muslim Societies & Cultures

UBC's newest school gets a new director

By Patricia Hall

Martin Dee Photograph

Dr. David Patrick will take up the post of director of the School of Population and Public Health in April.

Ask Dr. David Patrick about Canada's early explorer David Thompson, and he'll tell you how his leadership style is still relevant today.

"He took the time to try to understand the First Nations he was meeting along the way," says Patrick, who will become the new director of the School of Population and Public Health (SPPH) in April. "He wasn't up on a podium looking for laurels. He was just doing a thoroughly professional job of exploring the unknown, mapping it, and making the world more accessible."

SPPH—UBC's newest school—houses 45 full-time faculty, 125 clinical, adjunct, associate and emeritus faculty, 83 administrative and research staff, and 250 graduate students. Its research and teaching focus on themes within population and public health: epidemiology and biostatistics; global health and indigenous populations; health care services and systems; maternal-child health; occupational and environmental health; public health, emerging threats and rapid response; and social and life course determinants of health. Faculty members and students conduct research here and around the world.

A recent example of SPPH faculty impacting health internationally is Assoc. Prof. Steve Morgan, who was appointed to the World Health Organization's Consultative Expert Working Group on Research and Development. Morgan is bringing his expertise in the economics of pharmaceutical markets and drug development to the working group's wide range of international experts.

"The formation of the school that [founding Director] Martin Schechter catalyzed is allowing the full critical mass at UBC to come together, with the potential for a much bigger impact on policy and research provincially, nationally and internationally," says Patrick. "We need to be a home for anyone interested in our overall vision and mission of population and public health regardless of their discipline—from the humanities through any aspect of the sciences. SPPH brings the potential for broad interdisciplinary contributions not simply to the health care system, but to the broader applications of population health and public health prevention."

Prior to coming to this new role, Patrick served as Associate Director of STD/AIDS Control, then as Director of Epidemiology Services at the BC Centre for Disease Control. He completed his MD in Ottawa and his internal medicine and infectious diseases training in 1991. Early in his tenure at BCCDC, he completed the Master of Health Sciences at UBC.

"Strangely enough, it was the epidemiology course I took from Martin Schechter that sealed my interest in this path," he says. Patrick joined the Dept. of Health Care and Epidemiology as an associate professor in 2001 before becoming a full professor in SPPH in 2009.

"Teaching brings me back to the roots of curiosity—why seeking new knowledge is not just important but also good fun," he says.

When he's not working, Patrick is cycling, skiing, sailing, or blowing off steam on his trumpet with his rhythm and blues or jazz bands. Or he's spending time with his wife of 23 years, Patricia, and their two teenage daughters.

Although he'll be continuing with some communicable disease research and his teaching, he plans to devote his efforts to leading SPPH and renewing its strategic plan.

"I'm going to be spending the majority of my time here on campus trying to make sure this ship is on the right course," he says. "What I aspire to do in a leadership position here is to keep this place imbued with a sense of optimism about what it can become." ●

Crocodile tears? Facial clues reveal fake or sincere remorse

by Jody Jacob

A new study led by Leanne ten Brinke, a PhD Candidate of psychology at UBC's Okanagan campus, investigates how genuine and falsified remorse reveals itself on the human face, and how these facial clues can help detect whether a person is faking regret or sincerely sorry.

Published in February in the journal Law and Human Behavior, ten Brinke's study examined and coded the facial behaviors associated with emotional deception in videotaped accounts of true personal wrongdoing, accompanied by either genuine or fabricated remorse, among 31 Canadian undergraduate students.

"From the coding process we knew what emotions were present, we knew the duration of each emotion, and we also knew the sequence," says ten Brinke. "So we were able to compare these variables in the context of genuine and falsified remorse."

"We were able to compare these variables in the context of genuine and falsified remorse."

The study's findings have important implications for judges and parole board members, who look for genuine remorse when they make their sentencing and release decisions.

"Obviously offenders are motivated to pretend to be remorseful and legal decision makers are motivated to detect crocodile tears," says ten Brinke.

Her analysis of nearly 300,000 frames of both the upper and lower face showed that participants who displayed false remorse exhibited more of the seven universal emotions (happiness, sadness, fear, disgust, anger, surprise, and contempt) than those who were genuinely sorry.

"We found that during falsified remorse, people showed a greater range of emotional expression," she says. "They were more likely to show anger and contempt, where as the genuine folks didn't show these kinds of emotions."

Working with colleagues Stephen Porter and Brian O'Connor from the Centre for the Advancement of Psychology and Law (CAPSL) at UBC's Okanagan campus, and Sarah MacDonald from Memorial University of Newfoundland, ten Brinke's research showed that the sequence of facial emotions could also reveal important clues to deception.

"Particularly in the lower face, liars were much more likely to be what we termed as 'emotionally turbulent,'" says ten Brinke. "This means they were more likely to jump from positive to negative emotions immediately. During genuine remorse, people are more likely to return to a neutral emotion in between the extremes." ●

"Our bodies simply don't know how to respond to such a diet, which is unprecedented in our evolutionary history."

outtakes

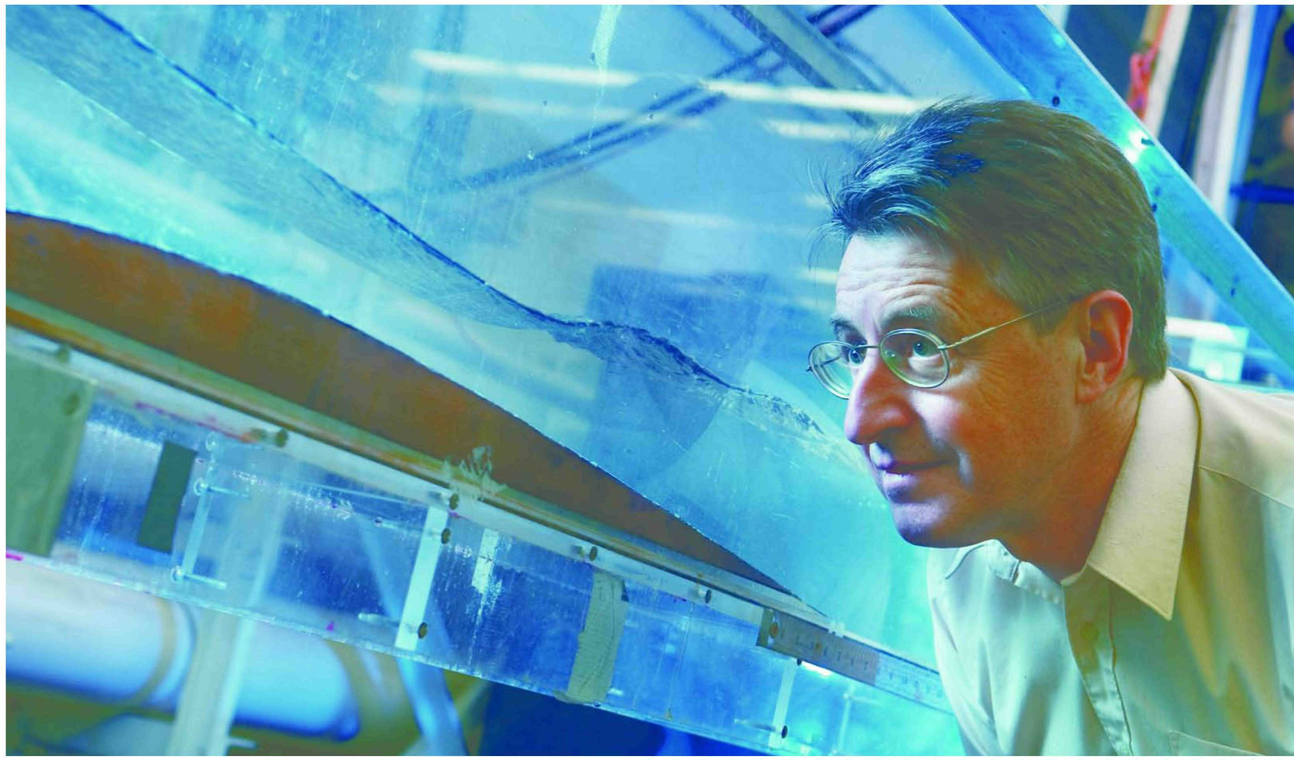
Reflections on academic life

Water waves and physics

by Lorraine Chan

UBC physicists and civil engineers have successfully tested a theory by eminent physicist Stephen Hawking. In 1974, Hawking posited that black holes emit a weak level of radiation even as they exert gravitational pulls so strong that little can escape, not even light. The UBC team published results in a recent issue of *Physical Review Letters*.

Professor **Greg Lawrence** reads the waves in a six-metre flume.



Study co-author Prof. Gregory Lawrence, who teaches in the Faculty of Applied Science, helped to design simple experiments that featured water flowing over an obstacle in a six-metre flume. Holder of a Canada Research Chair in Environmental Fluid Mechanics, Lawrence provided expertise in investigating an analogy between water waves and black holes.

How did you get involved in this study?

I was intrigued by [UBC theoretical physicist] Bill Unruh's discovery that the mathematical equations describing some aspects of the physics of black holes are the same as those governing water waves in a moving fluid.

Were you surprised that you got the results you did?

It was a collaboration that you could never plan. Frankly, we achieved more than I had dreamed possible with such simple equipment in such a short period of time. It has been the most fulfilling research experience I've had.

What was one of the "aha" moments?

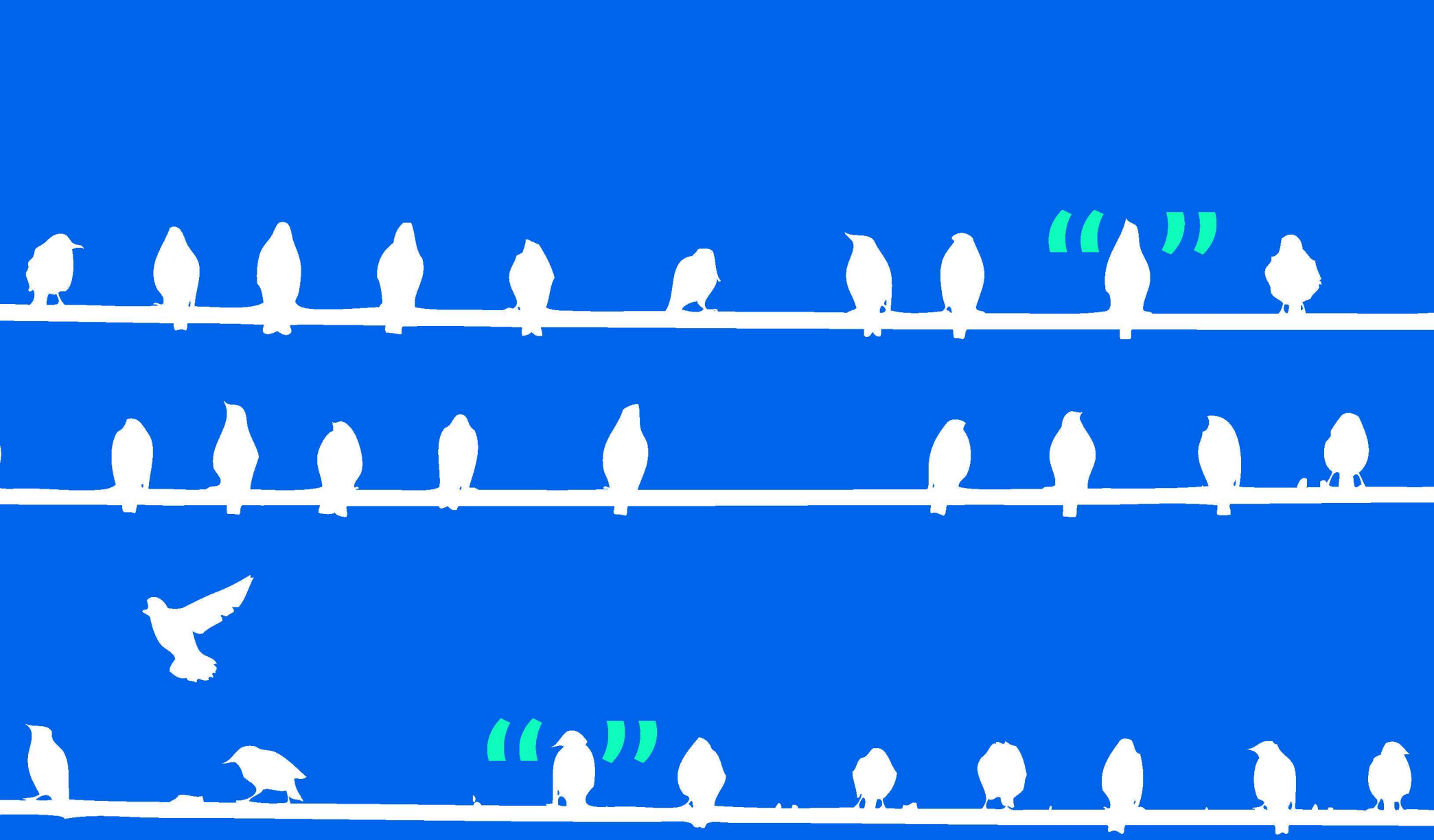
At one point, Bill and I were watching long waves in the flume and saw something we didn't expect: a small group of short waves that appeared after the long waves disappeared. It was very subtle, but we had seen something new. We turned to each other and it was like "Did you see that, or was it a ghost?"

What made the research experience so fulfilling?

Several things. The experience of working with an interdisciplinary team on a problem that was completely new to me. The discovery of results of great interest to theoretical physics using simple experiments performed in a flume usually devoted to undergraduate teaching. The realization that these experiments also revealed new aspects of water wave mechanics that are counter to what I had been taught. The prospect that our results are of engineering relevance, for example, to the study of flooding caused by tsunamis traveling up rivers. Finally, I used to stick my hand in the flume to illustrate waves travelling upstream. But it didn't work because I wasn't imposing long enough waves. In future I will ensure that I generate longer waves.

Learn more about the findings at: www.science.ubc.ca/news/505.

To learn more about Prof. Lawrence's research, visit: www.civil.ubc.ca/people/faculty/faculty-lawrence.php



We had a hunch that
if we brought together
a diverse range of UBC voices,
the result would be inspiring.

We were right.

Read. Share. Subscribe. Contribute

www.aplaceofmind.ubc.ca

A daily aggregation of content from the University of British Columbia