



## In The Media

**April – June 2017** 

## More women for STEM

As part of National Engineering Month, mechanical engineering student & research assistant Daniela Cortes organizes a STEM event to inspire young women into the field of engineering and technology.

**COVERAGE TYPE** Digital **APRIL 2017** Niagara-News

#### NIAGARA COLLEGE URGES WOMEN TO JOIN STEM

11 APR 2017



Team "Crypton", Kaitlyn Kettle (left), Kevin Stefanchuk (middle left), Lucy Nigro Stefanchuk (middle right) and Sharon Keller (right), constructing a man-made structure using supplied materials. A tear member must be able to walk underneath the structure to win the prize. The interactive activity promotes critical thinking and problem solving skills. Photo BY Lisa Brown

#### By LISA BROWN

#### Staff Writer

Women comprise about five per cent of students in Niagara College's School of Technology Programs. The college held its second annual student event challenge to promote engineering and its role in society and to help get more women into technology fields.

The event was one of 500 across Canada during March's NEM (National Engineering Month) by Engineering Canada.

Daniela Cortes Aristizabal, a second-year Mechanical Engineering student and research assistant, and Diana Serna, a first-year Mechanical Engineering student, represent the four female students in this diploma program. Both women organized and emceed the NEM event in The Core to inspire girls and promote the important role of women in technology.

Cortes Aristizabal says not only is the college promoting its engineering programs, the research and innovation centre and 3D scanning and printing, but it's also targeting a "niche market" to increase recruitment of women and representation in these areas of the college.

"We definitely want more women to enroll in our engineering and technology programs... It's a very stable and successful career path that you can take," said Cortes Aristizabal.

Cortes Aristizabal says a gender gap exists amongst engineering careers because women and men tend to have different, stereotypical upbringings. Boys aid their fathers in working around the home and fixing vehicles while girls spend time with friends and play at playgrounds. She says she feels welcomed and comfortable around peers in her program, but more inclusion of women is needed to support other women in these heavily male-saturated STEM (Science Technology Engineering and

### First 3D printer of its kind in Canada

**NC's Walker Advanced Manufacturing** Innovation Centre is now the home to the Fortus 900mc Gen 2., the first 3D printer of its kind in the country. Its first job was printing a matching window trim for a 1934 Dodge Dr.

### Niagara College 3D-Prints Replica of Window Trim for 1934 Dodge



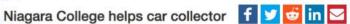
Innovation Centre at Niagara College reverse-engineered a matching window trim for classic collector Phil Foster's 1934 Dodge DR. The Research & Innovation division had recently insta a new Fortus 900mc Gen. 2 3-D printer from Stratasys at its Welland campus. The research to reverse-engineered Foster's existing window garnish moulding and designed a 3D CAD mire copy of the existing window garnish molding, and then printed the new component. Foster described the venture as a win-win and, while happy with his custom part, he is also proud that his project has provided real-world applied research experience for the student "These garnish mouldings just aren't around anymore," explained Foster who had spent yea searching unsuccessfully for a matching window trip.

Tags: Niagara College

#### Most advanced 3D printer belongs to Niagara College

NEWS Apr 24, 2017 Niagara Falls Review







Senior application specialist Charles Lecompte and junior co-op student Nathaniel Landry use the Fortus 900mc Gen. 23D printer. (Melanie Ross/Special to Postmedia Network)

And although he and his wife Gwen have access to a network of other vintage ca the Antique & Classic Car Club of Canada, Niagara Chapter, they still could not fi

finish restoration with 3-D printing

Recently a friend suggested he enlist the help of applied research students at the

and then printed the new component. Foster described the venture as a win-win The Innovation Centre currently is the country's only material beta testing facility

This story has been updated to correct the correct cost of the printer

installing a new Fortus 900mc Gen. 2 3-D printer from Stratasys at its Welland ca A real-world state-of-the-art teaching aid for students at Niagara College also has practical applications for The research team reverse-engineered Foster's existing window garnish moulding members of the community.

he is also proud that his project has provided real-world applied research experie A brand-new 3D printer, the Fortus 900mc Gen. 2, is the first of its kind installed in Canada, says the college.

**COVERAGE TYPE** Digital, Print

APRIL 2017 Niagara College, Canadian Metal Working, Print Action, St.Catharines Standard, Inside 3D Printing

## Precision Ag and the environment

Dr. Mike Duncan presents to the International Joint Commission about Niagara College's role in solving the farm runoff problem through precision agriculture technologies he and his team has worked on for the last decade.



**COVERAGE TYPE Video APRIL 2017** <u>Vimeo</u>



# Carolyn Mullin a leader in Niagara

Carolyn Mullin, Manager, Dissemination & Outreach with Research & Innovation, is spotlighted as part of the Leadership Niagara class of 2017. Carolyn was selected as the sole manager to represent Niagara College in the Community Leadership Program.

#### **CAROLYN MULLIN - NIAGARA COLLEGE**



'Tis Monday and no better way to kick off the week than with a spotlight on another member of our #LNClass2017. Say hello to Carolyn Mullin from Niagara College Canada. Follow Carolyn's journey with #LNClass2017.

**COVERAGE TYPE** Digital **APRIL 2017** Leadership Niagara

# Malker Advanced Manufacturing Innovation Centre

# SONAMI, an additive manufacturing success

In a story by online specialty publication 3D Printing Industry the benefits of additive manufacturing are touted and the Southern Ontario Network for Advanced Manufacturing and Innovation (SONAMI) was cited as an example.

**COVERAGE TYPE Digital**APRIL 2017 3D Printing Industry

British manufacturing company Renishaw is supporting the establishment of a specialist medical 3D printing center in Southern Ontario, Canada. Known as the Additive Design in Surgical Solutions (ADEISS) Centre, the project is the result of a partnership with the London Medical Network (LMN), Renishaw, and Western University (WU).

ADEISS aims to provide London, Ontario with a leading centre for the production of metal additive manufactured medical tools and implants with the project funded by a \$5 million USD (\$6.8 million CAD) investment.



Dr. Michael Strong, Dean of the WU's Schulich School of Medicine & Dentistry at the announcement of ADEISS. Photo via Western University.

### \$1 million grant for chair renewal

Thanks to a \$1 million federal grant Dr. Mike Duncan will continue another five years as the Natural Sciences and **Engineering Research Council (NSERC),** for the Industrial Research Chair for **Colleges (IRCC) in Precision Agriculture** & Environmental Technologies.

#### Niagara College farm researcher receives \$1M grant

NEWS May 02, 2017 Niagara Falls Review







Mike Duncan, left, industrial research chair at Niagara College, is the recipient of a \$1 million provincial grant to continue his research to help farmers improve their practices through data collection. Pictured from left, Duncan, winemaker and college instructor Gavin Robertson, and Neal Pilger, an industry collaborator from Profile Geomatics, show three ways to collect data with a drone, robotics on the ground and stationary sensors. (Supplied photo)

Niagara College's industrial research chair has received a five-year grant to continue his research and work on an interactive web-tool designed to help farmers farm better.

The \$1-million grant is a renewal from the Natural Sciences and Engineering Research Council and will allow Mike Duncan and his team to continue working on the Research Crop Portal, a project he started roughly 10 years

#### Niagara College researcher awarded \$1 million

Mike Duncan continues research with crop portal

Farms.com

Mike Duncan, Industrial Research Chair for Niagara College, is receiving a \$1 million provincial grant for his precision ag

He will use the grant to continue collecting data to help producers use this technology.

Duncan is recognized as a world leader in precision agriculture

He is the creator and head of the Research Crop Portal, a web-tool for producers to use data from precision ag technologies.



The study will provide quality improvements on the Crop Portal and other wireless equipment. Producers can have more control over their data through user-friendly software and immediate access to key information.

The team's goal is to develop tools which will help Canadian producers better understand developing technology

"The last five years have been assembling the data and the tools to learn as much as we can about precision ag, and, in doing so, carving out a niche in Canada," Duncan said in a release on May 2.

The grant is part of the federal government's \$37.4 million research budget.

Funding is supplied by the Natural Sciences and Engineering Research Council (NSERC) for projects at colleges and institutes

**COVERAGE TYPE** Digital, Print MAY 2017 Niagara College NSERC, Welland Tribune, Farms.com,

### NC research team at core of apple cider launch

The CFWI Innovation Centre team gets attention for its part in developing Reinhart's Red Apple Light Cider – now being sold in **Ontario LCBO stores.** 

Thursday, May 25, 2017 Another new brew in the area Stayner | by Mariane McLeod light cider from Stayner The vinegar plant in Stayner is returning to its roots, making cider. Reinhart's Foods began business as a cidery in 1910

but for the last 60 years has been making vinegars and other food products like maraschino cherries The new cider is called Red Apple, will have 3.8 percent

alcohol, and is being called a light cider. It is already available at LCBO stores across Ontario in pint cans. It's also available at some grocery stores.

Scott Singer with Reinharts, says sales are already impressive. He says the first pints were available over the holiday weekend, and he says people in our area were very supportive of the new product.

Reinhart's will continue to make its vinegar and other fruit products along with the cider.

Reinharts' is just the latest entry from our area in the booze market, with three breweries opening in Collingwood in the last few years, and a cidery in Thol started brewing its beer 30 years ago.



Reinhart Foods launches the first "Light" beverage in the Canadian cider category



its kind in the Canadian cider market at 3.8% ABV. As consumers are increasingly aware of what goes into their food and drink. Reinhart's cider is proudly made with one single ingredient - apple cider - without any artificial flavours or colours added. Reinhart's will be sold in 475 mL cans for \$5.20 each at the LCBO and select grocery retailers across Ontario.

#### Stayner business branches into hard cider market

Red Apple Cider is a different direction for company started in 1898







#### **Reinhart Foods launches Red Apple Light Cider**

ublished on May 24th, 2017 | by OBN News

Stayner - Reinhart Foods - a producer of baking products, vinegar, pie fillings, dried fruits and more - today introduced its first entry into Ontario's cider market with its Reinhart's



The low-ABV cider, measuring at 3.8%, is made in Stayner using Ontario apples rated at medium sweet. Apple varietals were not specified.

"Reinhart's Light Cider meets the two-pronged desire for a light beverage and a 'natural and clean' ingredient list," says Scott Singer, General Manager, and third-generation family member of Reinhart Foods, "With the help from our team of specialists at Niagara College, we worked very hard to perfect the taste of pure apples in this cider. We believe that its crisp flavour and pure ingredients, coupled with its small-town care, will be what draws consumers."

Reinhart's Red Apple Light Cider is available now in 473ml cans for \$3.20 each at the LCBO and select

**COVERAGE TYPE** Digital, Print

MAY 2017 Creemore.com, Ontariobev.net, Newswire.ca, Bayshorebroadcasting.ca, Torontosun.com

## Lyndon Ashton joins the research team

Niagara native Lyndon Ashton is announced as the new Manager for Niagara College's Canadian Food & Wine Institute Innovation Centre (CFWI IC) and Technology access Centre (TAC).

**COVERAGE TYPE** Digital MAY 2017 ncinnovation.ca

#### CANADIAN FOOD & WINE INSTITUTE INNOVATION CENTRE

#### **Lyndon Ashton - New Manager for CFWI Innovation Centre**



O May 29, 2017

Centre manager Lyndon Ashton is joined by newest members to the CFWI IC research team: Kelly Byer (I), lab technologist and senior food scientist Ana-Cristina Vega-Lugo (r) in the Food Quality Lab at the NOTL campus.



### Welland landfill slated for public space

A Niagara College team of faculty and environmental/horticultural students will provide detailed research on the old Atlas Landfill remediation site so it can be turned into a useful public space for the City of Welland.

**COVERAGE TYPE** Digital, Print JUNE 2017 Welland Tribune

#### **Turning landfill into useful space**

Jun 08, 2017 Niagara Falls Review











Welland Atlas Landfill site

Turning the Atlas Landfill remediation site into a useful public space is the goal of a project that will see the City of Welland, Dillon Consulting and Niagara College environmental and horticultural studies students work together over the next year.

"There is a lot of public interest on the future of this site, along with discussions on potential opportunities," said Mayor Frank Campion. "We're looking forward to hearing from the community and partnering with Niagara College."

The site, off Woodlawn Road beside the Welland River, stands 220 metres above sea level, and towers about 40 metres above its surrounding landscape. It has nearly reached its operational lifespan, said the city in a release, adding a detailed plan is necessary to research options, consult with the public, and plan for legislated closure and future land use apportunities

## NC Food & Wine Institute showcased

The Golden Horseshoe Food & Farming Alliance features the CFWI IC in its monthly newsletter.

**COVERAGE TYPE** Digital **JUNE 2017** <u>FoodandFarming.ca</u>



All photos provided by Niagara College

Nestled in the heart of Niagara's rich wine and culinary country, at Niagara College's Niagara-on-the-Lake Campus, the Canadian Food and Wine Institute (CFWI) provides students with valuable hands-on experience and academics in all aspects of food, wine, beer and artisan distilling.

Five years ago, the College's Research & Innovation division was given an unprecedented opportunity to transform the food and beverage

industry in Canada with more than \$4 million in federal, provincial and industry funding, to establish what is now the CFWI Innovation Centre at the NOTL campus. The announcement was made during a visit by Her Royal Highness, the Countess of Wessex.

Today, the Innovation Centre team offers a full suite of services to support industry innovation and commercialization of new products and processes in the food and beverage sector. From new recipe development to shelf-life testing and nutritional labelling, the CFWI Innovation Centre pairs industry partners with faculty, recent graduates and students with the right expertise and equipment to meet industry needs.

The Centre leverages the resources of the College's commercial brewery and hop yard, commercial winery and vineyard, and commercial kitchens, while also operating a microbiology lab, chemistry lab, sensory and consumer testing labs, shelf-life and packaging lab, and related commercialization solutions to allow industry partners to be market ready.



## 1Awards Winners Announced

The FirstOntario-created 1Awards are handed out in downtown St. Catharines. Co-sponsored by Niagara College, the top three businesses will all receive services from the Research & Innovation division.

**COVERAGE TYPE** Digital, Print **JUNE 2017** National Post

## 1Awards Niagara recognizes unique local businesses that enrich their communities



# Conquering the food supply challenge

Dr. Mike Duncan explains in a major online publication *Techvibe*, how his research team is using automation and wireless sensor technology to collect data in fields and vineyards to give to farmers so they can farm smarter.

JUNE 2017 Tech Vibes

#### Our Food

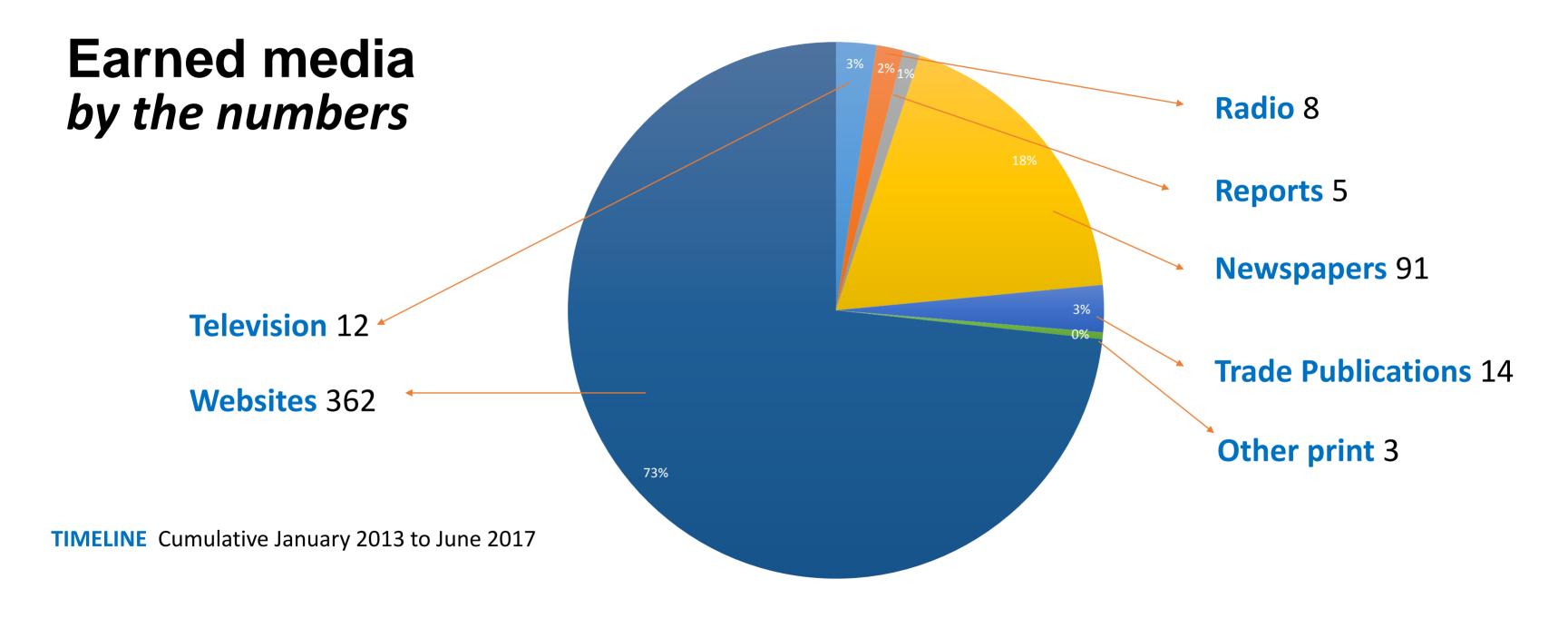
Let's discuss food security. It goes without saying that with a larger population you need a larger food supply, and with climate change already having an impact globally, Mother Nature has made our growing seasons unpredictable.

This is where I see automation being utilized to offset this volatility. Niagara College's Research & Innovation division is currently working on a project that uses automation and wireless sensor technology to collect data in fields, orchards and vineyards in southern Ontario. By using sensors that are connected to the cloud, the farmers of the future will know when an incoming storm is approaching, and be able to get an exact reading on the heat and humidity of their crops so they're no longer wasting water or spraying chemicals on crops that don't require them.

Ontario dairy farmers are already deploying robots to milk their cows, increasing production by almost a third while saving them tremendous amounts of personal time and resources.

#### Our Air

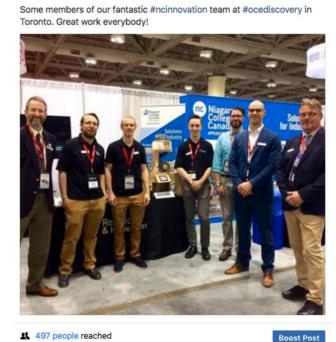
That leaves just one significant challenge: maintaining the quality of our air. Biking and carsharing continue to show great potential in cutting greenhouse gas emissions, but I believe businesses can and should take the lead on this area of environmental stewardship.











Research & Innovation

Published by Myles Fisher [?] · May 16, 2017 · ❷



Published by research@niagaracollege.ca [?] · June 14, 2017 · @

Research & Innovation

**SOCIAL MEDIA:** <u>Facebook</u> **TIMELINE** As of June 2017

**April** 440 people reached

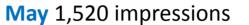
May 497 reached June
640 people reached







April 692 impressions







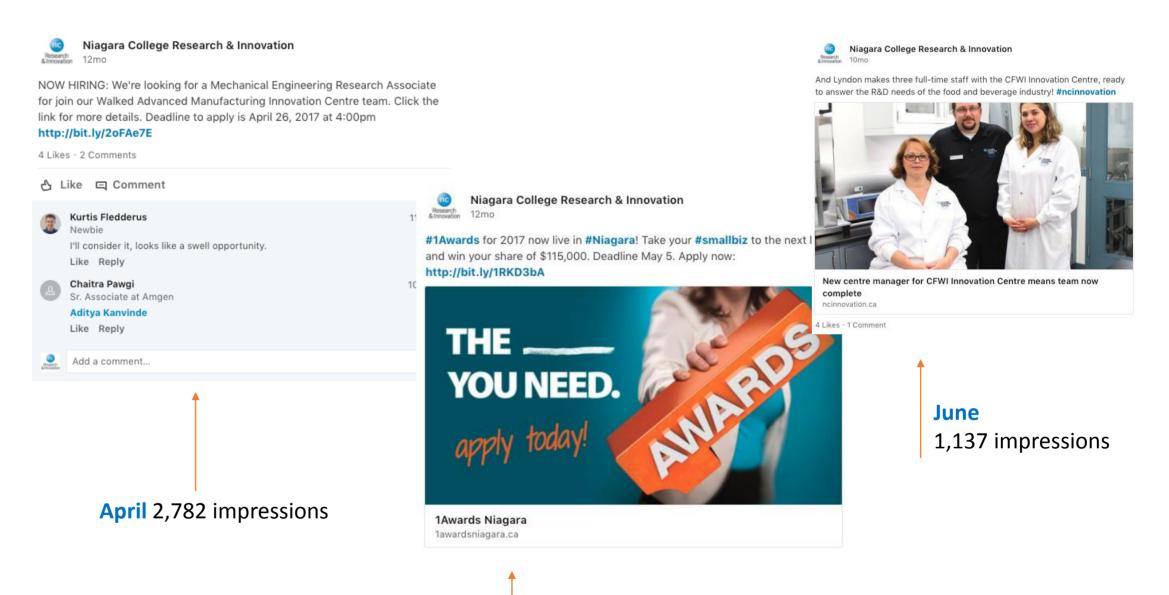
June 2,420 impressions

**SOCIAL MEDIA:** Twitter

**TIMELINE** As of June 2017







**SOCIAL MEDIA:** LinkedIn

**TIMELINE** As of June 2017

May 1,047 impressions



For more information visit: **ncinnovation.ca** 

#### **SOLUTIONS FOR INDUSTRY**

Providing innovation solutions to business and key industry sectors through applied research in partnership with Niagara College faculty and students.

