"Building Partnerships in Care"









# **Our purpose:** Make a difference

As a member of the Janssen Pharmaceutical Companies of Johnson & Johnson, Janssen Inc. is dedicated to addressing and solving the most important unmet medical needs of our time. Driven by our commitment to the passionate pursuit of science for the benefit of patients, we work together to bring innovative ideas, products and services to patients across Canada and around the world.

À titre de membre du groupe des entreprises pharmaceutiques Janssen de Johnson & Johnson, Janssen Inc. s'emploie à répondre aux besoins non satisfaits les plus importants de notre temps. Poussés par notre passion de mettre la science au service des patients, nous collaborons à de nouvelles solutions, produits et services pour le bien des patients dans le monde entier.

# Nous mettons la science **au service des patients**

Betsy Gross, Lilies and Carp Artwork from The Creative Centre Janssen is proud to feature artwork created by people affected by the illnesses and diseases we are committed to treating and preventing.

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#### **ISOPP 2014 Exhibitors**



























# ISOPP XIV XIV INTERNATIONAL SYMPOSIUM ON ONCOLOGY PHARMACY PRACTICE April 2-5, 2014 • Montréal • Canada

## "Building Partnerships in Care"

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#### Welcome from the ISOPP President

On behalf of myself, the ISOPP Secretariat and Committee Chairs it gives me great pleasure to welcome you to beautiful Montreal and ISOPP XIV. This milestone event marks the third time we are gathering in Canada: Toronto (although we weren't officially a Society yet), Vancouver, and now Montreal; as well as the additional milestone of completing our move to Canada.

This is a challenging and exciting time for our Society as well. In 2016, we will officially transition to annual from bi-annual meetings. While this will undoubtedly place some fiscal challenges on some members to continue to attend every year, it will also mean that ISOPP Symposia will be in [hopefully] your part of the world every three years instead of every six.

Thank you to our gracious local hosts, the Canadian Association of Pharmacy in Oncology, Carlo DeAngelis and the Planning Committee, and Tara Leslie, Alex Chan and the Scientific Program Committee for producing a first-class Symposium. Please make the most of all aspects of the Symposium including the scientific sessions, the exhibits, and above all take advantage of opportunities to network and meet new friends.

Thank you to all of our sponsors for their incredible ongoing support. Please visit their booths in the Exhibit and Poster Hall.

I look forward to seeing you at the General Assembly and throughout the Symposium.

John Wierrikowski

John T. Wiernikowski
Clinical Pharmacist, Paediatric Haematology/Oncology
McMaster Children's Hospital
Clinical Assistant Professor of Paediatrics
McMaster University, Canada



ISOPP President



April 2-5, 2014 · Montréal · Canada

"Building Partnerships in Care"

#### Welcome from the CAPhO President

I would like to welcome you to Canada for ISOPP 2014 on behalf of the Executive Committee of the Canadian Association of Pharmacy in Oncology (CAPhO). This is the third time that the ISOPP Symposium has taken place in Canada and it is our privilege to be the host organization once again.

It has been a pleasure for CAPhO to work in collaboration with ISOPP to bring you this outstanding Oncology Pharmacy Symposium with the theme Building Partnerships in Care.

I want to thank the Planning Committee, chaired by Carlo DeAngelis and the Scientific Program Committee co-chaired by Tara Leslie and Alex Chan who have given so much time and effort to create a program rich in educational updates and current research developments. I would also like to thank the sponsors for their generous support of the Symposium.

Please note, the CAPhO Annual General Meeting will be held on Wednesday at 17:00. I look forward to seeing all CAPhO members there.

ISOPP 2014 is a great opportunity for us to come together to share successes, discuss challenges and learn from and be inspired by one another.

Have fun in Montreal and enjoy the Symposium!

Joan Fabbro

Chemotherapy Certification Pharmacist Provincial Pharmacy Group BC Cancer Agency, Canada



**CAPhO** President



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"Building Partnerships in Care"

#### Welcome from the Symposium Chair

On behalf of the Planning Committee, welcome to the XIV International Symposium on Oncology Pharmacy Practice (ISOPP 2014), and of course, the "belle province" of Quebec.

Our goal is to provide you with an informative, engaging and leading edge program, held in a world-class location. We hope you will agree that we have been successful on both counts.

The Symposium program includes something for everyone with four topical plenary sessions, seven concurrent sessions each with three streams (Clinical, Research and Fundamental), more than 70 poster presentations and, of course, numerous opportunities to network and connect with old and new colleagues.

ISOPP 2014 could not have been a success without the support of the Canadian Association of Pharmacy in Oncology (CAPhO) Executive Committee and the hard work of the Planning and Scientific Program Committee members. All of their dedication and input is very much appreciated.

I would also like to thank our generous sponsors for their support of this important Symposium. I encourage you to take the time to visit the exhibits, as this is a great opportunity to learn about new services and products that may benefit your work and of course your patients.

While you are here in Montreal, I hope you are able to spend some time enjoying what Canada has to offer. Montreal is a city rich in culture and history and a well-deserved reputation as one of the most liveable cities in North America.

Welcome to ISOPP 2014!

Carlo DeAngelis

Clinician Scientist - Oncology Pharmacy Department of Pharmacy, Sunnybrook Odette Cancer Centre, Canada

Carlo Dell'ngelis

ISOPP 2014 Symposium Chair



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#### Welcome from the Scientific Program Committee Co-Chairs

On behalf of the Scientific Program Committee, it is our pleasure to welcome you to the XIV International Symposium on Oncology Pharmacy Practice. The Committee has worked diligently to bring you an educational program with thought-provoking plenary sessions and exciting breakout sessions addressing clinical, research and fundamental topics in oncology pharmacy practice.

For our daily plenary speakers, we welcome Mike Lang, a film maker, who will share his experience as a cancer survivor; Rachel White, with a discussion of changes within a dynamic system to improve safety; David U and Eric Cropp who will provide their perspectives in oncology medication best practices, Thomas Connor with an update from NIOSH, and a closing plenary panel that will share the global viewpoints in oral antineoplastic agents.

The Symposium theme is Building Partnerships in Care. As oncology pharmacists, we make partnerships with our patients, our patient care colleagues, and cancer care researchers to improve our patients' cancer experience and optimize health outcomes. We believe ISOPP 2014 is the premier venue for you to learn, network, and discover innovative ideas to advance your practice. We hope that you will feel inspired by the program content and depart with new enthusiasm and ideas to integrate into your home practice partnerships.

Thank you to our fellow Scientific Program Committee members who have shown much dedication over the past months. We also want to thank the presenters for sharing their knowledge and challenging us to think in new ways. In addition, we extend huge appreciation to our sponsors for their generous support.

Please enjoy the Symposium, the exhibition, the wonderful city of Montreal, and the Canadian hospitality.



**ISOPP 2014** Scientific Program Committee Co-Chairs



Tara Leslie

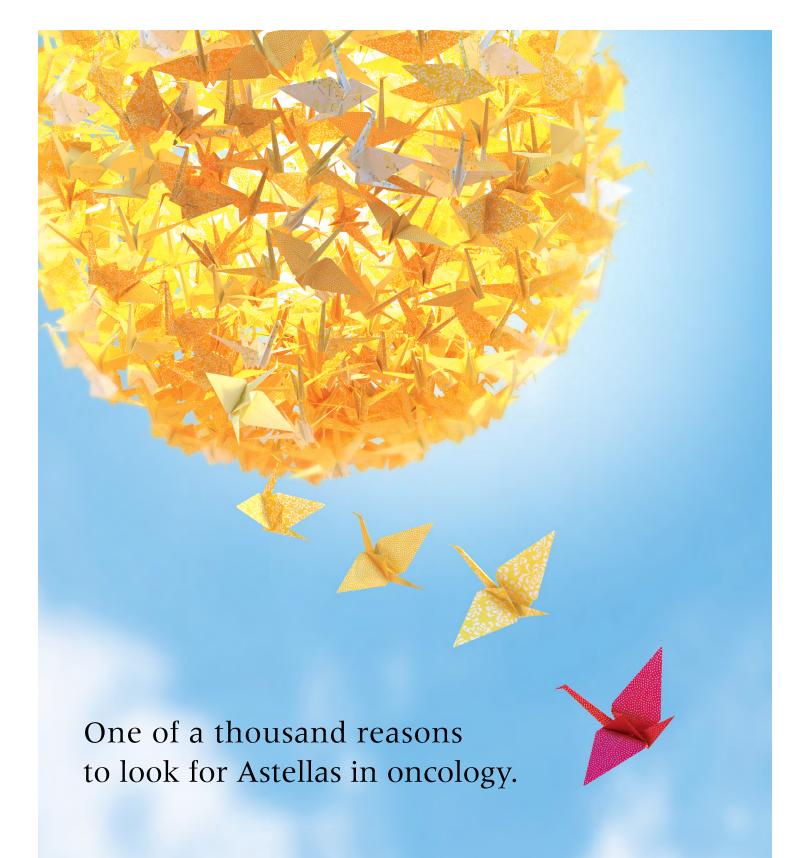
Pharmacy Clinical Practice Leader Alberta Health Services, Canada

Alex Chan

Associate Professor

National University of Singapore,

Singapore











les-maladies/oncologie.

CCPP\* (R&D)

oncology.

PAAB\* (R&D)



#### Program at a Glance

This program is interactive, click on session titles to jump to the detailed program and find out more about your selected session.

#### Wednesday, April 2<sup>nd</sup>

15:30 - 16:00

Welcome Remarks (Le Grand Salon)

John Wiernikowski, ISOPP President, McMaster Children's Hospital, Canada Joan Fabbro, CAPhO President, BC Cancer Agency, Canada Carlo DeAngelis, Symposium Chair, Sunnybrook Health Sciences Centre, Canada

16:00 - 17:00

**Opening Plenary** (Le Grand Salon)

Facts vs. Stories: The Lived Experience of Cancer and the Re-Personalization of Health Care Mike Lang, Alberta Health Services Cancer Control, Canada

17:00 - 17:45

**CAPhO Annual General Meeting** (Le Grand Salon)

17:00 - 18:30

Welcome Reception (Exhibit and Poster Hall)

Sponsored By Astellas Pharma Canada

18:30 - 20:00

Satellite Symposium – Merck (Marquette / Jolliet)

Managing the Complexities Associated with CINV in the Cancer Patient

Chair: Alex Chan, *National University of Singapore, Singapore*Jim Koeller, *University of Texas, USA* and
Haralambos Raftopoulos, *The Monter Cancer Center, USA* 

#### Thursday, April 3rd

07:00 - 08:30

**Satellite Symposium – Janssen** (Marquette / Jolliet)

Partnerships in Oncology for Better Patient Outcomes

Moderator: Biljana Spirovski, Humber River Hospital, Canada Dominic Duquette, Hôpital Enfant-Jésus, Canada and Sean Hopkins, Royal Victoria Regional Health Centre, Canada



08:30 - 10:00

Plenary (Le Grand Salon)

#### The Use of Oncology Medications: Its Challenges and Safe Practices

Eric Cropp, USA and

David U, Institute for Safe Medication Practices, Canada

10:00 – 10:30 Refreshment Break (Exhibit and Poster Hall)

10:30 - 11:30

#### **Concurrent Sessions 1**

#### Clinical 1: Hematologic Malignancy Update (Marquette / Jolliet)

- Non-Hodgkin's Lymphoma Is There More to It than CHOP?
- Jim Siderov, *Austin Health, Australia* Updates in Multiple Myeloma

Steve Stricker, Samford University McWhorter School of Pharmacy, USA

#### Research 1: Biosimilars (Duluth)

• Biosimilars – How Different is Similar?

Jürgen Barth, *Justus Liebig University Giessen, Germany* (presented by Klaus Meier)

#### Fundamental 1: Care Givers for Cancer Patients (Mackenzie)

Collateral Damage: The Untold Story for Family Caregivers
 Mike Lang, Alberta Health Services Cancer Control, Canada

11:30 - 12:30

**ISOPP General Assembly** (Marquette / Jolliet)

12:30 - 14:00

#### **Satellite Symposium – BD Medical** (*Le Grand Salon*)

## Making Sense of Engineering Controls: A Closer Examination of ISOPP Section 7 Special Devices and Section 8 Ventilation Controls

Facilitator: John Wiernikowski, ISOPP President, McMaster Children's Hospital, Canada Jim Siderov, Austin Health, Australia and

Rick Abbott, Dr. H. Bliss Murphy Cancer Center, Canada

#### 12:30 – 14:00 Lunch amongst the Exhibits and Posters (Exhibit and Poster Hall)

14:00 - 15:30

#### **Concurrent Sessions 2**

#### Clinical 2: Oral Agents - Toxicities and Management (Marquette / Jolliet)

- Hepatotoxicities of Tyrosine Kinase Inhibitors: A Class Effect or a Drug-specific Idiosyncrasy?
   Han Kiat Ho, National University of Singapore, Singapore
- Management of Oral Cytotoxic Agents' Toxicity
   Jürgen Barth, Justus Liebig University Giessen, Germany (presented by Klaus Meier)



#### **Research 2: Futuristic Therapies for Cancer** (Duluth)

- Oncolytic Viruses as New Cancer Therapeutics
  John Bell, Ottawa Hospital Research Institute, Canada
- Smart Medicines: The Role of Nanotechnology in the Future of Cancer Treatment John Lewis, *University of Alberta, Canada*

#### Fundamental 2: Chemo Treatment Pathways and Cancer Genomics (Mackenzie)

- Cancer Genomics

  Jill Kolesar, University of Wisconsin, USA
- Strategies to Optimize Oncology Care: Focus on Chemotherapy Treatment Pathways Rowena Schwartz, *McKesson Specialty Health, USA*

#### 15:30 – 16:00 Refreshment Break (Exhibit and Poster Hall)

16:00 - 17:30

#### **Hot Topic Cluster Discussions and Workshops**

**Hot Topic Cluster Discussions** (Marguette / Jolliet)

Moderator: Carole Chambers, Alberta Health Services, Canada

#### Workshop 1: Interacting with Professional Journals: Publishing and Reviewing (Mackenzie)

Barry Goldspiel, National Institute of Health Clinical Center, Pharmacy Department, USA and Judith Smith, University of Texas MD Anderson Cancer Center, USA

#### Workshop 2: Technology and Social Media in Patient Engagement, Patient Care,

#### Practitioners Education and Professional Updating (Duluth)

Felice Musicco, Istituti Fisioterapici Ospitalieri Regina Elena San Gallicano, Italy and Christopher Ralph, Tom Baker Cancer Centre, Canada

Bring your electronic device (Smartphone, tablet and/or laptop) to this workshop.

17:30 - 19:00

#### **Satellite Symposium – Baxter** (Le Grand Salon)

#### Global Perspectives in Outsourcing IV Admixing for Oncologics

Jiali (Lili) Chen, *University Health Network, Canada*, Esther Fung, *University Health Network, Canada* and Simon Venville, *Baxter Healthcare Pty Ltd*, *Australia* 

#### Friday, April 4th

07:00 - 08:30

**Satellite Symposium – Boehringer-Ingelheim** (Marquette / Jolliet)

#### Making the Most of First-line Treatment for Advanced NSCLC: The Role of EGFR TKIs

Denis Soulières, Centre Hospitalier l'Université de Montréal (CHUM), Canada and Nathalie Letarte, University of Montreal, Canada

08:30 - 09:30

**Plenary** (Le Grand Salon)

#### **Human Factors 201: Human Error in Complex Dynamic Systems**

Rachel White, HumanEra @ University Health Network, Canada

09:30 - 10:30

#### **Concurrent Sessions 3**

#### Clinical 3: Palliative Care (Marguette / Jolliet)

- Palliative Care: A Pharmacy Perspective
  Kimberley Stefaniuk, Princess Margaret Cancer Centre, Canada
- An Analysis of the PaCCSC Consortium Studies, A Pharmacist's Perspective Shaun O'Connor, St Vincent's Hospital, Australia

#### Research 3: Research in Oncology Dosing (Duluth)

• Does One Size Fit All in Dosing Algorithms Used in Oncology?

Michael Sawyer, University of Alberta and Cross Cancer Institute of Alberta Health Services, Canada

#### Fundamental 3: Safe Handling and Good Manufacturing Practices (Mackenzie)

 Australian Consensus Guidelines for the Safe Handling and Administration of Monoclonal Antibodies for Cancer Treatment by Healthcare Personnel

Sue Kirsa, Peter MacCullum Cancer Centre, Australia

#### 10:30 – 11:00 Refreshment Break (Exhibit and Poster Hall)

Sponsored By Boehringer-Ingelheim

#### 11:00 - 12:30

#### **Concurrent Sessions 4**

#### Clinical 4: Solid Tumour Update (Marguette / Jolliet)

- Breast Cancer Update
  - Scott Edwards, Dr. H. Bliss Murphy Cancer Center, Canada
- What's New in the Treatment of Metastatic Melanoma?
  - Gabriel Gazze, McGill University Health Centre Royal Victoria Hospital, Canada
- Pancreatic Cancer Have We Improved Therapy Options?
   Jim Siderov, Austin Health, Australia

#### Research 4: New Trends for Patient Participation in Research (Duluth)

- The Essential Role of Clinical Research for the Older Patient with Cancer
  - Rowena Schwartz, McKesson Specialty Health, USA
- Graduated Intensity Trials / Adapted Regimens for Cancer Patients in Low / Middle Income Countries (LMICs)
   John Wiernikowski, McMaster Children's Hospital, Canada
- Response Based Trials

Felicity Wright, Kids Cancer Centre, Sydney Children's Hospitals Network, Australia



#### Fundamental 4: Checking Chemotherapy Best Practices (Mackenzie)

• Mixology: Recipes for Error-free Chemotherapy Cocktails
Rick Abbott, Dr. H. Bliss Murphy Cancer Center Canada,
Roxanne Dobish, Alberta Health Services, Canada and
Rachel White, HumanEra @ University Health Network, Canada

12:30 - 14:00

**Satellite Symposium – Astellas** (Le Grand Salon)

#### **New Treatment Options for CRPC**

Tom McFarlane, Cambridge Memorial Hospital, Canada and Sébastien Hotte, McMaster University, Canada

12:30 – 14:00 Lunch amongst the Exhibits and Posters (Exhibit and Poster Hall)

14:00 - 15:30

#### **Concurrent Sessions 5**

## Clinical 5: New Opportunities and Expansion in Clinical Pharmacy Services – Global Perspectives (Marquette / Jolliet)

- · Advances in Clinical Services in Asia
  - Lita Chew, National Cancer Centre Singapore and Ministry of Health, Singapore
- Pharmacist Prescribing An Opportunity for Full Scope of Practice in Canada
   Tara Leslie. Alberta Health Services. Canada
- Europe

Klaus Meier, Heidekreis-Klinikum GmbH, Germany

#### Research 5: Research in HSCT (Duluth)

- Cytomegalovirus (CMV) Infection in the Setting of Haematopoietic Stem Cell Transplantation Nick Duncan, Queen Elizabeth Hospital, United Kingdom
- Don't Be Late! The Role of Pre-emptive Therapy for EBV-PTLD Jennifer Jupp, Alberta Children's Hospital, Canada

#### Fundamental 5: Professional Development (Mackenzie)

• Education, Competency and Mentorship

Barry Goldspiel, National Institute of Health Clinical Center, Pharmacy Department, USA and Judith Smith, University of Texas MD Anderson Cancer Center, USA

15:30 – 16:00 Refreshment Break (Exhibit and Poster Hall) Sponsored By Bristol-Myers Squibb

16:00 – 17:30 Exhibit and Poster Viewing (Exhibit and Poster Hall)

19:00 – 22:00 Dinner at the Circus (Le Grand Salon) Sponsored By BD Medical



#### Saturday, April 5<sup>th</sup>

07:00 - 08:30

#### Satellite Symposium – Bristol-Myers Squibb Canada (Marquette / Jolliet)

## Immuno-Oncology: Shaping the Present, Transforming the Future and Raising the Bar in Oncology

Chair: Dawn Goetz, H. Lee Moffitt Cancer Center & Research Institute, USA
Michael Smylie, Cross Cancer Institute, University of Alberta and Northern Alberta Community
Cancer Network, Alberta Cancer Board, Canada and
Natasha B Leighl, Princess Margaret Hospital, University Health Network and University of Toronto, Canada

08:30 - 09:30

Platform Presentations (Le Grand Salon)

Facilitator: Judith Smith, ISOPP Research Chair, University of Texas MD Anderson Cancer Center, USA

09:30 - 10:30

Plenary (Le Grand Salon)

#### NIOSH Updates to Its Guidance for the Safe Handling of Hazardous Drugs

Thomas Connor, National Institute for Occupational Safety and Health, USA

#### 10:30 – 11:00 Refreshment Break (Exhibit and Poster Hall)

#### 11:00 - 11:45

#### **Concurrent Sessions 6**

#### Clinical 6: Pediatric, Adolescent and Young Adult Update (Marguette / Jolliet)

- Pediatric Solid Tumour Update Neuroblastoma
   Rosalyn Sims, Children's Hospital of Michigan, USA
- Adolescent and Young Adult (AYA) Oncology: Update from the Pan Canadian AYA Task Force
  John Wiernikowski, McMaster Children's Hospital, Canada

#### Research 6: Resistance Issues with Targeted Agents (Duluth)

Resistance to Targeted Therapies in CML
 Jill Kolesar, University of Wisconsin, USA

#### Fundamental 6: Staffing and Career Planning (Mackenzie)

- Career Planning and Choices for Oncology Pharmacists / Technicians

  Judith Smith, University of Texas MD Anderson Cancer Center, USA
- Recruitment and Retention of Oncology Pharmacy Staff
   Kimberley Stefaniuk, Princess Margaret Cancer Centre, Canada



#### 11:45 - 12:45

#### **Concurrent Sessions 7**

#### Clinical 7: Survivorship (Marguette / Jolliet)

- Patient Care Issues in Cancer Survivors: A Focus on Physical Side Effects
  Alexandre Chan, National University of Singapore, Singapore
- Patient Care Issues in Cancer Survivors: A Focus on Psychosocial Issues
  Bruce Burnett, *University of Wolverhampton, United Kingdom*

#### Research 7: Investigational Agent Update (Duluth)

- Experimental Therapies in GI Cancers
  - Thomas McFarlane, Cambridge Memorial Hospital, Canada
- Looking Ahead: Investigational Agents for Prostate Cancer
   Steve Stricker, Samford University McWhorter School of Pharmacy, USA

#### Fundamental 7: Error Prevention (Mackenzie)

- Medication Safety with Intrathecal Chemotherapy Peter Gilbar, Toowoomba Hospital, Australia
- Error Prevention with Opioids in a Tertiary Teaching Hospital Shaun O'Connor, St Vincent's Hospital, Australia

#### 12:45 - 14:15

#### **Satellite Symposium – Lundbeck** (Le Grand Salon)

## Evaluating the True Benefit of Hematologic Therapies: The Critical Role of Oncology Pharmacists in Care Teams

Chair: Mark Pasetka, Odette Cancer Centre, Sunnybrook Health Sciences Centre, Canada Presenter: Marc Geirnaert, CancerCare Manitoba, Canada

#### 12:45 – 14:15 Lunch amongst the Exhibits and Posters (Exhibit and Poster Hall)

#### 14:15 - 15:45

#### Closing Plenary (Marquette / Jolliet)

#### Global Perspectives in Oral Anti-Neoplastic Agents

Panellists: Bruce Burnett, University of Wolverhampton, United Kingdom

Lita Chew, National Cancer Centre Singapore and Ministry of Health, Singapore

Scott Edwards, Dr. H. Bliss Murphy Cancer Center, Canada

Peter Gilbar, Toowoomba Hospital, Australia

Klaus Meier, Heidekreis-Klinikum GmbH, Germany

Steve Stricker, Samford University McWhorter School of Pharmacy, USA

Moderator: Carole Chambers, Alberta Health Services, Canada

#### 15:45 - 16:00

#### Closing Remarks (Marquette / Jolliet)

John Wiernikowski, ISOPP Past President, McMaster Children's Hospital, Canada Rowena Schwartz, ISOPP President, McKesson Specialty Health, USA Joan Fabbro, CAPhO President, BC Cancer Agency, Canada Carlo DeAngelis, Symposium Chair, Sunnybrook Health Sciences Centre, Canada

#### Satellite Symposia

#### Wednesday, April 2<sup>nd</sup>

#### 18:30 - 20:00 - Merck

#### Managing the Complexities Associated with CINV in the Cancer Patient

Chair: Alex Chan, National University of Singapore, Singapore Jim Koeller, University of Texas, USA and Haralambos Raftopoulos, The Monter Cancer Center, USA

#### Thursday, April 3rd

#### 07:00 - 08:30 - Janssen

#### Partnerships in Oncology for Better Patient Outcomes

Moderator: Biljana Spirovski, *Humber River Hospital, Canada* Dominic Duquette, *Hôpital Enfant-Jésus, Canada* and Sean Hopkins, *Royal Victoria Regional Health Centre, Canada* 

#### 12:30 - 14:00 - BD Medical

## Making Sense of Engineering Controls: A Closer Examination of ISOPP Section 7 Special Devices and Section 8 Ventilation Controls

Facilitator: John Wiernikowski, ISOPP President, McMaster Children's Hospital, Canada Jim Siderov, Austin Health, Australia and Rick Abbott, Dr. H. Bliss Murphy Cancer Center, Canada

#### 17:30 - 19:00 - Baxter

#### Global Perspectives in Outsourcing IV Admixing for Oncologics

Jiali (Lili) Chen, *University Health Network, Canada*, Esther Fung, *University Health Network, Canada* and Simon Venville, *Baxter Healthcare Pty Ltd, Australia* 

#### Friday, April 4th

#### 07:00 - 08:30 - Boehringer Ingelheim

#### Making the Most of First-line Treatment for Advanced NSCLC: The Role of EGFR TKIs

Denis Soulières, Centre Hospitalier l'Université de Montréal (CHUM), Canada and Nathalie Letarte, University of Montreal, Canada

#### 12:30 - 14:00 - Astellas

#### New Treatment Options for CRPC

Tom McFarlane, Cambridge Memorial Hospital, Canada and Sébastien Hotte, McMaster University, Canada



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#### Saturday, April 5th

#### 07:00 – 08:30 – Bristol-Myers Squibb Canada

#### Immuno-Oncology: Shaping the Present, Transforming the Future and Raising the Bar in Oncology

Chair: Dawn Goetz, H. Lee Moffitt Cancer Center & Research Institute, USA

Michael Smylie, Cross Cancer Institute, University of Alberta and Northern Alberta Community Cancer Network, Alberta Cancer Board, Canada and

Natasha B Leighl, Princess Margaret Hospital, University Health Network and University of Toronto, Canada

#### 12:45 – 14:15 – Lundbeck

## Evaluating the True Benefit of Hematologic Therapies: The Critical Role of Oncology Pharmacists in

Chair: Mark Pasetka, Odette Cancer Centre, Sunnybrook Health Sciences Centre, Canada Presenter: Marc Geirnaert, CancerCare Manitoba, Canada





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## LET'S THINK



TO HELP OUR PATIENTS,
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#### Venue Floor Plan

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#### **Exhibition and Posters**

#### **Opening Hours**

The following events will take place in the Exhibit and Poster Hall, located in Hochelaga 1-6, Saguenay and Saint-Maurice.

#### Wednesday, April 2<sup>nd</sup> 17:00 – 18:30

17:00 – 18:30 Welcome Reception sponsored by Astellas Pharma Canada

#### Thursday, April 3<sup>rd</sup> 09:30 - 16:00

10:00 - 10:30 Refreshment break

12:30 - 14:00 Buffet lunch

15:30 - 16:00 Refreshment break

#### Friday, April 4th 10:00 - 17:30

10:30 – 11:00 Refreshment break

sponsored by Boehringer Ingelheim

12:30 - 14:00 Buffet lunch

15:30 – 16:00 Refreshment break

sponsored by Bristol-Myers Squibb Canada

16:00 - 17:30 Exhibits and Posters Viewing

with Poster Authors

#### Saturday, April 5<sup>th</sup> 10:00 – 14:15

10:30 - 11:00 Refreshment break

12:45 - 14:15 Buffet lunch

#### Exhibitor Listing (alphabetical by company name)

Company Booth #
ACCORD HEALTHCARE INC27-28
AMGEN CANADA14
ASTELLAS PHARMA CANADAP7
BAXTER CORPORATION CANADAP6
BAYER INC11
BCE PHARMA21
BD MEDICALP3
BOEHRINGER INGELHEIMP5
BRISTOL-MYERS SQUIBBP8
CELGENE
ELI LILLY12
EQUASHIELD LLC19
FRESENIUS KABI 15-17
GSKP1

Company Boo	ui #
HEALTH ROBOTICS	20
HOSPIRA	34
ICU MEDICAL	29
INTELLIGENT HOSPITAL SYSTEMS	23
JANSSEN	P2
LUNDBECK ONCOLOGY	P4
NOVARTIS PHARMACEUTICALS CANADA3	2-33
OMEGA	18
PFIZER INJECTABLES.	24
ROCHE (HOFFMANN-LA ROCHE LIMITED)	26
SANDOZ3	0-31
SANOFI	13
TEVA CANADA LIMITED	9-10

Company	Table
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INTERNATIONAL SOCIETY OF ONCOLOGY PHARMACY PRACTITIONERS	T2
ONCOLOGYEDUCATION.COM	T4
SAGE PUBLICATIONS LTD	T5
SOSIDO	T3



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### "Building Partnerships in Care"

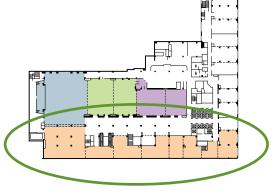
#### Exhibitor Listing (numerical by booth number)

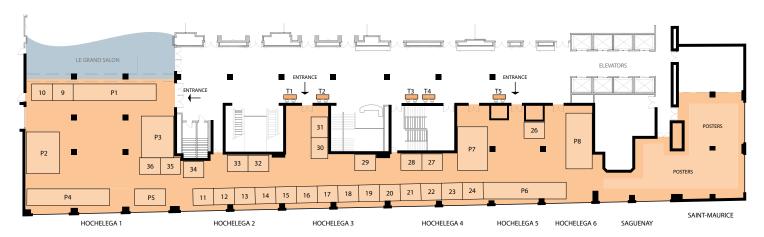
Company	Booth
GSK	P
JANSSEN	P:
BD MEDICAL	P;
LUNDBECK ONCOLOGY	P
BOEHRINGER INGELHEIM	P:
BAXTER CORPORATION CANADA	P
ASTELLAS PHARMA CANADA	P
BRISTOL-MYERS SQUIBB	Pa
TEVA CANADA LIMITED	9-10
BAYER INC	1
ELI LILLY	1
SANOFI	1
AMGEN CANADA	1
FRESENIUS KABI	15-1

Company Bo	oth #
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EQUASHIELD LLC	19
HEALTH ROBOTICS	20
BCE PHARMA	21
INTELLIGENT HOSPITAL SYSTEMS	23
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ROCHE (HOFFMANN-LA ROCHE LIMITED)	26
ACCORD HEALTHCARE INC	27-28
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SANDOZ	30-31
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CANADIAN ASSOCIATION OF PHARMACY ONCOLOGY	
INTERNATIONAL SOCIETY OF ONCOLOGY PHARMACY PRACTITIONERS	T2
SOSIDO	T3
ONCOLOGYEDUCATION.COM	T4
SAGE PUBLICATIONS LTD	T5

#### Exhibit and Poster Hall Floor Plan





## "Building Partnerships in Care"

#### **Poster Listing**

Please see the Journal of Oncology Pharmacy Practice 2014 Supplement to review poster abstracts.

#### **Clinical Sciences**

- 1 Complementary and alternative medicine use in rural cancer patients in Australia Aimee Sullivan, Toowoomba Hospital, Australia
- 2 Incidence of hypersensitivity reactions with intravenous fosaprepitant dimeglumine at an outpatient cancer centre Colleen Olson, Saskatoon Cancer Centre, Canada
- 3 Activity and safety of single agent carfilzomib for the treatment of relapsed and refractory multiple myeloma (RRMM): results from 4 phase 2 trials David Siegel, John Theurer Cancer Center at Hackensack University, USA
- 4 Implementing CyBorD as first-line therapy for transplant-eligible multiple myeloma patients: a single-center preliminary comparison Dominic Duquette, CHU de Quebec, Canada
- 5 WITHDRAWN

The management of skin toxicity during cetuximab treatment in metastatic colorectal cancer Elisa Marletta, ASP Siracusa - P.O. Umberto I, Italy

6 - Role of pharmacist in preventing prescribing errors of total parenteral nutrition in cancer

Gul Ambreen, Aga Khan University Hospital, Pakistan

7 - A Phase II single-arm study of aprepitant as antiemetic prophylaxis in patients receiving induction chemotherapy for AML

Jack Seki, University Health Network-Princess Margaret Hospital, Canada

8 - Prophylactic oral minocycline for EGFRi induced skin rash in patients with non-small cell lung

Jimmy Cote, Institut Universitaire de Cardiologie et de Pneumologie de Quebec, Canada

- 9 Cancer in older patients the polypharmacy domain examined
  - Jude Lees, Royal Adelaide Hospital, Australia
- 10 Prevalence of augmented renal clearance in haematological patients and the impact on vancomycin dosing

Karen Vermis, Ghent University Hospital, Belgium

11 - Palonosetron as a rescue strategy for CINV following failure with standard of care antiemetic reaimens

Kathy Gesy, Saskatchewan Cancer Agency, Canada

12 - The oncology pharmacist's role in smoking cessation

Kristi Hofer, CancerCare Manitoba, Canada

13 - Implementation of an oral cancer therapy monitoring program in a genitourinary oncology

Lisa Holle, University of Connecticut, School of Pharmacy, USA

14 - Explorative study to evaluate neuropathy induced by oxaliplatin in subjects with colorectal cancer at the CHUS

Marie-Pierre Rousseau, Centre Hospitalier Universitaire de Sherbrooke, Canada

- 15 Artocarpin induces apoptosis in A549 non-small cell lung carcinoma via MAPK signaling pathway/ p53/NF-iB dependent pathways
  - Ming Horng Tsai, Chang Gung Memorial Hospital, USA
- 16 Developing competency through webinar to establish oncology pharmacy services at the Aga Khan Hospital, Dar-es-Salaam, Tanzania Nadia Ayoub, Aga Khan University Hospital, Pakistan
- 17 Validation of chemotherapy regimen by clinical oncology pharmacist and its impact on direct patient care

Nadia Ayoub, Aga Khan University Hospital, Pakistan



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### "Building Partnerships in Care"

- 18 Role of pharmacy staff in reducing chances of lost to follow up and improving adherence hence achieving chemotherapeutic goals in Kenya Paul Wasike, Kenya
- 19 Novel immunotherapeutics and concurrent CYP substrate use in advanced cancer
   R. Donald Harvey, Winship Cancer Institute of Emory University, USA
- 20 BC Cancer Agency education program for oncology pharmacists
  Rhonda Kalyn, BC Cancer Agency, Canada
- 21 Pharmacist-led monitoring program for patients on sunitinib for metastatic renal-cell carcinoma: A Canadian experience
   Scott Edwards, Dr. H. Bliss Murphy Cancer Clinic, Canada
- 22 Survey of pharmacists' involvement in cancer treatment and rates of improper regimens in cancer core hospitals and general hospitals Shinya Suzuki, National Cancer Center Hospital East, Japan
- 23 Assessment of the feasibility of a pharmacy-led anemia monitoring program for gastric cancer patients in an ambulatory setting
  Soha Ahrari, Sunnybrook Health Sciences Centre,
  Canada

- 24 Combination cabazitaxel plus filgrastim in treating patients with metastatic castrationresistant prostate cancer Stanislav Synek, Hospital of St. Anne, Czech Republic
- 25 Effectiveness of pharmaceutical care in reducing adverse events
  Sulamta Miranda, *Universidad de Chile, Chile*
- 26 Integration of a Clinical Support Pharmacy Technician into a Pediatric Hematology/ Oncology/Transplant Clinic Tara Leslie, Alberta Children's Hospital, Canada
- 27 Clinical pharmacy activities in a pediatric hematopoietic stem cell transplantation unit Tiene Bauters, Ghent University Hospital, Belgium
- 28 Use of rasburicase in prevention and treatment of tumor lysis syndrome in children
  Tiene Bauters, Ghent University Hospital, Belgium
- 29 Novel secondary prevention strategy for a cisplatin hypersensitivity reaction-case report Toni Bailie, *Mount Sinai Hospital, Canada*
- 30 Tociluzumab for the treatment of an unusual case of multicentric Castleman's disease
  Vicki Wilmott, Wollongong Hospital, Australia
- 31 Incidence of neutropenia (N) in Asian metastatic breast cancer (MBC) patients treated with eribulin (E) in a routine clinical setting
   Vivianne Shih, National Cancer Centre, Singapore

#### **Practice Research**

#### 32 - WITHDRAWN

The quality of life amongst the different pharmacological treatments of women with breast cancer in tertiary care hospital in India Anantha Naik Nagappa, *Manipal University Manipal* College of Pharmaceutical Sciences, India

33 - Pharmacist Involvement within treatment funding model development to support quality care Annie Cheung, Cancer Care Ontario, Canada

#### 34 - WITHDRAWN

Aseptic processing validation of the IV compounding robot in a hospital pharmacy Celestino Bufarini, AO Ospedali Riuniti Ancona, Italy

35 - Incorporation of national oncology drug recommendations into the provincial oncology drug review process - The Manitoba experience Danica Wasney, CancerCare Manitoba, Canada

36 - Determinants of intravenous chemotherapy pharmacy processing time

Flay Charbonneau, Sunnybrook Odette Cancer Centre, Canada

- 37 Oral oncology safe use and handling: Results of the first pan-Canadian survey of provincial cancer agencies and programs
  - Heather Logan, Canadian Association of Provincial Cancer Agencies, Canada
- 38 Change in the procedure for the supply of medicines at a time of economic recession: A 3.5 year experience in a Greek anticancer hospital loanna Saratsiotou, Saint Savvas Anticancer Hospital, Greece
- 39 Validation of the cleaning and disinfection procedure in robotic aseptic preparation of cytotoxic injection solutions Irene Kraemer, University Medical Center, Germany
- 40 Ifosfamide-induced encephalopathy: A retrospective review of incidence over 5 years Janelle Penno, Peter MacCallum Cancer Centre, Australia
- 41 Oral Chemotherapy: Bridging Gaps Identified From an Environmental Scan Kathy Vu, Cancer Care Ontario, Canada
- 42 WITHDRAWN

  Near infrared spectroscopy to reduce medication
  errors with limited exposure of healthcare workers
  Laetitia Lê, Paris Sud University, European Georges
  Pompidou Hospital (APHP), France
- 43 Improving the safety of oral systemic therapy: An exploratory human factors project Larry Broadfield, Cancer Care Nova Scotia, Canada

- 44 Evaluating factors associated with life expectancy less than 3 months among elderly patients receiving palliative chemotherapy
  Lita Chew, National University of Singapore, Singapore
- 45 Patient safety first by compounding one drug at a time
   Mari Culotta-Mascioli, Odette Cancer Centre, Canada
- 46 Integration of a clinical pharmacist in a multidisciplinary team for renal cell carcinoma patients treated with oral chemotherapy: impact on adherence and financial aspects Nele Clottens, Ghent University Hospital, Belgium
- 47 Logarithmic Dose Banding: an opportunity for batch production
  Nele Clottens, Ghent University Hospital, Belgium
- 48 Cost of treatment sequences in metastatic colorectal cancer (mCRC): A Canadian retrospective chart review comparing oxaliplatinto irinotecan based first line therapy Petr Kavan, Jewish General Hospital, Canada
- 49 Development and implementation of embedded checklists into chemotherapy preparation worksheets

  Roxanne Dobish, Alberta Health Services, Canada
- 50 A Robotic System in support of the Hospital Pharmacist in management of Metastatic Colorectal Cancer Therapies Serena Corridoni, Hospital San Salvatore L'Aquila, Italy
- 51 The impact of utilizing intravenous robotic dispensing in oncology pharmacy Zubeir Nurgat, King Faisal Specialist Hospital and Research Centre, Saudi Arabia

#### Translational Sciences

- 52 To evaluate effectiveness of more diluted IV gemcitabine solution on infusion related pain score and patient comfort level during chemotherapy
  - Nadia Ayoub, Aga Khan University Hospital, Pakistan
- 53 EGFR mutations in Lung Adenocarcinoma and correlation with p63 and TTF1 immunohistochemical expression in Greek population

Savvas Papadopoulos, Hygeia Hospital, Greece

#### **Encore Presentations**

54 - Managing chemotherapy drug shortages in Ontario

Annie Cheung, Cancer Care Ontario, Canada

55 - Implementation of a medication reimbursement specialist (MRS) role to facilitate medication access for outpatient oncology patients - an interim evaluation

Karen Chuk, University Health Network, Canada

56 - What doses should our chemotherapy robot prepare?

Jeanne Chu, Princess Margaret Cancer Centre, Canada

- 57 Using guideline adaptation to update antiemetic recommendations in Ontario Kathy Vu, Cancer Care Ontario, Canada
- 58 Multidisciplinary approach to safe administration of intra-cerebrospinal fluid chemotherapy (ICC) and error prevention Lisa Holle, UCONN School of Pharmacy, USA
- 59 Use of pharmacist integration in oncology clinics to identify and resolve moderate to major drugdrug interactions

Jack Seki, University Health Network-Princess Margaret Hospital, Canada

60 - Administration of intravenous vincristine: Survey of ISOPP members

Peter Gilbar, Toowoomba Health Services, Australia

- 61 Incidence of febrile neutropenia in early breast cancer after adjuvant chemotherapy with docetaxel and cyclophosphamide
  - Peter Gilbar, Toowoomba Health Services, Australia
- 62 Pain severity and impairment of activity between pegfilgrastim (P) and fixed-dose filgrastim (F) in women with early-stage breast cancer receiving chemotherapy

Jessica Kano, Trillium Health Partners - Peel Regional Cancer Centre, Canada

- 63 DeMIStifying pharmacy workload measurement Venetia Bourrier, CancerCare Manitoba, Canada
- 64 Integration of a Clinical Pharmacist into a Pediatric Hematology/Oncology/Transplant Clinic Jennifer Jupp, Alberta Children's Hospital, Canada
- 65 Oncology Competence Pharmacy A German approach to improve quality in oncology pharmacy

Klaus Meier, Deutsche Gesellschaft für Onkologische Pharmazie, Germany

66 - Medication incident reduction at Illawarra Cancer **Care Centre** 

Vicki Wilmott, Wollongong Hospital, Australia

#### Research Award Presentation

- 71 The effect of race on the CYP3A mediated metabolism of vincristine in pediatric patients with acute lymphoblastic leukemia
  - Rosalyn P. Sims, Children's Hospital of Michigan, USA
- 72 Evaluation of the Stability of Ifosfamide and Mesna in Elastomeric Pumps: Bench to Bedside Shereen Nabhani-Gebara, School Pharmacy and Chemistry; Kingston University, UK

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# Immuno-Oncology: Shaping the Present, Transforming the Future and Raising the Bar in Oncology

Saturday, April 5<sup>th</sup>, 2014 | 7:00 – 8:30 AM Fairmont The Queen Elizabeth | Marquette/Jolliet Room Montreal, Quebec

#### LEARNING OBJECTIVES

After participating in this program, participants will be able to:

- 1. Understand the rationale for immune checkpoint inhibition in cancer treatment;
- Describe the mechanisms of action of CTLA-4 immunotherapy and of PD-1 antibodies:
- 3. Evaluate therapeutic response to immune checkpoint inhibition in melanoma and other cancers; and
- 4. Describe the role of the pharmacist in the overall management of immune related adverse events during cancer immunotherapy.

## Immuno-oncologie : Façonner le présent, transformer l'avenir et élever la barre en oncologie

Le samedi 5 avril 2014 | 07 h 00 à 08 h 30 Fairmont The Queen Elizabeth | Salle Marquette/Jolliet Montréal (Québec)

#### **OBJECTIFS D'APPRENTISSAGE**

Après avoir assisté à ce symposium, les participants seront en mesure de :

- 1. Comprendre la logique de l'inhibition de points de contrôle immunitaires dans le traitement du cancer;
- Décrire les mécanismes d'action de l'immunothérapie par les anticorps CTLA-4 et PD-1;
- 3. Évaluer la réponse thérapeutique à l'inhibition de points de contrôle immunitaires dans le mélanome et les autres types de cancers;
- 4. Décrire le rôle du pharmacien dans la prise en charge générale des effets indésirables liés au système immunitaire lors de l'immunothérapie contre le cancer.

## **ISOPP 2014**

Please RSVP for this symposium through the ISOPP 2014 symposium registration site at: http://www.isoppxiv.org/registration

Veuillez confirmer votre présence à ce symposium sur le site d'inscription du symposium de l'ISOPP 2014 à l'adresse : http://www.isoppxiv.org/registration

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Cancer Network,
Alberta Cancer Board



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#### International Society of Oncology Pharmacy Practitioners (ISOPP)

#### **ISOPP** General Assembly

The ISOPP General Assembly will be held on Thursday, April 3rd from 11:30-12:30 in the Marquette / Jolliet rooms on the Convention Floor. All are welcome to attend and ISOPP members encouraged to attend. In addition to updates on the Society's progress, the following awards will be presented:

- ISOPP Achievement Award
- Research Grant Award
- Fellowship Award
- JOPP Awards (Best Research Paper & Best Clinical/Practice Paper)

#### **About ISOPP**

ISOPP connects Oncology Pharmacy experts from around the world to leading edge oncology knowledge, best practices and essential networks through the Society's biennial symposium, Journal, newsletter and website. ISOPP also provides financial assistance through awards, grants, and reduced registration fees for members to the symposium and regional meetings.

#### Become a Member

Join ISOPP and become part of a community of oncology pharmacy practitioners with a common goal of encouraging, improving and embracing oncology pharmacy practice designed to benefit cancer patients worldwide.

Membership in ISOPP carries distinct benefits:

- Access to the Members' Only section on the ISOPP website offering tools and resources
- Subscription to the bi-monthly Journal of Oncology Pharmacy Practice in hard copy and electronic form
- Subscription to ISOPP's electronic quarterly newsletter
- Eligibility for ISOPP travel grants, awards and research grants
- Access to high quality biennial international symposia which help oncology pharmacy practitioners keep up to date with international developments in the field of oncology pharmacy practice
- Reduced registration fees for the international ISOPP symposia
- Networking opportunities with oncology pharmacists from around the world
- Opportunity to participate in ISOPP committees
- Eligibility for nomination for election to the ISOPP Secretariat
- Voting rights to determine the future of ISOPP
- Joint membership to select National Oncology Organizations

Visit www.isopp.org to become a member today!



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#### **Travel Grant Winners**

The following ISOPP members received Travel Grants to attend ISOPP 2014.

Tamret Assefa, Addis Ababa University, Addis Ababa, Ethiopia Nadia Ayoub, Aga Khan University, Karachi, Pakistan Aasma Hamid, Aga Khan University Hospital, Pakistan Rhonda Kalyn, BC Cancer Agency, Kelowna, Canada Bogumila Julia Sobkowiak, Medical University of Lublin, Lublin, Poland

#### Society Management Office

International Society of Oncology Pharmacy Practitioners (ISOPP) c/o Sea to Sky Meeting Management Inc.
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F: +1-604-984-6434

www.isopp.org



#### Canadian Association of Pharmacy in Oncology (CAPhO)

#### **CAPhO Annual General Meeting**

The CAPhO Annual General Meeting (AGM) will be held on Wednesday, April 2nd from 17:00-17:45 in the Le Grand Salon on the Convention Floor. All are welcome to attend and CAPhO members encouraged to attend.

Attend for a chance to win a free registration to the 2015 CAPhO Conference. Tickets will be distributed at the entrance to the AGM. You have to be present to win!

#### **About CAPhO**

CAPhO is the national forum for oncology pharmacy practitioners and other health care professionals interested in oncology pharmacy. CAPhO, a voluntary organization, promotes the practice of oncology pharmacy in Canada by conducting educational events, maintaining appropriate professional practice standards, facilitating communication between oncology pharmacists, technicians, pharmacy assistants and other interested health care professionals, and developing oncology pharmacy as an area of specialty practice.

CAPhO represents the professional interests and issues of oncology pharmacy at a national level.

#### Become a Member

Join CAPhO and become a member of a national community of professionals who all share a common interest in the practice of oncology pharmacy in Canada.

Benefits of becoming a member include:

- Opportunities to communicate and network with other oncology pharmacy professionals across the country via the members' only area of the website (www.capho.org), at CAPhO's annual conference (formerly known as NOPS), through social media, blog posts and the Sosido Network
- Access to Sosido Network an online community of healthcare professionals sharing peer reviewed published clinical research and their practical clinical knowledge
- Access to CAPhO's online education modules Oncology Basics, worth 5 CEUs and online education resources
- Access to Conference sessions post event
- Quarterly electronic newsletter keeping you informed of Association and Industry news
- Opportunities to apply for travel grants and awards
- Linkages on national and international levels with other relevant organizations such as the Canadian Association of Provincial Cancer Agencies (CAPCA) and the International Society of Oncology Pharmacy Practitioners (ISOPP)
- Opportunities to support the Executive Members who represent your professional interests and bring your ideas forward to decision makers such as government officials
- Volunteer opportunities in order to gain valuable experience and broaden your network of colleagues and friends
- Voting privileges at CAPhO's Annual General Meeting



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"Building Partnerships in Care"

#### **Travel Grant Winners**

The following CAPhO members received Travel Grants to attend ISOPP 2014.

Mark Brown, Hamilton Health Sciences, Henderson Hospital, Canada Kara Browne, Saskatoon Cancer Centre, Canada Melanie Danilak, Alberta Health Services, Canada Debra Hodgins, Saskatchewan Cancer Agency, Canada Rhonda Kalyn, BC Cancer Agency, Canada Annette Kempston, Tom Baker Cancer Centre, Canada

Catherine Leyshon, Tom Baker Cancer Centre, Canada

Sarah Lutes, Tom Baker Cancer Centre, Canada Geoffrey Maher, Alberta Health Services, Canada

Minna Tuokkola, Thunder Bay Regional Health Sciences Centre, Canada

#### **Association Management Office**

Canadian Association of Pharmacy in Oncology (CAPhO) c/o Sea to Sky Meeting Management Inc. Suite 206, 201 Bewicke Avenue North Vancouver, BC, Canada V7M 3M7

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### **Committee Listings**

Thank you to the ISOPP 2014 Planning Committee members, the Scientific Program Committee members, the ISOPP Secretariat and CAPhO Executive for their work in planning this Symposium. We would also like to thank those who have volunteered their time to assist the ISOPP 2014 participants and organizers. We really appreciate the assistance you provide to ensure participants have everything they need to participate effectively in the Symposium.

"Building Partnerships in Care"

### **Planning Committee**

Flay Charbonneau, Sunnybrook Health Sciences Centre, Toronto, Canada
Carlo DeAngelis, Symposium Chair, Sunnybrook Health Sciences Centre, Toronto, Canada
Tara Leslie, Program Co-Chair, Alberta Health Services, Calgary, Canada
John Wiernikowski, ISOPP President, McMaster Children's Hospital, Hamilton, Canada
Sea to Sky Meeting Management, North Vancouver, Canada

#### Scientific Program Committee

Alexandra Bartal, National Institute of Oncology, Budapest, Hungary

Carole Chambers, Alberta Health Services, Calgary, Canada

Alexandre Chan, Program Co-Chair, National University of Singapore, Singapore

Carlo DeAngelis, Symposium Chair, Sunnybrook Health Sciences Centre, Toronto, Canada

Peter Gilbar, Toowoomba Hospital, Toowoomba, Australia

Nagwa Ibrahim, Riyadh Military Hospital, Riyadh, Saudi Arabia

Maria Larizza, Alfred Health, Melbourne, Australia

Tara Leslie, Program Co-Chair, Alberta Health Services, Calgary, Canada

Annemeri Livinalli, Sociedade Brasileira de Farmacêuticos em Oncologia, São Paulo, Brazil

Klaus Meier, Heidekreis-Klinikum GmbH, Stelle, Germany

Judith Smith, University of Texas, Houston, USA

Bogumila J. Sobkowiak, Medical University of Lublin, Lublin, Poland

Kimberley Stefaniuk, Princess Margaret Cancer Centre, Toronto, Canada

John Wiernikowski, McMaster Children's Hospital, Hamilton, Canada

Vicki Wilmott, Wollongong Hospital, Wollongong, Australia

All Abstract Reviewers



# ISOPP XIV XIV INTERNATIONAL SYMPOSIUM ON ONCOLOGY PHARMACY PRACTICE

April 2-5, 2014 · Montréal · Canada

### "Building Partnerships in Care"

#### **ISOPP Secretariat**

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Rowena Schwartz, President-Elect, McKesson Specialty Health, The Woodlands, USA

Hannelore Kreckel, Secretary, University Hospital Giessen and Marburg, Giessen, Germany

Johan Vandenbroucke, Treasurer, University Hospital Ghent, Ghent, Belgium

Rosalyn Sims, General Secretariat Member 2012 - 2014, Children's Hospital of Michigan, Detroit, USA

Thomas Schubert, General Secretariat Member 2012 - 2014, ABC - Apotheke, Gelsenkirchen, Germany

Robert Terkola, General Secretariat Member 2011 - 2013, Kaiser Franz Josef Hospital, Vienna, Austria

Felicity Wright, General Secretariat Member 2011 – 2013, Centre for Children's Cancer and Blood Disorders, Randwick, Australia

Alexandre Chan, Education Chair, National University of Singapore, Singapore

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Jill Davis, Newsletter Editor, Austin Hospital, Melbourne, Australia

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Jim Siderov, Standards Chair, Austin Health, Heidelberg, Australia

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Jennifer Jupp, Past President, Alberta Children's Hospital, Calgary, Canada

Mark Pasetka, President-Elect, Sunnybrook Health Sciences Centre, Toronto, Canada

Lori Emond, Treasurer, CancerCare Manitoba, Winnipeg, Canada

Coleen Schroeder, Awards Committee Chair, McGill University Health Center, Montreal, Canada

Christopher Ralph, Communications Committee Chair, Tom Baker Cancer Centre, Calgary, Canada

Tara Leslie, Education Committee Chair Pharmacist, Alberta Health Services, Calgary, Canada

Colleen Thurber, Education Committee Chair Technician / Pharmacy Assistant, Saskatoon Cancer Centre, Saskatoon, Canada

Roxanne Dobish, Membership Committee Chair, Alberta Health Services, Edmonton, Canada

Biljana Spirovski, Research Committee Chair, Humber River Regional Hospital, Toronto, Canada

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**Hotel Facilities and Services** 

#### **Business Centre**

For internet access, photocopying, faxing and other business needs, the hotel's business centre is located in the Lower Lobby (S1 Level). Its business hours are Monday to Friday, 07:30 to 18:00.

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Please ask at the hotel's concierge desk for information on the closest restaurants, lost and found, sightseeing tours and other guest services. There is a TD Canada Trust ATM located in the Lobby towards the Voyageurs bar. There are also additional ATMs located inside Place Ville Marie shopping centre.

#### First Aid / Emergency

For first aid assistance or in case of a medical emergency, ask any hotel staff, or the staff at the Symposium Registration Desk for help. The hotel has an on call doctor who can be paged if you are feeling unwell. The doctor will call back within 15 minutes of being paged.

If you need immediate, non critical care, the nearest walk-in clinic is located in the train station below the hotel. The Clinique Médicale en Route's address is 895 rue de la Gauchetière West, Room #5. The telephone number is +1-514-954-1444. The Clinique is open Monday to Friday from 07:30 to 17:30.

#### **Internet Access**

Complimentary wireless internet is available in all meeting rooms and in the Exhibit and Poster Hall. The code is: isopp2014.

#### For registered hotel guests:

If you have booked within the ISOPP room block, complimentary wired and wireless high speed internet access is available in your guest room and in the Lobby. When connecting to the internet in your room, you need to agree to the charge which will be removed at check out.

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For assistance with lost and found items, please see the hotel concierge who will be able to contact the house keeping and security departments who keep track of all lost and found items.

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#### **Conference Administration and Services**

#### **Catering and Dietary Requirements**

Lunches and refreshment breaks will be held in the Exhibit and Poster Hall in the Hochelaga 1-6, Saguenay and Saint-Maurice rooms on the Convention Floor of the hotel.

Dietary requirements noted on your registration form have been communicated to the hotel. If special meals are being provided for you, you will receive dietary tickets with your name badge. If you have dietary requirements and did not let us know during the registration process, please inform the staff at the Registration Desk on the Mezzanine level.

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If you requested a Certificate of Attendance during the registration process, it will be available at the Registration Desk on the Mezzanine level.

#### **Evaluation Survey**

At the beginning of each day of the Symposium you will receive an email with a link to an online evaluation survey regarding the sessions for that day. Shortly after the Symposium, you will receive an email with a link to the overall evaluation survey where you can give us your feedback on all aspects of your experience at the Symposium. Your feedback is important to us and we rely on this information to help us improve future ISOPP Symposia. Please take a few minutes each day and after the Symposium to complete the evaluation surveys.

#### **Liability and Disclaimer**

Participants take part in the ISOPP 2014 Symposium at their own risk. The opinions, views and conclusions put forth at our conference are those of the authors. ISOPP and CAPhO make no warranties as to the accuracy of the material presented nor endorses any conclusions offered. Participants/users of this information should evaluate it in the context of their particular patient and/or health care setting.

#### Messages

Hand written messages can be posted on the message board located by the Registration Desk on the Mezzanine level.

#### **Name Badges**

In addition to being a means of identification for your fellow participants, name badges must be worn at all times and are required to enter sessions and functions. If you misplace your name badge, please visit the Registration Desk on the Mezzanine level.

#### **Registration Location and Hours**

The Registration Desk is located on the Mezzanine level, in between the Lobby and Convention Floor and is open during the following hours:

 Wednesday, April 2nd
 12:00 – 19:00

 Thursday, April 3rd
 06:30 – 16:30

 Friday, April 4th
 06:30 – 16:30

 Saturday, April 5th
 06:30 – 14:30

#### **Session Protocol**

The language of the Symposium is English.

Every effort will be made to ensure that all sessions start and end on time. Speakers and participants are asked to work together to respect the Symposium schedule.

Respect your fellow participants by turning cellular phones, pagers and other noise-making devices off during the sessions.

#### **Social Event Tickets**

The Welcome Reception takes place on Wednesday, April 2<sup>nd</sup> from 17:00 to 18:30 amongst the Exhibits and Posters in the Exhibit and Poster Hall. The event is sponsored by Astellas Pharma Canada. All Symposium participants are welcome to attend. You do not need a ticket to attend.

The Friday evening social event, *Dinner at the Circus*, takes place on Friday, April 4<sup>th</sup> from 19:00 to 22:00 in Le Grand Salon. The event is sponsored by BD Medical. Attendance is included in full Symposium registration fees and attendance must be confirmed by Monday, March 24<sup>th</sup>, including guest tickets, which can be purchased for \$199 CDN per person. Tickets are not available onsite.

#### **Speaker Ready Room**

The Speaker Ready Room is located in the Saint-Charles room on the Convention Floor and is open during the following hours:

Wednesday, April 2<sup>nd</sup> 13:00 – 15:00 and 17:00 – 19:00

Thursday, April 3<sup>rd</sup> 08:00 – 16:00 Friday, April 4<sup>th</sup> 08:00 – 16:00 Saturday, April 5<sup>th</sup> 08:00 – 11:30

Speakers are required to report to the Speaker Ready Room the day prior to their session to provide the audio visual technician with their presentation.

#### **Tour Bookings**

Please see the Concierge if you would like to book a sightseeing tour around Montreal.



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### Symposium Program

### Wednesday, April 2nd

#### **Welcome Remarks**

John Wiernikowski, ISOPP President, McMaster Children's Hospital, Canada Joan Fabbro, CAPhO President, BC Cancer Agency, Canada Carlo DeAngelis, Symposium Chair, Sunnybrook Health Sciences Centre, Canada 15:30-16:00 (Le Grand Salon)

#### **Opening Plenary**

Facts vs. Stories: The Lived Experience of Cancer and the Re-Personalization of Health Care Mike Lang, Alberta Health Services Cancer Control, Canada

16:00 - 17:00 (Le Grand Salon)

The strong biomedical focus of Western Medicine over the past 100 years has slowly degraded the awareness of the interpersonal aspects of health care, aspects which are now being found to have a strong and direct link to outcomes. Recently, there is a trend to re-personalize health care with concepts such as Person-Centred Care or Whole-Person Care gaining momentum across the health care landscape. This presentation will give a brief overview of the research literature that is driving this change in thinking as well as provide attendees with a candid insight into the lives of young adults with cancer through Mike's personal story and the stories of the other young adults in the film "Wrong Way to Hope" (www.wrongwaytohope.com). Attendees will leave with a deeper understanding of the struggles and challenges that their patients face outside of the treatment room as well as a renewed passion for the concept of patient-centred care and the part that they can play in the development of health care systems and services that enhance everyone's health, both patient and professional.

#### **CAPhO Annual General Meeting**

17:00 - 17:45 (Le Grand Salon)

#### **Welcome Reception**

Sponsored By Astellas Pharma Canada

17:00 – 18:30 (Exhibit and Poster Hall)



#### Satellite Symposium – Merck

Managing the Complexities Associated with CINV in the Cancer Patient

Chair: Alex Chan, National University of Singapore, Singapore Jim Koeller, University of Texas, USA and Haralambos Raftopoulos, The Monter Cancer Center, USA

18:30 – 20:00 (*Marguette / Jolliet*)

- Inform the pharmacist about the safety and efficacy of Aprepitant for appropriate patients is essential to optimal patient care
- Discuss the multi-disciplinary approach to managing the cancer patient is critical and the education of the pharmacist is an essential in this communication process
- Oncology Pharmacists play an increasing role in patient care and medication management; this program will provide up to date clinical and treatment guidelines critical to the oncology pharmacist

### Thursday, April 3rd

#### Satellite Symposium - Janssen

Partnerships in Oncology for Better Patient Outcomes

Moderator: Biljana Spirovski, Humber River Hospital, Canada

07:00 - 08:30 (Marguette / Jolliet)

#### Working Together to Optimize Care for Transplant-Eligible Multiple Myeloma Patients

Dominic Duquette, Hôpital Enfant-Jésus, Canada

Through a review of the most recent evidence and sharing of patient experience, this educational program will endeavor to:

- Review current best practices in the treatment of patients with Multiple Myeloma prior to receiving a stem cell transplant
- Discuss how newer approaches to therapy have improved the management of treatment-related side effects
- Explore the role of risk stratification and post-transplant strategies to deepen response to treatment

#### The Changing Treatment Landscape for mCRPC Patients: The Role of the Pharmacist Sean Hopkins, Royal Victoria Regional Health Centre, Canada

Through a review of the most recent evidence and sharing of patient experience, this educational program will include:

- Understanding new and emerging mCRPC treatments
- mCRPC patients and polypharmacy: updates on managing drug interactions
- The pharmacokinetics of mCRPC treatments: important updates for you and your patients

### Plenary: The Use of Oncology Medications: Its Challenges and Safe Practices

Eric Cropp, USA and

David U, Institute for Safe Medication Practices, Canada

08:30 - 10:00 (Le Grand Salon)

Incidents related to oncology medications continue to be reported in many countries. The outcome of a medication error with an oncology medication can be serious and even fatal. Root cause analysis of many of these incidents has revealed multi-factorial causes and system issues. It is not just the patient who gets harmed; the practitioners involved in these incidents are often the second victims. Examples will be used to illustrate tragedy on both sides and how a true patient safety culture can help to support the needed change. Emerging medication safety issues in oncology include use of oral agents and inappropriate processes for chemotherapy preparation. Findings from the International Medication Safety Self- Assessment for Oncology will also be presented.

#### Learning objectives:

- Understand the emerging issues
- Reiterate the importance of system failure
- Appreciate system approach as foundational framework for safe practices
- Learn the findings from the International Medication Safety Self-Assessment for Oncology

#### **Refreshment Break**

10:00 - 10:30 (Exhibit and Poster Hall)

#### **Concurrent Sessions 1**

#### **Clinical 1: Hematologic Malignancy Update**

10:30 - 11:30 (*Marquette / Jolliet*)

#### Non-Hodgkin's Lymphoma – Is There More to It than CHOP?

Jim Siderov, Austin Health, Australia

Diffuse large B cell lymphomas (DLBCL) are the most common lymphoid neoplasms in adults, accounting for approximately 30% of non-Hodgkin's lymphoma (NHL) diagnosed annually. Changes in gene expression microarray analysis and immunophenotyping have allowed major advances in the treatment of NHL.

#### While CHOP based chemotherapy remains a backbone of care, this discussion will focus on:

- New chemotherapy combinations including treatment options for elderly patients, patients with poor LVEF, and patients with relapsed or refractory disease
- New targeted therapies, including new methods of administering old drugs
- Bi-specific T-cell engagers or BiTE therapy

#### Learning objectives:

- Understand newer treatment options for non-Hodgkin's lymphoma
- Discuss toxicities associated with newer treatments of non-Hodgkin's lymphoma
- Increase the role of the pharmacist in the care of non-Hodgkin's lymphoma patients

#### Updates in Multiple Myeloma

Steve Stricker, Samford University McWhorter School of Pharmacy, USA

This presentation will address recent advances in multiple myeloma including a review of new drugs approved by the United States Food and Drug Administration within the past three years, updated data from key clinical trials, and a review of investigational agents currently in phase II and phase III trials.

#### Learning objectives:

- Review the current treatment guidelines for patients with multiple myeloma
- Identify clinical trial data leading to the FDA approval of carfilzomib and pomalidomide
- Understand updated clinical trial data from key multiple myeloma studies and implications for practice
- · Evaluate novel investigational agents currently in clinical trials for multiple myeloma

#### Research 1: Biosimilars

10:30 - 11:30 (Duluth)

#### Biosimilars – How Different is Similar?

Jürgen Barth, Justus Liebig University Giessen, Germany (presented by Klaus Meier)

Biopharmaceuticals or "biologicals" are different from chemically synthesized drugs which normally have a low molecular weight. Biopharmaceuticals are large, complex proteins that have far more complicated structures. They are produced via genetic methods like recombinant DNA technology, gene transfer, and antibody cloning. They are derived from living cells (e.g. microorganisms, mammalian derived cell lines, plants, transgenic animals). Because of their complex structure and manufacturing process, they cannot be copied as "atom-identical" like small molecules are, when developing generics. Slight alterations in the manufacturing of biologics can lead to clinically relevant changes and, in some cases life-threatening effects, in the final product.

Subsequently entry biologics are not therapeutically equivalent to the reference products. They are similar, but not identical, to the reference product in structure and biological activity. A biosimilar is an approved,

new version of an innovator biologic, following patent expiry. Additionally, the most dreaded property for example is immunogenicity, and regulatory agencies are very careful when reviewing data from these molecules.

The questions to be answered are: how unique is the original? What is a "Biobetter"? What definitions are most accurate? What should a pharmacist be concerned with or take into account when these types of compounds are marketed simultaneously in his or her country? Should an originator drug patient be exposed to a biosimilar? What about extrapolation of indications? Can, for instance, a rituximab biosimilar tested in a clinical trial against follicular lymphoma be given to a patient with rheumatoid arthritis? This lecture will take you into this area of focus and give you answers.

#### **Fundamental 1: Care Givers for Cancer Patients**

10:30 - 11:30 (Mackenzie)

# Collateral Damage: The Untold Story for Family Caregivers Mike Lang, Alberta Health Services Cancer Control, Canada

Over the past 30 years the 5-year relative survival rates have improved drastically with many supportive care programs, focusing on the psychosocial needs of the cancer patient population, developing alongside these biomedical advances. Although the psychosocial trajectory of a person diagnosed with cancer has been explored in depth, recent literature highlights very high levels of distress and unmet needs in the "caregivers" or "supporters" of those with cancer as well those who are diagnosed. The engaging documentary web series Valleys, hosted on the Huffington Post in April/May 2013, was created to help cancer patients, their caregivers and health care team understand the challenges that they each face, with the ultimate goal of promoting open and honest communication and strengthening mutually supportive relationships. Using an overview of recent research literature and three episodes from Valleys as a case study, this presentation will explore the cancer journey from the caregiver's perspective. Cancer care professionals will gain a candid insight into the needs and challenges of cancer caregivers and learn simple and practical tools to build a strong patient/caregiver/professional alliance and help their patients maintain healthy relationships with their friends and family throughout the cancer experience.

#### **ISOPP General Assembly**

11:30 - 12:30 (*Marquette / Jolliet*)

#### Satellite Symposium – BD Medical

# Making Sense of Engineering Controls: A Closer Examination of ISOPP Section 7 Special Devices and Section 8 Ventilation Controls

Facilitator: John Wiernikowski, ISOPP President, McMaster Children's Hospital, Canada

Jim Siderov, Austin Health, Australia and

Rick Abbott, Dr. H. Bliss Murphy Cancer Center, Canada

12:30 - 14:00 (Le Grand Salon)

Since the first published NIOSH Alert in 2004 there has been better understanding of the need for engineering controls that protect healthcare workers from exposure to hazardous drugs. However, there is still some lack of clarity around performance requirements for many pharmacists. With an understanding of engineering controls, pharmacists can avoid costly mistakes by specifying their needs up front, rather than discovering later that the controls in place fail to perform as expected.

#### Session Objectives:

At the end of this program, attendees should be able to:

• Describe the difference between a primary engineering control and a secondary engineering control.

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- Describe the advantages and disadvantages of biological safety cabinets (BSC), compounding aseptic isolator (CACI), and compounding robots.
- Describe why the closed system transfer device is an important compliment to BSC or CACI's.
- Specifically examine the research that demonstrates surface contamination still exists with the use of BSC/CACI and that CSTD further reduces exposure risks.

#### **Lunch amongst the Exhibits and Posters**

12:30 - 14:00 (Exhibit and Poster Hall)

#### **Concurrent Sessions 2**

#### **Clinical 2: Oral Agents - Toxicities and Management**

14:00 – 15:30 (*Marquette / Jolliet*)

# Hepatotoxicities of Tyrosine Kinase Inhibitors: A Class Effect or a Drug-specific Idiosyncrasy? Han Kiat Ho, *National University of Singapore, Singapore*

The advent of molecular targeted therapy (most notably the tyrosine kinase inhibitors, or TKIs) generates a distinct range of adverse effects as compared to conventional chemotherapy. In particular, hepatotoxicity has been observed frequently, leading to black box warning labels being applied for many new TKIs on the market. As of today, there is limited data to suggest that such hepatotoxicity is an extension of the pharmacology of the TKIs implicated. Yet at the same time, a survey of the current literature on the metabolism of specific TKIs (such as gefitinib, erlotinib, dasatinib and lapatinib) unveils a growing trend of reactive metabolite formation as a potential cause for idiosyncratic reactions in patients. Coupling this to our own investigations on lapatinib and sunitinib, we are able to highlight plausible drug and patient characteristics as risk factors for hepatotoxicity. These early findings will propel clinical investigation, so as to shape patient management strategy and to harness the best outcomes for this promising new class of drugs in oncology.

#### Learning objectives:

- To recognize the significance of hepatotoxicity as a dose-limiting toxicity for the use of TKIs
- To associate drug-specific metabolism as a potential cause for toxicity
- To appreciate the plausible drug and patient characteristics that predispose to this problem

#### Management of Oral Cytotoxic Agents' Toxicity

Jürgen Barth, Justus Liebig University Giessen, Germany (presented by Klaus Meier)

Albeit not fully known, oral tumor therapeutics have existed since the use of chemotherapy in the 1960's. The first substance was the alkylator chlorambucil and the purine analogon mercaptopurine, an anti metabolite. Since the beginning of this century, the numbers of oral cytotoxics have risen continually. Functionally these substances mainly act as kinase inhibitors of low molecular weight (smKI = small molecular Kinase Inhibitor), and are also known as "ATP-mimetics". These new substances require a highly dedicated expert knowledge from the pharmaceutical point of view. This lecture will focus on supportive care of selected smKI toxicities.



Conclusion: we are still learning of the side effects of smKl, also known as "targeted therapeutics" or non-cytotoxic chemotherapy. Their side effects can be severe and life threatening. Some of them can be avoided or attenuated by appropriate prophylaxis. The latter need a closer patient monitoring than initially assumed. SmKls are a new class and pharmacodynamically new acting cytotoxic drugs.

#### **Research 2: Futuristic Therapies for Cancer**

14:00 – 15:30 *(Duluth)* 

#### **Oncolytic Viruses as New Cancer Therapeutics**

John Bell, Ottawa Hospital Research Institute, Canada

As tumours arise from normal tissues they acquire genetic mutations that provide them with a growth/ survival benefit compared to their normal counterparts. We discovered that the same genes that are mutated in cancer cells that allow them to become immortal normally function to also provide cells with the ability to resist virus infection. Thus while cancer cells develop the ability to have unrestricted growth they are at the same time compromised in their ability to resist virus infection. We therefore designed viruses that can specifically infect and kill tumour cells but cannot infect normal tissues. These so-called oncolytic viruses have entered into clinical testing and encouraging new data is emerging. Data will be presented on how these viruses function and where they are in clinical development.

#### Learning objectives:

- Introduction to the field of oncolytic viruses
- Understanding of the basis of tumour selectivity
- Summary of current clinical development

# Smart Medicines: The Role of Nanotechnology in the Future of Cancer Treatment John Lewis, *University of Alberta, Canada*

Recent advances in nanotechnology have driven the clinical and preclinical development of novel therapeutics with the potential to address the shortcomings of conventional small molecule drugs. Over the past 25 years, a large number of nanoparticle delivery systems have been developed for cancer therapy, yet significant unrealized potential still lies ahead. The inherent multi-functionality of nanomedicines offers compelling advantages for improved drug delivery in cancer, allowing the development of sophisticated delivery systems that can incorporate unstable (e.g., siRNA) and/or highly toxic drugs, improve intracellular delivery, and precisely target cancer cells to reduce side effects. The development of novel ligands for molecular targeting, for example, has catalyzed a new generation of advanced nanomedicines with increased efficacy in drug resistant and metastatic disease. The features of nanoparticle therapeutics that distinguish them from previous anticancer therapies will be discussed in the context of upcoming clinical stage nanomedicines.

#### Learning objectives:

- Provide an overview of nanotechnology as it relates to the development of clinical nanomedicines for cancer
- Discuss recent innovations in nanoparticle design and formulation
- Summarize clinical nanomedicines and relevant clinical trials



### **Fundamental 2: Chemo Treatment Pathways and Cancer Genomics**

14:00 - 15:30 (Mackenzie)

#### **Cancer Genomics**

Jill Kolesar, University of Wisconsin, USA

Advances in the understanding of the genetics of cancer and the development of medications that specifically target genetic mutations have led to a new era of personalized medicine for the diagnosis, treatment and toxicity management of our cancer patients. Clinically relevant pharmacogenomic testing will be reviewed including pharmacogenomics tests used for therapy selection and toxicity avoidance. Additionally, the regulatory, reimbursement and clinical issues that either hinder or enhance the translation of pharmacogenomics into clinical practice will be discussed with strategies for incorporation into daily clinical practice.

#### Learning objectives:

- Describe the clinical use of pharmacogenomic testing, including, BRAF, ALK, EGFR and KRAS in clinical oncology practice
- Understand the characteristics of pharmacogenomics testing that determine rapid incorporation into clinical practice
- Identify strategies that are useful for assessing pharmacogenomic testing and incorporating testing into clinical decision making

# Strategies to Optimize Oncology Care: Focus on Chemotherapy Treatment Pathways Rowena Schwartz, McKesson Specialty Health, USA

A strategy to standardize therapy and, ultimately, improve quality of care is the use of clinical treatment pathways. A goal of many cancer-based clinical pathway programs is to facilitate evidence-based treatment and to reduce unnecessary and costly treatment variations. The opportunity associated with clinical pathway programs is to encourage evidence-based medicine, and optimally to assess adherence and impact of adherence to the evidence-based medicine incorporated within the pathway. Successful models of cancer treatment pathway programs and the published results from those experiences will be described. The challenges of clinical pathways programs include issues ranging from the logistics of the pathway creation/maintenance of treatment pathways to the assessment of value and quality of care associated with this strategy. Treatment pathways are meant to provide guidance for appropriate care to patients, without dictating treatment choices for all patients.

#### After attending this presentation the participant will be able to:

- Outline the process for the development and maintenance of chemotherapy treatment pathways, and discuss the potential role of the oncology pharmacist in this process
- Discuss the considerations for implementation and assessment of a chemotherapy treatment pathway,
   and describe the opportunities for the oncology pharmacist in this process
- Describe the potential benefits and limitations associated with chemotherapy treatment pathways and patient care
- Summarize the literature that addresses successes and challenges with chemotherapy treatment pathway programs

#### **Refreshment Break**

15:30 – 16:00 (Exhibit and Poster Hall)



#### Hot Topic Cluster Discussions and Workshops

#### **Hot Topic Cluster Discussions**

Moderator: Carole Chambers, Alberta Health Services, Canada

16:00 - 17:30 (Marquette / Jolliet)

This session is open to those who signed up for the Cluster Discussions during the online registration process. Participants will have the opportunity to discuss all three round table topics during the session, each led by a different facilitator. Read below for details on the themes, topics and facilitators for this session.

Cluster Theme	#	Round Table Topic	Facilitator
Cytotoxic Preparation and Safe Handling	1A	Chemotherapy Certification	Joan Fabbro
	1B	Closed Drug System Transfer Device	Colleen Thurber
	1C	Development of Institutional Hazardous Drug Lists, Policies, and Procedures	Johan Vandenbroucke
Chemotherapy Complication Management	2A	Febrile Neutropenia	Alexandre Chan
	2B	Chemotherapy Cumulative Toxicities	Jim Siderov
	2C	Venous Thromboembolism Prophylaxis and Treatment	Nick Duncan
Antineoplastic Side Effect Management	ЗА	Nail and Skin Toxicities	Peter Gilbar
	3B	Idiosyncratic and Rare Side Effects	Han Kiat Ho
	3C	Fatigue	Gabriel Gazze
Oncology Pharmacy Operation Process Changes	4A	Computerized Physician Order Entry (CPOE)	Flay Charbonneau
	4B	Cancer Center (and Oncology unit) Establishment, Centralization, and/or Relocation	Coleen Schroeder
	4C	Technology for Remote Checking of Chemotherapy and Satellite Community Cancer Networks	Roxanne Dobish
The Role of the Clinical Pharmacist in End of Life Care	5A	Pharmacist Involvement in Multidisciplinary Pain Teams and Pain Management Programs	Kimberley Stefaniuk
	5B	Talking to Patients and Families about End of Life Care	Shaun O'Connor
	5C	Palliative Sedation Protocols	Tom McFarlane
Oncology Pharmacist Education and Specialization	6A	Oncology Therapeutics in Undergraduate Programs	Carlo DeAngelis
	6B	Oncology Pharmacy Residency Programs	Jill Kolesar
	6C	Clinical Oncology Pharmacy Certifications	Rowena Schwartz



# ISOPP XIV XIV INTERNATIONAL SYMPOSIUM ON ONCOLOGY PHARMACY PRACTICE

April 2-5, 2014 · Montréal · Canada

## "Building Partnerships in Care"

Cluster Theme	#	Round Table Topic	Facilitator
Oncology Pharmacy Scope of Practice	7A	Expanded Scope of Practice for Pharmacists	Scott Edwards
	7B	Pharmacy within Multidisciplinary and Collaborative Care Teams	Lita Chew
	7C	Expanded Scope of Practice for Pharmacy Technicians	Jennifer Jupp
The Role of the Clinical Pharmacist in Survivorship	8A	Pharmacy Role within Long Term Follow Up Programs	John Wiernikowski
	8B	Ensuring Adherence to Long Term Therapy	Klaus Meier
	8C	Ongoing Patient Management	Mark Pasetka
Pharmacy Challenges in the Care of Oncology Outpatients	9A	Adherence to Oral Agents	Steve Stricker
	9B	Challenges in Monitoring Patients (Including those in Remote Locations) on Oral Agents	Biljana Spirovski
	9C	Challenges with Monitoring Patients with Cultural or Language Barriers	Rosalyn Sims
Development and Enhancement of Clinical Pharmacy Skills	10A	Documentation in the Patient Permanent Record	Tara Leslie
	10B	Pharmacist Assessment, Decision Making, and Confidence	Felicity Wright
	10C	Patient Communication	Mark Brown

#### Workshop 1: Interacting with Professional Journals: Publishing and Reviewing

Barry Goldspiel, National Institute of Health Clinical Center, Pharmacy Department, USA and Judith Smith, University of Texas MD Anderson Cancer Center, USA

16:00 - 17:30 (Mackenzie)

To a first-time author, the publishing process can seem daunting. However, with the proper direction and resources the publishing process can be made simple. To start, the author must follow the journal's submission guidelines. If these guidelines are reviewed carefully before the manuscript is drafted, it is likely that the process will proceed smoothly and focus on the article content, rather than the technical issues which may cloud the reviewer's viewpoint.

As your career advances, you will probably be asked to serve as a reviewer for a professional journal. Proper peer-review ensures the integrity and quality of the publishing process. An approach to reviewing different types of articles (case reports, review articles, research papers) will be presented with a focus on providing information that is needed to improve the quality of the submitted paper.

This interactive workshop will present the publication process using a published article as an example, provide a demonstration of reference management software, and allow the participants to share their publication stories.

#### Learning objectives:

- List and describe the steps in the publishing process
- Discuss the use of reference manager programs to make the writing process more efficient
- Describe an approach to reviewing various types of professional articles such that the information will improve the paper and be useful to the editor to make a decision

# Workshop 2: Technology and Social Media in Patient Engagement, Patient Care, Practitioners Education and Professional Updating

Felice Musicco, *Istituti Fisioterapici Ospitalieri Regina Elena San Gallicano, Italy* and Christopher Ralph, *Tom Baker Cancer Centre, Canada* 

16:00 - 17:30 *(Duluth)* 

Bring your electronic device (Smartphone, tablet, and/or laptop) to this workshop.

This session will be an interactive workshop with a mix of didactic teaching, group discussion, and hands on implementation. This presentation will provide practitioners with an overview of how mobile devices and relevant applications (apps) can be incorporated and utilized to improve clinical practice efficiency and patient care. By the end of 2014 there will be more mobile devices on earth than people. 56% of adults own a Smartphone. The utilization of mobile device technology in the healthcare setting continues to grow at a very high rate – by both healthcare professionals and patients.

Mobile devices have become a vital and versatile piece of technology providing prompt communication ability, accessing decision-making support tools including medical and drug information, keeping up with current clinical information and organizing schedules for the clinical practitioner. These devices have developed into an integral part of many healthcare professional's personal and professional lives. Mobile device apps can also provide patients with support throughout their cancer journey.

It can be challenging to incorporate technology into clinical practice. It is also difficult to determine which applications may be useful and provide you (both the practitioner and patient) with accurate information and support give the myriad of apps in the marketplace. Successful implementation of mobile devices into clinical practice will be outlined in this presentation with a focus on reviewing clinically useful applications (apps) for healthcare professionals and patients, highlighting positive aspects of the apps and any potential negative components.

Along with mobile devices, social media has also hastily become more ubiquitous in the healthcare industry. One-third of consumers now use social media websites such as Facebook and Twitter for health-related matters including seeking medical information, tracking and sharing symptoms, and broadcasting how they feel about healthcare providers, drugs, devices and healthcare insurance plans. 60% of physicians say social media improves the quality of care delivered to patients. This presentation will highlight the intersection of social media in patient care and patient engagement.

In addition Societies of practitioners have to use their websites and related tools in order to promote education and evidence based information to their members and website visitors. Webinars, interactive tools, online virtual journal club and discussion forums are available and can be used. It is important to decide which tools are most useful and can meet the practitioner's needs.

#### Learning objectives:

- Describe how Smartphone technology can been successfully incorporated into clinical practice
- To provide practitioners with an overview of apps that could be of great value in clinical practice and to keep abreast with current literature; not all apps are accurate and reliable but we will suggest some that are
- To provide practitioners with an overview of apps they can recommend to patients, who can potentially
  utilize them to increase adherence, improve communication between patient and care provider and to
  provide them with accurate medical/medication information and support with throughout their
  cancer journey
- To provide an overview of social media and trends in patient care and patient engagement
- To discuss what Internet tools are most useful and meet practitioners needs in order to promote evidence based education and information

### Satellite Symposium – Baxter

Global Perspectives in Outsourcing IV Admixing for Oncologics

Jiali (Lili) Chen, *University Health Network, Canada* Esther Fung, *University Health Network, Canada* Simon Venville, *Baxter Healthcare Pty Ltd, Australia* 

17:30 – 19:00 (Le Grand Salon)

Although outsourcing of IV oncology admixtures can provide a number of benefits to hospital pharmacies, many countries lack supporting guidelines to justify this. This symposium examines two case studies that have demonstrated successful outsourcing along with the criteria development and rationale. In Australia, regulations are in place to ensure admixture service providers adhere to robust standards, but variation exists in how external versus in-hospital compounding is regulated. In Canada, where stringent guidelines have not been implemented, the University Health Network was forward thinking and developed their own strategy. Come assess options to improve your own pharmacy processes leveraging outsourcing IV admixing of oncologics.

### Friday, April 4th

### Satellite Symposium – Boehringer Ingelheim

Making the Most of First-line Treatment for Advanced NSCLC: The Role of EGFR TKIs

07:00 - 08:30 (Marquette / Jolliet)

Improving Testing at Diagnosis to Optimize Treatment Decisions in NSCLC Denis Soulières, Centre Hospitalier l'Université de Montréal (CHUM), Canada

Side Effects, Quality of Life and Adherence: A Pharmacy Perspective

Nathalie Letarte, University of Montreal, Canada

By attending this program, participants will:

- Review the histology of lung cancer including subtypes of NSCLC
- Be able to identify gene mutations that occur in NSCLC, including those that represent potential drug targets
- Discuss ways pharmacists can optimize therapy through improved adverse event management and medication adherence

#### Plenary: Human Factors 201: Human Error in Complex Dynamic Systems

Rachel White, HumanEra @ University Health Network, Canada

08:30 - 09:30 (Le Grand Salon)

"We cannot change the human condition, but we can change the conditions under which humans work" (James Reason, 1997). Human factors is a discipline dedicated to uncovering and addressing elements of mismatch between people, the tools they have to work with and the environments in which they work. For this reason, human factors focuses on improving technologies and systems to work optimally for people, rather than attempting to change how people behave.

This presentation will introduce newcomers to the principles of human factors for oncology practice, while building on the concepts that were presented at the ISOPP 2012 conference. Human limitations and human



error will be placed in the context of dynamic multi-level socio-technical systems to illustrate how we can improve safety in a real-world oncology context. This presentation will be case-based, engaging and interactive.

#### Learning objectives:

- · Understand human limitations in the context of complex socio-technical systems
- Describe how and why safety dynamics change over time in an environment like oncology practice
- Become empowered to make oncology pharmacy safer through changes at all levels of a complex, dynamic system

#### **Concurrent Sessions 3**

#### Clinical 3: Palliative Care

09:30 - 10:30 (Marquette / Jolliet)

#### Palliative Care: A Pharmacy Perspective

Kimberley Stefaniuk, Princess Margaret Cancer Centre, Canada

The need for palliative care is increasing at a rapid pace as the global population ages and diseases such as cancer become more prevalent. How we deliver palliative care is changing as well; as pressures on acute care hospitals increase, there is a shift towards more community based care and also towards integrating palliative care sooner into the care plan. Essential palliative care medications, especially opioids, are required for the delivery of quality palliative care. Pharmacy is therefore a crucial element of palliative care delivery at all points in the patient's illness trajectory.

This presentation will provide an overview of emerging trends and issues in palliative care, identify essential medications for the most common symptoms, and examine the role of pharmacy in caring for the terminally ill across a variety of settings.

#### Learning objectives:

- List emerging issues and trends in palliative care
- Describe essential medications for palliative care
- Explore the role of pharmacy in the care of the terminally ill

### An Analysis of the PaCCSC Consortium Studies, A Pharmacist's Perspective

Shaun O'Connor, St Vincent's Hospital, Australia

Developing a quality evidence-base for practice in palliative care is often difficult with issues surrounding ethics, recruitment, low completion rates and lack of funding. The Palliative Care Clinical Studies Collaborative (PaCCSC), a national multisite collaboration in Australia, was established to examine medications commonly used in modern palliative care. This talk will discuss the implications for palliative care services when developing clinical trial capability from the clinical pharmacist's perspective, with a particular focus upon the findings of one study recently published by the PaCCSC group around Ketamine use in palliative care. In doing so, some of the issues around study design will be highlighted, and consideration given as to why translation of the study findings have not been universal. There will also be a brief analysis of other studies currently being run by the consortium and their potential impacts on palliative care practice.

#### Learning objectives:

- To explore issues and difficulties with clinical trials and palliative care
- To examine the methodology and statistical analysis of the Ketamine trial run by PaCCSC
- To summarise other trials currently being run by PaCCSC



#### Research 3: Research in Oncology Dosing

09:30 - 10:30 (Duluth)

#### Does One Size Fit All in Dosing Algorithms Used in Oncology?

Michael Sawyer, University of Alberta and Cross Cancer Institute of Alberta Health Services, Canada

Body surface area was originally used to scale doses of chemotherapy studied in animal models to the clinical setting. For unknown reasons BSA dosing was expanded into routine clinical practice and has become a habit in how we dose chemotherapy. There is little scientific evidence to show that normalizing chemotherapy dosing to BSA reduces inter-patient variability in terms of pharmacokinetics or toxicity. Recent research has shown that variation in lean body mass (LBM) between patients can better explain toxicities of classical cytotoxic chemotherapy such as 5-flurouracil, capecitabine and epirubicin. As well LBM variation can explain sunitinib and sorafenib toxicities and pharmacokinetics. Newer targeted therapies toxicities are not only predicted by LBM but targeted therapies can cause lean body mass wasting.

#### Learning objectives:

- How conventional diagnostic imaging techniques can be utilized to estimate lean body mass
- How lean body mass variation predicts 5-flurouracil and capecitabine toxicity
- Effects of body size on size fits all targeted therapy dosing
- Effects of targeted therapy on skeletal muscle

#### Fundamental 3: Safe Handling and Good Manufacturing Practices

09:30 - 10:30 (Mackenzie)

# Australian Consensus Guidelines for the Safe Handling and Administration of Monoclonal Antibodies for Cancer Treatment by Healthcare Personnel

Sue Kirsa, Peter MacCullum Cancer Centre, Australia

**Introduction:** Evidence of occupational exposure risks to monoclonal antibodies (MABs) is limited and had not previously undergone formal evaluation from the Australian perspective. The absence of national guidelines has resulted in development of inconsistent local procedures that range from preparation and handling according to full cytotoxic safety standards to using limited safety precautions and preparation at the bedside.

Guideline Development: Guideline development was overseen by a steering committee including clinical and operational experts from five Melbourne healthcare services. A multidisciplinary guideline writing group with national medical, pharmacy and nursing representation reviewed existing MAB handling guidelines to determine research questions, develop the guideline structure and direct the literature searches undertaken to inform the recommendations. Guidelines were developed in accordance with principles outlined by the Australian National Health and Medical Research Council. A rigorous methodological approach including critical appraisal of available evidence, national survey of current practice, and formal consensus meetings was undertaken. For many recommendations, there was a paucity of high quality supportive evidence with a predominance of pre-clinical evaluations, animal studies and expert opinion. The seven recommendations cover: 1) appropriate determinants for evaluating occupational exposure risk; 2) occupational risk level compared with other hazardous and non-hazardous drugs; 3) stratification of risk based on healthcare personnel factors; 4) waste products; 5) interventions and safeguards; 6) operational and clinical factors; and 7) handling recommendations.



Learning objectives: Following attendance at this session, participants should have an:

- Understanding of consensus guideline methodology
- Knowledge of the evidence-base for the occupational exposure risk to monoclonal antibodies
- Awareness of current handling practices and the need for standardised guidelines
- Understanding of guideline recommendations including consideration of the occupational health and safety of healthcare personnel, clinical factors relating to patient safety, and operational factors relating to healthcare service efficiency

#### **Refreshment Break**

Sponsored By Boehringer Ingelheim

10:30 – 11:00 (Exhibit and Poster Hall)



#### **Concurrent Sessions 4**

#### **Clinical 4: Solid Tumour Update**

11:00 - 12:30 (*Marquette / Jolliet*)

#### **Breast Cancer Update**

Scott Edwards, Dr. H. Bliss Murphy Cancer Center, Canada

The purpose of this session is to provide the oncology pharmacist with an overview and review of recent practice-changing updates in the field of breast cancer management.

Breast cancer remains the most frequently diagnosed cancer in women, and the second leading cause of cancer death in women, exceeded only by lung cancer. When found and treated early, breast cancer is often curable. The introduction of more effective therapies over the past few decades has produced major advances in clinical outcomes. While the diagnosis and treatment of this disease surpasses treatments for many other solid cancers, challenging issues in the appropriate treatment of breast cancer continue to be an issue for many clinicians.

This session will use a case-based approach to provide a relevant discussion of recent research advances in breast cancer that can be applied to routine clinical practice.

#### Learning objectives:

- Assess strategies to guide the selection of chemotherapeutic agents/regimens for patients with breast cancer
- Review current clinical data on the risks and benefits of HER2-directed treatments and how to integrate these treatments into the systemic management of HER2 positive breast cancer
- Identify adverse effects associated with systemic therapy agents used to treat breast cancer and strategies to mitigate these toxicities

#### What's New in the Treatment of Metastatic Melanoma?

Gabriel Gazze, McGill University Health Centre - Royal Victoria Hospital, Canada

Metastatic melanoma is the most aggressive form of skin cancer. For many years, available therapeutic modalities have had very little impact with regards to overall survival rates and response rates have been modest if not downright disappointing. Newer therapeutic agents that target the immune system or the development of targeted therapies that act on specific genes or pathways have demonstrated promising results. These newer agents are redefining the therapeutic landscape for the treatment of a horrible disease which historically has presented dismal response to traditional chemotherapy, if not being extremely resistant to chemotherapy. During this presentation, we will discuss these new therapeutic agents, their



mechanisms of action, their side effect profiles and their management and a brief snapshot of the relevant clinical trials supporting the use of these medications. We will briefly present what the future holds for patients that are afflicted by metastatic melanoma. Since the advent of these newer agents, there is finally hope of better disease control with potential impact on survival.

#### Learning objectives:

- To define the epidemiology, pathology and standard of care treatment of malignant melanoma
- To present and discuss the role and importance of the newer treatment modalities for the treatment of malignant melanoma
- To present briefly the relevant clinical trials of the newer treatment modalities for the treatment of malignant melanoma
- To discuss side effect management of these newer treatment modalities for the treatment of malignant melanoma
- To present future tendencies in the treatment of malignant melanoma

#### Pancreatic Cancer - Have We Improved Therapy Options?

Jim Siderov, Austin Health, Australia

Pancreatic cancer is the fourth leading cause of cancer deaths among men and women, being responsible for 6% of all cancer-related deaths. Surgery is the primary mode of treatment for pancreatic cancer. However, an important role exists for chemotherapy and/or radiation therapy.

Adjuvant therapy with gemcitabine is accepted as standard therapy for surgically resected pancreatic cancer. While gemcitabine remains the standard of care for metastatic pancreatic cancer, newer agents are increasing our arsenal against the disease.

This discussion will focus on gemcitabine monotherapy, and include new data on combinations with nab-paclitaxel, erlotinib, fluorouracil, and oxaliplatin, as well as the FOLFIRINOX combination. According to a population based study, malignant pancreatic endocrine tumours account for approximately 1% of pancreatic cancers by incidence. Therapy for these cancers differs to adenocarcinoma of the pancreas described above. Biologically targeted agents such as everolimus and sunitinib have shown to improve PFS in patients with advanced pancreatic neuroendocrine tumours. Other agents such as somatostatin analogues have shown benefit for symptom control, while radiolabeled somatostatin analogues have shown promise in patients.

#### Learning objectives:

- Understand pancreatic cancer treatment options
- Discuss toxicities associated with the treatment of pancreatic cancer
- Increase the role of the pharmacist in the care of pancreatic cancer patients

#### Research 4: New Trends for Patient Participation in Research

11:00 - 12:30 *(Duluth)* 

# The Essential Role of Clinical Research for the Older Patient with Cancer Rowena Schwartz, McKesson Specialty Health, USA

Despite the high frequency of cancer in older adults, historically, elderly patients are under-represented in clinical trials. This includes, although is not limited to, those clinical trials evaluating new cancer treatments. Additionally, there is a concern that the older adults with cancer that do participate in clinical trials may not represent the larger population, as often only those older adults that are considered healthy may be considered for clinical trial. The result of this under-representation of older adults with cancer in clinical



trials is that evidence-based recommendations for treatment resulting from a trial may not be appropriate for older patients. The consequence ultimately may contribute to over or under treatment older adults with cancer. During this presentation we will discuss the barriers for recruitment of older patients to cancer clinical trials, and opportunities for the oncology pharmacist to help address these barriers.

#### After attending this presentation the participant will be able to:

- · Describe the consequences of under representing older adults in oncology clinical trials
- Outline recommendations for the EORTC for considerations for cancer clinical trials in older patients
- Discuss practice considerations for the older adult that is participating in a cancer treatment clinical trial

# Graduated Intensity Trials/Adapted Regimens for Cancer Patients in Low/Middle Income Countries (LMICs)

John Wiernikowski, McMaster Children's Hospital, Canada

Evidence from Randomized Controlled trials remains the highest standard upon which to base decisions on therapies for patients with cancer. The vast majority of such trials are carried out in first world/developed countries and as such raise a number of significant issues. Firstly and most importantly is generalizability. The 'mix' of patients enrolled in a trial in a developed country may (and often will) under-represent certain ethnicities represented in LMICs globally. Secondly, the overall healthcare/research infrastructure such as radiation therapy, specialized surgical expertise, data management or even more basic support like access to an ICU or a blood bank for transfusion support may be either unavailable or available in limited centres far from the patient's home. This can make accessing appropriate cancer care difficult if not impossible, and has resulted in situations where patients with potentially curable disease abandon treatment. Of course, consistent access to affordable and high quality medications or a pharmacist to prepare them is an ongoing concern in low and middle income countries. To address these disparities; a number of oncology societies are starting to develop adapted treatment regimens and designing and supporting clinical trials that can be carried out with existing healthcare infrastructure in LMICs.

#### Learning objectives:

- Identify key limitations in providing cancer treatment in LMICs
- Understand the key infrastructure requirements to conduct a clinical trial in a LMIC
- · Gain insight into adapted treatment regimens/trials that have been developed and executed globally
- Gain insight into how ISOPP may have a role in supporting such initiatives around the world

#### **Response Based Trials**

Felicity Wright, Kids Cancer Centre, Sydney Children's Hospitals Network, Australia

The increase in survival in pediatric cancers is one of modern medicines true success stories. Advances in treatment and diagnostics have seen overall survival increase and toxicities of intensive treatment reduced. Unfortunately for some patients relapse is a real risk as is the acute and long term burden of treatment.

It is known that response to treatment varies. It is also known that toxicities appear at an incidence that doesn't always correlate to outcome. Novel trial methodologies have attempted to overcome this variability in both response and toxicity. An example of a trial type that imparts this methodology is response based trials. In pediatric and AYA patients, response based trials are most established in Hodgkin's disease (HD). The overall survival for HD is excellent. There is however extensive toxicity associated with this treatment. In better risk patients there is a threshold above which the toxicity burden for chemo-radiation therapy affects patient quality of life without further improvement in survival. In addition, the retrieval rates for HD are poor. This makes it an ideal candidate for response based trial methodology.



When response based trials are used in de novo HD patients, positron emission topography (PET) is used as initial staging tool. Interim PET-restaging is then used as an assessment and future therapy based on PET results. This identifies patients who require intensive therapy and ensures those patients with a good response are not subjected to intensive treatment with an increase burden of toxicity and late effects that confer no benefit to overall survival.

Response based trials for HD has resulted in maintenance of excellent overall survival. For rapid early responders the burden of toxicity and late effects has been reduced with intensive treatment reserved for slow early responders with poor interim-PET results. Response based trials have improved the cancer journey for patients with HD and are a promising pathway for clinical trial development in other malignancies.

#### Learning objectives:

- To define response based trial and response adapted therapy
- To identify those diseases that will benefit from response based methodology
- To describe current response based trials in paediatric haematology/oncology demonstrated by Hodgkin's Lymphoma
- To have an understanding of the effect of response based trials on overall and event free survival
- To have an understanding of the effect of response based trials on short term toxicity and late effects

#### Fundamental 4: Checking Chemotherapy Best Practices

11:00 - 12:30 (Mackenzie)

#### Mixology: Recipes for Error-free Chemotherapy Cocktails

Rick Abbott, *Dr. H. Bliss Murphy Cancer Center, Canada,* Roxanne Dobish, *Alberta Health Services, Canada* and Rachel White, *HumanEra @ University Health Network, Canada* 

Research, policy change and public awareness have resulted in a huge culture shift that now recognizes drinking and driving as an unacceptable practice. Have we made the same culture shift when it comes to safety practices in our chemotherapy mixing environments? In this engaging and entertaining session, we hope to illustrate that a similar shift is needed in the way that oncology pharmacy practitioners view their own potential for human error. Interactive examples, case studies and photos will be used, and Alberta Health Services' new chemotherapy mixing and checking worksheets will be shared.

#### Learning objectives:

- Provide at least three examples of human errors that can occur during chemotherapy mixing and checking
- Describe at least three specific error-prevention techniques incorporating principles of Human Factors
- Describe how usability testing can be used to develop optimal safety tools for use in oncology pharmacy practice

#### Satellite Symposium – Astellas

#### **New Treatment Options for CRPC**

Tom McFarlane, Cambridge Memorial Hospital, Canada and Sébastien Hotte, McMaster University, Canada

12:30 – 14:00 (Le Grand Salon)



#### Learning objectives:

- Review emerging data for newer oral hormonal therapies for metastatic castration-resistant prostate cancer (mCRPC)
- Discuss the practical aspects of treatment with new hormonal agents
- Discuss the role of pharmacists in the multidisciplinary care of mCRPC patients

### **Lunch amongst the Exhibits and Posters**

12:30 – 14:00 (Exhibit and Poster Hall)

#### **Concurrent Sessions 5**

14:00 - 15:30 (Marquette / Jolliet)

#### Clinical 5: New Opportunities and Expansion in Clinical Pharmacy Services – Global Perspectives

#### Advances in Clinical Services in Asia

Lita Chew, National Cancer Centre Singapore and Ministry of Health, Singapore

The healthcare system in Asia faces these major challenges – growing and aging population, increasing burden of chronic diseases and increasing healthcare costs. Rising to the challenges, pharmacists in Asia are embracing new professional roles, besides their traditional dispensing role, to ensure the provision of optimal and cost-effective pharmaceutical care. Areas where clinical pharmacists are making a significant difference to the care of patients includes, chronic disease management through pharmacist-run clinics, antibiotic stewardship, speciality practice (oncology, infectious disease, critical care, and psychiatry), medication review, medication reconciliation, and medication therapy management services.

#### Country case study: Singapore

The pharmacy profession in Singapore has been steadily progressing and keeping pace with the growth of Singapore's medical and healthcare sector. As complex health care issues continue to demand a multidisciplinary approach, specialty-trained pharmacist is a vital member of the collaborative care team to improve treatment outcomes.

The Pharmacy Specialists Accreditation Board (PSAB) was appointed on 1 February 2012. PSAB defines the specialties in the practice of pharmacy and certifies those who meet the requisites of both qualifications and experience for registration as specialists. The Board certifies specialist pharmacists in Oncology and Advanced Pharmacotherapy in the areas of Infectious Diseases, Cardiology, Geriatrics and Psychiatry. PSAB has established the specialist training framework and accreditation criteria for specialist pharmacists. To date approximately 30 specialist pharmacists have been registered.

Given the likely increase in the number of cancer patients, new therapeutics and the complexity of cancer treatment, it is clear that high-quality care for these patients will require the full application of specialized knowledge and skills of pharmacists. Oncology pharmacists must ride on new opportunities and expand our clinical services to develop better model of care for cancer patients.

#### Learning outcomes, at the ends of session, participants will be able to:

- List clinical services provided by pharmacists in Asia
- Describe one major advancement in clinical practice development in Asia



# Pharmacist Prescribing – An Opportunity for Full Scope of Practice in Canada

In recent years, the government of Alberta, Canada enacted new regulations expanding the scope of practice for pharmacists. One of these expanded activities is the ability to prescribe medications only available by prescription upon successful completion of the Additional Prescribing Authorization (APA) application process. The framework and expectations of prescribing pharmacists in Alberta is based on key activities of pharmacy practice; developing and maintaining a professional relationship with the patient, patient assessment, development of a care plan and follow up, collaboration, documentation, and judgement. Many pharmacists in Alberta have attained their APA allowing them to manage the pharmacotherapy of their patients with more autonomy while maintaining an important collaborative role in the multidisciplinary care team. Other provinces within Canada are also making changes that facilitate an

#### Discussion will include:

Tara Leslie, Alberta Health Services. Canada

expanded scope of practice for pharmacists.

- The key activities of clinical pharmacy practice that is the foundation of pharmacist prescribing in Alberta
- Examples of innovative ways pharmacist prescribing is being integrated into clinical oncology pharmacy practice settings
- How prescribing authority has impacted the role of the pharmacist in multidisciplinary care teams
- A brief look at the expanded practice opportunities being implemented in other Canadian provinces

# New Opportunities and Expansion in Clinical Pharmacy Services – Global Perspectives: Europe Klaus Meier, *Heidekreis-Klinikum GmbH*, *Germany*

**Objective:** The aim is to describe and provide insight into the role, expansion opportunities, and scope of practice for clinical pharmacists in Europe for better understanding of common goals and different approaches.

Situation: Europe consists not only of 28 independent states that have found each other over a certain period, but they try to come to a common policy in all areas of society, in particular healthcare. A common regulatory agency EMA (European Medical Agency) has been established, similar to the FDA in the United States. A European Commissar, Tonio Borg from Malta, for example, as a European Minister of Health, is responsible for the coordination among countries in this area.

The ESOP (European Society of Oncology Pharmacy), as member of the ECCO (European Cancer Organisation with it 50,000 members of physicians, nurses and pharmacists, is a recognised consulting society within this frame.

The European Society expects pharmacists to exercise their special role, not only in the context of supplying the population with medicines, the active prevention and care, but also the dissemination of knowledge regarding the correct application.

For this reason, the ESOP constructed, based on the experience in specific countries since 2006, training in Oncological Pharmacy, the ESOP Master class, and since 2013 together with the ESO (European School of Oncology), founded by Professor Umberto Veronesi from Milano and the Advanced Master class in Clinical Oncology.

**Methods**: An overview of the development of the content and implementation possibilities in the practice under the conditions described is to be presented.

Conclusions: The cooperation in the past years has shown that progresses, despite different stages of development, are possible. Although there is no rigid rule structures have influence, goals can be achieved together if the objectives are formulated and carried together. About 200 pharmacists from 23 different countries speak for themselves.



#### Research 5: Research in HSCT

14:00 - 15:30 (Duluth)

#### Cytomegalovirus (CMV) Infection in the Setting of Haematopoietic Stem Cell Transplantation Nick Duncan, Queen Elizabeth Hospital, United Kingdom

Cytomegalovirus (CMV) infection and disease is an important cause of morbidity and mortality following allogeneic haematopoietic stem cell transplantation (SCT). CMV pneumonitis is a particular concern as the mortality if untreated can be as high as 80%. Current strategies to reduce the incidence of CMV infection and disease include prophylactic aciclovir, valaciclovir or ganciclovir during the peri- and post-transplant periods but there is a need to further refine and optimise therapeutic approaches to this common complication.

Drawing on our experience in the management of patients undergoing allogeneic SCT, this presentation will focus on risk factors for CMV infection and disease and recent developments in preventative strategies. We will also discuss the management of established CMV infection, particularly in relation to the tolerability of our standard treatments.

#### Learning objectives:

- Identify the key risk factors for CMV infection and disease in patients undergoing allogeneic SCT
- Evaluate novel strategies for the prevention of CMV infection and disease
- Discuss toxicities of the commonly used antivirals in this area

### Don't Be Late! The Role of Pre-emptive Therapy for EBV-PTLD

Jennifer Jupp, Alberta Children's Hospital, Canada

Post-transplant lymphoproliferative disorders (PTLD) encompasses a spectrum of conditions that may occur as a consequence of the immunosuppression used during hematopoietic stem cell transplantation (HSCT). Although many advances have been made in post-transplant care, PTLD continues to be a potentially fatal complication. Epstein-Barr viral (EBV) infection is implicated in the majority of PTLD cases and will be the focus of this presentation. Discussion will include a review of the pathophysiology and clinical symptoms of EBV-PTLD as well as exploring the role that rituximab and chemotherapy have in PTLD management. A review of the literature surrounding the role of pre-emptive monitoring and treatment will also be presented. To conclude, the experience and local outcomes of the Alberta Blood and Marrow Transplant Program will be shared.

#### Learning objectives:

- Review the pathophysiology, classification and risk factors for post-transplant lymphoproliferative disorders (PTLD) in the hematopoietic stem cell transplant (HSCT) setting
- Outline the incidence, clinical manifestations and prognosis of PTLD in HSCT patients
- Review management principles for PTLD
- Discuss the role of pre-emptive management of EBV induced PTLD as described in the literature
- Describe the Alberta Blood and Marrow Transplant Program's guideline for pre-emptive management of EBV-PTLD



#### **Fundamental 5: Professional Development**

14:00 - 15:30 (Mackenzie)

#### **Education, Competency and Mentorship**

Barry Goldspiel, National Institute of Health Clinical Center, Pharmacy Department, USA and Judith Smith, University of Texas MD Anderson Cancer Center, USA

This session will discuss how the three topics of education, competency and mentorship are related. The first part of the didactic lecture will provide key elements and tools to be used for chemotherapy education and tools for the "peripheral brain" reminders. Examples and electronic copies (bring your own USB flash drive) will be provided for audience to take home and implement. This will transition how and why oncology pharmacy can take the lead in establishing chemotherapy competency programs for the multidisciplinary team. Finally the session will discuss role of mentorship throughout professional development across lifespan. Real-life scenarios will be provided to help role model successful mentorship and how it is key ingredient in professional development.

#### Learning objectives:

- Compare and contrast education tools to assist in chemotherapy order process
- Explain how oncology pharmacy can lead efforts to establish multidisciplinary chemotherapy competency
- Develop an action plan for identifying a mentor
- Describe different approaches for requesting mentorship from others

#### **Refreshment Break**

Sponsored By Bristol-Myers Squibb

15:30 – 16:00 *(Exhibit and Poster Hall)* 



#### **Exhibit and Poster Viewing**

16:00 – 17:30 (Exhibit and Poster Hall)

All participants are invited to the Exhibit and Poster Hall to network with exhibitors and poster presenters.

#### Dinner at the Circus

Sponsored By BD Medical

19:00 - 22:00 (Le Grand Salon)

Join us for *Dinner at the Circus* in Montreal's grandest and most elegant hotel, Fairmont The Queen Elizabeth, and experience circus magic while enjoying the region's culinary delights with friends, old and new.

Attendance is included in full Symposium registration fees and attendance must be confirmed by Monday, March 24th, including guest tickets, which can be purchased for \$199 CDN per person. Tickets are not available onsite.





### Saturday, April 5th

#### Satellite Symposium – Bristol-Myers Squibb Canada

Immuno-Oncology: Shaping the Present, Transforming the Future and Raising the Bar in Oncology Chair: Dawn Goetz, H. Lee Moffitt Cancer Center & Research Institute, USA

Michael Smylie, Cross Cancer Institute, University of Alberta and Northern Alberta Community Cancer Network, Alberta Cancer Board, Canada and

Natasha B Leighl, *Princess Margaret Hospital, University Health Network and University of Toronto, Canada* 07:00 – 08:30 (Marguette/ Jolliet)

Over the last decade, immuno-oncology emerged as a new paradigm in the treatment of cancer. By countering tumour immune escape mechanisms; these immune-based therapies harness the potential of the immune system to fight cancer. Indeed, immuno-oncology agents can provide profound and durable responses with long-term remission and the potential for functional cure, regardless of tumour type and characteristics.

This symposium will review the latest achievements in immuno-oncology research, specifically through proven examples in metastatic melanoma. It will also discuss the potential of immuno-oncology as an innovative therapeutic option for the treatment of multiple malignant diseases.

After participating in this program, participants will be able to:

- Understand the rationale for immune checkpoint inhibition in cancer treatment;
- Describe the mechanisms of action of CTLA-4 immunotherapy and of PD-1 antibodies;
- Evaluate therapeutic response to immune checkpoint inhibition in melanoma and other cancers; and
- Describe the role of the pharmacist in the overall management of immune related adverse events during cancer immunotherapy.

#### **Platform Presentations**

**Facilitator:** Judith Smith, *ISOPP Research Chair, University of Texas, USA* 08:30 – 09:30 (*Le Grand Salon*)

- 67 Description of the hematological toxicity of different regimens using bortezomib in multiple myeloma (CyborD, Vel-Dex and VMP)
  - Dominic Duquette, CHU de Quebec, Canada
- 68 Pharmacy toolkits for oral systemic therapy agents: Just-in-time information for the practicing pharmacist Larry Broadfield, Cancer Care Nova Scotia, Canada
- 69 Integrating pharmacogenetic information into electronic prescriber order entry using clinical decision support Barry Goldspiel, NIH Clinical Center, USA
- 70 Development and validation of a patient reported diarrhea assessment questionnaire in patients with cancer treatment-related diarrhea
  - Michelle Lui, Sunnybrook Health Sciences Centre, Canada

Please refer to the Journal of Oncology Pharmacy Practice 2014 Supplement for the presentation abstracts.



#### Plenary: NIOSH Updates to Its Guidance for the Safe Handling of Hazardous Drugs Thomas Connor, National Institute for Occupational Safety and Health (NIOSH), USA

09:30 - 10:30 (Le Grand Salon)

Based on growing concerns of healthcare worker exposure to hazardous drugs, the National Institute for Occupational Safety and Health (NIOSH) convened a Working Group on Hazardous Drugs in 2000. Since that time, NIOSH has been actively involved in several endeavors aimed at reducing healthcare workers' exposure to these drugs. Successful partnerships with government agencies, professional organizations, and academia to achieve these goals has led to the development of several guidance documents related to hazardous drug exposure: an Alert on hazardous drugs, several Workplace Solutions documents on specific safe handling issues, and a guidance document addressing potential adverse reproductive effects of hazardous drugs. The result of these activities has helped raise awareness of the issues surrounding workplace exposures to hazardous drugs in healthcare settings. This awareness has resulted in several states adopting legislation based entirely or in part on the Alert and professional organizations patterning their safe handling recommendations on the Alert.

Since publication of the Alert in 2004, there have been approximately 300 articles published related to hazardous drug exposures. Therefore, NIOSH has updated the Alert to reflect new information on the safe handling of hazardous drugs. NIOSH had originally utilized lists of hazardous drugs from several organizations and updated the original list in 2010 and 2012. The current update for 2014 added several new drugs, reviewed the 2004 list according to NIOSH's criteria for a hazardous drug, and removed several drugs that did not conform to the criteria. In addition, NIOSH revised the format for presenting the drugs and added some guidance on specific handling scenarios. NIOSH is also developing a guidance document on reproductive issues related to hazardous drug exposures.

#### Learning objectives:

- · Identify guidance documents on hazardous drugs developed by NIOSH
- Identify the characteristics of a hazardous drug
- Identify NIOSH's new scheme for listing hazardous drugs

#### Refreshment Break

10:30 - 11:00 (Exhibit and Poster Hall)

#### **Concurrent Sessions 6**

#### Clinical 6: Pediatric, Adolescent and Young Adult Update

11:00 – 11:45 *(Marquette / Jolliet)* 

#### Pediatric Solid Tumour Update – Neuroblastoma

Rosalyn Sims, Children's Hospital of Michigan, USA

At the completion of this presentation the participant will be able to:

- Define neuroblastoma
- Discuss the incidence of neuroblastoma in pediatric patients
- Discuss current treatment regimens for neuroblastoma
- Discuss the role of monoclonal antibodies in neuroblastoma treatment regimens

# Adolescent and Young Adult (AYA) Oncology; Update from the Pan Canadian AYA Task Force John Wiernikowski, McMaster Children's Hospital, Canada

Adolescents and Young Adults (AYA) with cancer are different from their pediatric or adult counterparts insofar as they have a different spectrum of diseases, with different biologies, and unique psychosocial needs based on their developmental status. They remain an 'at risk' group because they fall into the gap between the conventional pediatric and adult cancer systems of care. Despite its rarity, cancer in this population has a disproportionate personal and socioeconomic impact given the years of life to be gained; however, survival rates for this population have changed very little in the past 30 years, despite significant improvements in both pediatric and [older] adult cancers. Formed in 2008 and supported largely by the Canadian Partnership Against Cancer (CPAC) and the Federal Government the Canadian AYA Task Force was established and in consultation with Health Care Providers, Patients, and Policy makers set about to create a roadmap and action plan to transform the healthcare landscape, metrics, research agenda and strategies to implement these changes that will hopefully have a positive impact on outcomes for this population.

#### Learning objectives:

- Understand just which patients comprise the AYA population
- Understand the differing spectrum of diseases affecting the AYA population vs. children or older adults
- Review the Canadian AYA Task Force's key recommendations
- Gain an appreciation for potential specialist roles for oncology pharmacists working with this population

#### **Research 6: Resistance Issues with Targeted Agents**

11:00 - 11:45 *(Duluth)* 

### Resistance to Targeted Therapies in CML

Jill Kolesar, University of Wisconsin, USA

CML is characterized by the presence of the BCR:ABL oncogene, also known as the Philadelphia Chromosome. Targeting this gene with the tyrosine kinase inhibitor imatinib has changed CML from a relatively untreatable malignancy to a chronic disease. While many patients are well controlled on imatinib and other newer tyrosine kinase inhibitors, a subset of patients develop resistance and progress to accelerated of blast phase. Resistance may occur via altered transport, lack of adherence as well resistance mutations. A case based approach will be utilized to assess primary and secondary resistance and develop strategies for second and third line interventions.

#### Learning objectives:

- Describe the molecular genetic tests that are used to diagnose and monitor CML
- Understand the mechanisms of primary and secondary imatinib resistance
- Compare and contrast the use of second generation TKIs for the treatment of CML

#### **Fundamental 6: Staffing and Career Planning**

11:00 - 11:45 (Mackenzie)

# Career Planning and Choices for Oncology Pharmacists / Technicians Judith Smith, University of Texas MD Anderson Cancer Center, USA

Experience or a degree in pharmacy can be a foundation for numerous career pathways depending upon your goals and objectives. First and foremost, we will discuss the importance of establishing a plan. This session will introduce both traditional and innovative opportunities for building upon pharmacy experience and a degree. An overview of the educational degrees, training and/or certifications that may help facilitate



reaching each career goal will be discussed. Often things in life do not go "as planned" so this session will discuss how to manage a career pathway when things go off track! Finally, this session will emphasize importance of life-time learning to build and secure career opportunities.

#### Learning objectives:

- Compare and contrast different career pathways in pharmacy
- Develop an action plan for identifying long-term career goals
- Explain the role of post-graduate training and certification in career development

#### Recruitment and Retention of Oncology Pharmacy Staff

Kimberley Stefaniuk, Princess Margaret Cancer Centre, Canada

The increasing incidence of cancer, aging population, earlier detection and diagnosis, and more complex treatment protocols mean more qualified oncology pharmacy personnel than ever before are needed. Yet many issues create barriers to recruiting and retaining staff: lack of undergraduate or standardized training, coping with heavy workloads, fear of handling hazardous drugs, and the stresses of working with the seriously ill are some examples of challenges faced.

This presentation, intended for both staff and leaders, will explore these issues and examine what oncology personnel value, what they like about their jobs, what they wish they could change, and some strategies to recruit and retain qualified oncology pharmacy personnel.

#### Learning objectives:

- Identify issues that negatively impact oncology pharmacy recruitment and retention
- Identify issues that positively impact oncology pharmacy recruitment and retention
- Implement one strategy to help improve oncology pharmacy recruitment and retention

#### **Concurrent Sessions 7**

#### **Clinical 7: Survivorship**

11:45 – 12:45 (*Marquette / Jolliet*)

#### Patient Care Issues in Cancer Survivors: A Focus on Physical Side Effects

Alexandre Chan, National University of Singapore, Singapore

The remarkable progress made in the past few decades in early detection and effective treatment of cancer has resulted in a surge of cancer survivors. Globally, the number of cancer survivors will continue to increase as the population ages. Despite improvements in survival across a wide range of cancers, research has also suggested that cancer survivors, comparing to those without a cancer history, have poorer health-related quality of life. This is mainly because cancer survivors suffer from more physical side effects, poorer health and psychological distress. Physical side effects, such as cardiovascular toxicities, fatigue, cognitive impairment and peripheral neuropathy, have been documented to afflict cancer survivors. This presentation will focus on these long-term and late effects from the treatment of cancers. The prevalence among cancer survivors will be discussed, as well as the current literature on the management of these side effects.

#### Learning objectives:

- Describe patient care issues manifest among survivors of cancer
- Understand the trajectory and risk factors of physical side effects of cancer treatment
- Discuss the management of physical side effects in cancer survivors



# Patient Care Issues in Cancer Survivors: A Focus on Psychosocial Issues Bruce Burnett, *University of Wolverhampton, United Kingdom*

The remarkable progress made in the past few decades in early detection and effective treatment of cancer has resulted in a surge of cancer survivors. Globally, the number of cancer survivors will continue to increase as the population ages. Despite improvements in survival across a wide range of cancers, research has also suggested that cancer survivors, compared to those without a cancer history, have poorer health-related quality of life (and this has also been shown to be the case for their families), mainly because cancer survivors suffer from more physical side effects, poorer health and psychological distress. Psychosocial issues relating to emotions (distress, guilt), psychological (body image, sexuality, fear of recurrence), social (return to work, new social relationships), have been documented to afflict cancer survivors and impact on their families. This presentation will focus on these psychosocial sequelae of cancer and its treatment. Their prevalence among cancer survivors will be discussed, as well as the current literature on the management strategies of these effects.

#### Learning objectives:

- Describe the psychosocial patient care issues affecting adult survivors of cancer
- Understand the impact and of the psychosocial effects of cancer and it's treatment on adult patients, their families and caregivers
- Discuss the management strategies for psychosocial side effects in adult cancer survivors

#### Research 7: Investigational Agent Update

11:45 - 12:45 (Duluth)

#### **Experimental Therapies in GI Cancers**

Tom McFarlane, Cambridge Memorial Hospital, Canada

Gastrointestinal (GI) malignancies include a diverse set of diseases including cancers of the esophagus, stomach, pancreas, small bowel, colon, rectum, and anus. These malignancies comprise a large proportion of solid tumours diagnosed in patients worldwide and have a major impact on patients and healthcare systems worldwide. Despite the fact that major advances have been made in the treatment of some of these cancers, especially those of colon and rectal origin which now have a high rate of cure associated with them, much work is required in improving the outcomes of patients diagnosed with metastatic disease as well as patients presenting with tumours with poorer outcomes, such as pancreatic, gastric, and esophageal cancers.

Given the clear need for advancement in treatment in the setting of GI malignancies, the pharmaceutical pipeline has produced a number of potentially useful agents which are currently being explored in clinical trials for GI cancers. This presentation will briefly explore recent successes with novel agents in the GI cancer setting, and then will highlight some of the newer agents which have showed or are currently showing promise in various GI cancers in Phase II and III trials, including a discussion of potential future direction of treatment in patients presenting with these cancers.

#### Learning objectives, after attending this session, participants will be able to:

- Discuss recent advances through experimental therapies in the setting of GI cancers
- Outline current agents in clinical trials currently which show promise in the GI cancer setting
- Delineate future directions in the treatment of GI cancers



#### **Looking Ahead: Investigational Agents for Prostate Cancer**

Steve Stricker, Samford University McWhorter School of Pharmacy, USA

This presentation will review investigational agents currently in development for men with prostate cancer. Additionally, clinical practice guidelines will be reviewed with a focus on the potential place in therapy for these investigational drugs, as single agents or as combination therapy.

#### Learning objectives:

- Introduce novel investigational agents currently in development for prostate cancer
- Evaluate efficacy and safety data for these new prostate cancer therapies
- Review clinical practice guidelines and assess the impact of investigational therapies on the current paradigm for management of patients with metastatic castration-resistant disease

#### **Fundamental 7: Error Prevention**

11:45 – 12:45 (Mackenzie)

#### Medication Safety with Intrathecal (IT) Chemotherapy

Peter Gilbar, Toowoomba Hospital, Australia

**Background:** The central nervous system (CNS) is a unique sanctuary site for malignant disease. To ensure optimal disease control IT chemotherapy is commonly given in conjunction with standard chemotherapy protocols, thus providing the opportunity for medication errors.

Objective: A systematic review of the current literature on medication errors associated with the administration of intrathecal chemotherapy was conducted.

**Methods**: English-language literature published from January 1960 through June 2013 was accessed. Case reports, clinical studies and review articles pertaining to IT medication errors were included in the review. References of all relevant articles were searched for additional citations.

Results: Twenty-two cases of accidental IT overdoses have been reported with methotrexate and one with cytarabine. There have been numerous cases of antineoplastic agents intended for administration by the parenteral route being inadvertently given intrathecally. Vincristine has been implicated 31 times (25 deaths), as well as vindesine, asparaginase, bortezomib, daunorubicin and dactinomycin. This has led to profound toxicity and commonly death. Unfortunately many cases go unrecognised or unreported.

Conclusions: The best method for eliminating the risk of IT medication errors is to develop effective methods of prevention and incorporate them into oncology and hematology practice internationally. Strategies include abolishing the syringe as a method of vinca alkaloid administration and substituting small-volume intravenous bags, and developing novel methods for intraspinal drug administration.

#### Learning objectives:

- To understand the role of intrathecal chemotherapy
- To recognize the types of medication errors that can potentially occur with IT chemotherapy
- To understand what strategies for preventing IT antineoplastic medication errors are available and how to adopt them into current practice



# Error Prevention with Opioids in a Tertiary Teaching Hospital

Shaun O'Connor, St Vincent's Hospital, Australia

Opioids have been classified as a high risk medication (full stop) according to the "A PINCH" acronym, consisting of Antibiotics, Potassium, Insulin, Narcotics, Chemotherapy and Heparin. The high risk is related to their potential for misuse, frequent conversions between opioids and changes of dose, and the wide range of doses used. St Vincent's Hospital in Melbourne, Australia utilizes the Riskman<sup>TM</sup> risk management system to provide a database of self-reported errors and 'near-misses' that occur in hospitals. This retrospective audit using this database examined reported errors involving opioids over a period of 18 months enabling analysis of systematic weaknesses and failures potentially leading to patient harm.

### Learning objectives:

- To explore a self-reported risk management system and its interactions with opioid errors in a tertiary teaching hospital
- To analyze the results of this audit and explore opportunities for systematic improvement in a modern hospital environment

# Satellite Symposium – Lundbeck

Evaluating the True Benefit of Hematologic Therapies: The Critical Role of Oncology Pharmacists in Care Teams Chair: Mark Pasetka, Odette Cancer Centre, Sunnybrook Health Sciences Centre, Canada Presenter: Marc Geirnaert, CancerCare Manitoba, Canada

12:45 – 14:15 *(Le Grand Salon)* 

The rapidly evolving landscape of the management of the most common hematological malignancies is driving dramatic change in systemic treatment.

Keeping pace with these developments, the hematology/oncology hospital pharmacist is playing an everexpanding role within the care team in the consideration of current and emerging therapies. Strategies in evaluation of the true potential impact of toxicities on patient health outcomes, quality of life, and burden on healthcare system will be examined.

Through discussion of cases, this interactive symposium provides a glimpse into the critical appraisal undertaken by pharmacists as they provide guidance on the suitability of therapeutic options.

#### Learning objectives:

- Identify components of a critical evaluation of hematological therapies
- Evaluate the known/unknown parameters that influence determination of "true value"
- Define the expanding role of the oncology pharmacist as therapeutics counsel for the care team
- Evaluate the impact of a therapeutic choice vs. another

## **Lunch amongst the Exhibits and Posters**

12:45 – 14:15 (Exhibit and Poster Hall)

# **Closing Plenary: Global Perspectives in Oral Anti-Neoplastic Agents**

Moderator: Carole Chambers, Alberta Health Services, Canada

#### Panellists:

Bruce Burnett, University of Wolverhampton, United Kingdom
Lita Chew, National Cancer Centre Singapore and Ministry of Health, Singapore
Scott Edwards, Dr. H. Bliss Murphy Cancer Center, Canada
Peter Gilbar, Toowoomba Hospital, Australia
Klaus Meier, Heidekreis-Klinikum GmbH, Germany
Steve Stricker, Samford University McWhorter School of Pharmacy, USA

14:15 – 15:45 (*Marquette / Jolliet*)

The processes for dispensing, handling, and provision of patient education for oral anti-neoplastic agents can be variable. Differences in practice setting, training, and local standards influence how oral prescriptions and the necessary education are provided to cancer patients. In some countries, community pharmacy colleagues have become much more involved in cancer patient care. In addition, some centers may have specific processes for oral anti-neoplastic agents that may or may not model those of parenteral chemotherapies. In each practice center, oncology pharmacy teams are working towards optimal patient care for cancer patients. As oral agents are utilized more and more, practitioners are implementing processes to improve the dispensing, handling and education of patients requiring these therapies.

This interactive session will explore some of the similarities and differences in pharmacy practice with regards to oral anti-neoplastics around the globe. An international panel of oncology pharmacists will share their current issues, practice changes, and gaps in care they have experienced in their cancer center and home country.

During this session, participants will be exposed to 6 different international perspectives on the following:

- The distribution and handling process of oral anti-neoplastic agents to cancer patients
- The way in which cancer patients receive education on oral cytotoxic agents
- The order review process for non-parenteral anti-neoplastic therapy
- Successful practice changes and current gaps in pharmacy care for cancer patients receiving oral therapies

# **Closing Remarks**

John Wiernikowski, ISOPP Past President, McMaster Children's Hospital, Canada Rowena Schwartz, ISOPP President, McKesson Specialty Health, USA Joan Fabbro, CAPhO President, BC Cancer Agency, Canada Carlo DeAngelis, Symposium Chair, Sunnybrook Health Sciences Centre, Canada 15:45 – 16:00 (Marguette / Jolliet)

















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ISOPP XIV International Symposium on Oncology Pharmacy Practice

ISOPP XIV

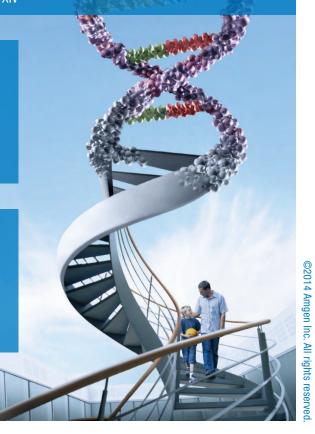
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# ISOPP XIV XIV INTERNATIONAL SYMPOSIUM ON ONCOLOGY PHARMACY PRACTICE

April 2-5, 2014 · Montréal · Canada

# "Building Partnerships in Care"

# **Speaker Biographies**

Rick Abbott, Dr. H. Blilss Cancer Center, Canada

Jürgen Barth, Justus Liebig University Giessen, Germany

John Bell, Ottawa Hospital Research Institute, Canada

Bruce Burnett, University of Wolverhampton, United Kingdom

Alexandre Chan, National University of Singapore, Singapore

Carole Chambers, Alberta Health Services, Canada

Flay Charbonneau, Sunnybrook Health Sciences Centre, Canada

Lita Chew, National Cancer Centre Singapore and Ministry of Health, Singapore

Thomas Connor, National Institute for Occupational Safety and Health, USA

Eric Cropp, USA

Carlo DeAngelis, Sunnybrook Health Sciences Centre, Canada

Roxanne Dobish, Alberta Health Services, Canada

Nick Duncan, Queen Elizabeth Hospital, United Kingdom

Scott Edwards, Dr. H. Bliss Murphy Cancer Center, Canada

Joan Fabbro, British Columbia Cancer Agency, Canada

Gabriel Gazze, McGill University Health Centre - Royal Victoria Hospital, Canada

Peter Gilbar, Toowoomba Hospital, Australia

Barry Goldspiel, National Institute of Health Clinical Center, Pharmacy Department, USA

Han Kiat Ho, National University of Singapore, Singapore

Jennifer Jupp, Alberta Children's Hospital, Canada

Sue Kirsa, Peter MacCullum Cancer Centre, Australia

Jill Kolesar, University of Wisconsin, USA

Mike Lang, Alberta Health Services Cancer Control, Canada

Tara Leslie, Alberta Health Services, Canada

John Lewis, University of Alberta, Canada

Tom McFarlane, Cambridge Memorial Hospital, Canada

Klaus Meier, Heidekreis-Klinikum GmbH, Germany

Felice Musicco, Istituti Fisioterapici Ospitalieri Regina Elena San Gallicano, Italy

Shaun O'Connor, St Vincent's Hospital, Australia

Mark Pasetka, Sunnybrook Health Sciences Centre, Canada

Christopher Ralph, Tom Baker Cancer Centre, Canada

Michael Sawyer, University of Alberta and Cross Cancer Institute of Alberta Health Services, Canada

Coleen Schroeder, McGill University Health Centre, Canada

Rowena Schwartz, McKesson Specialty Health, USA

Jim Siderov, Austin Health, Australia

Rosalyn Sims, Children's Hospital of Michigan, USA

Judith Smith, University of Texas MD Anderson Cancer Center, USA

Biljana Spirovski, Humber River Regional Hospital, Canada

Kimberley Stefaniuk, University Health Network, Canada

Steve Stricker, Samford University McWhorter School of Pharmacy, USA

Colleen Thurber, Saskatoon Cancer Centre, Canada

David U, Institute for Safe Medication Practices, Canada

Johan Vandenbroucke, University Hospital Ghent, Belgium

Rachel White, HumanEra @ University Health Network, Canada

John Wiernikowski, McMaster Children's Hospital, Canada

Felicity Wright, Kids Cancer Centre, Sydney Children's Hospitals Network, Australia

# Rick Abbott, Dr. H. Bliss Murphy Cancer Center, Canada

Rick Abbott graduated from the first Memorial University of Newfoundland School of Pharmacy class in 1990. In 2002 he moved to the Provincial Cancer Care Program as the Pharmacy Manager for the Provincial Systemic Therapy Program. Rick also lectures at the Memorial University School of Pharmacy in St. John's, Newfoundland.

Rick was the recipient of the following awards:

- 2007 Pharmacists Association of NL James C. Quick Award for innovative pharmacy practice and outstanding achievement in the practice of pharmacy
- 2007 NL Branch CSHP Award for Leadership in Pharmacy Practice
- 2010 Pharmacists Association of NL Meritorious Service Award
- 2010 Pharmacists Association of NL Past Presidents Award
- 2011 Best Paper of the Year, Canadian Pharmacy Journal.
- 2011 Eastern Health, CEO Award of Excellence for Safety

Since moving to Oncology Pharmacy Practice Rick has been very involved in and serves on several national committees and advisory boards related to cancer care. His research interests include a strong interest in outcomes based research with a focus on improving models of pharmaceutical care and patient safety.

#### Rick will be speaking in the following session:

• Fundamental 4: Checking Chemotherapy Best Practice

# Jürgen Barth, Justus Liebig University Giessen, Germany

Jürgen Barth is a specialist in clinical pharmacy and oncology pharmacy. He was the head of the Central Cytotoxic Service, Dept. of Pharmacy, University Clinic Essen, West German Tumour Centre until 2008. During that time, he participated in over 200 clinical trials (all oncology), ranging from phase I to III.

He is authorizer for advanced training in clinical pharmacy and for educational trainings in oncology pharmacy on behalf of several regional associations of pharmacists (different federal states of Germany). Since 2012 he has had a teaching assignment at the Rudolf-Buchheim-Institute for pharmacology, biomedical research centre of the Justus Liebig University Giessen, for practical pharmacotherapy (Hematology). In his present position, he is the Head of the StiL coordinating centre (StiL = Study Group Indolent Lymphoma) at the Justus Liebig University / University Clinic in Giessen, Hematology department. Jürgen is a member of several expert committees, including ISOPP.

#### Jürgen will be speaking in the following sessions:

- Research 1: Biosimilars
- Clinical 2: Oral Agents Toxicities and Management

# "Building Partnerships in Care"

# John Bell, Ottawa Hospital Research Institute, Canada

Dr. John Bell received his PhD from McMaster University in 1982. The three years that followed, he trained as a post-doctoral fellow at the University of Ottawa and then at the Medical Research Council in London, England. Dr. Bell began his independent research career at McGill University in 1986 and moved to the University of Ottawa, Department of Medicine, in 1989. He is a member of the Center for Cancer Therapeutics at The Ottawa Hospital Cancer Center, a Senior Scientist with the Ottawa Hospital Research Institute and Professor of Medicine at the University of Ottawa. He heads the Canadian Oncolytic Virus Consortium, a Terry Fox funded group from across Canada that is developing virus based cancer therapeutics and is the Director of the Biotherapeutics Program for the Ontario Institute for Cancer Research. His research program is directed towards the identification and characterization of novel viruses that specifically infect and kill cancer cells. Currently he is the Chief Scientific Officer for Jennerex Biotherapeutics, a small biotech company that performs clinical testing of virus therapeutics in patients.

# John will be speaking in the following session:

• Research 2: Futuristic Therapies for Cancer

## Bruce Burnett, University of Wolverhampton, United Kingdom

Bruce is currently a Teacher Practitioner in Clinical Pharmacy Practice (Senior Lecturer) at University of Wolverhampton. He qualified as a pharmacist in 1989 after completing his pre-registration year with Boots, a UK Chemist, and initially worked in community pharmacy before moving to hospital pharmacy in 1993. He gained a Master of Medical Sciences degree in Clinical Oncology from Birmingham University in 1996 and became a supplementary prescriber in 2004. Bruce specialised as an oncology pharmacist for 17 years working most recently at Glan Clwyd Hospital in North Wales. In addition he was an accredited tutor for the Cardiff Postgraduate Diploma in Clinical Pharmacy and was a pre-registration tutor. He moved to his current post in November 2012 which includes a one day per week practice day at Walsall Manor Hospital.

#### Bruce will be speaking in the following sessions:

- Clinical 7: Survivorship
- Closing Plenary Panel: Global Perspectives in Oral Anti-Neoplastic Agents

# Alexandre Chan, National University of Singapore, Singapore

Dr. Alexandre Chan is a tenured Associate Professor with the Department of Pharmacy at National University of Singapore and a Clinical Pharmacist at National Cancer Centre Singapore. He is also a Co-Director of the Oncology Pharmacy Residency and a Director of the Multinational Association of Cancer in Supportive Care. Alex's clinical and research interest includes cancer supportive care, anticancer drug-drug interactions and pharmacoepidemiology. He has published over 80 full-length peer-reviewed manuscripts in various medical and pharmacy journals. Alex is certified by the US Board of Pharmaceutical Specialties as Board Certified Pharmacotherapy Specialist and Board Certified Oncology Pharmacist.

#### Alex will be speaking in the following session:

- Hot Topic Cluster Discussions
- Clinical 7: Survivorship

# Carole Chambers, Alberta Health Services, Canada

Carole is the Pharmacy Director of Cancer Services with the Alberta Health Services, with over 30 peer reviewed publications.

Carole has received the Distinguished Service Award from the Canadian Association of Pharmacy in Oncology (2005), and an Achievement Award (2006) from the International Society of Oncology Pharmacy Practitioners (ISOPP) for longstanding commitment to oncology pharmacy practice through sustained excellence in providing oncology pharmacy services, leadership in innovative oncology pharmacy, related research and ongoing contributions to ISOPP. She served as President for ISOPP from 2008 to 2010. In 2011 she was awarded Fellowship status with the Canadian Society of Hospital Pharmacists, and in 2012 she was awarded Fellowship status with ISOPP.

Recently she has served on an international advisory panel for ISMP in the creation of a medication safety self assessment (MSSA) tool in oncology practice, and has given medication safety presentations in national symposia in Australia, Brazil and Canada. She also serves on the provincial advisory group for pCODR and the pan Canadian pricing negotiating teams.

## Carole will be moderating the following sessions:

- Hot Topic Cluster Discussions
- Closing Plenary Panel: Global Perspectives in Oral Anti-Neoplastic Agents

# Flay Charbonneau, Sunnybrook Health Sciences Centre, Canada

Flay Charbonneau is the Manager, Pharmacy at the Odette Cancer Centre. She is responsible for the cancer centre pharmacy and processes within the Systemic Therapy Program. The pharmacy at the Odette Cancer Centre prepares chemotherapy for 80-100 patients daily and dispenses approximately 200 retail pharmacy prescriptions daily. A key focus of her activities is in the area of process improvement, to reduce patient wait times and the optimal use of Systemic Treatment Computerized Prescriber Order entry systems.

Flay's professional memberships include the National Cancer Institute of Canada Clinical Trials Group (NCIC CTG) Breast Site and Audit and Monitoring Committee, Canadian Association of Pharmacy in Oncology (CAPhO) and its NOPS (National Oncology Pharmacy Symposium) planning committee, International Society of Oncology Pharmacy Practitioners (ISOPP) and CSHP (Canadian Society of Hospital Pharmacists). Flay is also on the steering committee of Oncology Pharmacists Toronto Regional Area (OPTRA), a local oncology pharmacists' group.

#### Flay will be speaking in the following session:

Hot Topic Cluster Discussions

# Lita Chew, National Cancer Centre Singapore and Ministry of Health, Singapore

Lita Chew is the Head of Pharmacy Department at the National Cancer Centre Singapore. She holds concurrent positions as Assistant Professor at the Department of Pharmacy, National University of Singapore and the Chief Pharmacist at the Ministry of Health Singapore. She has practiced in the area of oncology for 20 years. Her research and practice interest have included safe handling issues in oncology, medication safety, supportive care in cancer patients, pharmacoeconomics, pharmacy practice and professional development.

Lita sits in numerous boards and committees. She is the Registrar of the Singapore Pharmacy Council, Chair of the Pharmacy Specialist Accreditation Board, Member of the Drug Advisory Committee in the Ministry of Health, National Medication Safety Steering Committee, Health Science Authority Drug Reclassification Committee, SingHealth IRB, NCCS Pharmacy and Therapeutic Committee, and Medical and Professional Audit Committee at the Hospice Care Association.

Lita received her Bachelor of Science in Pharmacy from the National University of Singapore and Masters in Medical Science (Clinical Oncology) from the University of Birmingham, United Kingdom. She completed her fellowship training in Pharmacy Practice at the University of Illinois, Chicago. She is also a certified practitioner by the USA Board of Pharmaceutical Specialties (BPS) in both Oncology and Pharmacotherapy.

#### Lita will be speaking in the following sessions:

- Hot Topic Cluster Discussions
- Clinical 5: New Opportunities and Expansion in Clinical Pharmacy Services Global Perspectives
- Closing Plenary Panel: Global Perspectives in Oral Anti-Neoplastic Agents

### Thomas Connor, National Institute for Occupational Safety and Health, USA

Dr. Connor received his doctoral degree from the University of Texas Medical Branch. He was a member of the faculty of the University of Texas, School of Public Health in Houston for 20 years. Thomas Connor is currently a Research Biologist in the Division of Applied Research and Technology at the National Institute for Occupational Safety and Health (NIOSH). He was a primary contributor to the NIOSH Alert on Hazardous Drugs and is responsible for updating the list of hazardous drugs in the Alert. He was awarded the 2008 ASHP Board of Directors' Award honoring non-pharmacists for their contribution to the practice of pharmacy and the International Society of Oncology Pharmacy Practitioners' 2010 Achievement Award for developing the ISOPP Standards of Practice for Safe Handling of Hazardous Drugs. Dr. Connor's research area has focused on occupational exposure to hazardous drugs in healthcare settings. He recently co-authored a study that evaluated health care workers' exposure to antineoplastic drugs.

#### Thomas will be speaking in the following session:

Plenary: NIOSH Updates to Its Guidance for the Safe Handling of Hazardous Drugs

# Eric Cropp, USA

Several years ago, I chose a different path in my career due to my involvement in a serious medication error. I was a staff pharmacist who worked in both retail and hospital settings. I also had opportunities in both compounding and working in the hospice setting managing their pain and other medications. I was president of my pharmacy organization, Northern Ohio Academy of Pharmacy in 2001-2002. I was very active working with the Ohio Pharmacist Association as well. I unfortunately was the pharmacist in charge when a technician under my supervision made an error in preparing a saline solution needed for a chemotherapy intended for Emily Jerry. Emily died three days after the medication was administered. I was ultimately convicted of involuntary manslaughter and had to serve six months' time in jail. Drawing from the experience of being a pharmacist for 16 years, the majority of that time in the oncology field, I have learned that there is a huge gap in the safety of patients and their caregivers. From the many lectures to students and medical professionals, I have learned what solutions have been working in the work and study environments; keeping both patients and caregivers safe. By sharing my story and studying new technologies and safety protocols, I have been able to work with many health care institutions toward the goal of making changes in the safety of both the patient and its caregiver.

## Eric will be speaking in the following session:

Plenary: The Use of Oncology Medications: Its Challenges and Safe Practices

# Carlo DeAngelis, Sunnybrook Health Sciences Centre, Canada

Carlo earned his Bachelor of Science in Pharmacy from the University of Toronto in 1981 and completed a Hospital Pharmacy Residency at Sunnybrook Health Sciences Centre in 1982. He graduated with a Doctor of Pharmacy from the State University of New York at Buffalo in 1984. From 1985 to the present, Carlo has been the Clinical Pharmacy Coordinator for Oncology at the Odette Cancer Centre, Sunnybrook Health Sciences Centre and has owned and managed a community pharmacy, Panacea Pharmacy, since 1994. He is a past President of the Canadian Association of Pharmacy in Oncology.

Carlo is an Associate Professor in the Division of Pharmacy Practice at the Faculty of Pharmacy, University of Toronto and lectures in both the Undergraduate Bachelor of Science in Pharmacy and Doctor of Pharmacy Programs. He has given numerous presentations at local, national and international meetings on various oncology related topics.

His areas of interest include the prevention and management of treatment related side effects in cancer patients, with a particular interest in nausea and vomiting, neutropenia, anemia, neuropathic pain management and end of life care. Additional interests include practice based research to support the clinical activities of Oncology Pharmacists in symptom management, patient counseling and the roll of Pharmacists in promoting good medication taking behavior in the oncology setting.

Carlo is a passionate advocate of the need for pharmacists in both the hospital and community settings to be more involved in the care of cancer patients.

#### Carlo will be speaking in the following session:

Hot Topic Cluster Discussions

# Roxanne Dobish, Alberta Health Services, Canada

Roxanne graduated from the Faculty of Pharmacy at the University of Alberta and has over 25 years experience in oncology pharmacy in a variety of roles. Her current role is as Pharmacy Manager for 19 community oncology program locations. She has been involved in all aspects of pharmacy services and developed a strong interest in medication and patient safety through a number of process improvement and research projects at local, provincial and national levels and has come to value the unique perspectives that the Human Factors field can provide to improving safety in oncology pharmacy practice.

### Roxanne will be speaking in the following session:

- Hot Topic Cluster Discussions
- Fundamental 4: Checking Chemotherapy Best Practice

# Nick Duncan, Queen Elizabeth Hospital, United Kingdom

Nick Duncan is the principal pharmacist (haematology/oncology) at the Queen Elizabeth Hospital in Birmingham, United Kingdom. He graduated from Nottingham University in 1993 and subsequently obtained a Masters in Medical Science (Clinical Oncology) from the University of Birmingham. In 2010 he was awarded a fellowship of the Faculty of Cancer Pharmacy and the College of Pharmacy Practice. He is an active member of the British Oncology Pharmacy Association and is a regular presenter at their annual symposium. His research interests include the management of infections in the setting of haematopoietic stem cell transplantation.

#### Nick will be speaking in the following session:

- Hot Topic Cluster Discussions
- Research 5: Research in HSCT

### Scott Edwards, Dr. H. Bliss Murphy Cancer Center, Canada

Scott is currently the clinical oncology pharmacy specialist at the Dr. H. Bliss Murphy Cancer Center in St. John's, Newfoundland. He is an assistant professor at the School of Pharmacy and the Discipline of Oncology, Faculty of Medicine, Memorial University of Newfoundland.

Scott is active in clinical cancer research in the area of chemotherapy toxicities, supportive care and oral chemotherapy adherence.

Scott graduated from Memorial University of Newfoundland with a B.Sc. (Neuroscience) in 1994 and a B.Sc (Pharmacy) in 1997. In 2005 he graduated with a Doctor of Pharmacy degree from the University of Washington. Scott is currently working on a Masters in Oncology from Newcastle University.

# Scott will be speaking in the following sessions:

- Hot Topic Cluster Discussions
- Clinical 4: Solid Tumour Update
- Closing Plenary Panel: Global Perspectives in Oral Anti-Neoplastic Agents

# Joan Fabbro, British Columbia Cancer Agency, Canada

Joan Fabbro has been an oncology pharmacist at the BC Cancer Agency since 1997 and has held the position of Chemotherapy Certification Pharmacist since 2006. She is the Chair of the BCCA Pharmacy Safe Handling Working Group which has developed pharmacy directives/procedures for the safe handling of hazardous drugs for the BCCA. Joan is the President of the Canadian Association of Pharmacy in Oncology.

#### Joan will be speaking in the following session:

• Hot Topic Cluster Discussions

# Gabriel Gazze, McGill University Health Centre - Royal Victoria Hospital, Canada

Gabriel graduated with a bachelors degree from the Faculté de Pharmacie de l'Université de Montréal in 1991 and completed his residency in hospital pharmacy at the Royal Victoria Hospital in 1992. Since 1994, he has been working as a pharmacist in hematology-oncology at The McGill University Health Center at the Royal Victoria Hospital. He was a member of the NCIC CTG Pharmacists Network Steering Group from 1998-2004 and President of the Regroupement des Pharmaciens ayant un intérêt en Oncologie (RPO) de l'APESQ (Association des pharmaciens en établissements de santé du Québec from 2002-2005.

Gabriel has been a member of the Canadian Association of Pharmacy in Oncology (CAPhO) Executive Committee since 2001 and was President of CAPhO for 2006-2007. He received the CAPhO Distinguished Service Award in 2013.

#### Gabriel will be speaking in the following sessions:

- Hot Topic Cluster Discussions
- Clinical 4: Solid Tumour Update

#### Peter Gilbar, Toowoomba Hospital, Australia

Peter Gilbar is a Pharmacist Consultant and Senior Lecturer for the University of Queensland (School of Medicine – Rural Clinical Division) at Toowoomba Hospital, Australia. He holds a Bachelor of Pharmacy from the University of Queensland, a Master of Palliative Care from Flinders University, and Fellowships from the Society of Hospital Pharmacists of Australia (SHPA) and International Society of Oncology Pharmacy Practitioners (ISOPP). He also serves on the editorial board of the Journal of Oncology Pharmacy Practice and Journal of Pediatric Oncology. Peter is a regular contributor to peer reviewed journals (over 50 publications) and presenter at oncology conferences. His particular areas of interest and research include medication safety, symptom management and rural oncology practice.

#### Peter will be speaking in the following sessions:

- Hot Topic Cluster Discussions
- Fundamental 7: Error Prevention
- Closing Plenary Panel: Global Perspectives in Oral Anti-Neoplastic Agents

# "Building Partnerships in Care"

# Barry Goldspiel, National Institute of Health Clinical Center, Pharmacy Department, USA

Dr. Barry Goldspiel is Deputy Chief and Chief of the Clinical Pharmacy Specialist Section, at the National Institutes of Health Clinical Center Pharmacy Department in Bethesda, Maryland. He received his B.S. in Pharmacy from the Arnold and Marie Schwartz College of Pharmacy in Brooklyn, New York and a Doctor of Pharmacy degree from the University of Texas Health Science Center at San Antonio. He completed a Specialized Residency in Oncology Pharmacy Practice at the Audie L. Murphy Veterans Hospital in San Antonio.

Dr. Goldspiel is an active member of several pharmacy societies including the American Society of Health-System Pharmacists (ASHP), American College of Clinical Pharmacy (ACCP), the International Society of Oncology Pharmacy Practitioners (ISOPP), and the Hematology/Oncology Pharmacy Association (HOPA). He is a fellow of ASHP, ACCP, and ISOPP and an honorary member and past-president of ISOPP and HOPA. Dr. Goldspiel is the founding Editor of the Journal of Oncology Pharmacy Practice, the official publication of ISOPP.

# Barry will be speaking in the following sessions:

- Workshop 1: Interacting with Professional Journals: Publishing and Reviewing
- Fundamental 5: Professional Development

# Han Kiat Ho, National University of Singapore, Singapore

Dr. Han Kiat Ho is an assistant professor at the Department of Pharmacy, National University of Singapore (NUS). He received his Bachelor of Science (Pharmacy) with First Class Honors from NUS in 2000. Subsequently, he obtained his PhD in Medicinal Chemistry from the University of Washington in 2005, investigating the molecular mechanisms of specific drug-induced liver toxicity (under the mentorship of Prof Sid Nelson). After which he returned to Singapore for a 3-year post-doctoral fellowship with Prof Axel Ullrich, investigating the roles of tyrosine kinases for various malignancies. Since 2009, he started building his own research program focusing on drug-induced liver toxicity, as well as exploring new drug targets for liver cancer. He also directs a toxicology division within a newly founded Drug Development Unit in NUS. He has published more than 30 papers in internationally recognized journals, and has won multiple university-level teaching excellence awards.

# Han Kiat will be speaking in the following sessions:

- Clinical 2: Oral Agents Toxicities and Management
- Hot Topic Cluster Discussions

# Jennifer Jupp, Alberta Children's Hospital, Canada

Jennifer Jupp graduated from the University of Alberta in 2000. Since then, she has worked as a clinical pharmacist within the Alberta Blood and Marrow Transplant Program in Calgary, Alberta. In 2007, Jennifer received her Board Certification in Oncology Pharmacy. Currently, Jennifer is the Clinical Practice Leader for the Hematology, Oncology and Transplant Program within Alberta Health Services. She maintains a clinical practice with HSCT patients at the Alberta Children's Hospital and has a keen interest in clinical research, integrating technology into clinical practice and improving adherence in pediatric oncology patients. Jennifer is the Past-President of the Canadian Association of Pharmacy in Oncology (CAPhO) and is a member of other pediatric oncology committees.

# Jennifer will be speaking in the following sessions:

- Hot Topic Cluster Discussions
- Research 5: Research in HSCT

# Sue Kirsa, Peter MacCullum Cancer Centre, Australia

Sue Kirsa is the Director of Pharmacy at the Peter Mac Callum Cancer Centre. She has been a pharmacist for over 30 years, with much of her practice dedicated to oncology pharmacy practice. Sue also has an active interest in clinical governance, medication safety and pharmacy leadership. Sue is the immediate past president of the Society of Hospital Pharmacists of Australia and has sat on numerous professional and government committees and bodies whose aims are to further develop the practice of pharmacy and the safety and quality of healthcare. Sue is published in a range of areas including antimicrobial stewardship and hand hygiene, consensus guidelines and pharmacy practice.

#### Sue will be speaking in the following session:

• Fundamental 3: Safe Handling and Good Manufacturing Practices

# Jill Kolesar, University of Wisconsin, USA

Jill M. Kolesar, Pharm D, BCPS, FCCP received a Doctor of Pharmacy and completed a specialty practice residency in oncology/hematology and a 2-year fellowship in molecular oncology pharmacotherapy at the University of Texas Health Science Center in San Antonio, Texas. Jill is currently a Professor of Pharmacy at the University of Wisconsin School of Pharmacy and the Director of the Analytical Laboratory at the University of Wisconsin Carbone Comprehensive Cancer Center. Her research in pharmacogenomics includes the use of molecular markers to predict response and monitor efficacy of cancer chemotherapy, population genotyping for cancer susceptibility, and the regulation of gene expression of the two electron reductases. She has authored more than 100 abstracts, research articles, and book chapters, and as a principal investigator, she has received more than \$750,000 in research funding from the NCI, ACS and other sources. In addition, she holds two US patents for novel assay methodologies for gene expression and mutation analysis. She has received several research awards from local, national and international pharmacy organizations and a Merit Award from the American Society of Clinical Oncology. She received the Innovations in Teaching Award from the American Association of Colleges of Pharmacy in 2001. Jill serves on the editorial boards of the Journal of Clinical Oncology, the Journal of Oncology Pharmacy Practice, and the textbooks; Pharmacogenomics Handbook, ACCP's Pharmacogenomics: Applications to Patient Care, and Pharmacotherapy: Principles and Practice. She is the Chair of the Lung Biology subcommittee of the Eastern Cooperative Oncology Group (ECOG), the committee responsible for overseeing the correlative science in all lung cancer clinical trials conducted by ECOG. Jill is a former member of the National Cancer Institute Central IRB (2004-2009), and served as the Chair of the Adverse Events Subcommittee.

# Jill will be speaking in the following sessions:

- Fundamental 2: Chemo Treatment Pathways and Cancer Genomics
- Hot Topic Cluster Discussions
- Research 6: Resistance Issues with Targeted Agents

# "Building Partnerships in Care"

# Mike Lang, Alberta Health Services Cancer Control, Canada

Mike Lang is the CancerBridges Survivorship Education Coordinator with Alberta Health Services Cancer Control and is a MSc. student in the Community Health Sciences faculty at the University of Calgary, specializing in Health Services Research. He is a five year cancer survivor himself and the director of an adventure therapy organization for young adults with cancer called Survive and Thrive Expeditions. Mike also is a film-maker and storyteller, specializing in using illness narratives to educate, inspire and connect health care professionals with the lived experience of their patients.

# Mike will be speaking in the following sessions:

- Opening Plenary: Facts vs. Stories: The Lived Experience of Cancer and the Re-Personalization of Health Care
- Fundamental 1: Care Givers for Cancer Patients

### Tara Leslie, Alberta Health Services, Canada

Tara Leslie attained her Bachelor of Science in Pharmacy (BSP) degree from the University of Saskatchewan in 1997 and obtained her Board Certification in Oncology Pharmacy (BCOP) in 2010. She is currently a Pharmacy Clinical Practice Leader (CPL) with Alberta Health Services at the Alberta Children's Hospital Hematology/ Oncology/ Transplant (HOT) program. Prior to this position, Tara has worked as a CPL at the Peter Lougheed Hospital and as a clinical pharmacist at Foothills Medical Center. For several years, Tara's primary area of clinical practice has been with hematologic malignancy and bone marrow transplant patients. Recently, Tara was granted her Additional Prescribing Authority (APA) and is exploring ways to integrate it into her practice. As the Chair for the Pharmacist Education Committee with the Canadian Association of Pharmacy in Oncology (CAPhO), the Co-Chair for the Scientific Program Committee for the ISOPP XIV Symposium, and a Membership Committee member for the Alberta Branch of the Canadian Society of Hospital Pharmacists (CSHP), Tara is very involved with organizations dedicated to the advancement of the pharmacy profession. Outside of work, Tara enjoys spending time with her family and playing the piano.

#### Tara will be speaking in the following sessions:

- Hot Topic Cluster Discussions
- Clinical 5: New Opportunities and Expansion in Clinical Pharmacy Services Global Perspectives

#### John Lewis, University of Alberta, Canada

John Lewis holds the Frank and Carla Sojonky Chair in Prostate Cancer Research at the University of Alberta. He is an Associate Professor in the Department of Oncology, a Fellow of the National Institute of Nanotechnology, and currently serves as the chair of the Alberta Prostate Cancer Research Initiative (APCaRI). Dr. Lewis received his B.Sc. Honours in Genetics at University of Western Ontario in the Department of Genetics and a PhD in Biochemistry at the University of Victoria in 2003. He pursued post-doctoral training in Nanotechnology and Imaging at The Scripps Research Institute in La Jolla, CA.

Dr. Lewis's research group utilizes real-time intravital imaging of cancer to learn about the critical steps of disease progression. They have developed several innovative nanoparticle platforms for the early detection of cancer, drug delivery, and the study of cancer invasion and metastasis. Dr. Lewis is actively involved in advocacy and public awareness programs for prostate cancer, and enjoys surfing, snowboarding and mountain biking in his spare time.

#### John will be speaking in the following session:

Research 2: Futuristic Therapies for Cancer

# Tom McFarlane, Cambridge Memorial Hospital, Canada

Dr. Tom McFarlane received his Bachelor of Science in Pharmacy degree from the University of Toronto in 1996 and his Doctor of Pharmacy degree from Idaho State University in 2011. He is currently a clinical oncology pharmacist with the Waterloo Wellington Regional Cancer Program at Cambridge Memorial Hospital in Cambridge, Ontario, Canada, where he is part of a multidisciplinary team which treats both solid and hematologic malignancies on both an inpatient and outpatient basis. He also practices as an academician and researcher at the University of Waterloo School of Pharmacy in Kitchener, Ontario, where he created, coordinates, and teaches the oncology portion of the curriculum in the Doctor of Pharmacy program and is a member of the School of Pharmacy's Curriculum Assessment Committee. He has a particular interest in GI, lung, and prostate cancers, and conducts practice based research in these settings which includes exploring ways of improving supportive care regimens for patients and the impact of supportive care on overall outcomes. He is a member in good standing of the American Society of Clinical Oncology (ASCO), the Canadian Association of Pharmacy in Oncology (CAPhO), the International Society of Oncology Pharmacy Practitioners (ISOPP), and the National Cancer Institute of Canada Clinical Trials Group (NCIC-CTG), and is a member of both the CAPhO Education Committee and the CAPhO Task Force on Undergraduate Oncology Education.

#### Tom will be speaking in the following sessions:

- Hot Topic Cluster Discussions
- Research 7: Investigational Agent Update

# Klaus Meier, Heidekreis-Klinikum GmbH, Germany

After some experiences in community pharmacies, Klaus Meier started as hospital pharmacist in 1982 and became a certified Clinical Pharmacist after 6 years practical experiences and continuous education in 1989. In 1988 he implemented the centralised Cytotoxic service as one of the first in Germany at the General Hospital of Hamburg-Harburg.

He has attended ISOPP symposia since the second in Exeter in 1990 and founded the German Oncology Pharmacy Conference named NZW in 1993. Since that day's it became a well known meeting in Europe with over 900 attendees each year.

He was also responsible for implementing the specialisation for "Oncology Pharmacy" in Germany in 2001. From 1996 until 2001 he acted as Director and since 2012 he was Vice Director of the Institute for Applied Healthcare Sciences (IFAHS) in Hamburg.

He served ISOPP from 1997 as President Elect and from 1998 to 2000 as President. He has been the founding president of the ESOP (European Society of Oncology Pharmacy) since 2000. In 2012 he became a fellow of the European Academy of Cancer Sciences (EACS).

In 2002 he became General Manager of all pharmacies in community hospitals in Hamburg, Germany, serving nearly 6000 beds, with more than 40000 preparations for cancer patients yearly.

Since 2006, he has been the Head of the Department for Clinical and Hospital Pharmacy in the Heidekreis-Klinikum GmbH in Soltau, Lower Saxony.

### Klaus will be speaking in the following sessions:

- Hot Topic Cluster Discussions
- Clinical 5: New Opportunities and Expansion in Clinical Pharmacy Services Global Perspectives
- Closing Plenary Panel: Global Perspectives in Oral Anti-Neoplastic Agents

# Felice Musicco, Istituti Fisioterapici Ospitalieri Regina Elena San Gallicano, Italy

Felice Musicco is a pharmacist at Istituti Fisioterapici Ospitalieri Regina Elena San Gallicano, an oncological and dermatological research hospital in Rome, Italy. He is the current director of the hospital's external pharmacy and he also directs pharmacovigilance and new drug use monitoring services. He has over 20 years of experience in hospital pharmacy in many roles. Since 2006 he has been the Publication Committee Chair for ISOPP and is currently the website editor in chief for the Italian Society of Hospital Pharmacists (www.sifoweb.it).

His areas of interest include evidence based pharmacy, pharmacovigilance, information technology, database development and applications for mobile devices and desktop computers, website design and Internet educational tools for pharmacists and health care professionals.

In his free time he likes sports, plays tennis, soccer, and chess and enjoys practicing photography, reading books. He is 50 years old and married with 3 children.

#### Felice will be speaking in the following session:

 Workshop 2: Technology and Social Media in Patient Engagement, Patient Care, Practitioners Education and Professional Updating

### Shaun O'Connor, St Vincent's Hospital, Australia

Shaun received his B.Pharm from Monash University in 2005 and started to practice in Oncology Pharmacy in 2007. He has 4 years experience working in both the Haematology/Oncology Inpatients ward and the Cancer Care Centre at St Vincent's in Melbourne. He was on the Organising Committee for the ISOPP International Symposium in 2012 as well as the ISOPP Regional Symposia in 2011 and 2013, which were all held in Melbourne. He is a current member of the ISOPP Secretariat.

#### Shaun will be speaking in the following sessions:

- Hot Topic Cluster Discussions
- Clinical 3: Palliative Care
- Fundamental 7: Error Prevention

## Mark Pasetka, Sunnybrook Health Sciences Centre, Canada

Mark graduated from the University of Manitoba School of Pharmacy in 2004 and spent three years in a variety of practice settings. After having finished his Doctor of Pharmacy degree at the University of Toronto (2009), Mark went on to complete a two year post-doctoral fellowship in oncology at the Odette Cancer Centre in Toronto, Ontario (2011) and now serves as the Clinical Pharmacy Coordinator. Mark's is a member of both national and international oncology organizations and has publications in a number of recognized journals. His areas of interest include supportive care, health technology and education, and clinical research. Mark is the President-Elect for CAPhO.

#### Mark will be speaking in the following session:

Hot Topic Cluster Discussions

# Christopher Ralph, Tom Baker Cancer Centre, Canada

Chris Ralph is a graduate of Memorial University of Newfoundland's School of Pharmacy. Chris is a clinical pharmacist with advanced prescribing authority in the Symptom Control and Palliative Care outpatient clinic at the Tom Baker Cancer Centre in Calgary. He developed and maintains an oncology professional information resource website - OncoPRN. Chris has a keen interest in incorporating mobiles devices and health technology into Clinical Practice. He is also currently the Communications Committee Chair for CAPhO. In his spare time, Chris enjoys sports writing, watching and playing various sports, playing guitar, song writing, biking, hiking, skiing, travelling and keeping up with technology.

#### Chris will be speaking in the following session:

 Workshop 2: Technology and Social Media in Patient Engagement, Patient Care, Practitioners Education and Professional Updating

# Michael Sawyer, University of Alberta and Cross Cancer Institute of Alberta Health Services, Canada

Dr. Michael Sawyer is an Associate Professor in the Department of Oncology of the University of Alberta, and a medical oncologist and clinical pharmacologist for the Cross Cancer Institute of Alberta Health Services. He obtained his Bachelor of Science in Pharmacy and his MD from the University of Toronto. He completed his fellowship in Medical Oncology fellowship at the University of Western Ontario and completed his training in drug development and Clinical Pharmacology at the University of Chicago Cancer Center. The focus of his research is on causes of inter-patient variability in terms of both toxicity and efficacy to cancer chemotherapy. His research program centers on two fields of study: 1) body composition of cancer patients and 2) tyrosine kinase inhibitor pharmacology. He is also the head of the Phase I program at the Cross Cancer Institute.

#### Michael will be speaking in the following session:

Research 3: Research in Oncology Dosing

# Coleen Schroeder, McGill University Health Centre, Canada

Coleen Schroeder graduated from the University of Manitoba in 2002 and completed a Hospital Pharmacy Residency with the Winnipeg Regional Health Authority in 2003. She then moved to Montreal and started working as an oncology pharmacist at the McGill University Health Center on the Montreal General Hospital site. Coleen received her Board Certification in Oncology Pharmacy in 2008. She enjoys spending much of her free time with her family. She is the Chair of the Awards Committee on the CAPhO Executive.

#### Coleen will be speaking in the following session:

• Hot Topic Cluster Discussions



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# Rowena Schwartz, McKesson Specialty Health, USA

Rowena N. Schwartz is the Senior Director of Clinical Content and Services at McKesson Specialty Health. Dr. Schwartz received a Bachelor of Science in Pharmacy at the College of Pharmacy, University of Illinois at the Medical Center in Chicago and a Doctor of Pharmacy at the University of Texas Health Science Center at San Antonio. She completed a two-year fellowship in oncology drug development at the University of Texas. Dr. Schwartz is a board certified oncology pharmacist.

During the course of her career she has practiced in a variety of oncology clinical practice settings, and has been an Oncology Clinical Pharmacy Specialist in adult hematology, oncology and stem cell transplantation at the University of Pittsburgh Cancer Institute (UPCI). Additionally, she has held administrative positions including the Coordinator of Oncology Pharmacy Services at UPCI and the Director of Oncology Pharmacy at the Johns Hopkins Hospital (JHH). While at JHH, Dr. Schwartz maintained an active clinical practice with the Johns Hopkins Hospital Oncology Anticoagulation Service.

Dr. Schwartz's practice and research interest is in the area of drug therapy for the prevention and/or management of cancer and cancer related complications. She has a focused interest in geriatric oncology. Rowena is a an active member of the Hematology and Oncology Pharmacy Association, American Society of Health System Pharmacist, the International Society of Oncology Pharmacy Practitioners and the Oncology Nursing Society. She has authored numerous chapters, journal articles and abstracts in various topics related to pharmacy practice in oncology, and speaks frequently on pharmacy and multidisciplinary aspects of oncology practice.

#### Rowena will be speaking in the following sessions:

- Fundamental 2: Chemo Treatment Pathways and Cancer Genomics
- Hot Topic Cluster Discussions
- Research 4: New Trends for Patient Participation in Research

#### Jim Siderov, Austin Health, Australia

Jim commenced work in the area of oncology and haematology pharmacy practice in 1989 soon after completing his Bachelor of Pharmacy degree. In 1998 he successfully completed the inaugural US Board of Pharmaceutical Specialties Certification in Oncology Pharmacy (BCOP), and re-certified in 2006 and 2013. In 2004 he was awarded Fellowship to the Society of Hospital Pharmacists of Australia (SHPA), and in 2005 completed his Masters in Clinical Pharmacy. Jim is currently the Senior Pharmacist for Cancer Services at the Olivia Newton-John Cancer and Wellness Centre located at Austin Health, Heidelberg, Australia.

Jim has been an active member of many professional organisations. He served on the SHPA Committee of Specialty Practice in Oncology and the Cancer Pharmacists Group of the Clinical Oncological Society of Australia, which he chaired for 2 years from 2010. Jim is currently the ISOPP Chair of the Standards Committee. Jim also coordinates the Victorian Oncology Pharmacy Special Interest Group which meet on a regular basis to promote the education of local practitioners in cancer pharmacy practice.

Jim has published widely in peer-reviewed journals, and presented at local, national and international conferences. He has lectured to a number of undergraduate and postgraduate programs at both Melbourne and Monash Universities.

Jim's major interests are solid tumours, with a particular interest in colorectal cancer. He also has an interest in occupational health and safety issues in the handling of cytotoxic drugs.

#### Jim will be speaking in the following sessions:

- Clinical 1: Hematologic Malignancy Update
- Hot Topic Cluster Discussions
- Clinical 4: Solid Tumour Update

# Rosalyn Sims, Children's Hospital of Michigan, USA

Rosalyn Sims has been a Clinical Pharmacy Specialist in Hematology/Oncology at Children's Hospital of Michigan for 16 years. She is a graduate of Emory University, with a bachelor's degree in chemistry, and she received her PharmD from Mercer University - Southern School of Pharmacy.

Rosalyn has been an ISOPP member since 1998. She is an active member of the Membership and Finance committee and has served as the committee chair. She is currently a general secretariat member for 2012 – 2014. Rosalyn is dedicated to the field of oncology pharmacy, especially for pediatric patients.

# Rosalyn will be speaking in the following sessions:

- Hot Topic Cluster Discussions
- Clinical 6: Pediatric, Adolescent and Young Adult Update

# Judith Smith, University of Texas MD Anderson Cancer Center, USA

Dr. Judith A. Smith is an Associate Professor in the Department of Gynecologic Oncology and Reproductive Medicine at The University of Texas MD Anderson Cancer Center in Houston (UTMDACC), Texas and Adjunct Associate Professor in the Department of Obstetrics, Gynecology and Reproductive Sciences at The University of Texas Health Science Center at Houston Medical School. She received a Bachelor of Science in Pharmacy and her Doctor of Pharmacy degree from Albany College of Pharmacy and completed her residency in Pharmacy Practice and Oncology Pharmacy Practice at the National Institutes of Health followed by a fellowship in Clinical Pharmacology at UTMDACC. She is Board Certified in Oncology Pharmacy and Certified Professional in Healthcare Quality.

#### Judith will be speaking in the following sessions:

- Workshop 1: Interacting with Professional Journals: Publishing and Reviewing
- Fundamental 5: Professional Development
- Fundamental 6: Staffing and Career Planning

# Biljana Spirovski, Humber River Regional Hospital, Canada

Biljana Spirovski is a clinical pharmacist in the Oncology and Clinical Trials program at Humber River Regional Hospital in Toronto. She established the chemo pharmacy satellite at Humber in the 1990s and has been an instrumental part of its growth ever since. Biljana has recently spear-headed the establishment of the OPTRA group, a network of oncology pharmacists in the Greater Toronto Area that meets quarterly to discuss oncology pharmacy related issues. Biljana is a Past Chair of the Pharmacists Network Steering group at the NCIC. She is the Chair of the Research Committee for CAPhO.

# Biljana will be speaking in the following session:

Hot Topic Cluster Discussions

# Kimberley Stefaniuk, Princess Margaret Cancer Centre, Canada

Kim is a graduate of the University of Saskatchewan and currently pursuing graduate studies in education. She has been practicing in the fields of oncology and palliative care for many years, most recently at Princess Margaret Cancer Centre in Toronto, Canada.

She also very interested in competency assessment and works in the OSCE/OSPE section of the Pharmacy Examining Board of Canada.

Oncology and palliative care pharmacy education is important to Kim and she is always pleased to share her knowledge and experience in the area. She has several publications to her credit, is active in many pharmacy and health care organizations, and is a preceptor for numerous pharmacy students and visiting pharmacists. She is also the recipient of the CAPhO Distinguished Service Award, 3M Quality Award for Health Care, and a poster award winner from the International Society of Oncology Pharmacy Practitioners. In her spare time, Kim enjoys gardening, traveling, dancing, and playing the harp.

# Kimberley will be speaking in the following sessions:

- Hot Topic Cluster Discussions
- Clinical 3: Palliative Care
- Fundamental 6: Staffing and Career Planning

# Steve Stricker, Samford University McWhorter School of Pharmacy, USA

Steve Stricker is an Assistant Professor of Pharmacy Practice at the McWhorter School of Pharmacy at Samford University in Birmingham, Alabama, USA where he also practices as a clinical oncology specialist with Alabama Oncology. He completed his doctor of pharmacy degree at the University of Missouri – Kansas City, PGY-1 residency at the University of North Carolina and PGY-2 Hematology/Oncology residency at Emory Healthcare. Dr. Stricker currently serves as the Secretary of the International Society of Oncology Pharmacy Practitioners as well as holding leadership and advisory positions in other professional oncology organizations. He has lectured extensively throughout North America, Europe, Asia and Australia, has published multiple manuscripts and textbook chapters and was recently named the 2013 Hematology/ Oncology Pharmacy Association New Practitioner award recipient.

#### Steve will be speaking in the following sessions:

- Clinical 1: Hematologic Malignancy Update
- Hot Topic Cluster Discussions
- Research 7: Investigational Agent Update
- Closing Plenary Panel: Global Perspectives in Oral Anti-Neoplastic Agents

# Colleen Thurber, Saskatoon Cancer Centre, Canada

Colleen Thurber graduated with a Pharmacy Technician Certificate from SIAST in 1998 and started her career with the Royal University Hospital pharmacy department in Saskatoon, Saskatchewan the same year. She has worked as an oncology pharmacy technician at the Saskatoon Cancer Centre since 2004 and moved to a senior technician position in 2009. Colleen is also the co-chairperson of the Occupational Health and Safety Committee at the cancer centre. She is the Chair of the Education Committee on the CAPhO Executive.

#### Colleen will be speaking in the following session:

Hot Topic Cluster Discussions

# David U, Institute for Safe Medication Practices, Canada

David U is the president and chief executive officer of the Institute for Safe Medication Practices Canada (ISMP Canada). ISMP Canada is an independent Canadian not-for-profit organization established for the collection and analysis of medication error reports and the development of recommendations for the enhancement of patient safety. Since 2003, ISMP Canada has been a key partner of the Canadian Medication Incident Reporting and Prevention System which is supported by Health Canada.

David has a professional pharmacist background. He has held senior pharmacy management positions in different hospitals in more than 25 years. His interest is in medication safety, healthcare and information technologies in these years have provided David the expertise, passion and clear direction to be very much involved in medication safety. In late 1999, David, together with Michael Cohen of ISMP (US) founded ISMP Canada which has since initiated many medication safety projects across Canada. He has written numerous articles on medication safety in professional journals, newspapers, and ISMP Canada Safety bulletins. He is also an author of chapters on medication safety in two books. David has been speaking in many national and international conferences on medication safety.

Presently David U is a member of Board of Trustees of the Institute for Safe Medication Practice (ISMP) in the US; a member of the Ontario Chief Coroner's Patient Safety Review Committee; a member of the Interagency Collaboration Group (federal). In addition, David is a member of the executive committee of the International Medication Safety Network, a network of over 20 member countries involving in medication error centres, phamacovigilance centres and WHO.

#### David will be speaking in the following session:

Plenary: The Use of Oncology Medications: Its Challenges and Safe Practices

#### Johan Vandenbroucke, University Hospital Ghent, Belgium

Johan graduated as a pharmacist in 1979 from Ghent University, completing his Pharm D as a hospital pharmacist in 1981.

Since then he has worked in the Ghent University Hospital and became Senior Pharmacist for the Production Department in 2001.

Johan joined ISOPP in 1998 and has participated in every meeting since then (except the Washington congress) both as delegate and as speaker. He took the position as co-chair of the standards committee and became a Secretariat member, President Elect, President (2010-2012) and is the current Treasurer on the board of ISOPP.

#### Johan will be speaking in the following session:

• Hot Topic Cluster Discussions

# "Building Partnerships in Care"

# Rachel White, HumanEra @ University Health Network, Canada

Rachel is passionate about making healthcare safer for patients by making environments, processes and technologies more intuitive for clinicians. She has a keen interest in integrating human factors principles into medication safety initiatives, especially those relating to chemotherapy. She has led chemotherapy-focussed research projects on: independent double-checking processes; computerized prescriber order entry systems; bar-coded medication administration systems; closed system transfer devices; and pharmacy production processes. Through her research she has gained a strong understanding and respect for the role that clinicians, especially pharmacists, play in patient safety.

#### Rachel will be speaking in the following sessions:

- Plenary: Human Factors 201: Human Error in Complex Dynamic Systems
- Fundamental 4: Checking Chemotherapy Best Practice

# John Wiernikowski, McMaster Children's Hospital, Canada

John obtained his pharmacy degree from the University of Toronto (1985) and PharmD from the State University of New York at Buffalo (1987). He started working in Paediatric Haematology/Oncology at McMaster University in 1987 and is a Clinical Assistant Professor of Paediatrics in the DeGroote School of Medicine. John's interests are focused primarily on infection management; musculoskeletal morbidity; and thrombotic complications of cancer treatment in children. He also has a keen interest in International Health particularly in developing countries. In 1995 he was an ICRETT Fellow of the International Union against Cancer (UICC) and traveled to South America as part of a multi-disciplinary health care team examining health care resources for children with cancer. As part of that initiative; and through his ongoing involvement with the Pediatric Oncology in Developing Countries (PODC) committee of SIOP; John has established numerous links with pharmacists and other health professionals in developing nations and has an ongoing interest in establishing educational and training programs for Oncology Pharmacists in these parts of the world. John Co-Chairs the Canadian C17 International Development Committee and is presently working on a SIOP PODC Committee Task Force on access to oncology and supportive care drugs for children in low-income countries.

John is a full member of the Children's Oncology Group (COG) and is actively involved with the research initiatives of the Neuroblastoma and Cancer Control Committees.

John has been involved with the Pediatric Oncology Group of Ontario (POGO) since 1987 and serves on the Steering Committee of the POGO Research Unit; and is Co-Chair of the Provincial Paediatric Systemic Therapy Committee.

For his contributions to the International Society of Oncology Pharmacy Practitioners (ISOPP) and Oncology Pharmacy throughout his career; John was awarded Fellow status in ISOPP in 2008; and is the current President of ISOPP.

#### John will be speaking in the following sessions:

- Hot Topic Cluster Discussions
- Research 4: New Trends for Patient Participation in Research
- Clinical 6: Pediatric, Adolescent and Young Adult Update

# "Building Partnerships in Care"

# Felicity Wright, Kids Cancer Centre, Sydney Children's Hospitals Network, Australia

Felicity is a specialist clinical pharmacist in paediatric oncology and haematology and is currently employed at the Kids Cancer Centre at the Sydney Children's Hospital Network in Australia.

Felicity earned her bachelors degree from Sydney University in 2001 and has trained in oncology pharmacy in both adult and paediatrics in Australia and the United Kingdom. Currently Felicity holds a paediatric haematology oncology subspecialty position with responsibilities for cord and marrow transplant patients as well as use of early phase and investigational agents in the paediatric setting.

Her research interests include therapeutic drug monitoring in stem cell transplant patients, optimising antifungal therapies in paediatric patients, applied usage of pharmacogenomics and advancing the role of the pharmacist in the translational medicine field.

Felicity completed her Masters in public health policy in 2009. In 2012 she earned her board certification in oncology from the board of pharmaceutical specialities.

Felicity is a current International Society of Oncology Pharmacy Practitioners (ISOPP) secretariat member.

### Felicity will be speaking in the following session:

- Hot Topic Cluster Discussions
- Research 4: New Trends for Patient Participation in Research



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#### Oualité

recherche.

Prestation de services de pharmacie oncologique sécuritaires et efficaces aux patients d'un bout à l'autre du Canada.

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CAPhO
Conference 2015

May 21 – 24, 2015 Delta St. John's Hotel and Conference Centre St. John's, Newfoundland



# Considerations for safe handling of monoclonal antibodies (mAbs)

April 7<sup>th</sup> 5:30-7:00pm – Mt. Sinai Hospital, Toronto April 9<sup>th</sup> 11:30am-1:00pm and 2:00-3:30pm – Edmonton (location TBD)

RSVP to ruby\_calpito@baxter.com by April 3rd for Toronto and by April 7th for Edmonton.

# **Program Objectives**

Educate pharmacists and pharmacy managers/directors regarding:

- Background information of mAbs (chemistry, mechanism of action)
- Hazardous properties
- · Occupational risk assessment
- Exposure to cytotoxic compounds
- Stability and methods of preparation

# **Speaker**



# DR. KRAEMER Current Status, Position:

Currently employed as the Director of the Pharmacy Department at the Medical Center of Johannes Gutenberg-University Hospital in Mainz, as well as Professor for clinical pharmacy at the Pharmacy School of Johannes Gutenberg-University.

#### **Education:**

Dr. Kraemer completed her postdoctoral thesis in Pharmaceutical Technology focusing on "Development, quality assurance, and optimization of ready-to-

use parenteral solutions in the integrated cancer care concept."

### Research Area:

Her special interests include oncology pharmacy, cancer care, infectious diseases, and aseptic drug preparation. She is working on research projects in the field of Physicochemical and microbiological stability of cytotoxic drugs, Compatibility of admixtures of nebulizer solutions, Clinical and social outcome of clinical pharmacy services, and Electronic Monitoring of medication compliance.









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