DNSG 2015
33rd International Symposium on Diabetes & Nutrition
June 9 to 12, 2015 - Toronto

Dietary patterns and food based approaches in diabetes

Diabetes and Nutrition Study Group (DNSG) of the European Association for the Study of Diabetes (EASD)
Table of Contents

Welcome to Toronto 3

Conference Program
   Wednesday, June 10 4 - 5
   Thursday, June 11 6 - 7
   Friday, June 12 8 - 11

Conference Events 12

Accreditation 13

Notes 14

Sponsors 15 - 16

Conference Organization

Organizing Committee
Dr. John L Sievenpiper, MD, PhD, FRCPC
Dr. Cyril Kendall, PhD

Scientific Committee
Dr. John L Sievenpiper, MD, PhD, FRCPC
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Exhibitors
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Canadian Diabetes Association
Canadian Sugar Institute
Dairy Farmers of Canada
Hass Avocado Board
Loblaw Co. Ltd.
SunMaid

Conference Coordinator
Ms. Doreen Ostrowski
Email: Doreen.isdn@bell.net

Website
http://www.dnsq2015.ca/
Welcome to Toronto

We are delighted you are joining us for the 33rd International Symposium on Diabetes and Nutrition, hosted in Toronto from June 9 to 12, 2015.

The symposium represents the annual meeting of the Diabetes and Nutrition Study Group (DNSG) of the European Association for the study of Diabetes (EASD). It will bring together international scientists, physicians, and dietitians to showcase the latest advances from basic science to clinical trials in diabetes and nutrition through plenary lectures, panel discussions, and oral and poster abstract presentations.

The theme of this year’s scientific program will be

“Dietary patterns and food based approaches in diabetes”.

We welcome you to Toronto.

Sincerely,

Dr. John L Sievenpiper, MD, PhD, FRCPC

Co-chair, 33rd ISDN

Dr. Cyril WC Kendall, PhD

Co-chair, 33rd ISDN
Wednesday June 10th

**8:00-8:30**
**Conference Opening Ceremony**

**8:30-10:10**
**Traditional Diets in Diabetes**

Chairs: Ursula Schwab (Finland), Gabriele Riccardi (Italy)

- **8:30-8:50** The Mediterranean diet in diabetes (Jordi Salas-Salvadó, Spain)
- **8:50-9:10** The Nordic diet in diabetes (Ulf Risérus, Sweden)
- **9:10-9:30** Vegetarian diets in diabetes (Neal Barnard, USA)
- **9:30-9:40** Oral Abstract 1 - African Heritage Diet Pyramid (Sara Baer-Sinnott, USA)
- **9:40-9:50** Oral Abstract 2 - The effect of a vegetarian vs. conventional hypocaloric diet on serum concentrations of persistent organic pollutants in patients with type 2 diabetes (Hana Kahleová, Czech Republic)
- **9:50-10:10** Panel Discussion (Jordi Salas-Salvadó, Ulf Risérus, Neal Barnard, Sara Baer-Sinnott, Hana Kahleová)

**10:10-10:40**
**Coffee Break & Posters (abstracts of clinical interventions #1-7)**

**10:40-12:30**
**Other Dietary Patterns in Diabetes**

Chairs: Hana Kahleová (Czech Republic), Ulf Risérus (Sweden)

- **10:40-11:00** Dietary patterns rich in healthy oils in diabetes (Ursula Schwab, Finland)
- **11:00-11:20** Dietary patterns rich in dairy in diabetes prevention (Anthony Hanley, Canada)
- **11:20-11:40** Meal replacements in diabetes (Osama Hamdy, USA)
- **11:40-12:00** High-carbohydrate vs. low-carbohydrate diets in diabetes: effect on metabolic control (Livio Luzi, Italy)
- **12:00-12:10** Oral Abstract 3 – Tree nuts improve glycemic control in all-comers: A systematic review and meta-analysis of randomized controlled trials (Effie Viguiliouk, Canada)
- **12:10-12:30** Panel Discussion (Ursula Schwab, Anthony Hanley, Osama Hamdy, Livio Luzi, Effie Viguiliouk)
LUNCH BREAK

13:30-15:30

NUTS IN DIABETES

Chairs: Anne-Marie Aas (Norway), Cyril Kendall (Canada)

13:30-13:50 Tree nuts and cardiovascular mortality (Ying Bao, USA)
13:50-14:10 Tree nuts as part of a Mediterranean diet in diabetes (Mònica Bulló, Spain)
14:10-14:30 Tree nuts in the management of obesity, diabetes, and cardiometabolic risk (Joan Sabaté, USA)
14:30-14:50 Tree nuts and cardiovascular risk factors in diabetes (Sheila West/Katherine Sauder, USA)
14:50-15:00 Oral Abstract 4 - Almonds improve glycemic control in Chinese patients with type 2 diabetes mellitus (Oliver Chen, USA)
15:00-15:10 Oral Abstract 5 - Guidelines and nut consumption in Norway (Lars Johansson, Norway)
15:10-15:30 Panel discussion (Ying Bao, Mònica Bulló, Joan Sabaté, Sheila West/Katherine Sauder, Oliver Chen, Lars Johansson)

15:30-16:00

COFFEE BREAK & POSTERS (abstracts of epidemiology #8-14)

16:00-17:30

EXERCISE IS MEDICINE IN DIABETES

Chairs: Kirsti Bjerkan (Norway), Thomas Wolever (Canada)

16:00-16:20 Cardiorespiratory fitness and diabetes: A review of the epidemiology (Steven Blair, USA)
16:20-16:40 Optimal exercise prescription for type 2 diabetes mellitus (Timothy Church, USA)
16:40-17:00 Fitness is more important than fatness in diabetes (Carl “Chip” Lavie, USA)
17:00-17:10 Oral Abstract 6 - High intensity interval training improves glycaemic control and pancreatic β cell function of type 2 diabetes patients (Per Bendix Jeppesen, Denmark)
17:10-17:30 Panel discussion (Steven Blair, Tim Church, Carl “Chip” Lavie, Per Bendix Jeppesen)

18:00-21:00

EVENING EVENT

The Insulin Trail 90 years later (a walking tour and dinner talk at the University of Toronto by Prof. Michael Bliss, author of "The Discovery of Insulin")
Thursday June 11th

8:15-09:45

**REDUCING THE RISK OF TYPE 2 DIABETES: IMPROVED CARBOHYDRATE METABOLISM WITH RESISTANT STARCH**

**Chairs:** Fred Brouns (the Netherlands), Per Bendix Jeppesen (Denmark)

- 8:15-8:35: Review of mechanisms – Findings from Animal Models (Michael Keenan, USA)
- 8:35-8:55: Clinical evidence – Findings from human trials (Denise Robertson, United Kingdom)
- 8:55-9:10: Oral Abstract 7 – Responders and non-responders – Baseline metabolic condition affects response to resistant starch (Barbara Gower, USA)
- 9:10-9:25: Oral Abstract 8 – Linking microbial consumption of resistant starch to functional outcomes (Maria Marco, USA)
- 9:25-09:45: Panel Discussion (Michael Keenan, Denise Robertson, Barbara Gower, Maria Marco)

09:45-10:15

**COFFEE BREAK & POSTERS (abstracts of basic science #22-25)**

10:15-12:15

**CANADIAN DIABETES ASSOCIATION SESSION ON GLYCEMIC RESPONSE/INDEX/LOAD IN DIABETES**

**Chairs:** Jennie Brand-Miller (Australia), David Jenkins (Canada)

- 10:15-10:20: Opening Remarks (David Jenkins, Canada)
- 10:20-10:35: Glycemic response/index/load for weight management (Wim Saris, Netherlands)
- 10:35-10:50: Nutritional strategies to modifying glycemic response for diabetes and cardiovascular risk prevention (Simin Liu, USA)
- 10:50-11:05: Glycemic response/index/load: Methodological issues (Thomas Wolever, Canada)
- 11:05-11:20: Glycemic index labeling: The Australian Experience (Alan Barclay, Australia)
- 11:20-11:35: Regulation of glycemic response/index/load: European Food Safety Authority’s perspective (Silvia Valtueña Martínez, Italy)
- 11:35-12:05: Regulation of glycemic response/index/load claims: Health Canada’s perspective (Alfred Aziz, Canada)
- 11:50-11:55: Closing remarks (Jennie Brand-Miller)
**LUNCH BREAK**

**SWEETENERS IN DIABETES**

Chairs: Anastasia Thanopoulou (Greece), Andreas Pfeiffer (Germany)

- 13:15-13:35 Safety and metabolic effects of low-calorie sweeteners (Berna Magnuson, Canada)
- 13:35-13:55 Low calorie/no calorie sweetener in diabetes (John Peters, USA)
- 13:55-14:15 Fruit juice: impact on nutrient quality, obesity and diabetes (Fred Brouns, Netherlands)
- 14:15-14:35 Fructose in diabetes: friend or foe? (Luc Tappy, Switzerland)
- 14:35-14:45 Oral Abstract 9 - Raisin Intake, Glycemic Control and other Cardiovascular Risk factors in Type 2 Diabetes Mellitus (James Painter, USA)
- 14:45-14:55 Oral Abstract 10 - Systematic Review and Meta-Analysis of Artificially-Sweetened Beverages and Type 2 Diabetes (Douglas Weed, USA)
- 14:55-15:15 Panel discussion (Berna Magnuson, John Peters, Fred Brouns, Luc Tappy, James Painter, Douglas Weed)

**COFFEE BREAK & POSTERS (abstracts of clinical interventions #1-7)**

**ILSI NORTH AMERICA SESSION ON CARBOHYDRATE QUALITY: TOWARDS HARMONIZATION**

Chairs: John Sievenpiper (Canada), Cyril Kendall (Canada)

- 15:15-16:05 GI as a marker of carbohydrate quality (Jennie Brand-Miller, Australia)
- 16:05-16:25 Dietary fibre as a marker of carbohydrate quality (Jim Mann/Andrew Reynolds, New Zealand)
- 16:25-16:45 Whole grains as a marker of carbohydrate quality (Gabriele Riccardi, Italy)
- 16:45-17:05 In vitro digestibility of carbohydrates as a marker of carbohydrate quality (Furio Brighenti, Italy)
- 17:05-17:30 Panel discussion to find common ground (Jennie Brand-Miller, Jim Mann/Andrew Reynolds, Gabriele Riccardi, Furio Brighenti, Dan Ramdath)

**EVENING EVENT**

Tour of the Hockey Hall of Fame and dinner at La Bettola Di Terroni
Friday June 12th

8:30-10:00

**PREBIOTICS AND NOVEL CARBOHYDRATE INGREDIENTS IN DIABETES**

Chairs: Angela Rivellese (Italy), Dario Rahelic (Croatia)

8:30-8:50

Slowly and rapidly absorbed carbohydrates on postprandial metabolism in type 2 diabetes

(Thomas Linn, Germany)

8:50-9:10

Metabolic benefits of prebiotic fibre intake (Raylene Reimer, Canada)

9:10-9:30

Achieving low glycaemic response diets within food-based approaches to healthy eating

(Geoffrey Livesey, United Kingdom)

9:30-9:40

Oral Abstract 11 - Lowering Glucose and Insulin Responses to a Starchy Staple: From Formulation to Flux (David Mela, Netherlands)

9:40-10:00

Panel Discussion (Thomas Linn, Raylene Reimer, Geoffrey Livesey, David Mela)

10:00-10:30

**COFFEE BREAK & POSTERS (abstracts of epidemiology #15-21)**

10:30-11:00

**HEALTH ECONOMIC IMPACT OF INCREASED DIETARY FIBRE INTAKE: A CANADIAN EXAMPLE (Jared Carlberg, Canada)**

Chair: Livia Augustin (Canada), Vladimir Vuksan (Canada)

11:00-12:40

**INTENSIVE LIFESTYLE INTERVENTION (ILI) PROGRAMS IN DIABETES**

Chairs: David Jenkins (Canada), John Sievenpiper (Canada), Cyril Kendall (Canada)

11:00-11:20

Why do we Need Large, Pragmatic Randomized Outcomes Trials of Nutritional Interventions?

(Hertzel Gerstein, Canada)

11:20-11:40

Lessons learned from the LookAHEAD Trial (Edward Horton, USA)

11:40-12:00

A Mediterranean intensive lifestyle intervention: Predimed Plus (Jordi Salas-Salvadó, Spain)

12:00-12:20

Panel discussion (Hertzel Gerstein, Edward Horton, Jordi Salas-Salvadó)

12:20-13:20

**LUNCH BREAK**
13:20-14:20  INTERNATIONAL LIFESTYLE PORTFOLIO TRIAL PLANNING DISCUSSION
Chairs: John Sievenpiper (Canada), Cyril Kendall (Canada)
13:20-13:35  The "Lifestyle Portfolio Trial" rationale and design (David Jenkins, Canada)
13:35-14:20  Panel discussion (David Jenkins, Hertzel Gerstein, Michael Farkouh, Edward Horton, Jared Carlberg)

14:20-14:40  GUIDELINES UPDATES
Chairs: Rosalba Giacco (Italy), Lars Johansson (Norway)
14:20-14:30  International Carbohydrate Quality Consortium (ICQC) update (Livia Augustin, Canada)
14:30-14:40  DNSG Dietary guidelines update (Andreas Pfeiffer, Germany)

14:40-15:10  COFFEE BREAK & POSTERS (abstracts of basic science #22-25)

15:10-16:40  SHORT ORAL ABSTRACT PRESENTATIONS
Chairs: Ingunn Bergstad (Norway), Ingrid Mostad (Norway)
Abstracts of clinical interventions
15:10-15:16  Short Oral Abstract 1 - Diets naturally-rich in different polyphenols improve glucose metabolism: is the effect related to specific subclasses? (Claudia Vetrani, Italy)
15:16-15:22  Short Oral Abstract 2 - The Effect of α-linolenic Acid and Fish on Glucose Metabolism, Serum Lipid Profile and Low-grade Inflammation in Subjects with Impaired Glucose Metabolism (Maria Lankinen, Finland)
15:22-15:28  Short Oral Abstract 3 - A High-Protein Diet Reduces Liver Fat Content and Improves Glomerular Filtration Rate in Subjects with Type 2 Diabetes (Mariya Markova, Germany)
15:34-15:40  Short Oral Abstract 5 - The Effect of Glycemic Index and Glycemic Load on Liver Enzyme Activity (Laura Chiavaroli, Canada)
Abstracts of systematic reviews and meta-analyses

Short Oral Abstract 6 - Regular Participation in the phases of an Intervention Program and the Beneficial Effects on the Daily Dietary Habits of Participants-The PERSEAS study (Charilaos Dimosthenopoulos, Greece)

Short Oral Abstract 7 - Low-Carbohydrate Diets in the Management of Type 2 Diabetes – A Systematic Review and Meta-Analysis (Henny-Kristine Korsmo-Haugen, Norway)

Short Oral Abstract 8 - Fructose Containing Sugars-Sweetened Beverages and Their Contribution to Body Weight: a Systematic Review and Meta-Analysis of Controlled Feeding Trials (Vivian L. Choo, Canada)

Short Oral Abstract 9 - Effect of oat β-glucan on markers of lipid control: a systematic review and meta-analysis (Thanh Ho, Canada)

Short Oral Abstract 10 - The Effects of Maternal Diet on Glycemic Control: A Systematic Review and Network Meta-Analysis (Vanessa Ha, Canada)

Abstracts of epidemiology

Short Oral Abstract 11 - Cross-Sectional Associations of Plasma Fatty Acid Composition with Plasma Concentration of Leptin in Finnish Children (Taisa M Venäläinen, Finland)

Short Oral Abstract 12 - Comparison of Glycemic Outcome and Relation to Changes in Liver Fat Content in Low-carb vs. Low-fat Dietary Regimes for Prediabetic Subjects (Stefan Kabisch, Germany)

Short Oral Abstract 13 - The Effects of Dietary Glycemic Load on Plasma Proteomic Biomarkers (Joseph Jamnik, Canada)

Short Oral Abstract 14 - Serum Non-Esterified Fatty Acid (NEFA) Concentrations are Associated with Longitudinal Progression of β-Cell Dysfunction: Prospective Metabolism and Islet Cell Evaluation (PROMISE) Cohort (Luke W. Johnston, Canada)

Short Oral Abstract 15 – Increase in angiotensin converting enzyme in response to a high fat diet (Rita Schüler, Germany)
PRESENTATION OF THE 34th INTERNATIONAL SYMPOSIUM ON DIABETES AND NUTRITION

Chairs: Anette Buyken (Germany), Velimir Bozokof (Croatia)

16:40-16:50  
34th ISDN: An Invitation to Prague, Czech Republic, June 29th to July 1st, 2016 (Hana Kahleová, Czech Republic)

16:50-17:00  
CLOSE OF THE SYMPOSIUM

17:00-18:00  
GENERAL ASSEMBLY OF MEMBERS

Chair: Ulf Risérus (Sweden)

18:45-23:00  
GALA DINNER & AWARDS

An evening at the Royal Conservatory of Music
Conference Events

TUESDAY, JUNE 9TH
Welcome Reception under the stars
18:00 to 20:00 SkyLounge Patio, Intercontinental hotel
Unpack your bags and join fellow delegates on the SkyLounge patio at the Intercontinental Toronto Yorkville hotel, main floor, for cocktails and hors d’oeuvres.

WEDNESDAY, JUNE 10TH
Hart House, University of Toronto - The Insulin Trail; 90 years later
18:00 Meet in the hotel lobby for an informative walking tour of the University of Toronto campus, visiting some of the highlights of the history of insulin. The tour will deliver you to Hart House at 19:00 in time for cocktails. Advance sign-up for the tour is required as space is limited.
18:30 If you are not joining the tour, meet in the hotel lobby for the short walk to Hart House.
18:45 Cocktails in the Hart House quad
19:30 Dinner in Hart House Great Hall
20:30 Talk by Prof. Michael Bliss, author of “The Discovery of Insulin”
22:00 Evening ends

THURSDAY, JUNE 11TH
Visit to the Hockey Hall of Fame & Dinner at La Bettola Di Terroni
Canadians consider hockey their national sport. Visit the Hockey Hall of Fame, where you can join a tour, go one-on-one against goalies and shooters, call the play-by-play of some of hockey’s greatest goals; take your photo with the Stanley Cup, and explore the largest collection of hockey memorabilia in the world.

18:15 Meet in the hotel lobby for your coach transfer to the Hockey Hall of Fame
19:30 Take a short walk to La Bettola Di Terroni Ristorante
20:15 Enjoy traditional southern Italian fare and fine wines
22:30 Return to the hotel

FRIDAY, JUNE 12TH
Gala Dinner, “A night at the Royal Conservatory of Music”
The unique and stylish Royal Conservatory of Music will provide an elegant background for the final conference dinner. The modern architecture and floor to ceiling windows offer treetop views of the University of Toronto campus. Enjoy a performance by our First Nations Dancers and entertainment by RCM musicians. The RCM is located directly across from the Intercontinental Toronto Yorkville Hotel.

18:45 Meet in the hotel lobby for the short walk to the Royal Conservatory of Music
19:00 Cocktail reception
20:00 Dinner in the Galleria
21:30 Awards presentations
23:00 Evening ends

Note: Tickets are required for evening events.
ACCREDITATION

The “33rd International Symposium on Diabetes and Nutrition” has been designated by the Continuing Professional Development, Faculty of Medicine, University of Toronto as a U of T Accredited event and awarded with the following credits:

**College of Family Physicians of Canada – Mainpro-M1:**
This program meets the accreditation criteria of The College of Family Physicians of Canada and has been accredited by Continuing Professional Development, Faculty of Medicine, University of Toronto, for up to **20.5 Mainpro-M1 credits**.

**Royal College of Physicians and Surgeons of Canada – Section 1:**
This event is an Accredited Group Learning Activity (Section 1) as defined by the Maintenance of Certification Program of the Royal College of Physicians and Surgeons of Canada, approved by Continuing Professional Development, Faculty of Medicine, University of Toronto, up to a maximum of **20.5 Section 1 credits**.

**The American Medical Association - AMA PRA Category 1 Credit™:**
Through an agreement between the Royal College of Physicians and Surgeons of Canada and the American Medical Association, physicians may convert Royal College MOC credits to AMA PRA Category 1 Credits™. Information on the process to convert Royal College MOC credit to AMA credit can be found at www.ama-assn.org/go/internationalcme. As a result, this event has been approved for up to **20.5 Category 1 credits**.

**European Union for Medical Specialists (EUMS) ECMEC credit designation statement:**
Live educational activities, occurring in Canada, recognized by the Royal College of Physicians and Surgeons of Canada as Accredited Group Learning Activities (Section 1) are deemed by the European Union of Medical Specialists (UEMS) eligible for ECMEC®. As a result, this event has been approved for up to **20.5 ECMEC credits**.

Each participant should claim only those hours of credit that he/she actually spent participating in the educational program.

If you would like a credit certificate please contact Sonia Blanco Mejia at sonia.blancomejia@mail.utoronto.ca following the conference.
**Sponsors**

The organizers are grateful for unrestricted educational grants provided by: