

2022 CSHP NATIONAL AWARDS PROGRAM WINNERS / PROGRAMME NATIONAL DES PRIX 2022 DE LA SCPH : LAURÉATS ET LAURÉATES

The winner of the **Distinguished Service Award** (sponsored by Pharmascience Inc.) is **Glen J Pearson** (Edmonton, AB).

The winner of the **Hospital Pharmacy Student Award** (co-sponsored by the Canadian Society of Hospital Pharmacists [CSHP] and the Canadian Association of Pharmacy Students and Interns [CAPSI]) is **Christine S Vaccaro** (Winnipeg, MB).

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Excellence in Pharmacy Practice — Interprofessional Collaboration Award

Sponsored by **Teva Canada Limited**

Outcomes of Administering Cefazolin vs. Other Antibiotics in Penicillin-Allergic Patients for Surgical Prophylaxis at a Major Canadian Teaching Hospital (completed at Vancouver General Hospital, Vancouver, BC)

Nilufar Partovi, Tim TY Lau

Excellence in Pharmacy Practice — Leadership Award

Sponsored by **HealthPRO Procurement Services Inc.**

The Pharmacist's Role in the Hemophilia Clinic (completed at Children's Hospital of Eastern Ontario and Canadian Blood Services, Ottawa, ON)

Nisha Varughese, Sylvain Grenier, Sarah Jennings, Régis Vaillancourt

Excellence in Pharmacy Practice — Patient Care Award

Sponsored by **SteriMax Inc.**

Medication Assessment Centre Interprofessional Opioid Pain Service (MAC iOPS): A Novel Approach to Chronic Pain Management (completed at the University of Saskatchewan, Saskatoon, SK)

Katelyn Halpape, Derek Jorgenson, Eric Landry, Taylor Raiche, Amy Wiebe

The award-winning abstracts are published exactly as submitted by the authors and have not undergone any copyediting by the Canadian Journal of Hospital Pharmacy. Le Journal canadien de la pharmacie hospitalière n'a pas soumis les résumés primés à une révision linguistique et les publie ici tels que remis par les auteurs.

Outcomes of Administering Cefazolin vs Other Antibiotics in Penicillin-Allergic Patients for Surgical Prophylaxis at a Major Canadian Teaching Hospital

*Excellence in Pharmacy Practice — Interprofessional Collaboration Award
Sponsored by Teva Canada Limited*

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Background: Cefazolin surgical prophylaxis is associated with better patient outcomes, however, its use in penicillin-allergic patients is controversial. We evaluated safety and efficacy of cefazolin as surgical prophylaxis in penicillin-allergic patients, including those with anaphylaxis histories.

Patients and Methods: We conducted a pre- and post-intervention quality improvement evaluation of an institution-wide policy change at a tertiary-care hospital, before (October 2017–January 2018), during (February 2018–September 2018) and after (October 2018–October 2019) transition to routine cefazolin prophylaxis for penicillin-allergic patients, including those with anaphylaxis histories but excluding severe delayed reactions (e.g., Stevens-Johnson syndrome). Retrospective data was collected on all surgical prophylaxis patients with penicillin-anaphylactic histories between October 2017–September 2018. From October 2018, we prospectively reviewed adverse events with cefazolin. Primary outcome was adverse events in penicillin-allergic patients receiving cefazolin peri-operatively.

Results: From October 2017–October 2019, 27,467 surgeries were performed. Of 220 patients with penicillin-anaphylactic histories reviewed prior to full-policy change, no statistically significant differences were reported in allergic reactions ($P=0.70$), surgical site infections ($P=1.00$), or adverse events ($P=0.32$) with cefazolin compared to other antibiotics. Post-policy implementation, cefazolin usage increased 18.2%, while vancomycin and clindamycin decreased by 11.4% and 62.0%, respectively. No anaphylaxis was documented in penicillin-allergic patients receiving cefazolin in either the review or quality assurance follow-up after the change. Of 3 patients developing reactions to cefazolin, none had histories of penicillin allergy. Surgical site infection rates were similar between pre- and post-policy time-periods ($P=0.842$).

Conclusions: Administration of cefazolin in penicillin-anaphylactic patients for surgical prophylaxis appears to be safe and effective.

The Pharmacist's Role in the Hemophilia Clinic

Excellence in Pharmacy Practice — Leadership Award
Sponsored by HealthPRO Procurement Services Inc.

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Background: Hospital pharmacists have traditionally not been involved with hospital blood banks or hemophilia clinics. However, coagulation factors used in the treatment of hemophilia follow complicated pharmacokinetic (pK) trajectories with tremendous inter-individual variation, and the optimal use of these products involves systematically assessing and interpreting the pK profiles of all patients. This makes hemophilia care an ideal therapeutic area for pharmacist involvement. Canadian Blood Services manages a national formulary of about 50 plasma protein and related products (PPRP) on behalf of provincial and territorial governments (excluding Quebec).

Objective: As formulary manager, Canadian Blood Services recognized an opportunity for substantial savings without compromising patient care. A pharmacist could individualize doses and regimens and switching to lower cost products when clinically appropriate.

Methods: Canadian Blood Services partnered with the Children's Hospital of Eastern Ontario (CHEO) on an innovative project integrating a pharmacist into the Hemophilia Treatment Centre (HTC). The pharmacist attended clinics, educated staff and patients, developed policies, and conducted pK evaluations.

Results: In less than one year, pharmacist interventions reduced annual treatment costs for 15 patients by \$355,000. In a preliminary analysis, 1 patient had no change in bleeding events and 14 patients had fewer bleeds.

Conclusions: The results of this innovative project show promise for a new practice area for pharmacists.

Keywords: hemophilia, pharmacokinetics, pharmacists, pharmaceutical services, drug cost, formulary management

Medication Assessment Centre Interprofessional Opioid Pain Service (MAC iOPS): A Novel Approach to Chronic Pain Management

Excellence in Pharmacy Practice — Patient Care Award
Sponsored by SteriMax Inc.

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Background: One in five Canadians experience chronic pain. Saskatchewan residents have limited access to interdisciplinary chronic pain management. The Medication Assessment Centre Interprofessional Opioid Pain Service (MAC iOPS) was created to fill this gap.

Objectives: To develop, implement, and evaluate an interdisciplinary, pharmacist-led, chronic pain clinic.

Methods: The program development and implementation included securing funding, hiring health professionals, creating a care model, and patient recruitment. Initial program evaluation includes:

- 1) retrospective chart audit
- 2) survey of patients and their healthcare professionals.

Results: The MAC iOPS was established, with federal funding, as an interdisciplinary chronic pain service in March 2020. The team includes four pharmacists, one chronic pain physician, one physical therapist, and two social workers. MAC iOPS is available to all Saskatchewan residents and services are delivered virtually or in-person. The MAC iOPS differs from traditional interdisciplinary teams in that pharmacists lead the team. The MAC iOPS does not prescribe but works with the patient's existing prescriber to implement treatment plans. Chart audit results (n=79) found reductions in mean daily morphine equivalents of 37 mg and improved Brief Pain Inventory scores of 1.3 points. Eleven patients were provided take home naloxone kits. Patient surveys (n=17) indicated that 65% of patients had improved overall health status and 94% were satisfied with their care. The health professional surveys (n=16) revealed that 100% would recommend MAC iOPS to colleagues and 69% were more confident managing chronic pain after working with MAC iOPS.

Conclusions: The MAC iOPS has improved access to interdisciplinary chronic pain management in Saskatchewan, resulting in improved overall self-reported health status of chronic pain patients, reduced opioid intake, and expanded access to take home naloxone. The service has been well received by patients and health professionals.

Keywords: interprofessional team, chronic pain, opioids

Declarations: Katelyn Halpape and Derek Jorgenson received funding from Health Canada Substance Use and Addictions Program, Indigenous Services Canada, Saskatchewan Health, and for the MAC iOPS.

Encore Presentation