Innovating the Delivery of Infusion Therapy Education
Michelle DaGloria RN, BScN, CVAA (c), VA-BC Baxter Canada

Introduction
Maintaining competency and mastering new skills are two challenges that are present for novice and experienced nurses. Increasing workloads and patient care demands often make it difficult for nurses to participate in on-site learning opportunities at prescribed times using conventional methods. To understand and appreciate the challenges and define the need for additional resources for infusion therapy and vascular access education we developed and administered a voluntary survey of clinicians in attendance during the 2014 Canadian Vascular Access Association’s (CVAA) national conference. Attendees were given the opportunity to complete the survey during exhibitor hours.

Our goal was to develop and deliver a non-biased, evidence informed content to frontline nurses utilizing digital media. Content was developed following a review of current literature and accepted standards of practice. Themes emerged, leading to the development of five distinct modules of information, and a series of 12 technique videos with steps outlining the proper use of infusion equipment. Each module was filmed and graphics developed to enhance the audience experience.

This program was designed with the clinician in mind – content is available 24/7, accessible from any connected device, each module is less than 30 minutes in total length with chapter viewing times ranging from 2-12 minutes, online registration process, and the option to refer a colleague. Modules are released on a six week schedule initially as an interactive webinar and then via a secured website available to everyone who has registered for the program. Once released and online, modules can be viewed by individual chapters at any time when it is convenient to the clinician.

We continue to seek feedback from participants and will utilize this information to develop future content for subsequent modules. We continue to strive to develop a program to improve vascular access practices and patient outcomes, strengthen clinician’s knowledge and expertise in IV therapy, and provide flexible access to evidence based practices.

Demographic Questions
Demographic information obtained included province of practice, type of healthcare organization, number of years of experience, and area of specialty (IV Team, Management, Educator, RN or RPN/LPN). Clinicians from the following provinces completed the survey: British Colombia, Manitoba, Ontario, Quebec, Nova Scotia and Prince Edward Island – the majority of the respondents were from Ontario. Facility types included acute hospital care (teaching hospitals and community hospitals), community care, and other (location not specified). Novice to experienced nurses responded with years of experience reported ranging from <5 to >20. Areas of practice were reported as IV Team or PICC Nurse (23%), Management (15%), Educator (15%), and RN or RPN/LPN (45%).

Education Questions
A five point Likert scale was used to indicate the level of agreement or disagreement with the following questions: a need for greater education on vascular access therapy, and satisfaction with current resources available. The results from this survey indicated 98% of all respondents indicated there was a need for improved access to additional educational resources, with only 26% satisfied with current resources available. Dissatisfaction with current resource availability can be further broken down by area of specialty using the demographic information provided: 86% of IV Team and PICC Nurses, 50% of Management, 100% of Educators, and 62% of RN and RPN/LPN.

A list of topics related to infusion therapy and vascular access were listed, and respondents were asked to select topics of interest or those in which additional educational resources are required to support clinical practices. The top five topics included: infection control, clinical applications, basics of infusion therapy, fluid and electrolytes, and parenteral nutrition. This list was utilized to guide the development of the education program. Engaging with leaders in vascular access we endeavored to design and develop an educational program that would begin to fill this gap.

IV Therapy Made Simple
IV Therapy Made Simple has been developed and designed with the clinician in mind following the principles of adult learning as described by Malcolm Knowles: self-directed, incorporating life experiences and knowledge, relevant to clinical practice, practical, and respectful of prior of experiences and time. The program consists of five educational modules and twelve technique videos. Each module is approximately 30 minutes in length with individual chapters ranging from 2-10 minutes long. Modules are released on a six week schedule initially as an interactive webinar and then via a secured website available to everyone who has registered for the program. Once released and online, modules can be viewed by individual chapters at any time when it is convenient to the clinician. The modules include: An Introduction to IV Therapy, Vascular Access Devices, Care and Maintenance of Central Vascular Access Devices, Vascular Access Device Complications, and Infusion Equipment. Technique videos demonstrate the proper use of various components required for infusion therapy explaining step by step procedures for several products.

Conclusion
The first module for IV Therapy Made Simple was officially released on June 24, 2015 with subsequent modules scheduled for release every six weeks. Registration for the program continues to grow, with initial feedback and evaluations received indicating this is a program that will assist to meet the needs of clinical staff in a variety of clinical settings and environments.

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This program was designed with the clinician in mind – content is available 24/7, accessible from any connected device, each module is less than 30 minutes in total length with chapter viewing times ranging from 3-12 minutes, online registration process, and the option to refer a colleague. Modules are released on a six week schedule initially as a webinar with facilitated interactive question and answer during the completion of the video. Following the webinar each module is available for viewing via a secure website only accessible to clinicians registered for the program. This enable clinicians to access the content on demand when it is convenient. All video content has been optimized for viewing from smartphones, tablets, laptops, or computers.
Demographic Questions & Responses

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Maintaining competency, learning new skills, and staying up to date with changes in clinical practice is difficult for healthcare providers. Non-traditional work schedules, challenging workloads, high acuity patients, and managing priorities have made participation in customary education programs hard. Timely, on-demand, and in the moment education is often requested by healthcare providers when performing unfamiliar clinical procedures.

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