News

Journal Club

Hello Members of the PRN-BC!

The months have flown by and we are already in June. In this month's newsletter, the focus is on **knowledge translation.**

One research article is highlighted, a summary of the Canadian Respiratory Conference held in April in Quebec City is provided, and we share an exciting initiative that is starting this fall for pulmonary rehabilitation professionals.

I also share a few tips for how to increase referrals for your rehabilitation program, and showcase an interesting literature search tool that you might find interesting! Have a great summer everyone!

Yours truly, Pat Camp, PT, PhD

Assistant Professor, UBC Dept of Physical Therapy Clinician Scientist, UBC James Hogg Research Centre Head, St. Paul's Hospital Pulmonary Rehab Clinic Pat.camp@hli.ubc.ca 604-806-9144

Canadian Respiratory Conference 2013

This year's Canadian Respiratory Conference was held in Quebec City at the end of April. This multi-day event featured several talks related to pulmonary rehabilitation and many scientific posters.

One qualitative study (Joubert et al) investigated how the values and beliefs of health care professionals (HCP) influenced their decision to initiate advance care planning discussions with their patients. While all HCP agreed that advance care planning discussions were important, there was no clarity on what the roles of the HCP, the patients, and the families in the process. Clear guidance, including interprofessional education, was recommended.

Another poster (Janaudis-Ferreira et al) reported the results of a systematic review looking to identify measures of activities of daily living in COPD. The investigators found that there were 12 COPD-related and 18 generic tools that have been used. Most of these tools were self-report. There was little evidence of the responsiveness of these tools. (Responsiveness relates to the ability of the tool to detect a change after an intervention). This study was interesting because it highlights the difficulty we have in measuring change in function in our pulmonary rehabilitation patients. While we hope that the changes we measure in six minute walk distance relate to improvements in activities of daily living, we have few tools that have been validated in COPD to actually measure ADL performance. Clearly this is an area that needs further study!

The full list of posters presented can be found at: www.pulsus.com
Go to Canadian Respiratory Journal, select Current Issue (June) then click on the abstracts for the CRC.

Daily Step Count Predicts Acute Exacerbations in a US Cohort with COPD

Moy ML, Teylan M, Weston NA, Gagnon DR, Garshick E. PLOS One 2013; 8(4)e60400.

As we know, patients with COPD can have multiple exacerbations (AECOPD) every year and these exacerbations are associated with increased mortality. There has been a lot of research lately trying to find out what patient factors can predict who is at risk for future exacerbations. Here at St. Paul's Hospital there is a large study underway to identify biomarkers of AECOPD.

It makes sense that those who have exacerbations become less mobile, but there is less information on role inactivity plays in *future* exacerbations. The purpose of this study was to determine if activity levels (measured as step-counts) was associated with a future risk of exacerbations.

The investigators recruited 169 patients with mild to severe COPD. Patients wore a step counter for 14 days, and were followed for over a year. Step counts, 6 minute walk distance and quality of life were measured.

The investigators found that for every 1000 fewer steps walked in a day at baseline, there was a 7% increased risk of a future exacerbation and an 18% increased risk of a COPD-related hospitalization. This finding took into account how severe a person's COPD was, and how many exacerbations they had in the previous year (since these factors would increase the risk of future exacerbations on their own).

The authors also made a point that we tend to rely on the 6MWD as an important outcome measure, but it does not translate very well into an attainable goal for patients. Suggesting to patients that for every 1000 more steps they take in a day (about a 20 minute walk), they significantly reduce their risk of getting an exacerbation, especially a severe one, may be a different way of communicating the importance of physical activity on a day to day basis.

I've attached this open-source paper for your interest.

Ways to Increase Referrals

- Visit your respirologists and discuss the benefits of the program.
 Find out what outcome measures would be most valuable in their care of their patients and consider including them in your discharge notes.
- Work on a strategy to get automatic referrals for hospitalized patients with AECOPD
- Definitely visit the family physicians in your area they may not know you exist
- See if your local newspaper would like to do a story on your program, especially if it coincides with other sections related to seniors health.

PLEASE SHARE YOUR IDEAS!

Knowledge Translation for PRN-BC

Would you like more opportunities to network with your pulmonary rehab colleagues in BC?

Would you like to learn more about reading journal articles, find out what is the current research in pulmonary rehabilitation, and learn new things to better run your programs?

Then please consider joining the PRN-BC webinar series, starting September 2013.

We hope to run regular webinars that will feature different topics related to pulmonary rehabilitation. These include:

- Reading and critiquing the PR literature
- Discussions of different outcome measures
- Exercise for different lung conditions
- Collecting information for quality improvement
- Upcoming research studies
- Networking with your colleagues

These webinars will run FREE for the next 6 months.

The pilot webinar (where we trial the platform and work out our bugs!) will be held in late July. If you are interested in participating in the pilot webinar, please contact Ashley Kirkham by June 30, 2013 (first 10 people).

Research Corner

Pulmonary Rehab Projects and Research in BC

Qualitative Descriptors of Dyspnea during Exercise in Cystic Fibrosis Principal Investigator: Dr. Jordan A. Guenette, Ph.D.

Department of Physical Therapy, UBC

UBC Centre for Heart Lung Innovation

Shortness of breath (dyspnea) during exercise is a major source of distress and is a commonly reported symptom in patients with cystic fibrosis (CF). Due to our poor understanding of how dyspnea develops, there are no treatments that consistently reduce dyspnea in this population. We aim to acquire a more comprehensive understanding of the physiological mechanisms of exertional dyspnea in CF patients. This study will likely identify an important physiological mechanism of dyspnea in CF and may contribute to the development and use of effective treatments to reduce dyspnea in this population.

What are the causes of pain in people with COPD? Principal Investigator: Dr. Darlene Reid, PT, PhD

Department of Physical Therapy, UBC

Our investigations of pain in people with COPD demonstrated that the most common location was the neck and trunk. Dr. Darlene Reid and her PhD student, Emily Chen are examining CTs of the chest wall to look for compression fractures due to osteoporosis. An increased awareness of how often patients have compression fractures will help determine preventative treatment as well as how to modify posture and exercise to minimize pain associated with these fractures.

Handy Tools

I've just been introduced to an interesting new application that searches the literature for you, then sends you the paper based on the institutional approvals you have. It learns your interests the more you use it. Check it out on the App Store (also available on Android): http://qx.md/read

Events

PRN-BC Webinar How do I critique a journal article? September 17, 2013 4pm RSVP to Ashley.Kirkham@hli.ubc.ca by September 3, 2013.

American Association of Cardiovascular and Pulmonary Rehabilitation

October 3-5, 2013 Nashville, Tennessee **Gaylord Opryland Hotel** www.aacvpr.org

Canadian Respiratory Conference 2014

April 24 - 26, 2014 Calgary, Alberta www.lung.ca

Pulmonary Rehabilitation Programs in BC

CHASE. Chase Primary Health Care Services. 250-679-1419

CHILLIWACK. Chilliwack General Hospital. 604-795-4141 ext. 4261

DUNCAN. Duncan Community Centre. 250-737-2004

KAMLOOPS. Kamloops Lung Health Program. 250-851-7976

KELOWNA. Interior Health COPD/PR Program. 250-862-4066 LADYSMITH. Home and Community Care, VIHA. 250-739-5783

LANGLEY. Langley Memorial Hospital. 604 534-4121 Ext. 745273

MAPLE RIDGE. Ridge Meadows Hospital . 604-463-1820

NANAIMO. Nanaimo General Hospital. 250-755-7691 Local 53640

NEW WESTMINSTER. iConnect Health Centre FHA . 604-523-8800

NORTH VANCOUVER. Lions Gate Hospital. 604-984-5888

QUESNEL. G.R. Baker Memorial Hospital

PENTICTON. Integrated Health Centre. 250-276-2181

RICHMOND. Richmond Health Services- Garratt Wellness Centre. 604-204-

SURREY. Jim Patterson Outpatient Care and Surgery Centre. 604-582-4565

VANCOUVER. St. Paul's Hospital. 604-806-9032

VANCOUVER. Vancouver General Hospital. 604-875-4111 ext 63099

VANCOUVER. Kerrisdale Community Centre. 604-267-4430

VERNON. Vernon Jubilee Hospital 250-503-3712

VICTORIA. Royal Jubilee Hospital 250-519-5300 ext 13166

Newsletter Contact Information

Pat Camp, PhD, PT James Hogg Research Centre St. Paul's Hospital 1081 Burrard Street Vancouver, B.C. V6Z 1Y6

Phone: 604-806-9144 email: pat.camp@hli.ubc.ca