

# Lethbridge Number Theory and Combinatorics Seminar

Monday — December 2, 2013

Room: B660

Time: 12:00 to 12:50 p.m.

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## Biangular Lines

*Abstract:* A set of unit vectors  $V \subset \mathbb{C}^n$  is called *biangular* if for any  $u, v \in V, u \neq v$ ,

$$|\langle u, v \rangle| \in \{0, \alpha\}$$

for some  $0 < \alpha < 1$ . There are well-known upper bounds on the size of these sets of vectors. We will discuss these upper bounds, and the implications when they are met, including the generation of combinatorial objects such as strongly regular graphs and association schemes.

**EVERYONE IS WELCOME!**

Visit the seminar web page at <http://www.cs.uleth.ca/~nathanng/ntcoseminar/>



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