

# 2018 Ted Lewis SNAP Math Fair Workshop

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## 1 Introduction

The SNAP Foundation is a non-profit organization whose mandate is to encourage the development of mathematics learning resources at the classroom level with very little retraining of the teaching staff, with very flexible budgets, and by utilizing the energy and natural curiosity of the students themselves. The main theme of the BIRS workshop was, “What is a SNAP math fair and how to organize a math fair in your classroom”. The presenters mostly consisted of teachers/educators who shared their math fair experiences and success stories.

The first SNAP type math fair was designed in Edmonton by Mike Duman-ski and Andy Liu in 1997-1998. Since then, a large number of schools in Alberta and beyond have adapted the SNAP math fair to their needs. The SNAP program has been spread through similar workshops and conferences, and mainly by teachers themselves.

SNAP received its initial funding from the Canadian Mathematical Society and from private donations. PIMS, the Pacific Institute for the Mathematical Sciences, has been a long time financial supporter of our math fairs. BIRS, the Banff International Research Station, has provided funding for the BIRS math fair workshops that have been held in Banff on a regular basis. Currently, our major supporter is Thinkfun - a company that develops a variety of excellent puzzles.

## 2 Puzzle Resources

- [www.mathfair.com](http://www.mathfair.com)
- [www.galileo.org](http://www.galileo.org)
- [www.puzzles.com](http://www.puzzles.com)
- [www.thinkfun.com](http://www.thinkfun.com)
- [www.classic.csunplugged.org](http://www.classic.csunplugged.org)

### 3 2018 Workshop Highlights

A major theme of this year's Ted Lewis SNAP Math Fair Workshop was to point out connection of puzzles with the Alberta Education K-9 Mathematics Program of Studies. *Puzzles and Math Connections*, a new resource developed by Ted Lewis and Teresa Sutherland, has recently been made available to teachers. The booklet connects various math fair puzzles to specific outcomes in the Alberta curriculum as well as the American standards.

A second document resulted from the workshop pointing out how math fair addresses the front matter of the Alberta K-9 curriculum. Some of the ways that math fair fosters a child's mathematics education are as follows.

Student will...

- gain understanding and appreciation of the contributions of mathematics as a science, philosophy and art,
- exhibit a positive attitude toward mathematics,
- engage and persevere in mathematical tasks and projects,
- contribute to mathematical discussions,
- take risks in performing mathematical tasks,
- exhibit curiosity.

A subsidiary result of this year's workshop was the realization that the idea of math fair is not as well known amongst Alberta teachers as we originally thought. An area of improvement that we agreed to focus on is working to spread this idea to larger audiences. Presenting at teachers conventions and targeting math consultants accross the Alberta districtics should help.

### 4 2018 Workshop Feedback

This workshop is so helpful for giving people the confidence to try something new. I found it helpful this year to hear how different people do their Math Fairs. It's validating to hear that there is no one way that is necessarily better than others, as long as kids have choices and are engaged in the process. The other piece that I really enjoy is connecting with other teachers and having opportunities to hold conversations, share ideas, etc. I always leave feeling motivated!