



School District 19  
(Revelstoke)

**School District No. 19 (Revelstoke)**  
**Arrow Heights Elementary School**  
**2009 – 2010 Goals**  
**Numeracy**



**Goal**

*Focus on a specific area of student achievement for all students:*

**2008 – 2009 Goal to be continued:**

Continue to develop competency in math applications with emphasis in applying basic skills to solve problems in students' daily lives.

**2009 – 2010 Objectives:**

1. Improve basic numeracy skills in all grades.
2. Improve attitudes and perceptions toward success in numeracy.

**Rationale**

*Evidence and information used to set this goal:*

- Staff in-class evaluations indicate concern with students' competency in basic skills (addition, subtraction, multiplication, division).
- Vancouver Island Diagnostic Math Assessment (DMA) results indicate general grade level focus areas.
- DMA identifies individual students' areas of need for targeted intervention.
- Importance identified in being able to apply appropriate skills to solve daily life problems (problem solving). Success here ensures a numerate student (literate in area of numeracy).
- Importance identified to learn new curriculum and adjust instructional practice to best meet the learning needs of all students within WNCP curriculum.
- Desire to creating opportunities to have fun with math in order to reduce anxiety felt by many in relation to math.
- Big Ideas should be the foundation for one's mathematics content knowledge. Grounding one's mathematical content knowledge on a relatively few Big Ideas establishes a robust understanding of mathematics. "We understand something if we see how it is related or connected to other things we know." (Hiebert 1997)
- Common practices and language help provide our students with a "tool kit" of strategies to accomplish a given task.

**Data**

*Data considered (Provincial, District, School and Classroom)*

1. Vancouver Island Net Diagnostic Math Assessment Grades 3-7 (September & June)
2. Analysis of school generated letter grades
3. Review of FSA results grade four and seven.
4. Provincial Satisfaction Survey

## Success/Results

Data results shared with SPC, PAC, Parents and Staff in 2008-09:

### Diagnostic Math Assessment (DMA)

Number of students achieving at least 60% correct in computation section

Grade	Spring 2008	Fall 2008 Previous grade	Spring 2009 current grade
3	19/20 (78%)	No data	19/20 (95%)
4	19/22 (86%)	14/20 (70%)	12/20 (63%)
5	20/25 (80%)	13/21 (62%)	18/22 (82%)
6	12/19 (63%)	17/25 (68%)	22/26 (85%)
7	23/29 (79%)	9/19 (47%)	12/19 (63%)
average			78%

### Math Final Mark

Grade	June '08:% of students receiving C+ & better	June '09:% of students receiving C+ & better
4	91%	85%
5	92%	100%
6	74%	92%
7	90%	89%
average	87%	91.5%

### FSA Results Spring 2009 - Numeracy component (meeting or exceeded expectations)

Grade	Feb '08	Feb '09	'09 Meeting expectations	'09 Exceeding expectations
4	95%	(86%)	(67%)	(19%)
7	88%	(80%)	(70%)	(10%)

### Provincial Satisfaction Survey: Spring '09 % responses: All the time and Many Times

Spring '09	Gr 3	Gr 4	Gr 5	Gr 6	Gr 7	ave
Are you getting better at Math?	59	53	67	73	68	64

## Targets for 2009/2010

Expected results:

- That 85% of students in grades three to seven fully meet or exceed expectations (>60%) as measured by the DMA multiple choice and computation components.

- That 90% (average) of students in grades 4-7 achieve C+ or better for Math final mark

- That 90% of students who write the Foundation Skills Assessment in Grades 4 & 7 meet or exceed expectations

# Organizing for Improvement

## Strategies and Structures

- Implement WNCPC curriculum and resources for all grades
- Expand use of Diagnostic Math Assessment to help inform instruction
- Identify students struggling with basic skills and support these students with targeted interventions; i.e. Great Leaps in Math, Creative Mathematics (K. Sutton strategies)
- Celebrate math! Through bulletin boards, assembly presentations and newsletters we will show pictures of students doing math, share success stories, etc.
- Explore hosting a family math games evening for primary and early intermediate students.
- Continued full implementation of Math Makes Sense program Kindergarten to Grade 7.
- Continued support and encouragement for staff to expand strategies and knowledge to meet current Learning outcomes through professional development and networking
- Encourage use of online web-sites to practice skills, i.e:
  - <http://members.shaw.ca/teacherweb/TeacherHome.htm>
  - <http://members.shaw.ca/barongrodzki/home.htm>
  - <http://www.ronblond.com/MathGlossary/>
- Implement Mathletics interactive math games and learning activities.
- Implement regular classroom Math Games.
- Review FSA Item Level Analysis to inform instruction.
- Share “The Number Framework” strategies.
- Staff to review progress and share numeracy/math lessons and ideas regularly through staff meetings
- Practice a minimum 60 minutes per day average math instruction.
- PALS early math session

## Communication

- Publish results in school newsletter, also publish common language for Reading Powers and how to use them when reading with your child
- Presentations to SPC, PAC, students, staff, and Board
- Parent Conferences
- Classroom Displays