

From the Editor's Desk

■ PUBLICATIONS FREE TO ATA MEMBERS:

Mathematical Meanings in Elementary Arithmetic, ATA Problems in Education - Monograph No. 2.

Modern Concepts in Elementary Mathematics, ATA Improvement of Instruction - Monograph No. 4.

These publications are available from The Alberta Teachers' Association, Barnett House, 11010 - 142 Street, Edmonton 50, Alberta. Send your request to T. F. Rieger, c/o the above address.

■ A RECREATIONAL ENRICHMENT MAGAZINE

Pythagoras, a small enrichment magazine containing puzzles, problems, "teasers", and other forms of recreational mathematics for secondary school students, is now available in an English edition as well as the original Dutch version. Since this periodical is meant for a wide cross section of students, the articles in each issue are varied and are coded to indicate the degree of difficulty involved in solution. *Pythagoras* will appear six times yearly; the annual subscription rate is 8/6d. Orders and inquiries should be addressed to Fanfare Educational Publishing Company, Fanfare House, 174 Chingford Mount Road, London, E.4, Great Britain.

(From *NCTM Bulletin for Leaders*)

■ TRIVIA MATHEMATICA

- (1) A ham sandwich is better than nothing.
- (2) Nothing is better than utopia.
- (3) Therefore, by the transitive property of the relation "better than", a ham sandwich is better than utopia.

(Arizona Council *Newsletter*)

■ A GAME FOR THE ELEMENTARY CLASSES

Divide your class into two teams. Team A's appointed leader gives a command to Team B: "1/2 of Team B stand up!" If the right number of that team stand up, Team B scores one point.

Team B will then give Team A a command: "1/4 raise your right hand!", and so on.

If a team gives an impossible command, the other team scores a point. Many variations may be used depending on your own creativity.

■ GAMES TO TEACH THINKING

This item is an excerpt from an article by Carl Bereiter, Department of Applied Psychology and Curriculum, OISE:

Can you help?

We know that many teachers have good ideas for games. We are prepared to pay from \$10 to \$150 for game ideas, depending on how fully worked out they are and what use we are able to make of them. The games should require thinking - not just memory, luck, or persistence. We are looking for games that have the nine desirable features listed below. However, they needn't be sitting-still games. We are also interested in active outdoor games that involve thinking.

We prefer games that will not cost the teacher any money or require a large amount of effort to prepare materials. However, a really good game for which material is needed will be considered.

Send game ideas to:
Carl Bereiter,
Department of Applied Psychology,
The Ontario Institute for Studies in Education,
252 Bloor Street West,
Toronto 5, Ontario.

Please don't send along any materials that you will need back because we can't be responsible for returning them.

Some desirable features of a game:

- The game is actually fun. It may not sound like it from the description, but try it with whoever is handy and you will see.
- Rules are very simple to learn.
- Game requires no supervision.
- No special materials are required.
- It can easily be adjusted to the level of competence of the players.
- There is an element of chance so that less capable players are successful part of the time and no one is successful all the time.
- The game can grow with the players. As players get more sophisticated, they start looking for harder sentences when they are leaders (that is, sentences with less predictable sequences).
- It isn't very competitive. No score is kept. Enough motivation seems to come just from winning a turn as leader.
- In addition to whatever value it may have in training thinking skills, it gives practice in something else useful - reading and guessing words from their context.

■ TRY THIS

The Counting Numbers 1-100 Expressed as Combinations of Four Fours

For example, $1 = \frac{4}{4} + 4 - 4$, $29 = 4! + 4 + \frac{4}{4}$, $35 = 4 \cdot 4 \cdot \sqrt{4} + 4$, and $70 = 4! + 4! + 4! - \sqrt{4}$. How about the others?

(The editor will publish a list of solutions if you will send your classes' efforts to him.)

■ MATH-initions

Weatherman's promise of a good evening: Finite.
 Green substance in all salads: Lattice.
 Someone who is now with it: X^2 .
 A tangled fishing line: Rectangle.
 Out of gas: Octagon.
 A deployment of heavy artillery: Canonical form.
 Spring pranks: Matrix.
 The painless way to pull a tooth: Number.
 Take someone out of an election: Denominator.
 Promise of good luck in the future: Hexagon.
 Why a Chinaman goes to the dentist: 2:30.
 We have a system of linear equations: Use detergents for a solution.
 Set: what you do in a chair.
 Subset: what you do under a chair.
 Proper subset: sitting straight under a chair.
 Empty subset: somebody is absent.
 Disjoint: place where truck drivers eat.
 Element: large animal with trunk.
 Binary: two-headed canary.
 Rational number: four-day week.
 Irrational number: parent with complaint.
 Infinite: children in your class.
 Fraction: broken bones.
 Plane: not fancy.

(This item has appeared in several exchange newsletters.)

■ FROM THE MATHEMATICS STUDENT JOURNAL

Teacher: What is $\sqrt[3]{1000Q^3}$?
 Student: $10Q$.
 Teacher: You're welcome.

■ ACTIVITIES FOR ELEMENTARY CHILDREN

1. Pantomiming Angles

Select individual pupils, have them go to the front of the room one by one, and put their bodies in the position of some angle. Have others guess what kind of angle they are representing.

2. Countdown

Have pupils count by 6's, starting with 5. Anyone who makes an error must sit down for the moment, but he can regain his place in the game by supplying an answer when another child cannot think of it immediately. Use more difficult situations as the game progresses.

(This item has appeared in several exchange newsletters.)

NCTM Notes

BUILDING FUND REPORT (CANADA) FEBRUARY 1, 1972

<u>Canadian</u>	<u>19%</u>	\$6,640
Alberta	73%	775
British Columbia	18%	810
Manitoba	4%	975
New Brunswick	31%	160
Newfoundland*	107%	85
Northwest Territories*	300%	5
Nova Scotia	0%	215
Ontario	11%	2,325
Prince Edward Island	0%	0
Quebec	5%	1,125
Saskatchewan	42%	165

* Goal Surpassed

(Below is a form for you to make a contribution.)

NCTM BUILDING FUND
1201 - 16th Street N.W., Washington, D.C.

NAME _____

ADDRESS _____

_____, Alberta

Enclosed is _____ (CHEQUES PAYABLE TO "NCTM BUILDING FUND")
(AMOUNT)

Credit Mathematics Council, The Alberta Teachers' Association, in honor of
M. E. LaZerte.
