THE ALBERTA TEACHERS' ASSOCIATION

MATHEMATICS

COUNCIL

Jelta-k



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I have now prepared two issues of *Delta-K* and have not had an opportunity to obtain reactions on either at this time. I am most anxious to know what is superfluous, what is missing and what is valuable. I have presented some questions; I have challenged you for response to articles; I have requested your contributions. I am unable to make personal contact with many of you for obvious reasons of time and distance. But contributions and constructive criticisms will help make *Delta-K* and MCATA more valuable sources of suggestions to improve the role of mathematics in the lifelong education of everyone directly and indirectly reached through our mathematics teachers. Together, we can grow professionally and improve both our intellectual and social environments more effectively than any of us can singly.

Delta-K makes MCATA members aware of happenings and the philosophy of mathematicians and mathematics teachers collectively. For MCATA members, it can be a source of expression of individual practices and philosophy. You can be heard by all of us if you contribute practical and/or philosophical manuscripts and/or letters to the editor in reaction to published material or as original ideas. I promise to present your position without comment and/or endorsement along with the reactions of all who prepare logical defensible differences, except where a repetition of arguments may occur in several consecutive issues, necessitating a temporary closing of one topic in favor of fresh topics.

Metric or not metric?

This is no longer a question. We have reached the point where our world is too interdependent economically to have a multiplicity of physical standards of measurement that create confusion. With this issue of *Delta-K*, we have adopted the international standard of paper size.

This standard is based on paper size of one meter square, referred to as AO. All smaller paper sizes are cut from this paper in such a manner that, no matter what size, it is in the same proportion as the original, and there is no waste. The sizes are A1, A2, A3, A4, A5, A6, A7, and A8. The size we are using is A4.

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This may necessitate some adjustments in filing cabinets which is a temporary inconvenience that will easily be overcome as irregular sizes and shapes of paper will no longer be used. For our amateur photographers, darkroom work will be much easier as less cutting and waste will occur in printing paper. For others, we suggest there will be a way for you to see improvements as time passes.

Relationship between university mathematics departments and mathematics teachers

At a recent MCATA executive meeting, the ability of mathematics teachers and university mathematics departments to assist each other was questioned: "What can the university offer mathematics teachers?" The university now offers credit courses, but is this the most useful program today in light of the present minimum requirement of a degree before beginning teaching in our public schools?

Questions that arose from this meeting related to innovative courses, short courses, workshops, seminars, classroom visits and travelling courses to our more remote centers. What content and format is the most desirable and valuable in your situation? Your responses are essential if we are to assist our universities in improving their services to us. Something they are doing that most of us are not using is to send representatives to the classrooms to show that mathematics careers are available and that not all mathematicians are odd, and that mathematics is for students of every talent and interest. Contact Dr. Jack Macki at the University of Alberta in Edmonton for more details on this program. Contact Dr. Macki or other members of MCATA executive for improvements to the liaison and activities with the Universities.

Annual meetings forthcoming in 1974

NCTM annual meeting is April 17 - 20 at Atlantic City, New Jersey. Members of NCTM have received details of the meeting; others may contact Dr. George Cathcart, NCTM representative for MCATA. NCTM is the organization that made it possible for our Name-of-Site meeting in Edmonton last fall to have leaders in mathematics from every part of North America. NCTM assists us in other ways also, such as providing us with a wider market for our monographs and making available publications from other sources.

MCATA annual meeting is October 25-26 at Jasper. We have not abandoned our practice of rotating the meeting sites to accommodate everyone; we've just added another site not recently used. Our costs will be: registration - \$5 for members and \$10 for non-members with a one year membership included and a luncheon on Saturday; accommodations - \$18 per person per day and \$12 per day double occupancy. The "social" and keynote address will be on Friday evening; Saturday will have sessions for teachers with topics of special interest at each level. Details will be released soon. For suggestions and questions that are already in your mind and need immediate attention, contact Denis Baudin, annual meeting chairman (see last page for address).

Math kits- New format

Our math lab kits have grown in size and popularity so that a single K-XII kit is too massive to be practical. We have divided our kits into three groups: elementary, junior high and senior high, as stated in the information letter from Stu McCormick, Coordinator of Math Laboratory Kits. When you experiment with the sample materials, consider what you want added so that we can update the kit for our next circulation. One item that will not appear in the kits before next fall is material for use in teaching metric measurements.

We are gathering material and ideas for evaluation now so that what will be included will be valuable to MCATA members and other teachers at all grade levels. What is in your repertoire that is valuable for others? What do you need to evaluate before you purchase? Your participation is the only way MCATA members may truly work together to improve the teaching of mathematics in our schools. Your executive is working to make the kits worthwhile, but our success depends on your assistance and active participation.

Mathematics Canada

As announced in the August issue of *Science Forum*, the Science Council of Canada has agreed to finance a one-year study of the mathematical sciences in Canada. In addition to the traditional disciplines of pure and applied mathematics, the mathematical sciences include such fields as mathematical statistics, computer science, actuarial science, and operations research. The initiative for the study comes from the Canadian Mathematical Congress, and the study itself will be supervised by a joint committee whose members have been appointed by: The Canadian Mathematical Congress, The Canadian Information Processing Society, The Canadian Operational Research Society, The Canadian Institute of Actuaries, The Statistical Science Association of Canada, The American Statistical Association (District 11).

Surprisingly little attention has been given to the mathematical sciences in Canada. Although the need for long-range policy planning in this area seems obvious, the Lamontagne Report (entitled "A Science Policy for Canada") scarcely mentions mathematics at all. The present study will be breaking new ground in attempting to provide an overall view of the role of mathematics in Canadian science, education, government, and industry. The specific objectives of the study are:

- To establish what kinds of mathematics are currently used in Canada and to what extent. Also to suggest areas of mathematics which are not being studied or used to the extent which would be desirable.
- 2. To describe and evaluate the various possible types of research in the mathematical sciences.
- 3. To estimate present and future manpower supplies and needs at various levels of mathematical competence.
- To examine current objectives and methods of training in mathematical activities and to suggest possible improvements at the undergraduate and graduate levels.