



Editorial from Małgorzata Marciniak

Since last year the journal has been receiving a large number of submissions which motivated numerous transformations of the work of the Editors. We have decided to increase the number of people who actively participate in shaping the journal. The current, 37th issue of MTRJ, is the first one prepared by the new, expanded team, which consists of the Chief Editor Bronisław Czarnocha (CUNY, USA), the Managing Editor Małgorzata Marciniak (CUNY, USA), and the new Editors: Ivan Retamoso (CUNY, USA), Mónica Arnal-Palacián (University of Zaragoza, Spain), Hannes Stoppel (Max-Planck-Gymnasium, Germany). We are looking forward to new publishing trends brought by the new coming editors.

The issue opens with the work titled “Framing word problems: task confidence in early-childhood and pre-service teachers” by Luke Brownlow. The paper is devoted to assessing teachers confidence while they work on mathematics word problems. The scope of the paper is limited to teachers of very young children at the beginning of their education, which may be ignored by many as having very little influence on the performance of college STEM students. However, at that age children are particularly sensitive to the attitude of the teachers toward the subjects thus, the confidence of pre-service teachers toward mathematics may influence students attitudes in the future. The most important aspect of the study reflects on the change of the confidence while performing the experiment. Hopefully this paper will show some direction of research in mathematics education to expand the themes of the attitudes while respecting the themes of solid knowledge. The point is that the attitudes are the starting point for shaping the knowledge and whenever there are issues with the knowledge, the faults may lie on the subtle side of the attitudes.

The next article, “Contemporary problems of teaching and learning in mathematics education” by Paul Nnanyereugo Iwuanyanwu takes an enhanced view of the various stages of education, pointing out aspects which influence the knowledge and skills of the learners. Among many aspects, the author emphasizes that the attitudes of the students, the teachers and the authorities are relevant factors creating the shape of education.

Shashidhar Belbase et al. in the article “Mathematics teachers’ perspectives on emergent issues in teaching and learning mathematics in Nepal” make an attempt to study various aspects of mathematics education. They use a lengthy questionnaire and thoughtfully analyze the statistical data to draw conclusions about the needs of Nepalese curriculum. This is a theoretical work, based mainly on a quantitative analysis not rooted in teaching practice. But such work, motivated by the authors “wish to know” and accompanied by mindful conclusions related to the shape of the Nepalese education in the future, is a valuable contribution to the current issue of the journal. From a perspective of CUNY teachers who live in a highly international city and educate students from

all over the world, we may jump to stereotyping conclusions that all students from Asia display amazing mathematics skills forgetting that these students who we meet in our classes likely do not represent the entire broad spectrum of student body from that region. Thus, we should not forget that Asian emergent nations face serious educational challenges that leave their marks on students and their teachers. The next article “Modelling and applications in Iran school mathematics curriculum: voices of mathematics teachers” by Abolfazl Rafiepour and Danyal Farsani displays the history of math curriculum transformations in Iran. The authors analyze the long term changes of the curriculum, placing a particular emphasis on the application problems. Most importantly, they present teachers perspective on the content of the modern mathematics textbooks and their opinion of the presence of the application problems in the classroom. Both articles are very much research-oriented and it would be valuable for the authors to continue their work toward the direction of their teaching practice.

The next article “Improving mathematics lecturers’ content knowledge through Lesson Study” was prepared by Hosseinali Gholami et al. from Malaysia who assess the Lesson Study approach to improving five lectures about functions. The center of the research remains in the collegial nature of collaboration among the teaches and how their knowledge improves while they work on the lectures. This is another example of an excellent work of researchers from emergent nations who make an attempt to reflect on certain aspects of education within their community.

The current issue has an innovation in a form of a column “The Problem Corner” created by Ivan Retamoso, who is one of the new editors of MTRJ. This column contains a mathematical question for students and teachers to enjoy. In the future the column will be expanded to contain solutions submitted by the readers of the journal.

One of the key themes in today’s mathematics education is related to digital skills of the teachers and the students. These skills do not only consist of knowing how to create an original video lesson but knowing how to use digital features to optimize students learning and assess them in a suitable way. Coincidentally, digital skills became even more pronounce during the times of the pandemic, when the education suddenly had to convert to a remote modality. The next two articles treat about digital aspects of teachers’ work from two quite opposite perspectives. The article by Dirghaa Raj Joshi et al. titled “Synthesis review of digital frameworks and DEPSWALIC digital competency Framework for teachers from basic to university level” reflects on theoretical aspects of the digital features in mathematics education. The authors list multiple digital skills and for the convenience of the readers provide suitable platforms that support them but at the same time emphasize paying attention to ethical values. This theoretical work does not provide examples from the classroom but the editors believe that the content can be useful to all teachers for various levels of education who face an increased amount of digital features in their work. The next article “Developing Interactive Electronic Student Worksheets through Discovery Learning and Critical Thinking Skills during Pandemic Era” prepared by Marfilinda Atma Sari Subekti and Rully Charitas Indra Prahmana from Indonesia has complementary features. It displays examples of the process of



creating interactive electronic worksheets for junior high school students and includes the explanations of the process of creation based on suitable assessment. It is really joyful to see how creative processes repeats themselves to accommodate everchanging circumstances.

The current issue closes with the article prepared by Aradhana Kumari. “A visual way to teach how to find square of an algebraic expression” is based on a lesson which teaches visualization of an algebraic operation. As the author explains, the idea appeared to her after observing students mistakes and understanding their misconceptions. This simple “box method” is something that many teachers figure out on their own but it is worth spelling out loud for the purpose of exposing junior faculty to the thoughts of seasoned professors.

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