Guest Editorial: Risk – Mathematical or Otherwise

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‘Risk’ is an established domain of research in various academic disciplines (e.g., mathematics, statistics, probability, economics, engineering, political science, business, earth science, health science, computer science, psychology, sociology, and law). At present, risk, as a domain of research, is not similarly established in the field of mathematics education. However, there is established research on risk from members of the mathematics education community (e.g., Dave Pratt, Manfred Borovenik, Ramesh Kapadia and others). Further, the established research on risk from the fields of psychology (e.g., Daniel Kahneman, Amos Tversky, Paul Slovic, Gerd Gigerenzer and others) and the popularization of mathematics and statistics (e.g., David Spiegelhalter and others) is consistently found in the relevant mathematics education research literature. As such, one could argue that risk, as a domain of research in the field of mathematics education, is starting to take shape.

The signs are there for risk to become a major topic of research in mathematics education. For example, there are themed issues of prominent mathematics education journals dedicated to “Probability and Reasoning about Data and Risk” (Biehler & Pratt, 2012), keynotes and plenaries on risk at prominent international conferences (e.g., 9th International Conference on Teaching Statistics) and, of course, foolish prognostications (Chernoff & Sriraman, 2014). Lest we forget, however, risk can be defined in numerous ways and is an interdisciplinary domain of research. As such, any publication attempting to help further cement risk as an established domain of research in the field of mathematics education and beyond would have to have rather unique features; which would include, but would not be restricted to, such features as: the open accessibility of material, a reputation of inviting articles that present original work on a wide range of topics and from various academic disciplines. Alternatively stated, a special issue on ‘Risk – Mathematical or Otherwise’ befits The Mathematics Enthusiast and The Mathematics Enthusiast befits a special issue on ‘Risk – Mathematical or Otherwise’

This special issue aspires not only to further investigate established research threads pertaining to risk, but, also, to identify and investigate, that is, extend the purview of risk research in the field of mathematics education and beyond. To achieve this lofty goal, over 40 individuals from various academic disciplines (e.g., mathematics, statistics, psychology, popularization, education and cognitive science) have contributed 26 articles, which, collectively, comprise the broad-based, interdisciplinary special issue on risk, mathematical or otherwise, that I had hoped to achieve when I was invited to guest edit this special issue. I wish to thank those individuals, here, for helping my plan come to fruition.

References