## Joint application of socio-cultural approach on continuing professional education among mathematics teachers

## **ABSTRACT**

The University's fundamental missions are teaching, research, and public service. Higher education promotes the advancement of knowledge and the pursuit of cooperation locally, nationally, and internationally. It develops in people a respect for the dignity and worth of the individual, a capacity for critical reasoning and a desire for learning. Therefore, expanding higher education in China through continuing education has developed high quality human resources in quantity and quality issues in universities. Especially, in the universities mission rapidly increased the extension of the boundaries of knowledge through research and scholarship. This was the result of developing ideas and the facing of issues and challenges in a knowledge based economic society that relies on information technology, innovation, knowledge creation, development of human resources, and cultivation of skills. Based on the socio-cultural notion that mediated action cannot be separated from the milieu in which it occurs, meaningful continuing professional education (CPE) among mathematics lecturers will be hypothesized in the present paper. We posit a study for continuing professional education of lecturers that prepares them for 21st century skills, competencies and identities as lecturers. The construct of Community of Practice (COP) is relevant and important for thinking about successful lecturer learning. Based on the literature, we propose design tenets for supporting and sustaining communities in the 21st century: foregrounding practice, relying on existing social networks, building on strengths, of diversity in membership, task practices that require collaboration and peer and leadership mentoring. Further, technology architectural considerations for the development of an online learning environment that supports the continual professional education of teachers is proposed. An attempt will be made in this study to investigate and to explore, effectiveness sociocultural issues on promoting continuing professional education (CPE) will be exhibited by mathematics teachers Malaysian .The quantitative method will be used in this study and will survey 45 lecturer respondents in Malaysia. A sample will be obtained randomly from universities in Malaysia whilst a questioner as a instrument will be used. Data analysis are Mean, Standard Division, Variance and ANOVA (F-test). In this study we will indicate the impact of sociocultural approach on promoting continuing professional education (CPE) among mathematics teachers.

**Keyword**: Socio-cultural, promoting; Continuing professional education (CPE); Design Tenets; Teachers professional development; Teachers practice; Online lecturer learning