

# **New Generation of Smart e-Learning Systems and BigData Analytics**

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With the fast development in Internet technologies, most prominently Cloud and Big data technologies, a new generation of online learning and collaboration systems, also referred to as Smart e-Learning and Collaborative Systems, is emerging. The current situation of the worldwide pandemics is situating new e-Learning and collaborative systems based on Cloud and BigData eLearning Analytics as de facto approaches to cope with limitations of face-to-face learning and collaborative work.

In this talk we will address and discuss current and new trends and challenges arising in BigData eLearning Analytics as enablers of new learning and collaborative paradigms such as the A3 paradigm (Anywhere, Anytime, Awareness), emotion-aware learning, trustworthy e-assessment and other trends to maximize learners' and collaborators' motivation, experiences and outcome. Issues arising from massive data processing and mining techniques for BigData eLearning under efficiency and scalability requirements will be discussed as well. We will exemplify the presentation by real life examples and case studies from a real Virtual Campus.