

## **System dynamic ace for destination managers: online software DestinACE for decision-making support**

*Petr Štumpf, University of West Bohemia, Faculty of Economics, Czech Republic*

*Petr Janeček, University of West Bohemia, Faculty of Economics, Czech Republic*

*stumpf@kmo.zcu.cz*

Tourism destinations are considered as complex systems which should be managed in sophisticated way due to the complexity of relationships within the system. We can consider a system dynamic modelling as one of these complex approaches. From the theoretical point of view, several studies using system dynamics as a main method have been published. However, the use of the system dynamic models by destination managers seems to be too academic and hard to use in practice. Therefore, we developed a software tool DestinACE as a user friendly online environment for destination managers. This software is based on the system dynamic simulation modelling where the complicated model calibration, Stock and Flows Diagram (SFD) created in Vensim software is hidden to the users. The user environment runs in Google Sheets and uses PySD engine to call the SFD for simulations reflecting the destination managers initial decisions. After the simulation run, the software provides a user friendly report presenting simulation results.

**Key words:** system dynamics, destination management, software, decision making