xAct: Efficient Tensor Computer Algebra
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This talk/tutorial will introduce xAct, a stable and well tested collection of Wolfram Language packages for Tensor Computer Algebra in Mathematica. First we will present the global project, its structure, history and mathematical point of view adopted, as well as a summary of Wolfram Language concepts. Then we will explore its main packages, performing example computations for each of them: xTensor for abstract computations, xCoba for computations with frames and coordinates, xPert for curvature perturbation theory, and others.