

SIM-AM 20223

## Session on “Optimization: Modelling, Methods and Application”

Organized by

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Additive manufacturing frees the established manufacturing processes from many restrictions in terms of layout, shape and topological design. On the other hand, many new aspects and their interactions have to be taken into account, such as the printing process, the handling of materials, necessary auxiliary constructions or the continuous digitization of the entire design chain, as examples. In fact, many issues arise that can be formulated as tasks of optimization or optimal control and can be solved with appropriate methods. Contributions are addressed that deal with the formulation and modeling of such optimization tasks, the development of suitable optimization algorithms and methods, and their application for additive manufacturing.