The SbD4Nano case studies structure, and pathway to support SMEs

A major challenge for the global nanotechnology sector is the development of safe and functional engineered nanomaterials (ENMs) and nano-enabled products (NEPs). In this context, the project SbD4Nano aim at further developing the application of the Safe-by-Design (SbD) concept, creating a comprehensive new e-infrastructure to foster dialogue and collaboration between all actors in the supply chain for a knowledge-driven definition of SbD setups that optimize hazard, technical performance and economic costs.

In this context a set of Case Studies, leaded by 9 industrial partners, have been conceived, in order to practically assess the performance of the proposed SbD indexes calculated by the e-infrastructure under realistic case studies covering a wide range of materials and processes. This will be achieved by testing, evaluating and validating the modules implemented in the e-infrastructure, with the aim to precisely identify the needs of the actors of the nanotechnology value chain and to test critical functions of the e-infrastructure with a variety of ENMs, NEPs and exposure situations, to further improve the integration of knowledge driven recommendations into practical solutions.

The case studies under development will be here introduced, with the aim of showing the pathway that we have designed and that we are, actually, implementing to support SMEs in this complex and fragmented sector.