



3DEXPERIENCE®

ENERGY, PROCESS & UTILITIES **SUSTAINABLE PRODUCT**

Delivering sustainable product and process innovation



**OPTIMIZE
PRODUCT
INNOVATION
PROCESSES VIA
STREAMLINED
MODELING &
COLLABORATION**

Chemical and materials producers are under pressure to deliver new products at lower costs while using less energy and fewer resources. This demanding challenge is compounded when research organizations work in silos with processes that leave vital experimental data unshared, hidden in notebooks and on scientists' hard drives. Dassault Systèmes **Sustainable Product** Industry Solution Experience provides tools to accelerate the pace of innovation. It optimizes resources and processes in the laboratory, delivering improved innovation and research efficiencies, and ultimately more sustainable and profitable products that are first to market.

STREAMLINED PROCESSES ACCELERATE INNOVATION

Chemicals, petrochemicals and materials producers and their supply chains in the fine, bulk, polymer and specialty chemicals, oil and gas, petrochemical, agrichemical and materials industries are under pressure to deliver an ongoing stream of innovative new products. These must not only meet end-user needs, but also incorporate sustainable features and comply with demanding regulatory and environmental requirements. Faster innovation will help address these challenges, but innovation is severely hampered when laboratory processes, people and data are disconnected. This leads to needlessly repeating experiments and workflow bottlenecks that result in added waste, additional costs and slower innovation. Dassault Systèmes Sustainable Product Industry Solution Experience provides scientific organizations with the tools to accelerate the pace of innovation by optimizing resources and processes in the laboratory.

UNIQUELY POWERFUL CANDIDATE PRE-SCREENING

Too many new chemicals and materials research pathways lead to dead ends, which consume cash and resources without delivering value, and their lessons are lost as a result of processes not fit for purpose. **Sustainable Discovery**, a core process experience of Sustainable Product, enables researchers to overcome these barriers with uniquely powerful candidate pre-screening tools. Atomistic and molecular predictive modeling solutions screen and identify chemical and materials properties and behaviors. The results enable researchers to select only those candidates meeting the right criteria to progress to laboratory development, accelerating the innovation process and maximizing the chances of successful outcomes.

OPTIMIZE RESEARCH OUTCOMES BY STREAMLINING PROCESSES

Even the most exciting new product finds cannot progress to market efficiently and profitably without rigorous and effective processes. **Sustainable Lab**, a core process experience of Sustainable Product, digitizes the research, development and testing process. Secure and easy collaboration is enabled, eliminating paper-based processes and silos, introducing efficiencies and fostering innovation by optimizing how people and resources are utilized. The process of finding, tracking, storing and disposing of new ingredients and materials for formulation testing is streamlined and more efficient ways to reuse past experimental data are provided.

Vital knowledge is lifted out of researchers' notebooks and PCs to be shared and used by the wider business.

REDUCING SAFETY AND COMPLIANCE RISK, ENHANCING SUSTAINABILITY

The digitization of the research, development and testing process enabled through Sustainable Product allows the complete and accurate recording of laboratory activities alongside inventory management, asset and equipment monitoring. The benefit for research program directors is reduced risk and improved compliance. Better utilization of resources, cutting material wastage and better prediction of the properties and behaviors of new substances leads to greater sustainability and improved environmental performance. The optimal utilization of people, materials, equipment and processes that Sustainable Product delivers provides unparalleled efficiency and excellence in the laboratory and an expanded new product pipeline for product producers.

Industry process experiences

The following solution processes are part of the Dassault Systèmes **Sustainable Product** Industry Solution Experience:

- Sustainable Discovery
- Sustainable Lab

Our 3DEXPERIENCE® platform powers our brand applications, serving 12 industries, and provides a rich portfolio of industry solution experiences.

Dassault Systèmes, the 3DEXPERIENCE® Company, provides business and people with virtual universes to imagine sustainable innovations. Its world-leading solutions transform the way products are designed, produced, and supported. Dassault Systèmes' collaborative solutions foster social innovation, expanding possibilities for the virtual world to improve the real world. The group brings value to over 190,000 customers of all sizes in all industries in more than 140 countries. For more information, visit www.3ds.com.

