



A brand of the ADVITEC Informatik GmbH

ADVISIM^{3D}

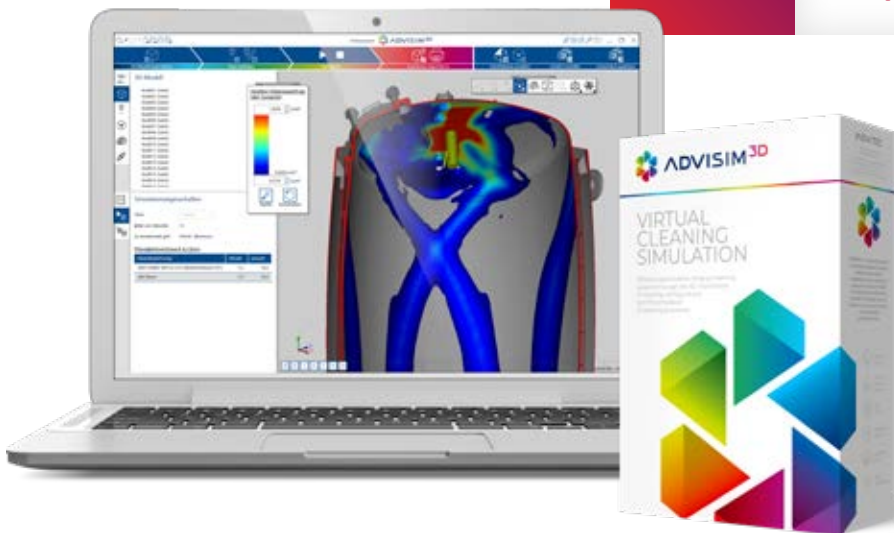
Spray Cleaning Simulation

**Virtual testing of spray shadows,
volume flow and cleaning effect
with ADVISIM^{3D}**

**ADVISIM^{3D} is the first resource-efficient
3D cleaning simulation for container
and component cleaning in the food,
pharmaceutical and
manufacturing industries.**

**TEST
NOW**

**ADVISIM^{3D}
2.0**



When designing and validating cleaning systems, the focus is always on the optimum nozzle configuration to remove contaminants from each individual point of the cleaning object in a resource-optimized manner. ADVISIM^{3D} reliably visualizes spray shadows as well as the volume flow distribution and cleaning effect in its temporal progression.

ADVISIM^{3D} Highlights

- Customization of spray balls or designing new ones
- Instant display of spray shadows with nozzle placement
- Import of complex CAD models in STEP file format
- Simulation of linear and rotating nozzle motions with user-defined time and velocity
- Large catalog of scientifically measured nozzles from numerous manufacturers
- Precise simulation of volume flow distribution over time for meaningful cleanability proofs
- Determination of the cleaning effect under the ideal conditions of a scientific laboratory test
- Simulation results as color visualization and as a report

Branchenlösung für



Cosmetics



Pharma



Food



Packaging



Automobile



Nozzle Technology



Chemistry

**You have questions?
We advise you!**

Phone +49 351 65262-22

- Order trial version
- Request live presentation
- Purchase license

**Software subscription
from 4150 EUR net
annually per license**

- Unlimited installations
- 1 active user
- Support and updates included

What makes ADVISIM^{3D} so valuable for you

REQUIREMENT

The hygienic production, storage and delivery of pharmaceutical products, cosmetics and foodstuffs place high demands on the cleanability of production areas as well as storage and transport containers. As a consequence, complex systems with integrated cleaning systems are usually required to ensure both product safety and environmental protection.

PROBLEM

The efficient design of systems is very resource-intensive and is based on the valuable experience of engineers. In particular, the optimal positioning of static and dynamic cleaning nozzles is a major challenge. As a result, cleaning systems are repeatedly reconfigured with complex analog tests and often end up being oversized for safety reasons.

SOLUTION

ADVISIM^{3D} simulates industrial spray cleaning processes reliably to identify and realize optimization potentials for the design, layout and operation of professional cleaning environments. It enables the user to make valid statements about spray shadows, volume flow distribution and cleaning effect for optimum resource efficiency.

Your benefit: What ADVISIM^{3D} saves and improves

TIME

- Design and layout cleaning systems faster
- Virtual comparison of variants
- More test runs in less time thanks to virtual simulation
- Bidirectional compatibility with CAD programs
- Shorter time to market
- Shorter downtime when changing products
- Competitive advantage



ENVIRONMENT

- Save cleaning medium, water and waste water
- Less effort for assembly, elimination of assembly marks and model contamination thanks to virtual variant comparison
- Prevention of incorrect dimensioning thanks to optimal system design and resource-efficient layout
- Virtual troubleshooting outside the production environment saves set-up times and rejects



TRANSPARENCY

- Keyword „glass tank“: the digitally visualized cleaning process gives the customer more transparency



DOCUMENTATION

- Clean documentation of the optimal cleaning configuration and export as STEP file
- Faster and cheaper cleanability proofs for quality assurance and audits
- Automated report generation after each cleanability test



DISTRIBUTION

- Use as demonstrator tool for sales support



EXPERTISE

- Less engineering hours in plant design and layout
- Use ADVISIM^{3D} efficiently as a sales tool
- Uninterrupted production



CONTROL

- Optimized process and project control



RELIABILITY

- Higher calculation and planning reliability in plant design and commissioning
- Early recognition and consideration of critical cleaning areas

YOUR DIGITAL ASSISTENT

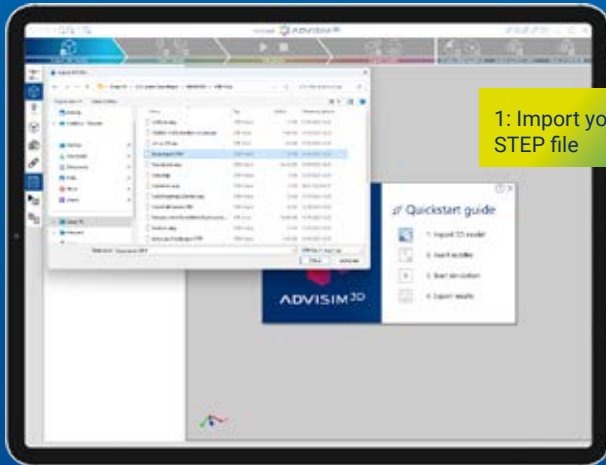
In the hands of an experienced engineer ADVISIM^{3D} unfolds its full technical potential in the resource-efficient design, layout, validation and of course in the amortization of industrial spray cleaning systems.

Whether component manufacturing or internal cleaning of containers in the food, pharmaceutical, automotive or cosmetics industry - the advantages of virtual simulation with ADVISIM^{3D} saves your analog business valuable personnel, time, financial and above all environmental resources.

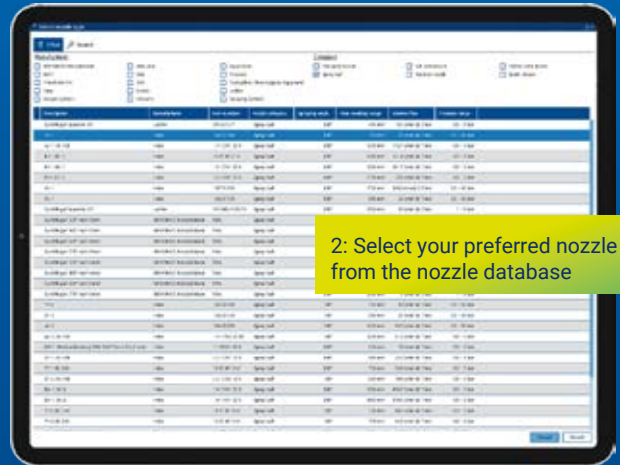
And in productive operation, the avoidance of spray shadows and oversizing thanks to optimal nozzle configuration pays for itself with each new cleaning process over months and years.



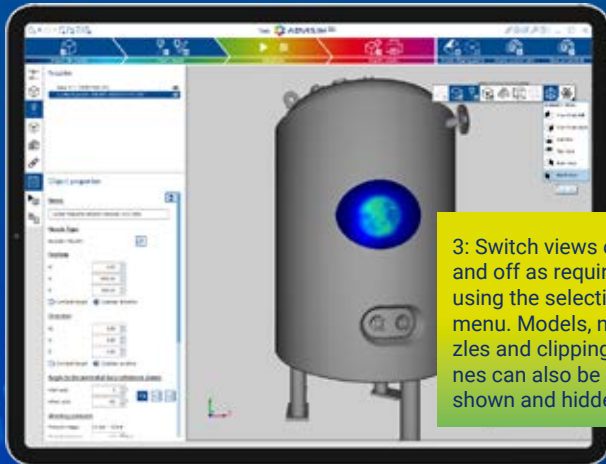
Insights into the ADVISIM^{3D} software



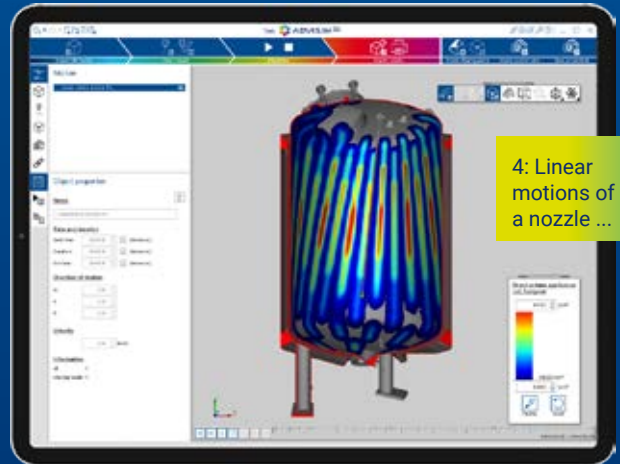
1: Import your STEP file



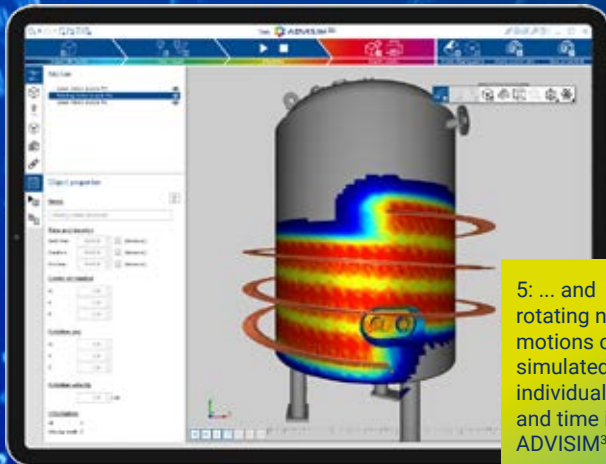
2: Select your preferred nozzle from the nozzle database



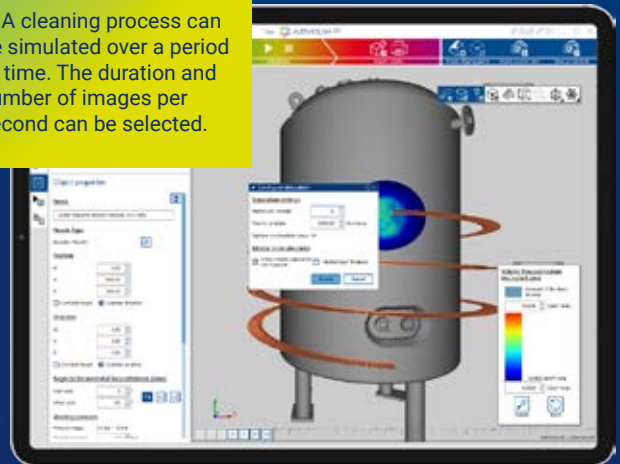
3: Switch views on and off as required using the selection menu. Models, nozzles and clipping planes can also be easily shown and hidden.



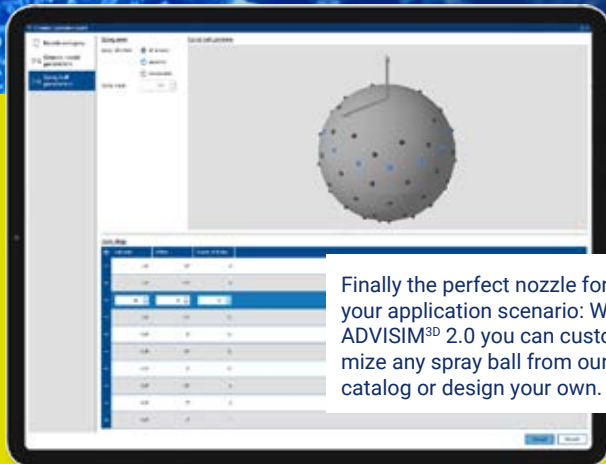
4: Linear motions of a nozzle ...



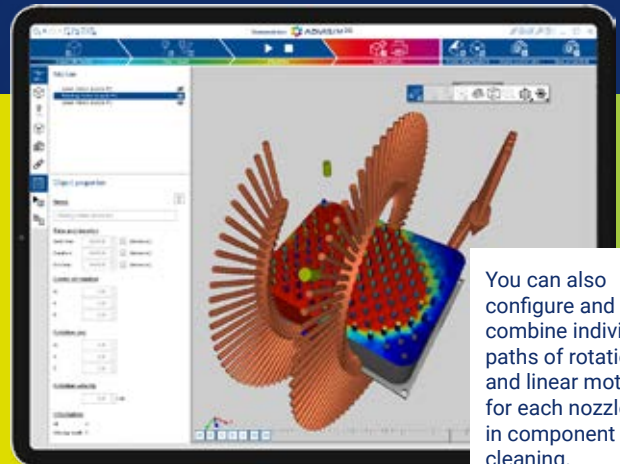
5: ... and rotating nozzle motions can be simulated with individual speed and time in ADVISIM^{3D}.



6: A cleaning process can be simulated over a period of time. The duration and number of images per second can be selected.



Finally the perfect nozzle for your application scenario: With ADVISIM^{3D} 2.0 you can customize any spray ball from our catalog or design your own.



You can also configure and combine individual paths of rotations and linear motions for each nozzle in component cleaning.



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ADVISIM^{3D}

Spray Cleaning Simulation

Perspectives and potentials



"ADVISIM^{3D} sets a previously unattained standard in the simulation of container interior cleaning. The 3D visualization and user-friendliness are inspiring. The results are precise and save costs for expensive test series and modifications."

Torsten Große

Design Manager | Standardization and Design Requirements (PADD/ENG-N) | Syntegon Technology GmbH



"ADVISIM^{3D} is the first market-ready product of our strategic development offensive „Software for industrial cleaning“. Since 2015, ADVITEC has been building up in-depth expertise in the digitisation of cleaning processes, particularly in the areas of virtual simulation and robot control. We regularly contribute our expertise to research and funding projects with partners from science, industry and politics. Our common goal is to optimize resources through more efficient cleaning processes for the benefit of the environment, society and companies."

Norbert Ebersbach

Managing Director and Product Manager in the project ADVISIM^{3D} | ADVITEC Informatik GmbH

System requirements

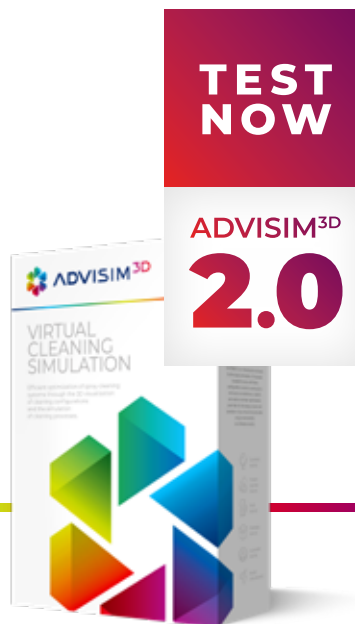
- 64-bit Windows operating system, from Windows 10
- Graphics card and driver with OpenGL 4.0 or higher
- 32 GB RAM
- Internet connection
- CAD files in STEP file format

Software subscription from 4.150 EUR net annually per license

- Unlimited installations
- 1 active user
- Support and updates included

ADVISIM^{3D} is a product and brand of ADVITEC Informatik GmbH

ADVISIM^{3D} is an industry solution from ADVITEC, which has been available with headquarters in Dresden for around 30 years of experience in managing and consulting complex IT projects and developing highly specialized software with its own engineering team. ADVISIM^{3D} is based on the SIMKOR research project on software-supported virtual cleanliness tests and the simulation of complex spray cleaning systems. It was funded by the BMBF and developed as a cooperation project with partners Fraunhofer Institute IVV Dresden and the Innovation and Simulation Service of Festenberg (ISF).



HOW YOU CAN REACH US

Find out more about ADVISIM^{3D} and its many possible applications

WWW.ADVISIM3D.COM

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