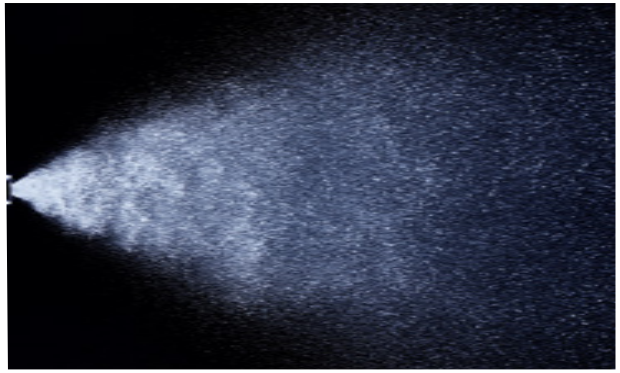

ENGINEERING
YOUR SPRAY SOLUTION
LECHLER
SUCCESS CAN
BE MEASURED

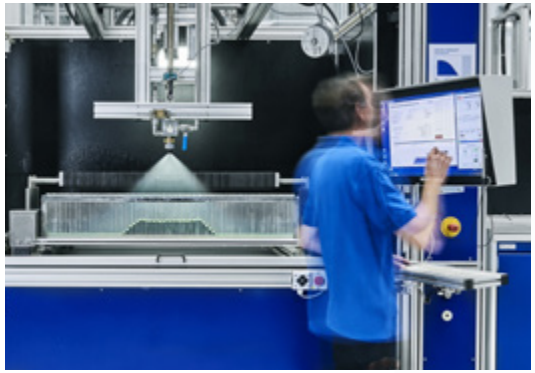
LECHLER GIVES LIQUIDS A BENCHMARK

We are the technology leader in the market for precision nozzles and nozzle systems and are the number one in Europe. Thanks to our in-depth industry knowledge and our close relationship with our customers, we know your requirements in detail and provide sustainable solutions.

The unique Lechler Development and Technology Center at the Metzingen site is proof of this. Equipped with state-of-the-art test benches, advanced nozzle measuring technology and a high-performance infrastructure, the “Lechler Spray Lab” offers the perfect conditions for practically-oriented tests and analyses. For us, for you and for your customers.





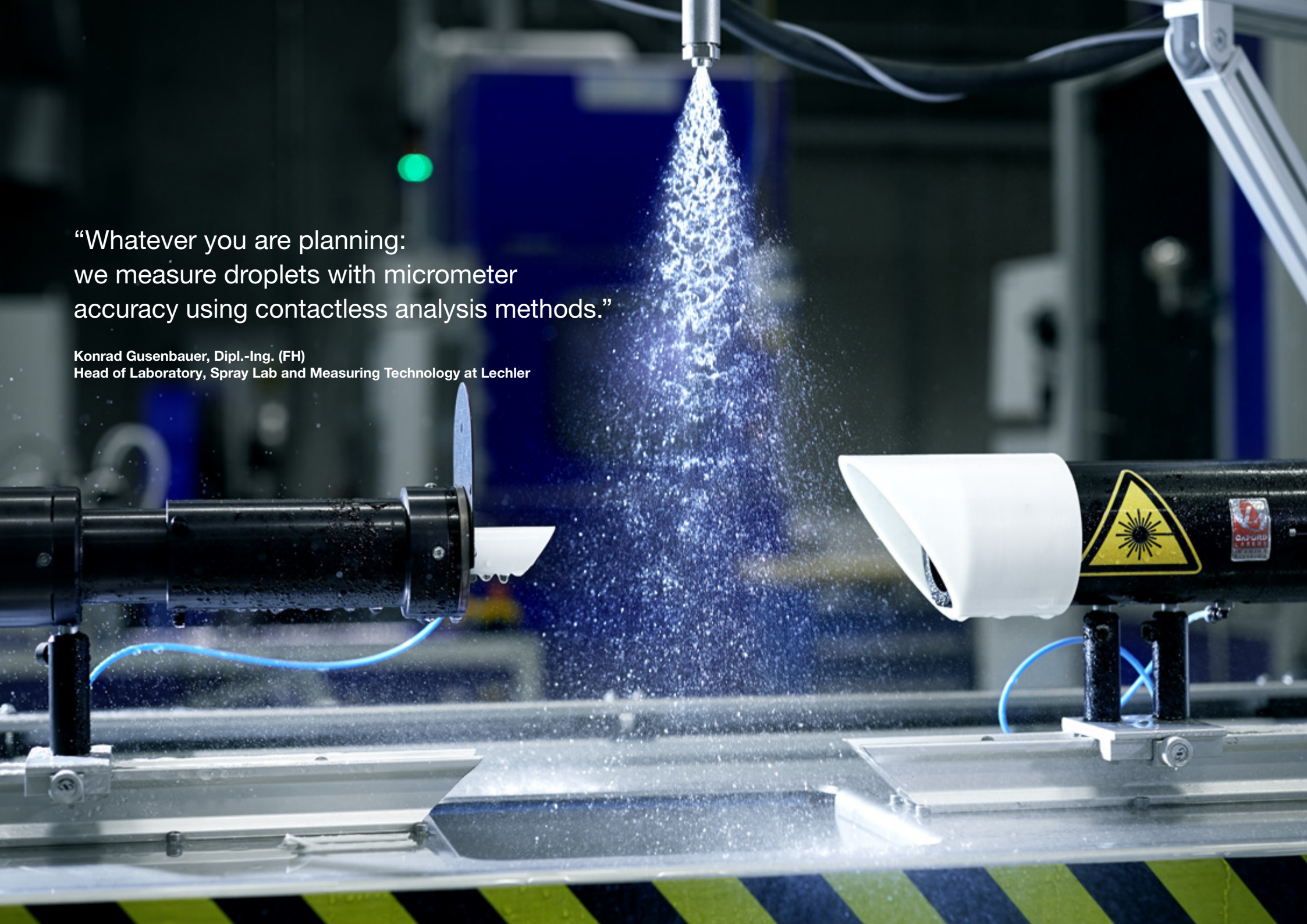


The Lechler Spray Lab is unique. It offers:

- a very wide spectrum of different, precise measuring and test possibilities
- a very large pressure and volume flow rate range
- determination of relevant parameters for practical nozzle operation
- space for large test setups



Open for your innovations: the Lechler Spray Lab.


“Whatever you are planning:
we measure droplets with micrometer
accuracy using contactless analysis methods.”
Konrad Gusenbauer, Dipl.-Ing. (FH)
Head of Laboratory, Spray Lab and Measuring Technology at Lechler

RENT OUR PRECISION – IT'S YOUR BENEFIT

Numerous inquiries show that you are not alone with your requirement for maximum accuracy. Because there are many reasons why it is interesting to find out about a spray droplet by droplet. For example, as a basis for:

- exact design of installations and sub-processes
- CFD calculations
- objective comparison of different nozzles for a specific process
- exact economic efficiency calculations

The required data can be determined precisely according to your specifications in the Lechler Spray Lab. This provides you with a solid foundation for optimizing your products and processes. A further advantage: you can choose what you need in the Lechler Spray Lab – in other words, you can use exactly the services that are most suited to your requirements.

Measurements
- Volume/mass flow rate
- Droplet size (PDA)
- Droplet size (Shadow)
- Pressure distribution (Impact)
- and much more

Visual representations
- Volume distribution
- Volume distribution 3D
- Photo
- Video
- and much more

Spray laboratory
Are you planning something big? If so, you can also rent our complete laboratory with all the measuring technology and accompany the measurements yourself on-site.

EVERY MEASUREMENT STARTS WITH A GOOD QUESTION



Only those who measure well can become better. And only those who ask the right questions will get meaningful answers. We therefore do not just support you with our measurements, but will gladly advise you on all topics relating to fluid measurement – for individual test setups, for example.

“Can a component withstand loading by nozzle sprays?” Simulation or real reproduction of a component leak test are no problem in our 600 m^2 test laboratory. (Component tightness)

“Which pump atomizer provides the optimum droplet distribution?” We measure the propagation of even the finest mists with micrometer and millisecond accuracy. (Droplet size)

“Which nozzle arrangement produces the best possible results for your process?” With more than 140 years of nozzle experience, we know what factors influence this and how we can check the results. (Impact)

“Does the fluid quantity required in the process actually reach the right location?” We precisely monitor even the tiniest flow rates of only 0.002 l/min. (Fluid distribution)





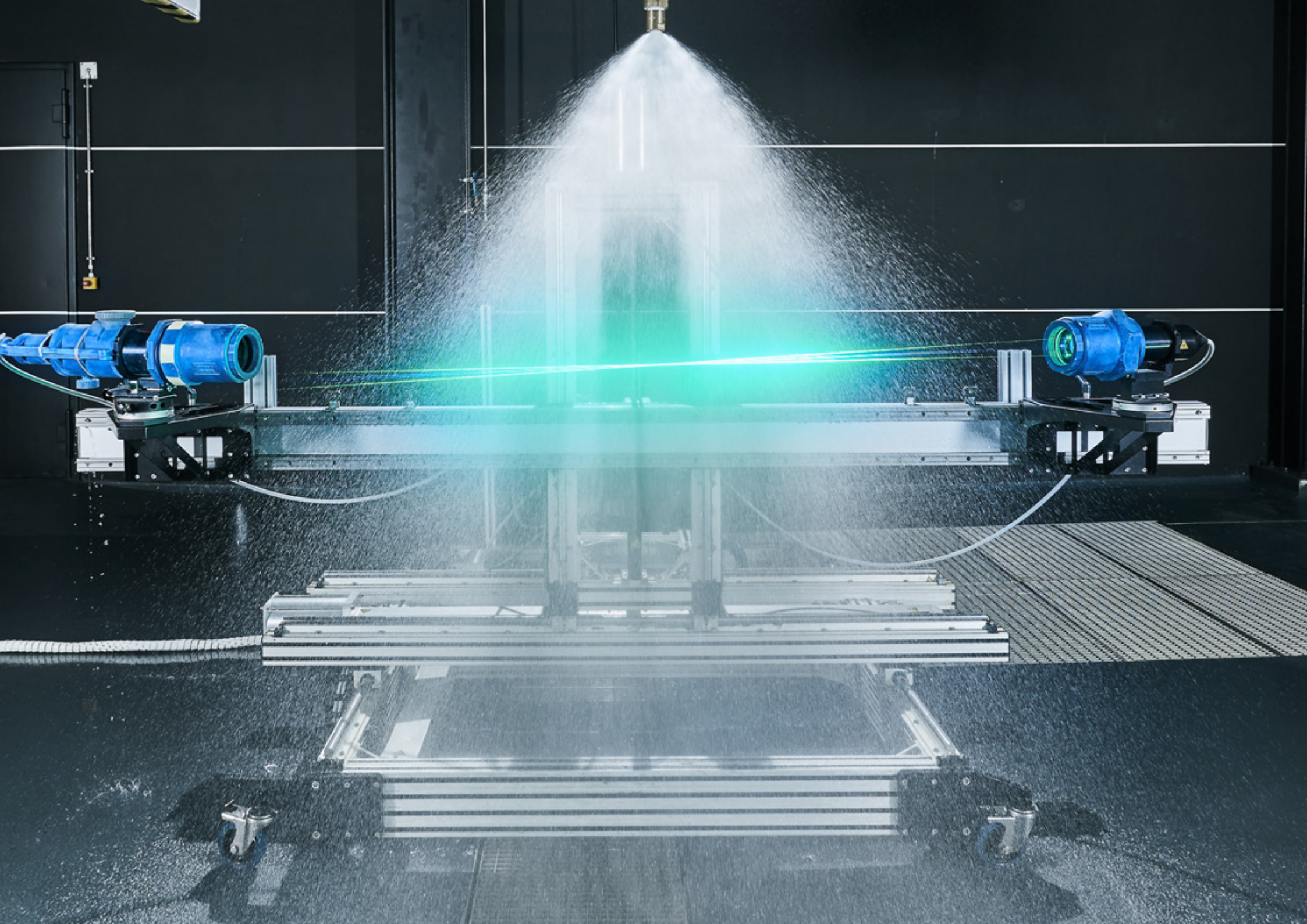
OUR REFERENCES:
THOUSANDS OF MEASUREMENTS

Recording of nozzle-specific measured values – such as volume flow rate, impact, droplet size and more – is subject to strict standards at Lechler. In many cases, specifications and measurement variables are defined in separate processes.

Measurements at Lechler are performed on specially developed test benches that are customized for nozzle applications. In addition, calibrated measuring devices and a modern quality management system guarantee reliable and meaningful results.









PLENTY OF SPACE FOR TESTING – BUT NO ROOM FOR ERRORS

In the spacious facilities of the Lechler Spray Lab we implement extensive measuring and test setups and record the relevant data with uniformly high measuring accuracy. The test rooms are also prepared for tough ambient conditions. And so that even complex measuring setups can be moved easily, every test room can be accessed with a forklift truck.



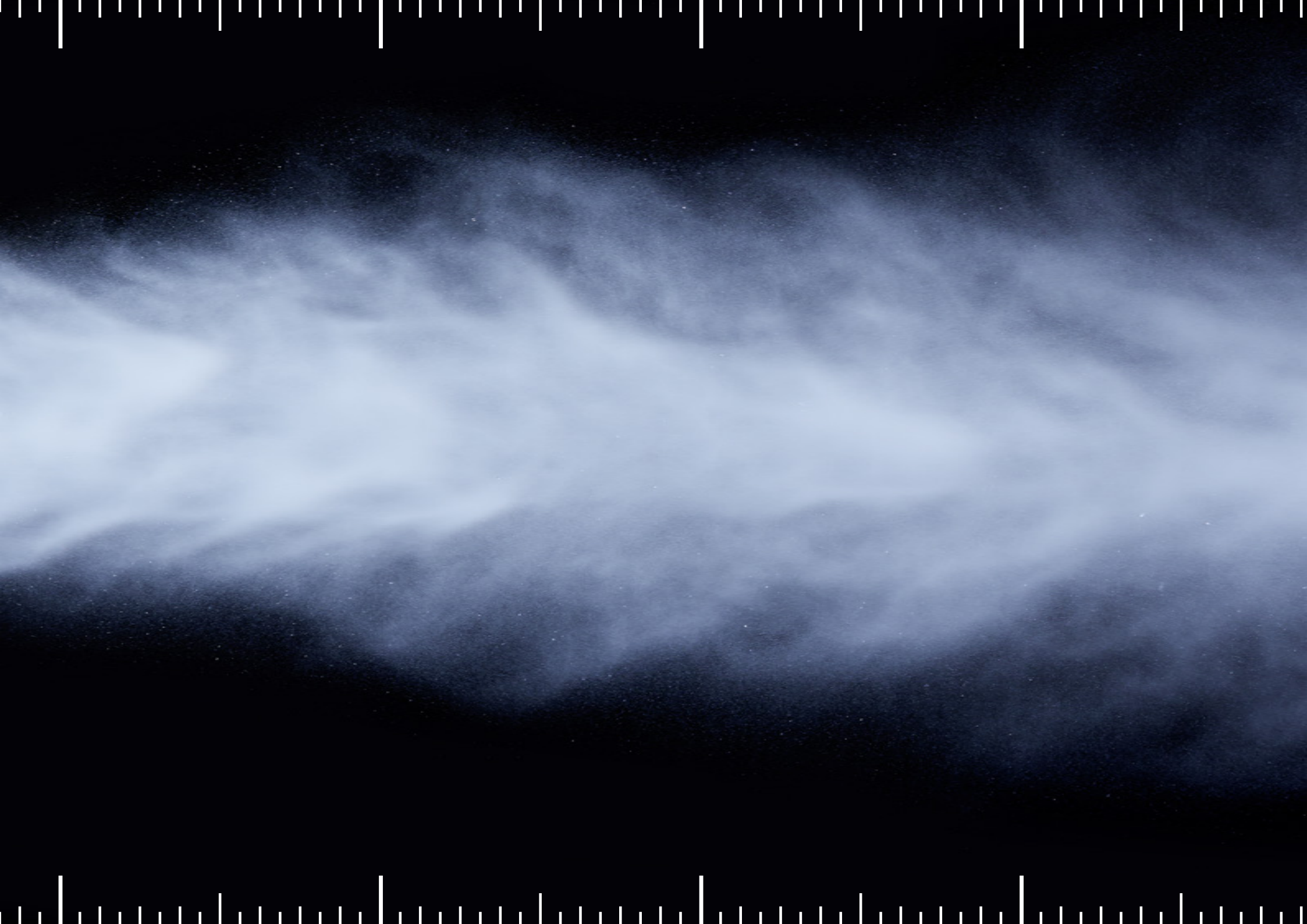


OUR TRIPLE JUMP FOR YOU: DESIGN, SIMULATE, MEASURE



Before a nozzle is used, it has performed successfully in three different disciplines: conceptually in the basic nozzle design, functionally in detailed CFD flow simulations and practically in the test laboratory.

Thanks to the close cooperation between the three competency areas of development, simulation and measuring technology, we can realize even extremely complex customer requirements quickly and precisely. We are also glad to support you in the realization of your own projects.



CUSTOMERS, UNIVERSITIES, COMPETITORS: WE MEASURE OURSELVES WITH EVERYONE

A reliable reference framework is a prerequisite for comparison of individual measurements. The Lechler Spray Lab offers exactly these reference conditions. This is where we test our own nozzle technology with uniform company standards and reproducible conditions.

We are now opening this test environment to you for the first time. We will gladly compare different products for each scenario – also with those of the competition. So you can decide for yourself: objectively, fairly and under the same conditions for all.







AND WHAT IS THE COST OF ACCURACY?

Thanks to extensive standardization of the most common test procedures, the costs for your desired measurements in the Lechler Spray Lab are reasonable – and can be calculated exactly. The price list enclosed below provides you with a few figures for your initial orientation.

We will gladly answer any questions you may have and provide you with further information at any time. If required, we will also provide you with an individual quotation matched to your needs and wishes.

Someone else was faster?
You can find our online price list here:
www.lechler.com/de-en/pricelist-measuringtechnology

www.lechler.com

Contact us:
Phone +49 7123 962-0
info@lechler.de

Lechler. Measuring
your spray solution.

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