

Best Practice

Inline Moisture Measurement of Corn Seeds

When it comes to growing corn, soybeans, alfalfa or many vegetables, it requires a high quality that produce high yields in the fields – no matter what type of soil and weather conditions. Therefore, the seeds need to be carefully selected and treated to protect the living organism inside. When the moisture level is too high there is a risk of molding, early degeneration and reduced shelf live. In case the moisture is too low the seed may not develop anymore. To meet the small moisture window an inline measurement with 100% quality control is essential.

Bulk Density Measurement of Aqua Feed Pellets

When fish feed is put into water it should act in accordance with the feeding behavior of the respective fish. This means that it should either float on the surface or sink to the bottom. These characteristics largely depend on the fish feed's density, which in turn defines the different types of fish feed, like floating, sinking or extremely water resistant. Consequently, the density of the fish flakes, granules, pellets or chips is an important aspect for the quality of the product. The moisture and bulk density can be measured simultaneously using a tubular bypass sensor that is integrated into the process. The values are measured and visualized reliably and accurately in a matter of seconds. A quick and targeted intervention in the production process is thus possible.

Areas of Application

Aqua Feed

Flakes and Meal

Compound Feed

Petfood

Feed Pellets

Pet-Treats & Snacks

Grain

Seeds

Oil Seeds

Press Cake

Advantages of Microwave



Moisture and density measurement



Measurement of core and surface moisture



Simple and longterm stable calibration



Independent of dust or dirt



Helps to reduce CO₂ footprint



Short ROI



ATEX protection possible



Industry 4.0 ready



Online-Cloud-Based support



Worldwide Service

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TEWS
MEASURABLY BETTER



**Feed & Petfood Industry
As a Partner.**

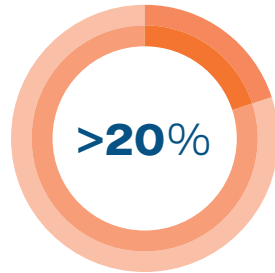
HIGH PERFORMANCE SOLUTIONS



Your production process combined with our patented solutions. The result: the most accurate data about the moisture & density of your products.

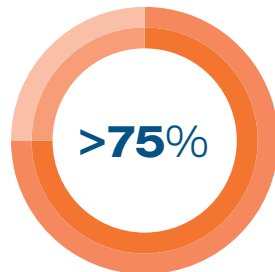
Facts and Figures

Energy



savings – due to improved dryer control

Time



faster – in the lab due to readings within milliseconds

Quality



control – of finished products like pet food pellets

TEWS Measures Moisture and Density Independently

Traditional 1 - parameter - measurement

0,12%
unknown layers

0,24%
unknown layers

0,36%
unknown layers



3 different layers of the same material with a typical 1 Parameter Method: Each layer increases the moisture → **misleading results**

TEWS - 2 - parameter measurement

8%
1 layer

16%
2 layers

24%
3 layers



3 layers of same material show the same moisture, the density is recognized and moisture result compensated → **correct results**

About TEWS

TEWS was founded in Hamburg, Germany back in 1970. Today, the company is owned and managed by André Tews in the 2nd generation of leadership. As the market leader in high performance moisture and density measurement solutions, TEWS is at the center of today's business for almost 50 years, now.

TEWS helps you streamline your processes, giving you the ability to collect and use data by applying a unique patented microwave technique across your production business. When you run TEWS high performance solutions, you run measurably better.

Let's look at your production structure together. And in a new, agile way we exchange, attach, discuss, omit or add knowledge. From this we develop new opportunities together. Bringing them into life brings your business forward at the same time. We call this Co-Improving.

