

What Is Agritech?

With the global population expected to near 10 billion by 2050, it's clear that we are going to need to produce more food to feed these extra mouths. At the same time, the agricultural industry is beset by an array of different challenges, including climate change, air pollution, land management, resource depletion and biodiversity conservation.

With that in mind, agritech is set to play an increasingly important role in the future of our food production. As an abbreviation of agricultural technology, agritech simply refers to the use of technological advancements within the farming sector in order to optimise efficiency, reduce waste, maximise yields and contribute to healthier profit margins.

Agritech in practice

Living as we are in the age of Big Data and artificial intelligence (AI), it's only logical to leverage the incredible potential of these technologies for our gain with regard to agriculture. This means using sensors, drones and other robotic equipment or machinery to gather detailed reports on crop health, ambient conditions and other important factors, then using that data to inform policy decisions.

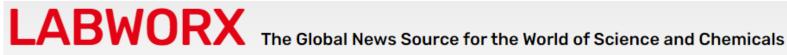
In this way, farmers can ensure that they are using exactly the right amount of water, fertiliser or other resources for the situation in question. This will not only conserve precious resources and minimise waste, but also optimise the output from crop yields.

Meanwhile, agritech can also go one better through non-traditional methods of crop cultivation. Instead of sowing and harvesting plants in a field, for example, the advent of vertical farming and hydroponics means that food can now be produced in a laboratory. This is a massive breakthrough in that it occupies far less space than traditional farming methods (meaning more land can be devoted to reforestation and biodiversity), while the food can also be produced closer to the urban epicentres where it will be consumed.

The UAE at the forefront of agritech

The agritech industry was valued at \$22.15 billion in 2022, according to Econ Market Research, and is expected to enjoy a compound annual growth rate (CAGR) of 12.5% over the next decade, culminating in a net worth of \$63.68 billion by 2031. As ever, the UAE is spearheading that incredible rise in the industry, having recently announced the launch of a first-of-its-kind agritech digital platform.

A collaboration between homegrown agricultural sustainability champions Gracia Group and integrated telecommunications company du, the platform will unite a variety of exciting technologies such as the Internet of Things (IoT), data science, AI, automation and cloud computing to revolutionize the way in which farming is carried out in the country.





As well as automating and digitizing all logistical aspects of the agricultural process, the platform also has an inbuilt e-commerce framework which connects producers, suppliers and consumers to foster a sense of community. As such, it's a one-stop shop for the entire farming world, from the farmers on the ground to the producers utilising the ingredients to the vendors selling the products to the citizens buying them.

