

B100 P Drone Photovoltaic Cleaning



B100P Photovoltaic Cleaning Drone

Nowadays, photovoltaic power generation has been widely used. Due to environmental factors and long-term use, photovoltaic panels inevitably accumulate dirt and dust, greatly affecting power generation efficiency.

However, manual cleaning of photovoltaic panels has always been an industry challenge. So we propose a more efficient solution - B100 p photovoltaic panel cleaning drone.

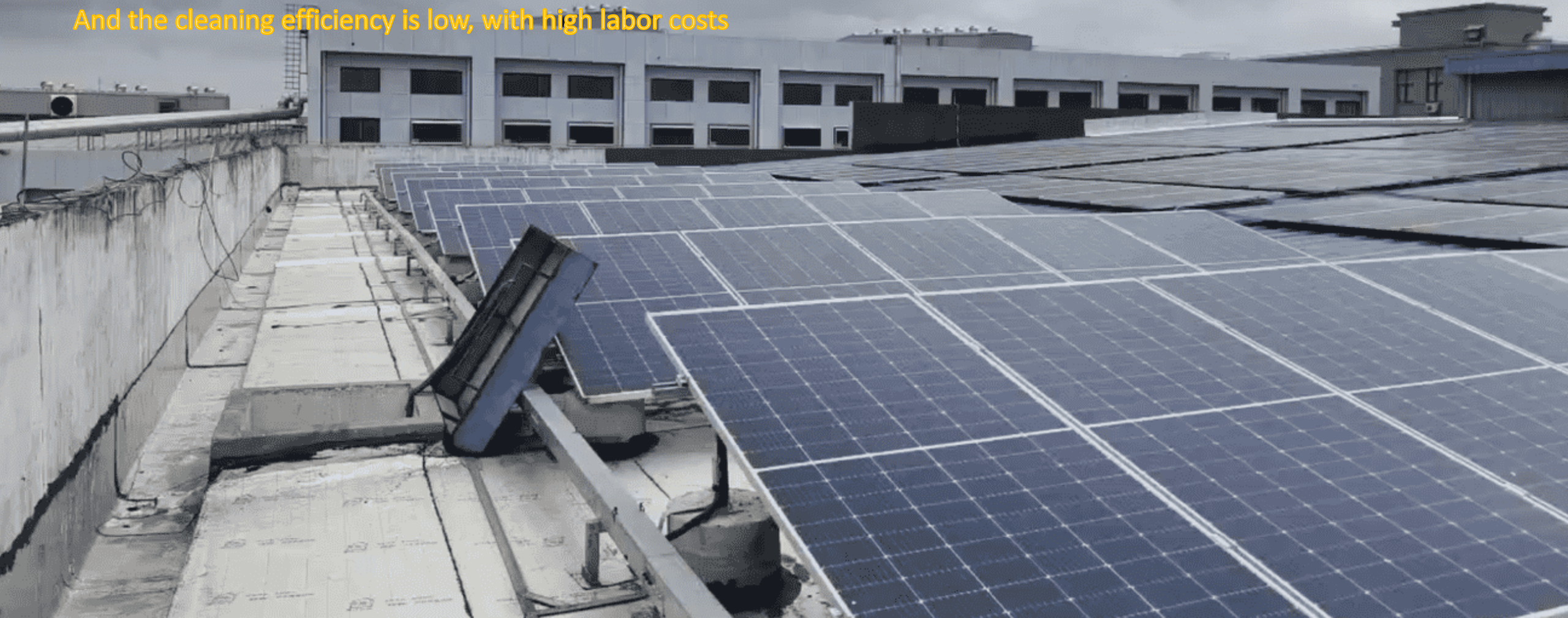
B100p is a drone with a large payload of 50kg. The oversized medicine box can carry 50L of cleaning solution each time, and automatically or manually cleans the photovoltaic panels through high-pressure swing cleaning nozzles and high-power water pumps.

The maximum flight speed of B100P drone can reach 13.5m/s, and the single cleaning width can reach 5 meters; Equipped with high-definition intelligent gimbal, real-time viewing of cleaning effect, inspection of photovoltaic damage or other situations



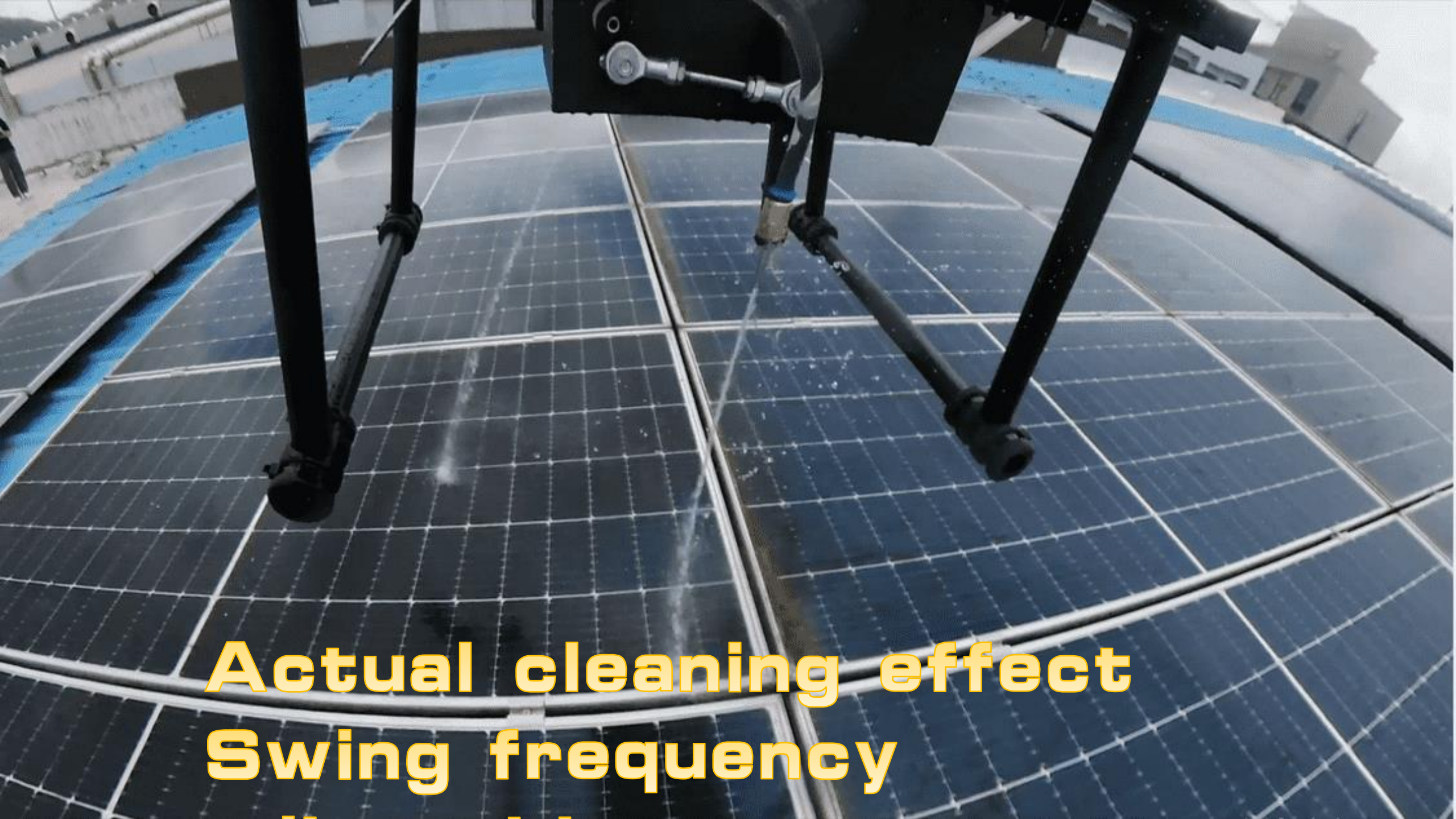
Photovoltaic panels on high-rise buildings

Solar photovoltaic panels are usually placed on the top floor or built in mountainous areas
For large-scale installation of photovoltaic panels, the problem faced is that it is time-consuming and laborious to transport manpower and materials,
And the cleaning efficiency is low, with high labor costs





Swing high-pressure nozzle



Actual cleaning effect
Swing frequency

Operate the drone for cleaning through the ground station, with a maximum flight altitude of 120m and a maximum flight distance of 1000m
Equipped with a high-definition camera, the cleaning effect can be viewed in real-time, remote takeoff and landing are possible, and water and battery replacement are more convenient, Effectively improve cleaning efficiency

Intelligent software application, capable of fully automatic operation, only requires measurement of the cleaning area in advance, and the APP automatically plans the route

B100P drone cleaning photovoltaic panel



Drone cleaning process



Can take off and land on the ground, the APP will automatically record the take-off point, combined with automatic return function

Only complete operations such as adding water, cleaning agents, and replacing batteries on the ground, which is convenient and fast

Only 1-3 people are needed to clean a large area

Drone cleaning process

A white quadcopter drone with a camera is flying in the air, positioned between a building with solar panels and industrial equipment on the left, and a multi-story building with many windows on the right. The scene is set on a rooftop or industrial site.

Optional high-definition camera, real-time view of surrounding environment, remote inspection of cleaning effect

It is also possible to inspect the photovoltaic status

Optional 10/20km ground station for easier remote control

Drone cleaning process

An aerial view of a solar farm on a blue corrugated metal roof. A small black and white drone with a blue tank is positioned over a grid of solar panels, spraying water. The panels are arranged in neat rows, and the drone is in the center of the frame, slightly lower than the middle.

High pressure swing cleaning nozzle, cleaning stubborn stains
High efficiency water pump, pressure of 5 kilograms, effective
spray cleaning distance of 10 meters

Drone cleaning process

A high-angle, wide shot of a rooftop solar farm. The roof is covered with a grid of dark blue solar panels mounted on a light blue corrugated metal structure. A small, white and blue drone is positioned in the center of the frame, hovering over one of the solar panels. The drone has four rotors and a small payload. In the background, other buildings and a city skyline are visible under a clear sky.

Brushless centrifugal nozzle, fine water mist
Complete the cleaning of photovoltaics



Can be equipped with high-definition intelligent cameras

Quick inspection of rooftop photovoltaic panels to quickly identify dirt, damage, or other conditions on the panels
Significantly improve the efficiency of investigation.

B100P

Photovoltaic cleaning kit



B100P drone equipped with AG6 flight control system

Integrated Multi Module Integration

Enrich peripheral interfaces

Multiple hardware protection

The module circuit is concise and clear

High robustness control algorithm

Stable flight with heavy load



Product Features

PWM/CAN

Supports two types of signal driven power systems, with reliable interference performance and power data recording function



Strong seismic resistance

Unique shock absorption design and filtering algorithm, high vibration adaptability, stronger model adaptability



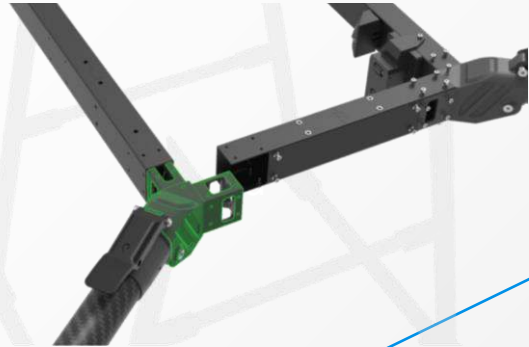
No need to wait for star search

Large capacity UPS, system hot start, no need to wait
Waiting to search for stars, immediately enter the homework after replacing the battery



B100P High strength integrated modular design

High strength connectors



- The connecting parts of the boom adopt integrated die-casting technology, with higher strength and an open frame design, making it easier to maintain the aircraft. The maximum load-bearing capacity of the flight platform is 400KG

Foldable arm
Four link locking



- Adaptive adjustment, fearless of virtual shaking; The locking method of folding the four-bar linkage up and down minimizes the risk of explosion caused by loose, deformed, or broken buckles.

Vertical folding storage



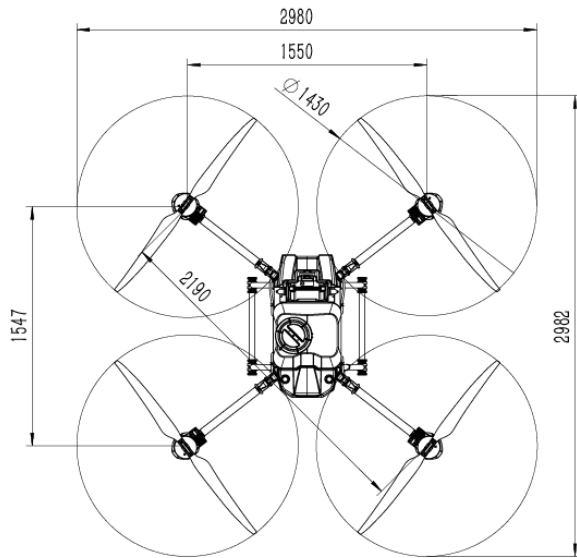
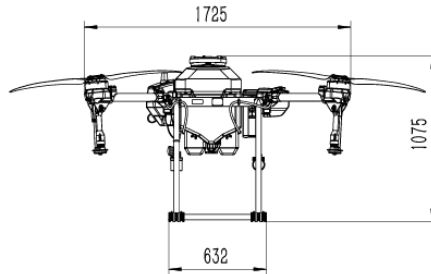
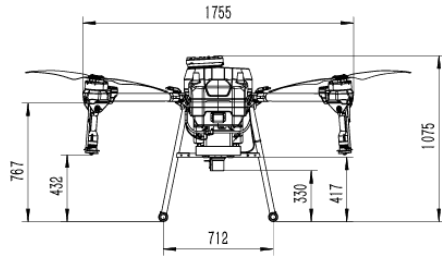
- Quick folding of the robotic arm
Expand: Efficient homework, fast transition

Flexible modification
Easy adaptation to various modules



- Wide scalability, compatible with various peripheral modules, meeting the usage scenarios of multiple industries

parameter



wheelbase	1850mm
Medicine box capacity	50L
Empty aircraft quality	55kg
Expand size	1725*1755*1075mm
Folding size	1030*835*1075mm
Blade diameter/pitch	56*20 inch
Takeoff weight	105kg
Pump pressure	5kg
Effective spray cleaning distance	10米
Battery	18S 30000amh