



## 5X-12 Seed Cleaner & Grader

High standard cleaner removes light impurity, small impurity, big impurity.

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ISO  
9001:2008  
REGISTERED



SGS



**SYNMEC**

The world top Manufacturer for Grain Cleaning Solutions  
Adviser Seed Processing



## INTRODUCTION

5X-12 Fine Seed Cleaner is used for cleaning and grading seeds, grains, cereals, and other granule products.

It can be equipped to suit a variety of special jobs and purposes.

Dust and light impurity are removed by aspirator fan and bottom blowing fan. Material falls on sieve layers and was separated by sieves according to width and thickness difference. All the oversize and undersize impurities were discharged from different outlets.

## FEATURES

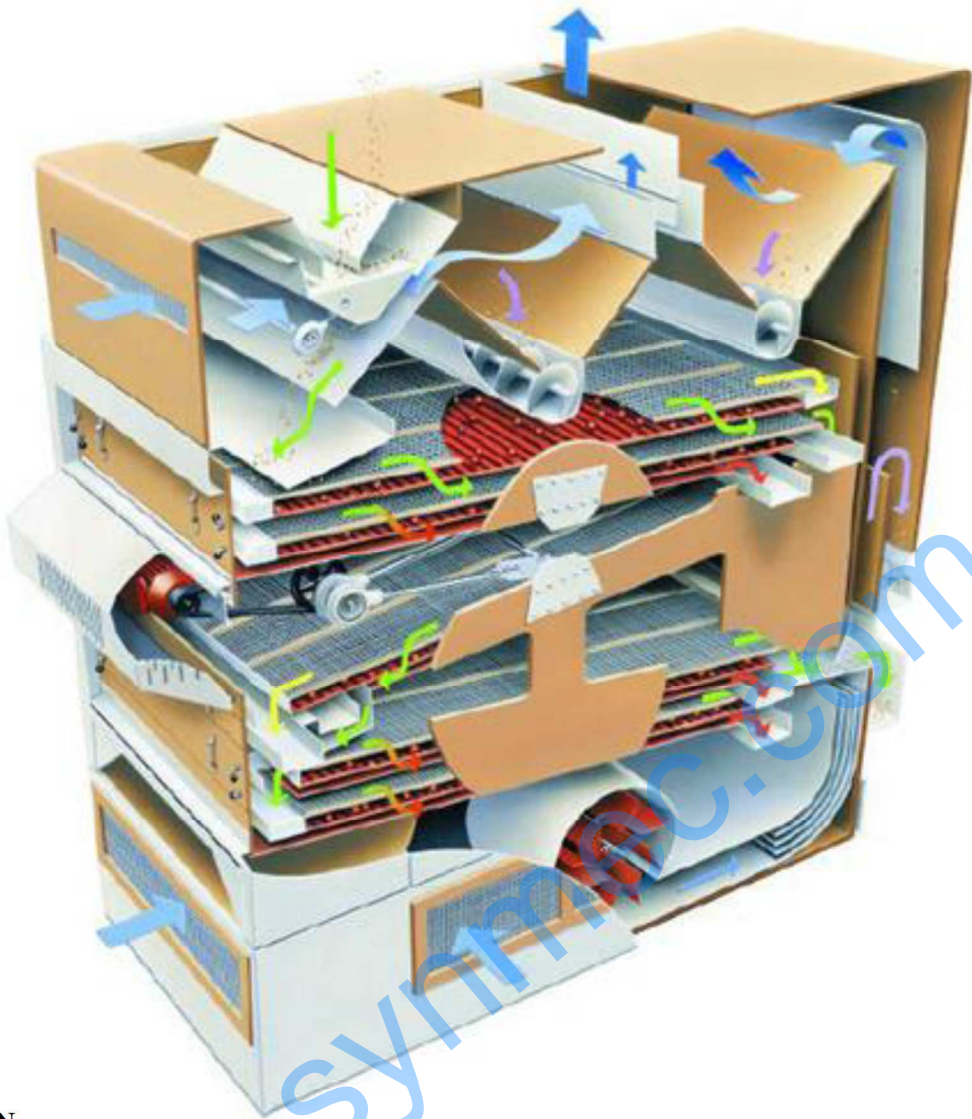
5X-12 Fine Seed Cleaner is basic and most favourite cleaning machine in seed and grain industry of global market, with high efficiency, excellent performance, wide application.

It is suitable for processing all kind of seeds, cereals, grains species and crops, such as wheat, paddy, rice, barely, maize, millet, cumin, sunflower seed, soybean, coffee bean, cocoa bean, oil seeds, etc.

Customized screen hole size and various machine combinations allow the Fine Seed Cleaner to be used for a wide range of applications and increase grading efficiency.



5X-12 Fine Seed Cleaner ensures excellent efficiency and purity in the cleaning of all kinds of crops by removing undesired elements and potentially dangerous impurities with high precision.

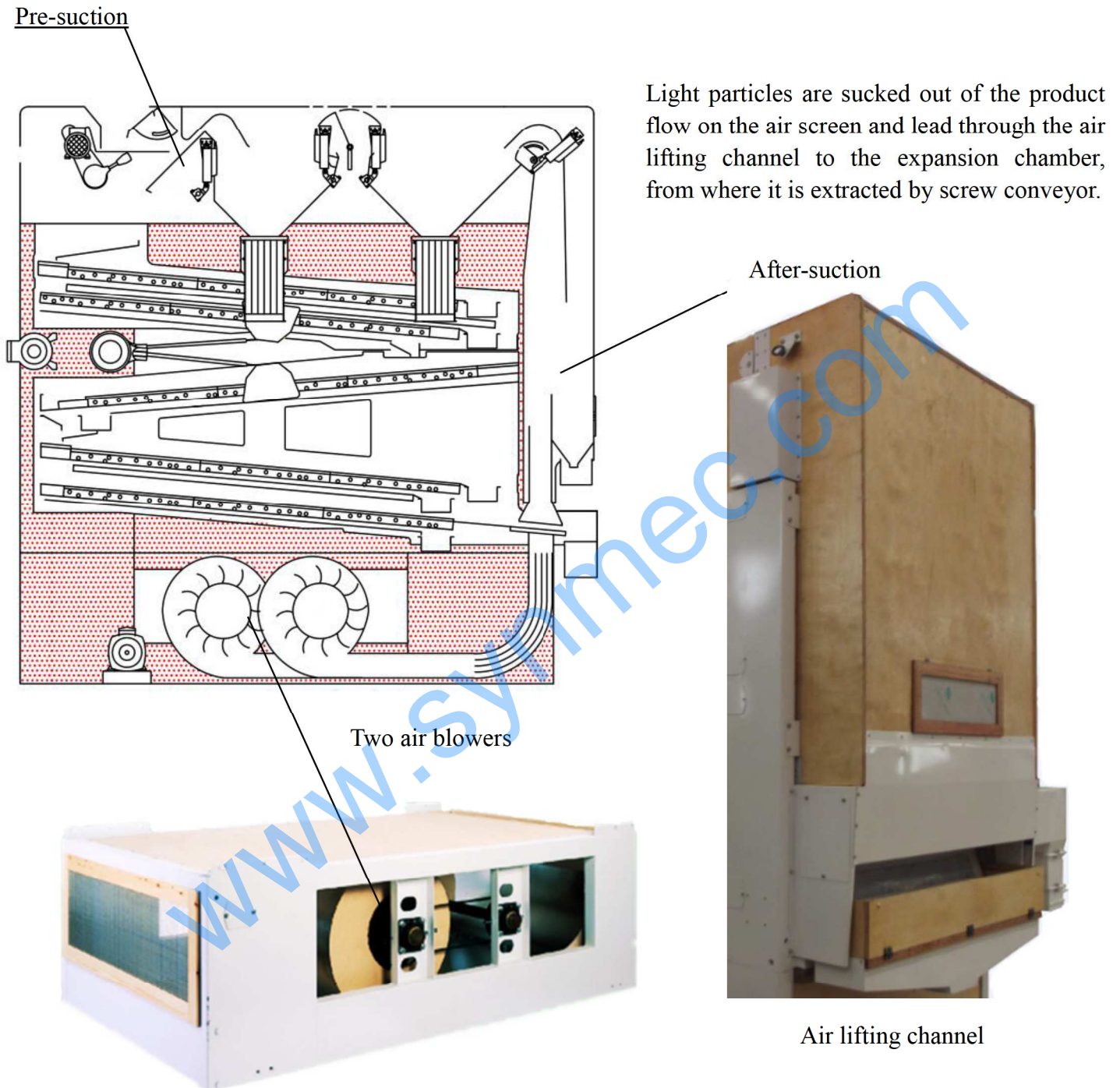


**SPECIFICATION**

Model	5X-12
Dimension(L×W×H)	3720×1750×4060 mm
Overall weight	3600 kg
Rated capacity	12 Ton/h
Overall air volume	12520 m <sup>3</sup>
External air blower	4-79N0-6A, 11 kW
Vibration sieve motor(gear motor)	2.2 kW
Back lifting system motor	3.0 kW
Feeding motor	1.5 kW
Total Power	6.7 kW
Air Blower Type	centrifuge air blower
Top air blower Rotary speed	4-79NO6A,1400 r/min
Back lifting air blower Rotary speed	100~1000 r/min
Screen Type	piercing screen
Each Screen Dimension (L×W)	800×1250 mm
Frequency	300(80~400) times/min
Amplitude	30 mm
Layers and number	5 layers,15 pieces
Total Screen Area	15 m <sup>2</sup>

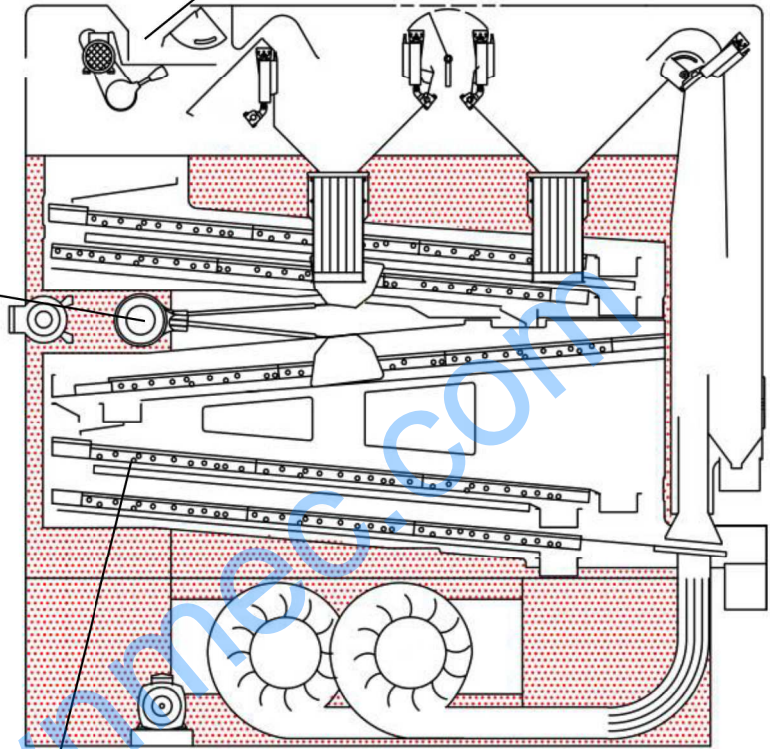
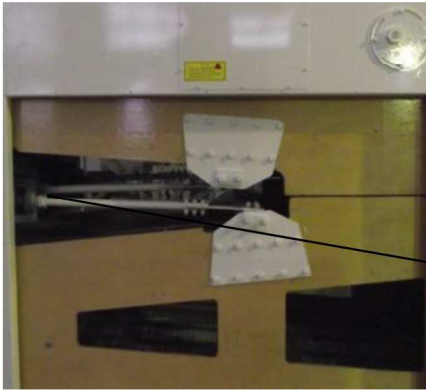
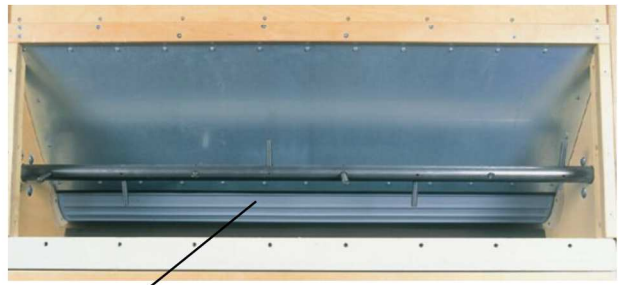
## AIR SEPARATION SYSTEM

The airlifting system consists of the airlifting unit providing a positive air flow from below the product and the negative air from the after-suction above. The unit is equipped with two staggered fans which ensure a homogenous air flow through the product on the final air screen. This combined with the electronic control system provides the most precise air separation adjustments on the market.



Ensure a homogenous airflow and support the after suction considerably. Delivered with frequency regulation. The system is used to separate light grains with low germination, from the final product, by blowing the light product up into the airlifting channel, and separated in the expansion chamber the husk will be lifted in to the after suction blower, and the light kernels will fall in to the middling outlet.





The eccentric system is designed to drive the screen shoes and create a gentle flow of product through the machine. The weight of each screen shoe is optimized to ensure a well-balanced and smooth motion. Supplied as standard with flywheel to recapture the force created by the movement of the screens shoes and reduce the power consumption.



Screens are designed for highest possible efficiency and are effectively kept clean by rubber balls in special designed ball boxes. A high percentage of open area ensures maximum capacity in the machine. The screens are effectively kept clean by rubber balls in newly developed ball boxes. It is not necessary to take out the ball boxes when changing screens.

The screens shoes are made in coated marine plywood to ensure a long lifetime. With its strong and flexible structure, this material is extremely resistant against the constant movement in the machine. Wear areas inside the screen shoes are protected by easy replaceable plates in hardened steel.

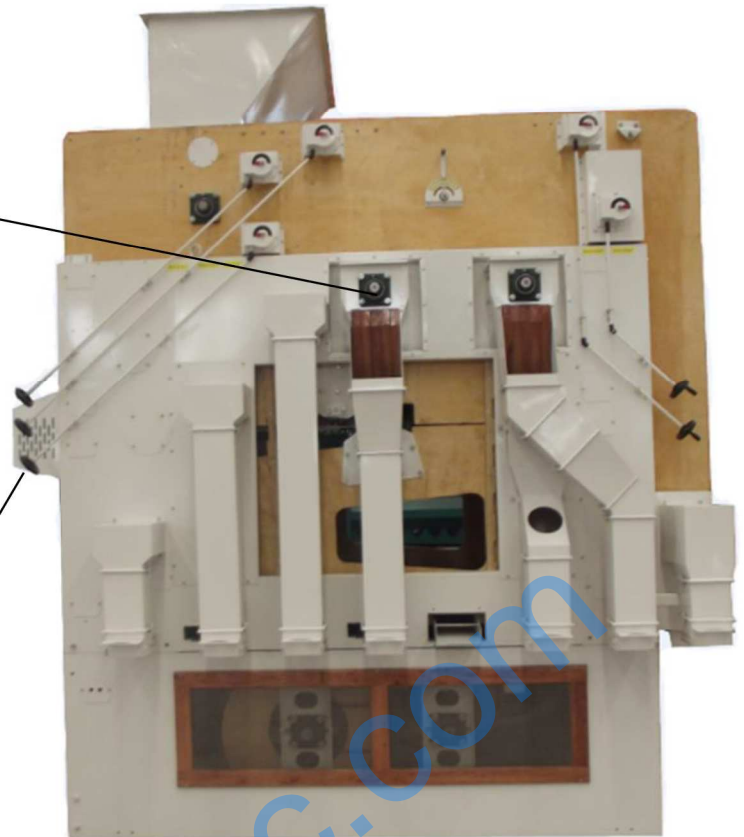


### **Screw conveyor**

Ensures continuous discharge of dust/light waste from air system

### **Easy to operate**

All the adjustment handles are placed at a suitable height for easy operation



### **Strong handles and screws:**

Every wood cover has two screws and handles. This kind of design is better to remove the wood cover for change the inside sieves.







### **Balanced eccentric system**

This system has counter weights for best steady running.

This system has high quality bearings.

The driveshaft with high quality and minimum stress. Better to running.

High quality screws and connecting plate fit driveshaft working well.



### **Inspection window**

This machine with a big inspection window, can be better to check the grains cleaning effect anytime.

### **Sieve bed**

The sieve bed has a certain angle, can make the grain of liquidity play better under their own gravity.



### **The power distribution box.**

(The machine excludes power distribution box, which you can order separately.)

Safety control

Main power

Air blower running and stop

Vibrating running and stop

Feeding running and stop

Frequency control for vibration speed

Frequency control for air volume

Emergency stop button



### **The inside of power distribution box:**

High quality frequency inverters

High quality switches

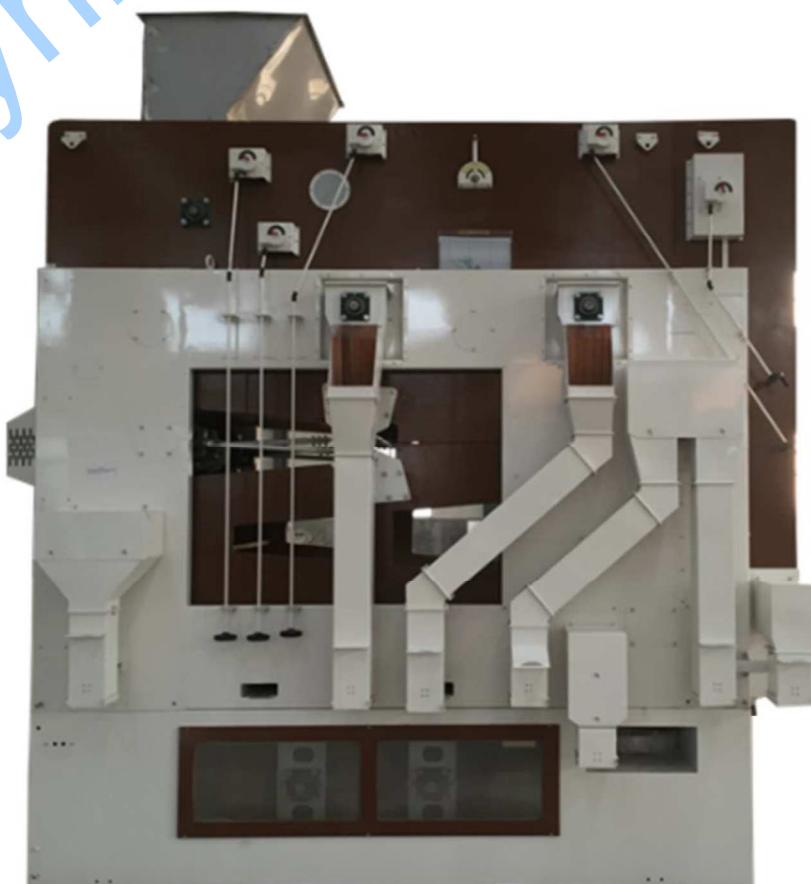
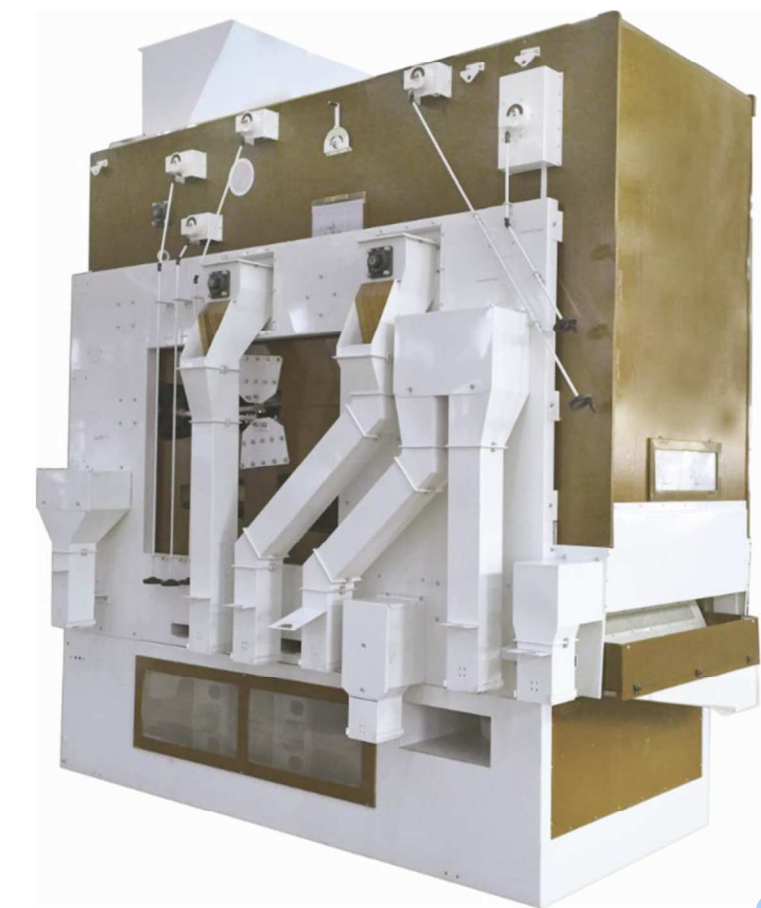
High quality electric wire

Perfect power wire connection

All are good quality ensures people safety and working well.



**VARIOUS ANGLES SHOW:**



## 5X series fine seed cleaner in SYNMEC overseas seed processing plant



10T/H Barley seed processing plant in Australia



8T/H Soybean, red kidney bean, lentil, chickpea and 6T/H sesame cleaning plant in Ethiopia



5T/H Rice seed processing plant in Ecuador



8T/H Red kidney bean and 6T/H sesame cleaning plant in Ethiopia



1T/H quinoa processing plant in Australia



5T/H Bean cleaning plant in Saudi Arabia



We are the best choice for you!

## Factory view



## We have professional manufacturing equipment!

Drilling and milling machine	CNC lathe	Laser cutting machine
		
Plasma cutting machine	Bending machine	Shearing machine
		



**We can provide over sea machine assembly and staff training services!**



**We have strong production capacity!**



One time produce 6 sets 5XZD-15AC



One time produce 33 sets QSX-85 Destoner



One time produce 40 sets 5XZ-6 Gravity Separator



One time produce 30 sets 5BY-5B Seed Coating Machine



**We have customers all over the world!**





# Healthy Grain, Pretty Beans, Strong Seed. SYNMEC

We serve for



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