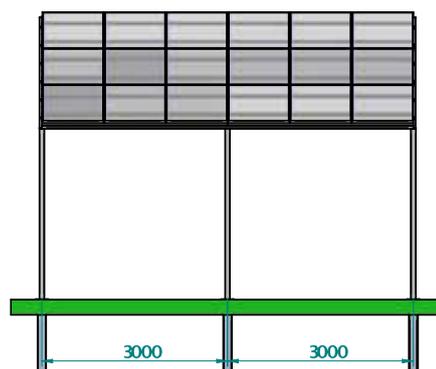
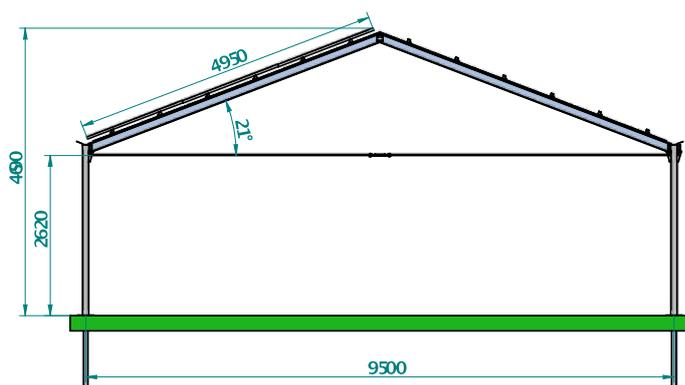


KAPPA

MODULAR STRUCTURE WITH DOUBLE FUNCTION OF GREENHOUSE AND ENERGY PRODUCTION. THE KAPPA SYSTEM IS SUPPORTED ON FOUNDATION AND IS INTENDED FOR INSTALLATION ON FLAT LAND OF DIFFERENT CONFIGURATIONS.

MODULAR ELEMENT CONFIGURATION OF THE "KAPPA STANDARD" VERSION:



**3 VERTICAL MODULES
3 HORIZONTAL MODULES**

**Maximum HMIN: 2,620 mm
Maximum HMAX: 5,000 mm**

Kappa	Rows	Column	Alfa	Xpv	Ypv	X	Y	H.min	H.max	Modules
Layout	Nr.	Nr.	°	mm	mm	mm	mm	mm	mm	Nr.
V	3	3	21	990	1650	9500	3000	2620	5000	9

ADVANTAGES:

- Total MODULARITY system during plant configuration and adaptation to the planned lay-out;
- Standardization and reduction of components with consequent simplicity and speed of installation;
- Hot galvanized elements to grant the durability against the atmospheric conditions.
- Arrangement for different covering and closing systems (polycarbonate, nylon sheets, anti-aphid nets);
- Arrangements for front or lateral opening systems.

10 YEAR WARRANTY - EUROCODE 1 CERTIFICATION DISPOSAL OF THE WHOLE SYSTEM AT ITS LIFE END

COMPONENTS

FOUNDATIONS

The standard solution foresees the use of a hot galvanized laminated steel column (IPE100) to immerse into the concrete casting. Depending on the ground characteristics, different solutions can be evaluated using large screws driven into the ground or with continuous foundation beams made in reinforced concrete.

COLUMNS

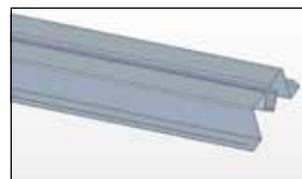
The lateral and intermediate supporting columns are made of hot galvanized tubular steel with high resistance (100x80x3 mm). They are designed for installation of possible anti-wind stiffening structures or of the necessary buffering supports.

GROUNDWATER BEAM

The groundwater beam provides a monolithic solution with the use of rolled and hot galvanized profiles (IPE140). The truss is completed by the necessary flanged and bolted joints and by containment chain made of laminated Ø14mm, regulated and required in the work.

CROSS-MEMBER

The cover supporting crossing elements (both on the photovoltaic side and on the free side) are made of hot galvanized steel with high resistance. The cross-member have an omega-shaped open profile to facilitate the modules fixing and to ensure the total absence of rain water stagnation.



GUTTERS AND DOWNSPOUTS

In order to ensure the perfect fastening, the structure presents a gutters and downspouts system for the water gathering and discharge.

SIDE AND FRONT CLOSING SYSTEMS

The structure is arranged for common closing system as nylon film, polycarbonate, anti-aphid net, or for mixed solutions as polycarbonate "skirts". In the side panels opening doors can be opened to allow the logistic management of the greenhouse. In frontal closing system it is possible to have sliding doors if we insert the bracings necessary to the tightening of mobile structures.



Each plant is dimensioned to support the wind and the snow overloads, accordingly to the specific site conditions where it is installed. For each plant, we present the 10 years Guarantee Certificate and the declaration of entire system disposal at the life end.