



## CUVI-02. Soybean (*Glycine max* Merrill) cultivar with high productive potential and tolerant to virosis

### CUVI-02. Cultivar de soya (*Glycine max* Merrill) de alto potencial productivo y tolerante a la virosis

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**ABSTRACT:** At the National Institute of Agricultural Sciences, individual plants with high productive potential were selected from the DT-02 variety from the Agricultural Genetics Institute of Vietnam (AGI). After four cycles of selection and validation in different provinces, the CUVI-02 cultivar was registered, which stands out for its high productive potential and tolerance to virosis.

**Key words:** selection, mutation, virus, yield, cultivar.

**RESUMEN:** En el Instituto Nacional de Ciencias Agrícolas se realizó la selección de plantas individuales de alto potencial productivo a partir de la variedad DT-02, procedente del Instituto de Genética Agrícola de Vietnam (AGI). Después de cuatro ciclos de selección y validación en diferentes provincias se registró el cultivar CUVI-02 que se destaca por su alto potencial productivo y tolerancia a la virosis.

**Palabras clave:** Selección, mutación, virus, rendimiento, cultivar.

## INTRODUCTION

Soybean (*Glycine max* Merrill), native to northern and central China, has been an ancient food of the people of the East. It is considered a strategic crop due to its high protein and vegetable oil content, of great importance for human and animal nutrition. This species has the advantage of being able to fix atmospheric nitrogen, making it less dependent on chemical fertilizers.

Taking into account the high demand for soybean in our country and the need to reduce soybean imports, a selection breeding program was developed to obtain Cuban varieties with high productive potential in our soil and climatic conditions.

## ORIGIN AND DESCRIPTION

Seeds of the DT-02 variety from the Germplasm Bank of the Agricultural Genetics Institute of Vietnam (AGI) were

sown in 2006 at the National Institute of Agricultural Sciences (INCA). During three years, sowings were carried out in different months of the year (April, May, June, August, September) and individual plants with high productive potential under our conditions were selected. An asymptomatic plant to geminivirus that had affected the plantation under natural conditions was identified and after four cycles of selection, the CUVI 02 cultivar was obtained, which was validated for three years in Mayabeque, Holguín, Pinar del Río and Matanzas and was registered as a commercial variety.

This variety is characterized by its high yield potential (2.9-3.7 t ha<sup>-1</sup>) and tolerance to geminivirus. The optimum planting time is from May to July, but it can be grown all year round. It has a cycle of 85 to 90 days, a plant height of 90-105 cm and a height to first pod of 10-12 cm, suitable for mechanized harvesting. Its flowers are purple and it has large cream-colored grains and carmelite hilum ([Figure 1](#)).

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**Figure 1.** Characteristics of cultivar CUVI-02.