SHIKAMOO®, Ornamental Sunflower Seeds

For the last few years, Dutch company H.W. VAN DER VELDE B.V. has been deeply involved in the breeding of cut flower Helianthus. The breeding programme is aimed entirely at the professional cut flower grower. In order to achieve the maximum number of breeding cycles per annum, one or two cultivation batches take place in Tanzania every year; this in addition to the main trials in the Netherlands. In order to be able to guarantee the quality and continuity of these, the company entered into collaboration with VASSO AGROVENTURES LTD. They have a regular team of employees that is involved in cross-fertilization and making observations on a daily basis. Seed production takes place in insect-free mesh cages, thus insuring that undesired cross-pollination is avoided. There are 14 large compartments available with a surface area of approx. 6,000 m². The collaboration in breeding and seed production of ornamental sunflowers for the professional cut flower market between H.W. VAN DER VELDE B.V. and VASSO AGROVENTURES LTD. takes place under the SHIKAMOO® brand name. This name means “respectful greetings” in Swahili, the native language of Tanzania.

Spring/summer 2011, commercial trial seed of the first experimental hybrid will become available. This variety was initially tested under number VV10-1 and has been named ‘Jua Maya’. The name Jua® (which is Swahili for sun!) is also protected as a brand name by the collaborating breeding partners.

SHIKAMOO® introduces and sells its new sunflower hybrids via HANDELSWERKERS H.A. VAN KLING & ZN. B.V.. This with the exception of North and South America and Canada. Also some other countries will be supplied via other local agents. Easy find your local supplier by sending an e.mail message to sales@shikamoo.nl

The seeds of SHIKAMOO® varieties are sold exclusively in their original resealable packaging in units of 20,000 seeds.

-No rights can be derived from the following information. This was drawn up on the basis of currently available knowledge and experience-

Helianthus annuus ‘Jua Maya’ (VBN-code: 109347)

‘Jua Maya’ has deep golden yellow ligulate or ray flowers with a pure, truly black centre. It is a pollen free F1 hybrid. Its leaves are remarkably dark green and look very healthy, especially when compared to the best-known popular varieties. This variety has anthocyanin in its genetics, which results in the stems turning a very dark colour in cold nights during the cultivation period. During the flowering period, ‘Jua Maya’ bears relatively fine leaves under the flower (top leaves). Another thing that catches the eye is the fact that the bottom leaves on the stem are still green and healthy when harvested. Under long-day conditions, multiple rows of ray florets are initiated in the bloom.

The standard cultivation period in the Netherlands and similar growing areas is the sowing period from 15 April until 15 July. (week 15 up to and including week 28). This means that the variety flowers 10-20 days sooner than ‘Sunrich Orange’. When the temperature is sufficient (natural day >15°C), one can use a cultivation period of approx. 60 days from germination to harvestable stem as a guideline. Under the best possible conditions, the cultivation period under long-day conditions (period of 14-16 hours of light per day) is approx. 55 days. Under short-day conditions (12 hours of light during the entire cultivation period), a cultivation period of approx. 45 days is possible. However, at such an extremely short cultivation period, one should expect the flower centre to be smaller in diameter (approx. 6-8 cm). In order to allow better flower development, it is advisable to
grow the plants for the second half of their cultivation period under long-day conditions (>14 hours of light).

Greenhouse production is possible, at a maximum of 32 plants per m\(^2\). Watering should be limited or stopped entirely from 2 weeks after sowing. If necessary,correctively inhibit using Alar (200 – 350 gr/100 litres) from 4 weeks after sowing. However, additional experience is needed and results will vary under different growing conditions.

In outdoor cultivation, a plant density of maximally 18 to 22 plants per m\(^2\) is advisable.

This variety was mainly developed for cultivation under long-day conditions. Under long-day conditions, ‘Jua Maya’ does indeed initiate flower buds.

In 2011, we will have to establish how the variety behaves exactly under different growing conditions (across the whole of Europe and beyond) by means of broadly set-up cultivation trials.

With regard to the number of seeds per gram; because we are going to deliver in units of 20,000 seeds, their specific gravity is of no real consequence. The seeds will be fractionated per pack/lot; this in order to improve on uniform sowing. The quantity of seeds per kilo varies from one lot to the next. The average weight per 1000 seeds is between 60 and 75 grams. That is approx. 20% more (heavier seeds) as compared to most existing varieties of third parties and results in slighter faster emergence (shorter germination period).

As a standard, all ‘Jua Maya’ seeds as delivered by SHIKAMOO® are disinfected with Apron (metalaxyl-M) and ProSeed (thiram). These fungicides do colour the seeds slightly reddish. Nevertheless, the degree to which individual seeds in a particular batch are more or less coloured does not provide any clues on how these fungicides are distributed but is caused by the underlying seed colour in combination with a difference in absorption. Within the batch, the amount of active substance on the seed covering is adequately evenly distributed.

As far as the comparison with ‘Sunrich Orange’ is concerned, ‘Jua Maya’ does have a shorter production period. Furthermore, the leaves of this new variety are finer and darker. The golden yellow ray florets of ‘Jua Maya’ form more of a contrast with the black centre.

When sowing between 15 may and 1 July, the flower diameter of ‘Jua Maya’ is expected to be comparable to that of ‘Sunrich Orange’. However, ‘Jua Maya’ is less susceptible to variations in flower diameter when planting at different densities. When there are less plants per m\(^2\), ‘Jua Maya’ will not develop ridiculously large flower heads and will remain better controllable as compared to ‘Sunrich Orange’. During the regular cultivation season, the diameter of the flower centre of ‘Jua Maya’ is expected to reach approx. 10-14 cm.

What height ‘Jua Maya’ stems will reach in different soils is yet to be established. The longitudinal growth is expected to be significantly less than ‘Sunrich Orange’. Under long-day conditions and when grown on heavier (clay) soils, the plants will as a rule, reach a stem height of between 90-120 cm. With regard to the results on light soils, there is for the moment insufficient experience to warrant any statements.

The post harvest quality and vase life of ‘Jua Maya’ is above average as compared to most of the regular well-known varieties. In general, the flower does fully open when harvested in bud.

Flower food considerably extends the vase life and results in continued growth of the heart of the flower in diameter.
Future developments

Within SHIKAMOO®, there is a systematic and ongoing process aimed at the development of new varieties that are less sensitive to (“resistant to”) downy mildew.

The company is in the final stages of work on a hybrid (Exp. VV11-2) that is virtually identical to ‘Jua Maya’ but which is somewhat slower under short-day conditions, meaning that the flower can develop better.

Within 2 years, we expect to introduce several trial hybrids in a broader range of colours, including bicoloured varieties.