

Association for Breeding Research and Crop Maintenance **Based on Biodynamic Principles** 

Breeding Biography of a Biodynamic Variety



# Beetroot for fresh marketing and storage

Updated: 15/02/2017

### **JANNIS**

German Plant Variety Registry Code: **RR 66** 

## **Breeder:**

**Ute KIRCHGAESSER** 

## **Variety Description:**

JANNIS belongs to the group of round beet root types, with a finely-set root and stem insertion. The variety is of a mild aromatic flavor and is suitable, due to its early maturity and its appealing form, especially for fresh marketing in bunches; later sowings demonstrate better storage properties. The growing period is about 120 days. The seed is polygerm.

### **Breeding History:**

The first selection for this variety took place in 1998 at Hof Wörme, a farm that had been for a long time been biodynamically stewarded with poor sandy soils in the northern moors. The variety BOLTHARDY was the original seed stock used. As of 2001, the breeding work took place at the vegetable farm of the Lebensgemeinschaft Bingenheim ("Living Community" for the handicapped), also a biodynamic farm, but with heavy, clayey, river valley floor soil and basalt weathering.

Since the variety was originally intended for early production for fresh marketing, the focus of selection was on its earliness. The crop was surveyed after 90 days, and a second time after 120 days. Positive mass selection was carried out, singling out individual plants and accordingly establishing groups of 2-3 selected plants whose progeny were later tested.

Among the selection criteria were a spherical shape with fine root setting, narrow stem insertion at the collar, less cork formation, less ring formation and medium- to dark-red inner coloration. In addition, taste selection was performed on ten plants from each line and their repetitions. Only those lines were allowed to continue in which a balanced relationship was achieved from size and shape of the root, as well as sweetness and aroma. The breeding work was accompanied by picture-forming methods of analysis.



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In the years 2005-07, cultivation trials were performed from three different lines of JANNIS at differing locations in Northern, Central, and Southern Germany. All three lines were satisfactory at all locations. The results led to the selection of one of the lines, where the consistent taste appraisal and partly higher yields of this line were decisive.

JANNIS was entered for trial at the German Plant Variety Registry in 2008 and after the 2<sup>nd</sup> year of testing it was approved as a new variety. Since 2009, maintenance breeding is performed and seed stock produced by the same breeder at the Lebensgemeinschaft Bingenheim vegetable farm. The Bingenheimer Saatgut AG is responsible for the organization of the multiplication and commercialization of sale seed.