# **Technical Data Pack**











(Figure 1)

# **Key Benefits**

- Faster emergence in UK field conditions
- Greater leaf coverage
- Improved uniformity
- Stronger plants leading to increased yield potential

# Xbeet® enrich 100 Explained

Xbeet® enrich 100 is a combination of a new pellet and elicitor treatment that promotes stronger plants, leading to greater yield potential (Figure 1).

# What is an Elicitor?

Naturally derived elicitors set-off chain reactions that trigger different responses to not only pathogenic fungi and bacteria but also abiotic stresses such as drought, heat and cold.

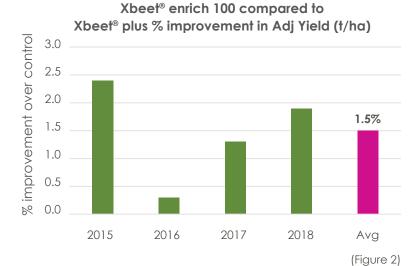
#### **Yield Results**

#### **Small Plot Trials**

Xbeet® enrich 100 demonstrated an average increase in yield of **1.5%** in small plot trials (Figure 2).

#### Strip Trials

Germains' strip trials have achieved a 4.4% increase in yield, those that are as close as possible to commercial conditions.





# The Value of the Xbeet® enrich Series

Seed technology will play an even more important role in coming seasons in minimising possible yield losses due to the suspension of chemical treatments.

Therefore, it will be imperative to get the young plants to the 12-leaf stage as quickly as possible and this is where our Xbeet® enrich 100 and 200 products can support.

With faster emergence allowing the crop to achieve mature plant resistance quicker, our products boost early plant growth to maximise yield potential.







- Boosts early plant growth
- Quicker canopy development
- Faster emergence in UK field conditions
- Greater yield potential

# Xbeet® enrich 200 Explained

Xbeet® enrich 200 contains a plant derived biostimulant in combination with the elicitor to boost early plant growth (Figure 3).

# What is a Biostimulant?

Biostimulants are defined as "materials, other than fertilisers, that promote plant growth when applied in small quantities". This has been shown to boost early plant growth, helping plants during the most vulnerable stage of development.

# **Plant Weight**

Xbeet® enrich 200 has shown an increase in plant weight, demonstrating the impact of the biostimulant in boosting early plant growth (Figure 4).

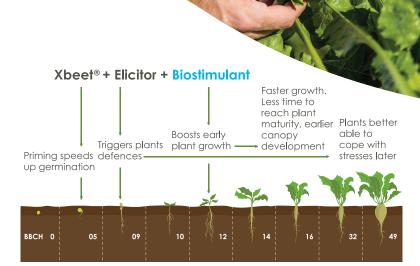
# **Yield Results**

#### **Small Plot Trials**

Our small plot trials have shown an average yield benefit of 1.3% over Xbeet® enrich 100.

#### **Strip Trials**

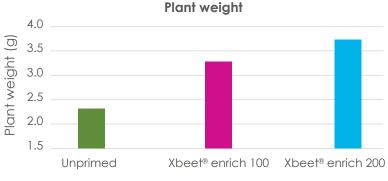
This year's strip trials demonstrated that Xbeet® enrich 200 achieved an average 2% increase in yield (Figure 5).



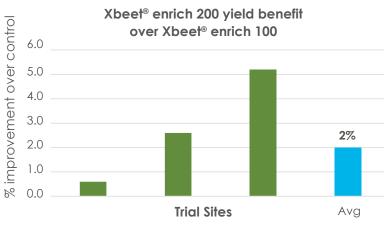
Xbeet<sup>®</sup>

enrich 200





(Figure 4)



(Figure 5)

# **About our Trials**

There are several different types of trials that Germains commissions, each has a specific purpose:



#### **Small Plot Trials**

Gather robust data to prove benefits

- 3-4 varieties, 3-6 sites, 6 replications, plot size – 3 rows 7-10m long
- Trial design: Small randomised blocks



### **Replicated Strip Trials**

Prove benefits at field scale

- 1 variety, 3 sites, 6 replications,
  plot size 6 rows 150-300m long
- These trials demonstrate a yield benefit under conditions as close as possible to normal farming practice

# **Overall Process**

After lab trials, commercial trials are done to obtain independent yield results

UK based trials are completed by BBRO and Armstrong Fisher

Harvested beet is taken to the Tarehouse at Wissington Factory to obtain the sugar yield

NIAB are contracted to independently calculate yield results





# Want to discover more about our Xbeet® enrich series?

- Email us at **UKSugarBeet@germains.com**
- Tweet us @GermainsUKBeet
- Wisit our website at germains.com







