

IPOT Industrial potato monitoring for the Belgian potato sector

Programme STEREO III **Contract** SR/00/312

Start - End 1 June 2014 - 31 May 2017 **Project type**Application

https://eo.belspo.be/IPOT https://eo.belspo.be/IPOT-webstory

Context and objectives



Belgium is the biggest exporter of frozen potato products in the world. On a yearly basis the Belgian companies process almost 4.5 million tons of potatoes in fries, chips and other products, of which 90 % are exported. If the sector wants to keep investing in a sustainable growth, more and better potatoes are needed and this with an optimal use of natural resources. However, an extension of the agricultural area is not possible. However, by better monitoring the potato production and by making steps towards precision agriculture the yields may be increased. This way, the potato chain can, as flag ship of the Belgian agro-food chain, further insure and extend its role as a world player in the potato industry.

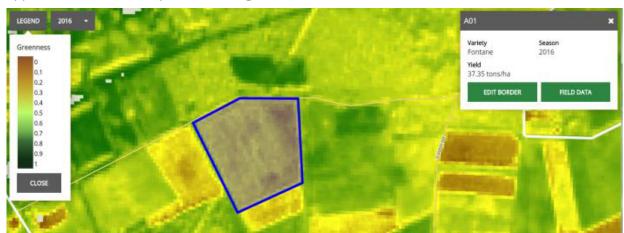
The aim of iPot was to develop a monitoring tool which supports the Belgian potato sector (farmers, traders, processors, consultants, suppliers, researchers...) with information on crop growth and development and possible anomalies, and with yield forecasts. This tool should allow the sector to monitor the potato production in a more efficient and more professional way.

Project outcome

Results: products and services

In the frame of the iPot project a potato monitoring service was set up for the Belgian potato sector. Various geo-information products were developed and made available to the end users via a web application called "WatchITgrow".

WatchITgrow provides information on crop growth and development as observed from satellite images. By monitoring temperature and rainfall and comparing actual with average values, the production risk or quality losses can be assessed. Crop growth models are used to generate yield forecasts, currently for the three main varieties (Bintje, Fontane, Nicola). WatchITgrow can also be used to store and exchange field data. This includes basic information such as the variety, planting date, date of haulm killing, harvest date or more specific information on treatments such as application of fertilizers, pesticides, irrigation,...



The web application is available for the entire Belgian potato sector, from farmers to traders, processing companies, suppliers, consultants, researchers,... It allows them to better monitor the potato production in Belgium. This should lead to an increase of the production in a sustainable way, which is necessary to support the further growth of the sector.

During the 2017 season more than 300 users registered on WatchlTgrow. More than 1300 parcels or 7500 hectares of potatoes were monitored with WatchlTgrow. It shows that there is a clear interest for such monitoring tools. Moreover, the user feedback was very positive which offers perspectives for the continuation and elaboration of WatchlTgrow in the future.

Users

WatchITgrow is meant to support the entire Belgian potato sector: potato farmers, traders, processors as well as consultants, suppliers, researchers... active in the potato sector.



Project leader(s)

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Location

Belgium

Website

http://www.watchitgrow.be



Belgian Science Policy Office (BELSPO)