Scanning report (EIP format for practice abstracts)

*Project title (native language): EUFRUIT: Europäisches Obst-Netzwerk

*Project title (English): EUFRUIT: European Fruit Network

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Section A. Summary for EIP dissemination

*Keywords: Thematic Network, Fruit Sector, EUFRUIT,

Berries, best practices, variety testing, cultivation, plant protection

*Main geographical location: ITH10 Bolzano-Bozen

Other geographical locations: ITH10 Bolzano-Bozen

*Summary (native language):

Die Mitglieder der Erzeugergenossenschaft Martell (MEG), selbst Mitglied der Vinschgauer Produzenten (VI.P), produzieren Beerenobst auf einer Fläche von 50ha auf 1.000 bis 1.700 m Meereshöhe.

Bei Erdbeeren, welche auf insgesamt 35ha angebaut werden, überwiegen die Sorten Elsanta und Darselect. Keine dieser Sorten ist besonders geeignet für die Höhenlagen des Martelltals. Um bessere Sorten für dieses Anbaugebiet zu finden, wird im Einzugsgebiet der MEG ein Versuchsfeld für Erdbeeren errichtet. Was die Anbausysteme betrifft, so werden 30% der MEG-Erdbeeren noch traditionell angebaut, 70% jedoch mit Doppelabdeckung (Regen- und Unkrautabdeckung).

Auf 6ha des Martelltals werden Himbeeren angebaut. Die angebauten Sorten sind: Polka, Tulameen, Glen Ample, Amira und andere. Heidelbeeren, bei denen vor allem die Sorten Duke und Berkeley überwiegen, werden auf 2 ha und vor allem in Töpfen angebaut. Brombeeren, welche auf lediglich 1ha angebaut werden, wachsen als Hecken direkt im Boden. Hier werden vor allem die Sorten Loch Ness und Novaho angebaut.

In den letzten Jahren konnte ein Rückgang der Ernte von Beeren vermerkt werden. Dies war einerseits den Spätfrösten und invasiven Schädlingen (wie Drosophila suzukii) geschuldet. Andererseits hat auch die Landflucht ihren Teil zum Rückgang beigetragen. Steile Hänge, die Höhenlagen und keine Sorten, welche besonders für diese hohen Lagen geeignet sind machen den Anbau in diesen Lagen zu einer Herausforderung. Daher werden unter anderem mehr Unterstützung, Arbeitskraft und Expertise für die Sortenzucht und -testung bei Beeren benötigt. Eine weitere Herausforderung stellt die Logistik dar: die Felder sind sehr weit von den Städten entfernt, was den Transport und die Vermarktung erschwert. Außerdem fehlen den Südtiroler Beerenbauern die nötige Expertise und finanzielle Unterstützung, um ihre Tätigkeit aufrecht zu erhalten. Der Anbau von Beerenobst stellt jedoch, wenn subventioniert, ein großes Potential für Zonen über 1.000 m über dem Meeresspiegel dar und kann eine echte Alternative zur Landflucht darstellen, da er der Landbevölkerung und besonders den Bauern eine Perspektive bieten kann.

Summary (english):

The members of the Cooperation of producers Martell (MEG), for its part member of the Federation of Vinschgau Fruit and Vegetable Producers (VI.P), grow berries on a total of 50ha, situated on 1.000-1.700 masl.

Regarding strawberries, cultivated on ca. 35ha, the varieties Elsanta and Darselect are prevailing. Neither of these varieties are particularly suited for the high altitudes of the Martell valley. To find more suitable varieties for this region, a research field for strawberries is being created in the MEG area. Regarding the production systems, 30% of the MEG-area is still cultivated on traditional fields, whereas 70% of the strawberries are cultivated with rain- and weed-cover (double-cover).

On 6ha of the Martell valley, raspberries are cultivated. The main varieties of raspberries grown are Polka, Tulameen, Glen Ample, Amira, and others. The main varieties of blueberries grown are Duke and Berkeley. Blueberries are cultivated in pots

and on a total of 2ha, and blackberries, cultivated on 1ha of the MEG-area only, are grown as hedges. In this case, the cultivated varieties are Loch Ness and Novaho.

In the last couple of years, the harvest of berries decreased due to spring frosts and invasive pests such as Drosophila suzukii, which both pose very big problems to the berry-farmers. In addition, the rural exodus caused some of the decrease. Alpine farming poses a lot of challenges to the farmers in general, and for producers of soft fruits and berries in particular. Steep fields, high altitudes and no varieties particularly suited for these regions make farming challenging. Thus, more support, manpower and expertise for the berry-variety breeding and testing are needed. Another challenge is logistics: the fields are very far from the cities, which makes the transportation and the marketing of the fruits very difficult. Finally, South Tyrolean producers of soft fruits are lacking expertise and funding. If subsidized, however, berries provide a big potential for the zones, which are situated above 1.000 masl, where apples can't be produced. As such, the cultivation of soft fruits can provide an alternative to rural exodus, as it can be a vista for the rural communities in general and to farmers in particular.

Section B. Project information

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*Project period: 2016 - 2019

*Project status: Ongoing

*Funded by: Horizon 2020

*Total budget: €1.8m

*Geographical regions: DK011 Copenhagen, DK012 Copenhagen and its environs, DK013 North Zealand, DK014 Bornholm, DK021 East Zealand, DK022 West- and South Zealand, DK031 Funen, DK032 South Jutland, DK041 West Jutland, DK042 East Jutland, DK050 North Jutland, BE211 (Arrondissement. Antwerpen), BE212 (Mechelen), BE213 (Turnhout), BE221 (Hasselt), BE222 (Arr. Maaseik), BE223 (Tongeren), BE231 (Aalst), BE232 (Dendermonde), BE233 (Eeklo), BE234 (Gent), BE235 (Oudenaarde), BE236 (Sint-Niklaas), BE241 (Halle-Vilvoorde), BE242 (Leuven), BE251 (Brugge), BE253 (Ieper), BE254 (Kortrijk), BE255 (Arr. Oostende), BE256 (Arr. Roeselare), BE257 (Tielt), BE258 (Veurne), BE310 (Nivelles-Nijvel), BE331 (Huy-Hoei), BE332 (Liège- Luik), BE334 (Waremme-Borgworm), BE335 (Verviers), FR8 Méditerranée; FR81 Languedoc-Roussillon, FR6 SUD-OUEST, FR512 Maine et Loire, FR611 Dordogne, FR812 Gard, DE6 (Hamburg), DE8 (Mecklenburg-Vorpommern), DE9 (Niedersachsen), DEF0 (Schleswig-Holstein), DEE0 (Sachsen-Anhalt), DEA (Nordrhein-Westfalen), DE111, DE112, DE113, DE114, DE115, DE116, DE117, DE118, DE119, E11A, DE11B , DE11C, DE11D, DE121, DE122, DE123, DE124, DE125, DE126, DE127,DE 128, DE129, DE12A, DE12B, DE12C, DE131, DE132, DE133, DE134, DE135, DE136, DE137, DE138, DE139, DE13A, DE141, DE142, DE143, DE144, DE145, DE146, DE147, DE148, DE149, DE600 Hamburg, DE932 Cuxhaven, DE933 Harburg, DE939 Stade, DEF09 Pinneberg, NL1-NL4 + NLZ Holland; NL 224 zuidwest Gelderland, NL 226 Arnhem/Nijmegen, NL230 Flevoland, NL310 Utrecht, NL321 Kop van Noord-Holland, Nl322 Alkmaar en omgeving, NL338 oost Zuid-Holland, NL33A zuidoost Zuid-Holland, NL341 Zeeuws-Vlaanderen, NL342 overig Zeeland, Nl411 west Noord-Brabant, NL413 noordoost Noord-Brabant, NL414 zuidoost Noord-Brabant, NL421 noord Limburg, NL422 Midden-Limburg, NL423 zuid Limburg, ES620 Murcia, UKG11 Herefordshire, UKG12, Worcestershire, UKH12 Cambridgeshire, UKH16 North and West Norfolk, UKH17 Breckland and South Norfolk, UKJ22 East Sussex, UKJ35 South Hampshire, UKJ36 Central Hampshire, UKJ37 North Hamphshire, UKJ41 Medway, UKJ42 Kent, UKJ43 Kent Thames Gateway, UKJ44 East Kent, UKJ45 Mid Kent, UKJ46 West Kent, ES618 Sevilla, ES511 Barcelona, ES512 Gerona, ES513 Lérida, ES514 Tarragona, CH0 Schweiz/Suisse/Svizzera, ITH51-59 Emilia Romagna region, ITH10 Bolzano-Bozen, HU101 Budapest, HU102 Pest, RO111, RO112, RO113, RO114, RO115, RO121, RO122, RO123, RO124, RO125, RO126, RO211, RO212, RO213, RO214, RO215, RO216, RO221, RO222, RO223, RO224, RO225, RO226, RO311, RO312, RO313, RO314, RO315, RO316, RO317, RO321, RO322 RO411, RO412, RO413, RO414, RO415, RO421, RO422, RO423, RO424. HU101, HU102, LT001 Alytaus apskritis, LT002 Kauno apskritis, LT003 Klaipėdos apskritis, LT004 Marijampolės apskritis, LT005 Panevėžio apskritis, LT006 Šiaulių apskritis, LT007 Tauragės apskritis, LT008 Telšių apskritis, LT009 Utenos apskritis, LT00A Vilniaus apskritis.

Project web page: http://www.eufrin.org/index.php?id=55

*Project Objectives (native language):

1. Errichtung eines europäischen Netzwerkes, welches sich auf den Obstsektor konzentriert
2. Entwicklung und Umsetzung einer systematischen Vorgehensweise zum Festhalten und Synthetisieren des bestehenden wissenschaftlichen und praktischen Wissens
3. Schaffen eines kontinuierlichen/anhaltenden Dialogs mit relevanten EU, nationalen, sowie regionalen politischen Körperschaften
4. Identifikation und Unterstützung von neuen prioritären Forschungsgebieten durch das kontinuierliche Monitoring und Analysieren von bestehender und aufkommender Forschung und Innovationsaktivitäten

Project Objectives (English):

1. Establish a European network focused on the fruit sector.
2. Develop and implement a systematic approach for scanning and synthesizing existing scientific and practical knowledge.
3. Establish an ongoing dialogue with relevant EU, national and regional policy bodies.
4. Identify and support new priority areas of research by continually monitoring and analysing existing and upcoming research and innovation activities.

*Project partners:

1. Aarhus University, Department of Food Science (Denmark) • AU
2. Research Station for Fruit npo (Belgium) • Pcfruit
3. Centre Technique Interprofessionnel des Fruits et Légumes (France) • CTIFL
4. Obstbauversuchsanstalt Jork (Germany) • OVA
5. Stichting Wageningen Research (Netherlands) • WR
6. ~~East Malling Research (United Kingdom) • EMR~~ (terminated 08-02-2016)
7. Institut de Recerca i Tecnologia Agroalimentàries (Spain) • IRTA
8. Federal Department of Economic Affairs, Education and Research (EAER), acting through Agroscope Institute of Plant Sciences (Switzerland) • Agroscope
9. Laimburg Research Centre for Agriculture and Forestry (Italy) • Laimburg
10. University of Agronomic Sciences and Veterinary Medicine of Bucharest (Romania) • USAMV
11. National Agricultural Research and Innovation Centre Fruitculture Research Institute (Hungary) • NARIC
12. Lithuanian Research Centre for Agriculture and Forestry (Lithuania) • LRCAF
13. Assemblée des Régions Européennes Fruitières, Légumières et Horticoles (France) • AREFHL
14. Variety Innovation Consortium South Tyrol (Italy) • SKST
15. Freshfel Europe (Belgium) • FRESHFEL
16. Elbe-Obst Erzeugerorganisation r.V. (Germany) • EO
17. Fruitconsult BV (Netherlands) • FC
18. University of Greenwich (United Kingdom) • UoG
19. University of Hohenheim (Germany) • UHOH
20. Università di Bologna (Italy) • UNIBO
21. Institut National de la Recherche Agronomique (France) • INRA
22. NIAB EMR (new 09-02-2016)

Section C. Annex: Scanning report[1]

Scanning report
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Country: Italy

NUTS 3 region(s)[2]: ITH10 Bolzano-Bozen

[1] Equivalent to 'final report' in EIP-AGRI format.

WP no. and title: WP2, Performance of new fruit varieties

Date: 26.04-2018

Source materials and methodology

Data gathered by MEG on its members.

Best practice findings

In South Tyrol, berries occupy a surface of about 180ha: 115ha strawberries, 45ha raspberry, 6ha black- and 3ha red-currant. Other berries, such as blueberry and blackberry, are cultivated rarely and in single spots, with a field size of maximum 200m[2]. Most of the farmers cultivate berries on a small scale (on 0.2ha to about 5ha) to complement their income.

The Variety Innovation Consortium South Tyrol collects independent information on the agronomic performance and the market potential of new apple varieties of interest, both from abroad and through local evaluation. The consortium does currently not conduct variety testing for berries. Therefore, this Scan will tackle the experience with berries of the consortium's members VOG and VI.P.

The Association of South Tyrolean Fruit Grower Cooperatives (VOG) is a recognized producer's organization for Apple, Pear, Cherries and Strawberries. Currently, however, no berries are marketed through VOG, as there is no request from its members.

One of the seven cooperatives of the Federation of Vinschgau Fruit and Vegetable Producers (VI.P), namely MEG (Cooperation of producers Martell) works exclusively with berries and stone fruits. MEG represents 45 members who are cultivating a total of 50ha. The area of MEG is situated in the Martell valley and on 1.000-1.700 masl. The valley is small and remote, lies among the boundaries of a national alpine Natural Park (Parco dello Stelvio), and bases a significant part of its economy on berry fruit production. About 40% of the whole strawberry production in South Tyrol comes from this valley (followed by the Puster-valley, and the Eisack valley).

Strawberries:

Strawberries in South Tyrol are cultivated in an alpine environment, at an elevation from 500 up to 1,700 m a.s.l. The climate is characterized by severe winters and a short vegetation season. The main crop cultivated by far in the area of MEG is strawberries (ca. 35ha). The strawberry-varieties are Elsanta (53%) and Darselect (24%), next to Roxana (7%), Salsa (7%), Arosa (5%), and other varieties (Aprica, Murrano, Malgo, Sunsation, 5%). None of these varieties is particularly suited for the high altitudes of the Martell valley. Therefore, MEG is developing, in collaboration with the Laimburg Research Centre, a research field for strawberries to find more suitable varieties for this region and for these altitudes. Regarding the production systems, 30% of the MEG-area is still cultivated on traditional fields, whereas 70% of the strawberries are cultivated with rain- and weed-cover (double-cover). Newer systems, such as mechanical harvest or vertical farming, are not introduced in South Tyrol yet, and the introduction might proof to be difficult, due to the steep fields.

Other berries:

Raspberries are cultivated on 6ha of the Martell valley. Here, the main varieties of raspberries are Polka, Tulameen, Glen Ample, and Amira. Blueberries are cultivated in pots due to their requirement of an acid soil, and on a total of 2ha. The varieties grown are Duke and Berkeley. Blackberries, cultivated on 1ha of the MEG-area only, are grown as hedges. Loch Ness and Novaho are the main varieties of this berry.

Challenges:

Generally, many of the berry-types suffer from winter damages. In the last couple of years, the harvest of berries decreased. On the one hand, this was due to spring frosts and invasive pests such as Drosophila suzukii, which both pose very big problems to the berry-farmers. Thus, further research is required to mitigate these challenges. On the other hand, the rural exodus caused some of the decrease too. Alpine farming poses a lot of challenges to the farmers in general, and for producers of soft fruits and berries in particular. One factor that makes the cultivation of berries difficult is the steep fields; other factors are represented by the high investment costs, the high altitudes, and the fact that there are no varieties particularly suited for these regions. Thus, more support, manpower and expertise for the berry-variety breeding and testing are needed.

[2] Please see ec.europa.eu/eurostat/ramon/nomenclatures/ for details on NUTS regions, level 3

Another challenge is logistics: the fields are very far from the areas of high population density, which makes the transportation and the marketing of the fruits- which are characterized by a very short storability and shelf life- very difficult. Finally, in South Tyrol the focus lies traditionally on apples. Therefore, producers of soft fruits are lacking the expertise that has been developed and that is subsidized in pome fruit production and research, and they are lacking financial support. The same is true for stone fruits. In fact, funding of the soft and stone fruit-sectors is very little in comparison to the funding of apple production. If subsidized, however, berries provide a big potential for the zones, which are situated above 1.000 masl, where apples can't be produced. As such, the cultivation of soft fruits can provide an alternative to rural exodus, as it can be a vista for the rural communities in general and to farmers in particular.