

Deliverable WP 3 D2.4

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1 Introduction

In the report of deliverable T3.2.4, we provide an overview and an evaluation of the farmer citizen events organized in the FAB pilot regions, more specific we discuss the tools and methods used.

As a reminder these meetings were organized to stimulate community engagement, serving ultimately a triple goal:

- 1. fostering the development of a good relationship between the citizens and the farmers, based on mutual understanding,
- 2. educating the citizens on the role they can play in the sustainable management of FAB, and
- 3. creating a favorable environment for the adoption and implementation of FAB solutions by the farmers.

We'll start with describing the process all pilot regions went through to organize the farmer citizen events, then we'll give an overview of these events indicating which objectives were met and in the end we'll share the lessons learned. In this report we gathered all the information and feedback reported by the pilot regions.

2 **Process**

The goal was to organize at least 36 farmer citizen events throughout the different pilot regions. Up to the end of 2022 already 23 events took place and these are discussed and evaluated in this report. Since the project FABulous Farmers is prolonged for a year, some farmer citizen events will still take place in 2023. They will be reported through the activity reports.

As work package and task leader, ILVO has developed the framework for farmer citizen meetings and the process to guide the pilot regions to select a tool or method that was best suited for their specific context. Figure 1 gives the schematic overview of the different steps in the process that was designed for selecting, organizing and reporting on the farmer citizen meetings.

ILVO organized different (online) meetings and coaching sessions for the pilot regions to inspire and motivate them. Each project meeting there was a possibility to exchange experiences, learn from each other and find some inspiration.

Figure 1: overview of the process for the farmer citizen meetings in the FABulous farmers project



A **first step** in this process to organize a farmer citizen event, is the selection of a tool or method. ILVO has put 3 criteria central in this consideration, the tool must:

- 1. Be tailored to the local context of the pilot region,
- 2. Be linked to the FAB action plan and selected FAB measures of the pilot region, and
- 3. Enable participation of farmers and citizens.

Information on good practice tools and methodologies for FAB community engagement were provided in two documents:

- Report: Review of current good practice tools and methodologies for FAB community engagement. See Annex 1.
- Inspiration inventory of tools and methods. See Annex 2.

The examples could inspire similar approaches in the context of the FAB community engagement. Pilot regions could whether they would

- use new tools or tools that were already in the inventory,
- use the same tool for all farmer citizen events in their pilot region.

The inspiration inventory gives information about different tools and methods for farmer citizen events on the broad topics of Functional AgroBiodiversity, agriculture and food. The inventory is conceived as an Excel file with for every tool or method information on the region/country where it was implemented, the organization that was responsible, the project name, the method type, a short description of the method, the number of participants, the level of engagement of the participants, the duration of the activity, the FAB theme and a web link to find more information.

Based on their objectives and specific context, the pilot regions could take into account these parameters in making a selection of a tool or method for their farmer citizen event. Besides thinking about their ideal situation (expectations), pilot regions also had to consider their practical possibilities. What are possible resources and restrictions concerning labor, funds, equipment, infrastructure, knowledge, participants, COVID-19 restrictions ...? Depending on their possibilities, pilot regions could select a tool matching their expectations. Table 1 gives an overview of the practical implications for different tools.

Table 1: Examples of types of methods based on their possibilities:

 Event: low time investment/short duration low budget requirements low equipment requirements low infrastructure requirements high knowledge requirements low engagement participants variable covid-19 restrictions 	 Digital platform: medium time investment/variable duration medium budget requirements low equipment requirements no infrastructure requirements high knowledge requirements variable engagement participants no covid-19 restrictions
 <u>Citizen science:</u> medium time investment/medium duration medium budget requirements variable equipment requirements 	 <u>Cooperation:</u> high time investment/long duration high budget requirements variable equipment requirements variable infrastructure requirements

low infrastructure requirements	high knowledge requirements
 high knowledge requirements 	 high engagement participants
 medium engagement participants 	 variable covid-19 restrictions
variable covid-19 restrictions	

After selecting a tool or method, the pilot regions started with the **second step**: the practical organization of the farmer citizen events taking into account their possibilities and expectations. The COVID-19 restrictions made the organization of these events challenging, some pilot regions decided to organize digital events, but most of them waited until the restrictions were released. ILVO also searched for and added some new digital tools and methods.

Third step: reporting on the meetings in the reporting excel.

Table 2: Questions asked about the meetings in the reporting excel:

			Log of meetings & events
1.	Preparation	1.1	How did you motivate/convince people to participate? (direct
			email, letter, phone, through associations, involving persons
			with good reputation, invite established connections, recruiting
			article, Facebook event etc.
2.	Objective	2.1	What were the objectives of the meeting?
		2.2	Which questions/topics were discussed?
3.	Actors	3.1	Who was invited?
		3.2	Who was present? (list name of organizations)
		3.3	Number of attendees
	_	3.4	Who was missing? Why?
4.	Resources	4.1	What resources did you use as input for the activity (reports, WOCAT, experts, experience of farmers, field
-		F 4	experiments,please specify.
5.	Methods	5.1	What methods were used during the meeting? (e.g. plenary discussion, field visit, presentation, focus group discussion,
			Mentimeter, sharing experiences, etc.)
6.	Group process	6.1	How was the interaction between the actors? (conflict about what?, discussions about, mainly listening, questions about)
7.	Results	7.1	Which objectives did you achieve ?
		7.2	Which objectives didn't you achieve ? Why didn't you achieve these objectives ?
		7.3	Good aspects of the meeting (that helped to realize the objectives).
		7.4	Poor aspects of the meeting (that made it difficult to realize the objectives).
		7.5	What should be improved to make these meetings more effective?
		7.6	Important topics/questions raised by participants to address at another meeting?
8.	External	8.1	How and with whom did you communicate to others about the
	communication		meeting? (Article, online film, post on social media)



Fourth step: evaluate & share experiences.

As mentioned earlier, throughout the project, ILVO has organized different (online) meetings and coaching sessions for the pilot regions to inspire and motivate them. To stimulate the pilot regions again to inspire and learn from each other a challenge was organized in the summer of 2022, where they were asked to send a photo post card of their event to all the other regions. At the project meeting in Bristol a speed date took place where pilot regions could tell each other about the farmer citizen events they organized and list some tips (do's, don'ts and new ideas).

In this report ILVO bundled all the information gathered throughout the project, being:

- information from the coaching sessions and project meetings,
- input of all the pilot regions in the reporting excels, and
- the evaluation at the project meeting in Bristol.

3 Overview farmer citizen events, methods used and evaluation

In this part of the report ILVO made an overview of all the farmer citizen events that were organized in the different pilot regions. They are ordered per country and there is information about the project name, the FAB themes, the methods used and the date of the events. After a short description of the events, there is an evaluation of the events per pilot region.

3.1 France

So far, 6 farmer citizen events were organized and reported by the FABulous farmers team in France. Table 3 gives an overview of these events.

Pilot region	Project name	FAB theme	Methods used	Date
Pays de la Loire	Welcome to worms	Soil quality	Digital video, public meeting: debate	30 Sept 2020
Pays de la Loire	Hiking and theatre at the farm			30 May 2021
Pays de la Loire	Workshop about soil and earthworms	Soil quality	School event, earthworms observation, discussion: questions-answers	18 Mar 2022
Normandy	Sustainable development tour	Soil quality, pollination, water quality and conservation	Presentation (model, panels), field visit	2 July 2021
Normandy	La fête de la pomme	Soil quality, pollination, water quality and conservation	Community event, discussion, FABulous game	31 Oct 2021
Normandy	Agricultural fair of Etrépagny	Soil quality, pollination, water quality and conservation	Community event, presentation (model, panels), Fabulous game, discussion	11-12 June 2022

Table 3: Overview of farmer citizen events in France

3.1.1 Pays de la Loire

Description events and methods

The pilot region **Pays de la Loire** organized three farmer citizen events about soil quality, one was also about pollination, pests and diseases. The first one was called <u>Welcome to</u> <u>worms'</u> which consisted of a projection of the movie with the same title, which is about soil conservation agriculture and based on farmers testimonies. In these testimonies farmers talked about why they chose for conservation agriculture, how they practice it and what the benefits are for them and the environment. After that there was a debate with three experts: Frédéric Thomas, a farmer and French expert of conservation agriculture and direct sowing, the chief editor of the revue TCS (no tillage revue) and Bruno Parmentier (speaker on

agriculture and food issues). This all took place in Erdre en Anjou, a central city in the pilot region. The objective of this event was to inform people about conservation agriculture and its benefits (including biodiversity) and to allow a debate between citizens and farmers on this topic.

The second event was <u>hiking and theatre at the farm</u>, organized on the farm of one of the members of the FAB learning network, Denis Colineau. At the start, the farmer presented his farm and explained practices implemented to preserve biodiversity. During the walk there were five different workshops (10min each) about diversity in and above the soil: one on soil biodiversity (Chamber of Agriculture), earthworms (Chamber of Agriculture), hedgerows and auxiliaries (CPEI), landscape design (Chamber of Agriculture) and birds (LPO). The theatre company Lino Balatum did five small stage plays (3min each) in cooperation with high school students (high school of Pouillé) about biodiversity and the relationship between farmers and citizens. There was also a stand of the municipality to present their biodiversity inventory (ABC). The objective was to stimulate citizens' curiosity about biodiversity and show how farmers take biodiversity into account in their practices. It was done by creating a convivial moment and creating a link between culture and agriculture.

The last event was a <u>workshop about soil and earthworms for schoolchildren</u>, this was part of a bigger school event to educate children about 'eating well', for example work on the education of the taste, promote local products and local knowhow. Children visited a stand where they could observe earth worms and have a discussion about soil functioning, soil health, soil life and earthworms ecology. The objective was to inform the children about soil and farming and the importance of soil health for food production.

Evaluation

In pilot region **Pay de la Loire** the first farmer citizen event <u>Welcome to worms</u> was good to stimulate interaction. Farmers, citizens and agricultural advisors were present, in total there were 90 participants. During the debate many questions were asked about challenges in agriculture, conservation agriculture and the use of pesticides. Also participants started discussing different topics among themselves. There was for example a debate between farmers in conservation agriculture and organic farming. The interaction level of this event was very high and the questions and discussions were experienced as very positive. Maybe a theme other than conservation agriculture could also be considered for future events like this. Also the quality of the speakers, pedagogical and federators, added value to the event. Afterwards, farmers were very motivated to continue such initiatives and inform the citizens of the region about what they are doing, what conservation agriculture is and what the benefits are. So it created some dynamic in the farmer community. One of the farmers is a very active member of the Chamber of Agriculture. He really wanted to organize an event at his farm to show and explain what he is doing with conservation agriculture and biodiversity. This is a conventional farmer and he works a lot on biodiversity at his farm.

So things were set in motion and a lot of other stakeholders were involved in the organization of the <u>hiking and theatre at the farm</u> event. It was organized together with local politicians, but also environmental organizations, the municipality, high school students and a theatre company got involved. The strong involvement and the network of this farmer were a big advantage. The farmer himself is part of the theatre company and he reached out to his friends. Because of that the theatre company teamed up with one of the students. One of the connections was also a professor in agriculture, so it was very nice to see how everyone came together. The pilot region coordinator indicated that if you can count on good experts and the



experience of the farmers it's a nice way to organize such an event. It was a lot of work, but really inspirational. It also helped that the farm is very known in the region, maybe 100 visitors came because they knew the farmer or were personally invited by him. When subscriptions started, it took only one day until the event was full. The event received 260 citizen-visitors of which 60 were children. COVID also played a positive role in this, people were happy to get out of the house. A lot of interaction was created in the different workshops and theatre pieces. Citizens asked many questions to understand farmers' practices and wanted to learn about the differences between conventional, organic and conservation agriculture, landscape effects and ways to improve biodiversity in their garden. There were many meetings to prepare this event, but the preparation, the good collaboration between the partners and the strong initiative and involvement of the farmer who opened his farm made it a great success. All the objectives set were achieved. One thing to take into account a next time is the time to provide for the walk. Now it was 5 kilometers and it was a bit too long. A suggestion is to remove one or two stage plays during the walk to make sure people have more time at the arrival at the farm. Because of the time investment it's not easy to do such thing each year, but it's definitely an event to repeat. Maybe not with theatre, but maybe music or other things. To link culture and agriculture is a good way to attract citizens. Also the activities could include other themes, now they were mostly about diversity.

At the last farmer citizen event, 100 schoolchildren joined in for a <u>workshop about soil and</u> <u>earthworms</u>. Many questions were asked about the earthworms for example about their way of life, feeding, reproduction and the functions they have in the soil. The earthworms at the stand, in a soil vivarium, got a lot of interest and made it possible for the children to do some observations. An expert on soil and earthworms was present to inform the children and answer their questions.

3.1.2 Normandy

Description events and methods

In the pilot region **Normandy** the farmer citizen events were all about agroforestry. Agroforestry includes more than one FAB theme being soil guality, pollination and water guality and conservation. The first farmer citizen event was a sustainable development tour (DDTour Agroecologie), organized in cooperation with the Agence Normande de la Biodiversité and Developpement Durable (ANBDD). A presentation was given on agroforestry and the development work in Eure, a model and information panels were used to show and inform the participants. The model has little tractors and trees, it is a nice tool to explain people on a little surface what the trees are doing and the role of agroforestry. There was also a more technical discussion about the place for trees on farms. The second event was a participation at a city festival in Conches en Ouche. People could visit a stand with information on agroforestry, the role of trees in farming and some success stories. The model and information panels were also used here to show and inform the visitors. For the children a FABulous board game about agroforestry was developed. Participants in the game can roll the dice and each square on the board has a question about a tree. There are also questions about trees in agriculture. The goal is of course to talk about agroforestry in farming. After playing the game, the children got a small tree to grow at home. The third event was the agricultural fair of Etrépagny, with almost the same set-up as the second event. There was a presentation on agroforestry and hedgerows, also the model, the information panels and the FABulous board game were used to inform visitors about agroforestry, the dynamics in Normandy and create awareness about the advantages.



Evaluation

In the pilot region **Normandy**, the first farmer citizen event was the sustainable development tour. Invitations were sent out and 18 individuals were present. There was good interaction and discussion in the group about agroforestry and the place of trees on farms. Because it was a small group of people, it was possible to have a more technical discussion about this. This was experienced as a positive thing. At la fête de la pomme and at the agricultural fair of Etrépagny the objective was to inform citizens about agroforestry and hedgerows. At la fête de la pomme we saw about 95 citizens, at the fair 159 farmers and citizens visited the stand. It was a pity that on the first event the stand was on a bad location. If it had a better location, more people might have visited. The board game about agroforestry is a nice tool for farmers as well as for the public. The game is much more fun than a powerpoint presentation. Because of the game farmers can speak directly to the public and they find it a nice and easy way to interact. Children are very open minded to play the game and it's a nice way to teach them something new about trees and farming. In the meantime the parents also learn something or ask questions. Not a lot of people know what agroforestry or the aim of hedges is, they say it's nice for the landscape but they do not know it is also useful for insects, crops, to have some energy in the wood and to stock carbon energy. The children were asked to send a photo of their tree they got after they planted it, but on 20 children only one did so. There are already questions from colleagues in other regions who want to use this game. The model with little tractors and trees is also a nice tool to explain citizens what trees are doing on a farm. The children like the little tractors on the model and that gives an opportunity to talk to them about trees. It's easier to keep the attention of citizens when we have something visual like a map, a flag, a model ... The parents also like to play with the model, and even they don't always know the answers to simple questions. It's nice to hear which discussions parents have with their children on the subjects. In the end everybody learns something.

3.1.3 Brittany

Description events and methods

In the pilot region of **Brittany** no farmer citizen events were reported yet at the end of 2022. But several ideas are being considered like for example planting trees with schools and citizens, bee monitoring, burying litterbags or underpants (and digging them back up) or organizing afternoons at the farm.

3.2 The Netherlands

The FABulous farmers team in The Netherlands already organized and reported 4 farmer citizen meetings. Table 4 gives an overview of these events.

Pilot region	Project name	FAB theme	Methods used	Date
Zeeland & West Brabant	Counting night butterflies	Pollination	Field visit, activity, crowdsourcing	21 Sept 2021
Zeeland & West Brabant	Counting night butterflies	Pollination	Field visit, activity, crowdsourcing	17 May 2022
Hoeksche waard	Field margin excursion	Pollination, pests and diseases	Site visit	26 Sept 2020
Hoeksche waard	National sow day	Pollination	Site visit, demonstration	22 April 2022

Table 4: Overview of farmer citizen events in The Netherlands



3.2.1 Zeeland and West Brabant *Description events and methods*

In pilot regions Zeeland and West Brabant two farmer citizens events were organized together, both were about pollination and counting night butterflies. Interested citizens were invited to a field of one of the demonstration farmers. At this field visit they got information on how to count and what to expect before they started practicing. The first time an expert from Koninklijke Nederlandse Natuurhistorische Vereniging (KNNV) was present to give information. At the second event an expert from Boeren InsectenMonitoring Agrarische Gebieden (BIMAG) was there to give the presentation. The farmers organization LTO had already contacts with the butterfly foundation, they use the BIMAG system often and also work with volunteers. So counting night butterflies is linked to farmers, citizens and volunteers. The system itself is a set of 3 LED-buckets, there's a funnel in it with a LED-light behind it, powered by a battery. The butterflies are attracted by the light, go through the funnel and fall asleep at the bottom on an egg carton. In the morning the farmer or volunteer can take pictures of the butterflies while they are sleeping. The photos are uploaded immediately to the butterfly foundation. It's always a set of 3 buckets, so one is for example at the farm yard, one on the cropland and another in an optimal field margin. They determine the species and put them in the national database. The objective was to count night butterflies and create interaction with the participating citizens.

Evaluation

The pilot regions Zeeland and West Brabant organized two farmer citizen events together, they were both about counting night butterflies. The advantage is that the butterfly foundation already works with volunteers, and so it's a method to reach citizens. Farmers have different locations to count them, so it's a nice way to link farmers and citizens or volunteers. The results do not give the farmers advice about crop protection, but by looking at the results we had some interesting discussions with farmers and citizens. To have an expert at the field visit is also a big asset. People are amazed what kinds of and how many insects you attract at a field at night with a white sheet and two lights. To actually see the different butterflies and insects with their own eyes it gives the participants a better impression about what is happening at a field. Citizens find it interesting to hear why butterflies are relevant for farmers and their crops. Most meetings were in small groups, but there was also one big meeting in Brabant. There is still some sensitivity between farming and ecology. When you find insects on farm land, there's always a possibility that it's a rare species and farmers would not be happy if that would lead to restrictions in pest and plague control. Luckily night butterflies are innocent and not in need of (over)protection. They are an interesting species that are interesting for both parties and that can bring farmers and ecologists together. Using this method (unlike sticky strips where the insects die), it's also nice for the butterflies, who can live on after their sleep. 6 sets of buckets were placed in Zeeland and one in Brabant. The reading data capacity from the butterfly foundation is not that big, so it's kind of a logistical problem. Now you can find many more buckets sets in the Netherlands than 3 years ago, it's new and growing fast.

3.2.2 Hoeksche Waard *Description events and methods*

In the pilot region **Hoeksche waard** the farmer citizen events were about field margin management and flower strips, so the FAB themes were pollination, pests and diseases. In Hoeksche Waard there is a long-standing tradition in facilitating natural pest control by means



of introducing and maintaining flower strips at the field margins. More information on that tradition you can find in Annex 1. The first farmer citizen event was an organized <u>excursion</u> to inform citizens about biodiversity and field margin strips. The second event was in the context of the <u>national sow day</u> (*nationale zaaidag*). It consisted of a presentation about the use of flower strips and a demonstration of a sowing machine for flower strips. The objective was to raise awareness on the importance of flowers for (beneficial) insects.

Evaluation

In pilot region **Hoeksche waard** the first farmer citizen meeting was an <u>excursion</u>. Farmers and citizens had a discussion about the role of field margin strips and biodiversity. The second event was the <u>nationale zaaidag</u>, where farmers and citizens interacted about the importance of (sowing) flowers for restoring pollinator and natural enemy populations. There were 25 attendees, which were representatives and citizens. No more information was reported to do a more extended evaluation.

3.3 England

So far, 8 farmer citizen events were organized and reported by the FABulous farmers team in England. Table 5 gives an overview of these events.

Pilot region	Project name	FAB theme	Methods used	Date
SW West Midlands & Wales	Worm hunt	Soil quality	Website with digital videos, printed materials, activity, crowdsourcing	21 April 2021
SW West Midlands & Wales	Sustainability event	Soil quality, pollination	Community event, presentation	26 Feb 2022
SW West Midlands & Wales	Worm hunt	Soil quality	Website with digital videos, printed materials, activity, crowd sourcing	1 April 2022
SW West Midlands & Wales	Worms workshop	Soil quality	Presentation, demonstration, discussion	10 June 2022
East of England	National Trust event	Soil quality, pollination, pest and diseases, water quality and conservation	Community event, site visit leaflets, discussion	7 Aug – 7 Sept 2021
East of England	Bat detecting	Pollination, pest and diseases	Site visit, survey, presentation, crowdsourcing	1 April – 20 Oct 2021
East of England	Tree planting	Soil quality, pollination, water quality and conservation	Site visit, presentation and demonstration	27 Oct 2021
East of England	Tree planting	Soil quality, pollination, water	Site visit, presentation and demonstration	29 Oct 2021

Table 5: Overview of farmer citizen events in England



	quality and	
	conservation	

3.3.1 SW West Midlands and Wales

Description events and methods

In the pilot regions SW West Midlands and Wales all the farmer citizen events were about soil quality, more particular earthworms. They organized two events for worm hunting, targeting families with children. Due to COVID-19 this was an online event. A website was provided with digital videos and printed materials. The videos demonstrated methods to find worms and showed how worms engineer the soil. There was also more information on the website on places where worms potentially can be found, methods of finding worms, why it is important to take care of our soil, how farmers take care of their soil and how you can do it at home. Experienced farm advisors and agronomists gave input to create all this. People could download an activity sheet and organize their own worm hunt. Afterwards there was also the opportunity to submit their worm hunt findings on the website. The objective was to raise awareness of the important role/functions worms play in soil health, why soil health is important and ways to keep soil healthy both on farm and garden/local areas. A third farmer citizen event was a presentation at a sustainability event. This event was organized by the Uttoxeter Nature Recovery Network. A biodiversity group that forms part Sustainable Uttoxeter, a community led initiative to get Uttoxeter in Staffordshire (Mid West pilot region) to net zero carbon by 2030. The objective was to celebrate all the fantastic projects that are happening locally and nationally, and how this all contributes towards climate action and minimizing biodiversity loss. Each project was to deliver a 5-minute presentation giving an overview that showcases the project work and latest projects or how they are supporting the local area. The last farmer citizen event was a worms workshop, organized in cooperation with the Ludlow Wildlife watch homeschooling group. There was a practical demonstration and discussion about earthworms. The objective was to engage children and raise awareness of the important role/functions worms can play in soil health, why soil health is important and ways to keep soil health both on farm and garden/local areas.

Evaluation

Pilot regions SW West Midlands and Wales went two times for a digital event and organized a worm hunt. The first ideas were about an agroforestry activity, where schools would be invited to a farm and do science experiments about trees. But because of COVID-19, schools were careful in organizing activities with external parties and as an alternative, the worm hunt was created. The plans were immediately to organize the worm count in the spring, hoping to make use of all the materials that were gathered and to visit some schools to look at worms with the children. Pity it had to be an online activity due to COVID-19 restrictions. The materials and information on the website were made as interesting as possible with the videos and included also fun facts about why worms are so great. With this initiative a lot of people were reached and hopefully raised awareness of the important role worms play in soil health, why soil health is important and ways to keep soil healthy both on farm and garden areas. Citizens, more specific families with children, were targeted and there were 2236 hits on the website the first time, 1192 downloads of the worm hunt activity pack and 29 participants submitted their results. The second time there were 3582 hits on the website, 1561 downloads of the worm hunt activity pack and 53.299 people reached on social media. Which is actually great. At the sustainability event there was the opportunity to promote and raise awareness about



the FABulous Farmers project and the fact that one of the pilot regions is within the Uttoxeter area. Besides the presentation, there were one on one conversations with local citizens and land managers. Attendees were educated on the FAB measures and which ones are being carried out within the local area. Discussions were about worms, soil health, primary school education, bees, potential trainings and farm walks for land managers and soil training and Support Staffordshire for citizens. The last farmer citizen event was the worms workshop. The 21 attendees were parents and children in the Ludlow Wildlife watch homeschooling group. The children aged between 3 and 12 years old. A lot of information, the fun facts and the activity pack templates of the worm hunt could be used again for this interactive workshop. A wormy was used to demonstrate how worms move through the soil and rubber worms to explain the different parts of the worms. After the information was given about places where worms could be found, methods of potentially finding worms and why and how farmers and citizens (can) take care of their soil, the children could go explore and try different methods to find worms. For example cover soaked soil in a plastic bag to encourage worms to the surface, use trowels to dig, uncover stones and leaves or use a fork to do some twanging. Parents and children were engaged and asked lots of questions. There was a lot of shrieking with excitement when the first worm was found. Everyone learned about the important role worms play in soil health. There were also conversations with the parents about farming practices in general, agro ecological farming practices and the direction farming is currently going in regard to this. There was a natural interest in the subject. Being set outdoors created freedom for the children to go and explore within a safe area. There was interaction between all age groups and parents. Giving the children the task of using various methods to find worms to add to the wormy encouraged them. They became competitive in their own self formed groups. The yucky worm children's book from Vivian French was also a useful tool, as it is a story but has lots of interesting facts.

3.3.2 East of England

Description events and methods

The farmer citizen events in the pilot region **East of England** were focused on more than one FAB theme, they were about soil quality, pollination, pest and diseases as well as water quality and conservation. The first event was a big National Trust event which was a community event and consisted of a trail, a site visit and discussion. On the trail there were lots of volunteers who gave information and a leaflet was distributed to record the data collected on the trail and to prompt discussion about hedgerow management, field margin management, crop rotation, cover crops, semi-natural landscape elements ... The objectives were to engage citizens in a citizen science activity that collects baseline data for the performance of FAB measure, to engage citizens in an activity that raises awareness of the link between a healthy ecosystem and good agricultural practices and to engage a family audience in looking at the different functions and relative biodiversity value of different areas of fields and farms. The second event, which was about bat detecting, was also organized by the National Trust. At a site visit participants got a presentation and a survey about bat detection. The objectives were to engage citizens with the ecological benefits of agroforestry and field margins, to train a group of citizens in completing ecological surveying and to complete a baseline ecological survey ahead of a agroforestry trial. The two other events were about tree planting. Citizens were given the opportunity to learn about the benefits of agroforestry. Volunteers were recruited to participate in the implementation of the agroforestry tree planting project and they were trained in tree planting so that they could be involved in the creation of an agroforestry trail planned for implementation two months later.



Evaluation

In pilot region **East of England** the National Trust organized al big farmer citizen event. Approximately 20.000 people visited the Wimpole Estate, that were about 5.500 families that took part in the event. The number of participants expected was exceeded, so more leaflets had to be printed. It was very good to have specialists involved in the production of the trail to make it engaging and appealing. Information boards and leaflets to record data on the trail and to prompt discussion were designed and printed. There was a lot of discussion about hedgerow management, field margin management, crop rotation, cover crops and semi natural landscape elements. The feedback from the participants was excellent. Now there was one trail, but alternative trails would have made the activity more repeatable for people who wanted to visit more than once. At the second event the idea was to engage and train citizens to complete an ecological survey ahead of a agroforestry trial and do some bat detecting. The event was promoted on the National Trust volunteering website, followed up with direct communication to individual citizens. 27 people attended. First they got some information on the surveying protocols, they followed the training program and were informed about the health and safety risks and controls. After going through those three steps they could start surveying and then discuss the results. Bat detectors and a presentation were the tools needed for this. The group worked well together and they built a good team dynamic. The citizens had a wide range of prior experience and they worked well to support each other through the technical aspects of the surveying. Because the meeting was held in the field, this gave it a sense of purpose. The two other farmer citizen events were a tree planting activity. This event was also advertised on the National Trust volunteering website, same as before. At the first event there were 18 participants, the second time 14. To begin the National trust presented information on the financial and ecological benefits of agroforestry, the physical work involved in tree planting in the winter, the practical arrangements in place for completion of the project. A range of maps were used to explain the plans for the project. This was followed by questions which promoted active group discussion. There was a demonstration of tree planting and a session on practical training for each participant at the end of the meeting. It was experienced as very positive to hold the meeting outside in the field. A small negative point was that an expert joined the participants who had already implemented agroforestry on their land. The National Trust has a lot of experience at engaging citizens, they have 200.000 visitors each year. They have a whole department that is called 'visitor experience' which is a big asset. Approaches go from very simple surveying where people can just engage at a very low gentle level to longer programs of training and development engaging with the land owners in the neighbourhood or a more practical approach where citizens can actually do something like planting a hedge.

3.4 Luxembourg

In the pilot region of Luxembourg no farmer citizen events were reported yet at the end of 2022.

3.5 Belgium

The FABulous farmers team in Belgium organized and reported 5 farmer citizen events. Also two more are already planned for 2023. Table 6 gives an overview of these events.

Table 6: Overview of farmer citizen events in Belgium

Pilot region Project name FAB theme Methods used Date



De Merode	Bike ride	Soil quality, pollination, pests and diseases, water quality and conservation	Field visits, discussion	10 Aug 2021
De Merode	Reunion citizen science project	Soil quality, pollination, pests and diseases, water quality and conservation	Presentation, discussion	18 Nov 2022
De Merode	Start event interactive bike route	Soil quality, pollination, pests and diseases, water quality and conservation	Platform/app	Planned 2023
De Merode	Plant FABulous in your garden	Soil quality, pollination, pests and diseases, water quality and conservation	Information and promotion in garden shops	Planned 2023
Pajottenland	Flower strips walk	Pollination, pests and diseases	Site visit, presentation, discussion	1 Aug 2021
Pajottenland	Day of agriculture	Soil quality, pollination, pests and diseases, water quality and conservation	Public event, site visit, presentation, discussion	19 Sept 2021
Pajottenland	Presenting FAB @countryside centre Paddenbroek	Soil quality, pollination, pests and diseases, water quality and conservation	Site visit, presentation, discussion	24 Oct 2021

3.5.1 Merode

Description events and methods

In the pilot region **De Merode** organized a summer <u>bike ride</u> as their first farmer citizen event. At the route were different stops with field demonstrations of various project partners. The aim was to have a discussion about the actual implementation of FAB measures and to connect farmers and citizens in the field.

Also a citizen science project was launched in collaboration with ILVO and Ghent University, similar to the BEL-landschap project (see Annex 1, 3 and 4). 28 FAB gardens were installed in the municipalities of Geel and Laakdal, that were managed by local citizens. These FAB gardens are standardized measurement tools for multiple FAB-supported ES. The gardens are each one square metre in size and are planted with a fixed set of crops of different plant families. Crop species' selection can be based on several criteria, including sensitivity to different groups of pests, diseases and dependency on pollination. The exact set-up of the crops in the gardens allows a focus on specific ecosystem processes of interest and measure, for instance, arthropod activity signs (plant herbivory, prevalence in traps, observations), observed services (natural pest control, pollination, etc.) and the overall ecosystem performance (yield). From April 2021 until September 2021 the citizen scientists monitored the FAB gardens following the scientific protocols and reported their measurements to scientists. More information on the approach and results can be found in Annex 3 and 4. Results of this project were shared with and presented to the participants during a reunion of the citizen science project.



Still on the agenda for 2023 there is a start event about an <u>interactive bike route</u>. The idea is to develop a platform or an app, as a way to present different FAB measures at fields and farms next to a bike route. It can be an interactive way for citizens to explore the countryside and learn something about FAB measures. This will be developed together with a local startup company that can provide a platform or app that will help us with the development of this interactive bike route. Also on the agenda there is a start event <u>Plant FABulous in your garden</u>' in which citizens can help farmers in their neighborhood. The plan is to promote species that have a positive impact when they are planted in local gardens, through promotion in local garden shops. Information pillars will be provided at the entrances of the shops and there will be a separate corner in the shop where all the species are collected and products with a positive impact are labeled.

Evaluation

The first farmer citizen meeting that took place in pilot region **De Merode** was a bike ride (field visits, discussion). Farmers of the Merode, citizen scientist that worked on a square meter garden project and project partners were invited. 9 citizen scientists were present, some of them couldn't participate because of other plans or because of the type of the event (bicycle tour). It was a pity that only one farmer participated, it would have been a stronger concept and discussion if more farmers could participate. But none the less it was an interesting event. Results of the field experiments, methods and personal experiences of the volunteers in the citizen science project were shared. For example about the effects of different mixtures of flowers in the periphery of cropland on the crops and the effects of shallow soil tillage were discussed. There was a lot of interaction and different opinions, but mutual respect and understanding grew through the interaction and learning from each other. It went on about the benefits of FAB measures and we learned about different approaches. There was a good atmosphere and nobody held back to join in the conversations. At the reunion of the citizen science project the participants were very curious to hear what happened with all the information they gathered in their own gardens during the project. The researcher explained very thoroughly what he did with the data to make the analysis and what the overall results were. The participants were very close involved in the project and thus eager to learn about what was happening in their gardens. During the project the researcher and participants built a good relationship, there were site visits and newsletters by email to keep everyone involved. At the meeting there was a nice atmosphere, all of the participants had something in common and were happy to share their personal experiences. The overall results were presented, but they were also very interested in the results of their personal garden. So they were promised an individual report for each garden. Very spectacular for this citizen science project is that there were (as good as) no missing data, which also shows the high involvement of the citizens. The open and regular communication between researcher and participants played a big part in this. There was also a good relation with the municipality of Laakdal, one of the local politicians offered to drive the researcher around to go and install the one square meter gardens and offered to organize the reunion at the city hall.

3.5.2 Pajottenland

Description events and methods

In pilot region **Pajottenland** the first farmer citizen event was about flower strips, pollination, pests and diseases. The other ones were mostly to inform citizens on climate action by the FABulous farmers project, so all FAB themes were discussed. The first event was a site visit, were the participants <u>walked along the flower strips</u> of the FABulous farmers in and near Gooik.



During the walk they got information about the flower strips and was asked about their impressions and suggestions to do more useful activities for biodiversity. Participants could also play a FABbingo game, where they had to look for specific insects and plants. The objective was to inform citizens and show them the efforts the local farmers are doing. The second farmer citizen event was the <u>day of agriculture</u>, on this day a lot of farms in Flanders open their doors to the public. On one of these farms in Gooik, there was an information stand about the FABulous Farmers project. The project was presented to inform citizens about the efforts of farmers on climate change. Visitors were asked what measures they thought interesting to have attention for in the years to come and try to identify their priorities in the FAB-themes. The last event <u>presenting FAB at the Countryside Centre Paddenbroek</u> was similar to the previous one. The information stand was on another location, but the information, questions asked and objectives were the same.

Evaluation

The first farmer citizen event in pilot region **Pajottenland** was organized in cooperation with the local organization Landelijke Gilden of Gooik and was a walk along the flower strips (site visit, presentation, discussion) in the region. Working together with this local organization it was nice to count on their network of people living in the countryside. Different fields were visited and the efforts from the farmers in Pajottenland became clear to the citizens. They were happy to learn about the FABulous Farmers project and see what actions were taken in their region. The group was very interested and there was a good interaction between the citizens and the farmers. Information boards were used to show the results of the farmers field experiments. A lot of questions were asked and answered. Despite the bad weather, still 48 interested participants showed up. During the day of agriculture (public event, site visit, presentation, discussion) about 4000 citizens and farmers visited a FAB Farm in Gooik. An information stand on the FABulous Farmers project was placed on the farm and a lot of people came to listen how farmers are working on the climate change, landscape management ... Themes like climate, water, recreation ... were discussed. Not only farmers and citizens came by, but also other actors like for example energy cooperatives, nature organizations ... came to check out the booth. Interaction was created by asking citizens and farmers to identify priorities in the FAB measures and what they find interesting to keep on working on in the coming years. They could put stickers with their top 3, there was another color sticker for the farmers and the citizens. When FAB was presented at the Countryside Centre Paddenbroek (site visit, presentation, discussion) the same set up was used. About 1550 farmers and citizens visited the stand. Looking at the results of the interests it was clear that landscape management and food security scored really well. Weirdly recreation did not. The discussion was not specific on the different FAB measures but more the broader themes. In explaining the visitors what FAB farmers are doing in Pajottenland, it became clear that it was not so easy with people that don't know a lot about farming. So it's important to prepare your communication for different target audiences. There is also a link between the stakeholder meetings and the farmer citizen events, because citizens could also play a part in implementing FAB measures. In Pajottenland they worked together with local partners to organize the farmer citizen events because of their network, but for example Landelijke gilden was also a stakeholder who could tell us about possible barriers in implementing FAB.



4 General conclusions

From the evaluation of the farmer citizen events that were organized we can summarize some lessons learned. Besides conclusions based on the information in this report, also the do's, don'ts and new ideas gathered during the speed date at the partner meeting in Bristol will be included.

4.1 Timing

The first wave of COVID-19 started in Europe at the beginning of March 2020 and every country went in lockdown. Towards summer most of the restrictions were relaxed and the first farmer citizen events were organized in September of that year. In September-October the situation worsened again and nothing was organized until April 2021. Despite the uncertain situation the pilot region SW West Midlands in England was the only pilot region to organize a digital farmer citizen event. Other regions started their activities back up and more events took place over the summer. Winter is probably not the most attractive period to reach citizens, because from November until March no events took place, with the exception of one event in November 2022. Spring and summer seem to be the most preferred periods to organize farmer citizen events.

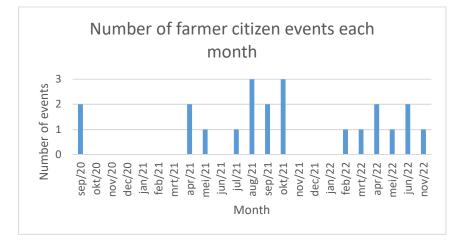


Figure 2: number of farmer citizen events organized each month during the FABulous farmers project

4.2 Methods used

Most farmer citizen events were some kind of community, public or school event and more than half of them organized a site or field visit. Also more than half of them included a presentation or demonstration about one or more FAB measures. A debate or discussion was sometimes organized to answer questions, get input or exchange ideas. To inform people those methods or a combination of them seemed to be a popular choice. A few pilot regions have chosen for a more practical approach, letting citizens perform some research themselves during an activity for example during the butterfly count, worm hunt or bat detection. This is also a form of citizen science, namely crowdsourcing. The citizen science project in the Merode had more a long term involvement of the citizens. Some pilot regions were creative and developed interesting tools or programs to inform citizens and create interaction between farmers and citizens. Think about the FABulous board game, the hiking and theatre at the farm, the digital call for a worm hunt or the plans to develop a bike route with app info and involving garden shops.

4.3 Community engagement level

As reported earlier, there are different levels of community engagement, see figure 3.



INFORM	CONSULT	INVOLVE	COLLABORATE	EMPOWER
To provide the public with balanced and objective information to assist them in understanding the problem, alternatives, opportunities and/or solutions.	To obtain public feedback on analysis, alternatives and/or decisions.	To work directly with the public throughout the process to ensure that public concerns and aspirations are consistently understood and considered.	To partner with the public in each aspect of the decision including the development of alternatives and the identification of the preferred solution.	To place final decision making in the hands of the public.
We will keep you informed.	We will keep you informed, listen to and acknowledge concerns and aspirations, and provide feedback on how public input influenced the decision.	We will work with you to ensure that your concerns and aspirations are directly reflected in the alternatives developed and provide feedback on how public input influenced the decision.	We will look to you for advice and innovation in formulating solutions and incorporate your advice and recommendations into the decisions to the maximum extent possible.	We will implement what you decide.

Most of the pilot regions made the choice to inform the public, the used different methods or combinations of methods to do this. Sometimes citizens were also consulted, asked about their opinions and ideas with a very low level of engagement. In a few cases there was a collaboration like for example at the hiking and theatre at the farm event or citizen involvement like the crowdsourcing citizen science activities listed in the previous part. Aiming at involvement of citizens needs possibly a higher effort or is more time consuming to prepare, but the impact is also a lot higher. When possible think about long term funding and projects.

Farm, field or site visits are a good method to bring farmers and citizens together. When people can see or experience things for themselves, a higher level of engagement can be achieved. Also outdoor activities are more appealing to citizens than an indoor activity about farming (depending on the weather of course). When the objective is to actually train citizens or volunteers to do something, it's interesting to work in small groups.

Doing ecological surveys or diagnostic activities with citizens create more empathy for farmers and sometimes a longer lasting relationship. Downside of working with volunteers are that it can influence the data quality, or there is some judgement behavior to take into account. Also the when work is done on a farmers field, the farmer has to be able to 'let it go'. Besides aiming at citizens or volunteers, it's an idea to invite other stakeholders for an 'internship' or working day.

4.4 Tools to start a conversation

When looking to start a conversation there are different tools that can help for example visual aids, a game, asking questions ... It can also be a good way to resolve common misunderstandings citizens have. Don't be afraid to talk to groups that are further away from your way of thinking. At meetings list and order the issues and start with the easy ones.

Whether or not you organize a site visit, visual aids like panels, models, vivaria, games ... are always a valuable tool to help transfer the information, to ease up the conversation and create

interaction. This can create a pleasant context for the farmers to explain something and for citizens to better understand the information. It also works especially well with children.

4.5 Who is your target audience?

Experts can play a valuable role in the development of an event as well as being at the event to speak, debate or give information. Qualitative information (written materials or a good speaker) gets the attention of the public and has a big impact on the engagement level. Important is to prepare the communication specific for the target audience that will be invited or prepare for different target audiences if needed.

Farmers who speak from their own experience sometimes tell the story even better (or more believable) than an expert, but not everyone can do it. Again take into account the target audience and their knowledge level about the subject. If possible give farmers the stage.

Besides farmers and experts there are a lot of other parties to involve in creating an event. Make sure to choose the right farmers, people and organizations for the event and dare to think outside the box. Third parties can have some interesting input or bring things to the table you can't yourself, think about what experience could be useful. Having a big network and a good cooperation between farmers/partners involved can make it possible to create something you didn't expected. When involving politicians, think carefully about their role, not everyone can appreciate for example the Mayor opening the meeting. This can be experienced as too political.

Schools/children are a very interesting target group to organize your event. You can go to the school but inviting the children to a farm could even be better. A challenge here is to find teachers that are interested and to make it possible to fit the timetable and curriculum. Schools could also have an impact on a landscape level by implementing FAB measures themselves, specific schools could be targeted and asked to contribute to regional plans.

4.6 Spark interest

Think of things that a lot of people are interested in. Farmer citizen events don't have to be about farming, FAB measures or the technical aspect alone. Try to link it to other things like for example theatre, art, music, poetry, sport, technology, climate ... or aspects of the topic were people are excited about for example bees, worms ...

If people don't know the organization it's not always easy to get citizens to come, think of a good communication strategy or involve other partners. In the end citizens just want to have a nice day and experience. Giving a gift to take home to remind participants of the event can also be an idea for example a tree, a beeswax candle ...

The other way around: it's interesting to think which role you can have in already existing events. Attending folklore events or fairs or ... where already a lot of people go to can also be very interesting. Make sure to get a good position at the event for example together with other ecological actors (not in between commercial stands). Or another idea can be to let farmers sell some of their products.

Digital initiatives have also the potential to reach a lot of people. The success of the worm hunt was possibly also influenced by the Covid situation, but a lot of people participated.



Annex 1 Report: Review of current good practice tools and methodologies for FAB community engagement.



Annex 2 Inspiration inventory of tools and methods

All the examples mentioned in this report were also added to the inspiration inventory.



Annex 3 A social-ecological framework and toolbox to help strengthening functional agrobiodiversity-supported ecosystem services at the landscape scale



Annex 4 Disentangling the interrelated abiotic an biotic pathways linking landscape composition and crop production