

# Samen Zuiderveld; A Situated Study Using a Participatory Visual Methodology to Reduce Social Distance Between an Ecovillage and the Surrounding Neighbourhood

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## ABSTRACT

This pictorial documents a situated study of reducing social distance between Ecovillage Zuiderveld and surrounding neighbours in Nijmegen, the Netherlands. Through a participatory visual methodology (PVM) [1] this work aims to put social design values into practice. This pictorial aims to show what worked, what did not, and what remains open. This is a Research through Design [2] study. Designed encounters – a co-creation and exhibition – is the medium through which knowledge is generated. Three key moments are examined: the pre-sessions participatory process; a constellation emplacement exercise; and unstructured social gatherings. Two types of analysis read across these moments: 1) what the thresholds to connect are; the main contribution for the Research domain [R] 2) what types of social interaction each participatory method produces; relevant to the Design domain [D]

## AUTHOR KEYWORDS

Participatory design; ecovillage; neighbourhood integration; Constellations; participatory visual methods; social design; participatory action research; community connection; intergroup contact; social distance

## CSS CONCEPTS

- Human-centered computing → Participatory design
- Human-centered computing → Field studies



# SAMEN ZUIDERVELD

project by Wietske Zwinkels  
film by Jens Vervoort  
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## INTRODUCTION

### Research problem

Ecovillages, *self-organised residential communities built around shared socio-ecological values*, risk becoming isolated islands of sustainability: socially exclusive, difficult to scale, and disconnected from the wider urban fabric [3]. Research calls for ecovillages to adopt a more inclusive, interdependent relationship with neighbouring communities [4]. Field visits to 4 ecovillages in the Netherlands and conversations with 2 neighbourhood directors confirm the social distance between ecovillages and neighbourhoods:

*"The step for an ordinary neighbour to walk into an ecovillage is very big. We can hope it happens on its own, but it simply doesn't."*

– Juliëtte Driessen, neighbourhood director Nijmegen-Noord

After the field visits, this project sharpened its focus to the possibility that socio-ecological value exchanges can be found and set-up between ecovillagers and neighbours. For example, neighbours who want to help in the communal garden.

### Design approach

This real world research problem is approached through a participatory visual methodology (PVM) by *using methods that use visual forms as instruments of participatory inquiry and social change*. Insights are produced with the community rather than about them [1].

The work is guided by a Participatory Action Research (PAR) ethic. [5] PAR advocates that research should be transformative in process and that findings return to the community rather than being extracted from it. This project's process is inspired by PAR principles but does not claim to be a PAR project as the session design, method selection, and analytical framing remained largely researcher- rather than community-led.

This is as Research through Design [2] study. The act of designing, in this project's case: facilitating encounters with designed artefacts in social situations, is the medium through which knowledge is generated.

This creates a twofold structure:

**[R]** Research dimension: What barriers maintain social distance between ecovillagers and neighbours, under which conditions do they dissolve or persist, and can this approach be transferred to other neighbourhoods?

**[D]** Design dimension: Which participatory methods, and under what conditions, produce which types of social interaction?



f.1 Ecovillage Zuiderveld



f.2 Zuiderveld, Nijmegen-Noord, drone shot



f.3 Ecovillage Zuiderveld, garden entrance

### The case: Ecovillage Zuiderveld

Ecovillage Zuiderveld is one of the roughly 50 ecovillages in the Netherlands [6]. The 5-year old community, located in Nijmegen-Noord consists of ~80 residents who share a communal garden, kitchen, workshop, garage, laundry, pizza oven, solar energy and rain water. The garden was designed from the start as a public space — on municipal land — but this was not communicated to the neighbourhood and not known to the municipality's own neighbourhood director. The ecovillage is located next to a conventional Dutch, social rent neighbourhood. No neighbours showed up during previous attempts to connect and few neighbours have ever walked in the communal garden.

### Situational gap

The intergroup contact theory [7] already shows that social distance typically dissolves on direct contact, as it removes misunderstandings and pre-assumptions. Also, PVM have been applied in many community contexts [1]. However, there is limited reflective documentation on how designed encounters using PVM can support connection specifically between ecovillagers and neighbours. Therefore, this study aims to contribute a situated, reflective account of how the chosen established methods function in this underexplored relational context. The following research question led the process:

**RQ:** How can a **participatory visual methodology** support conversation about **socio-ecological value exchanges** between ecovillagers and neighbours in Zuiderveld (Nijmegen)?

Sub-question 1 **[R]:** *What barriers to connection exist and under which conditions do they remain or resolve. What socio-ecological value exchanges become possible after connecting?*

Sub-question 2 **[D]:** *How do or don't the participatory methods contribute to creating cross-community social connections? Can they help identify or set-up socio-ecological value exchanges?*

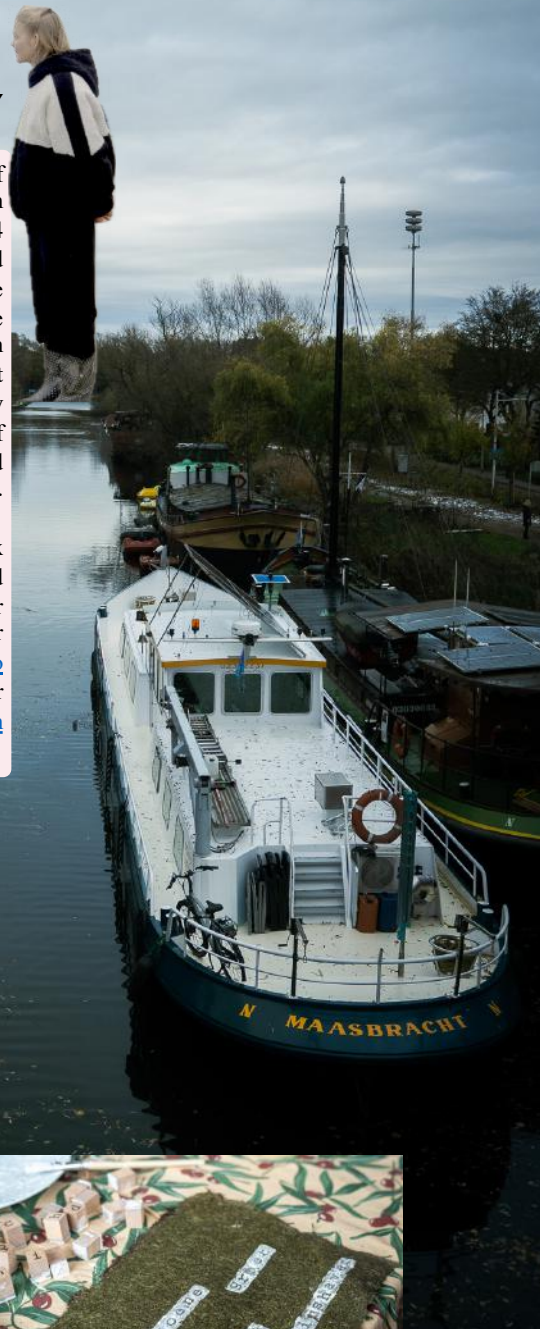
### Pictorial

This pictorial is intended as a resource for social designers and municipalities exploring how to better integrate ecovillages – or similar intentional communities – in the neighbourhood. You can read it as a reflectively documented attempt about what worked, what did not, and what remains open. It starts with providing context and a methodology section. It then presents the findings structured into 3 key moments, followed by two analyses. After a discussion it concludes with how the participatory process with visual methods was able to reinforce hope, new curiosity and start self-reflections amongst ecovillagers and neighbours as well as municipal stakeholders.

## POSITIONALITY

I entered this project with no prior knowledge of or connection to ecovillages. This outsider position formed the lense through which I approached the 4 field visits. The walking-with videos functioned mainly as my own introduction to 'the ecovillage lifestyle'. This helped to naturally approach people in an open, curiosity-driven stance. A limitation however is that insider knowledge — the kind that comes from lived experience within a community — can be lacking in this project. Some nuances of ecovillage culture and previous neighbourhood integration may have escaped my interpretation.

I entered this project with a useful toolbox regarding situated (workshop) designs and facilitation skills, and multi-stakeholder collaboration experiences. Built up through for example designing and organizing a ['Plant to Paper' workshop](#) in the harbour in Tilburg, or [bridging teachers with local woodworkers in Tanzania](#) to create reusable student materials.



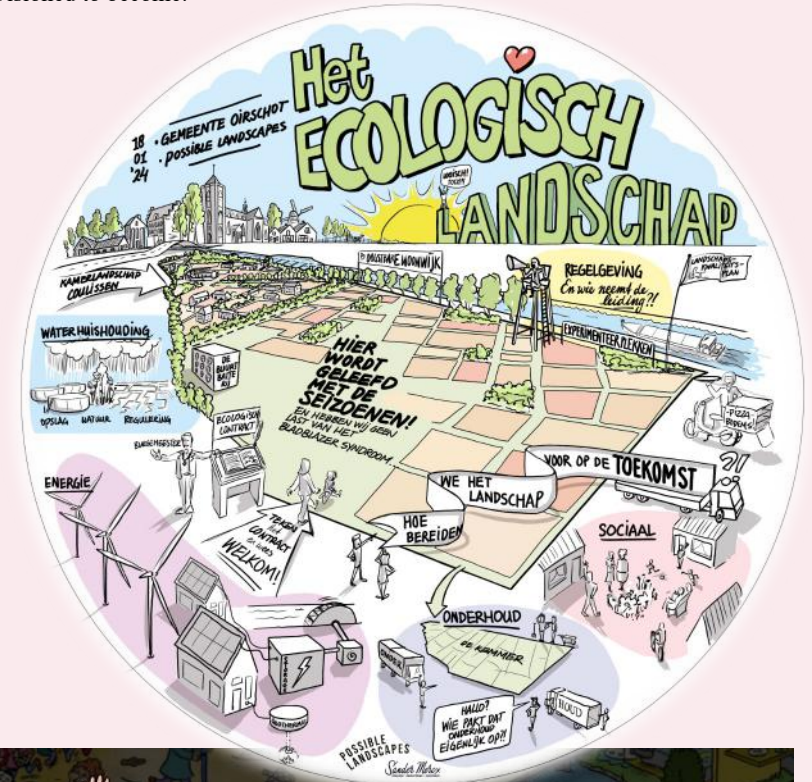
f.5-6, Tanzania project

f.7-8, Piushaven project

## RELATED REAL WORLD PROJECTS

- [The Blue House](#) [8] shows meaningful community encounter requires repeated contact, not a single event.
- [Before I Die](#) [9] demonstrates how low-threshold prompts can generate surprising depth from passers-by.
- [Possible Landscapes](#) [10] shows that co-creation sessions can produce shared graphic representations of community dialogue.
- [Circuville](#) [11] visualises socio-ecological value exchange through persona-based storytelling.

The last two real-world examples formed the north star of what this project envisioned to become:



f.9-10, Praatplaat by Possible landscapes [10] & screenshot of Circuville webpage [11]

## PARTICIPATORY PROCESS OVERVIEW

The project started with the question what we – ‘normal’ citizens – can learn from ecovillagers, and shifted towards connecting both groups. Step 1 and 2 was about defining the RtD challenge. The most important findings during these steps are written down below. These key findings helped contextualize, create and deepen step 3 and 4. The rest of the pictorial will focus on step 3 and 4.

### Walking-with videos at 4 ecovillages

*‘What can we learn from ecovillagers?’*

# 1

The walking-with video method [12] was used to capture daily routines and norms and values of ecovillagers. Key insights captured are:

**Ons Dorpje Overeind** – There is a neighbour who every day collects old bread from the supermarket, dries it outside and ecovillagers collect it to feed the chickens.

**KleinOers** – Neighbours complain about untrimmed gardens, but ecovillagers point to insects and wild flowers saying: *“They don’t understand that this garden holds the richest biodiversity around.”*

**Minitopia Eindhoven** — Sanne’s spark when she talks about what you can accomplish together, like growing many tomatoes. But also her examples about how you keep needing ‘kartrekkers’ to sustain neighbourhood connection.

**Zuiderveld, Nijmegen** – see Introduction.



f.11 Walking-with OnsDorpjeOvereind



f.12 Walking-with OnsDorpjeOvereind



f.13 Walking-with Minitopia Eindhoven



f.14 Drawing at co-creation session



f.15 Neighbourhood picnic

### Conclusions & zooming in — pilot inventarisation

*‘Why is this not everywhere? -> Why not try to spread the ecovillage spirit to neighbours?’*

# 2

The rainwater collection, the shared tools, the shared responsibilities in the garden — the 4 examples showed many benefits of this socio-ecological community life. However, still only a niche part of our society can or wants to live in an ecovillage. Ecovillagers talked about how the ecovillage community is currently strengthening connections between other ecovillages, *‘but what about the neighbours right next door?’*

Start situated study at Zuiderveld:

1. Topic-specific walking-with video asking how Lian sees the neighbourhood connection and what she would want: *‘We need more helping hands in the garden.’*
2. Pilot inventarisation: asked 10 neighbours *‘How is it for you to live next to this ecovillage? And would you like to do more together?’* One woman reacted: *“I really want to garden more, but I just not have the room and not enough knowledge.”* The first connection!



f.16-17, Walking-with Zuiderveld

# 3

### Co-creation & picnic

*‘What do you want to do together?’*

17 May 2026.

# 4

### Watch & Draw Exhibition

*‘Add your perspective too!’*

6 June 2026.



f.18-19, Watch & Draw exhibition



## METHODS

### Inspired by PAR cycles

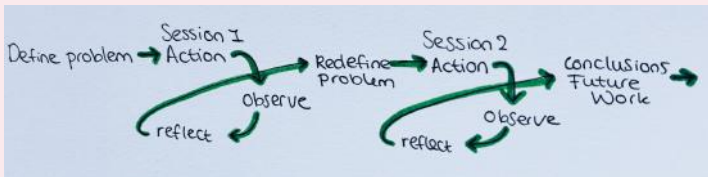
This project follows a two-cycle structure (f.20): define the problem, participatory action, observe, reflect, repeat [5].

#### Session 1 (step 3) – Co-creation + neighbourhood picnic

A co-creation session bringing ecovillagers and neighbours together for a structured encounter, closing with a shared picnic. Insights captured through film by filmmaker Jens Vervoort. Film translated into illustration by graphic illustrator Nandi Smits.

#### Session 2 (step 4) – Exhibition at Zuiderveld's 5th anniversary festival

Outcomes of Session 1 are exhibited as a public installation. Festival visitors can [watch the video](#) and illustration and respond with text, drawings or voice.



f.20 Process visual based on the cyclical process of PAR [9]

### Participatory Visual Methodology

A participatory visual approach to design was chosen because of its alignment with the PAR ethic: create insights together and return findings to the community [5]. Where purely verbal or embodied methods can quickly disappear, each participatory method in this project produces something tangible — a film, an illustration, a drawing on a map — where the community can respond to or build upon.

In total, six participatory methods have been developed, together forming a Participatory Visual Methodology [1]. Table 1 contains a brief descriptions and theoretical grounding of the created methods. More information and large images can be found in Appendix 1–6.

Method	Based on	What it is
(1) Walking-with Video	Pink's walking-with tradition in sensory ethnography [12]	Short film walking through ecovillages > QR code on invitation
(2) Puzzle Piece Invitation	Candy Chang's <a href="#">Before I Die</a> [9] low-threshold prompts	Puzzle piece-shaped invitation card filled in at home before arrival
(3) Constellation on Floor Map	Future Workshops Phase 1: Critique [14], Constellations for Transformative Futures [16]	Empacement exercise on floor map with graphic drawings of close-by (public) spaces
(4) Drawing & PoA	Future Workshops Phase 2 & 3: Fantasy & Implementation [14], Telling-making-enacting framework [15], Participatory Drawing [1]	Participants add drawings to the map and create Plans of Approach
(5) Picnic with Video	Video-recorded unstructured interviews [12]	in-depth interviews on camera
(6) Watch & Draw Exhibition	Exhibiting with video [1], Possible Landscapes [10] <a href="#">Circuville</a> [11]	installation with graphic illustration + video and drawing station

T.1 Participatory methods with short explanation

The methods differ in how central the visual functions: method (1), (3) and (6) centre around visual forms, while the *puzzle piece invitation* (2) and *picnic with video* (5) use visual artefacts as participatory triggers and documentation. The *constellation on floor map exercise* (3) has a distinct position among the six: it uses a visual floor map as ground on which participants position themselves based on felt distance from the ecovillage and each other. This is a form of enacting what Pink [12] calls emplacement – *knowing through where the body stands*. Jaasma shows this spatial positioning can enable multi-stakeholders to generate collective meaning [13]. Method (2)(3)(4)(5) together formed the co-creation + neighbourhood picnic session, structured through a Future Workshops [14] methodology.

### Participants

Participants were reached through purposive sampling based on geographic proximity. ~250 invitation cards have been distributed: ~60 within Ecovillage Zuiderveld and ~190 amongst their most direct neighbours. Those who answered the door bell received a brief face-to-face explanation of the project's intentions. Table 2 shows the quantitative participant turnout per session.

Session	Eco-villagers	Neighbours	Total	Notes
1 Co-creation	8	5	13	13 neighbours filled in forms; weather likely lowered the turnout
1 Picnic	15	15	30	10 new neighbours joined cross-community conversations
2 Exhibition	30	18	48	in-depth conversations with 10 ecovillagers and 8 neighbours

T.2 Participant turn-out per session

## ANALYSIS

### Key moments

Significant quotes are drawn from three audio sources: pre-session interviews, the co-creation session recording, and in-depth video interviews. These are combined with field notes and post-encounter reflections. Resulting insights are described through three Key Moments: reflective telling cases — each representing a (set of) distinct moments — selected because they are intuitively meaningful and concentrate findings across both dimensions [R + D] of this study.

### Thematic clustering [R]

Analysis 1 is guided by Pettigrew's theoretical distinction between personal and systemic barriers to intergroup contact [7], quotes were coded around a single question: *what keeps people from crossing the threshold to connect?* This deductive coding process sorted findings into two categories — personal and systemic barriers.

### Interaction analysis [R]

Analysis 2 is created by analyzing post-encounter reflections about the participatory methods, with a focus on three interaction types – agreeing, contrasting and generative – following Jaasma [13] and Brandt et al. [15]. This is done to examine *in what ways and to what extent each method contributed to connection*.

## KEY MOMENT 1 OF 3

# Pre-session participatory process

[R] Research finding · [D] Design finding

[R] *Many significant moments of distance reduction did not happen during or after the two sessions but during participatory session preparations.*

[D] *The pre-session participatory process — being present in the neighbourhood, building relationships before the designed encounter — is both the medium as an important part of the outcome.*

### Flyering with ecovillagers

While preparing the invitation campaign, an ecovillager wanted to come flyering with me because of his intrinsic curiosity of wanting to get to know his neighbours. Walking through the neighbourhood, knocking on doors, he found out that neighbours were more open than he had assumed. He connected with neighbours who make their own ice creams to invite them to invite them to sell those ice creams at the Festival.

*'Curiosity is a prerequisite for connection. Connection is a prerequisite for doing things together.'* - ecovillager



f.21 Ecovillager who joined flyering

### Interview with Juliëtte Driessen [R+D]

During the project I got in contact with social neighbourhood director Nijmegen-Noord Juliëtte Driessen. Next to contributing to the project by arranging municipal subsidy [A.8], she provided see her views on ecovillage integration in neighbourhoods and the role of the municipality. Together we found out she did not know the community garden was meant to be public space:

*'There's a great need in Nijmegen-Noord for more community gardens. And there's actually very little physical space left where new ones can be made. So I think it would be so helpful if more people know this garden is meant to be public and I will talk to the right colleagues about this.'*

This is a system-level finding: the gap between what the system intended and what was communicated is itself a barrier to integration. The interview prompted her to raise it with colleagues. More interesting quotes can be found in the quote list [A.7].

*'Our system world doesn't always fit people's lived reality. But policy only becomes useful when it connects to what people actually need.'* – Juliëtte Driessen



f.22 Interview Juliëtte Driessen



f.22 Set-up co-creation

### Participant fatigue [R]

When setting up the party tent in the rain before Session 1, no ecovillager reacted to my request for help. I was told beforehand that previous attempts had attracted no neighbours. Ecovillagers later explained that they feel participation fatigue [17]: *the exhaustion that comes from being repeatedly asked to contribute without much in return.* Ecovillages are a heavily researched topic today and extractive research practices [5] have left its mark. Also, many ecovillagers I met carry multiple social and voluntary roles simultaneously – a recognised pattern of over-demand on active citizens in the Dutch participatory context [17].

*"More students have tried this, but they always dropped it quickly."*

– ecovillager 1

*"But I really feel like Wietske will actually do what she says."*

– ecovillager 2

The atmosphere at Session 2 (Watch & Draw Exhibition) stood in complete contrast. Upon arriving at the festival, ecovillagers immediately offered to help without asking. They also spontaneously directed others towards the installation. Between sessions the word had spread about the co-creation session and ecovillagers expressed that the visual outcomes feel like *'presents for our ecovillage'*. Giving back helps against participation fatigue!

### Design reflection [D]

Sanders & Stappers [18] argue that participation is both the medium as the goal. During this project I felt what that means concretely: the participatory approach to design may even contribute more to reducing social distance than the specific designed artefacts. This is also a PAR ethic [5] in practice: relationships first, research second.

*"When I walk past, I do find it interesting to see how the garden is growing. But I do not dare to go somewhere new alone." - neighbour*

## KEY MOMENT 2 OF 3

# Constellations in social design

[R] Research finding · [D] Design finding

[R] *Invisible social thresholds become physically felt and discussable.*

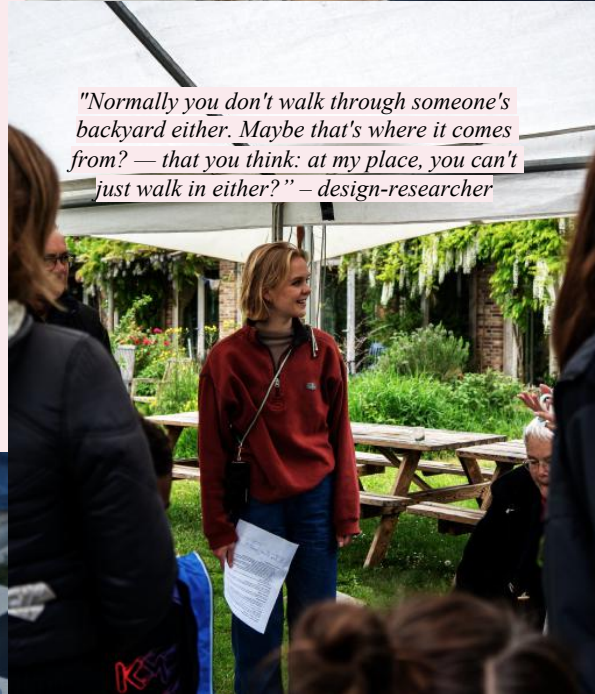
[D] *Constellations — physical positioning around a shared map — makes invisible distances visible in ways verbal methods cannot.*

### Constellation on floor map

Of all methods used, the floor map positioning produced the deepest and most unexpected insights. Participants were first asked to place themselves *where they approximately live* – based on the graphic illustrations of (public) spaces nearby. Ecovillagers close to each other, by their home, neighbours approximately where they lived. The second question was to re-order themselves based on *how close they feel connected* towards each other. During these spacial arrangements, participants opened up about how these placements make them feel – see quotes.



*"Normally you don't walk through someone's backyard either. Maybe that's where it comes from? — that you think: at my place, you can't just walk in either?" - design-researcher*



### Constellations in social design [D]

Systemic Constellations is an emerging method mostly applied to map systems within an organisation, recently documented at the Design Research Society conference with 50+ participants using physical floor positioning to make system dynamics visible [16].

This project applies the method of constellations in a neighbourhood co-design setting: not mapping organisational systems, but social distance. Embodied perception, according to Pink, locates the body as the source of knowing, the mind as a tool for interpretation [12]. The method contains four steps: map the elements; arrange them spatially; invite embodied sensing; create a move toward resolution [13]. The move towards resolution here was to translate the insights that this embodied method produced into visuals, by drawing them on the map.



*"We should really put up a sign there — right now it doesn't attract people to walk in. Officially, everyone is welcome; it's municipal land." - ecovillager*

f.24-26 Conversations during the constellation exercise

This exercise quickly produced moments of genuine vulnerability on both sides, even though neighbours were still strangers to one another. An ecovillager stood in the corner and a neighbour stood far from the ecovillage —because she had never dared enter. A resident on the waiting list stood close but said:

*'I want to belong here, but it doesn't quite feel that way yet, because you are such a close community.'*  
- resident on the waiting list



f.23 Floor map with drawings



KEY MOMENT 3 OF 3

## Unstructured room for conversations

[R] Research finding · [D] Design finding

[R] A picnic or party reaches a way more diverse set of neighbours than a co-creation workshop — different people join different formats.

[D] Graceful disengagement: designing conditions that last when the designer disappears.

### Letting go of structure [D]

The most connecting moments, looking at the laughter, friendly atmosphere and cross-community spontaneous conversations, was not during the structured FW session but during the picnic afterwards and at the festival.

A new family quietly arrived, first hiding behind a tree as they were not sure they could enter this garden. An ecovillager friendly welcomed them and invited them to join the picnic:



Father: "It feels strange to eat — this is YOUR food." Ecovillager: "That's exactly the point! We want to share. Sharing brings happiness."



"We're looking for a place where we can help in the garden — we want to DO things, help and learn, not just harvest."  
— neighbours (family)

f.27-28 Garden entrance and picnic table



'I don't recognize all perspectives in the film, but the honest self-reflections stimulate me to also honestly look at myself.'  
- ecovillager



'This illustration seems 'typically Zuiderveld' to me, but at the same time it is very nice-looking for everyone, like I want to have it as postcards to send to all kinds of people.'  
- ecovillager

f.30-31 Conversations during the Watch & Draw exhibition

'Het is zo'n mooie combi: de film laat het 'echte' zien — met eerlijke uitspraken, en de illustratie sluit daarop aan als vrolijke visie — hoe we onze realiteit samen nóg wat mooier kunnen maken.'  
- neighbour

During the picnic, children began spontaneously drawing further on the map. New adults joined out of curiosity. Ecovillagers began giving spontaneous tours of the garden to newcomers. These examples show the importance of letting control go as designer!



f.29 Drawings on the floor map

### Visual outputs as continuation [D+R]

The two visual outputs functioned as a complementary pair. The film showed honest, unscripted perspectives on the current state — setting a tone of openness which helped new visitors to more quickly open up about their personal perspective too. The illustration followed was described mostly as a happy vision board upon their current reality.

Both outputs now can continue the conversation beyond the researcher's presence. The film will once more be showed at the next 'Zotte Zondag' — a monthly coffee garden moment set up during the co-creation. The artwork will be placed on the wall and printed into postcards to spread further and the video is distributed on more platforms by the municipality. Whether the initiated values persist without continued support remains open, but at least a hopeful tone has been set.

### Multiple entry points [D+R]

Many people will never join a co-creation session — not everyone wants to position themselves on a map or articulate wishes in a group. This project shows that different people enter through different doors: the structured session attracted those already open to connection; the picnic drew people who came for food or the garden; the festival exhibition reached people who may never would attend either. The designer's task is not to pick one format but to create multiple entry points.

ecovillager

neighbour

municipality

## ANALYSIS 1 — READING ACROSS THE THREE KEY MOMENTS

## Clustering the threshold to connect

Figure 1 is a canvas with quotes regarding ‘the threshold for neighbourhood and ecovillage to connect with each other’ clustered as *personal vs systemic barrier* and *dissolved on contact vs barrier remained*.

This clustering step informs part of the answer to:

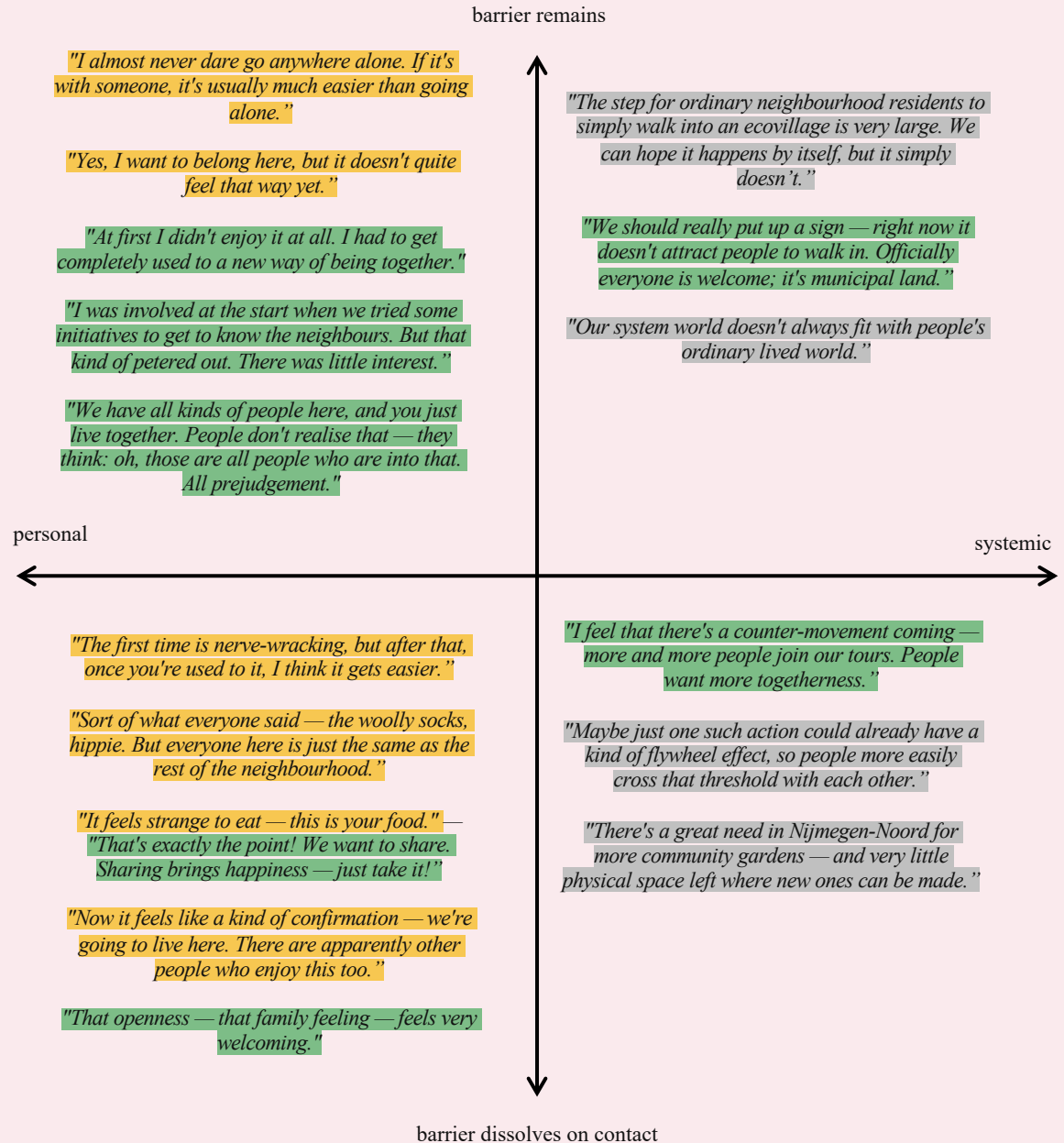
Sub-question 1 [R]: *What barriers to connection exist and under which conditions do they remain or resolve. What socio-ecological value exchanges become possible after connecting?*

**Key finding [R]**

Personal barriers – the father who felt he should not eat from the communal picnic or a neighbour who didn’t dare to enter the garden alone – dissolve quickly on contact. Systemic barriers – no sign at the garden entrance, municipality forgot about the public intention, ‘eco’ label) persist after the session.

At the start of the first encounter, ecovillagers mainly faced the personal barrier of their prejudices about their neighbours: ‘*They never show up, so they do not want to connect with us/do not like us*’. Neighbours opened up about how high the barrier is to walk-in and connect because the ecovillage strongly feels like a closed community for them. In contrast to the systemic barriers, most personal barriers showed to dissolve quickly on contact. This finding is in line with the intergroup contact theory [7], arguing that personal barriers dissolve quickly on contact, while systemic barriers take longer and often require structural/institutional change.

This emphasizes the importance of designers and citizens to have feedback loops with municipal stakeholders. No systemic barriers have been resolved during this project. Only hypothetical solutions to systemic barriers are provided or conversations within the municipality about how to open up the community garden have been started. To further dissolve systemic barrier the garden entrance should be redesigned.



## Interaction analysis in what ways PVM contributed to connection

This table contains post-encounter reflections regarding in what ways the participatory methods functioned. They have been labeled as ‘agreeing, contrastings or generative’ kinds of interaction following Jaasma [13] and Brandt et al. [15].

This table contains important insights to answer:

Sub-question 2 [D]: *How do or don't the participatory methods contribute to creating cross-community social connections? Can they help identify or set-up socio-ecological value exchanges?*

### Key finding [D]

Participatory method (3), (5) and (6) contributed the most to generative, cross-community interactions. The puzzle piece introduction (2) created mostly confirming and within-group interactions, functioning well as a warm-up exercise. Drawing new realities on the floor map (4) felt somewhat forced during the co-creation as people were more in the mindset to chat rather than draw.

Table X looks at each method individually. However it is important to incorporate the sequencing into this analysis. The conversation flow changed from awkward silences at the start to organic dialogue in the end. The structured FW session felt somewhat forced, whereas at the picnic there was genuine enjoyment, people stayed for hours and new people joined. What stands out when looking at the social atmosphere over time, is that, even though the constellation exercise was almost at the complete beginning, it did create honest self-reflections and moments of genuine recognition.

The key finding of using a PVM came at the end when returning the visual findings at the festival (6). The illustration gave people something to point to, disagree with, and build on and ecovillagers expressed that this visual return of insights feels like a present to them.

Participatory method	Agreeing (participant's response mirrors or validates what is visually presented)	Contrasting (participant's response challenges, questions or introduces an alternative)	Generative (participant's response builds on or extends beyond what is visually presented)
1. Walking-with Video	Some people wrote down wishes similar to those shown in the video	For most people the film did not heavily influence what they wrote down on their puzzle piece.	
2. Puzzle Piece Invitation	People acknowledged each other's puzzle pieces with verbal or physical agreement — nodding, "yes, me too,". Good as get-to-know round/warming-up exercise.		
3. Constellation on Floor Map	Ecovillagers position themselves closely towards one another – almost hugging - and agree they feel this close: 'like family'.	Neighbours opened up in honest and vulnerable ways about how they do not dare to enter the community or how they do not (yet) feel comfortable in this garden where they 'do not belong'.	People react on each other, showing empathy or coming up with solutions when vulnerability is shown: 'Now we know you a little bit – that will make it easier to pass by again.'
4. Drawing & Plan of Approach	During the session people found some matches to connect their puzzle pieces, but the drawing on the map was not very generative. The atmosphere was more: 'we just want to talk.'		During the picnic children asked me if they could draw their hobbies on the map. Of course! The children lowered the threshold for adults because for 2 hours straight new people started spontaneously drawing on the map.
5. Picnic with Video	People narrated back what was said in the session, summarizing it and confirming that is how they feel. Concrete actions were taken to move forward: phone numbers exchanged, first activities planned.	Reflective conversations about how to move forward as there were systemic and personal barriers still unsolved.	Some deepened the conversation — adding context or nuance. Two ecovillagers came with concrete steps to continue neighbourhood connection, like: Zotte Zondag - garden coffee moment (every month, clear marketing, low threshold)
6. Watch & Draw Exhibition	People recognize themselves in the film and illustration (nodding and discussing similar topics together)	Film: neighbours express that they did not have the prejudice of 'there only live hippies here' and add their own perspective.	Further talks with garden responsables about how to open up the garden for the neighbourhood in a win-win way.

T.3 Contribution of each participatory method

## DISCUSSION

### [R] The 'eco' paradox

No neighbour nor ecovillager initiated a conversation about ecological values separate from social ones during the project. Ecovillagers explained why: *'We believe social connectedness comes first, because through sharing and caring for each other ecological living follows.'* This however is contradicting to what the name 'ecovillage' imposed to neighbours. The word 'eco' in ecovillage attracts a specific type of person and can push away others. Nielsen-Englyst & Gausset [3] show that ecovillage identity and mainstream accessibility are in structural tension; Pettigrew [7] confirms that societal norms shape contact before it even begins. This study shows that tension operates through naming and representation, not only physical exclusivity. If the goal is integration with a diverse neighbourhood, what an intentional community calls itself — and how it introduces itself — deserves as much design attention as the physical space.

Yet the RQ asked specifically about socio-ecological value exchanges, and this study can only partially answer it. Of course, social connection had to come before shared ecological practice could begin — and this project proved too short to move beyond that first step. One concrete exchange is now in progress: the communal garden opening up to neighbourhood volunteers. Beyond that, only social exchanges were identified and set-up: for example the monthly garden coffee moment. This raises an the question: was the RQ too ambitious for the timeframe and establishing social conditions the necessary and sufficient first contribution or could the research be designed differently to stimulate setting-up socio-ecological value exchanges between neighbours more quickly?

### [R+ D] PVM and PAR outside marginalised contexts

Both PAR and PVM are rooted in work with historically marginalised communities [1, 5]. This study applies them in a conventional Dutch social housing neighbourhood, where participants are not marginalised in the traditional sense. However, the core needs these methods address — being genuinely heard and receiving something tangible back — proved equally relevant here, in a context of growing social polarisation and participation fatigue. But one clear limitation remains: this neighbourhood was socioeconomically homogeneous. Whether these methods work across greater socioeconomic diversity within a neighbourhood remains untested. It may be possible that one group then over shadows the other.

### [D] A social designer's role

When overarching looking at what produced the most cross-community connection, the answer is the unstructured picnic or party. You could argue: *what is the role of design when the most generative moments are the ones you don't design?* However, without the designed session or visual installation, people would not have been in the same headspace. What it does show is that designing the conditions for spontaneity needs to be done as careful as designing the participatory methods themselves.

*"We also have to look at ourselves." – ecovillager*



## LIMITATIONS

### *[R] Reach and selection bias*

Of ~250 invitation cards, 13 people attended the co-creation session. At the picnic, 15 neighbours joined — but most were already open to connection, on the waiting list, or involved in community initiatives. The festival reached 18 neighbours in in-depth conversation, a more diverse group, but still self-selected: people who chose to attend a celebration. Across these three formats, the same pattern can be seen: those who showed up were already curious. How to reach the 95% who stay quiet inside — who perhaps need connection most — remains the central unanswered question of this study. Future projects can experiment more with formats requiring no significant time commitment and no physical attendance: for example watching the film and illustration at home.

### *[R] Social continuity*

Do the connections made persist? Did the neighbour return to help in the garden? Did the 'Zotte Zondag' happen for the second time? Do ecovillagers and neighbours small-talk with each other in the street? Longitudinal documentation would provide evidence currently absent.

### *[D] Facilitator skill requirements*

The constellation on the floor map requires near-psychologist skills: deep empathy, the ability to sit with vulnerability but also knowing when to continue and strong group reading. This was challenging, say almost impossible, to put to its full potential for me as a single designer-researcher, with the task to both structure the session as deepening the conversation. The method works — but it is not easily transferable without training and needs at least two skilled facilitators.



f.34 Ecovillage Zuiderveld Drone shot

## FUTURE WORK

### *[R] Transferring to similar contexts*

Is this method ready for other ecovillages? In principle, yes. In practice it requires: a designer, filmmaker, graphic artist and volunteers with neighbourhood knowledge. In the current format this would be realistically possible if municipalities have roughly double the budget what was received for this project [A.8]. Municipalities can sit together with designers to specify the PVM to situated needs and available budget.

About the approach, I suggest that after the creation of a situated vision board (like Nandi's illustration), the design-researcher should focus on finding one meaningful, sustainable socio-ecological exchange per context and working closely with the community on how to implement it to keep it alive — rather than trying to set up many at once. One recurring exchange, well-designed and genuinely mutual, may do more for integration than many one-off initiatives.

### *[D] Redesigning the entrance*

In Zuiderveld, I believe this one socio-ecological exchange is making the food garden public. To do so, this study for example identified the need to redesign the entrance. This is an interesting design challenge about embodiment and spatial design. The chosen designer needs to approach with multi-stakeholder involvement: municipality, ecovillagers and neighbourhood, to create a system that is a win-win for all stakeholders.



f.35 Graphic illustration made by Nandi Smits

## CONCLUSIONS

### [R] Research conclusions

The most important conclusion for the research domain is how this study shows that social distance between ecovillages and neighbouring communities is maintained by two structurally different types of thresholds:

1. personal barriers that can dissolve quickly through social gatherings. However, meaningful social connection requires repeated contact: the social integration of an ecovillage in the neighbourhood is a process, not an event. It is needed to create multiple entry points with different kind of thresholds to reach and connect a diverse set of neighbours with each other. But at the same time it is needed to do one thing routinely good, to create an socio-ecological value exchange that can grow into a well-functioning win-win situation.
2. systemic barriers that require structural intervention that goes beyond what a single designed session can achieve. Addressing them demands a sustained feedback loop with the municipality: translating community findings into policy action, and commissioning spatial interventions such as a redesign of the garden entrance. Visual outputs can play a role here too — as evidence and as persuasion — making abstract community needs concrete and legible to institutional decision-makers.

## COLLABORATORS AND THANKWORD

This project would have not been possible without the expertise and video outputs of Jens Vervoort (Visual Ethnography and filmmaker), and the graphic illustration of Nandi Smits (graphic illustrator). Next to these collaborators I want to thank everyone from ecovillage Zuiderveld and the neighbourhood who collaborated with their time, openness and ideas. Thank you Juliette Driessen (gemeente Nijmegen) for your candid perspective and the municipalities willingness to fund this design-research project. Lastly, thank you Stephan Wensveen (supervisor TU/e Industrial Design) for guiding me throughout this process.

### AI statement

This deliverable was created with Claude (Anthropic), which was used to correct and tighten sections of this pictorial's text.

### [D] Design conclusions

One participatory method I want to highlight is the application of systemic constellation in social design neighbourhood settings. It produced significantly deep cross-community dialogue — making invisible social distances visible and feelable. It does require two trained facilitators.

The most important design insight concerns exhibiting the visual outputs. The film showed honest, unscripted perspectives on the current state of the neighbourhood — setting a tone of openness that helped new visitors quickly share their own. The illustration followed as a collective vision: an image of what living together could become. This complementary pair is where PVM most directly fulfils the PAR principle of returning findings to the community rather than extracting them [1, 5] — because there is something tangible to give back. The video and illustration format also provide many possibilities on how to give it back — e.g. the illustration on postcards sending hope — and how to inspire a broader range of people — e.g. the video on social media platforms. I see the future as possibilities to be imagined together — and these outputs can keep that imagination alive after the researcher has left.



## REFERENCES

- [1] Mitchell, C., De Lange, N. & Moletsane, R. (2017). *Participatory Visual Methodologies: Social Change, Community and Policy*. SAGE.
- [2] Frayling, C. (1993). *Research in art and design*. Royal College of Art Research Papers, 1(1).
- [3] Nielsen-Englyst, C. & Gausset, Q. (2024). From countercultural ecovillages to mainstream green neighbourhoods. *npj Climate Action*, 3, 60.
- [4] Rautan, I. et al. (2025). Ecovillages: From isolated communities to ideal models of sustainable communities. *Community Development Journal*.
- [5] Cornish, F. et al. (2023). Participatory action research. *Nature Reviews Methods Primers*, 3, 34
- [6] GEN Europe Global Ecovillage Network. n.d. GEN NL – Ecodorpen Network. Retrieved June 8, 2026 from <https://gen-europe.org/geneunetworks/gen-nl-ecodorpen-network/>
- [7] Pettigrew, T.F. (1998). Intergroup Contact Theory. *Annual Review of Psychology*, 49.
- [8] Van Heeswijk, J. (2005–2009). *The Blue House*. Amsterdam. Retrieved June 8, 2026 from [https://www.jeannetworks.net/projects/the\\_blue\\_house/](https://www.jeannetworks.net/projects/the_blue_house/)
- [9] Chang, C. (2011–ongoing). *Before I Die*. Public art installation. Retrieved June 8, 2026 from <https://www.candychang.com/beforeidie/>
- [10] Biobased Creations (2022). *Possible Landscapes: De Kemmer, Oirschot*. Retrieved June 8, 2026 from <https://possiblelandscapes.com/nl/biobased-verbouwen-in-de-kemmer-oirschot-3/>
- [11] Biobased Creations & Studio Goudbaard [De Man, L. & Goudswaard, W.] (n.d.). *Circuville*. PLUS Change / Horizon Europe. Retrieved June 8, 2026 from [www.circuville.com](http://www.circuville.com)
- [12] Pink, S. (2009). *Doing Sensory Ethnography*. SAGE.
- [13] Jaasma, P.G. (2018). *Exchanging perspectives: Designing for public sphere*. Doctoral dissertation, TU/e.
- [14] Jungk, R. & Müllert, N. (1987). *Future Workshops: How to create desirable futures*. Institute of Social Inventions, London.
- [15] Brandt, E., Binder, T. & Sanders, E.B.-N. (2012). Tools and techniques: Ways to engage telling, making and enacting. In *Routledge Handbook of Participatory Design*. Routledge.
- [16] Speed, C. et al. (2024). *Mapping Constellations for Transformative Futures*. DRS2024: Boston. doi.org/10.21606/drs.2024.1527
- [17] Janet Newman and Evelien Tonkens (Eds.). 2011. *Participation, Responsibility and Choice: Summoning the Active Citizen in Western European Welfare States*. Amsterdam University Press, Amsterdam, the Netherlands.
- [18] Sanders, E.B.-N. & Stappers, P.J. (2008). Co-creation and the new landscapes of design. *CoDesign*, 4(1).

## Appendix 1

### PARTICIPATORY METHOD 1

## WALKING-WITH VIDEOS

Drawing on Pink's walking-with tradition in sensory ethnography [12] was used at four ecovillages (Ons Dorpje Overeind, KleinOers, Minitopia and Ecodorp Zuiderveld) to capture daily routines and norms and values of ecovillagers. The main questions were: *'What can we learn from how you live together? And how can some practices be transferred outside ecovillages?'*

A compilation of these films has been distributed via a QR code and on the invitation card for the Co-Creation + Neighbourhood Picnic. 300 physical invitation cards have been distributed, ringing doorbells to quickly explain our intentions face-to-face to as many neighbours as possible.

The film invites recipients to already get to know some ecovillagers and move through ecovillage Zuiderveld perceptually, feeling the space before physically entering it. The aim of this is to lower the threshold of arrival.



f.36 Walking-with OnsDorpjeOvereind



f.37 Walking-with OnsDorpjeOvereind



f.38 Walking-with Minitopia Eindhoven



f.39, Walking-with ecovillage Zuiderveld



f.40, Walking-with ecovillage Zuiderveld



f.41 Drone shot Minitopia Eindhoven

## Appendix 2

### PARTICIPATORY METHOD 2

## PUZZLE PIECE INVITATION

Next to the Walking-with Video on the back of the invitation card, invitees can write what they want to do together with the neighbourhood, externalising individual wishes before group dynamics can shape them.

At the start of the co-creation, participants introduce themselves through what they wrote on their puzzle piece at home, functioning as a warming-up exercise. Later in the session we held a 'networking' round where people tried to match their puzzle pieces with each other.

JIJ BENT HET ONTBREKENDE  
**PUZZEL STUKJE**  
VOEL JE WELKOM IN  
VAN ECODORP ZUIDE  
17 MEI, 2026  
MELD JE HIER AAN:  
CONTACT: WIJTSKEZWIJKELS@GMAIL.COM  
10:30-12:30 CO-CREATIE SESSIE MET WIJTSKE ZWIJKELS  
> 12:30 BUURT PICKNICK

Je bent uitgenodigd voor een gezellige buurtkring waarin we gaan ontdekken welke wensen er spelen in de buurt. Tijdens de sessie gaan we samen puzzelen; bij welk stukje past dat van jou? Met als doel om waardevolle connecties te starten of te versterken.

Ik doe actie-onderzoeken naar hoe we op een leuke manier samen komen en samen kunnen werken aan duurzame en sociale manieren van leven. Dit project zoekt naar wat **ecodorp Zuiderveld en aanliggende buurt voor elkaar (kunnen) betekenen**. Denk aan dagelijkse uitwisselingen en bezigheden. Met participatory design – samen ontwerpen – organiseer ik een creatieve sessie om mogelijke waarde uitwisselingen verkennen.

Het grafische kunstwerk met video fragmenten zal tentoond worden gesteld op Zuiderveld op 6 juni!  
Wees welkom om ook daar je stem te laten horen en buurtconnecties te maken.

De sessie zal op een persoonlijke manier worden vast gelegd door filmmaker DeGrootJens

Julie gesprekken worden omgezet in een grafische illustratie door Hey Nan!

JENS VERVOORT  
NANDI SMITS

## VUL IN EN NEEM UITGEKNIPT MEE NAAR DE BUURTKRING OP 17 MEI, 2026

Vul hieronder in naar welke waarden jij op zoek bent in de buurt of wat je wilt bieden (tuinieren, kinder oppas, creativiteit, eten, sporten?). Tijdens de sessie gaan we puzzelen: bij welk stukje past dat van jou? Met als doel om waardevolle connecties te starten of te versterken.

## INSPIRATIE?

### ECODORP VIDEO COMPILATIE

Wij gingen langs 3 ecodorpen in Nederland om te ontdekken hoe mensen hier op een sociale, duurzame, leuke manier samen leven. Wellicht geeft deze video je inspiratie over jouw wensen.



## Appendix 3

### PARTICIPATORY METHOD 3

## CONSTELLATION IN SOCIAL DESIGN

FW phase 1: Critique (reflecting on the current state)

In this session, participants were asked to:

1. Stand on the floor map where they approximately live, oriented toward the illustrated public spaces in the neighbourhood.
2. Re-order themselves based on how connected they feel to the people around them.

These contrasting spatial arrangements formed the Critique phase of the Future Workshops structure [14]: reflecting on the current state of neighbourhood connection before moving towards imagination and action.

*"When I walk past, I do find it interesting to see how the garden is growing. But I do not dare to go somewhere new alone." - neighbour*



*"Normally you don't walk through someone's backyard either. Maybe that's where it comes from? — that you think: at my place, you can't just walk in either?" — design-researcher*



*"We should really put up a sign there — right now it doesn't attract people to walk in. Officially, everyone is welcome; it's municipal land." - ecovillager*



## Appendix 4

### PARTICIPATORY METHOD 4

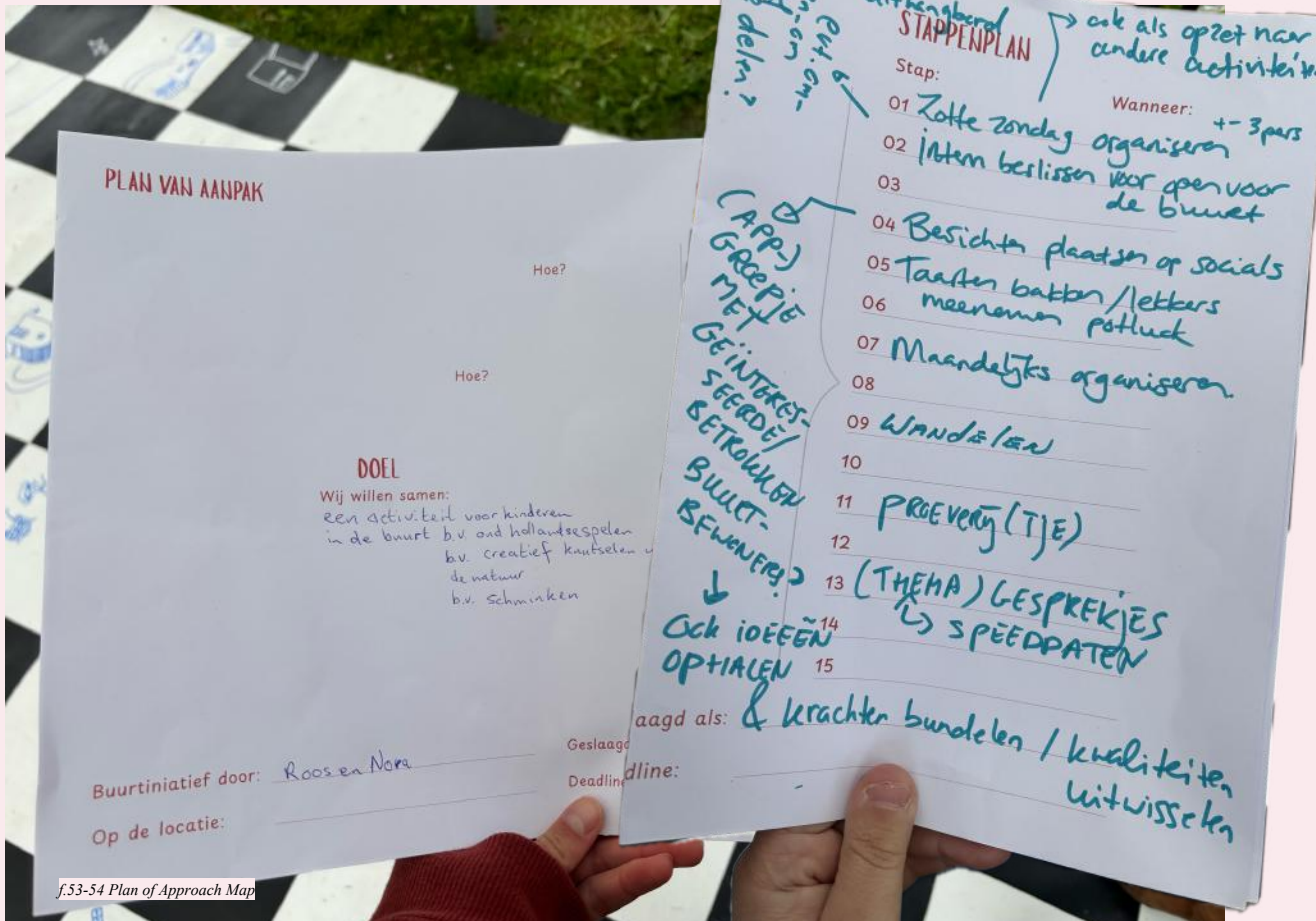
## DRAWING & PLAN OF APPROACH

FW Phase 2 + 3: Fantasy & Implementation

Moving into FW phase 2 – the fantasy phase [14] - participants connect their puzzle pieces on the map and sketch what living together could look like. The making and enacting modes of the telling-making-enacting framework [15], tell us that drawing together can produce shared imagination: a co-authored future is harder to dismiss than one only discussed. The session then moves to FW phase 3 – the implementation phase [14]. Participants filled in Plan of Approach maps, to help them move towards concrete, small actions that they realistically commit to.



f.51-52 Drawings at floor map



f.53-54 Plan of Approach Map

## Appendix 5

### PARTICIPATORY METHOD 5

## PICNIC WITH VIDEO

The structured session closes with a shared communal picnic where also new neighbours and ecovillagers joined. Letting structure go as a designer, created room for spontaneous cross-community interactions. Filmmaker Jens Vervoort conducted in-depth video interviews during the picnic, capturing reflections on the session, the ecovillage, and what participants want next. [This video](#) shows in-depth reflection on the topic.



f.56-61 Stills from the picnic video

## Appendix 6

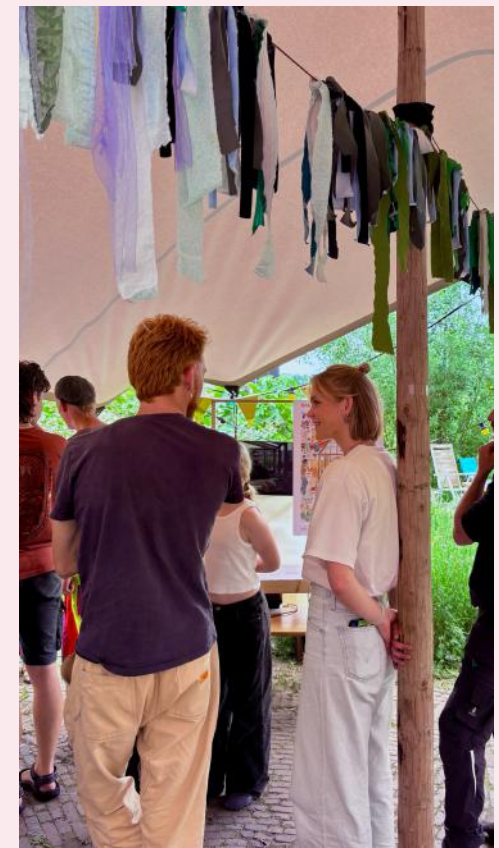
### PARTICIPATORY METHOD 6

## WATCH & DRAW EXHIBITION

Graphic artist Nandi Smits translates the findings of Session 1 into a collective visual image of how Zuiderveld wants to live together. Exhibited at the ecovillage's 5th anniversary festival alongside the walking-with video, the installation can be seen as a research instrument: festival visitors draw and write in response — what resonates, what is missing, what they disagree with. Following van Heeswijk's principle that meaningful community encounter requires repeated contact over time [8], and Cornish et al.'s PAR ethic that findings return to rather than are extracted from the community [5], this second session constitutes the collaborative analysis phase of the research.



f.62 Watch & Draw installation at the festival



f.63-64 Conversations at the festival



f.65 Drawings at the festival