International Journal of Entrepreneurial Behavior & Research

67

Experimentation in "everyday" small business ventures

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Received 21 March 2024
Revised 19 August 2024
15 November 2024
Accepted 8 January 2025

Abstract

Purpose – Entrepreneurial experimentation is often studied in the context of tech, retail and high-growth startups. Current interpretations lean on limited empirical data and suggest structured and deliberate approaches. Our empirical observations in the food and beverage industry expand these perspectives by revealing emergent and impulsive experimentation practices.

Design/methodology/approach – A qualitative multiple case study of 20 small food and beverage ventures examined experimentation within non-tech and "everyday" contexts. Applying an abductive research design, the authors investigate experimentation practices through the conceptual lenses of transformation, social learning model, play, improvisation and entrepreneurial hustle.

Findings – The study reveals three forms of experimentation in the food and beverage sector: informative decision-making, transformative learning and improvisational exploring. These forms vary in their deliberateness and differ from those seen in the context of tech, retail and high-growth start-ups. In the food and beverage sector, not all uncertainties and opportunities can be rationally validated, but they require transformational social interactions with stakeholders, and swiftly changing situations need to be addressed in ways other than rationally pre-planned experiments.

Originality/value – This study contributes to the entrepreneurship literature by extending the dominant rational view of experimentation. By refining deliberateness in entrepreneurial actions and synthesizing and categorizing experimentation in three forms, this study constructs a more nuanced picture of what entrepreneurial experimentation consists of in the work of "everyday" ventures.

Keywords Innovation, Experimentation, Entrepreneurial action, Everyday, Entrepreneurship

Paper type Research paper

This article uses data collected under a larger research project, DesignBites. Conceptualization, investigation, project coordination and funding acquisition have been the DesignBites research team's joint effort, which the paper's authors would like to thank and acknowledge. More specifically, the following people have taken part in the DesignBites project for the data used in this article (According to the CRediT statement): Maria Talvinko (investigation, conceptualization, methodology, funding acquisition and project administration), Tua Björklund (investigation, conceptualization, methodology, funding acquisition, project administration and supervision), Ville Kukko-Liedes (investigation, conceptualization and methodology), Erika Perttunen (investigation), Anna Kuukka (investigation), Hanna Huhtonen (investigation) and Martyna Kosmala (investigation).

We would also like to thank the Antti Wihuri Foundation for funding most of the data collected and Business Finland (No. 211822) for partial funding of interviews conducted in 2020. We also would like to thank Nico Klenner for initial inspiration and discussions about entrepreneurial experimentation and Jouni Partanen for support throughout the writing process.

CRediT author statement: Maria Talvinko: conceptualization, methodology, formal analysis, investigation, writing – original draft, writing – review and editing, visualization, project administration, funding acquisition; *Antonius van den Broek:* conceptualization, methodology, writing – original draft, writing – review and editing; *Mikko Koria:* conceptualization, methodology, writing – review and rditing.

International Journal of Entrepreneurial Behavior & Research
Vol. 31 No. 11, 2025
pp. 67-91
Emerald Publishing Limited
e-ISSN: 1758-6534
p-ISSN: 1355-2554
DOI 10.1108/IJEBR-03-2024-0279

Introduction

Entrepreneurial experimentation is gaining momentum in the discussions of entrepreneurial action. Entrepreneurs experiment to reduce uncertainty in decision-making (Kerr *et al.*, 2014), to strategize based on gained knowledge and theory-based learning (e.g. Ehrig and Schmidt, 2022; Gans *et al.*, 2019), and to refine opportunities with their communities (Shepherd *et al.*, 2022). Commonly defined as: *"the application of "scientific" experimentation or the "scientific method" by entrepreneurs to the key parameters of their business"* (Murray and Tripsas, 2004, p. 53), the concept is popularized for entrepreneurs to systematically test hypotheses and engage in continuous innovation by iterative testing, learning, and adaptation in the real world (Ries, 2017). Unlike the broader concept of entrepreneurship, which focuses on a wider set of strategic practices such as planning, recruitment, and resource acquisition, experimentation is considered a specific time-bound practice that addresses tactical-level challenges, such as business model development (Hampel *et al.*, 2020), flexibility in resource allocation (Camuffo *et al.*, 2020), and expansion of solution spaces during crises (Björklund *et al.*, 2020).

Despite increasing interest, empirical research on entrepreneurial experimentation remains scarce and has been primarily conducted in the technology and retail sectors (Hampel *et al.*, 2020), leading to the general notion that all experimentation takes rational forms. For example, Camuffo *et al.* (2020) tested and introduced a scientific approach with Italian startups, Contigiani (2023) studied appropriability with experimentation in the US software industry, and Chen *et al.* (2022) focused on computational simulation, discussing the way designing a program of experimentation supports pivoting and decision-making.

Recently, several researchers have started to question the preference for scientific, rational interpretation of entrepreneurial action (Packard and Bylund, 2021; Zellweger and Zenger, 2021), which is based on deliberativeness, reasoned and intentional judgment regardless of causal or effectual logic (Lerner *et al.*, 2018); further suggesting exploration around less deliberative, a-rational, and even impulsive approaches in entrepreneurial action (Lerner *et al.*, 2018; Pietersen and Botha, 2021; Wiklund *et al.*, 2018).

The emergence of these contrasting interpretations signals a timely opportunity to explore the broader spectrum of entrepreneurial experimentation (Hunt *et al.*, 2022). Combined with the calls for further empirical investigations of entrepreneurial action in "everyday" sectors (e.g. Welter *et al.*, 2017), such as the food and beverage, and the limited number of publications around experimentation (Hampel *et al.*, 2020), prompts the question: *Which different forms of experimentation do entrepreneurs in "everyday" sectors use?*

This research question is addressed with a qualitative exploratory study of the experimentation episodes of 20 small Finnish food and beverage ventures working with packaged products. Applying an abductive research design, we analyze experimentation practices through the conceptual lenses of its rational forms (e.g. Kerr *et al.*, 2014), a social learning model (e.g. Shepherd *et al.*, 2022), play (e.g. Hjorth *et al.*, 2018), improvisation (e.g. Miner *et al.*, 2001) and entrepreneurial hustle (Fisher *et al.*, 2020).

This study shows how small business ventures in beverage and food employ experimentation practices that vary in deliberativeness and openness in three forms: *informed decision-making*, *transformative learning*, and *improvisational exploring*. The first two forms are deliberately designed to resolve specified challenges and uncertainties in opportunities in joint with communities of inquiry; however, they vary in the openness and mode of engaging with stakeholders. In contrast, the third form, improvisational exploration, occurs less deliberately, is prompted more spontaneously by external or internal drivers, and leans on play, improvisation, and entrepreneurial hustle. These findings expand the current interpretation of entrepreneurial experimentation beyond the practices of non-tech and non-retail sectors and consequently be relevant for a more diverse set of organizations and contexts.

Theoretical background

The following section reviews the literature on experimentation in entrepreneurship and, more broadly, in organization and management, considering both deliberate and less deliberate forms.

Deliberate forms of experimentation

Entrepreneurial success depends on identifying key uncertainties of an opportunity and resolving those effectively and rapidly through experimentation (Kerr *et al.*, 2014). To do so, entrepreneurs engage in "focused engagement" (Shepherd *et al.*, 2022, p. 14), where experimentation supports decision-making by choosing amongst alternative strategies (Gans *et al.*, 2019), testing assumptions (Ehrig and Schmidt, 2022), and recombining resources in a novel way to innovate (Foss *et al.*, 2019). Indeed, entrepreneurial experimentation is vital for transferring new knowledge and creating continuous innovation (Ries, 2017) and innovation systems (Lindholm-Dahlstrand *et al.*, 2019). Experimentation is further used to assess the potential value of opportunities before allocating further resources toward the finalized outcome (Contigiani, 2023). These approaches have often been interpreted as deliberate action, where entrepreneurs conduct experiments using the scientific method to test hypotheses tied to the identified variables (Murray and Tripsas, 2004).

Other scholars have found that experimentation also reduces uncertainty by engaging with key stakeholders to learn (Shepherd *et al.*, 2022) about potential opportunities and negotiating to transform and influence their surroundings (Berglund *et al.*, 2020). Uncertainty is reduced by gaining control of the environment and shaping the future by engaging actively with strategic alliances (Sarasvathy, 2001). Explained by a social learning model of opportunity development (Shepherd *et al.*, 2022), openly engaging with communities of inquiry, "*potential stakeholders that provide feedback on the veracity of the potential opportunity*" (Shepherd, 2015, p. 491), entrepreneurs gain information, form alternative options, and test opportunities through "disconfirmation." Bremner and Eisenhardt (2022) emphasize the importance of external communities in experimentation efforts, as there is often a lack of team diversity and, at times, getting involved in broader, larger-scale joint exploration. As communities of inquiry refine the potential opportunity, a change in both the creator's mind and the context occurs (Shepherd, 2015). Similarly, in Berglund *et al.*'s (2020) concept of "transformation," an evolving network of diverse stakeholders interacts creatively to design opportunities and the environment, extending the formal organizations' boundaries. The design principle of open-ended negotiation with stakeholders facilitates joint sense-making and co-creation using "mutable artifacts" (Berglund *et al.*, 2020), aligning with a social learning model (Shepherd *et al.*, 2022), where entrepreneurs progress in opportunity development by showing prototypes early on to their stakeholders and co-creating different alternatives.

Emergent forms of experimentation

Various scholars have suggested that entrepreneurial action may also be less deliberate and even be improvisational (Lerner *et al.*, 2018; Pietersen and Botha, 2021; Wiklund *et al.*, 2018), suggesting that experimentation may equally be improvisational. Scholars in the broader field of organizational theory explain that improvisation means acting without prior anticipation and acting on the unforeseen (Weick, 1998), as well as responding to the unexpected and its source (Cunha *et al.*, 2015). This extemporaneous composing refers to "*on-the-spot surfacing, criticizing, restructuring, and testing of intuitive understandings of experienced phenomena,*" with the ongoing action shaping the outcome (Schön, 1987 cited in Weick, 1998 p. 544). Extending this, Montuori (2003) notes that improvisation can be seen as second best to more orderly ways, where instead of choosing to improvise, it is done under the lack of general rules and recipes. Miner *et al.* (2001) characterize the purpose of improvisational learning as solving

surprising problems or creating value from unexpected opportunities with a lack of pre-planning, as well as post-hoc reflection.

Such improvisation might also lack rational thought, as explored by Hjorth *et al.* (2018), who explain that "play" is a free movement engaging with spaces of potentiality, hence not regulated by concepts specified goals. Play further suggests pleasure and enjoyment, avoiding boredom and overstimulation (Petelczyc *et al.*, 2018), and emotional states affecting entrepreneurial processes (Cardon *et al.*, 2012). Play stimulates novelty by exploring diverse ideas and possibilities, with less functional fixedness, inability to see alternative solutions and use-bases, and premature closures, common pitfalls associated with experimentation (Mainemelis and Ronson, 2006). Mainemelis and Ronson (2006) suggest that play may stem from deliberateness but unfold a-rationally as improvisational play or include goals that transform over time, called experimental play. The authors (Mainemelis and Ronson, 2006) continue to argue that play is not defined by the lack or presence of goals, not a way to work towards a fixed goal rationally, but instead turns to flexibility in handling means to an end (Mainemelis and Ronson, 2006 citing Dansky, 1999). As such, experimentation becomes a goal in itself.

Lastly, as entrepreneurs are often resource-constrained and sometimes work under urgency, allocating substantial resources for opportunity analysis and research might not be feasible (Bhide, 2000; Fisher *et al.*, 2020). Indeed, they often need to make swift decisions, act when encountering opportunity windows, and learn as the process unfolds (Wiklund *et al.*, 2018). Entrepreneurs might start with an abstract idea and adapt and refine it upon encountering problems and opportunities, a process regarded as opportunistic and myopic rather than scientific and strategic (Bhide, 2000, p. 63). This approach is conceptualized by Fisher *et al.* (2020, p. 1012) as "entrepreneurial hustle," where *"an entrepreneur's urgent, unorthodox actions that are intended to be useful in addressing immediate challenges and opportunities under conditions of uncertainty,"* with characteristics of acting under a sense of urgency, working in novel ways, aiming toward useful intentions, and addressing immediate opportunities and challenges (Kuratko *et al.*, 2023). This is, for example, demonstrated in Björklund *et al.*'s (2020) empirical investigation, where small business ventures amidst the COVID crisis experimented with business model innovation through entrepreneurial hustle.

To summarize, while current literature on entrepreneurial experimentation predominantly focuses on deliberate and rational approaches, we address the call to explore less structured, emergent forms of experimentation. We contribute to the entrepreneurial experimentation by providing empirical evidence for a spectrum of experimentation approaches, ranging from the deliberate to the improvisational. In the next section we discuss the methodological approach and explain how our abductive approach led us to draw from the wider organizational theory literature to better understand less deliberate approaches in "everyday" entrepreneurial contexts.

Methodology

Data collection

To explore how dominant theories of rational forms of experimentation apply to industries other than the tech or retail industry, sometimes termed "everyday" (Welter *et al.*, 2017) type of venturing, small business ventures in the food and beverage sector were chosen. This industry is affected by uncertainties that are different from those in the technology and retail sectors. These include, for example, the perishable nature of the products and ingredients, the temporality of production (Hernes *et al.*, 2021), the physical nature of the products and ingredients, different cultural associations with food, and consumers' personal tastes. Furthermore, macro-level changes, such as sustainable solutions and business models (Halloran *et al.*, 2018; Long *et al.*, 2018) impact the industry. Ventures in this context, such as craft breweries, have been known to engage in continual innovation and experimentation

(Drakopoulou Dodd *et al.*, 2018), leverage improvisational capabilities (Levallet *et al.*, 2023), and relate to both the ethos of "everyday" venturing and growth (Dodd *et al.*, 2021b).

The selection criteria for the 20 case ventures included that they were established five years or less before the first interview, were small or medium-sized from a single entrepreneur to 30 employees, had at least one packaged food or beverage product in the business-to-consumer (B2C) market and introduced something new to the market. Furthermore, while all the ventures utilized some form of technology in their operations, such as for growing raw ingredients or using sensors to track the alcohol level, none were formally classified or self-identified as technology companies. The cases were identified by observing new ventures and innovations entering the marketplace through weekly supermarket visits, following general media such as *Helsingin Sanomat*, and snowball sampling (Given, 2008).

At the beginning of the data collection in early 2018, the Finnish business environment had not established support resources specifically tailored for the food and beverage industry. However, between January 2018–March 2021, there was a noticeable increase in services such as incubators, innovation competitions, and specific governmental innovation programs, which some ventures started engaging with. These did not yet seem to significantly affect the development efforts described in the interviews; however, they were variables that could be identified as a limitation and focus of further research. This was important, as the case ventures had not been directly involved in programs promoting tools and processes created initially, for example, for the scalable technology ventures, allowing the authors to investigate an alternative industry from tech and retail. Most ventures were not created with the backing of investment funding or venture capitalists. Still, some were planning to discuss external investment or had acquired investment on a small scale. These plans and funding were not aimed at high growth but to support everyday operations, internationalization, or innovation activities.

The first author and colleagues from a larger research project (see acknowledgments) conducted 62 in-depth semi-structured interviews with 44 informants. In cases where there were multiple founders, invitations were extended to all founders to gain multiple perspectives, and in four cases, interviews were held with critical employees who did not officially have a founder status but held a significant strategic development role. The first interview rounds lasted an average of one hour and focused on concrete experimentation and development examples (Appendix). The critical incident technique (Chell, 2004; Flanagan, 1954) was employed to capture meaningful narratives and asked targeted questions such as "*Was there something surprising*?" or "*What was helpful*?" The follow-up interviews lasted, on average, 50 min, focusing on the outcomes and progress discussed in the first round. These were conducted between 3–12 months after the initial interview. In two cases, a formal follow-up interview was conducted two years later. In two other cases, the interview data consists of a more extended first-round interview and an informal meeting during a workshop setting. In addition, the first author had been in contact with the ventures in between through other mediums, such as hosting workshops or live events to ensure continued access to informants. The summary of the cases and data is presented in Table 1.

During the data collection, the first author toured the ventures' premises, learning about the production processes and products (except for two cases where they were interviewed through a video conferencing platform and one where the founders visited the university). She immersed herself in the industry by following the ventures' social media accounts, Instagram and Facebook, and general media such as the main newspapers in Finland, organizing events on the University campus together with the research project team, visiting industry events, and photographing the ventures and activities. This resulted in over 1,000 photos and multiple notebooks of reflective notes. These first-hand experiences, immersion in the industry, photographs, and reflective notes collected served as a sense-making device to understand the ongoing phenomenon (Wiklund *et al.*, 2019) and triangulate the collected data (Carter *et al.*, 2014).

Table 1. Case information and data collection

Case venture/ interviewed agents	Stage of the venture and age during the first round of interviews	Type of product	The focus of experimentation examples shared	Forms of experimentation shared	Interviews and meetings with informants	Minutes (min)
ProteinCo 3 founders	Several food products in domestic stores and restaurants, scaling up their production processes of the raw ingredients and facilities 4 years	Novel ingredients and production processes	Primary production processes, technology, new products and flavor variations, maturity of the market, service models	All	3 first round, 1 follow-up	239
GreensCo, 2 founders	Several food products in stores and restaurants, scaling up their production processes of the raw ingredients and facilities 2 years	Novel ingredients and production processes	Primary production processes, technology, new products and flavor variations, product formats and packaging sizes	All	2 first round, 1 follow-up	119
RootsCo, 2 founders	One product in stores, few food products in restaurants, scaling up own production processes of the raw ingredients and facilities 3 years	Novel ingredients and production processes	Primary production processes, products and flavor variations, product use cases	All	2 first round, 1 follow-up	199
HerbCo, 5 founders	Several food products in stores both in domestic and international markets, in the process of outsourcing production 2 years	Novel ingredients and production processes	New products and flavor variations, product categories, international markets, branding, marketing materials	All	5 first round, 1 follow-up	290
FreshCo, 3 founders	Several beverage products in stores and restaurants, scaling up own production processes and facilities 2 years	Novel ingredients and production processes	The production process, new product and flavor variations, packaging, and marketing materials	All	3 first round, 1 follow-up	186
NaturalCo, 2 founders	Several food products in international markets, outsourced production 3 years	Novel ingredients and production processes	Flavor variations, packaging materials and branding, international markets, marketing campaigns	All	2 first round, 1 follow-up	139

(*continued*)

Table 1. Continued

Case venture/ interviewed agents	Stage of the venture and age during the first round of interviews	Type of product	The focus of experimentation examples shared	Forms of experimentation shared	Interviews and meetings with informants	Minutes (min)
GrainCo, 2 founders	Several food products in domestic stores, own production facilities 2 year	Classic products, novel ingredients, and production processes	New products and flavor variations, marketing materials and campaigns, branding	All	2 first round, 2 follow-up	209
RoastCo, 2 founders	Several beverage products in stores both in domestic and international markets, own production facilities 4 years	Classic products and ingredients, novel applications	Novel product, product flavors, collaborative products, open experimentation space	All	2 first round, 2 follow-up	267
FloraCo, 2 founders	Several food products in stores, novel applications of a classic product sold both in domestic and international markets, small collaborations with different stakeholders, own raw ingredient production and facilities 2 years	Classic products and ingredients, novel applications	Novel applications of a classic product, production process, packaging materials, flavor variations	Transformational learning, improvisational exploring	2 first round, 2 follow-up	222
BeanCo, 1 founder, 2 key employees	Several food products in stores both in domestic and international markets, own production facilities 3 years	Classic products and ingredients, novel applications	New products and flavor variations, open experimentation space, new markets, packaging materials	All	2 first round, 1 follow-up	187
ForestCo, 2 founders	Several beverage products in stores and restaurants both in domestic and international markets, own production facilities 4 years	Classic product, novel ingredients	Flavor variations, service models, branding, marketing materials, international markets	All	2 first round, 2 follow-up	216
GlassCo, 1 founder	Several beverage products in domestic stores and restaurants, own production facilities 3 years	Classic product, novel ingredients	New products and flavor variations, production processes, marketing materials and communication, packaging	All	1 first round	127

(*continued*)

Table 1. Continued

Case venture/ interviewed agents	Stage of the venture and age during the first round of interviews	Type of product	The focus of experimentation examples shared	Forms of experimentation shared	Interviews and meetings with informants	Minutes (min)
SweetCo, 1 founder	Several food products in domestic stores and restaurants, own production facilities 2 years	Classic product, novel application	New products and services, flavor variations, packaging and branding, customer demand for a new product category	All	1 first round, 2 follow-up	134
FermentCo, 2 founders	Several beverage products in domestic stores and restaurants, own production facilities 4 years	Classic product, novel ingredients	New products and flavor variations, customer demand, flavor pairings in restaurants	All	1 first round	80
DrinksCo, 2 founders, 2 key employees	Several beverage products in stores and restaurants in domestic and international markets, own production facilities 5 years	Classic products, ingredients, and production processes	New products and flavor variations, digital marketing, packaging materials, community engagement effort	All	2 first round, 2 follow-up	331
AlcoholCo, 2 founders	Two beverage products in stores and restaurants in domestic and international markets, outsourced production 4 years	Classic products, ingredients, and production processes	New products and flavor variations, packing materials	All	2 first round, 1 follow-up	205
BrewCo, 1 founder	Several beverage products in domestic stores and restaurants, small collaborations with international ventures, own production facilities 2 years	Classic products, ingredients, and production processes	New products, cultural artifacts, tap room space	Transformational learning	1 first round, 1 follow-up	85
TapCo, 1 founder, 1 key employee	Several beverage products in domestic stores and restaurants, small collaborations with international ventures, own production facilities 4 years	Classic products, ingredients, and production processes	Product flavors, new trends from abroad, production process, new equipment, collaborative products, new markets	All	1 first round, 1 follow-up	135

(*continued*)

Table 1. Continued

Case venture/ interviewed agents	Stage of the venture and age during the first round of interviews	Type of product	The focus of experimentation examples shared	Forms of experimentation shared	Interviews and meetings with informants	Minutes (min)
DistillingCo, 1 founder	Several beverage products in domestic stores and restaurants, own production facilities 5 years	Classic products, ingredients, and production processes	New products and flavor variations, production processes	Transformational learning, improvisational exploring	1 first round, 1 follow-up	82
PintCo, 3 founders	Several beverage products in domestic stores and restaurants, small collaborations with international ventures, own production facilities 5 years	Classic products, ingredients, and production processes	New products and product categories, flavor variations, collaborative products, marketing campaigns and materials, service concept	All	1 first round, 1 follow-up	165
20 case ventures *44 informants*					*62 interviews*	*3,617*

Source(s): Created by the authors

Data analysis

Aligning with Alvesson and Kärreman (2007), the empirical material is used as a conversational partner to rethink and reflect on existing theories of entrepreneurial experimentation. Specifically, we turn to abduction (Peirce, 1978), where we iteratively move between the data transcripts and existing theory (Timmermans and Tavory, 2012).

The analysis started by capturing concrete experimentation instances from the data and building a general overview of their characteristics and each case. During the analytical process, we used the software, Atlas.ti to organize coding. We adopted the Gioia methodology (2013) to structure the emerging findings in multiple rounds of discussions among the author team (see Figure 1). During these iteration rounds, the authors moved dynamically between the coded data, raw data, and the literature to create coherent themes with contrasting features.

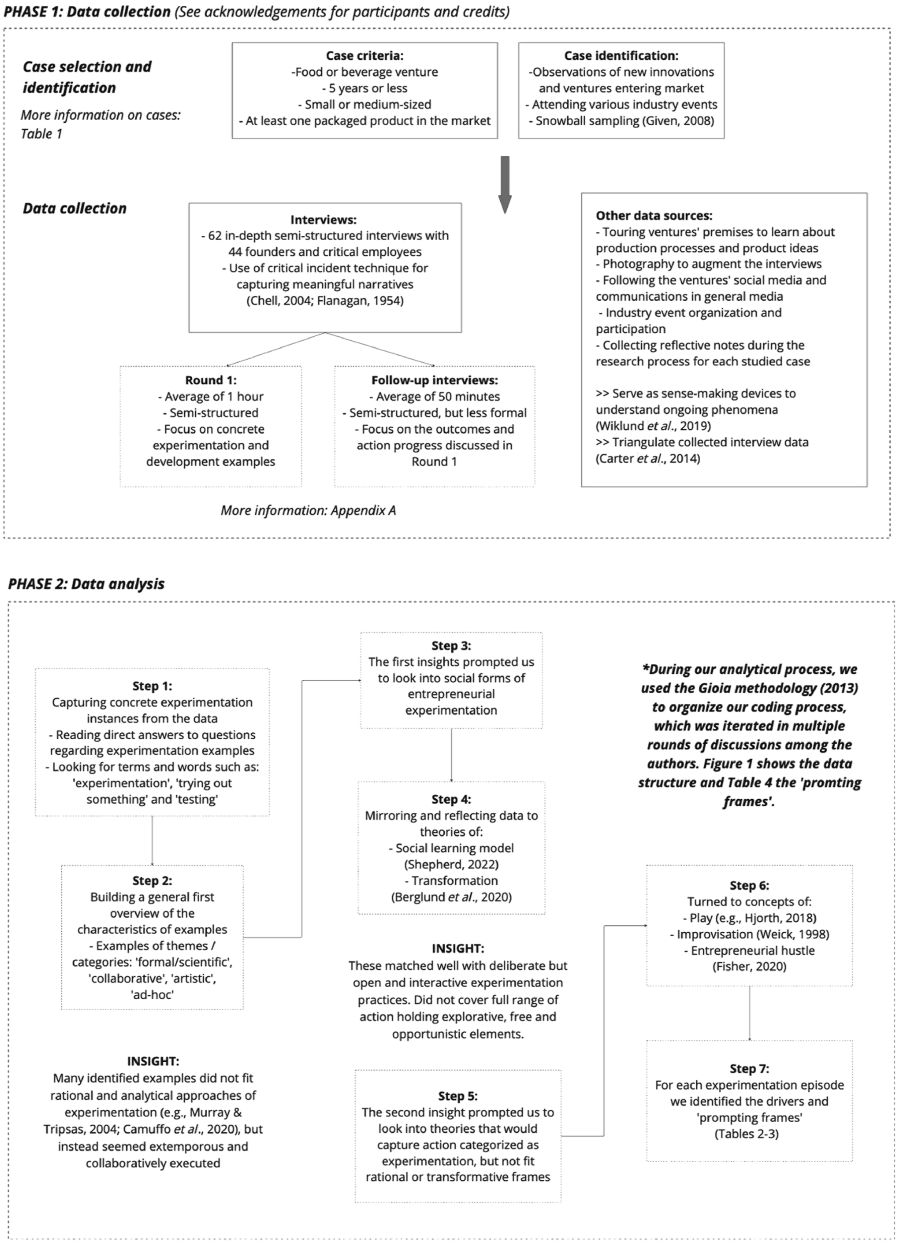
The informants used various wording to indicate experimentation practices, describing the episodes as "experimentation," "testing," or "trying out something." However, the most specific examples were responses to questions: *"Could you share an example when you experimented with/tried something and it went well/did not work out?"* and *"What kind of experimentation plans do you have in the near future?"* To verify the emerging themes, each instance was analyzed by looking at the action and identifying the driver and the *framing* of the issue, challenge, or initiating act (see examples in Tables 2 and 3). We included any form of experimentation that fell within our definition of experimentation to let various actions and processes emerge from our analysis. Initially, a categorization of the overview around open and descriptive themes (Williams and Moser, 2019) was done using single words or phrases such as: "formal/scientific experiment," "collaborative," "artistic," and "informal/ad-hoc."

After the first round of open coding and categorizing emergent themes, many identified examples did not fit the rational approach to experimentation (e.g. Murray and Tripsas, 2004; Camuffo *et al.*, 2020) but seemed extemporaneous and collaborative. This prompted the authors to explore and find more forms of entrepreneurial experimentation. The first stage was to mirror theories of a social learning model (Shepherd *et al.*, 2022) and transformation (Berglund *et al.*, 2020). These matched well with deliberate but open and interactive experimentation practices, providing alternative views on refining the categories. However, they did not capture the recognized explorative, creative, and opportunistic characteristics. The authors then turned to the concepts of play (e.g. Hjorth *et al.*, 2018), improvisation (Weick, 1998), and entrepreneurial hustle (Fisher *et al.*, 2020), providing keywords and concepts such as "urgent action," "improvisation," "aesthetics" and "passion" for developing the conceptualization of emergent experimentation and building the supporting theoretical background. A visual summary of the different stages is presented in Figure 1.

Findings

The analysis of the 20 Finnish food and beverage ventures reveals three forms of experimentation: (1) informed decision-making, (2) transformative learning, and (3) improvisational exploring (Figure 2).

Through *informed decision-making*, the informants sought specified knowledge used for decision-making and informing subsequent action. In *transformative learning*, the entrepreneurs turned to their communities of inquiry to learn, discuss, and co-create around often more complex and open challenges and opportunities. With a less deliberate approach to experiment *improvisational exploring*, the entrepreneurs acted on opportunities and challenges as they appeared, in an ad-hoc manner, or turned to more playful and improvisational approaches to explore ideas. These forms were driven by different framings discussed in the following sections and are summarized with examples in Table 4.



Source(s): Created by the authors

Figure 1. Summary of the different stages of data collection and analysis

Informed decision-making

Driven by the need for external validation, solving specific uncertainties, and testing crafted hypotheses, ventures engaged in informed decision-making. Central in this approach was that the entrepreneurs collected detailed data to inform their decision-making. The framing in this

Table 2. Examples of how explorative open-coding to first-order categories was deduced from the interview data

Experimentation example	Attached open-coding	First-order category
We try *different variations* to see the scale of, for example, by adding x amount of sugar in one and y amount of sugar on the one next to it. We'll see then *what the difference and effect are* when we don't change anything else. (FreshCo)	Variables, testing differences, scientific	Working with variables and hypothesis
When we have tested it in the restaurants and *gotten a green light, it makes it to a kind of "holding list" where we move the product to the retail side.* (ForestCo)	Testing demand, approval	Deciding further action
With digital marketing, it's great that you can just do comparatives. So you have picture A and picture B, copytext A and copytext B. Then you just *AB test* it with different markets and different customer segments. *So, with little money and super fast, we got the top three,* and it was interesting to compare the differences between the two countries. There was a clear difference. (DrinksCo)	Comparing alternatives, A/B testing, formal	Filtering out alternatives
Why I like to engage is to actually put *my thinking on a test bench.* Because I believe that *dialog, I mean, while you have a dialog,* you start from personal opinions, and ideas. And my experience has been that there have been very few cases where the individual or the initial idea has been better than the dialog. I am close to 100% sure that the dialog contributes to a better solution than the inspirational idea at the beginning. (GlassCo)	Dialog, alternative views	Discussing solutions
[In tasting sessions] We get much of this "I've tasted [product category], and it is horrible." So you just *tell them to give it another chance, tell them it won't be so strong.* So then they taste it and say, "This is actually quite good." [. . .] *So the point is [in addition to gathering feedback] to get a bigger mass of people to drink it.* (FreshCo)	Gathering feedback, sense-giving, experience	Knowledge and experience sharing
We are piloting 180 grams of frozen [product] in four or five [retailers]. So, we had an alternative to the size of a frozen shrimp bag. [. . .] We just wanted to see if people who want to buy frozen [niche products] exist. [. . .] *We would have to have a conversation now with the retailers about how their overall feeling is to get some real feedback from there. Then we'll see what has been the possible bottleneck.* (ProteinCo)	Conversation, piloting, testing demand, gaining understanding	Prototyping
I worked a lot with paper and tried to do all kinds of things with my hands. Some things were more representative, and some were abstract. I was really stuck with that and couldn't get the kind of style that I wanted. So then I just took out the basic *aquarelle paints.* I hadn't painted out in a long time and thought I must try something. *I started painting* [their core ingredient], and the tones of the color started to work really well. [. . .] *It just kind of happened.* I just tried something different that I hadn't done before. (GrainCo)	Artistic, intuitive exploring, aesthetic	Aesthetic exploration

(*continued*)

Table 2. Continued

Experimentation example	Attached open-coding	First-order category
[A niche product with unusual ingredients] was actually created as *I [an expert in the field] became frustrated* by the excess amount of [natural ingredients], so I had like hundreds of kilos of this kind of trash. So I thought, here are some good [ingredients]. *Now I just need to think about how to use these. So I mixed [another ingredient] in there, and it just started to work.* That was a success in all kinds of ways. (DistillingCo)	Problem solving, expertise, feelings	Expert improvising
Before we got the proper beer cases, we tried to solve it [transporting] in other ways. [. . .] *We were always running out of beer, and we needed to get the beer to our customers right away.* The other breweries let the beers wait and rest so they would warm up and then pack them in boxes. *We didn't have time to wait, and we didn't want them to warm up.* [. . .] These are things that you learn from your mistakes, and you learn small things every day. (PintCo)	Urgency, testing in action, learning from mistakes	Acting under a sense of urgency

Source(s): Created by the authors

form focused on confirming and targeting questions, often starting with words such as: *"What is . . .", "Do they.."* or *"Which one.."* leaving little room for alternative views or solutions to emerge. Here, the readiness of an opportunity was validated by piloting a version in the market and creating a "proof of concept." For instance, RoastCo showed expert coffee users globally early versions of their novel coffee innovation to seek approval for the taste and quality:

> Then I tasted it with a small group of friends who use those products and like to make [niche product]. [. . .] You shouldn't think too much beforehand or test and ask in moderation. Be brave and go all-in; it has already been accepted in specific communities.

Entrepreneurs also sought encouragement for the overall direction of the venture or certain business areas. For instance, in the case of natural producer HerbCo, they sought feedback from their stakeholders by organizing a community event. They enquired about the quality of their internal design capabilities and the need to hire an external designer when renewing their packaging and brand visuals. Some entrepreneurs also used experimentation to know whether they were ready to take the next steps. The founder of dessert company SweetCo explains how their cafe franchise is a useful testbed for packaged retail products aimed at the broader consumer market:

> The franchise is a great place to test which flavors and combinations work well. If they work in the franchise, they will also work well in the stores. So the franchise doesn't only add our brand visibility and income, but is excellent for product testing, a base for market research.

The entrepreneurs also used experimentation to select amongst different strategic alternatives and the order of action. For example, the initial enthusiasm from restaurants' and bars' buyers toward specific taste profiles affected the order of flavors entering the supermarket aisles in the case of Alcohol Co:

> When we have the taste profiles and introduce the products to the market with brochures and sales materials, we start getting feedback from the buyers. For example, which taste profiles are getting the most interest? Often, we then take that product first out to the market.

Lastly, entrepreneurs' iterative development included fine-tuning, testing hypotheses, tweaking selected variables, and forming feedback loops. The results were often followed

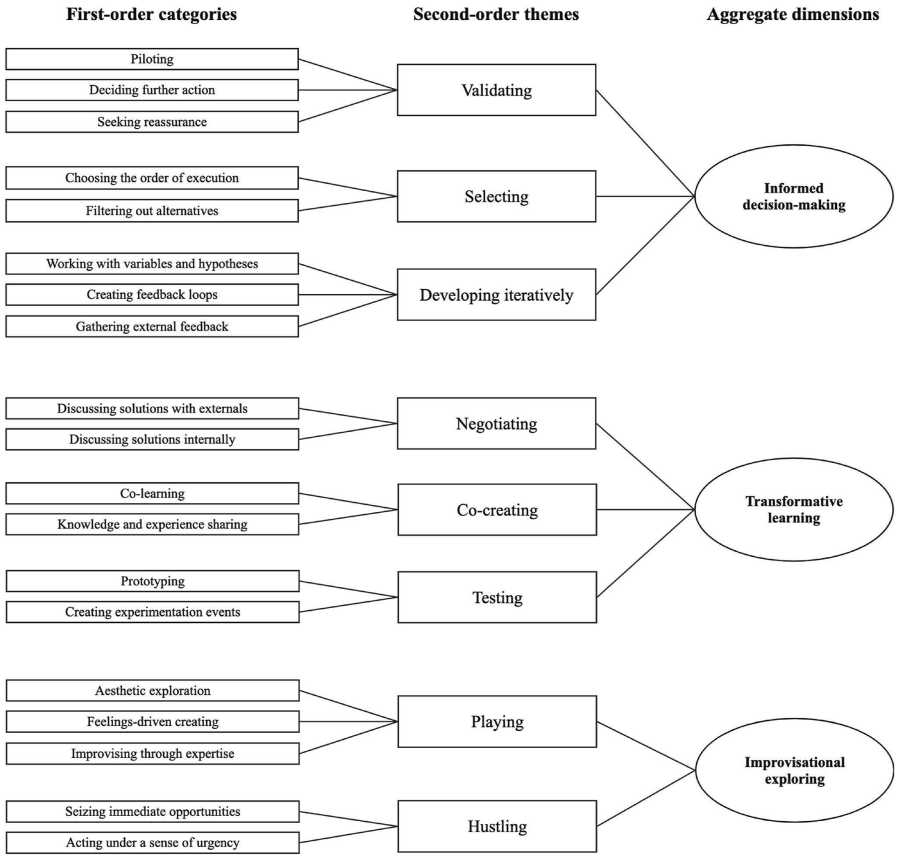
Table 3. Examples of deduction of framing of the experimentation instances

Quote	Prompting frames
When we get an idea, then everyone asks around, *'How does it sound like?'* We use WhatsApp conversations to share ideas. [. . .] I belive that we *need to get the base from somewhere else*, and people say, "It is really good, really good, really good". So we develop it as long as we *get the strength and base from the decision that this will work*. (FloraCo)	Seeking reassurance and affirmation externally, creating a strong base for decision-making *"How does it sound like?"*
You start off with a base [product], then I do something to it, and we taste it together as a group. I get comments and feedback and then get back to the lab to do the next versions. We add [flavor] sugar, add more flavor, and drop this and that. With the [in-house product expert], think about '*Should it be a bit more approachable?'* or '*Is this too weird for the masses?*' So these kinds of things, and then we change one of the characteristics and see how it changes. (DistillingCo)	Crafting characteristics of the product to the intended audience *"Should this be a bit more approachable?", "Is this too weird for the masses?"*
We create the recipe by deciding the color, as it excludes certain [ingredients]. If it's a completely new thing for us, we do a test batch. If it's just a new version, and we have already been testing many different recipes, then we do a bigger batch. All of these will go under [a branded series indicating a "test"]. So we don't name the new products yet, but *if they sell well and people like them, we* give them a name and appearance, and it becomes a product. (TapCo)	Deciding whether a bigger batch of a product should be made *"Does it sell well?", "Do people like it?"*
What we do during different fairs is that we always have new products with us. Those are B2B fairs with many buyers, so we always ask the most important ones, *"How would this sound like? Would this work?"*. We do that kind of subconsciously, but at the same time, it is consciously part of the process. *So, saying things out loud is something we do all the time.* (BeanCo)	Discussing new products with key stakeholders, e.g. buyers *"How would this sound like?", "Would this work?"*
The way we developed [product name] was because we were bored. We put [ingredient] into a container, forgot it there, opened and realized that "wait a second, this isn't [the original idea], but it is pretty good!". Then we decided to make a product out of it. (DrinksCo)	Experimenting based on feelings *"We were bored"*
In order to avoid big setbacks, "Ok, now we lost all the money, and everything is lost," the effort must be as small and light as possible. That's why we have this resource [access to an advertising agency], so we can do really good presentation materials, and *we can, with this one sample, take all the feedback and find out, "Ok, this is not finding its space, let's put this aside. We shouldn't do this or that the price is going too high or something else*". (AlcoholCo)	Doing small experiments to avoid big setbacks *"Does this [product] find its space?", "Should we do this?", "Is the price too high?"*

Source(s): Created by the authors

and documented, and while seemingly minor, served an essential purpose in refining opportunities and tweaking when encountering problems. For instance, GreensCo explains how sensors for moisture and temperature and continuous documentation are essential when growing novel raw ingredients:

> If we have a problem with a product, we have sensors that collect data. That is something we did not do so much in the beginning. Now, we document everything, and through the data, we can be more efficient with our resources. It is ongoing daily research.



Source(s): Created by the authors

Figure 2. Data structure

Transformative learning

Instead of resolving specific and targeted unknowns, entrepreneurs also engaged with their communities to make sense of complex uncertainties, learn, and gain new perspectives, termed "Transformative learning." Central to this form is the environment's influence and participants' involvement through co-learning and knowledge sharing. These instances had more scope for open-endedness and acquisition of "disinformation," challenging their original views and possibly creating further questions. Indeed, more open-ended prompting frames, such as "What could it be?" or "How," create space for ambiguity and negotiation.

In contrast to informative decision-making, where entrepreneurs engaged in a one-way collecting data approach, transformative learning focused on two-way *interactions* with communities. For example, through combining product testing with knowledge sharing with locals with an interest in learning and developing personal skills in a specific hard alcohol category, as in the case of DistillingCo:

> I've been running this [alcohol beverage category] school and tasting these new products there. They aren't the most experienced hobbyists, OK, maybe some of them, but typically quite basic people. Some men and women are interested in [the product category] but not so in-depth that I can teach them something, and it's a lot of doing things together.

Table 4. Prompting frames driving the different forms of experimentation

Experimentation approach	Prompting frames	Practice	Examples of prompting frames from the data
Informed decision making	The driving unknowns are specific and narrow, seeking direct and precise answers to inform further action Questions often begin with "Do they..?", "Is..?", "Which..?", or "What..?"	Validating	*Do people buy our products? Do the products sell well?* *Is the product ready? Is the price too high?*
		Selecting	*Which product should we develop further first? Which taste gets the most interest from buyers? Which flavors should we introduce first?*
		Developing iteratively	*What is the difference between adding "x" and adding "y"?* *What is the suitable cooking time for different temperatures?* *What should the pH of the water be?*
Transformative learning	The driving problems or unknowns are intentional but open and expansive to disinformation, allowing further questions to emerge Questions often began with "How..?" and included words such as "could" and "would," suggesting room for ambiguity. Drivers could also indicate the need to engage without specific questions	Negotiating	*How would this [concept/product] sound like? Would this work [concept/product]? Should this be more approachable? What do you think?*
		Co-creating	*How can we coach them? [A stakeholder involved with experimentation] What requirements do they have [for the solution to work]? What are the needs of a [customer part of a co-development process]?* *Getting people to experience [a novel product]* *Doing things together*
		Testing	*How could we change the packaging? What do we like about this collectively? What could other experts make out of [set of ingredients]? What is our starting point?*
Improvisational exploring	Specific questions about identified problems through the lens of one's expertise or craft. Playing and entrepreneurial hustling were not prompted by framed questions but rather through "acts."	Improvising through expertise	*Could I make a vegan version of [a staple food product]?* *How to turn [trash ingredients] into a product?* *Could we do this with less cost?*
		Playing	*I have a feeling or a memory [to explore]. I just tried something different. We just started testing recipes. We were bored*
		Entrepreneurial hustling	*I want to test this. We just got really excited. Random shooting at things. Let's stop ideating, let's do*

Source(s): Created by the authors

The entrepreneurs reflected both the potential of the opportunities and the current versions with their stakeholders through "negotiation." Mutable artifacts, such as early product versions, were presented to key stakeholders to learn how they could be used or improved.

The key difference to informed decision-making was that the informants did not experiment to validate but expand their knowledge and reflect on the incoming information. A founder of a distillery, AlcoholCo shared how instead of a one-way "sales" type of information sharing to bartender customers, they presented new products to learn about the use-case with conversation openers:

> With [a low percentage alcohol product], it is easy to develop the flavors through the end users, for example, with restaurants. The basic product stays the same, but then you don't tell the customers: "Hey, you need to do exactly this kind of serving, or you don't do it at all," but instead: "With your experience, what do you think would be the best way to sell this product when you are preparing the serving? I'll support you on that." In that way, the customer can receive it as "we are doing something new here," we are testing and creating variations and then selling that.

These interactions were often operationalized through co-creation and co-learning with key stakeholders. For instance, a novel beverage producer, FreshCo, explained the involvement of their niche community of fellow DIY producers, from which they obtained feedback, mainly through an active Facebook group, from the members' ongoing experimentation activities:

> We need to get experience from real life, which is part of product development. Wanted or not, people are always part of this development. The ones in our team and the whole community where we work. We get feedback from there, make changes, get new feedback, and do this kind of dialogue.

Another example comes from BrewCo, a community-based brewery that co-developed a beer for a local neighboring restaurant. Instead of engaging an online community, they decided to involve local customers in a participatory evening consisting of blind tastings and discussions of nine different beer variations:

> We tried together to think which ones we liked. It wasn't a quantitative way to research, but it was more participatory. It was a really fun night, and everyone was excited.

Testing was not intended to validate or act as a gatekeeper for further action. However, it created a stage for "open-ended" experimentation around loose constraints. A natural foods producer, ForestCo, explains how prototyping with physical mockups of new packaging further increased their understanding of the importance of different use situations, raising further questions:

> We tested and measured [product packaging] and have not realized how important that is for the customers using it in different contexts - is it in a pot or a mug? What is our starting point?

Improvisational exploring

The analysis also indicated a less deliberate and exploratory way to experiment through improvising, playing, and hustle. Here, the entrepreneurs allowed space for exploration, prompting new visions to form before submitting these to other forms of experimentation and external evaluation. In these practices, the entrepreneurs did not always rely on prompting frames in the form of "questions" to explain their experimentation. Instead, their experimentation efforts were often framed in "act" statement formats such as: *"We just started smoking the ingredients"* (DistillingCo), *"The point is really to create"* (ForestCo), or *"We just went in. We got excited and thought it would be wonderful"* (HerbCo). When improvising, the entrepreneurs highlighted challenges to address. However, these do not stem from the market or target external stakeholders. Instead, they signaled curiosity about, for example, testing something new, *"Could I make a vegan version of this?" (GrainCo)* or addressing encountered hurdles, such as *"How to turn these [trash ingredients] into a product?" (DistillingCo)*

This form of experimentation often occurred *in situ* as opportunities or challenges suddenly appeared, either from the external environment or the entrepreneur's passions, ideas, or

feelings, such as "boredom" or the need for creative fulfillment. These often unfolded a-rationally or began extemporaneously. For instance, for a beverage venture FermentCo's founder, an aesthetically pleasing color of an unusual raw ingredient that her spouse used in the home kitchen inspired him to experiment:

> She's cooking [a fresh ingredient] on the stove one day. Neither one of us grew up with [ingredient], but we're trying all these things, and I'm looking at the part of [ingredient] and thinking, what a beautiful color that is, we should make [a beverage] in that color. I thought about it like, you can make [beverage] out of anything . . . so I tried to make a [unique flavored beverage product].

In this form, the founders showed that experimentation was motivated by passion and approached opportunities with curiosity and excitement. This is emphasized by the founder of GlassCo, stating that one needs to work through passion instead of causality:

> The way to excel is through passion because you will need to make compromises somewhere. So, you need to have this passion, especially as an entrepreneur. You are not counting and not led by causal effects.

Improvisational experimenting relied on entrepreneurs' expertise, such as knowledge of winemaking or various edible mushrooms, to test opportunities or address emerging challenges. For instance, a founder of a plant-based snack firm GrainCo, used his expertise to explore the idea of creating a vegan version of a common household dairy product with low threshold experimentation:

> At one point, [the co-founder, an expert in food product development] was just trying in his home kitchen how to do a vegan version of [a type of dairy product]. He was like, "This actually worked out," and we were like, "Oooh, this is amazing". You can just do those kinds of experiments he likes to do, just trying small things.

In some cases, explorative experimentation practices also took the form of play. Some entrepreneurs use their sensibility, creativity, and feelings to explore new possibilities and learn. The narratives highlighted enthusiasm for playing with possibilities and imagination, demonstrating freedom to explore and a lack of "rules." A founder of DistillingCo explains how deviating from ingredients typically associated with the specific alcohol category encourages wider exploration and novelty:

> I have created something from almost all local berries and fruits, and this [product category] is my passion. I once did it from [a natural ingredient], which became Finland's first [product category].

Lastly, in some cases, a sense of urgency drove ventures to jump quickly to possible solutions, which they described as "trying out" or "testing." Such hustling stems from personal excitement, competition, or sudden recognition of short opportunity windows, creating pressure to move forward quickly. For ProteinCo, a novel food producer, a sudden rise in competition in their market caused them to test and introduce various new products rapidly:

> The pressure is very high. When there is a shortage [of supply], you need to take advantage of it. [. . .] We have a really wide funnel with tens of different product ideas, and it has been important to just get fast into the market. [. . .] In practice, it is constantly shooting out new products, testing, getting feedback, and seeing what sells.

This, however, can result in negative outcomes, as illustrated by a natural foods producer HerbCo. Excited about the hype around a certain beverage product category, they ran into quality problems by directly testing the product by entering the B2C market:

> When we started having quality problems, the biggest issue was that we hadn't planned to look into this properly. We just went straight in. We got excited and thought this would be wonderful. [. . .] All of this has been pretty much experimenting, just going forward without thinking too much about whether something works or not.

Discussion

This study questions how small emergent "everyday" ventures outside of tech and retail experiment and, as such, addresses calls to explore how entrepreneurs utilize different modes of experimentation (Berglund *et al.*, 2020) and study different contexts (Hampel *et al.*, 2020). By addressing these calls, this study demonstrates that contrary to the dominant view of experimentation as rational and "purposeful" practice (e.g. Kerr *et al.*, 2014; Murray and Tripsas, 2004), experimentation can vary in terms of deliberateness in "everyday" entrepreneurial contexts, categorized in three forms: *informative decision-making*, *transformative learning*, and *improvisational exploring* (see Figure 3).

This study contributes to the literature on entrepreneurial experimentation in three ways.

First, this study contributes to the discussions of entrepreneurial experimentation by providing evidence of deliberate practices that not only seek to validate or test hypotheses but instead highlight the openness and transformative characteristics (Berglund *et al.*, 2020; Shepherd *et al.*, 2022). As the examples of experimentation shared by the entrepreneurs

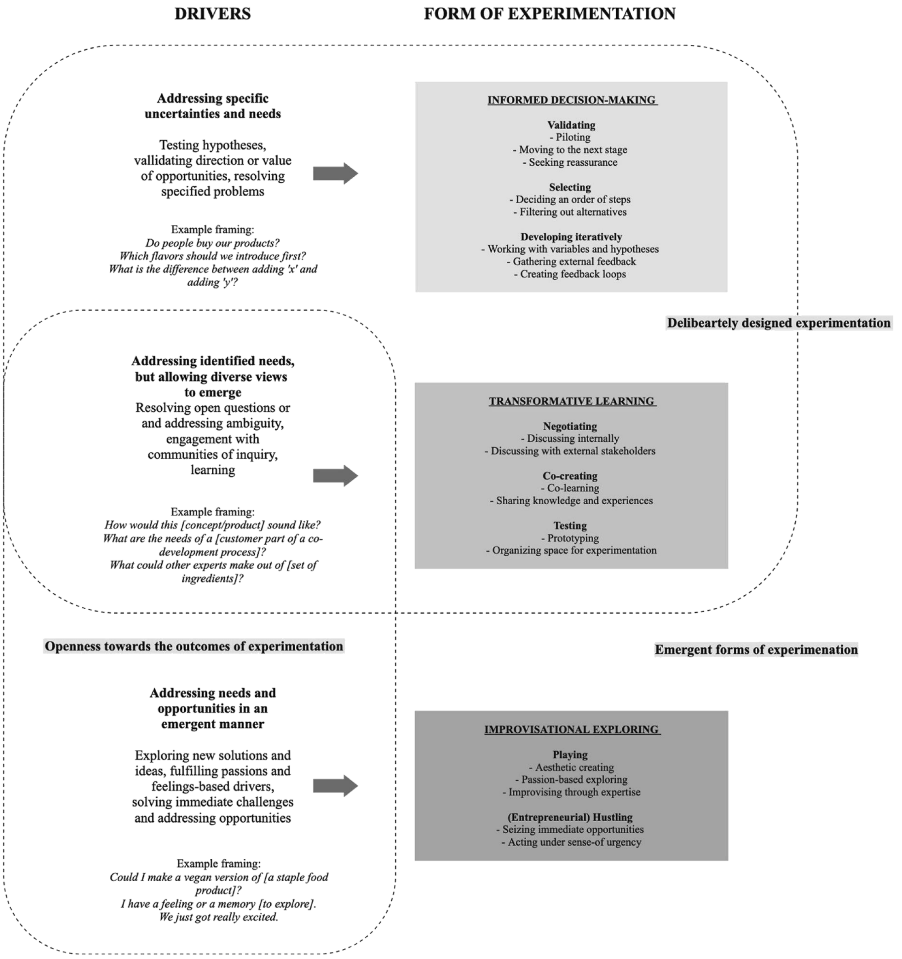


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Figure 3. Forms of entrepreneurial experimentation

highlight, transformative learning interactions with various stakeholders were conducted as open-ended encounters, discussions, and co-creation events. Instead of deconstructing the problem or opportunity into tangible, testable pieces or hypotheses (Camuffo *et al.*, 2020; Kerr *et al.*, 2014), the instances revealed openness to explore wider solutions and allow alternative views to emerge. Experimentation here does not explicitly test assumptions (Ehrig and Schmidt, 2022) but is driven by curiosity to learn about unique use cases from creative stakeholders. This aligns with Bianchi and Verganti (2021), who note that entrepreneurship practices should take on a more expansive "why-related" role in the front end instead of a narrow focus on testing assumptions early on with users. Central to these experiments was intentionality and planning, which require pre-thought before action (Wood *et al.*, 2021). Especially when engaging with external stakeholders, the ventures describe the purpose, value, and organization of these experimentation encounters, illustrating their conscious engagement with the experimentation process. For example, when FreshCo designed a co-creation event, they needed to set the right boundaries for joint experimentation while staying open-minded. Similarly, DrinksCo shared an inspiration kit of fresh ingredients with engaged bartenders, allowing them to freely experiment with flavor portfolios for their upcoming beverages. This creation of mutable artifacts (Berglund *et al.*, 2020) allowed the community to engage in negotiation around potential solutions and co-learn (Bremner and Eisenhardt, 2022).

Second, this study provides empirical evidence supporting Hunt *et al.* (2022) and Lerner *et al.* (2018) that while deliberative and rational approaches to entrepreneurial decision-making and action are essential, they only represent part of the spectrum. Entrepreneurs face a "constant flow of emergent possibilities" (Felin *et al.* 2014, p. 270) and resource constraints (Bhide, 2000), making it impossible to consider, search, or compare all possible opportunities solely rationally. The shared experimentation examples highlight these sudden opportunities, such as waking up in the morning to try out a new product mix in the kitchen or recognizing an intriguing color of one solution to be tested in another product context. Compared to the two approaches of informative decision-making and transformative learning, the study highlights an emergent convergence of planning and execution of experimentation (Cunha *et al.*, 2015) instead of pre-planning the expected outcomes or the experimentation event itself. These approaches to experimentation stand in stark contrast to the deliberate, controlled types often discussed in the literature. These less deliberate forms are often not driven by specific problems or questions but instead emerge from enthusiasm and passion (Cardon *et al.*, 2012; Petelczyc *et al.*, 2018) for playing with possibilities and imagination, demonstrating freedom to explore and a lack of "rules" (Hjorth *et al.*, 2018, p. 157).

While for some, these less deliberate approaches were driven by intrinsic personal desires, they also emerged from turbulent business environments, especially in nascent niche fields, affecting their ability to plan and instead, turning to swift experimentation efforts resembling "entrepreneurial hustle" (Kuratko *et al.*, 2023; Fisher *et al.*, 2020). In these cases, the experimentation is conducted in a trial-and-error manner, for example, releasing different types of food products under urgency to test the customer demand and claim a first mover status in a rapidly growing nascent market. While the outcome of these "hustling" actions can be rationalized in hindsight, temporally, the planning and execution amidst urgency also merged in these cases.

Finally, this study provides empirical evidence for experimentation in ventures outside the technology and retail industries, operating in a simultaneously dynamic and constrained complex environment with "everyday" and emergent characteristics (Dodd *et al.*, 2021a; Welter *et al.*, 2017). This is demonstrated by the richness of experimentation practices utilized by this study's food and beverage ventures. The focus on this industry responds to a call to understand practice in organizations where development processes are less standardized, slower, or complex (Hernes *et al.*, 2021), and ventures operate in an environment in which they are limited in ability to affect external constraints (Levallet *et al.*, 2023).

Limitations

This study also includes some limitations. First, the sample of food and beverage ventures consists of actors with diverse backgrounds, business opportunities, and stakeholders involved. On the micro level, variations in education, experience, and personality of individuals might affect the extent and approach to experimentation. For example, a founder with an artistic interest might lean towards a more improvisational approach than a founder whose experiences are rooted in, for example, management or science. Similarly, neurodiversity or personality perspectives have been found to affect entrepreneurial action and behavior (e.g. Wiklund *et al.*, 2018) yet were not included in the analysis. On a meso level, the variation in the sub-sector might also affect the level (and need) of experimentation, where the nature of perishable products and swiftly changing customer preferences and trends might vary between beverage and food sub-sectors. Furthermore, each case experimented with a unique set of stakeholders, which might affect the chosen experimentation practices.

Further, broader macro-level changes might affect the experimentation practices where the sample of ventures has been selected from a specific region in the Nordics, representing an area with a specific regulatory and social environment in which the entrepreneurs operate. Specifically, during this study, increased entrepreneurial support activities, investment, and organizations within the Finnish food and beverage ecosystem might play a role in the experimentation practices utilized.

Conclusions and directions for future research

This study challenges and extends the rational interpretation of experimentation often explicitly identified in the entrepreneurship literature. The empirical findings of the food and beverage industry of "everyday" types of ventures demonstrate how experimentation varies in deliberativeness, which is categorized into three forms of experimentation: *informed decision-making*, *transformative learning*, and *improvisational exploring*. By extending the concept of entrepreneurial experimentation with emergent forms such as improvisation, play, and hustle, this study provides a broader picture of how entrepreneurs experiment. These insights not only provide a better grounding for existing researchers studying experimentation in contexts beyond tech and retail but also provide a richer toolbox of experimentation practices and resources available in the early stages that are helpful in support functions, such as entrepreneurial education or accelerator programs.

This study recognizes avenues for further research. By providing empirical evidence for different forms of experimentation (Berglund *et al.*, 2020), future studies can explore the temporal aspects of experimentation about broader entrepreneurial action and opportunity development schemes (Wood *et al.*, 2021). The short-termism of localized problem-solving in improvisation (Miner *et al.*, 2001) or opportunistic tendency towards immediate cash-maximization of impulsivity (Bhide, 2000, p. 543) hold the risk of removing focus from carefully crafted experimentation, which could potentially lead to impactful solutions in the long term (Miner *et al.*, 2001). This short-term or "real-time" learning from unintentional improvisation (Archer and Mauer, 2009) might be very specific and local, hampering broader visioning (Miner *et al.*, 2001). A longitudinal process-based focus would enable an understanding of how the forms of experimentation change as the ventures mature and whether some forms are linked to long- or short-term problem-solving or planning.

Another area for further research would be understanding the management and organization of various experiments. The responses and resources of the informants in the case ventures varied in their readiness to design and conduct experiments. Some cases explained how their lack of resources drove them towards less formal experiment methods, such as skipping gathering user feedback or conducting user research with their resources instead of outsourcing to external services. This raises the question of how participation in official support functions, such as accelerator programs, affects the style of experimentation conducted.

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Appendix

Information about the first round and follow-up interviews

Key questions from the first semi-structured interview round focused on opportunity development pathways and experimentation examples.

(1) *Could you run through the detailed steps of developing one of your latest products?*

(2) *Could you share an example of when you tried out/experimented with something and it turned out well? (*Further questions: *What was surprising? What helped? What made it difficult?)*

(3) *Could you share an example of when you tried out/experimented with something that did not work out/was frustrating/backfired? (*Further questions: *What was surprising? What helped? What made it difficult?)*

(4) *What type of experimentation plans do you have?*

Supporting questions:

(1) *How would you describe your development efforts at the moment?*

(2) *What are important aspects to take into consideration in development?*

*The interviews were conducted in the informants' native language, Finnish or English, and transcribed by professional services. The Finnish word "kokeileminen" directly translates to "*experimenting*" with close synonyms of testing and trying out something. The follow-up interviews were more informal and focused on discussing plans and progress from the first round of interviews.

Example questions from the follow-up interviews:

(1) *What has happened with the experimentation plans (insert specific examples from the first-round interview)?*

(2) *Could we run through one of the product pathways more specifically?*

Further questions to be asked:

(1) *What is the basis for the decisions made, and at what stages?*

(2) *At which points do you experiment/test?*

(3) *Do you do these internally or externally?*

(4) *Why do you experiment?*

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