

# “Secret Seasoning”: exploring the playful potential of eating first-hand

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## ABSTRACT:

In this paper, we present the outcomes of a design-led exploration into the playful potential of eating. Building on a body of first-person artistic experiments around eating, we articulate 8 forms of playful eating that transcend existing works in gastronomy by giving diners an active role. Our contribution is threefold: First, we present 8 provocative forms of playful eating so designers can embrace them in their work; Second, we provide examples of our artistic experiments that instantiate those playful eating forms and make them actionable; Third, we share our autobiographical accounts of engaging with those play-food experiences, as well as the responses from other stakeholders in a public exhibition we set up. Overall, our contribution will inspire chefs and other designers to embrace a more diverse palette of play-food experiences in their work.

## 1 INTRODUCTION

Food is a popular area of interest for design research (Zampollo, 2016). Recognizing the multifaceted importance of food practices and systems—for our bodies, culture, communities, and the environment at large—researchers explore how to enhance human-food interactions by design. A subset of that research focuses on the experiential texture of eating. Within that space, scholars explore how to craft or otherwise enable eating experiences that are socially, culturally, and/or emotionally rich. They embrace food as something far greater than a source of nutrients and investigate how to respond to such multifaceted significance by design.

Inspired by work on the socio-cultural dimension of eating (Douglas, 1972; Germov & Williams, 2017; Poulain, 2017), we turn to play and playfulness to explore how to enrich its experiential texture. By reclaiming the playful potential of food consumption, we hope to broaden the set of experiences available in gastronomy. We build on recent calls for increasingly playful approaches to food design (Altarriba Bertran & Wilde, 2018) and food-tech innovation (Altarriba Bertran & Wilde et al., 2019b; Grimes & Harper, 2008; Mueller et al., 2020), which suggest that the palette of play-food experiences available in today’s gastronomic landscape is narrow. There is a need for transcending mainstream ideas of what it might mean to play with food.

Here we argue that, through play(ful) design, we may be able to entice people to engage more (and more consciously) with their food—and, in turn, help to reverse a trend of growing indifference towards food practices, and systems, which hinders our nutrition (Schmidhuber & Shetty, 2005), social cohesion (Euromonitor International, 2016), and the environment (Akotia et al., 2019; Clapp, 2015) alike.

Thus, to support chefs and other designers to embrace a more diverse idea of what it may mean to play with food, we present a design-led exploration into the playful potential of eating. Through a combination of first-person (Marshall & Mead, 2005), artistic (Frayling, 1993), and design-led approaches (Gaver, 2012), we experimented with (and reflected on) ways of playfully reconfiguring our meals. As a result of that process, we identified 8 exciting forms of play-food that might currently be underrepresented in gastronomy, as well as several ways in which they could be creatively designed for. We thus present a three-fold contribution: (1) a collection of inspirational exemplars of playful eating; (2) a synthesis of those exemplars’ underlying mechanisms; and (3) our reflections from inviting people to experiment with and make creative use of the above inspirational material. Overall, our work provides food designers with *generative* (Gaver, 2012) knowledge: inspirational ingredients that can guide the design of eating experiences that are increasingly fun.

## 2 BACKGROUND

### 2.1 *Food and eating as a societal concern*

Eating is a fundamental part of human life. It nourishes our bodies, brings sensorial pleasure, creates opportunities for socio-cultural flourishing, and connects us with the environment. It is far more than an act of biological survival: it is an inherently hedonic, cultural, and social phenomenon (Douglas 1972; Ochs and Shohet 2006; Warde and Martens 2000).

Research shows a decrease in the time people invest in eating (Zeballos & Restrepo, 2018). More and more, people lead irregular diets and skip meals (Akotia et al., 2019); though meals have long been

important for socialization (Douglas, 1972), people increasingly eat alone (Akotia et al., 2019) while engaging in mindless tasks (Euromonitor International, 2016). Such multifaceted detachment from eating—and other food practices—has serious implications: for our bodies, e.g. leading to growing obesity rates (Schmidhuber & Shetty, 2005); for society, hindering socio-cultural development (Euromonitor International, 2016); and for the planet, e.g. desensitizing people from their environment (Akotia et al., 2019; Clapp, 2015). Recent studies suggest that promoting more mindful ways of eating might help to reverse those trends (Hurst & Fukuda, 2018).

## 2.2 *Why playing with food?*

We argue that play and playfulness can help to reclaim the social, emotional, and cultural function of our food practices, and in turn to foreground the importance of leading more active, engaged, and conscious food lives. Just like eating, play is a key part of human life (Brown, 2009; Brown & Juhlin, 2015; Caillois, 2001; Huizinga, 1950; Sicart, 2014). Even if it does not yield materially productive results, it can be socio-emotionally productive (Sharp & Thomas, 2019). Here we discuss 3 qualities of play that are highly relevant in the context of eating:

First, *play brings joy* to unstimulating situations as it is intensely pleasurable (Brown, 2009). Playful experiences can help us to approach the table as an ephemeral playground where we can explore and detach from boredom and isolation—feelings we increasingly experience at mealtime and that have negative nutritional (Chae et al., 2018) and psychological (Kimura et al., 2012) effects. Second, *play provides us with a feeling of agency*: it allows us to choose, act, and express ourselves in ways that feel meaningful (Huizinga, 1950; Sicart, 2014). By food design, we can help to cultivate those qualities in our meals, empowering people to play a more active, conscious, and creative role in them. Finally, *play can bring people together* (Isbister, Márquez Segura & Melcer, 2018), which is highly relevant as social interaction is key to our wellbeing (Isbister, 2016) and a key reason why people eat (Douglas, 1972).

These experiential qualities of play—joy, agency, and social connection—are desirable social goods that can have positive effects on our wellbeing. We argue that food designers should cultivate them. We hope our work inspires a move towards increasingly rich and diverse play-food experiences.

## 2.3 *Related works in play-food design and research*

Play-food design has received attention lately. In fine dining, chefs have long tried to imbue their creations with an element of play—the so-called “play-food” (Regol, 2009). In a study of contemporary fine dining, Altarriba Bertran & Wilde (2018) noted that

“play-food” experiences often center on a very particular understanding of play in which diners take the rather passive role of “sitting and contemplating” (Regol, 2009), while chefs amuse them through captivating, mysterious, surprising experiences. While there are exceptions, it is uncommon to find gastronomic creations that provide diners with a more active role. That is at odds with many forms of playful engagement that have interactivity as a core component. There is an opportunity for broadening ideas of what it means to play with food and thus enrich the palette of play-food experiences available to diners.

In the arts, the intersection of food and play has been explored from a more interactive and experimental perspective. An example is *Mealing*, an artistic cup designed by Martí Guixé (2010) that has a set of tasks written on it (e.g. “communicate”, “listen”, “eat at end”) as well as a series of food items (seeds, mini snacks...) people can eat after completing the tasks. The cup is meant to provoke different ways of engaging and socializing in public events. These kinds of artistic play-food interventions often extend the work of gastronomic chefs through more radical, experimental, and subversive forms of play—giving diners a more active and empowered role in the experience. Their aim is not necessarily to enrich the experiential texture of meals that take place outside the domain of art and artistic practice, but rather to use artistic meals as a form of creative provocation.

Play-food has also been explored in technology and experience design. A recent review of playful technology design revealed that works in this space often embrace a narrow idea of what it might mean to play (Altarriba Bertran & Wilde et al., 2019b)—a limitation that resembles that of gastronomic restaurants, as seen above. In response, design researchers have begun to explore how to incorporate more interactivity in food designs—technological and non—and thus enrich the palette of play experiences available in gastronomy. For example, Grimes and Harper (2008) proposed to think about future mealtime tech as a tools for celebrating the joy of eating in community; Wilde & Altarriba Bertran (2019) proposed designing play-food meals by involving diners in the ideation process; Altarriba Bertran et al. (2020) explored food traditions and rituals to distill play-forms that might inspire culturally grounded playful food design; or Gupta et al. (2021) explored how narrative-based food experiences (such as the ones we sometimes see in gastronomic restaurants) could be made more interactive through technology.

Our work aligns with those efforts towards exploring increasingly rich forms of playful eating. To continue to broaden possibilities in this space, we present an exploration of the playful potential of eating from a first-person perspective; we highlight exciting opportunities derived from our hands-on experiments with playing with our food. Below we describe our research process and outcomes.

### 3 METHOD

The aim of our study was to broaden perspectives on what it may mean to play with food, to support the design of increasingly playful eating experiences. To that end, we used a combination of first-person research (Marshall & Mead, 2005) and research through design (Gaver, 2012), which are suitable for conducting *generative* research like ours (Gaver, 2012). Importantly, we did not aim to provide a comprehensive account of all the ways in which one may play with food, nor to unpack the behavioral and sociological implications of playful eating. Rather, we explored, foregrounded, and made accessible to designers a range of relevant experiences that might currently be underexplored in food design. Our process included three phases: (1) first-person artistic exploration, (2) design-oriented analysis, and (3) community consultation. We unpack them here:

#### 3.1 Phase 1: First-person artistic exploration

The study began with a first-person artistic exploration. Over the course of 17 months, the first author imagined, prototyped, experimented with, and reflected on a plethora of ways of playfully reconfiguring the act of eating. Her artistic exploration involved 100+ experiments where she created and consumed dishes involving uncommon ways of eating. An example is “Arm Plate”, which involved placing food on the inside of the forearm and using it as a vessel to lick and eat from (Fig. 1D).

At that stage, the experiments were not yet conceived as academic research; the first author conducted them as part of her artistic practice, with no other intent. They were motivated by a pressing need to connect more with her body and with the food during meals: noticing that she often ate alone, in front of a screen, she hoped to enable herself to eat more mindfully. While a systematic protocol for data collection was not formally envisioned from the onset, the artist autobiographically documented her work using Instagram<sup>1</sup>. For each experiment, she made a post including: one or more photos/videos of the play-food experiment; an artistic name; a description of the experiment; and a brief account of her own experience of engaging with it.

#### 3.2 Phase 2: From artistic practice to analysis

The first author’s artwork gained visibility on Instagram over time. Through a series of informal, collegial conversations, the two authors discussed the experiments as a potential source of insight into playful eating, an analysis of which might inspire chefs and other food designers. We decided to collaborate to do such analysis.

The second phase of the study involved a qualitative analysis of the play-food experiments. Using a combination of visual content analysis (Bell, 2001) and reflexive thematic analysis (Braun & Clarke, 2021), we examined the Instagram posts with the aim of uncovering interesting forms of playful eating that might inspire the design of increasingly playful eating experiences. We built on the Situated Play Design (SPD) methodology (Altarriba Bertran et al., 2019), which proposes to explore forms of play and playfulness in people’s existing lived experiences (i.e. *play potentials*) and distill them into generative knowledge other designers can use to create.

To do that analysis, we collected the first 100 experiments on a shared document. We decided to limit analysis to the first 100, even though the list continued (and still continues, as of 2022) to grow. Once collected, we did a first round of inductive coding, independently, followed by a meeting where we contrasted our early lists of codes and negotiated one that generated consensus. Our focus was to surface commonalities in the forms of playful eating expressed in the pool of play-food experiments.

Our first round of analysis yielded a list of 10 codes—i.e. 10 different forms of playful eating. In a second round of analysis, we clustered all the play-food experiments thematically using these codes as a starting point. In a subsequent meeting, we collated our independent analyses and consolidated the thematic clustering of the play-food experiments based on their underlying playful eating forms. That helped to sharpen the final list of codes (i.e. playful eating forms) from 10 down to a list of 8.

Through those two rounds of thematic analysis, we thus surfaced 8 forms of playful eating that, we argue, transcend mainstream approaches to playful eating found in the gastronomic industry and in commercial food design. We suggest that they have inspirational value: they foreground exciting, fun ways of eating that are as experientially rich as commonly underexplored. Building on the SPD methodology (Altarriba Bertran et al., 2019), we frame those playful eating forms as *play-food potentials*: forms of playful eating that are grounded in real, situated lived experiences and that can inspire increasingly playful eating experiences and designs.

#### 3.3 Phase 3: A catalog and exhibition of play-food experiments

The last phase of our study involved dissemination of our play-food potentials (i.e. the findings from our analysis) and underlying play-food ingredients (i.e. the artistic, first-person experiments that motivated them). Importantly, the previous phases of the study reflected our voices and perspectives—the first author’s, through self-experimentation and later reflection; the second’s, through second-person reflection. However rich and valuable those perspec-

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<sup>1</sup> See Instagram account: <https://bit.ly/3TOY90L>

tives were—first-person methods are recognized as a valuable form of qualitative inquiry within design research (Marshall & Mead, 2005)—we set out to broaden them by exploring other people’s.

Hoping to learn about other stakeholder’s thoughts about the play-food forms uncovered by our research, we created an inspirational catalog that presents the 8 play-food potentials and illustrates them with a selection of play-food experiments from Phase 1 of the research. We framed those experiments as actionable ingredients for implementing the play-food potentials, as they provide tangible and nuanced ideas of how these play-food potentials can materialize. We called the catalog “Secret Seasoning”, after the name the first author gave to her artistic work, and presented it as an inspirational guide for playful eating. We printed and distributed it through our personal and professional networks.

We also set up an exhibition featuring a representative selection of the catalog’s content. We used it as an opportunity to gauge people’s reactions to our work, to invite them to discuss it with us, and to engage them in voluntary, playful, and lightweight creative exercises using our work as inspiration. We deployed the exhibition twice, in Spain and Belgium; ~40 people visited it, 21 of which actively engaged us to discuss the work. We consider the latter our research participants; they consented to participate in our research either verbally during the workshop or via WhatsApp. A reflexive thematic analysis (Braun & Clarke, 2021) of the notes, photos, and videos produced during the exhibitions allowed us to broaden our perspectives from the analysis done in previous phases of the study with the views and lived experiences of others. We report on the combination of those findings below.

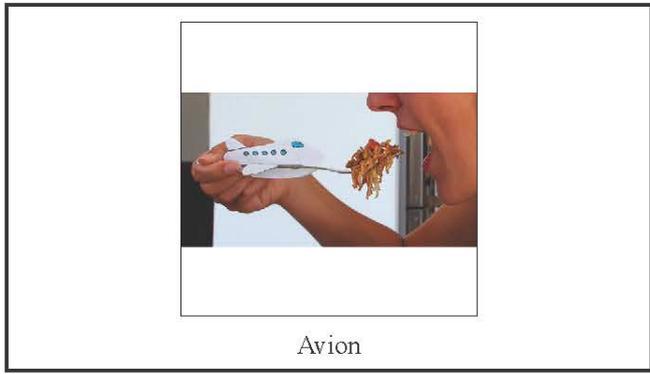
#### 4 RESULTS: AN INSPIRATIONAL LIST OF PLAY-FOOD POTENTIALS & INGREDIENTS

The aim of the process described above was to unpack and make actionable to designers a set of play-food experiences that might be currently overlooked in food design. In this section, we present the findings from our study as 8 *play-food potentials*, i.e. 8 forms of playful eating that we found interesting and potentially inspirational. For each of those play-food potentials, we: (1) unpack their underlying form of playful experience; (2) provide “ingredients” to empower designers to design for it, in the form of examples of play-food experiments included in our catalog; and (3) give an account of both the first author’s and our research participants’ lived experiences with and thoughts about those playful eating experiences. Overall, we this section will provide designers with actionable inspirational starting points for incorporating elements of playfulness and interactivity into their food designs and experiences.

**#1 Edible story worlds**, our first play-food potential, has to do with the idea of enriching eating experiences with a narrative overlay. It uses storytelling as a tool to add an element of playfulness into a meal. Importantly, as opposed to the rather passive forms of storytelling and narrative we often see in gastronomic restaurants (see Section 2.3), this play potential builds on the idea that the diner should be able to actively participate in the story, either as a principal actor or even as a creator. It stimulates the eater’s imagination to help them to become conscious of a story while eating. An example of “Edible story worlds” is “Avion” (Fig. 1A), where the artist pasted figurative elements on her fork to make it look like a plane. During that meal, she found herself imagining taking off, landing, and flying her fork from and to various destinations while managing to land the plane-fork into her mouth with a heap of spaghetti.

According to the first author’s autobiographical accounts of eating “Edible story worlds”—“Avion” and beyond—adding a narrative layer to eating can make meals more meaningful. As food becomes part of a larger story, eating is reframed into a richer, more joyful experience that often has a humorous touch. In our conversations with exhibition attendees, we explored how to enable narrative-based eating experiences: When provided with small food items (cheese cubes, cherry tomatoes, crackers...) as well as toothpicks with different kinds of drawings pasted on them (swords, unicorns, a lightning...), people were generally able to let their imagination flow. For example, two attendees started making little scenes on paper, letting toothpicks with cheese cubes fly over a scenery of cucumber trees representing a park. Differently, when provided only with a plate of spaghetti Bolognese (no props involved), attendees struggled to make up stories and shifted attention towards pragmatic ways of eating. We thus suggest that, to afford “Edible story worlds”, using pre-prepared props such as our thematic toothpicks might be necessary; else, it may be too much for diners to have to invent a story taking as a point of departure a commonplace dish of ordinary food.

**#2 The estrangement of things**, our second play-food potential, messes with the tools that are used for eating. It disrupts commonplace ways of eating in two ways: First, by preventing the eater to handle cutlery as one normally would do. For example, in the experiment “Nose Fork” (Fig. 1B), the artist used a fork as an extension to her nose. While she thought it might be easier to eat with the fork closer to her mouth, the experiment turned out to be challenging. Since her hands became useless for eating, she concentrated on her face as a point of attention, and she felt like she was learning a new skill.



A: Edible story worlds



B: The estrangement of things



C: Displaced food

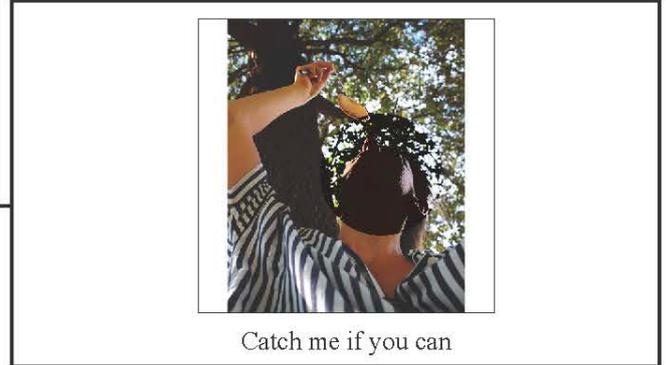


D: The bodily plate

Play-food potentials



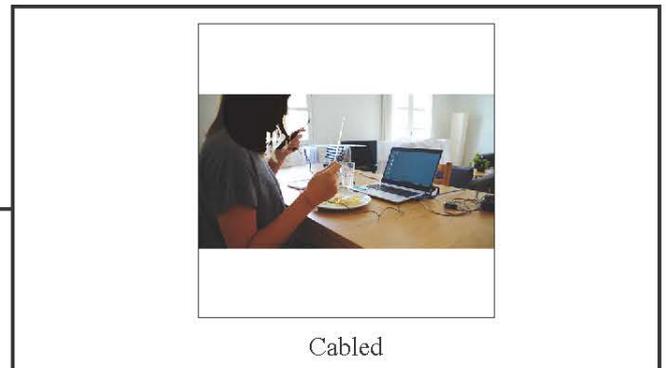
E: Challenge the meal



F: Eating: it's a game!



G: Altered senses



H: Digital eaters

Figure 1. Summary of the *play-food potentials* [1] we derived from our analysis of the first author's artistic practice, illustrated with relevant play-food experiments from her work. The full collection of play-food experiments can be found at: <https://bit.ly/3TOY90L> and in the catalog available through: <https://bit.ly/3DFCWj9>.

Suddenly, she was moving an unusual part of her body (mainly, the neck) to put food into her mouth; a challenge that added great fun to the experience as the artist kept trying to defy the food and the laws of physics with her nose-fork. A remarkable moment in the experiment was when the artist eventually gave up and dived into the plate with her full face to get a bit of food into her mouth—a cheating moment that brought about a great deal of joy.

A second way of experiencing “The estrangement of things” inserts playfulness into the meal is by using tools that are hardly associated with eating. For example, in “Toothbrush” (Fig. 1B) the first author replaced her usual cutlery with a toothbrush. As she had a strong mental idea of the brush’s usual flavor of toothpaste, she found it weird to taste yogurt instead. It was also strange for her to scoop food with the toothbrush instead of squeezing toothpaste on top of it. Using such an uncommon utensil also implied new movements she had never done before while eating her food. It thus added an extra sensorial layer to the meal as well: the texture of the brush stimulated the artist’s tongue.

According to the artist’s first-person experience of experiments involving “The estrangement of things”, by incorporating new objects into the meal the diner can discover how different textures and properties change the perception of food. These new tools invite disrupting old associations and building new connections. Likewise, being playful with the tools one uses for eating invites rethinking one’s commonplace practices. As the first author experimented with her eating tools, she repeatedly challenged her brain and muscles to adapt to the new eating situation. She also broke many conventions and pre-set ideas about certain objects as she used them to handle food with. Keeping an open mind while being aware of those prejudices brought intense joy during those experiments.

That joy resonated with many attendees of our exhibitions. For example, when invited to explore how to use a clothespin as an eating utensil, people surprisingly discovered that a clothespin might in fact be a useful grabbing tool provided the food at focus is not too thick or fragile. As they experimented with that unusual utensil, they enjoyed the process of learning how to not squeeze cherry tomatoes too much (to avoid them splashing open), or turning the clothespin in spaghetti as if it was a normal fork. These carefree explorations, all with their own share of playful failure, were both fun and learningful. Seeing people’s enthusiasm to explore how to eat with those unusual tools and in those unusual ways, we thought that “The estrangement of things” might be an interesting entry-level form of getting people to eat more playfully, as it still respects their comfort zone by giving them the control of handling the objects and tools however they please.

**#3 Displaced food** entails placing foods in unusual settings, i.e. beyond the table or picnic blanket. Consuming food in an atypical environment, whether indoors or outdoors, disrupts old associations and challenges the eater to get rid of certain ideas and standards. An indoors example of “Displaced food” is “Chocolate Window” (Fig. 1C): the artist placed melted chocolate on a (clean) window in her house and then licked the chocolate straight from it. Exploring a new food surface and eating posture—she was licking the chocolate while standing in front of the window—led to the discovery of new human-food interactions, e.g. using the tongue to draw and write on the chocolate. According to her autobiographic account of the experiment, such displacement of food came with a feeling of creative agency.

At the exhibition, many attendees expressed disgust when seeing some of the artist’s “Displaced food” experiments; however, they did burst out in laughter when they found examples of this play potential that did not pose hygienic risks. For example, people seemed to find the experiment called “Hanging pizza” (Fig. 1C) amusing, where the artist hung up pizza slices on a drying rack with clothespins—to a point that one of the visitor’s children got so excited about this experiment that she convinced her parents to try it out at home. Thus, we suggest that “Displaced food” experiences that are hygienically comforting might be a good entryway for people to begin to experiment with their own food.

**#4 The bodily plate** involves placing food on different parts of one’s body, thereby turning oneself into a vessel. According to the artist’s autobiographical experience of experiments based on this play potential, the key affordance of eating from “The bodily plate” is that it adds an extra sensorial layer to consuming food. “Shaving” (Fig. 1D) is an illustrative example of this play-food potential: the first author placed yogurt on her shins and scraped it with a spoon pretending to be shaving her legs. As she was creating this narrative around shave-eating food, she noticed the calming properties yogurt has for the skin. That sensorial discovery, together with the fun of performatively “eating the shaving cream”, added fun to the experience through imaginative pretend play. Further, it brought about discovery: the yogurt took over the artist’s body temperature, becoming lukewarm (and in consequence less tasty) for her.

As food could be placed on arms, hands, legs, face, shoulders, feet, and beyond, this play potential led to mixed reactions at the exhibition. Some attendees were very hesitant to touching food with any other body parts than their hands; they avoided getting dirty and preferred to use plastic bags as a protective layer between their body and the food. However, those attendees who dared to place food directly on their skin reported an experience that resonated with the artist’s: they found it very sensu-

al. To implement this play-potential, we suggest that the environment should lend itself to it: anyone engaging in a bodily plate should feel at ease and safe, and that might require a more private atmosphere.

**#5 Challenge the meal**, our fifth play potential, adds a provocative twist to the meal to make it more interactive and challenging. That can manifest in different ways: setting rules (e.g. not using the hands), creating physical constraints (e.g. tying both hands together), or presenting food in a way that is intrinsically challenging (e.g. placing it in containers that make it difficult for the eater to reach). An example of this play potential is “Handcuffed” (Fig. 1E), where the artist tied her hands before eating a sandwich. Such restriction made her conscious of how much she takes her hands for granted when not tied together. She had to adapt her eating style to be able to coordinate her hands towards simultaneous action. The challenge was much greater than anticipated.

Making a meal challenging requires very minimal setup and preparation. It is a rather simple way to add a playful element to a meal and turn it into a more mindful experience—exhibition attendees noted that. Especially in the Belgian setup, attendees often resorted to this play potential when invited to creatively explore their eating: they challenged themselves by tying their hands, by attaching them to their neighbor’s, by pinning their lips with a clothespin, by taping their face... Interestingly, they noted that seeing other people’s experiments inspired them to try out new things; we suggest these kinds of “Challenge the meal” experiments, if performed in a social context, might lead to incremental collective creativity as diners will be inspired by each other’s occurrences.

**#6 Eating: it’s a game!** encompasses eating experiences enhanced through challenging gameful elements. In different ways, they dare diners to “earn” their food. For example, in “Catch me if you can” (Fig. 1F), the artist made holes on a set of cookies to fish them up with a fishing line and a hook. As she performatively adopted the role of a fisherwoman, she found that fishing up cookies was not easy. The rope dangled from one side to another, and the wind added an extra challenge to that. Nevertheless, she enjoyed the experience, as she saw the laws of physics put into practice and ate each cookie catch as a well-deserved reward.

Generally, experiences around “Eating: it’s a game!” impose a great challenge to eating. Eating becomes a competition as scoring points is translated by a food item that manages to reach the eater’s mouth. The unpredictability and the thrill of flying, moving, and falling food items are what make these experiences so joyful. Exhibition attendees generally liked this play potential, and some pointed out that it lends itself better for snack-based eating scenarios.

When being too hungry, having such a challenge for eating could be too much to deal with. This remark resonated with the artist’s own experiences: in her experiments, she noticed her patience was inversely proportional to how much she was starving.

**#7 Altered senses** involves experiences that aim to trick the senses. This can manifest as playing with lighting, darkness, or other ways of modifying the visual perception of food; it can imply playing with different sensorial cues that alter the touch and feel of eating; or it can involve acts and installations that affect sound perception, smell, or taste.

The first author experimented with “Altered senses” in various ways. An example is “Blindfolded” (Fig. 1G), where she eliminated any visual distraction by putting on a blindfold. Interestingly, she was not as surprised by the taste of her food as she had expected—possibly, because she knew what was on her plate beforehand. Yet, what she found surprising was her way of engaging with the food: once she removed the blindfold, she noticed she had been holding her knife wrongly all around. In another experiment, “Plastified” (Fig. 1G), the artist experimented with her sense of touch and ate a sandwich with plastic gloves. She found that, by putting on plastic gloves to eat, she irrationally started perceiving her sandwich as something that was possibly contaminated—the experiment happened right during the first wave of the COVID-19 pandemic—and raised many questions about the hygienic qualities of the food. Also, since the tactile feel of the plastic was unusual, her attention was exceptionally drawn towards its auditory qualities. Another element that added playfulness to this meal was the fact that the artist took away the limitation of getting something dirty as with the gloves on she was less careful about making spills or making a mess of her hands.

For many exhibition attendees, eating blindfolded was something new; they were generally eager to experience it and to explore and discover its sensorial implications. Many realized that they take many of their senses for granted while eating, and (like the artist) found joy in re-connecting with them through an experience of “Altered senses”.

**#8 Digital eaters**, our last play-food potential, involves experiences that challenge the idea of eating in front of a screen. While on the one hand the idea and concept of a “screen” is confronted, on the other hand this play potential involves experiences that combine screens and eating in playful ways. Mainly, this is done by making the act of eating more interactive. An example is “Cabled” (Fig. 1H): the artist attached cables to her cutlery and plugged them into her laptop. It gave her eating a ‘computer mouse’ experience as she had to deal with cables and their cluttering while trying to eat. The installation made her question and re-imagine food tools in screen set-

tings. Could these tools evolve as well to make screen-meals more conscious? Conducting the experiment enabled the artist to think more creatively and envision solutions to distractive meal settings.

Exhibition attendees identified eating in front of the screen as a relevant issue that interferes with conscious eating. Many noted they wanted to change their scrolling and watching habits but found it very hard to do so. This shows that speculating on how to be more (consciously) playful during meals is relevant considering current societal trends, as also noted in Section 2. We suggest that playfully reambiguating our eating experiences around screens might be first step in that direction.

## 5 CONCLUSION

Our study explores, foregrounds, and makes accessible a set of inspirational materials that can inspire the design of eating experiences that are more (and more diversely) playful. Those generative materials take the form of 8 play-food potentials—i.e. 8 forms of playful eating that transcend existing works in food design—and a set of inspirational play-food ingredients, i.e. 100+ playful eating experiments that instantiate these play-food potentials. Our contribution aims to broaden perspectives on what it may mean to play with food and to support the design of increasingly playful eating experiences. Importantly, it does not present a comprehensive or universally generalizable list of ways in which one can play with food, nor does it unpack the behavioral and sociological implications of playful eating. This work rather reflects on and illustrates the underlying mechanisms found within an artistic exploration and a subsequent reflection on why those playful eating insights are interesting and relevant through the light of both the authors' and other stakeholders' perspectives. Our work thus has inspirational, generative rather than validative value (Gaver, 2012): it is meant to be used in practice to inspire design.

As described in Section 2, play-food experiences often center on a very particular understanding of playfulness, both in food design and contemporary fine dining. They seldom incorporate active participation and interactivity as core properties (Altarriba Bertran & Wilde, 2018). Our contribution makes a richer and broader palette of play experiences accessible and actionable to food designers, as it focuses heavily on play forms that give diners an active role.

We suggest that empowering chefs and other food designers to enhance and diversify the playfulness of their creations can have societal benefits. As people increasingly engage in mindless tasks while eating (Euromonitor International, 2016), inspiring them to playfully re-configure their meals might bring joy to their eating, and in consequence lead to more mindful eating. For example, what would happen if a piz-

za delivery service inserted a playful game element based on the play potential “Eating: it’s a game!”, to make the consumption of their pizzas more joyful? Being inspired by our work, the delivery service could have the idea to modify their pizza boxes by adding a spinning wheel to the base of the box. Diners could then opt to spin the wheel of their “Pizza Roulette” to decide who is getting a slice of pizza first. As opposed to just opening the box to eat the pizza straight from it, diners would discover a multi-layered experience that potentially sparks joy and paces the meal and the underlying social dynamics.

A major limitation that our first-person design led approach brings to the table is that most of our reflections stem from the first author’s first-person lived experiences with the body of play-food experiments. Though these perspectives were enhanced through the second author’s views during analysis, and through 21 research participants’ experiences during the exhibitions, the core of the work reflects the first author’s views. This implies that our contribution cannot be considered a universal representation of how people enjoy playing with their food; we rather present it as an inspirational starting point designers can use and map out with the contexts and populations they design for (or with). By sharing our work at exhibitions, we were able to explore that inspirational potential. We learned that people seemed to lean more towards playful experiences they could engage with and see the results of in a straightforward manner. Those co-design engagements allowed us to better understand how our experimental forms of playful eating might be perceived by others and, more broadly, how they could inspire design. To further explore and enrich the inspirational materials we provide, in future work we will engage more perspectives by collaborating with chefs and other gastronomic designers. Learning how they use our catalog and set of play potentials to ideate playful food experiences will enrich our current understanding of how playfulness can enrich food design.

To close, in this paper we presented a design-led exploration into the playful potential of eating. We shared a body of first-person artistic experiments around playful eating to find actionable insights for food designers to incorporate playfulness into their work. Our contribution surfaces 8 provocative forms of playful eating, illustrated by a body of examples of play-food experiments that transcend existing works in playful gastronomy. Sharing those materials in public exhibitions broadened our understanding of those play-food experiences. We hope our work inspires chefs and other designers to embrace a more diverse palette of play-food experiences in their work, encouraging them to give diners an active role in eating experiences. In future work, we will further explore the inspirational value of our work from professionals within gastronomy.

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