

Autonomy with Food:

How the social, emotional and physical environment may promote wellbeing during mealtimes



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1. Abstract

The way humans eat is linked with wide-ranging social, environmental and health issues. The early years of childhood are when dietary habits and food preferences are established so it is useful to understand the many factors that influence these. The social, emotional and physical mealtime environment in early childhood settings may impact upon children's lasting attitudes toward food and dietary preferences. The research project sought to understand how the social, emotional and physical environment may promote wellbeing during mealtimes, paying particular attention to how the child's autonomy is linked with this. The provision of food has long been an important feature of the service, yet despite the careful attention that was being paid to meals, some children appeared to experience mealtimes as upsetting or stressful. Therefore, the motivation behind the research project was to bring about positive change for the children in the participant group. Information about children's wellbeing levels during mealtimes was collected then a series of changes were introduced to increase children's autonomy with food. Information about wellbeing was collected once more to determine the extent to which the changes had supported children's wellbeing during mealtimes. Following the changes that were introduced, every child in the participant group experienced an increase in their overall wellbeing levels, with all children consistently experiencing high wellbeing during mealtimes. To gain a deeper understanding, the views and experiences of childminders were obtained in questionnaires. Childminders cited the social and emotional environment as being of particular importance in promoting wellbeing during mealtimes. While the findings cannot be generalised because of the small-scale nature of the project, the research highlighted the value of early years settings reflecting on mealtime provision, introducing changes and enhancing wellbeing.

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2. Introduction and rationale

The interconnected nature of food, health and global issues has been a significant interest of mine for the past decade. It stems from my previous job working on the management team of an independent café which provided environmentally sustainable, ethically produced food. While supporting the café to gain national recognition and awards for its work around sustainability and ethics, I acquired a belief that many world-wide problems, including health issues, poverty and climate change, are inextricably linked to food production and food demand. I have struggled to come to terms with the fact that a significant percentage of the population is either obese or malnourished, both internationally and in the United Kingdom (UK) (World Food Programme (WFP), 2016; World Health Organisation (WHO), 2016; NHS Choices, 2015). I find it difficult to comprehend that both nationally and internationally, the free market means farmers experience poor pay and working conditions so that we can enjoy cheap food, while millions of tons of edible food is discarded in the UK every year (Waste and Resources Action Programme, 2016; Baird, 2006). It is my belief that the way we eat can have a powerful impact on such global issues. It is in the early years of childhood that people form dietary habits and attitudes towards food (Wilson, 2015). Therefore, the provision of food can be considered as a central and important aspect of early years settings.

These broad concerns have shaped my work and ethos in early years where I run a small setting which caters for around nine children each day. A strong ethos of the setting is around good nutrition and the provision of homemade, healthy food. Additionally, food ingredients for the setting are selected for their environmental and ethical standards. Mealtimes are an important part of each day, where food is shared by practitioners and children together, with the goal of creating a happy and relaxed atmosphere. Parents cite food as a significant appeal of the provision, often

commenting that it has supported their children to develop healthier, more adventurous diets. Despite this, a small number of children can experience some mealtimes as stressful. This project asked: *to what extent does increasing children's autonomy with food promote wellbeing during mealtimes?* The project aimed to critically reflect upon mealtimes in the setting. It sought to find out whether wellbeing could be better supported by introducing changes designed to promote children's sense of confidence and autonomy. Furthermore, the concepts of occasion, aesthetics and routine around mealtimes have been explored. The changes that were introduced had a positive impact upon the participant group. As such, the changes have been adopted as standard practice and will continue benefitting children beyond the duration of the project.



The children eating pasta with lentils: a Reggio Emilia recipe.

3. Literature

3.1 Global issues

Food preferences and eating behaviours in childhood have a lasting impact on long-term individual health, collective health and global issues such as climate change (WFP, 2016; WHO, 2016; Wilson, 2015; Stuart, 2009; Baird, 2006). On a global scale, the way we eat is having an increasingly detrimental impact upon the health of the human population and the environment. Research highlights stark juxtapositions in the planet's food-related issues. One such concern is the two extremes of malnutrition: starvation and obesity. These impact the global population on a broad scale. For example, there are a reported 795 million people in the world without adequate food, whilst conversely there are an estimated 600 million obese adults and a further 41 million overweight or obese children (WFP, 2016; WHO, 2016). The problems arising from obesity and malnutrition, including diabetes, stroke and cardiovascular disease, are predicted to place increasing strain on healthcare systems around the world (WHO, 2016; NHS Choices, 2011). Additionally, obesity is associated with a range of negative psychological health outcomes, including depression and reduced quality of life (Pulgarón, 2013 *cited in* Fairbrother *et al.*, 2016). Beyond obesity, poor nutrition may also impact upon cognitive function and academic performance (Rose *et al.*, 2016). Richardson (2006) and Holford & Colson (2010) argue that diet is a key factor for treating disorders which impact on children's ability to concentrate and learn. Therefore, diet plays a vital role in some of the most significant issues facing the world.

Another worldwide issue associated with the way we eat is the demand, production and waste of food. Stuart (2009) presents evidence from international research, highlighting the connection between food profligacy in the Global North and food poverty in the Global South. In the United States of America around half of all food is wasted, while in the UK millions of tons of food are discarded each year (Stuart, 2009; Waste and Resources Action Programme, 2016). The over-demand for food in developed countries leaves poorer parts of the world unable to feed their own populations (Stuart, 2009). Furthermore, the widespread imbalance in global food distribution is having a significant impact on the environment; food production and food waste contribute to greenhouse gas emissions and diverse ecosystems are cleared to

grow monocultures such as grains, soy and vegetable oils (*ibid*). Ultimately, scientists believe that this will lead to a world with unfavourable food growing conditions, impacting the long-term sustainability of our food production (*ibid*). The connections between our demands for food, wastage of food, obesity, starvation, climate change, rising food prices and poor working conditions and pay for farmers are complex but real (Baird, 2006; Stuart, 2009). Thus, improving the way that food is produced and consumed is an international priority which is inextricably linked with health outcomes, poverty and climate change.

3.2 Local issues

It is possible to tackle some of these issues on a local level. In the UK around a quarter of adults and almost ten percent of children are obese (NHS Choices, 2016; NHS Choices, 2013). The National Obesity Forum (2014: 3) published a report claiming that obesity 'is one of the biggest threats to the UK, not only in terms of individual and collective health, but in terms of financial cost and societal impact'. The report found that in the UK, knowledge of nutrition is low and food choices are poor, with families from socially and economically deprived backgrounds at particular risk (National Obesity Forum, 2014). The outcomes of this include wide ranging, lifelong health complications (*ibid*). The report acknowledges the importance of the government's School Food Plan but fails to make recommendations for the early years sector. In Bristol, the early years and maternity services have been identified as priority areas in two key strategy documents: Bristol's Strategy for Children, Young People and Families 2016-2020 (Bristol City Council, undated) and the Bristol Health and Wellbeing Strategy (Bristol City Council, 2013). In Bristol, childhood nutrition and health outcomes vary significantly depending on social and economic background, with children from disadvantaged families far more likely to be poorly nourished or obese (Bristol City Council, undated). 15 percent of three-year-olds in Bristol experience tooth decay and 35 percent of children are overweight or obese at the end of primary school; these figures are worse than the national averages (*ibid*). Maternity services are a local priority because this critical time is connected with future health outcomes including obesity and heart disease (Bristol City Council, 2013). The evidence clearly indicates the need to establish healthy lifestyles in the early years of childhood.

3.3 The significance of the early years

The Children's Food Trust (2015) recommends that the early years are important for establishing good eating habits for life and there is growing literature to back this up, yet greater understanding is needed. There is increasing interest in understanding how early experiences of food impact upon food preferences for life and consequently health (Wilson, 2016; Holford & Colson, 2010). Clara M Davis researched the dietary habits of children in the 1920s and 1930s. The research concluded that when babies are given the opportunity to self-select from a wide range of healthy food options they tended to choose an overall balanced diet (Davis, 1939). This research continues to influence thinking such as the concept of 'baby-led weaning', a weaning method popular with British parents that emphasises the child's autonomy and choice (Rapley & Murkett, 2008). However, widespread rhetoric about allowing children full control over their own diets is based on a misinterpretation of Davis' (1939) findings. Wilson (2015) points out that in Davis' self-selection diet the foods on offer excluded all processed, high in sugar and addictive foods that are common in modern diets. Wilson (2015) recommends that adults should control what food is on offer to children, ensuring that it is varied and nutritious but that children should have full control over what they put into their mouths. When children are denied the opportunity to develop broad and healthy food preferences their unhealthy food habits can remain with them into adulthood (Wilson, 2015). Therefore, early childhood is the optimum time for setting the tone for a lifelong healthy relationship with food. Research indicates that besides family, early years settings and staff are key influencing factors in children's food preferences (Atik & Ertekin, 2013). Therefore, focusing on the quality of mealtime provision in early years settings is important.

3.4 Promoting wellbeing

Emerging research indicates that the way in which children develop lasting nutritional habits is far more complex than the dietary rules that parents enforce; emotional and social experiences are also key. As a result of the global obesity epidemic much research has been conducted into certain influences on children's food preferences, such as marketing (Atik & Ertekin, 2013). Yet there remains a lack of research on

social and emotional factors (*ibid*). Wilson (2015) argues that our food preferences are connected to our sense of identity, with positive childhood memories often centring around unhealthy indulgence food leading to unhealthy emotional relationships with food in adulthood. Atik & Ertekin (2013) highlight the importance of social influences such as family and school. Research conducted in America concluded that even in high-performing early years settings the social environment may be poor during mealtimes (Hallam *et al.*, 2014). This conflicts with evidence that mealtimes should be a sociable and enjoyable occasion, free from tension or stress, in order to help children to develop positive associations with healthy food (Rose *et al.*, 2016). Family mealtimes can become an over-emotional experience with parental anxieties about what children eat having an adverse effect on the child's food preferences (Underdown, 2007 *cited in* Rose *et al.*, 2016). It is reasonable to assume that such tensions may exist in early years settings and schools too, meaning that the emotional environment in all childhood settings should be carefully considered during mealtimes. Both internationally and in the UK, emphasis has been placed on the importance of promoting healthy diets in schools. However, research conducted by Fairbrother *et al.* (2016) suggest that when children are consulted they cite family environments as being the key influencing factor in their food preferences. Furthermore, children identified a lack of care within school eating environments as being a negative aspect of school meals (*ibid*). Therefore, it might be concluded that educational settings should provide family-like mealtimes where key staff eat alongside the children, thus enhancing the emotional environment and promoting wellbeing.

Mogharreban and Nahikia-Nelms (1996) analyse how promoting autonomy by providing family-style mealtimes in early years settings develops lifelong healthy eating behaviours. Twenty years ago they identified that early years settings have the opportunity to set enduring food preferences and healthy dietary habits by changing the emotional environment of mealtime provision (*ibid*). Mogharreban and Nahikia-Nelms (1996) argue that settings could create family-style mealtimes by giving children greater autonomy. They suggest that adults should determine the food on offer to children but children should be allowed to serve themselves from dishes in the centre of the table, having ultimate control over what they eat (*ibid*). They cited the importance of intimate, conversational, respectful and relaxed mealtimes shared between staff and children, suggesting that children could be involved in preparing food, setting and

clearing up the dining table in order to promote their autonomy (*ibid*). By acknowledging the learning and developmental value of mealtimes, a shift can occur which allows greater time during each session for children and adults to share food (*ibid*). Yet despite decades having passed since this analysis, it is probable that many settings still place too little emphasis on the significance of the social and emotional environment during mealtimes. Although more research is needed in this area, these ideas can be understood in the broader context of theory. For example, attachment theory highlights the vital role that responsive, trusting adult-child relationships play in children's wellbeing (Sunderland, 2016). Therefore, it stands to reason that a child will benefit from their key person being present during mealtimes. Trusted adults not only help children to feel secure while eating but can also act as positive role models for trying new foods (Mogharreban & Nahikia-Nelms, 1996).

Another theory that may help in understanding the significance of mealtimes is Maslow's 'hierarchy of needs' (Huitt, 2007). Maslow presented the idea that in order to achieve 'self-actualisation' and 'self-transcendence', basic needs, including proper nourishment must be met (*ibid*). But beyond these physiological needs there are other important requirements which can be met through mealtimes. For example, the need for love and a sense of belonging, by creating a family-style mealtime environment in which interaction between children and adults occurs; the need for esteem by allowing children autonomy with food, encouraging them to help prepare meals; the need for cognitive stimulation by allowing children the opportunity to explore food through play and by introducing knowledge about food production, nutrition and health during mealtimes; the need for symmetry, order and beauty by having strong routines in which children can feel secure and by setting up attractive eating environments, using centrepieces such as flowers or candles. In this way, mealtimes can be a part of supporting the child's broader wellbeing and development beyond nourishment. The early childhood settings of Reggio Emilia are internationally renowned for their provision of care and education for young children (Edwards *et al*, 2012). The unique and carefully considered approach to mealtimes in the settings of Reggio Emilia offer an alternative which emphasises the aesthetic, social and emotional elements of mealtimes, promoting wellbeing and autonomy (Cavallini & Tedeschi, 2008). Food is culturally important in Italy and the early education centres of Reggio Emilia reflect this

importance by giving children responsibility over preparing for mealtimes with care (Bennett, 2001).

Understanding children's eating behaviours and food preferences is key to the health of the human population and as such it has been widely investigated. It is recognised that the earliest years of childhood are a critical time for establishing a lifelong healthy relationship with food (Wilson, 2015). Theories, pedagogical perspectives and emerging research are beginning to build understanding of the significance of the emotional and social eating environment in early years settings, yet more research is needed in this specific area. It feels like a vital investment in the future physical and mental health of local and global populations, as well as for promoting economic and environmental sustainability around the world. It seems there is a need to research food habits in early childhood settings in order to understand these issues better and make progress. Small scale action research projects within settings may provide some of the most important contributions to improving dietary habits in early childhood because practitioner-led research promotes positive, authentic and informed change within settings, sometimes contributing to broader understandings of an issue (Nolan *et al*, 2013). Thus, the literature review has provided motivation to examine wellbeing and autonomy during mealtimes within my setting.

4. Methodology

4.1 Approach

The research project asked: *to what extent does increasing children's autonomy with food promote wellbeing during mealtimes?* The project aimed to critically examine the provision of food within the setting, looking closely at the social and emotional environment then drawing conclusions about how effectively mealtimes promoted the wellbeing of children. As a result of the initial findings, changes were implemented with the goal of increasing food autonomy and thus increasing wellbeing during mealtimes. Further data was then collected which allowed inferences to be made about the value of autonomy with food. The project was concerned with interpreting the experiences of a specific and small group of children. As such, it is grounded in the interpretivist research paradigm (Ormston *et al*, 2014; Nolan *et al*, 2013). Interpretivism suits the context of the research and has informed the way in which it was conducted. As a practitioner-researcher, trusted relationships have been established with the young group of participants, making possible the in-depth inquiries into their thoughts and experiences that were obtained (*ibid*). As interpretivism is concerned with investigating the social world it was the appropriate paradigm with which to guide the research process from start to finish (Thomas, 2013). The project has also been rooted in ethical principles which were woven throughout and has regarded the child participants as competent 'social actors' who have influenced the research process and outcomes (James & James, 2012: 114; Jones & Welch, 2010).

4.2 Design frame

The research involved introducing changes and drawing conclusions about how the children responded to these. Thus, it can be categorised as action research (Brown, 2016). Action research was a fitting design frame for the project for two key reasons. Firstly, it was an empowering opportunity to bring about small-scale, positive changes to the provision in direct response to the unique needs of the children (*ibid*). Food and mealtimes have been a longstanding personal and professional interest. The project provided a chance to gain greater understanding of this topic and bring about meaningful change. Secondly, action research in early childhood settings is a process

of collaboration between child participants and practitioner-researchers, emphasising the co-construction of knowledge (Lewis & McNaughton Nicholls, 2014). Thus, the research promoted the children's participation (*ibid*).

4.3 Methods

The methods used mostly produced qualitative data. The initial intention was to assess the existing mealtime provision to determine how effectively mealtimes supported children's emotional wellbeing (see appendix 1). At first, Leuven involvement and wellbeing scales were used. I began by doing group observations during each lunchtime while sitting at the table and participating in the mealtime. However, it became clear that completing assessments about involvement and wellbeing for each child while eating and interacting with the group was too much to manage. Following a review of the situation, SW and AA began sitting at the children's table too. This allowed them to participate more in the conversations and support children so that I could spend more time observing. It was also decided that the focus of observations should be exclusively on wellbeing as this was more relevant to the research question than involvement levels. Wellbeing observations were collected every day over a seven-week term; this produced adequate data for reliable conclusions to be drawn, thus enabling reflection on existing practice (Laevers & Heylen, 2003 *cited in* Woods, 2016). The findings from these preliminary observations revealed that while overall wellbeing was satisfactory, some children had a tendency to struggle at mealtimes and consequently changes should be made. The following term was spent implementing the changes: children began taking responsibility for preparing the lunch environment; children began helping with menu planning; a self-service model for lunchtime was introduced; more time was allowed for meals to avoid rushing; the children were invited to participate in weekly 'Experimental Cookery' sessions. The aim was to increase children's food autonomy and create a relaxed atmosphere during mealtimes. Four weeks after the changes were introduced, further wellbeing observations were conducted in order to assess whether there had been an improvement in children's experience of mealtimes.

Due to the subjective nature of the research topic it was important to add validity to the findings by triangulating the data (Walker & Solvason, 2014). The views of other

childminders were sought in order to gain a deeper understanding of what promotes wellbeing in other similar settings (see appendix 2). However, the questionnaires were distributed too late to inform the second stage of the project. Nevertheless, the data obtained from other childminders provided interesting and useful insights into food provision in other home-based settings which has enhanced the analysis. By using questionnaires, it was possible to take a broader look at the research question and notice whether there were any consistencies between what promotes wellbeing across other childminding settings. From the outset, the intention was to include the views of child participants in the project and aid them in the process of reflection as the project evolved. An ongoing scrapbook-style reflective journal was kept throughout the project, including observations, quotes and photographs. I had planned to also use elements of the Mosaic approach, a research design that uses a range of tools to obtain the views of children (Clark, 2014). However, the birth of my daughter at this stage in the research project meant there was not time for this.



23rd January 2017: An Experimental Cookery session

4.4 Ethical considerations

Numerous ethical considerations have been encountered and there has been a need for ongoing awareness throughout the project. Researching with such young participants presents extra challenges because of the complex power relations that exist between adults and children (Brown, 2016). For the research to be meaningful, researchers must listen and respond with authenticity to the contributions that children make (Gilson, 2013). For example, as young children communicate multimodally, when conducting wellbeing observations it was necessary to be sensitively tuned in to not only their verbal utterances but also their body language, subtle facial expressions and behaviour (Flewitt, 2005 *cited in* Jones & Welch, 2010). As is typical for interpretivist research, the wellbeing observations were subjective (Walliman, 2014); I used the strong knowledge I have of each child in my care to determine their wellbeing levels during mealtimes. Thus, I was a part of the research journey and the findings are based upon my own interpretations of what the children experienced (*ibid*). Another consideration to be aware of was the need to avoid bias. The topic was already of significant personal and professional interest and the literature made for passionate views and assumptions which could not be allowed to cloud the interpretation of the data. It was therefore necessary to maintain an attitude of reflexivity throughout the study in order to add validity to the findings (Robert-Holmes, 2014).

The research topic itself posed ethical considerations. Firstly, because the research was concerned with children's emotional wellbeing and secondly because it linked closely with diet and nutrition, which could easily have crossed an ethical barrier if parenting came under scrutiny. Managing these delicate ethical considerations required focused and mindful conduct. When researching young children, it is important to be aware of the emotional impact of being research participants and to discontinue if a child appears uncomfortable, as this could indicate the child's non-assent or the potential that the research could cause unanticipated harm (Taylor, 2013). The challenge was that some children did find mealtimes upsetting or difficult; this was the very reason for choosing mealtimes as a research topic. Children displaying low wellbeing levels during mealtimes provided important data in the study. As a practitioner-researcher it was possible to decipher whether low wellbeing was

caused by the mealtime or by the observations. Given that the children who tended to experience low wellbeing during mealtimes had done so before the research commenced it was decided that the research was not having an impact on wellbeing. Additionally, it was decided that to avoid the unintentional scrutiny of the impact of dietary habits in children's home environments, the research would remain focused on children's experiences in the setting. Whilst parents continued to seek advice about dietary or mealtime issues at home, these discussions were kept separate from the research project.

At the start of the project, informed parental consent was gained for all of the young participants (see appendix 4). Additionally, the children's assent was sought on a continuous basis. For example, during Experimental Cookery sessions I would ask, "Is it okay if I take photographs of what you're doing?" or, "Can I write down what you said?". This ongoing assent from the children was important because it grounded the project in an ethical, 'rights perspective' approach (Kellett, 2010 *cited in* (Nolan *et al*, 2013). Further ethical considerations included managing the small participant group. Instead of using the children's own initials, which would leave the children identifiable to other families in the group, the initials A, B, C, D, E and F were randomly assigned to each child to increase anonymity levels (Thomas, 2013). Confidentiality was managed by storing the data securely: raw, handwritten data was kept in a locked filing cabinet and later anonymised data was stored on a password protected computer. Parents and children were kept informed about how the project was progressing throughout. Parents received updates via letters home and a private social media group. The photographic journal aided in keeping children informed and seeking their reflections on the ongoing project.

5. Findings and analysis

The project is likely to have had a positive impact on each of the children who participated. The children seemed to find the changes satisfying and enjoyable; in particular, the Experimental Cookery sessions were undertaken with enthusiasm and the children appeared to take pleasure in menu planning, setting the table, creating centrepieces and serving their own food. In addition to the project being enjoyable as a process in its own right, the data indicated that autonomy, a sense of occasion and the emotional environment at mealtimes can promote wellbeing. It is impossible to determine which elements of the changes contributed to this positive impact on wellbeing, so the various aspects of the changes that were introduced will be considered together as a whole. It is also important to note that the small-scale nature of the project means that the research is useful to the setting but cannot be generalised beyond the specific cohort of children involved (Thomas, 2013). Furthermore, while it is likely that the changes boosted children's wellbeing levels, it is possible that as children became more settled within the group and more mature over time, such improvements would have occurred anyway (*ibid*). Thus, it is necessary to exercise caution in interpreting meaning from the results. By drawing together the information obtained from literature, wellbeing observations and colleague questionnaires, some significant themes emerged. While the broad range of information obtained was both interesting and useful, three core themes have been identified and will be analysed, drawing upon the process of thematic analysis (Spencer *et al*, 2014).

5.1 Summary of findings

All children in the participant group showed an increase in wellbeing once the changes had been introduced in Terms 3 and 4 (see figure 3). The data from Term 2 showed that Child F had the highest wellbeing levels before the changes were implemented (see appendix 3, figure 1). Child F made the smallest increase in wellbeing of all the children after the changes had been implemented. While Child F remained as one of the children with the highest average wellbeing levels in Terms 3 and 4, the wellbeing gap between the highest and lowest children had been diminished significantly, resulting in more equal levels of wellbeing during mealtimes between the children (see appendix 3, figure 2).

Figure 3

Change from Term 2 to Terms 3 and 4:

| Child A | Child B | Child C | Child D | Child E | Child F |
|---------|---------|---------|---------|---------|---------|
| +0.5 | +0.8 | +0.3 | +0.3 | +1.7 | +0.1 |

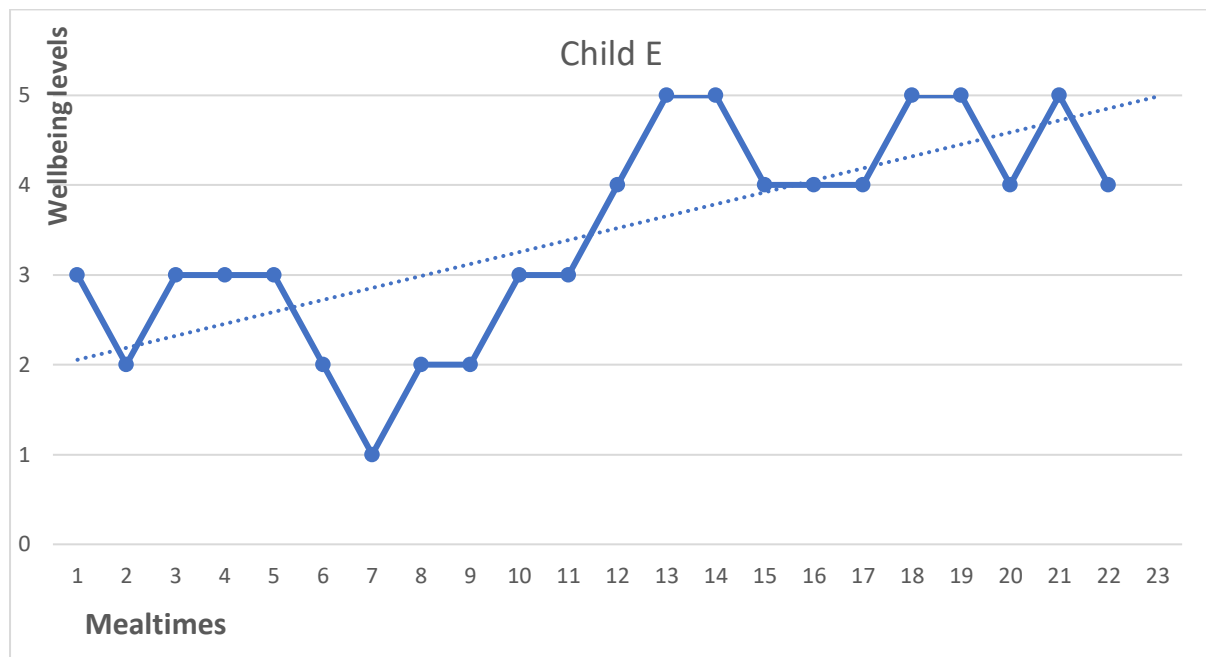
Child E's wellbeing levels increased significantly following the changes. During the initial round of data collection, Child E's wellbeing levels were an average of 2.7 out of 5. Child E had a tendency to find mealtimes upsetting, displaying unhappy body language. For example, on 21st November 2016 Child E's wellbeing level was recorded as 1 with the markers of very low wellbeing noted as follows: *'Child E says "No" and puts head on table, hiding in hands and looking tense and sad. Remains like this for whole meal. Eats nothing.'* Similar behaviour during mealtimes was typical of Child E before the project commenced and throughout Term 2. It is important to note that Child E displayed high wellbeing levels at other times of day but rarely during mealtimes, showing that mealtimes were the cause of Child E's anxiety or unhappiness. In Term 2, Child E did occasionally score highly during mealtimes and this correlated with meze-style meals with plenty of food options. This was an early indication of the importance of autonomy for Child E. Once the changes had been implemented, Child E's average wellbeing levels improved significantly (see figure 4).



3rd January 2017: AA supports the youngest child in the group to participate in an Experimental Cookery session.

Figure 4

Child E's wellbeing improved by 1.7 points on the Leuven scales:



The colleague questionnaires revealed factors that support or prevent wellbeing according to the experiences of fifteen childminders. The questionnaires asked open questions which I categorised according to themes (see appendix 3, figures 9 & 14). This highlighted the commonalities between the childminders' experiences. In particular, childminders understood the significance of the social and emotional environment.

5.2 The social and emotional environment

Childminders cited a range of factors that can be broadly characterised as relating to the social and emotional environment (see appendix 3, figures 7, 8, 10 & 15). The most common reference was the absence of 'pressure', with childminders citing pressure to eat and time pressures as barriers to wellbeing. Childminders described the need for a relaxed attitude towards children trying food, how much children eat and how fast children eat (see appendix 3, figures 10 and 15). An element of the changes that were introduced in the setting was the creation of a more relaxed atmosphere around mealtimes; this was partly achieved by allocating more time in the day for eating. Mealtimes became a central event in the session which allowed us to

relish the moment without hurrying. When pressure on children is avoided, the resulting absence of tension enables them to develop positive associations with healthy food (Rose *et al*, 2016).

Many childminders recognised the importance of adults and children sitting together during mealtimes in a family-like arrangement and engaging in conversations (see appendix 3, figures 10 and 15). These measures were already in place before commencing the research project but as children’s wellbeing levels rose they were gradually more able to participate in group conversations and laughter around the table. Evidence suggests that children prefer eating in social and emotional environments that reflect the family home (Fairbrother *et al*, 2016). Childminders recognise this and are well placed to meet this need; many childminders who participated in the research claimed to share mealtimes with children, sitting around a family dining table in small groups that facilitate interaction (see appendix 3, figure 10). This resonates with ideas presented by Mogharreban and Nahikia-Nelms (1996) that suggest early childhood settings can influence children’s dietary habits positively by modelling the provision on family meals; this would entail adults and children sitting together in intimate, conversational groups to eat. Returning to the concept of Maslow’s hierarchy of needs, it is clear that in meeting children’s need for love and a sense of belonging, family-style mealtimes may boost wellbeing levels in early years settings (Huitt, 2007).



*9th January 2017: “Shall we sit together?”
Two children carefully arranged their plates and cutlery so that they could sit together and talk during lunchtime.*

5.3 Autonomy and choice

A clear theme that emerged in the literature was the need for autonomy with food. While this influenced the changes that were implemented during the project, few childminders directly referred to the need for autonomy and choice. In Question 5 the option, *'Meals with lots of choices that children can select themselves'* was selected six times, making it average in terms of significance to the participant group (see appendix 3, figure 6). But some of the answers may relate indirectly to autonomy and choice. For example, the second most common answer was *'Meals which children have planned or requested'*. This indicates that childminders identified involving children in menu planning as key to promoting wellbeing. In Questions 7 and 8, childminders cited avoiding pressure and coercion as important and this also links with autonomy. For example, when describing the barriers to wellbeing one childminder wrote, *'Telling a child that they have to eat something (imagine that as an adult!)*' (see appendix 3, figure 16). The wellbeing observations appear to support this notion. Before the changes were implemented, the few days where average wellbeing levels were high in the group were days with meze-style meals which offered plenty of choice. Once the changes were introduced children appeared to respond positively to the new system where they served their own food onto plates, having more control over what they ate. To promote wellbeing and positive dietary habits, children should be given control over food by serving themselves from dishes in the centre of the table, providing adults have carefully considered the nutritional value of the food that is on offer (Wilson, 2015; Mogharreban & Nahikia-Nelms, 1996).

5.4 Symmetry, order and beauty

Maslow's hierarchy of needs identifies the importance of 'symmetry, order and beauty' so that a person can reach their full potential and experience fulfilment (Huitt, 2016). In the early years settings of Reggio Emilia, mealtime wellbeing and autonomy are promoted through children's involvement in carefully preparing the aesthetic environment (Edwards *et al*, 2012; Cavallini & Tedeschi, 2008; Bennett, 2001). From the beginning of Term 3, children were invited to take responsibility for setting the dining table. They appeared to relish this opportunity and took great care over the task; soon after this measure was introduced they began to do it independently. For

example, on 16th January 2017 I said, “We’ll need to get ready for lunch soon,” to nobody in particular. Child D stopped and said, “chair,” then began setting chairs around the table. The whole group sprang into action and without guidance they set out plates, cutlery and glasses of water. This routine became an important and enjoyable element of each session. Childminders commented on this factor in the questionnaires. For example, a small number of childminders wrote about the importance of routine in promoting wellbeing and others described routines such as handwashing, setting the table, clearing away food and giving thanks as a group (see appendix 3, figures 13 and 15). Taking inspiration from the early years settings of Reggio Emilia, children were invited to create centrepieces for the dining table. During the winter months, bought flowers were provided which children arranged, sometimes with support. Candles were often lit on dark, rainy days. Later in the year children were encouraged to find flowers and other natural items from the garden to make centrepieces. On one occasion, a child chose to bring a collection of shells from home especially for this purpose, showing the personal significance of this routine. One childminder referred to the routine of lighting a candle during mealtimes but there were no other references to the aesthetic environment in the questionnaires. Of childhood eating experiences, Wilson (2015: 79) writes, ‘These are the memories that still have emotional force years or even decades later’, arguing that these formative eating experiences have a lasting influence over future diet. Thus, creating a sense of occasion and beauty around nutritious food can be regarded as important.



6th February 2017: A child created this centrepiece using shells from home.



Preparing the mealtime environment.

6. Conclusion, outcomes and recommendations

Human dietary habits are established in early childhood and are linked to a broad range of negative issues in the world, from poor health to environmental and social factors (WFP, 2016; WHO, 2016; Wilson, 2015; Stuart, 2009; Baird, 2006). Evidence suggests that the value of mealtimes in promoting positive outcomes for children can be overlooked in early years settings (Hallam *et al*, 2014). Yet mealtimes may be a powerful tool for promoting the health of children (Rose *et al*, 2016; Wilson, 2015; Mogharreban & Nahikia-Nelms, 1996). Thus, the provision of food must encompass much more than nutritional value; attitudes toward food are established in early childhood and so early years settings have a role in founding these (Atik & Ertekin, 2013). By focusing on the social and emotional environment, early years settings can promote autonomy and thus wellbeing during mealtimes (Mogharreban & Nahikia-Nelms, 1996).

The research project set out to discover the extent to which autonomy with food promotes wellbeing during mealtimes. Changes were introduced with the goal of increasing children's autonomy. Children were invited to participate in weekly Experimental Cookery sessions; they were able to exercise autonomy by playing with food in an entirely child-directed process. During these sessions, children explored the qualities and properties of fresh food produce and chose to taste food while they played. A self-service model was introduced for mealtimes. Instead of children being presented with adult-prepared portions of food, they helped themselves from dishes in the centre of the table. Children took responsibility for preparing the lunchtime environment; this element linked with the importance of routine and aesthetics as well as the slower, more relaxed pace we were trying to adopt around mealtimes. Overall, these measures took a more holistic view of food provision in the setting. We moved beyond simply catering for children's nutritional needs and began considering how mealtimes might support their emotional and social development. In retrospective, children were also developing valuable independence, mathematical and communication skills in setting the dining table and serving their own food. They were being creative in considering the aesthetic elements of the environment and creating attractive centrepieces for the table. This process was positive, enjoyable and therefore worthwhile in its own right. Moreover, the data revealed that wellbeing levels

rose for all children in the group following the introduction of these changes; however, it is challenging to determine the extent to which the improved wellbeing resulted from the changes (Thomas, 2013).



Investigating a lemon;



Newly developed allotment area.

The research focused on a small group of child participants and was situated in the specific context of this group. Therefore, the findings cannot be generalised to other settings (Thomas, 2013). By drawing upon the experiences of more children from the perspective of other childminders, the data was triangulated and common themes around promoting wellbeing in mealtimes emerged, adding some validity to the findings (*ibid*). The birth of my daughter during the project meant it was not possible to complete the Mosaic approach element of the research. This might have offered insight into the elements children found particularly beneficial to their experiences and could be useful future exploration after the project has concluded. The project has instigated the adoption of significant changes in the setting. The setting operates predominantly outdoors so it has been decided that weekly Experimental Cookery sessions will be offered throughout the winter months when the group spends more time indoors. The children will continue participating actively in menu planning and

preparing the mealtime environment, and meals will continue to be self-service. I would like to further explore self-service models by examining what happens in other settings to determine a good balance between autonomy and encouraging children to try a range of foods. I have wondered whether full autonomy is appropriate when evidence suggest that trying new or disliked foods helps children overcome fussiness and broadens their diet (Cooke, 2007). Since concluding the research, an allotment area has been established in the setting and children have been involved in growing, harvesting and eating food; it is hoped that this will further promote wellbeing and therefore, positive attitudes toward food.

The action research has proved to be an empowering and positive experience for the child participants and staff in the setting (Brown, 2016; Lewis & McNaughton Nicholls, 2014). While what has worked in this setting would not produce the same result for all children and childminders, it has demonstrated the value of reflecting on mealtime provision and making changes with the goal on enhancing wellbeing. The report concludes that childminders are well placed to meet the needs of children's wellbeing during mealtimes. Consequently, it is recommended that childminders will find value in reflecting on mealtime provision and engaging in research to bring about positive change. In this way, home-based childcare settings are positioned to use mealtimes as a powerful tool for holistic development and setting life-long healthy dietary habits.



9th January 2017: Smoothie and spices in an Experimental Cookery session

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Appendix 1: Group mealtime screening form

Group mealtime screening of Leuven wellbeing levels

| Date | Observer | Meal | Food |
|------|----------|------|------|
| | | | |

| Child | Wellbeing | Comment |
|-------|-----------|---------|
| | 1 2 3 4 5 | |
| | 1 2 3 4 5 | |
| | 1 2 3 4 5 | |
| | 1 2 3 4 5 | |
| | 1 2 3 4 5 | |
| | 1 2 3 4 5 | |

Appendix 2: Colleague questionnaire

Dear childminders

I am doing a research project in my setting to examine how children's wellbeing can be promoted during mealtimes as part of my Sector Endorsed Foundation Degree in Early Years. I want to find out the extent to which increasing children's autonomy, choice and independence with food boosts their sense of wellbeing and enjoyment while they eat. In my setting we are implementing a new approach to mealtimes and measuring whether wellbeing levels change as a result. I am keen to find out what works (and does not work) in other childminder settings during mealtimes. **I would be grateful if you would complete this questionnaire and return it to me by Monday 19th June 2017.**

Your completed questionnaires will be submitted as paper appendices to my tutors when the research project is finished. Some of the data will be used in my analysis, which will be submitted to my tutors online via 'turnitin', but please be assured that you will not be identified. The finished project will be seen by my tutors and the research participants. I may also share the findings more widely but the completed questionnaires will be destroyed before then. **To help maintain anonymity, please do not identify yourself, your setting or any of the children you work with in the questionnaire.** I will do my utmost to maintain confidentiality and anonymity. The only exception to this is where I believe a child or any other person is at risk of harm, in which case I will follow local safeguarding procedures. You can withdraw from the research at any point without consequence; the questionnaires have been coded to ensure that this is possible.

1. Do you provide meals for your childminded children? (Please tick one).

- I provide meals.
- Parents provide meals (e.g. packed lunches).
- Both of the above.

NB: If children do not eat in your setting there is no need to continue with the questionnaire.

2. If you provide meals for the children, which meals do you provide in a typical day? (Please tick all that apply).

- Breakfast.
- Lunch.
- Evening meal.

NB: If you do not cater for children please leave this blank.

3. If children bring meals from home which of the following statements best describes your approach? (Please tick one).

- Parents provide meals and I do not regulate what food children bring with them.
- Parents provide meals but I have some rules about what they can bring.
Please _____ provide _____ details:
.....

4. If you provide meals for children, which of the following statements best describes your approach to food and mealtimes? (Please tick one).

- I provide meals that I know children will like. Young children can be fussy eaters and it is important that they do not go hungry so I stick to meals that I know they will usually eat.

- I provide a varied menu with new choices during meals to encourage children to eat a wide range of foods. This sometimes means that they reject meals but it is important to offer variety and new things.
 - I do a bit of both, combining new foods with 'safe' favourites.
 - None of these statements is right, I want to write my own!
-
-
-
-

5. What do you consider to be the favourite meal experiences of your childminded children of the following options? (Please tick up to three).

NB: Consider what makes children seem happy and relaxed when they eat.

- Meals at the setting.
- Meals in the garden.
- Picnics eaten on outings.
- 'One pot wonders' (a meal like soup or pasta that 'come as they are').
- Meals with lots of choices which children can select themselves.
- Meals which children have planned or requested.
- Meals which children have helped to cook.
- Other:

6. In your experience of working with children are there any things that help children to experience higher levels of wellbeing during mealtimes?

Comment:

.....

.....

.....

.....

.....

.....

7. In your experience of working with children are there any things that cause children to feel unhappy or stressed during mealtimes?

Comment:

.....

.....

.....

.....

.....

.....

Thank you for taking the time to support my research project by completing this questionnaire.
 Please return your completed questionnaire to me using the envelope provided.
 Millie Colwey.

Appendix 3: Summary of data

Summary of data from group mealtime screenings

The wellbeing level of each child was recorded during mealtimes throughout Term 2. In Term 3, changes were implemented with the goal of promoting autonomy and raising wellbeing levels. After four weeks, further group screenings were conducted during mealtimes to ascertain whether wellbeing levels had improved.

Key:

- - No data collected
- x child absent

Figure 1

Term 2 wellbeing observations:

| | Child A | Child B | Child C | Child D | Child E | Child F |
|---------------|---------|---------|---------|---------|---------|---------|
| 31/10/2016 | 4 | 3 | 4 | 5 | 3 | 5 |
| 01/11/2016 | 3 | 4 | 5 | 3 | 2 | 5 |
| 07/11/2016 | 4 | 4 | 3 | 3 | 3 | x |
| 08/11/2016 | 4 | 5 | 3 | 5 | 3 | x |
| 14/11/2016 | 4 | 3 | x | 4 | 3 | 5 |
| 15/11/2016 | 3 | 2 | 3 | 4 | 2 | 4 |
| 21/11/2016 | 3 | 4 | 4 | 4 | 1 | 4 |
| 22/11/2016 | 4 | 5 | 4 | 5 | 2 | 4 |
| 28/11/2016 | 3 | 4 | 4 | 5 | 2 | 4 |
| 29/11/2016 | - | - | - | - | - | - |
| 05/12/2016 | 4 | 4 | 5 | 4 | 3 | 5 |
| 06/12/2016 | 2 | x | 3 | 4 | 3 | 5 |
| 12/12/2016 | 4 | 4 | x | 3 | 4 | 5 |
| 13/12/2016 | 5 | 5 | x | 5 | 5 | x |
| Modal average | 4 | 4 | 4 | 4 and 5 | 3 | 5 |
| Mean average | 3.6 | 3.9 | 3.8 | 4.1 | 2.7 | 4.6 |

Figure 2

Term 3 and 4 wellbeing observations:

| | Child A | Child B | Child C | Child D | Child E | Child F |
|---------------|---------|---------|---------|---------|---------|---------|
| 03/01/2017 | - | - | - | - | - | - |
| 09/01/2017 | - | - | - | - | - | - |
| 10/01/2017 | - | - | - | - | - | - |
| 16/01/2017 | - | - | - | - | - | - |
| 17/01/2017 | 5 | 5 | 4 | 4 | 5 | 5 |
| 23/01/2017 | 4 | 5 | 5 | 5 | 4 | 4 |
| 24/01/2017 | 4 | 5 | 4 | 5 | 4 | 5 |
| 30/01/2017 | 4 | 4 | 4 | 4 | 4 | 4 |
| 31/01/2017 | 4 | 4 | 4 | 4 | 5 | 5 |
| 06/02/2017 | 4 | 5 | x | 4 | 5 | 5 |
| 07/02/2017 | 3 | 4 | x | 4 | 4 | 4 |
| 20/02/2017 | 4 | 5 | 4 | 5 | 5 | 5 |
| 21/02/2017 | 5 | 5 | 4 | 5 | 4 | 5 |
| Modal average | 4 | 5 | 4 | 4 | 4 | 5 |
| Mean average | 4.1 | 4.7 | 4.1 | 4.4 | 4.4 | 4.7 |

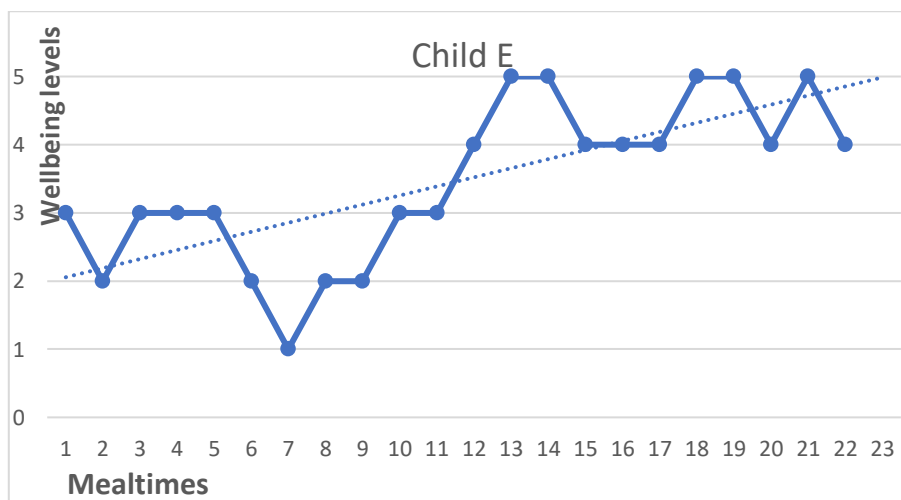
Figure 3

Change from Term 2 to Terms 3 and 4:

| Child A | Child B | Child C | Child D | Child E | Child F |
|---------|---------|---------|---------|---------|---------|
| +0.5 | +0.8 | +0.3 | +0.3 | +1.7 | +0.1 |

Figure 4

Child E's wellbeing improved by 1.7 points on the Leuven scales:



Summary of data from colleague questionnaires

Questionnaires were sent out to other childminders around the city to gain insights from practitioners working in similar environments. Fifteen childminders completed and returned questionnaires, offering a broad range of views with some common themes. Questions 4 and 5 were multiple-choice questions and this information has been presented in tables.

Figure 5

Colleague questionnaire, question 4:

If you provide meals for children, which of the following statements best describes your approach to food and mealtimes? (Please tick one).

| | |
|--|----|
| I provide meals that I know children will like. Young children can be fussy eaters and it is important that they do not go hungry so I stick to meals that I know they will usually eat. | 1 |
| I provide a varied menu with new choices during meals to encourage children to eat a wide range of foods. This sometimes means that they reject meals but it is important to offer variety and new things. | 1 |
| I do a bit of both, combining new foods with 'safe' favourites. | 12 |
| None of these statements is right, I want to write my own! | 1 |

Other answer:

- 'Varied menu – 3 week rotation balance of pasta, potatoes and rice over 3-4 days. Evenings tend to be 'safer' as sometimes feeding 14 children of different ages. Mix new food with safe ones and present several times over a period of time'.

Figure 6

Colleague questionnaire, question 5:

What do you consider to be the favourite meal experiences of your childminded children of the following options? (Please tick up to three).

| | |
|---|----|
| Meals at the setting. | 2 |
| Meals in the garden. | 6 |
| Picnics eaten on outings. | 13 |
| 'One pot wonders' (meals like soup or pasta that 'come as they are'). | 2 |
| Meals with lots of choices that children can select themselves. | 6 |
| Meals which children have planned or requested. | 7 |
| Meals which children have helped to cook. | 6 |
| Other. | 1 |

Other answer:

- 'Meals under the kitchen table (den) are always a favourite here.'

Questions 6 and 7 were open questions, so network analysis was used to decipher common themes. This data is presented using quotes from the questionnaires as examples.

Figure 7

Colleague questionnaire, question 6:

In your experience of working with children are there any things that help children experience higher levels of wellbeing during mealtimes? (Written answers).

| | |
|--|---|
| Answers to do with allowing plenty of time to eat. | 3 |
| Answers to do with routine and ritual. | 2 |
| Answers to do with adults and children eating together. | 5 |
| Answers to do with pleasant environment or atmosphere. | 4 |
| Answers to do with social environment i.e. having conversations. | 7 |
| Answers to do with having familiar 'safe' food on their plate. | 3 |
| Answers to do with variety and new foods. | 1 |
| Answers to do with not being pressured to eat. | 6 |
| Answers to do with being offered lots of choice. | 1 |
| Answers to do with pudding i.e. being allowed to eat it even if not had main course. | 2 |
| Answers to do with helping to set and clear the table. | 3 |
| Answers to do with fun and games i.e. 'making faces with food on plates' | 3 |
| Answers to do with receiving praising for trying new food or table manners. | 2 |
| Answers to do with growing food. | 1 |
| Answers to do with helping to prepare food. | 2 |

Figure 8

Colleague questionnaire, question 7:

In your experience of working with children are there any things that cause children to feel unhappy or stressed during mealtimes? (Written answers).

| | |
|---|----|
| Answers to do with being made to sit at the table/stay at the table. | 2 |
| Answers to do with atmosphere i.e. too noisy or not calm enough. | 2 |
| Answers to do with pressure to try new foods or finish a portion. | 11 |
| Answers to do with withholding pudding or using pudding as a bribe. | 2 |
| Answers to do with preference, broken routines or habits i.e. wrong coloured plate. | 2 |
| Answers to do with being isolated. | 2 |
| Social disputes i.e. having food stolen by another child or interrupting conversations. | 4 |
| Answers to do with not having food choices. | 3 |
| Answers to do with feeling tired or unwell. | 1 |

Figure 9
Childminder insights about promoting wellbeing during mealtimes.

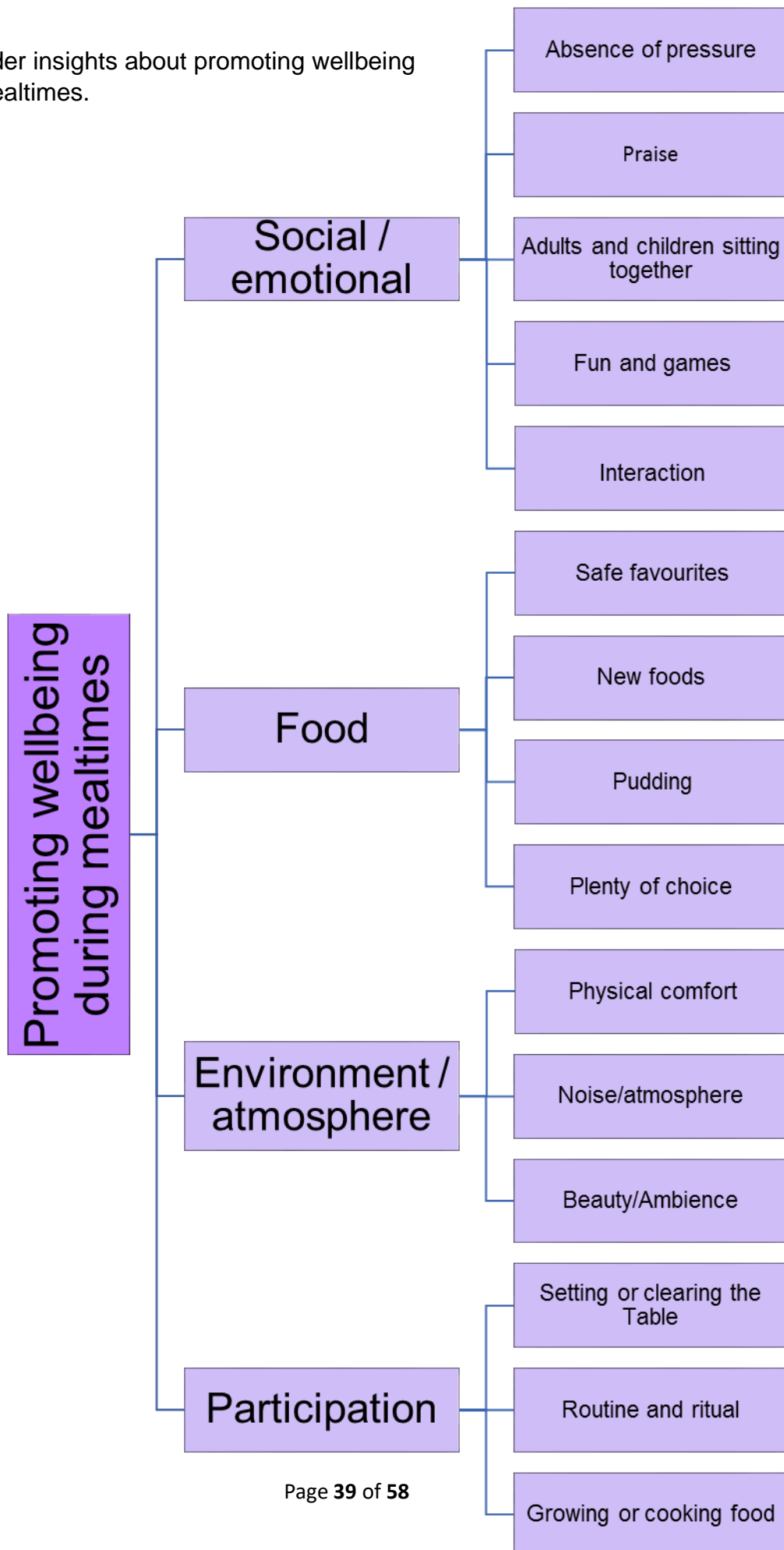


Figure 10
Social and emotional factors that support wellbeing during mealtimes.

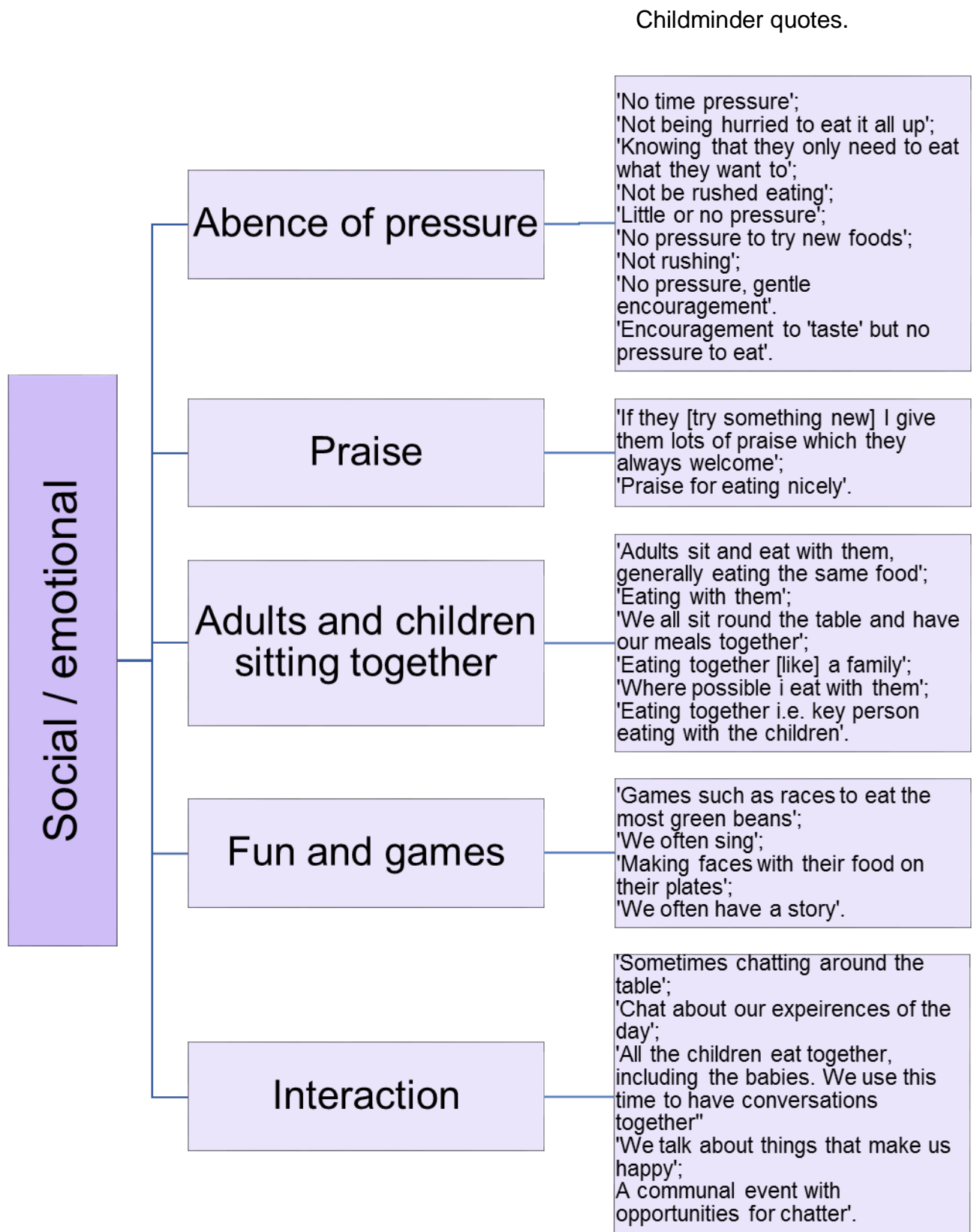


Figure 11

Food factors that support wellbeing during mealtimes.

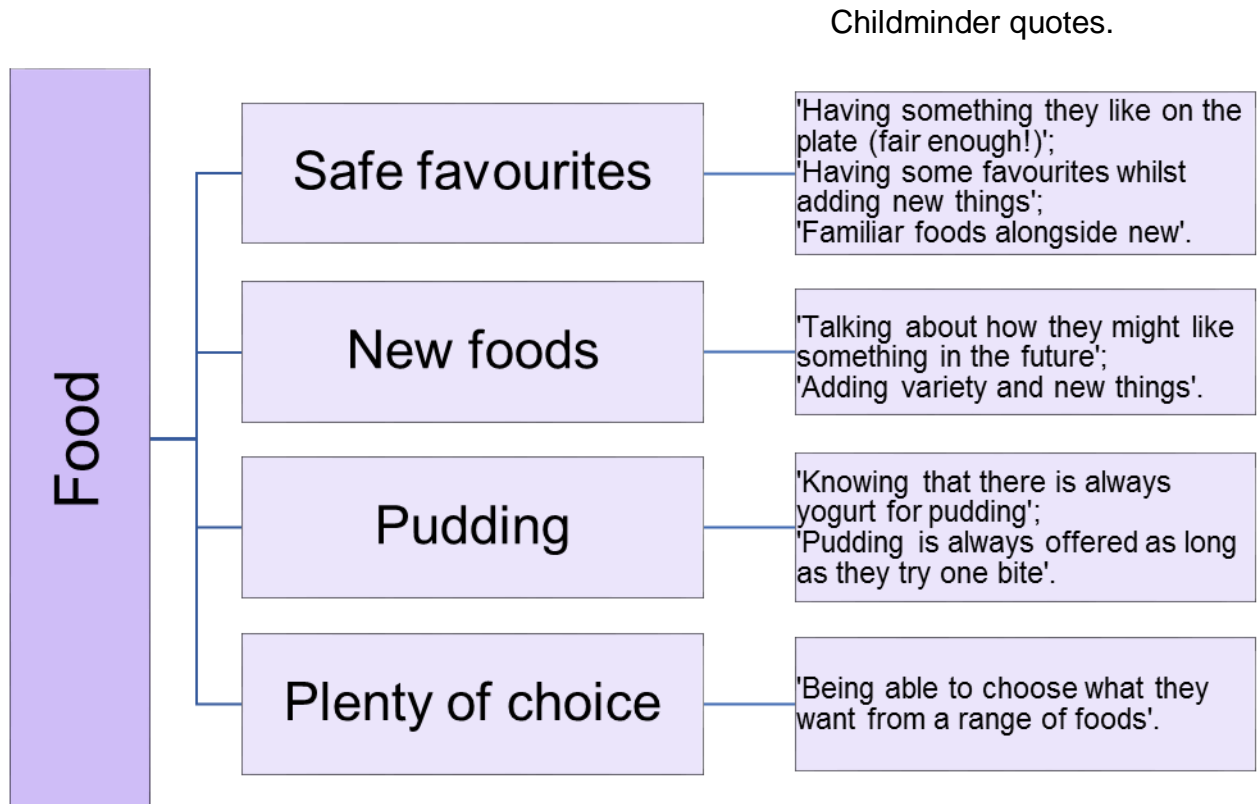


Figure 12
Environment and atmosphere factors
that support wellbeing during mealtimes.

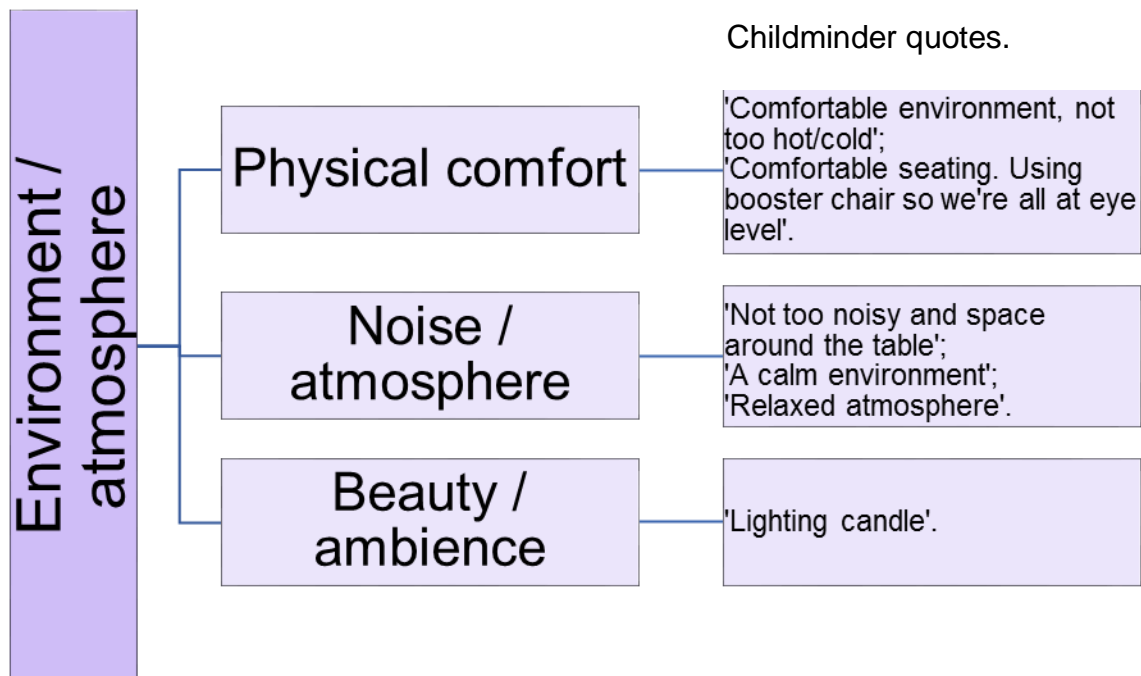


Figure 13
Participation factors that support wellbeing during mealtimes.

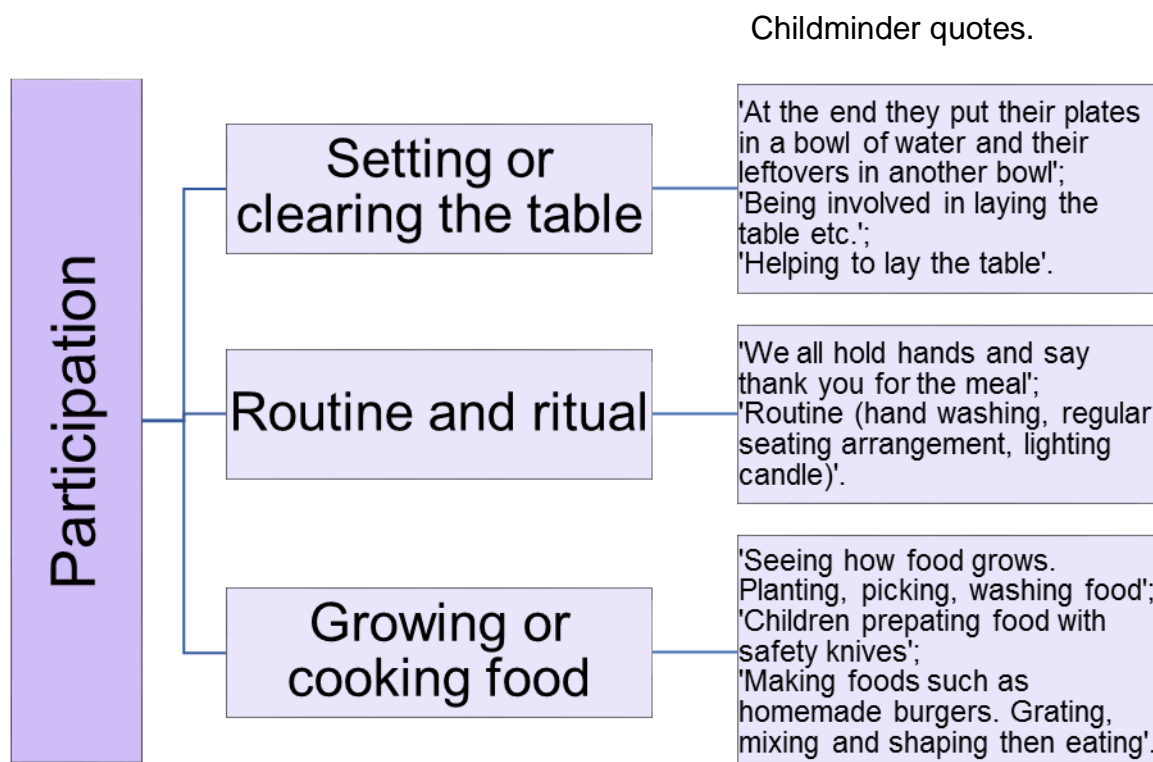


Figure 14
Childminder insights about barriers to wellbeing during mealtimes

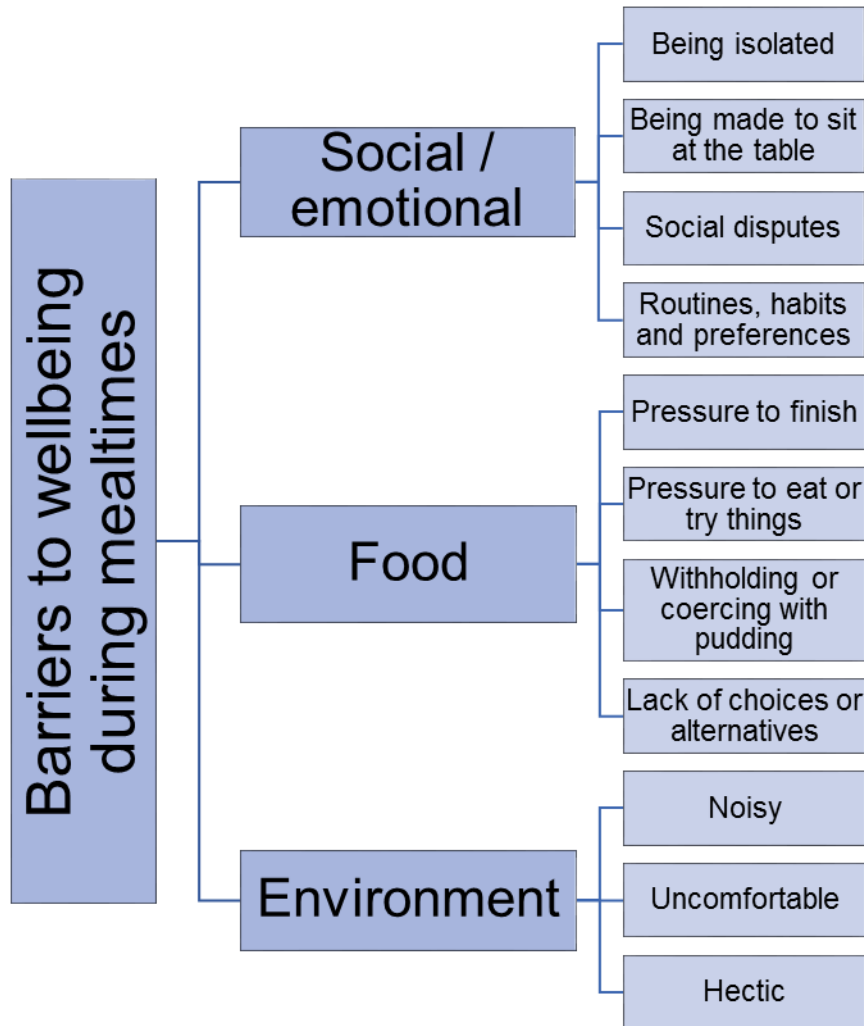


Figure 15

Social and emotional factors that act as barriers to wellbeing during mealtimes.

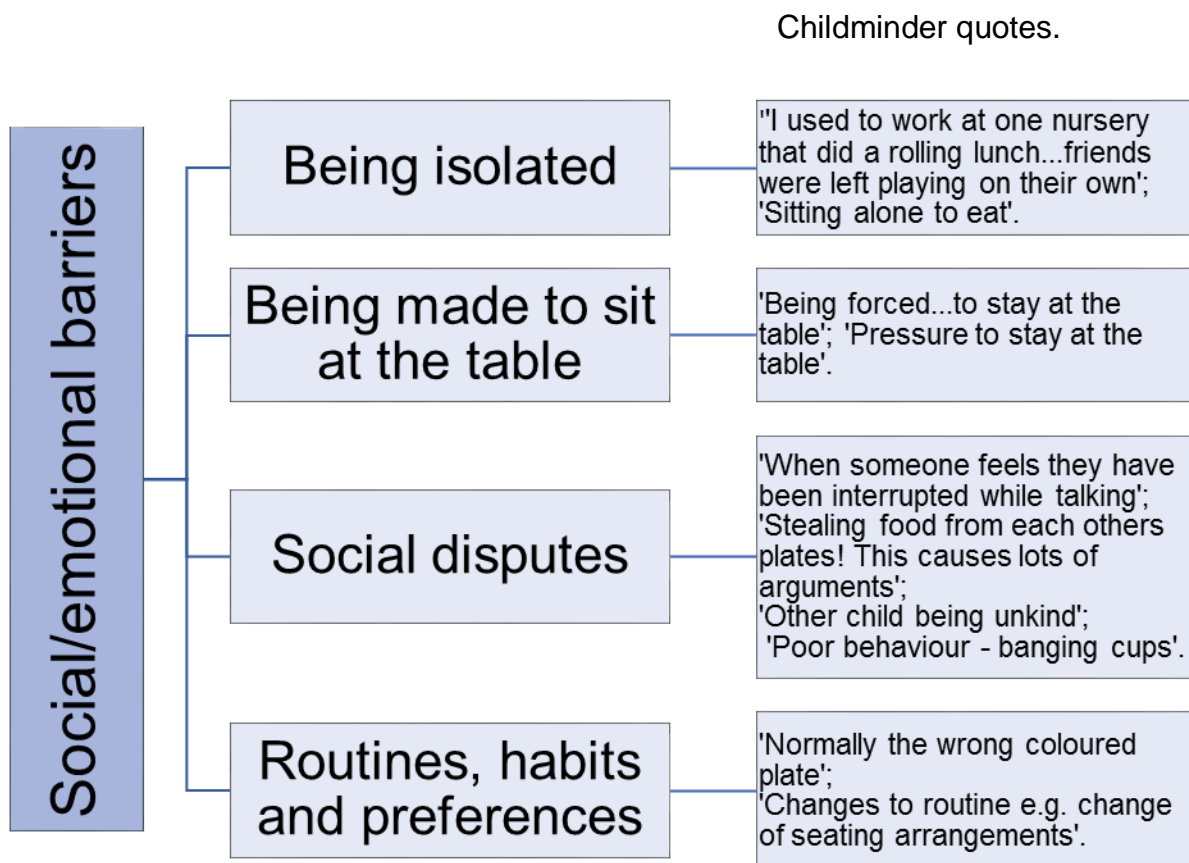


Figure 16
 Food factors that act as barriers to wellbeing during mealtimes.

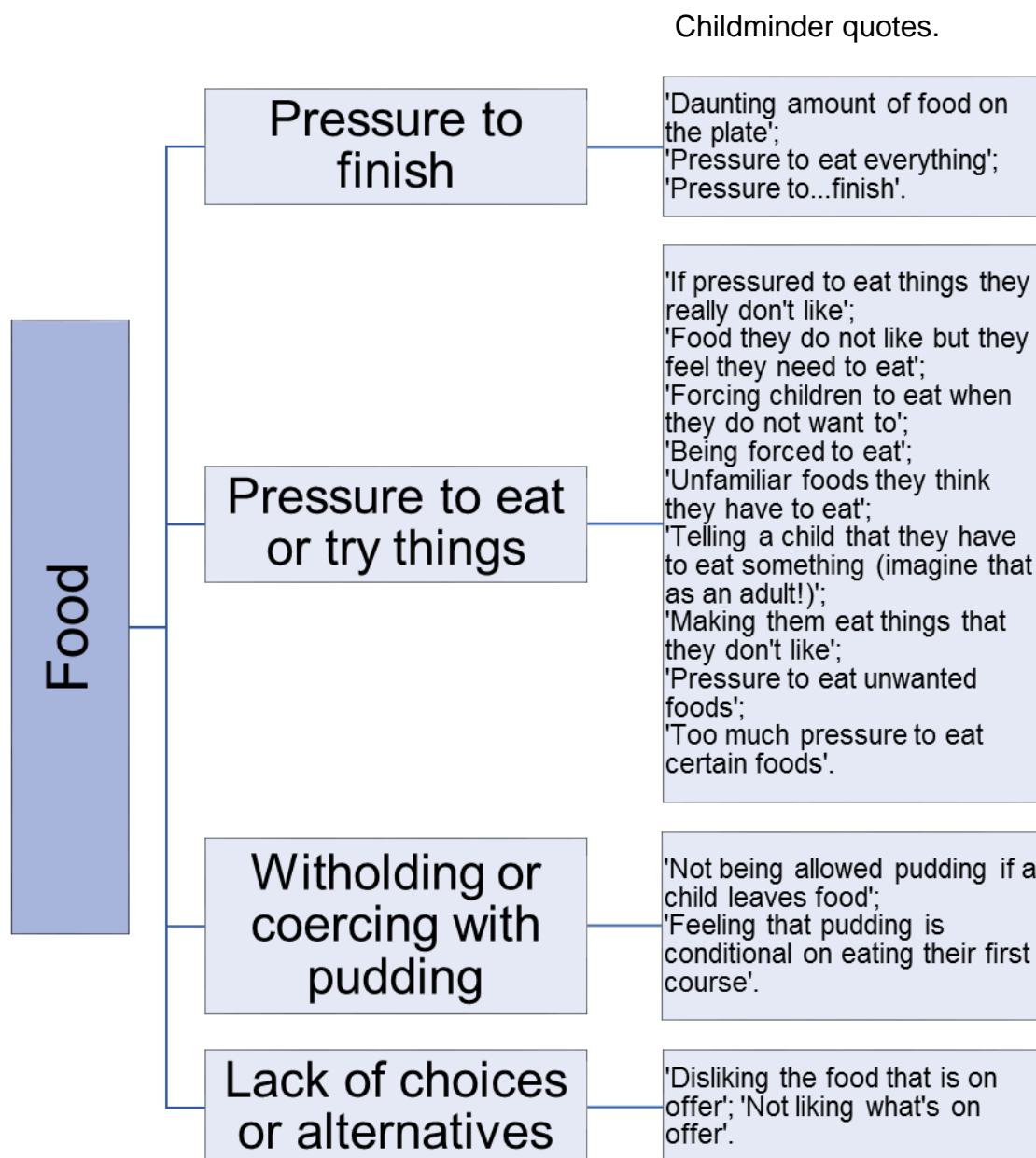
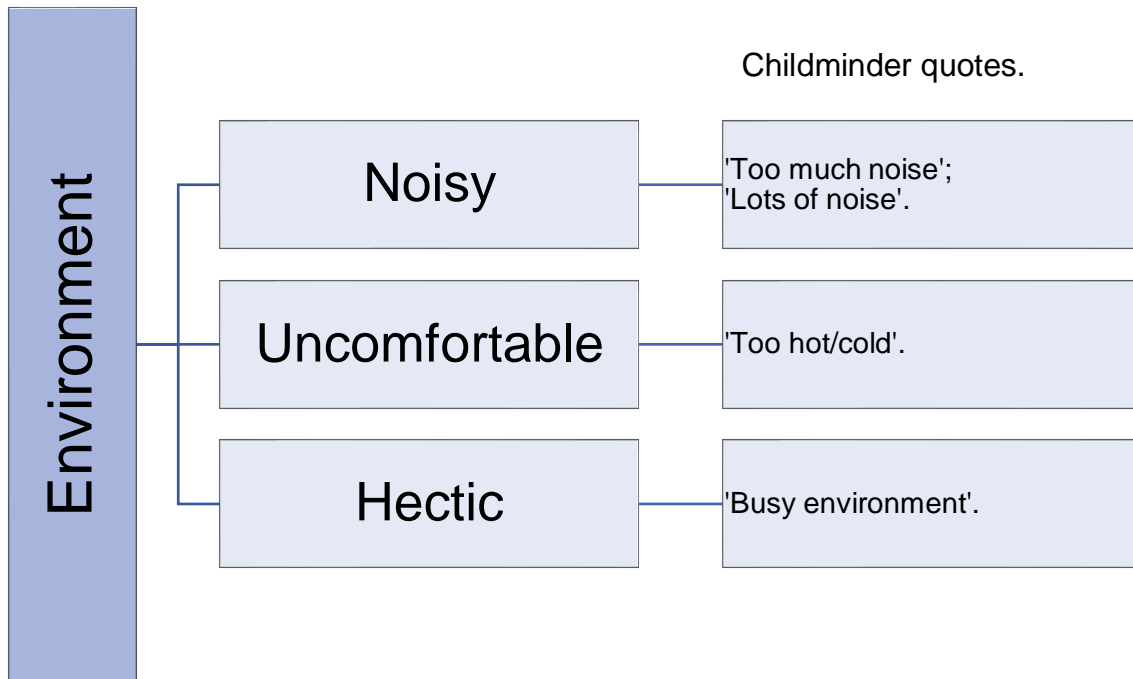


Figure 17

Environment factors that act as barriers to wellbeing during mealtimes,



Appendix 4: Child participant consent letter



14th October 2016

Dear [parent/carer name here],

As you are aware I am currently working towards a Sector Endorsed Foundation Degree in Early Years (SEFDEY). As part of a module called Reflective Practitioner, I must complete a research study with the aim of finding out more about a certain aspect of our provision. I have chosen to focus my study on food. I believe the food we serve is a real area of strength, but that it could be improved further to benefit more children in the group.

Over the course of the year I will gradually introduce a food project. This will involve:

- Regular 'Experimental Cookery' sessions (opportunities for children to play and experiment with food).
- Setting up a new allotment area on the premises and involving children in growing food.
- Offering more autonomy and choice during mealtimes.
- Focusing on creating a special atmosphere during mealtimes (flowers on the table etc.).

I want to find out to what extent introducing these new measures, and therefore increasing children's food autonomy, improves children's involvement and wellbeing during mealtimes. In other words, does giving children greater autonomy at mealtimes make them feel more confident with food or enjoy food more?

I would like to include all of the children in the group in this research. If you give permission for your child to participate in this research, I am likely to include the following data in my work:

- Group observations (these will be written and photographs may sometimes be included).
- A project book (this will track key events through the year and is likely to include photographs).
- Children's views (through transcripts of discussions, drawings or photographs taken by the children).

I may also include the following data:

- Practitioner/colleague views (through transcripts of discussions or questionnaires, to gain insights about what works in other settings or reflections on what we do here).
- Parent/carer views (through transcripts of discussions, focus groups or questionnaires).

I will ensure anonymity for your child by using code names instead of initials. Additionally, I will maintain confidentiality by only sharing the work with my SEFDEY tutors, my mentor and parents/carers of children in the group who request to see it. The only exception to this is if I

believe your child or any other person may be at risk of harm, in which case I must follow my safeguarding procedure (see policy 2.8).

If you are happy for me to include photographs of your child in the study they will be submitted as paper hardcopies. The rest of my work will be submitted online via Turnitin. Work will be stored on a password protected computer and as with all hardcopy observations, any paper copies will be stored in a locked filing cabinet.

I will keep you informed about how the study progresses and may invite you to participate if you wish to be involved. You can see the work at any time and when the study is complete I will report my findings to you in writing. You maintain the right to withdraw your child from the study at any point, for any reason, and you will not be penalised for doing so.

If you consent to your child participating in my research, please sign below and return to me. Do not hesitate to contact me if you would like to find out more.

I, the parent/carer of [child name here], give consent for [child name here] to be included in the study (please tick) yes / no

Parent name:.....

Parent signature:.....

Date signed:.....

Appendix 5: Practitioner participant consent letter



12th December 2016

Dear [practitioner/student name here],

As you are aware I am currently working towards a Sector Endorsed Foundation Degree in Early Years (SEFDEY). As part of a module called Reflective Practitioner, I must complete a research study with the aim of finding out more about a certain aspect of our provision. I have chosen to focus my study on food. I believe the food we serve is a real area of strength, but that it could be improved further to benefit more children in the group.

Over the course of the year I will gradually introduce a food project. This will involve:

- Regular 'Experimental Cookery' sessions (opportunities for children to play and experiment with food).
- Setting up a new allotment area on the premises and involving children in growing food.
- Offering children more autonomy and choice during mealtimes.
- Focusing on creating a special atmosphere during mealtimes (flowers on the table etc.).

I want to find out to what extent introducing these new measures, and therefore increasing children's food autonomy, improves children's involvement and wellbeing during mealtimes. In other words, does giving children greater control over food make them feel more confident with food or enjoy food more?

I would like to include all of the children in the group in this research. As a [practitioner/student] working with us long-term, you may end up being included in the study. If you give permission for me to include you in this research, I am likely to include the following data in my work:

- Group observations (these will be written and photographs may sometimes be included).
- A project book (this will track key events through the year and is likely to include photographs).
- Children's views (through transcripts of discussions, drawings or photographs taken by the children).

I may also include the following data:

- Practitioner/colleague views (through transcripts of discussions or questionnaires, to gain insights about what works in other settings or reflections on what we do here).
- Parent/carers views (through transcripts of discussions, focus groups or questionnaires).

I will ensure anonymity for you by using initials. Additionally, I will maintain confidentiality by only sharing the work with my SEFDEY tutors, my mentor and parents/carers of children in

the group who request to see it. The only exception to this is if I believe any person may be at risk of harm, in which case I must follow my safeguarding procedure (see policy 2.8).

If you are happy for me to include photographs of you in the study they will be submitted as paper hardcopies. The rest of my work will be submitted online via Turnitin. Work will be stored on a password protected computer and as with all hardcopy observations, any paper copies will be stored in a locked filing cabinet.

I will keep you informed about how the study progresses and may invite you to participate if you wish to be involved. You can see the work at any time and when the study is complete I will report my findings to you in writing. You maintain the right to withdraw from the study at any point, for any reason, and you will not be penalised for doing so.

If you consent to participating in my research, please sign below and return to me. Do not hesitate to contact me if you would like to find out more.

I give consent to be included in the study (please tick) yes / no

Full name:.....

Signature:.....

Date signed:.....

Appendix 6: Colleague evaluation

Evaluation for Colleague

1. What involvement have you had in this project?

a) Consultation prior to the research?

Millie had quite a few ideas for the project around food so I helped her decide what would be most relevant and achievable – it needed reigning in a bit because we had a new kitchen installed halfway through the project and a baby due a month after that.

b) Involvement in the action?

I lead on food provision so I had practical involvement with introducing the changes to food and mealtimes. I helped figure out the practicalities like how children would start serving their own lunches and how we could make it possible for them to set the table independently by moving the tableware to where they could access it.

c) Joint reflection with the student?

We reflected together a lot around the time we introduced all the changes. This was often to solve practical problems while we were getting used to all of the changes.

2. What has the impact of the project had on the following areas (where appropriate):

a) the setting

b) the children

It's been really fun and positive for them. We've seen a big change in them because of this.

c) the staff

I lead on food provision so it was a big change for me. Millie had to spend a few weeks convincing me about the self-service at mealtimes because I thought it would be chaotic and the same with the experimental cookery sessions. But looking back I think it's been one of the best things we've ever done for our childminding.

d) the parents

The parents have shown interest in what we've been up to with the food project this year and some of them have even been inspired to involve their children in setting the table and cooking after hearing about how much their children have enjoyed doing that here.

3. Will this project be presented to staff?

The project will be shared with future students and assistants who work with us. Millie is hoping to share it with the children's centre where she did the Experimental Cookery training. The childminders who filled out questionnaires want to hear about the findings so Millie will write a bit about the project for the local childminding network newsletter.

Signed

Appendix 7: Research proposal

Autonomy & Wellbeing During Mealtimes: A Research Proposal

Project objectives

The project aims to research and critically reflect upon mealtimes in the setting. It asks whether children's wellbeing could be better promoted by introducing changes to mealtimes designed to promote their sense of confidence, occasion and autonomy. The ultimate aim of the project is to change mealtime provision with the intention of supporting all children to feel happy and relaxed while eating.

Rationale

The interconnected nature of food, health and global issues has been a significant interest of mine for the past decade. It stems from my previous job working on the management team of an independent café which emphasised environmentally sound, ethically produced food. While supporting the café to gain national recognition and awards for its work around sustainability, ethics and health, I acquired a belief that many world-wide problems, including health issues, poverty and climate change, are inextricably linked to food production and food demand. I have struggled to come to terms with the fact that significant percentages of the population are either obese or malnourished, both internationally and here in the United Kingdom (UK) (World Health Organisation, 2016; World Food Programme, 2016; NHS Choices, 2015). I find it difficult to comprehend that both nationally and internationally, the free market means farmers experience poor pay and working conditions so that we can enjoy cheap food, while millions of tons of edible food is discarded in the UK every year (Baird, 2006; Waste and Resources Action Programme, 2016). This has shaped my work and ethos in early years, where I run a small setting which caters for around nine children each day. A strong element of the ethos in the setting is around nutrition and the provision of homemade, healthy food. Additionally, food ingredients for the setting are selected for their environmental and ethical standards. Mealtimes are an important part of each day, where food is shared by practitioners and children together, with the goal of creating a happy and relaxed atmosphere. Parents cite food as a significant appeal of the provision, often commenting that it has supported their child to develop healthier, more adventurous diets. Despite this, a small number of children can experience some

mealtimes as stressful. This project asks: *to what extent does increasing children's autonomy with food promote wellbeing during mealtimes?*

Literature

The World Food Programme (2016) reports that, 'Some 795 million people in the world do not have enough food to lead a healthy, active life,'. While the majority of these are in developing countries, the National Health Service (NHS) reports there to be an estimated three million malnourished people in the UK (World Food Programme, 2016; NHS Choices, 2015). Conversely, there were an estimated 600 million obese adults and a further 41 million overweight or obese children in the world in 2014 (World Health Organisation, 2016). In the UK, around a quarter of adults and almost 10 percent of children are obese (NHS Choices, 2016; NHS Choices, 2013). As obesity rates rise, so do global rates of noncommunicable diseases, such as diabetes, stroke and cardiovascular disease and these are predicted to place increasing strain on healthcare systems (WHO, 2016; NHS Choices 2011). Accordingly, diet plays a significant role in major global health issues. Experts increasingly suggest that getting food attitudes right during infancy and childhood sets the tone for a positive and healthy relationship with food for life (Holford & Colson, 2010; More, 2013).

Current advice on how to feed babies and children focuses on long-term health but it varies immensely. A method that is growing in popularity is 'baby-led weaning', which emphasises the child's autonomy and choice (Rapley & Murkett, 2008). Baby-led weaning and other similar childhood weaning plans are often based upon research from the 1920s and 1930s by Dr Clara Marie Davis, which found that when babies are given the opportunity to self-select from a wide range of healthy food options they tended to choose an overall balanced diet (Wilson, 2015). Unfortunately, widespread rhetoric about allowing children to choose what they eat has misinterpreted the research findings, which totally excluded all processed, sugary, addictive foods (*ibid*). Wilson (2015) concludes that children should be allowed to choose what they put in their mouths but adults must be responsible for ensuring that what is on offer is nutritious and varied. She argues that in this way children can learn life-long healthy eating habits (*ibid*). The research question relates to wellbeing, as many of the important things outlined thus far are beyond the scope of this project. Therefore, it will be necessary to read around how the physical and emotional environments impact

upon children's sense of wellbeing while they eat, making links between wellbeing and nutrition. As a starting point, I plan to find out about mealtimes in the early years settings of Reggio Emilia.

Methodology (paradigm, methods, ethical considerations and limitations)

It is felt that mealtime provision could be improved further by striving to help all children consistently feel happy, relaxed and confident while eating. The project will involve making changes, measuring the impact of the changes and drawing conclusions about the effectiveness of these changes. The project is classed as action research as it seeks to bring about improvements through change (Brown, 2016).

To determine starting points for the research, daily observations will be made of the children during mealtimes using wellbeing scales (Laevers, Moon & Declercq, 2012). After this preliminary data has been collected, a series of new measures will be introduced with the aim of improving wellbeing during mealtimes. These are likely to include: regular Experimental Cookery sessions; increased choice during mealtimes; setting up a new allotment to grow food; involving children in menu planning; improving the physical and emotional eating environments. After this, further wellbeing scale assessments will be completed to see whether there have been any notable changes. It will also be interesting to see whether children appear more willing to try new foods. The wellbeing scales have been selected as a data collection method which is both relevant and simple to complete about a whole group of children during mealtimes. The basic note-taking and number-scale form of assessment will allow my continued participation in the mealtime, which is important. A limitation of this method is that it is entirely subjective, yet as a practitioner I am inevitably immersed in the research context (Thomas, 2013; Walliman, 2014) and am well placed to form such judgements. The wellbeing scales will form the bulk of the data, but I will add to the validity and reliability of the research by using aspects of the Mosaic approach to gather a range of views, including children, parents/carers and other practitioners to triangulate.

In any research study, ethics must be at the forefront of all actions (Thomas, 2013). Researching with children requires careful consideration because children are 'disadvantaged by their widespread subordination to adults in social, cultural and legal structures' (Morrow, 2005 *cited in* Gallagher, 2009: 14). My research will involve very young children and a focus area that can cause children to experience a range of

emotions, therefore, the research will need to be conducted in a highly sensitive and caring manner. It is essential that the research causes no harm (Walker & Solvason, 2014); as food and diet are delicate issues, an important ethical consideration for this project will be ensuring that children and parents do not feel criticised. To support this, the project will only examine what happens with food in the setting and will not look at mealtime habits and diets in children's home environments. Additionally, informed consent for parents and informed assent for children are crucial, so that both can participate willingly and have an understanding of what the research project entails (Thomas, 2013). Parents will be given full, transparent details about the project and will be invited to allow their child to participate. The project will be explained to children in simple terms and their assent will be sought before each observation is conducted with a simple question such as, "I'd like to write about our mealtime again, is that okay?". Parents will be kept updated throughout the project and will have the opportunity to see the full project once it is completed, or sooner if they wish. A photographic journal will be kept for the children, to track the project and help them understand the findings. Finally, children have a right to participate in research and it is the intention of this project to view the children as researchers too (James & James, 2012). The Mosaic Approach has been selected as a tool that can help build a comprehensive picture, using meaningful insights that are offered by children.

As is the nature of small-scale qualitative research, a limitation of the findings is that they cannot be easily generalised (Thomas, 2013). However, this is not the purpose of the project; rather, its value will lie in how it brings about improvements within the specific context of this setting and the benefit it brings to this unique group of children (Lewis & McNaughton Nicholls, 2014). It is hoped that positive changes will occur as a result of the developments introduced in the project. However, it should be recognised that positive changes could occur naturally as children mature and develop in key areas like physical development and personal, social and emotional development. For example, children typically become more adventurous with food as they develop and overcome 'neo-phobia', or fear of new foods, with age (Early Education, 2012; Wilson, 2015).

Finally, having considered the research design, ethical considerations and possible limitations of the project, it is hoped that the research process will be an empowering, rewarding and enjoyable experience for all who are involved.

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