# First-time fathers' experiences of well-baby visits with and without the Newborn Behavioral Observation (NBO):

A qualitative study utilizing SWOT-methodology in a comparative evaluation of well-baby visits with a low-risk sample

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First time fathers' experiences of well-baby visits with and without the Newborn Behavioral Observation (NBO): A qualitative study utilizing SWOT-methodology in a comparative evaluation with a non-risk sample
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## Sammendrag

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Tittel: Førstegangsfedres erfaringer av hjemmebesøk med og uten Newborn Behavioral Observation

(NBO)

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Bakgrunn: Hjemmebesøket fra helsestasjonen er en del av kommunens helsefremmende tiltak og finner sted omtrent 1-2 uker etter fødselen. Denne studien er en del av et større forskningsprosjekt tilknyttet Spedbarnsnettverket v/ Regionssenter for Barn og Unges Psykiske helse (RBUP) med 40 førstegangsforeldre (20 fedre), der målet var å lære mer om førstegangsforeldres erfaringer med hjemmebesøket fra helsestasjonen og NBO er en metode som passer i denne settingen. Målet med den foreliggende studien er todelt: 1) Å utforske førstegangsfedres erfaringer med hjemmebesøk med NBO, sammenliknet med fedre som har fått ordinært hjemmebesøk. Særlig med fokus på å utforske hvordan kjernefokusområdene til NBO (å observere og forstå barnets individualitet og kommunikasjon gjennom atferd og uttrykk; styrke relasjonen mellom foreldre og barn; bygge en arbeidsallianse mellom helsesøster og foreldre) er erfart av fedre som har fått NBO veiledning sammenliknet med fedre som ikke har fått det.; 2) Å evaluere hjemmebesøket ved hjelp av SWOT metodikk, inkludert evaluering av hvorvidt NBO er en metode som passer i denne settingen basert på fedrenes opplevelser.

Metode: Et hensiktsmessig utvalg av 20 fedre med friske fullbårne barn ble rekruttert av helsesøster på hjemmebesøket, der 10 hadde fått ordinært hjemmebesøk, og 10 fikk hjemmebesøk med en helsesøster som var trent i Newborn Behavioral Observation (NBO) veiledning. Innen 2-3 uker i etterkant av besøket ble alle foreldrene individuelt intervjuet om sin opplevelse av besøket. Denne studien er basert på intervjuer av fedrene. Semi-strukturerte intervjuer basert på SWOT metodikk (Styrker / svakheter / muligheter / begrensinger) ble implementert, etterfulgt av en template analyse av det transkriberte materialet som innehold a priori teoretiske kategorier basert på studiens teoretiske rammeverk (Foreldres mestringsfølelse / Foreldre-barn tilknytning / Arbeidsallianse), i tillegg til det prosedurale innholdet i NBO, som ble utnyttet som underkategorier for koding av spedbarns kommunikasjon. Alle intervjuene, samt følgende bearbeiding av disse og videre analyser gjennomført av forfatteren.

**Funn:** Studiens funn gir støtte til at Newborn Behavioral Observation metoden kan passe godt inn i hjemmebesøket fra helsestasjonen, men at det som bidrar mest til fedrenes integrering av veiledningen er oppfattet arbeidsallianse, og at kvaliteten på arbeidsalliansen var av størst betydning for om fedre i begge grupper erfarte besøket som positivt.

Nøkkelord: Newborn Behavioral Observation (NBO), tidlig intervensjon, spedbarns atferd, farspedbarn relasjon, terapeutisk arbeidsallianse, template analyse, SWOT

## **Abstract**

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Title: First time fathers' experiences with well-baby visits with and without Newborn Behavioral

Observation (NBO)

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Background: The well-baby visit from the local well-baby clinic is a part of the municipal health promoting effort, and takes place approximately 1-2 weeks after birth. This study is part of a larger research project with a total of 40 first time parents (20 fathers), administered by the National Center for Infant Mental Health (Nasjonalt Spedbarnsnettverk) – at the Center for Child and Adolescent Mental Health, Eastern and Southern Norway (from now on referred to as RBUP). The aim is to explore how first-time parents experience the well-baby visit, and if the NBO is a method well suited for this purpose. The purpose of the current study was two-folded: 1) Investigating first-time fathers experiences with home visits from the well-baby clinic using NBO, compared to fathers who receive ordinary well-baby visits. More specifically, an exploration how the main focus areas of the NBO method (observing and understanding infant individuality and communication through its behavior and expressions; strengthen the parent-infant relationship; build a nurse-parent working alliance) are experienced by fathers receiving NBO compared to the experiences of fathers in the "control" group; 2) to evaluate the well-baby visit utilizing SWOT methodology, including evaluation of whether the NBO is a well suited method for use at well-baby visits in Norway based on this sample's experiences.

Methods: Purposive sampling of 20 first time fathers with healthy on-term infants were recruited by the well-baby nurse at the visit (10 ordinary, 10 receiving NBO), and interviewed within two-three weeks after the visit. The aims of the study were targeted mutually through implementation of semi-structured and open-ended interviews based on SWOT-methodology (strength/weaknesses/opportunities/threats), followed by template analysis of the transcribed material with pre developed theoretical coding categories drawn from the theoretical framework of the study (parental self-efficacy; parent-to-infant attachment; nurse-parent working alliance), and contents of the NBO (18 procedural items and infant states of consciousness) that were utilized as coding subcategories for infant communication. All of the interviews and following transcription and coding process were conducted by the author.

#### **Findings:**

**Conclusion:** The findings in this study suggest that the Newborn Behavioral Observation method is well suited in the setting of well-baby visits, but that the main contributor to the fathers' perceptibility of the contents of the NBO still is perceived nurse-parent working alliance, in which quality were the most essential in all the fathers' experience of the visit as positive.

Keywords: Newborn Behavioral Observation (NBO), early intervention, infant development, infant behavior, father-child relationship, parent-clinician relationship, template analysis, SWOT

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First and foremost, I would like to thank all of the contributing fathers, who so willingly gave of their

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Christina Færden Stenvaag

Oslo, May 2018

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## Reflexive preface

All research can be regarded as a joint product of the participants, the researcher, and their relationship: It is co-constituted (Finlay, 2002). As a way of ensuring the integrity and trustworthiness of the current study, it is important to find ways to analyze how these subjective and intersubjective elements influence the current research. Reflexivity is the term used for such explicit considerations (Yardley, 2008). It can be defined as thoughtful, conscious self-awareness, and involves continual evaluation of subjective responses, intersubjective dynamics and the research process itself (Finlay, 2002). Throughout my studies, I have been interested in the parent-infant/toddler relationship, specifically with regards to attachment development. Additionally, I have worked with parental guidance and support, as well as observation and assessment of care taking abilities at residential family institutions in the municipal child protective service system. Not only has this interest led me to choose this field of research, but I realize that it possibly makes me sensitive to certain themes in the data material, perhaps making me overlook other topics of relevance to the participants or misinterpret their meaning. When introduced to the Newborn Behavioral Observations system, it was done in a manner of genuine excitement and belief of the method's positive impact, which certainly caught my interest and contributed to the choice of this study. As truly pro almost any early preventive intervention aimed at enhancing the quality of parent-child relationships, I probably have a hard time acknowledging negative aspects of the method as well.

In order to make both myself and the reader aware of my own impact upon the material, I intentionally refer to myself with pronouns such as "I" and "me" in the sections of reflexive consideration throughout the thesis. An analytic memo, although simple in its form, was kept for reflexive notes and ideas through the latter part of the process, and post reflections concerning reflexivity are implemented in the final part of this report.

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## 1 Introduction

The well-baby visit from the local well-baby clinic is a part of the municipal health promoting effort, and takes place approximately 1-2 weeks after birth (Helsedirektoratet, 2014). Public health nurses have offered universal well-baby visits to parents of newborn infants in the Nordic countries for decades, in contrast to other high-income countries. Still, there has not been done much research on the well-baby visit as a health promoting means for first time parents in Norwegian non-risk populations (Hjälmhult, 2009), and there is not enough knowledge concerning the different approaches used during well-baby visits. Over the last decades the length of stay at the maternity ward after giving birth has decreased in Norway (Folkehelseinstituttet, 2018). Clinicians warn against the risk of more mothers experiencing postpartum difficulties, such as symptoms of depression or lactation related stress, without the adequate care and support in this early and vulnerable phase, and calls for higher quality in the low-threshold services in the municipalities in order to better attend to new families (Eberhard-Gran & Wang, 27.02.2018; statements given as part of an interview with Dagsavisen). Early and individually adapted home visits are regarded as an intervention of high preventive importance in order to reduce parental stress, insecurities and low self-efficacy (Slinning & Sandtrø, 2016), that if long term may have adverse consequences to both parents and children (Stern, 2006). It is often the mothers that receive the most attention in this vulnerable period, while the fathers unwittingly are marginalized (Nugent, Keefer, Minear, Johnson, & Blanchard, 2007). However, the adjustment to fatherhood also comes with its own unique set of challenges and altered role definitions, and new fathers too report a need for support and guidance in the postpartum period (Skjøthaug, 2016). Higher father involvement in infancy is prospectively associated with children's healthier behavioral, emotional, social and cognitive outcomes (Lamb, 2010; Sarkadi, Kristiansson, Oberklaid, & Bremberg, 2008), as well as potentially having a buffering effect on mothers' experienced stress and depressive symptoms (Aagaard, Uhrenfeldt, Ludvigsen, & Fegran, 2015; Goodman, Lusby, Thompson, Newport, & Stowe, 2014). It has been argued that the shifting trends in postpartum care for mothers demand more of fathers' caretaking abilities (Eberhard-Gran, Nordhagen, Heiberg, Bergsjø, & Eskild, 2003), and preventive means aimed at promoting father involvement and caretaking in this early phase should therefore receive great attention.

This study aims at investigating how well-baby visits are experienced by fathers, and more specifically how the use of an infant focused and relationship centered observation tool – the Newborn Behavioral Observations (NBO) System – is experienced compared to ordinary well-baby visits. The use of NBO have shown promising results with regards to better quality of care related to facilitating optimal mother-infant social interaction (McManus & Nugent, 2014; Nugent, Bartlett, Von Ende, & Valim, 2017). However, the scientific literature concerning the effect of NBO on fathers' early relationship with their newborns is sparse, and to the author's understanding non-existent in

Scandinavia. Reviews on literature concerning factors and interventions that influence father-infant bonding, concludes with an immediate need to perform studies on specific interventions aimed at the promotion of father infant-bonding (Scism & Cobb, 2017). Nugent (2013) emphasize that the postpartum period is an extremely sensitive stage in the transition to parenthood and as such may be "the intervention 'touchpoint' *par excellence*" (p. 173) for professionals who are dedicated to give children and their families the best start in life.

### 1.1 Scientific background

Presented in this section is a review of relevant research in the field of NBO and early interventions. International databases (PsycINFO, Embase, Cochrane DSR, MEDLINE, ERIC, and MIDIRS) were used in the search, which was limited from 1985 to present. Relevant research was also drawn from *Ab inito*, the on-line publications of the Brazelton Institute. The focus in the current study is on first-time fathers from a non-risk population with healthy on-term infants. Hence, the sample is not directly comparable to the samples in some of the studies presented in this section which contains high-risk participants: young or single parent families, entailing drug related problems or mental issues. Because the amount of research on fathers is sparse in comparison to that of mothers, some of the following studies include only mothers.

Research on infant development beginning in the 1960's and 70's contributed to a new understanding of the infant, not as a "blank slate" continually occupying a state of either sleep or hunger, but rather as a social being that is predisposed to interact with its caregivers from the start (Nugent et al., 2007). Within hours after birth, newborn infants show an ability to imitate facial expressions (Meltzoff & Moore, 1977; Simpson, Murray, Paukner, & Ferrari, 2014). They also show a preference for visual stimuli similar to human faces (Johnson, Senju, & Tomalski, 2015; Morton & Johnson, 1991; Nelson & Ludemann, 1989), and are especially sensitive to high-pitched "child like" speech (Cooper & Aslin, 1990; Schachner & Hannon, 2011). This new understanding of infant capabilities fueled theory development in the field of infant development, and the infant were soon given a status as a subject. Its innate abilities and predispositions led several clinical researchers pointing to the importance of aspects of infant-caregiver interaction and the effect this interaction had on the quality of their relationship (i.e. the works of Bowlby, 1969, 1973, 1980; Brazelton & Nugent, 1987; Stern, 1985; Trevarthen, 1979). Today, a growing body of research suggests that the early parent-infant relationship and the parents' caretaking abilities play a significant role to the infant's brain development (Schore, 2001a), and affects social, emotional and cognitive development, even laying the foundations for lifelong physical health (Shonkoff, Boyce, & Mcewen, 2009).

#### 1.1.1 The role of fathers in infant development

The individual role of fathers to infant development is increasingly recognized (Lamb, 2010; Skjøthaug, 2016). Systematic reviews suggest a positive influence of father engagement on offspring social, behavioral and psychological outcomes (i.e.Sarkadi et al., 2008; review of 24 publications). Highly involved fathers have shown to contribute to a better cognitive development, an ability to regulate emotions adaptively, higher empathy skills in friendship relations (Radin, 1994), as well as higher scores on intelligence tests (Gottfried, Gottfried, & Bathurst, 1988). Fathers' sensitivity, even without elements of stimulation or play, has shown to be equally important in the development of attachment security as mothers' sensitive care giving (Lucassen et al., 2011).

Negative feelings with regards to parenting may be linked to the parents' difficulties in developing emotional bonding with their infants (Nyström & Öhrling, 2004). One study of 72 family triads found that high father perception of infant 3 days post-partum, was related to better infant development at 12 months (Hernandez-Martinez, Sans, & Fernandez-Ballart, 2011), suggesting that father neonatal perceptions of the infants' behavior and affective cues may alter the father's behavior towards his child, which influences their relationship and, consequently, his or her development. Later studies of fathers preoccupational thoughts and neonatal perceptions in relation to parent-infant interaction and infant development support this finding (Kim, Mayes, Feldman, Leckman, & Swain, 2013, n=28 fathers; Parfitt, Pike, & Ayers, 2014, n=42 family triads).

#### 1.1.2 The transition to fatherhood and perceived parental self-efficacy

The transition to fatherhood involves massive changes and demands of psychological preparations (Skjøthaug, 2016). Some studies of expectant fathers indicate that men also may be affected hormonally in this phase, although to a less degree than women (Edelstein et al., 2017; Storey, Walsh, Quinton, & Wynne-Edwards, 2000). Fathers too attach themselves emotionally to the unborn child (Habib & Lancaster, 2006), and form internal representations of it (Condon, Corkindale, Boyce, & Gamble, 2013; Vreeswijk, Maas, Rijk, & van Bakel, 2014). Research has consistently demonstrated that the birth of a child is often a stressful event and brings about more profound changes than any other developmental stage of the family life-cycle (Condon, Boyce, & Corkindale, 2004), and the postnatal experiences of the new life with a child has been termed by some as an 'emotional roller coaster' (Asenhed, Kilstam, Alehagen, & Baggens, 2014). In a review of 33 publications targeting parenthood experiences during a child's first year Nyström and Öhrling (2004) found that fathers' experienced the transition to fatherhood as overwhelming. Some of the emerging subthemes included feelings of hurtfulness when prevented from achieving closeness to the child, as well as it caused strain to live up to the new demands. However, other themes included feelings of confidence as a father, and of being the protector and provider of the family.

Some research suggests that first time fathers develop their infant care self-efficacy in a slower rate than mothers, and that the fathers' infant care self-efficacy scores were significantly related to their parenting satisfaction scores at 12 and 16 weeks postpartum (Hudson, Elek, & Fleck, 2001; n= 44 couples ). A finding supported by previous (Froman & Owen, 1989) and later studies (Fillo, Simpson, Rholes, & Kohn, 2015). The authors suggest that well-baby nurses should implement individualized interventions to support mothers and fathers in the transition to parenthood (Hudson et al., 2001).

In a study evaluating Finnish mothers' and fathers' parenting satisfaction and parental self-efficacy after childbirth (Salonen et al., 2009, n=1300 families) found that both mothers' and fathers' biggest self-reported challenges were related to their affective skills: The parents needed extensive support in interpreting and responding to infants' cues and behavior as well as their daily rhythm and sleep. In a concurrent study with the same sample, the authors found that fathers also experienced low self-efficacy related behavioral skills, including how to comfort the infant to sleep, how to take account of the infant's sates of consciousness and how to console a crying infant (Salonen, Kaunonen, Astedt-Kurki, Jarvenpaa, & Tarkka, 2008). Apart from this, both mothers' and fathers' in the study generally reported that they experienced parenting satisfaction and self-efficacy positively (Salonen et al., 2009). It should be noted though, that the parents still were in the maternity hospital, and had not yet cared for their infant independently. It may be that they overestimated their abilities in the protective hospital environment, as suggested by another study (Ferketich & Mercer, 1995; n=182), were both experienced and inexperienced fathers' scores on perceived paternal role abilities were reduced between measurement at the hospital and when repeated 1 month post-partum.

A newly published study on Norwegian infants' temperamental adaptability, persistence and regularity (Olafsen et al., 2018), showed that mothers and fathers of infants with irregular eating or sleeping patterns perceived higher amounts of parenting stress. The authors point to the importance of taking into account individual differences of infant temperament when implementing preventive measures with the aim of supporting the parent-infant relationship.

#### 1.1.3 Early interventions targeting the infant-parent relationship

In the introduction to a special edition of the Infant Mental Health Journal (Vol. 27,1) concerning home based interventions in high-risk families with infants, Daniel Stern (2006) argued that the included studies in the issue showed convincing results with regards to the effect of early home based interventions. An earlier meta-analysis concluded that short term interventions aimed at promoting parent sensitivity are the most effective (Bakermans-Kranenburg, van, & Juffer, 2003), whereas a review of interventions aimed at helping mothers transition into parenthood, showed that interventions directly targeting the mother-infant relationship are more effective than interventions providing more general advices (Mercer & Walker, 2006). It has been argued that the same is probably true with regards to the father-infant relationship (Slinning & Sandtrø, 2016).

It has been argued that the professional background of the clinician conducting home visits are of minor importance, and that the "positive effects" of such visits to a greater extent is due to the therapeutic relationship between the clinician and parent (Korfmacher, 2007; Slinning & Eberhard-Gran, 2010), which also may be termed *therapeutic alliance*. Some studies suggest that providing parents with information on their child's development and offering caregiving guidance in the context of relationship-centered care, might provide a greater effect on child health and development (Massey, Rising, & Ickovics, 2006; Nobile & Drotar, 2003). Following this, Salonen et al. (2009) found that general guidance and confirmation of mothers' parental skills by an empathic trained professional, in itself enhanced feelings of self-efficacy.

## 1.1.4 Previous research on the Newborn Behavioral Observation (NBO) method

Research targeting the effect of the Newborn Behavioral Observation on fathers' experiences and paternal-infant interactive quality has not been located. However, clinicians performing the NBO have reported positive experiences with participating fathers, both in hospital settings (Kasovac, accessed 03.04.2018; Paul et al., 2014), and during home visits (Slinning & Sandtrø, 2016). Others have advised NBO as an intervention to help fathers become involved with their new baby (Hawthorne & Savage-McGlynn, 2013). Research conducted with the Neonatal Behavioral Assessment Scale (NBAS; Brazelton & Nugent, 1973/2011) - the clinical diagnostic tool on which the NBO is founded on (Nugent et al., 2007) – has shown a positive effect on father-infant interaction (Beal, 1989), with significant differences in the quality, but not quantity of first-time fathers' interactions with their infants 1 month post-intervention compared to a control group who did not receive this intervention. Reviews of the effect of NBAS (featured as CliNBAS when used as an intervention; Slinning & Sandtrø, 2016) suggests that its uses may improve a caregivers responsiveness (Das Eiden & Reifman, 1996), increase parent-infant involvement (Worobey, 1985), and improve a caregiver's attitudes toward the infant and satisfaction in the parenting role (Britt & Myers, 1994). However, it has been argued that none of these three reviews used a systematic methodology, and selection bias may therefore have influenced their results (Bartram, Barlow, & Wolke, 2015). A newly published review targeting the effect of NBAS (13 RCT studies) and NBO (3 RCT studies) on mostly low-risk, firsttime caregivers and their infants in the USA, concluded that there is currently only low-quality evidence for the effectiveness of the NBAS and NBO in terms of improving parent-infant interaction in this population (Barlow, Herath, Bartram Torrance, Bennett, & Wei, 2018). The authors justify these conclusions by referring to small samples and potential researcher biases in the NBO studies. The term "low quality" indicates that further research is very likely to have an important impact on the confidence in the estimate of effect and is likely to change the estimate (Barlow et al., 2018). As so, the authors warrant more research on the NBO in particular, as the existing research is sparse.

Findings in a few small qualitative studies suggest that the NBO is associated with enhanced feelings of enjoyment when interacting with the infant, as well as improved general knowledge of the infant's competencies (Cheetham, 2011; Sanders & Buckner, 2006). Apart from a concurrent study on primiparous mothers' experience of the NBO (Bekken, 2017), to the authors knowledge, no studies have yet been conducted on the use of NBO at well-baby clinics in Scandinavia.

## 1.1.5 What is known about fathers' involvement in well-baby consultations?

Conducting home visits to new parents is one of the central clinical tasks of Norwegian well-baby clinics, serving as part of the municipal health promoting offer provided universally to all parents. The intention of the well-baby visit is to create an arena for contact in the parents own environment; to observe / examine the child; to talk about the birthing experience and postpartum period; breastfeeding and caretaking; to be receptive and adjust guidance according to the family's needs; and provide information of the clinics services etc. (Sosial og helsedirektoratet, 2003). The founding principle is that the well-baby clinics should deliver services that is founded in research (Glavin, 2007). However, research on well-baby visits in Norway and the rest of the Scandinavian countries is limited. A review provided by Hjälmhult (2009) concludes that well-baby nurses' visits in a home setting provided a better foundation for further relations with the family (as opposed to an appointment at the clinic), with mothers receiving visits reporting higher satisfaction with the nurses' counseling. Still, because national guidelines aims for the incorporation of family-centered focus in the postpartum public care (Helsedirektoratet, 2014), the author stresses the need to gain knowledge from different perspectives, hereby warranting research that includes fathers' thoughts and opinions about the well-baby visit (Hjälmhult, 2009).

There have been conducted some, although few, international studies on father involvement in the child health care in general, and the well-baby visit in particular. Garfield and Isacco (2006, a qualitative study n=32) found that fathers were overall satisfied with their experience of the child health care staff and system, reporting that the reasons for satisfaction include feeling as though their questions had been dealt with seriously and answered appropriately. However, both nurses and fathers report a variety of barriers to health care involvement, including conflicting work schedules, a lack of confidence in their parental role, and health care system barriers. This is supported by Sierau, Brand, and Jungmann (2012) who also found that the quality of the couple relationship represented the main mediating factor to parental involvement in home visiting (n=124, high-risk families). In samples from two cohorts of Swedish fathers, (Hildingsson, 2009, n=640) examined the fathers' satisfaction with postnatal hospital care with measurements two year apart. There were no differences with regards to satisfaction between the two cohorts. The fathers reported that lack of support from staff, not being included in infant care, lack of medical check-ups or breastfeeding advices for the mother, and visiting

hours (restricted time to spend with the infant and mother) were the main factors contributing to dissatisfaction. The author conclude that Swedish fathers are not yet being well integrated into postpartum care, but that *they want to be*, and that the future focus should be to create more family-centered care and make fathers feel included (Hildingsson, 2009).

In a Swedish study with a sample of 499 well-baby nurses (Massoudi, Wickberg, & Hwang, 2011), the authors investigated how the nurses perceived working with fathers, and to what extent they offered support to, and included fathers in clinical encounters. The results showed that almost all of the nurses found working with fathers positive, but that many of them had an ambivalent attitude towards fathers' caring capacity when compared to that of mothers, and that the fathers received less support. The authors conclude that methods need to be developed to involve both parents in child health care. Panter-Brick et al. (2014) support this conclusion in their review, and warrants a "gamechange" in the field of parenting interventions in order to better include fathers.

#### 1.2 The Newborn Behavioral Observations (NBO) System

The development of the Newborn Behavioral Observations system (from now on referred to as NBO; Nugent et al., 2007) was inspired by the clinical experiences of working with the Neonatal Behavior Assessment Scale (NBAS) – a highly renowned method for assessment of newborn neurologic development and behavior (Brazelton & Nugent, 1973/2011). Being highly comprehensive and structured, the NBAS is primarily used in research and medical examinations of infants. However, its uses contributed to a greater understanding and appreciation of the richness and complexity of the newborn behavioral repertoire (Nugent, 2013, 2015), and also provided clinicians with a wider understanding of how the major developmental transitions in these early months, both for infants and parents, represent a unique opportunity for preventive intervention (Brazelton, 2009; Brazelton & Sparrow, 2005). The NBO includes some of the procedural items of the NBAS, but while the NBAS is used as a diagnostic tool, the NBO is designed to enable clinicians to share observations of infants with the parents and to make an immediate connection with them, by focusing on the infants' competencies and resources. Thus, the NBO is more of a relationship-building instrument that can be used to sensitize parents to the capacity and the individuality of their newborn child, as well as to foster the relationship between parents and infants (Nugent et al., 2007).

The NBO (Nugent et al., 2007) can be used to guide / converse with parents and their newborn infants up to three months of age. It is primarily guided by the principle that the quality of early experiences drives brain development and functional outcomes, and can be used to support parents at a time when the very bases for parental functioning are being established (Brazelton & Sparrow, 2005; Nugent, 2015). The NBO is family-centered, not pathology-centered (Nugent et al., 2007): It focuses

on the healthy infant and is not a diagnostic tool utilized to reveal abnormalities. It may be described as a strength-based, or *recourse oriented* intervention comprised of three elements:

- 1) To observe what the infant is communicating through its behavior and expressions
- 2) To strengthen the parent-infant relationship
- 3) To build an alliance between the parent(s) and the practitioner

The goal of the NBO is to take advantage of the open window of opportunity in this early phase of parenthood, to build an alliance with the parents and promote their intuitive parenting through the invitation 'let us together observe what your baby is telling us' (Nugent, 2015; Slinning & Sandtrø, 2016). As so, the NBO is not just an assessment, or a simple demonstration of the infant's capacities, but rather 'it aims to capture the uniqueness of the infant with the goal of fostering the bond between parent and infant' (Nugent et al., 2007).

The NBO is *context sensitive*. The method was designed to be flexible and easy to use so that integrates easily into the care of newborn families, whether it be in a home setting, at well-baby clinics or at the hospital (Nugent et al., 2007). The NBO is highly adaptable to the individual needs of the family, the clinical goals of the practitioner, and the infant's current behavioral state.

#### 1.2.1 Two clinical windows

The method is comprised of 18 behavioral observations of the infant where the parents play an active role not only in the observations, but also in the identification of appropriate caregiving strategies (Nugent et al., 2007). Siblings, grandparents, or other significant caregivers of the parents' choice are also welcome to participate. The observations are structured by two clinical windows:

- I. The infants' state of consciousness
  - 1) Deep (non-REM) sleep. Regular breathing, no motor activity
  - 2) Light (REM) sleep. Irregular respirations, more modulated motor activity, facial expressions and sounds
  - 3) Drowsy or semi-alert. Eyes half-open and 'glazed'
  - 4) Awake. Calm and alert, with minimal motor activity
  - 5) Awake. Unfocused, irregular breathing, considerable motor activity and perhaps fussing
  - 6) Crying
- II. And the degree to which these states are organized and integrated through the process of the infant's Autonomic, Motor, Organization of states, and Responsivity system, which are summarized by the acronym "AMOR" (the foundations of this system will be presented in more detail as part of the theoretical framework below).

Knowledge of the behavioral states and the AMOR system provides the clinician and the parents with a frame that enables them to organize their own observations of the infant, and learn to read the infant's behavioral cues (Nugent et al., 2007). Figuratively speaking, the clinician wears 'NBO-lenses', and the goal is to make the parents understand that they can use the same lens when interacting with their child (Slinning & Sandtrø, 2016).

#### 1.2.2 Administration of the NBO: "Let's meet the baby"

The duration of the administration sequence of the NBO (Nugent et al., 2007) may vary. Its length and focus will be shaped not only by the infants' behavior and the needs of the parents, but also by the clinical goals of the session. It is always driven by the infant's current state, and the clinician may start the session with i.e. the soothability item if the infant is crying (state 6), or with the habituation items if the infant is asleep (state 1 or 2). The clinician aims at assessing the quality of each of the 18 items in the procedure in order to – together with the parents – understand more of the infants' individuality. The parents are invited to participate throughout the procedure, i.e. by calling the infant's name in order to observe if he or she orients towards their voice (item 11). The clinician begins the NBO with an introduction and an observation of the infant state with the parents, followed by the procedural items:

- 1) Habituation to light (sleep, state 1 and 2).
- 2) Habituation to sound: a rattle (sleep, state 1 and 2)
- 3) Muscle tone: legs and arms (awake, state 4 and 5)
- 4) Rooting reflex (state 4 and 5)
- 5) Sucking reflex (state 4 and 5)
- 6) Hand grasp (state 4 and 5)
- 7) Shoulder and neck tone: pull-to-sit (state 4 and 5)
- 8) Crawling response (state 4 and 5)
- 9) Response to face and voice (state 4 and 5)
- 10) Visual response: to face (state 4)
- 11) Orientation to voice (state 4)
- 12) Orientation to sound: a rattle (state 4)
- 13) Visual tracking: of a red ball (state 4)
- 14) Crying (state 6)
- 15) Soothability (state 5 and 6)

The last three of the items are 'global', which means that they represent a closing of the observation by formulating an overall impression of the infants' individuality based on the following:

- 16) The infant's regulation of states
- 17) The infant's response to stress

#### 18) The infant's level of activity

The items in the NBO were designed to capture the process by which the AMOR domains become integrated (Nugent et al., 2007): The autonomic domain is represented by observations of the infant's response to stress, such as the amount of startles and color changes. The motor domain is represented by observations of motor tone in the arms and legs, activity level, crawling response, and sucking and rooting reflexes. The organization of state domain is captured by observations of the infant's transition between states – its capacity for sleep protection through habituation, the amount of crying, how easy the infant is consoled, as well as his or her capacity for self-soothing. The responsivity domain is represented by the infant's response to visual and auditory stimulation, including the items related to social interaction. The NBO is thus designed to capture the process of the developmental tasks that newborn infants face through their first few months of life (Nugent et al., 2007), as elaborated upon in the theoretical foundations of this thesis presented next.

## 2 Theoretical Framework

### 2.1 Development in the newborn period

In the course of the first few months of life, the newborn infant has to learn how to live outside the womb, and it is a period of rapid developmental transition (Als, 1982). Before birth, the infant's physiology and behavior was regulated intrauterine, and the infant now face a series of hierarchically organized developmental tasks in the development towards self-regulation as he or she tries to adapt to his or her new extrauterine world (Nugent, 2015). A syntactic model of development (Als, 1982) focuses on the dynamic, continuous interplay of various subsystems within the newborn infant. The infant's developmental tasks, according to this model, progresses in a stage-like manner over the first 2 to 3 months of life, and include the infant's individual capacity to regulate 1) his or her physiological or autonomic system; 2) his or her motor behavior; 3) his or her organization of behavioral states; and finally, (4 his or her affective interactive behavior. Infant development and capacities are central concepts in the understanding and uses of the NBO. The developmental tasks that infants face this period are summarized by the AMOR acronym, which reflects the constituent components of a syntactive theory of development. This framework enables both clinicians and parents to interpret and attribute meaning to the behaviors and communication cues they observe in the context of the NBO (Nugent, 2015).

An infant has to be understood as developing in the relational context of its caregivers. He or she is not only influenced by its caregivers, but is itself an independent agent and co-player in a transactional developmental process that is ever changing (Sameroff, 2010). Research suggest that the same adult brain networks involved in emotional and social interactions are present in immature and

incomplete forms already in infancy (Schore, 2001a, 2001b). The early social interactions between an infant and its caregiver(s) entail central components of the infant's early developmental process, laying the foundation for basic trust, attachment and self regulatory abilities (Center on the Developing Child at Harvard University, 2010). In the following sections, the theoretical framework of the components in the developing relationship between the infant and its caregivers is presented.

#### 2.1.1 The competent newborn

Daniel Stern (1985) argued that infants already form birth regularly occupy a state of alert inactivity were they are physically calm but alert, and able to perceive the world around them: 'Alert inactivity provides the needed time "window" in which questions can be put to newborns and answers can be discerned from their ongoing activity' (p. 39). Good infant "answers" according to this view, are readily observable behavior stemming from voluntary muscle movement, such as head-turning, sucking, and looking (Stern, 1985). This state of alert inactivity, were the infant is capable of processing external stimuli such as faces, smells, and voices, contributes to an "emergent sense of self". The "self" concept according to Stern refers to a primary organizing experience of a sense of self-and-other. The emergent sense of self has as its starting place the infant's 'inferred subjective experience' (Stern, 1985, p. 26). Newborn infants experience sensations, perceptions, actions, cognitions and behavioral states in terms of the current intensities, shapes, temporal patterns, vitality affects, categorical affects and hedonic tones (Stern, 1985) It is in his or her interaction with the social world that the infant's ability to organize and integrate experiences slowly "emerges": Based on repeated compositions of certain experiences, the infant will gradually begin to relate the experienced elements to one another. This is how they are making sense of their world, by a form of 'emergent organization' of experiences (Stern, 1985, p. 67).

Stern (1985) describes four periods in a child's development up to about 17 months were the child's sense of self is formed. In each of these periods the infant finds new ways to organize its experience, and the next period completes the previous, at the same time as the previous continues to exist and develop. In this sense, Sterns model draws an image of development as an *expansion*, rather than a stage like process (Røed Hansen, 2010). Stern's theory of infants' development of a sense of self has been fundamental for the collective understanding of the competent infant.

#### Intersubjectivity

When two individuals share an experience, like that of a father and his child sharing eye contact, a moment arises of mutual participation in each other's intrapersonal world. Stern (1985, 2004) values these moments of "mental contact" between individuals: The ability to "read" other people's intentions, and feel with our body what the other person is feeling through an observation of their facial expressions, movements, posture, and the tone of their voice. He argues that our mental lives are created through these continual "present moments" of contact with other minds, and defines it as the

intersubjective room, or 'matrix' (p. 77). According to Stern, the intersubjective ability is a condition for humanity, reflecting the need to be understood (Stern, 2004). Trevarthen (1979) argues that newborn infants already entails a primitive form of intersubjectivity. The *primary intersubjective dialogue* comprises the early reciprocity between an infant and its caregiver, the moments of mutual attentiveness in direct face-to-face interaction. It takes the form of a "proto conversation" (as defined by Bateson, 1979), a primitive form of communication with mutual exchange of imitative gests in a "dance like" interplay where the infant and the adult take turns in imitating and being imitated. Trevarthen (Bråten & Trevarthen, 2007) argues that these early dyadic proto conversations are comparable to musicality, in the sense that they can be appraised by their "rhythm and quality", as a dance between the infant and its caregiver. The mutual mirroring and turn taking that is seen between adults engaged in a conversation, has its origins in these early imitative interactions (Bråten & Trevarthen, 2007; Trevarthen, 2005). The discovery of so called mirror neurons, or pre motoric neurons, has provided a neurologic foundation in the understanding of this early imitative ability and interpersonal synchrony (Ferrari & Gallese, 2007).

#### Vitality affects

The concept of vitality affects is essential to how infants perceive and experience the world. According to Stern (1985), this concept refer to different forms of vitality in the caregiving behavior, not readily defined as regular emotions or feelings, but better captured by dynamic kinetic terms such as "bursting", "fading away", "surging", "explosive", "tenderly" - different forms of expressions provoked by vital processes such as hunger, breath, falling in/out of sleep, the coming and going of thoughts and emotions, etc. Also termed state activation (Røed Hansen, 2010), the quality of these affects are inherent in all behavior, and are most certainly sensed by the infant, i.e. through how it is lifted up and handled. Stern (1985) argues that infants probably does not initially perceive and categorize acts, such as feeding, the same way as adults - an act of laying the infant in position for nursing, as opposed to i.e. an act of unfolding a diaper. Rather, Stern argues, the infant is more likely to perceive the act more directly and categorize it in the terms of the vitality affect it expresses, not the behavioral content. 'Like dance for the adult, the social world experienced by the infant is primarily one of vitality affects before it is a world of formal acts' (p. 57). The way the caregiver rocks and caress a crying infant transfers a rhythm and intensity that will determine if the infant gets more activated or calms down: The caregivers vitality affects contributes to a change in the infant's state, which in turn also leads to a change in the caregivers state (Røed Hansen, 2010). As so, Stern (1985) described vitality affects metaphorically as a melody or an "affect tone", referring to this mutual "rhythm" of affects between caregiver and infant. The quality of the vitality affects are viewed as an important part of the infant's development of an emergent sense of self. Because these affects are ever present, both intertwined in and in the absence of categorical feelings, they may be said to be the foundation of our sense of being alive (Røed Hansen, 2010).

#### 2.1.2 The affective dialogue between an infant and its caregiver

Adults adapts their communication with infants through the variation in affective intensity (Røed Hansen, 2010): Smiles, mimicry, gestures, and sounds that indicates positive engagement are exchanged, with lowering and heightening intensity in a wavelike motion. Usually, the adult adapts to the form of expressions that infants prefer, such as an "open" face, rhythmic movements, and a voice that is high-pitched and rhythmic, with stretched vocals and a lot of pronounced breath (Stern, 1971). Adults in general, and new parents in particular, entail this innate way of interacting with infants, also called *intuitive parenting behavior* (Papoušek & Papoušek, 1995). Similarly, infants use their affective language to communicate their internal state. The infant will show that his or her limit of intensity is reached by looking away, which indicates a need of regulation in the form of a pause, before the interplay can be resumed. Fussing and/or crying are similar signals that something needs to change, whether it be time to sleep, nurse or other discomforts (Røed Hansen, 2010).

The first weeks of an infant's life are characterized by rapid alterations between behavioral states (Møller-Pedersen & Hanssen-Bauer, 2016). The behavioral state of the infant is one of the two clinical windows guiding the clinician when conducting the NBO, and refers to the infant's different phases of sleep, alertness and cry, as well as the transitions between these. A primary form of affect communication is *affect regulation* – or state regulation (Røed Hansen, 2010). This type of communication is fundamental in the neonatal phase when the infant's capability of self-regulation of the states is very fragile and unstable. Through affect regulation the caregiver utilizes the vitality affects described above to regulate the infant's pattern of state activation. Ed Tronick (1989) describes how the infant depends on this dyadic regulation system with its caregivers because of its limited abilities to self-regulate. Even though the infant's competence in self-regulation quickly develops and changes through its first living years, this system will continue to form a fundamental base in its caregiving (Røed Hansen, 2010). The infant's emotional experiences are regulated through what Tronick (1989) claims to be self-initiated and other-initiated regulatory behavior. The infant is dependent on other-initiated regulation in the neonatal phase, when its own ability to self-initiated regulation is limited. Stern (1985) also values this perspective when he refer to the caregiver as 'the self-regulating other' (p. 102). There is however, great individual variation among infants with regards to their ability to self-regulate. Innate predispositions, such as temperamental factors (Olafsen et al., 2018) or hyper sensitivity relating to prematurity, dysmaturity or other unfavorable conditions in the prenatal environment, often lead to regulatory challenges (Hans & Jeremy, 2001). Other infants show greater robustness by protecting their sleep with more ease, and maintain a calm and alert state for longer periods through an ability to stabilize motor activity and ignore irrelevant stimuli. A major focus area through the observations in the NBO method is the unveiling of the individual characteristics in an infant's ability to self-initiate state-regulation (Nugent et al., 2007). When new parents are made aware and attentive to their newborn infant's individual self-regulating competencies, the hopes are that they with greater ease and assertiveness employs other-initiated regulation strategies that is more finely attuned to the individual needs of the infant.

Affect synchronization refers to the sensitivity and mutuality in the interplay between infant and caregiver (Røed Hansen, 2010), as exemplified in the face-to-face contact illustrated in the introductory part of this section. Through the rhythmic coordination of the vocal and imitative dialogue (proto conversations: ref. Bateson, 1979 above) the infant experiences that he or she "controls" both their own and others interactional start, stop and pause (Jaffe, Beatrice, Stanley, Crown, & Jasnow, 2001). Affective expressions are central in the communication of our inner thoughts and feelings, hence are forms of affective communication at the heart of intersubjectivity (Røed Hansen, 2010). Following this, primary forms of intersubjectivity may be characterized as the immediate sense of unity and affective synchronizing as it occurs in the mutual emotional exchange (Trevarthen, 1998). Proper and attuned affect communication also forms the base mechanism in the sensitive caregiving associated with the development of secure attachment between an infant and its caregiver (Stern, 1985), as presented next.

#### 2.1.3 Attachment development in the early infant-parent relationship

Bowlby (1969) proposed that the strong emotional bond that ties a child to its main caregiver stems from a biologically based desire for proximity, which has evolved through natural selection. It forms a *behavioral system* of attachment behaviors, which sole purpose is to elicit increasing proximity and protection from the caregiver and ensure the infant's survival. Attachment behaviors, depending on the child's age, may include crying/fussing, smiling/vocalizing, or approaching/following – all entailing the common goal of alerting the caregiver's attention and increase proximity. Psychologically, attachment can be described as a *stress reducing* mechanism (Schore, 2001b), were the goal is to avoid or reduce experienced stress, through attentional reassurance or comforting from the caregiver. As so, the attachment system has a two-way function in that the attachment behaviors of the infant alerts the attachment system in its caregiver and elicits appropriate caregiving behaviors. The child constructs mental representations, or *internal working models* (Bowlby, 1969, 1973) of attachment relationships, based on its experience of the caregivers availability and responsivity. These working models develops – as the child matures – to include broader representations of the self, the attachment figure(s), interpretations of relational experiences, as well as "rules" of conduct in interpersonal relationships (Bowlby, 1969, 1973; Thompson, 2008).

#### The "first phase" of infant attachment development

According to Bowlby (1969), the attachment process develops through four phases, three occurring during the first year of life, and the fourth beginning sometime around the child's third birthday. The *first phase* lasts from birth until about 8-12 weeks of age, although potentially much longer if the caregiving conditions are unfavorable (Bowlby, 1969). From birth, the infant's internal working

models are present, but primitive: The attachment behaviors are not goal directed, but probably limited to internal "on-again, off-again" experiences associated with the actual activation and termination of individual behaviors, such as crying (Marvin & Britner, 2008). In this sense, the infant's attachment behavior cannot be fully understood except as taking place in the context of the complementary behavior, and changes in behavior, of his or her caregiver(s). However, over the course of the first weeks of life these patterns of infant-caregiver interactions are repeated frequently, and if the caregiver's responses and initiations are well-attuned to the infant's behavioral state, then *stable* patterns of interactions are established (Bowlby, 1969). As proposed by Stern (1985), the infant will in this context establish its own behavioral and auto regulatory rhythms, so that stable internal and dyadic rhythms are becoming established at the same time. These reciprocal patterns of parent-infant behavior will, if attuned, minimize the frequency and intensity of aversive attachment behaviors such as crying, and more readily elicit other attachment behaviors such as smiling and visual orientation (Marvin & Britner, 2008).

#### Establishing infant-to-father attachment

Even though attachment theory mainly is focused on the infant-*mother* relationship, most attachment scholars today considers attachment processes to be involved in all emotionally close child-adult relationships (Belsky & Fearon, 2008). In most two-parent families, it is natural to assume that the infant will form a close attachment to the father, and vice versa. Smith (2010) sheds light on how differences in the caretaking tasks in families contribute to an *attachment hierarchy*. The infant seem to have a small "network" of attachment figures forming a *primary* attachment to its main caretaker, and *secondary* attachments to other caretakers. This notion is supported by findings in cross-cultural studies (Van Ijzendoorn & Sagi-Schwartz, 2008). Studies have pointed to the importance of establishing stable and secure infant-father attachment relationships (Lucassen et al., 2011). Involving the father on equal terms as the mother in the routine caregiving tasks (also during the night) provide the infant with the interactional experiences it needs to establish and maintain trust, safety feelings and attachment to the father (Lamb, 2002; Skjøthaug, 2016).

#### Father-to-infant attachment – the role of parental preoccupation

The concept of "primary maternal preoccupation" was developed by Winnicott (1956/1975), and refer to the intense mental focus and behaviors directed towards the infant and its psychological and physical needs in the postpartum period. Immediately after a child's birth and the first few months after, parents are highly drawn to their infant's vocalizations and physical attributes (Kim et al., 2013), and it has been argued that fathers too experience this "preoccupation", albeit less intensely (Leckman et al., 1999). Studies have shown that such preoccupation may reflect an important stage for mothers and fathers to create long-term emotional ties with their infants (Feldman, Weller, Leckman, Kuint, & Eidelman, 1999; Leckman et al., 2004; Leckman & Mayes, 1999), tapping into two domains also

fitting the attachment caregiving behavioral system (as defined by George & Solomon, 2008): The first domain relating to relationship building, including activations of thoughts and actions in response to infant cues, that drive emotional and physical proximity; the second domain involving preoccupation regarding the infant's physical well-being, anxious and intrusive thoughts, and harm avoidant behaviors (Leckman et al., 1999).

Condon and Corkindale (1998) developed a 19-item self-report questionnaire to assess the quality of the emotional bond or tie of affection experienced by mothers toward their infants. They found that the strength of the parent-to-infant attachment was indicated by the strength (and/or frequency) of the following four subjective experiences – which accounted for 40 % of the variance in attachment scores (Condon & Corkindale, 1998):

- 1) *Pleasure in proximity*. A desire for proximity, and feelings of enjoyment, affection and pride during times with the infant, as well as a desire to prolong time spent with the infant, sadness (rather than relief) at separation, joy at reunion, and pleasant and frequent preoccupation with the baby during separations.
- 2) *Tolerance*. This experience includes an absence of feelings of anger and hostility towards the baby, an absence of feeling the baby is being deliberately difficult, and feeling generally relaxed during interactions with the baby.
- 3) Acceptance. This constellation comprises a lack of resentment about the impact of the baby upon the parent's lifestyle, and not experiencing the baby as a burden.
- 4) *Competence*. A sense of competence, confidence and satisfaction of being the parent of the infant. Experiencing the infant as "own baby", and perceiving oneself to be patient in interactions with the infant.

The questionnaire yielded acceptable levels of internal consistency and test-retest reliability (Condon & Corkindale, 1998). In the absence of any similar method in the assessment of *father*-to-infant attachment, the current study utilizes the four concepts above as operationalized codes in a "parent-to-infant attachment" coding category, presented in the methods section below.

#### 2.2 The transition to fatherhood

Transition theory defines 'transition' as a passing from one life phase to another (Schumacher & Meleis, 1994). Stern (1995) proposed the concept of a *motherhood constellation*, referring to the psychic shift that occurs when a woman enters into the all-consuming role of motherhood, bringing on a new triadic focus made up by three players – her mother, herself and the new baby. Four themes are central to the constellation (Stern, 1995): The *life-growth* theme, or concern for the baby's development; the *primary relatedness* theme, referring to a mother's connection to her child as well as her beliefs about the child's connection to her; the *support matrix* theme, concerning the ability to

create, allow and regulate a network of supporting individuals; and the *identity reorganization* theme, the ability to shift focus and priority in order to meet the new demands of parenthood. It has been argued that new fathers to some extent develop a similar "fatherhood constellation" (Madsen, Lind, & Munck, 2007), and clinical experience of working with new fathers suggests that the same themes to some extent also are actualized by fathers (Slinning & Sandtrø, 2016).

Following the evolving process of a motherhood constellation and the support matrix theme, a natural part of the pregnancy and postpartum process is that the woman to a greater degree caters to forums with other women that usually entail no natural opening for male participation (Stern, 1995). Some men may experience this as exclusion, and that their role has been limited to someone who only conducts all the practical chores and preparations (Slinning & Eberhard-Gran, 2010). A healthy transition to parenthood has been conceptualized to include parenting self-efficacy and satisfaction as important aspects of mastery of the parenthood role (Hudson, Campbell-Grossman, Fleck, Elek, & Shipman, 2003).

#### 2.2.1 Parental self-efficacy

Self-efficacy pertains to personal judgments about one's ability to execute a future course of action (Bandura, 1997). It encompasses feelings of competence about one's ability to perform a role or task and is thought to influence the amount of effort and persistence individuals will exert in the face of obstacles. Bandura (1997) argues that self-efficacy is an important element in the adjustment to parenthood, with self-efficacy beliefs being a major base for parental practices. In order to employ parenting behaviors successfully, parents must both believe that it will produce the desired outcome as well as have confidence in performing the specific behavior (Salonen et al., 2009). Following this, parental self-efficacy (PSE) may be defined as 'beliefs or judgments a parent holds of their capabilities to organize and execute a set of tasks related to parenting a child' (de Montigny & Lacharité, 2005, p. 387). These tasks are related to parent-child interaction and reflect day-to-day tasks, in addition to interactive behaviors such as how to be sensitive to infant cues and needs, and how to respond to them in a growth-fostering way (Salonen et al., 2009). Other concepts used for similar purposes include parental "competence", "confidence", "sense of infant care skills", "perceived role attainment" and "self-esteem" (de Montigny & Lacharite, 2005; Jones & Prinz, 2005).

Salonen et al. (2008, 2009) proposes three domains of perceived parental self-efficacy which are utilized in the current study as sub themes in a "parental self-efficacy" coding category:

#### • Cognitive skills

Regarding <u>perceived general knowledge</u> about, nutritional recommendations, hygiene, clothing, day-rhythm/sleep, normal development, stimulation, safe environment, infant cues, ways to console, enough facts for decision making, where to get more help/support.

#### • Affective skills

Regarding <u>sensitivity to</u> recognizing hunger, to cry, to behavioral states, to other cues and behavior, to individual personality, to infant's response to stimulation, to sources of pleasure/cherishment.

#### • Behavioral skills

Regarding <u>how to execute</u> caregiving tasks, such as to nourish, to conduct basic care, to comfort to sleep, to take account of states of consciousness, to handle / care safely, to console, to cherish, to stimulate/support development, caring skills in general.

The *Touchpoints Approach* is a theoretical intervention model of predictable times when parents are vulnerable, and hence, available to the practitioners guidance (Brazelton & Sparrow, 2005). These "touchpoints" opens whenever a child regresses prior to a burst in development. Brazelton (2009) argues that each developmental "touchpoint" represents an opportunity to offer both a positive message about what the parent is doing well, and a detailed observation of the infant's behavior in order to provide anticipatory guidance' (p. 284). This framework forms the cornerstone the NBO. Following this, Nugent (2015) proposes that the major transition into parenthood in the early postpartum period represents an 'intervention touchpoint *par excellence*' (p. 2) for a skilled practitioner to affect change and enhance parental-self efficacy.

### 2.3 The skilled practitioner: Clinician-parent working alliance

We are neurobiological predisposed to respond to one another in just milliseconds (Schore, 2014). Non-verbal communication occurs through our facial expressions, bodily tensions and movements, uttered sounds and silence, through the words that we choose, and our tone and lingual rhythm. It is more or less the communication of vitality affects, and this type of communication activates our senses at a subconscious level and influences the way we relate to one another (Schibbye, 2009). Following this, Stern (2006) propose that 'The subject matter of therapeutic interest no longer resides within the patient–client's mind nor within the home visitor–therapist's mind but rather in the products of their interaction' (p. 3).

In order to adhere to the mandate of the well-baby clinic (Sosial og helsedirektoratet, 2003) and succeed in the task of providing parental support, it is important for the well-baby nurse to establish a relationship of mutual trust with the parents (Lindberg & Hvatum, 2016). Just as the rhythmic quality in the parent-infant communicative "dance", the nurse should be capable of adjusting or "attune"(Stern, 1985, 2004) herself to the individual states of the parents. Lindberg and Hvatum (2016) emphasize that the "melody" in the consultations may vary between a playful and light-hearted to a more profound or serious tone, and that it is important to adjust to the family's rhythm, not putting too much pressure on reaching a certain goal or pass on information. Hence, one of the challenges for

the well-baby nurse or midwife is to create a balance between the proper attunement to the parent's states – adjust, be open, engaged, and willing to listen – at the same time as providing necessary information (Lindberg & Hyatum, 2016).

#### 2.3.1 To keep your mind and others' minds in your own

The ability to *mentalize* entails to see ourselves from the outside and others from the inside. It is a capacity to perceive and interpret other peoples' behavior in terms of intentional mental states (needs, purposes, desires, feelings, beliefs, reasons etc.)(Fonagy & Allison, 2012). Mentalizing requires a degree of humbleness with regards to the knowledge about processes in our own minds – to see ourselves from the outside demands an ability to reflect upon ourselves from the inside (Lindberg & Hvatum, 2016). The ability to relate to one's own feelings, needs, impulses, and reflections regarding these, give others *the room to do the same* (Schibbye, 2009). This ability is vital in a consultation setting, such as a home visit, where the well-baby nurse represents a helper that meets parents in a vulnerable period (and possibly state) in their life.

The conceptualization of intersubjectivity, as described earlier (Trevarthen, 1979), may also be utilized in describing what may be termed as "good encounters" between adults: It concerns two subjects capable of attuning into each other and share experiences, not only verbally but also through non-verbal behavior (Lindberg & Hvatum, 2016). Following this, Shai and Fonagy (2014) presents the concept of *embodied mentalizing*. They argue for the differentiation between controlled (explicit, verbal and reflective) and implicit (automatic, unconscious and non-verbal) mentalizing. The term "embodied" implies these implicit, body-based interactive processes (Shai & Fonagy, 2014). Nugent et al. (2007) argues that the specific challenge for the NBO-trained nurse is to be able to develop her own capacity for embodied mentalizing, which means to be able to read the infant's communication cues, and respond thoughtfully in a reciprocal embodied way. Her specific challenge is to make it possible for the parents to recognize the infant's communications repertoire, so that they can learn to anticipate the infant's state of mind and meet its needs adaptively (Nugent, 2015).

## 2.3.2 Conceptualization of the working alliance and its constituent components

Bordin (1979) perceived working alliance as an integrated relationship, and clearly defined three constituent components that in combination define the quality and strength of all alliances: the agreement on goals, the assignment of tasks, and the development of bonds. Horvath and Greenberg (1989) summarizes the meaning of these terms: A strong working alliance is characterized by the nurse's and parent's mutually endorsing and valuing the *goals* (outcomes) that are the target of the intervention. *Tasks* refer to the counseling behaviors and cognitions that form the content of the consultation process. In a well-functioning relationship both persons must perceive these tasks as both relevant and effective, and each must accept the responsibility to perform these acts. The concept of

bonds concerns the complex network of positive personal attachments between the nurse and the parent(s) that includes issues such as mutual trust, acceptance, and confidence. In addition to these three concepts, Bordin (1979) emphasize that the goodness of fit of the respective personalities – the personal chemistry – also will influence the strength of the working alliance.

Horvath and Greenberg (1989) developed the Working Alliance Inventory (WAI), a widely used self-report questionnaire measuring the experienced quality of a working alliance. The WAI is based on Bordin's (1979) tripartite conceptualization of the alliance defined above. The current study utilizes the three concepts – task, bond and goal – as operationalized codes in a "nurse-parent working alliance" coding category, presented in the methods section below.

## 3 The Current Study

This study is part of a larger research project with a total of 40 first time parents (20 fathers), administered by the National Center for Infant Mental Health (Nasjonalt Spedbarnsnettverk) – at the Center for Child and Adolescent Mental Health, Eastern and Southern Norway (from now on referred to as RBUP). The aim is to explore how first-time parents experience the well-baby visit, and if the NBO is a method well suited for this purpose. The project is conducted in collaboration with two well-baby clinics in the greater Oslo area, and includes ordinary well-baby visits with nurses not trained in NBO, and visits with one nurse trained in NBO. Parental couples where recruited by the nurses during the visit, and interviewed one-on-one within two weeks after the well-baby visit.

The current study includes the interviews with the fathers. Semi-structured interviews contained open-ended questions developed in a SWOT-format, and the data were analyzed through template analysis. The study follows the COREQ (Consolidated criteria for reporting qualitative research) checklist (Tong, Sainsbury, & Craig, 2007; Appendix A). The translation of illustrative quotations from the interviews throughout the thesis was conducted by the author. Because these are illustrative quotations and not *the base for analyze*, further means were not implemented in order to ensure proper translation in line with the philosophical underpinnings of this study – all of the interviews were analyzed in their original language. The author conducted all of the interviews, as well as the proceeding transcription-, coding- and analyzing process.

## 3.1 Aims and objectives

The purpose of this study is two-folded: 1) to investigate first-time fathers experiences with home visits from the well-baby clinic using NBO, compared to fathers who receive ordinary home visits. More specifically, to explore how the main focus areas of the NBO method (observing infant communication through its behavior and expressions; strengthen the parent-infant relationship; build a

nurse-parent working alliance) are experienced by fathers in the NBO group compared to the control group; 2) to evaluate the well-baby visit utilizing SWOT methodology, including evaluation of whether the NBO is a well suited method for use at well-baby visits in Norway based on this sample's experiences. Following these aims the research questions guiding the current study are:

- I. How does first time fathers experience well-baby visits with the Newborn Behavioral Observation (NBO) compared to ordinary well-baby visits without NBO?
  - a. Are there differences with regards to perceived knowledge about their infant's competencies, feelings of parental self-efficacy, parent-to-infant bonding or nurse-parent working alliance?
- II. What are the primary internal strengths and weaknesses, and external opportunities and threats (SWOTs) to the well-baby visit practice as stated by the participating fathers?
  - a. Based on the fathers' stated SWOTs, to what degree is the Newborn Behavioral Observation well suited for use at the well-baby visit?

The research questions were targeted mutually through implementation of semi-structured and openended interviews based on SWOT-methodology (strength/weaknesses/opportunities/threats), followed by template analysis of the transcribed material with pre developed theoretical coding categories drawn from the theoretical framework presented above (parental self-efficacy; parent-to-infant attachment; nurse-parent working alliance), and contents of the NBO (18 procedural items and infant states of consciousness) that were utilized as coding subcategories for infant communication.

#### 3.1.1 Initial expectations to the findings

Because the NBO targets intuitive parenting capacities with regards to an understanding of the newborn's individual competencies, interviews with fathers whom have received the NBO should reflect a greater variation in the descriptions of their child (i.e. statements concerning the variability in behavioral states). Further on, because the NBO method is particularly relationship centered, and supports intuitive parenting skills by creating a dialogue around the newborns innate social and communicative competence, interviews with fathers whom have received the NBO should also contain more statements reflecting enjoyment and competence in interacting with the child (i.e. statements about the ability to understand what the child "wants" in various situations). A deeper understanding of a newborn baby's behavioral tendencies and communicative signals is also expected to lower first-time father insecurities, and hence enhance feelings of parental self-efficacy. Many factors may influence the working alliance between the nurse and the family, including personality and personal chemistry. Yet because NBO targets this relationship in particular, evaluations of the working alliance should at least be *as good* among fathers whom have received NBO compared to fathers with ordinary well-baby visits.

### 3.2 Epistemological stance

The philosophical underpinnings of this study belong in a realist tradition. Philosophic realism can generally be defined as 'the view that entities exist independently of being perceived, or independently of our theories about them' (Phillips, 1987, p. 205). A distinctive feature of various accounts of *critical realism* (as defined by Maxwell, 2012) is that – although adhering to the notion of a 'real world' – they deny the possibility of obtaining any "objective" or certain knowledge of this reality, and accept alternative valid accounts of any phenomenon (Maxwell, 2012). This means that any theory generated about a phenomenon, in some way or another refer to real features of the world (Fletcher, 2017), and that how we perceive facts, particularly in the social realm, depend partly upon our beliefs and expectations (Madill, Jordan, & Shirley, 2000). One could state that critical realists retain an ontological realism, while accepting a form of epistemological constructivism or relativism (Maxwell, 2012), in so far as they admit to an inherent subjectivity in the production of knowledge.

As part of a larger research project, the research design of this study was somewhat predeveloped: Including the number of participants, the topic of research, and the interview protocol. Hence, this is *not* a study that is purely developed from a critical realist stance (following the guidelines of i.e. Maxwell, 2012 or Fletcher, 2017). Still, it is argued that the choices made with regards to research methods in the current study draws inspiration from this philosophical stance, based on the definition presented in this section.

#### 3.3 Limitations

As a master thesis, this research endeavor has clear limitations with regards to scope and time available. Pursuing a qualitative design with as many as 20 respondents is time consuming, and certain means have been applied in order to make it feasible, which inevitably will have an effect on the findings and conclusions reached: Only one interview was conducted with the participants, without any follow up contact through a second interview or return of the transcripts for comments or corrections. As a template analysis, the template development did not follow the regular guidelines for template development (i.e. as presented in Brooks, McCluskey, Turley, & King, 2015). Instead, a predeveloped template was applied to the whole data-set, before reanalyzing the parts of the data not coded in the first phase. In addition, the sample composition and size has high homogeneity, which may also impact the nature of the findings and making them difficult to validate. These limitations will be elaborated upon in the methods- and discussions section.

### 3.4 Ethical considerations and necessary applications

The participating fathers were informed – both verbally and by their signature on a form of consent (Appendix B) – of the study's purpose and potential benefits; the interview procedure; their right to withdraw their participation; interviewer confidentiality; and how their privacy were to be safeguarded by ensuring full anonymity through the transcription process. Because the participants were interviewed at a vulnerable time in their life, a plan regarding risk management and action procedure in cases of severe concern for the participant's / child's health and wellbeing was also developed (Appendix C, p). A notification was sent to, and approved by, the Norwegian Data Protection for Research (Norsk Samfunnsvitenskapelig Datatjeneste - NSD) in March 2015 (Appendix D).

### 4 Methods

#### **4.1 SWOT**

As qualitative evaluation method, SWOT is often used at the start of or as part of a strategic planning exercise, particularly used in analyzing business ventures, but also applicable in other disciplinary areas (Helms & Nixon, 2010). The name SWOT is an acronym for Strength, Weaknesses, Opportunities and Threats, and the method covers both the internal reality and external preference of a product, event, system, person etc. In the current study it is utilized as a method to evaluate the wellbaby visit – as experienced by the fathers – by forming the base of the interview protocol, as well as structuring parts of the analysis and being directly linked to the research questions. As an interview, it is a semi-structured, with relatively open-ended questions regarding what the respondent considered to be the Strengths, Weaknesses, Opportunities and Threats of their experience with the well-baby visit. The attempt was to create an open reflection concerning the fathers' thoughts and experiences of the well-baby visit, without interruption from the interviewer; to minimize the influence of the interviewer's assumptions or preconceptions; as well as to reduce the risk of any pre-specified or determined answers. A SWOT-design gives the interview a certain structure, making it possible to structure the respondent's reflections along several dimensions (i.e. positive-negative, past-present etc.), theories and/or models (Helms & Nixon, 2010). This makes it adaptable to the philosophical underpinnings of this study, as well as to combine with a template analysis for analytical purposes. Below are illustrative examples of statements on the SWOTs. They are actual statements from different participants in the current study, and refer to information material that routinely is handed out at the well-baby visit:

Strength: "And then we got handed this folder containing information... papers and brochures. And I've read through those. A lot!"

Weakness: "She handed out <u>a ton</u> of papers and brochures... Can something be done about that?"

Opportunity: "Is there a webpage called 'helsesøster.no' or something. It would've been a lot easier to gather all the information online. You know, because your whole life is revolves around information acquisition through the internet..."

Threat: "It's a lot easier just to turn to google... instead of go looking through all those brochures"

As illustrated, Strengths and Weaknesses refer to the internal aspects of the visit as experienced by the participants. Opportunities and Threats are external factors, not necessarily inherent in the visit, but factors that should be exploited (opportunities), or could cause trouble and hence should be avoided (threats).

#### 4.2 Data collection

#### 4.2.1 Participants

20 first-time fathers were purposively selected and recruited continuously over a period of about 9 months by the nurses conducting the well-baby visits. The fathers were interviewed one-on-one within a three-week range after the visit. Ten participants received well-baby visits with NBO, and 10 received ordinary well-baby visits without NBO. They didn't receive any information with regards to the type of visit they got. All the fathers had healthy on term babies, although some experienced birth complications or post-birth neonatal infections that required short term hospital treatment. The nurses recruited the parents continuously if 1) the visit were conducted with both parents present, 2) the couple was comprised of a mother and a father, 3) they were married or cohabitants, and 4) both parents were orally proficient in either Norwegian, Swedish, Danish or English. Parental couples were excluded if 1) one or both parents had drug related problems, and/or 2) if there was a risk of violent behavior.

Following these inclusion / exclusion criteria, the study ended up with a homogenous sample: All of the fathers were ethnic Norwegian, with Norwegian as their mother tongue. All were resident of the greater Oslo area, most of them in their mid 30's, with the oldest being 45, and the youngest 28. There was little variance with regards to socio economic status – all of the respondents had completed at least three years of higher education, and were hired in permanent positions, except one who was a student completing additional education (videreutdanning). Half of the 20 fathers were married, and the other half cohabitant. The reason the sample didn't achieve greater heterogeneity might be because the cooperating well-baby clinics were situated in areas with great homogeneity in the population. Criteria for exclusion and inclusion might also have pushed the sample composition in this direction.

The limitations of this homogeneity will be implemented in the discussion below, regarding *validity* and *generalization* of the findings.

#### 4.2.2 The interview procedure

At the end of the well-baby visit, the nurse gave the parents a brief introduction to the study. If the parent agreed to participate, their contact info was provided to the interviewer via the head of research at RBUP, which made the interviewer blind to the type of visit the parent had received. The fathers were called up by phone by the interviewer and asked if they still wished to participate in the study. All agreed to participate except one, who stated that he found it too time consuming. None of the participants had any pre-acquaintance with the interviewer nor informed of the interviewer's background.

#### Setting

Because most of the fathers were back in their occupation after their two-week leave, many expressed a need to conduct the interview in a way that was adaptable to their working hours:

- 5 interviews were conducted by telephone (2 during lunch hours, 3 in the evening)
- 7 interviews were conducted at an office at RBUP (5 during lunch hours, 2 in the evening)
- 8 interviews were conducted as home visits (4 in the evening, 4 at daytime mother and child was present at 7 of these, although in an adjoining room).

An audio recorder where used to tape all of the interviews. The participants were informed of this in advance, and given the opportunity to raise objections. All gave their consent.

#### Duration

The participants were told in advance that the interview would last about  $1-1\frac{1}{2}$  hours. The three shortest interviews lasted 30 min. (home visit and telephone). The longest lasted 86 min (RBUP). All of the interviews lasted on average 50 minutes, but there was a difference between the two groups: The interviews of the *control group* lasted longer, on average 57 minutes, whereas the *NBO-group* lasted 49 minutes. In both groups, the interview conducted at RBUP had the longest duration, on average over 60 minutes, whereas interviews conducted on telephone or as a home visit varied between 30-60 minutes. Reasons behind these differences are difficult to obtain, but apart from personality differences and talkativeness of the participants, it should be noted that the interviews conducted at RBUP were the only ones that was completed in a controlled setting, without any arbitrary disturbances (i.e. in the form of cries from the baby, or other distractions).

#### Data saturation

The concept of "saturation" refers to the 'point at which no new information or themes are observed in the data' (Guest, Bunce, & Johnson, 2006, p. 59). Ideally, in order to aim for data saturation, the

sampling should continue until there is a high rate of duplication or recurrence of responses, entailing that nothing new is added to the understanding of the research topic. In the current study, the amounts of participants were given, and no possibilities for re sampling existed. However, waiting to reach saturation is necessarily not an option for most qualitative researchers, and a "yardstick" has been proposed by Guest et al. (2006) to estimate a point at which saturation is most likely to occur. The authors emphasize that sample sizes' estimate really depend on how the data will be used (methodology), the type of knowledge that is produced (epistemology), as well as the research aims of the study. The current study contains a homogenous sample on many levels: both with regards to socio-economic status; all being first-time fathers; and that the topic for interview is framed on the well-baby visit – the only difference is the approach used at the visit. Guest et al. (2006) argues that a purposive selection of about twelve participants in each group 'if one wishes to determine how two or more groups differ along a given dimension' (p. 76). Because of the homogeneity of the present sample it is deemed adequate with the existing 10 participants in each group, although perhaps not optimal.

#### The interview protocol

The interview protocol (Appendix 3) was initially developed by the manager of the research project. It was comprehensive and included a list of preparations for each interview; an introduction template; open-ended and explorative questions in a SWOT format; a set of two follow-up questions; summary questions and remarks; a crisis-management plan; a section for memo-writing after the interview; as well as registration of the date / location / duration / identification number of the interview.

The protocol was discussed in detail with the interviewer, and was open to revision based on any remarks from the interviewer. However, hardly any changes were made, except to exchange the word *threats* to *limitations*, being that "threat" is a negatively loaded word with higher intensity than 'limitation', which may sound odd in the setting it were to be used in this particular project. It was therefore agreed upon to mainly use 'limitations' when conducting the interviews. However, in order to conform to the terms used in the SWOT acronym, the word "threat" will be used in the written report. A test interview was also conducted, under direct supervision of the project manager, to ensure proper use of the protocol as well as to point out any errors.

The first part of the interview consisted of the open-ended and explorative questions with regards to what the father considered to be the strengths / weaknesses / opportunities / threats as illustrated in table 2 and 3.

Table 2: An outline of the open-ended question regarding Strengths in the interview guide

1) Tell me about what you experienced as the strengths regarding your well-baby visit?
(Open space for the interviewer to make notes)
(Probing questions) Tell me more about the elements you experienced as positive. What else? Additional strengths? What other strengths did you experience with the well-baby visit? How did the well-baby visit benefit you? In your experience, is there anything in particular that you regard as positive with the well-baby visit? Can you give me an example? Can you elaborate? Please, take your time.

The participants' experiences with regards to *weaknesses*, *opportunities* and *threats* (limitations) were inquired in the same manner. The interviewer probed the participant when necessary in an endeavor to encourage them to "empty" themselves of their thoughts, but without further exploring the topics presented. Only when the participants stated that they had nothing more to say, the interviewer moved on to the explorative stage, and began to ask follow-up questions. These questions were based on the notes taken in the open part of the interview (table 2).

Table 3: An outline of the explorative questions regarding *Strengths* in the interview protocol

(Only to be used in the exploration of strengths with the participants)

(Follow up questions the interviewer has in mind as the participant talks can be noted here, in order not to forget them. i.e. If the participant previously stated that he regarded it as strength "that the nurse could see him and his family at home, in their own environment", the interviewer may perhaps want him to elaborate upon these matters, and so make notes):

"What do you mean by "seeing the parents at home? Why do you consider this to be a strength? How did it make you feel to have her in your own home? What did you gain from having her in your home, instead of you going to the clinic?"

(This section also has examples of probing questions)

You were saying that[..], what does that mean to you? Why is that important to you? What do you mean by [...]? How did that affect ... [you perception of the nurse / your experience of the well-baby visit etc.]? Do I understand you right when you say [...]? When [...] happened, what did you think / feel? Have you done any of the things the nurse talked about in the period after the well-baby visit – what? How did you do it??

The second part of the interview protocol was comprised of two follow-up questions, targeting *infant sensitivity*, and the nurse-parent *working alliance* (table 4):

Table 4: An outline of the questions targeting infant sensitivity and working alliance

What did you learn about your baby during the visit?
(Notes)
(Probing questions: What did you learn with regards to sleep / feeding / social contact / crying? how your baby relates to its surroundings (i.e. noise / light etc.)? attachment? when your baby is stressed?)
How would you describe the nurse who conducted the well-baby visit and you relationship to her?
(Notes)
(Probing questions: What thoughts and foolings did she gooks in you? How did she show if she was interested in your peeds?
(Probing questions: What thoughts and feelings did she evoke in you? How did she show if she was interested in your needs? How did she encourage you to find solutions or make changes? How did she contribute in finding alternatives or solutions to the challenges you faced? How did she show you new skills, or how you could do things differently? In what way did she make you feel more reassured or competent as a parent? What did she do, and how, to make you feel more attached to your child?)

Additionally, there was a crisis management plan embedded in the third part of the protocol — with guidelines on how to proceed if, during the interview, there was concern for the participants and / or child's health, or if the participant showed clear signs of a post-partum depression or other struggles (i.e. anxiety, reduced cognitive abilities), or asked for help directly or indirectly. However, all the interviews proceeded without encountering any issues such as these.

The fourth, and final, part of the protocol was developed to make preliminary analytic field notes after the interviews of what the interviewer considered to be the main SWOTs of the interview; to gather these in a SWOT matrix; and formulate brief main impressions of how the well baby-visit practice could be developed accordingly. Short notes with main impressions of what the participants learned about their child, as well as their relationship with the nurse at the visit were also formulated.

### 4.2.3 Reflexive considerations in the data collection phase

As presented above, the initial goal was to set aside some time after each interview to write down immediate and preliminary ideas, thoughts and clarifications to develop strategies in a SWOT matrix, and the final part of the protocol was designed for this purpose. Unfortunately this plan failed for the most part, both due to limited time resources after some of the interviews, but also to the fact the main impression after the interviews were a difficulty to get many of the participants to reflect upon weaknesses, opportunities and threats – making it hard to fill out the SWOT matrix. It should be noted that the proceeding transcription and analysis of the material uncovered several statements coded on

the SWOTs, but somehow these did not adhere to the interviewer's consciousness when completing the field notes. This interesting observation will be elaborated upon further down in the report.

Although not adhering to the plan of structured field notes and memo-writing after each interview – notes, ideas and especially descriptive statements from the participants, were continually written down in a notebook.. These notes were helpful in not forgetting good themes for discussion, but also to keep track of possible sources of knowledge or insight: Did it emerge from the data, from discussions with others, or other sources? Hence, this memo writing served a function of also maintaining a degree of researcher reflexivity throughout the process.

The data collection phase lasted about 9 months. During this period I interviewed not only the 20 fathers in the current study, but also several of the coupled mothers, as well as a few clinicians in concurrent studies, using more or less the same protocol and the SWOT procedure. The learning curve was steep, and I probably went on from conducting the interviews a bit fumbling to expressing more assertiveness. Ongoing discussions with my supervisors about the fathers' responses, as well as my experience of conducting the interviews, probably had an influence on the way I conducted the preceding interviews, as shown in an excerpt of the memo notes from this period:

'Am I implementing a form of "self-development" of the SWOT methodology?' (November 22<sup>nd</sup>)

Already in the first few interviews I experienced that the fathers found it hard to reflect upon the opportunities and threats. They seemed to struggle with discerning between internal and external factors, or perhaps did I fail to explain it properly to them. Either way they often ended up answering *plausible* factors, i.e. threats that did not exist but that would be a threat *if* it existed. A recurrent tendency among the replies was that the nurse at the visit was such a lovely person, but *if* she had been judgmental or aloof then it would have been a limitation because they would not have felt as comfortable with her. As the interviews proceeded, I probably began to anticipate these misconceptions, adjusted my probing questions accordingly and "pushed" less for reflections upon the opportunities and threats. As so, I "accepted" certain factors as i.e. threats, although they according to the SWOT methodology were not. However, by keeping a memo I more readily became aware of this – as reflected by the excerpt above – and tried to refocus and adhere to the initial interview protocol regardless of the participant's replies. Further reflections upon the possible reasons and implications of the fathers' struggles with the external SWOTs will be elaborated upon in the analysis. For now it will serve as an example of how this affected me as a researcher.

### 4.3 Analysis

A *Template Analysis* was conducted to get a wider grasp of the specific factors creating the (potential) differences between the two groups – in particular to reveal if some of the expectations presented in the section above are met. The template development in this study did not follow the most common procedural steps in conducting Template Analysis, i.e. as described in Brooks, McCluskey, Turley, & King's (2015). Instead a pre-developed template of coding categories was applied onto the whole data set, before reanalyzing the data not captured by the first template. This procedure will be justified and explained in the following sections. The analysis aimed at following Braun and Clarkes (2006) 15-point checklist of criteria for good Thematic Analysis (table 4). Claims of how the current study adheres to these criteria will be presented chronologically throughout this report.

Table 5: A 15-point Checklist of Criteria for Good Thematic Analysis (Braun & Clarke, 2006)

Process	No.	Criteria			
Transcription 1		The data have been transcribed to an appropriate level of detail, and the transcripts have been checked against the tapes for 'accuracy'.			
Coding	2	Each data item has been given equal attention in the coding process.			
	3	Themes have not been generated from a few vivid examples (an anecdotal approach), but instead the coding process has been thorough, inclusive and comprehensive.			
	4 5	All relevant extracts for all each theme have been collated.  Themes have been checked against each other and back to the original data set.			
	6	Themes are internally coherent, consistent, and distinctive.			
Analysis	7	Data have been analyzed – interpreted, made sense of – rather than just paraphrased or described.			
	8	Analysis and data match each other – the extracts illustrate the analytic claims.			
	9	Analysis tells a convincing and well-organized story about the data and topic.			
	10	A good balance between analytic narrative and illustrative extracts is provided.			
Overall	11	Enough time has been allocated to complete all phases of the analysis adequately, without rushing a phase or giving it a once over lightly.			

Written report	12	The assumptions about, and specific approach to, thematic analysis are clearly explicated.
	13	There is a good fit between what you claim to do, and what you show you have done $-$ i.e., described method and reported analysis are consistent.
	14	The language and concepts used in the report are consistent with the epistemological position of the analysis.
	15	The researcher is positioned as <i>active</i> in the research process; themes do not just 'emerge'.

Being a flexible technique, Template Analysis can be adapted to the needs of a particular study as well as that study's philosophical underpinnings (Braun & Clarke, 2006). By the use of a realist position as defined above, it is expected to see the use of a set of strong and well defined *a priori* themes (Brooks et al., 2015; Fletcher, 2017). The *a priori* themes implemented in the initial template of this study are defined in the theory section above, and reflects the areas one might expect differences between the experiences of the participants in the two groups: 1) sensitivity to infant behavior/signals 2) parent-to-infant attachment 3) parental self-efficacy and 4) nurse-parent working alliance. The data was analyzed using a *semantic* approach, where the themes were identified by the surface or explicit meanings of the data (Braun & Clarke, 2006).

#### **4.3.1** The transcription process

The transcription of the interviews was done in three steps, all completed by the author, with the final transcription becoming the base for the unitizing and coding:

- 1) By listening through the interviews, a complete transcription including every word and utterance was conducted with each interview. Significant behavior of the participant was also included by the use of bracketing, i.e. [giggling] or [sarcastic undertone].
- 2) A revised version of the interview was implemented, leaving out any utterances such as "uh..." and incomplete sentences without any meaning such as This second step was included in order to gain better control over the process towards step 3, and not to make too big "cuts" into the material, with the risk of losing items of importance.
- The final version was revised in order to make an independent text material that was easy to read. Questions from the interviewer were left out, although included in their conveyed meaning in brackets, so as not misinterpret the source of the participants' statements. Through this process the interview was divided into distinct parts under the headlines "Open" ("Strengths"; "Weaknesses"; "Opportunities"; "Threats"), "Explorative" ("Strengths"; "Weaknesses"; "Opportunities"; "Threats"), "Follow-up questions" ("What they learned about their child?", "Their relationship with nurse", "Final remarks").

The first criteria in Braun and Clarke's checklist is considered to be partially fulfilled through this process: By adhering to the steps above it is argued that the data were transcribed to an appropriate level of detail, but the second part of the criteria of checking the tapes for accuracy was discarded due to two aspects. First, because the interviews were conducted by the author a previous familiarity with the material was present, and the preceding transcription steps were done in a thorough manner. In addition, the factor of limited time resources available made this a favorable choice. Second, by adopting a semantic approach, the *underlying* ideas and assumptions of the participants are of less importance (Braun & Clarke, 2006). Hence the accuracy in terms of tape-transcription similarity was deemed of less significance as long as the overall themes – as stated by the participants – were covered.

Through the transcription process, the interviews were listened through *once*, and read through *three* times.

#### 4.3.2 Unitizing

The final interview transcript was broken down into smaller units, and a codebook in an excel-format was used for this purpose. In line with critical realist views, a primarily deductive strategy was implemented in the coding process, drawing on existing theory and literature, as well as the goals of the study (Brooks et al., 2015; Fletcher, 2017). This also influenced the preceding process of unitizing. Because the intention was to get a wider understanding of the participants' experience of the *well-baby visit*, longer statements containing a lot of information, but concerning experiences i.e. at the hospital, was kept as one unit. One father elaborates in great lengths upon events at the hospital that he experienced as traumatic, and his statement was kept as one unit (even tough reaching about 300 words) reflecting a need to talk about the birth / events at the hospital. The unit is not presented due to anonymity considerations, but its size stands in stark contrast to one of the smallest units:

"or recognize faces"

This unit refers to a specific interaction with the baby during the visit, and because it relates directly to what is sought investigated in this study, the full statement:

"So that was a really positive experience... that [he] in a way has developed further... or is capable of more than I perhaps realized. That he already is capable of doing quite a lot. [i.e.] like mimic after facial expressions... or tracking things with his eyes, turn his head towards sounds, or recognize faces".

The statement was broken down into several smaller units (as circled) in order to code the units on the *a priori* themes relevant to the research question and goals of the study, in this case as items in the NBO observation.

Through the process of unitizing the interviews, the transcripts were read through *once*. The total number of units added up to 1833, with an average of 91 units per interview.

#### **4.3.3** Coding

The initial template consisted of 69 provisional codes of two types described by Maxwell (2012): Organizational and theoretical. *Organizational* codes function primarily as topic-based 'bins' into which information is sorted for further analysis, while *theoretical* codes are derived from prior theory and often represent the researcher's concepts, rather than reflecting participants' own concepts (Maxwell, 2012). The coding process followed the provisional coding method described by Saldaña (2013), which implies a predetermined '"start list" set of codes prior to fieldwork' (Miles & Huberman, 1994, in Saldaña, 2013, p. 144). The list of codes was drawn from the relevant literature review and theoretical framework of this study, which is in line with the realist stance adopted in this study (Fletcher, 2017). Thirty-four theoretical codes were distributed amongst the four *a priori* categories defined in the theory section above:

- 1) Infant to infant behavior / signals / state: Statements coded along the 18 NBO observations, as well as infant sleep-awake states: Deep sleep / light sleep / drowsy / awake alert inactivity / awake motorically active / crying (Nugent et al., 2007).
- 2) Parent-to-infant attachment: *Pleasure in proximity / acceptance / tolerance / competence (Condon & Corkindale, 1998).*
- 3) Parental self-efficacy: Cognitive / affective / behavioral (Salonen et al., 2009).
- 4) Nurse-parent working alliance: *Task / goal / bond* (Horvath & Greenberg, 1989).

Twenty organizational codes were distributed along structural dimensions, including:

- 1) Strengths / weaknesses / opportunities / threats (SWOTs)
- 2) What part of the interview the statement belongs to: *Open / Explorative / Learn about child / Relationship with nurse*
- 3) 12 levels of analysis: Is the statement reflecting information about the *mother/father/child/mother-child relationship/father-child relationship/mother-father relationship/family/nurse/mother-nurse relationship/father-nurse relationship/nurse-child relationship/nurse-family relationship*

Units could be simultaneously coded on several of the categories, depending on their content.

Saldaña (2013) argues that one should exercise caution when applying provisional coding, pointing out that 'your preconceptions of what to expect in the field may distort your objective (...) of what is "really" happening here' (p. 146). Provisional codes should therefore be open to alteration, removal or adding of new coding categories as the data requires (Brooks et al., 2015; Fletcher, 2017). Although aware of this warning, the only revision made to the initial template before applying it to the

whole data set, was to reduce infant sleep-awake states from six to three codes as there wasn't enough richness in the participants' descriptions to cover all six – which resulted in a template consisting of 51 codes. This is where this procedure differs from the most common steps of conducting Template Analysis (Brooks et al., 2015), which involves an iterative process of applying and revising the template on a few accounts (unitized transcripts) at a time in order to 'fit' the template better onto the themes in the data. Two aspects were taken into consideration when choosing the applied procedure. First, because this study contains participants divided in two groups – an intervention and a control group – it's in line with the goals of the first research question to target the main focus areas (the *a priori* categories) of the intervention (NBO) in order to investigate how it is experienced compared to the control group. Second, the use of SWOT structures the material in such a way making it more feasible to capture the data not theoretically coded for closer scrutiny, as well as re-visiting the material already coded, so as to answer the second research question. Even so, Saldaña's (2013) warning above were taken into consideration, and included in a wider discussion below of limitations with regards to the choice of methods, and *researcher reflexivity*.

#### Using holistic coding in the interpretive process of identifying new themes

Although the theoretical codes in the existing template seemed to tap readily into the data, some parts of the material remained un-coded. As elaborated upon above with regards to the interview protocol, the participants' (lack of) understanding of the different SWOT's, particularly with regards to Opportunities and Threats, created some frustration while collecting the data. Means could have been taken early on in the data collecting phase i.e. in the form of changing the interview protocol in order to better extract the participants' experiences – a tactic in line with most qualitative inquiry with realism underpinnings, were components in the research design necessarily isn't fixed in advance, but can be subject to alterations as the process of data collection or analysis progresses (Maxwell, 2012). In the current study, such steps were not taken, and the interview protocol remained unchanged. This however, created some insight into the possible processes of *why* the participants found it hard to elaborate upon opportunities and threats.

Through progress in the coding of data, discussions with the supervisor and analytical notes, the impression was that many of the participants in both groups weren't sure of what to *expect*, neither from the visit itself, nor from the nurse (competence, training etc), which was mainly revealed when asked to elaborate upon what they considered to be the Opportunities and Threats, and to some extent Weaknesses, of the visit. Hence, the use of SWOT seemed to open the door to the interpretation of processes that perhaps would not have been discovered by conducting a different form of analysis.

While being aware of the risk of 'muddying the analytical waters' (Saldaña, 2013, p. 60) by employing too many coding methods in one study, a form of holistic coding (Saldaña, 2013) was applied to the SWOT part of the transcripts to further explore this hunch, and to get a clearer picture of

what the fathers considered to be the main SWOTs of the visit. By chunking up broader pieces of the data material, absorbing them as a whole to grasp basic themes or issues – rather than analyzing them line by line or unit by unit – broader 'lumps' of data, i.e. coded as *doesn't know what to expect*, could be collected for closer scrutiny. Although holistic coding primarily is a preparatory approach to unit data *before* a more detailed coding or categorization process, it can also be used as a "middle-order" approach on smaller units of data, and is favorable for those with a short period for analytic work (Saldaña, 2013). The time and scope of this study made holistic recoding of the transcripts a favorable choice above systematic reanalyzing of all the units in the code book. As the interpretive coding process progressed, three new themes were identified:

- Expectations and degree of pre-knowledge
   This theme involves statements where the fathers reflect upon an uncertainty with regards to the visit intention and content, as well as their role in the visit.
- 2) Practicality preferences
  This theme contains statements that was interpreted as aspects of the visit that involves the actual doing or experience of something, i.e. when the nurse carries out an exercise, such as showing how to hold the baby, rather than just talking about it.
- 3) Online resources
  This theme involved statements referring to various aspects of the use of online resources.

Because the themes proved to be closely linked to the stated SWOTs, they will be further defined and elaborated upon in the findings section below, structured under strengths, weaknesses, opportunities and threats alongside the pre-developed theoretical coding categories. Due to time restrictions, these new themes were *not* developed into standard coding categories and applied to the data in the code book.

The choices made in the analytical process, were done bearing the research questions in mind. However, from a realist perspective, one doesn't mechanically "convert" research questions into the methods chosen (Maxwell, 2012). Rather, the methods are a *means* to answering the research question(s). This entails that the choice of specific methods also depends on 'the actual research situation and what will work most efficiently in that situation to give you the data you need' (Maxwell, 202, p. 104). The goal was to investigate how well-baby visits with the NBO was experienced by first-time fathers, compared to ordinary visits – in particular the extent to which the main target areas of the NBO were salient in the experiences of the fathers who received this method. The size of the data material made the application of pre-developed theoretical coding categories based on the target areas of the NBO-method a favorable choice. In an attempt to minimize the effect of this enforcement of researcher generated categories upon the material, subsequent effort was placed in moving focus away from the coded data units. The transcripts were reanalyzed with a simple holistic coding method in

order to "catch" topics and processes not coded through the initial template. The use of SWOT-methodology was implemented to evaluate the well-baby visit practice as a whole – as captured by the fathers' stated experiences of the main SWOTs. While the template development in this study may appear somewhat unorthodox, it still adheres to Brooks et al.'s (2015) advice of not to 'leave any data of clear relevance to the study's research question uncoded' (p. 204). Considerable effort has been placed in presenting the reader to the assumptions about, and specific approach to, the type of analysis chosen in this study (Braun and Clarke's checklist, criteria no. 12); The potential disadvantages of this procedural approach are discussed further under 'Limitations of the presents study'.

#### 4.3.4 Methods to ensure the quality of the process of analysis

Considerable effort was placed in following Braun and Clarkes (2006) checklist. Criteria no. 2-11 relates to the coding and analysis process: The transcripts' *entire* content was unitized and coded in an aim to make the coding process thorough, inclusive and comprehensive (criteria no. 3), and to give each data item equal attention (criteria no. 2). The coder had several meetings with the supervisor to discuss existing and emerging themes. Throughout the interpretive process of coding, the interview transcripts was read through about seven times, continually checked back and forth with the data set, and all of the interview units were read through *twice* (criteria no 5). All relevant extracts for each theme was collated (criteria no. 4) through the systematic unitizing and coding of the entire transcript content on the pre-developed theoretical and organizational codes. A limitation in this regard may be that the three new themes captured through the reanalyze of the transcripts through a form of holistic coding, did not constitute a similar systematical approach. Hence, it was more difficult to obtain control of all the extracts relating to each of the new themes. It is still argued that this two-phased process of coding was of an interpretive art – an *analysis* – rather than just a description of the data (criteria no. 7).

By the use and thorough definition of the *a priori* theoretical themes, it is argued that these prove to be internally coherent, consistent, and distinctive (criteria no. 6). As a novice researcher, one should be careful of arguing that self-developed themes entail the same quality. In particular when not applying a thorough thematic analysis (i.e. following the steps of Braun & Clarke, 2006) onto the data set. However, it is strived to obtain meaningful coherence between the data *within* the new themes, as well as clear and identifiable distinctions *between* these themes. Because this study is a combined SWOT / template analysis with pre-developed themes, focus was placed on the definition of the SWOTs and *a priori* themes, and illustrative extracts were given less space in this analytical report compared to that of a "pure" thematic analysis (criteria no. 8 and 10). Effort was placed in writing an analytical report that presents itself as convincing and well-organized (criteria 9).

As a master thesis, time restrictions made it difficult to complete all the phases of the analysis adequately without rushing (criteria no. 11). This is elaborated upon in the report with regards to the

choices made by the use of holistic coding in the development of the new themes, and in not developing these into new coding categories applied to the data in the codebook. However, criteria no. 11 also points to the importance of not giving phases of the analysis a "once over lightly". It is argued that the choices referred to above prevented this risk to a greater extent, than to apply a more comprehensive coding method without the time to complete it thoroughly.

#### Researcher reflexivity and reliability considerations

The use of memo writing escalated during the coding phase. Following the critical realist stance, our understanding of phenomena and processes in the real world are fallible and incomplete at best, and shaped by the assumptions and perspective that we bring to the research – ' the lens through which we view the world' (Maxwell, 2012, p. 103).'Good research is not about good methods as much as it is about good thinking' (Robert E. Stake in Saldaña, 2013, p. 41). The researchers influence was of course of considerable significance throughout the research process and reflexive considerations were a high priority. This was targeted through reflexive reflections when entering the study – as reported in the reflexive preface of this report, and by keeping reflexive and analytical memos throughout the data collection and analysis phase, which are elaborated upon at the end of this report.

In the beginning of the unitizing process, the supervisor read through the developed units, as well as the initial coding, of one interview. The units were commented and sent back to the coder. Based on the supervisors' comments, not much revision was needed, and the coder proceeded with the rest of the interviews. However, with limited resources available, only coder was used in the process and reliability may have been diminished. Reliability considerations and limitations in this regard will be discussed further at the end of this report.

### 5 Findings

The following report of the findings in were articulated by continuously moving back and forth between the original transcripts and the coded units, in order to stay as close to the fathers reported experiences as possible. With as many as 20 participants, coding of units was helpful in organizing the material and to attain an overview of certain themes in relation to each other. Their purpose was to organize the material, so as to make it more accessible for further exploration. This is illustrated in the presentation of the findings, with initial diagram outlines of the two groups statements distributed on the SWOTs and pre-developed coding categories, followed by elaboration upon the qualitative content of the statements.

First however, a few clarifications will be accounted for. Most of the names of the coding categories are abbreviated: "PSE" = Parental Self-efficacy; "MPAS" = parent-to-infant attachment (derived from Maternal Postnatal Attachment Scale); "WAI" = Nurse-parent working alliance. The

NBO items and infant states are merged as one category named "NBO". Due to the size of the material, some of the initial findings are summarized in tables / diagrams before elaborated further. This choice was made to ease the presentation of the findings to the reader. Being a qualitative study, further "quantitative" means were not employed. In the following, the participants' statements have been made anonymous, and their ID-numbers replaced with actual (although fictive) names in order to make the illustrative statements more personalized.

The interpretive process of unitizing the interview transcriptions resulted in a total of 1833 units (or individual statements), distributed on the 20 interviews of fathers from both groups. Approximately 65%, or 1153, of these units (statements) could be coded on the pre developed theoretical coding categories (table 6)

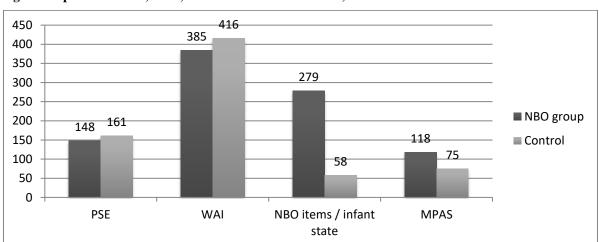
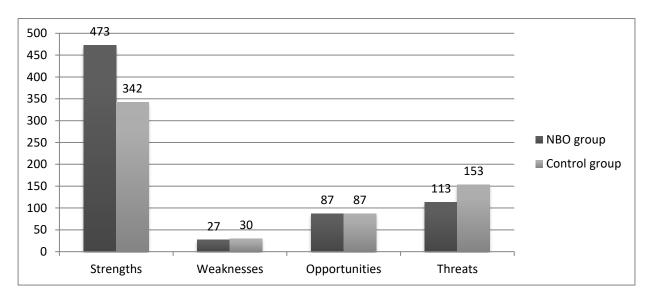


Table 6: Distributions of fathers' statements in the NBO group and control group respectively, with regards to perceived PSE, WAI, NBO items and infant state, and MPAS.

Initially it seems as though the greatest difference between the two groups is in relation to statements involving infant states and the 18 NBO items. A smaller difference is also visible with regards to perceived parent-to-infant attachment. Fathers in both groups had considerably more statements reflecting aspects of the working alliance.

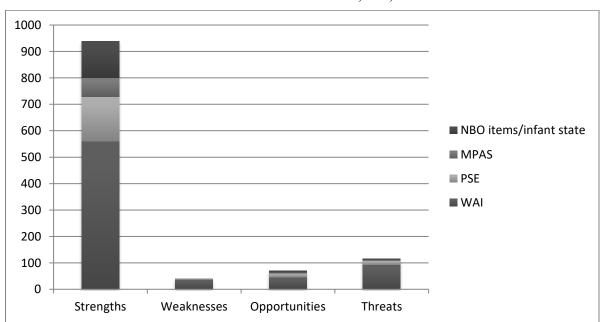
However, all of these statements have to be explored in the context of SWOT, as most of them are mutually coded as strength, weakness, opportunity or threat. First, let us view the total distribution of stated SWOTs between the fathers' of both groups (table ---).

Table 7: Differences between the control- and NBO group with regards to the number of stated SWOTs.



Fathers in both groups reported an overweight of strengths and only a minimum of weaknesses, which may be interpreted to that they probably experienced the well-baby visit as mainly positive. This notion was also explicitly stated by all of the fathers in both groups. Even fathers who reported weaknesses, they all still reported that the total impression of the visit was positive. Table --- still shows that there were differences between the groups, with fathers in the NBO group reporting considerable more stated strengths, whereas the fathers in the control group reporting slightly more threats. A diagram of how stated SWOTs are distributed on statements mutually coded as MPAS, PSE, WAI or NBO items/infant state (table --), enforce the impression that the fathers experienced the visit as positive. It also seems as though the fathers were preoccupied with aspects of the nurse and their relationship with her, with statements coded on WAI being predominant among the all of the stated SWOTs.

Table 8: Total number of stated SWOTs distributed on MPAS, PSE, WAI and NBO items/infant state



However, when moving away from these simple statistic overviews and explore the statements qualitatively in relation to how they were framed in both groups, the picture naturally grows more complex. In the following, the fathers stated SWOTs will be presented in their relation to WAI, PSE, MPAS and NBO items / infant state. Additional stated SWOTs are presented further down. Illustrative statements have been given plenty of room in an attempt to adhere to the fathers stated experiences as much as possible. Each statement is chosen because it illustrates a general tendency also shown in other interviews. This means, that if not otherwise clarified, then the illustrative expressions in the following section resembles expressed statements among other fathers in the same group or across groups, and hence are not consciously "picked" in order "push" the presentation of the findings in any artificial direction.

### 5.1 Strengths

## 5.1.1 "It's almost like 'Wow, she's got time for us... and even motivation for us!"

Personal aspects of the nurse and qualities of their relationship with her were thematized without prompted by all the fathers. Regardless of group belonging, the fathers described the nurse with characteristics such as 'warm-hearted', 'kind', 'mild', 'trustworthy', 'including (of the father)', 'took her time', 'genuinely interested', 'a good communicator' 'It just gave me the impression that "Wow! This one knows what she's doing" (Marius, NBO). Personal characteristics of the nurse, typically coded as WAI bond, were equally salient among the experiences of both groups. A couple of fathers in both groups reflected upon personal characteristics of the nurse when asked for weaknesses (next section below), but they all still emphasized that the strengths outnumbered the weaknesses, and that they experienced the nurse and their relationship with her as mainly positive. 'It seemed as though she understood what it felt like to be parents of a tiny little newborn' (Johannes, ordinary). Reflecting upon the "stopwatch" in the health care system, a father said that 'But then she came and sat down, with no signs at all of being in a rush. And this contributed to us opening up and sharing our experiences" (Nikolai, ordinary).

"It's like if you receive an advice from anyone then the advice may be good, but if you receive the advice from a good friend, then they're sort of extra good, because you know that someone on a different level than just this technical level [...] So there was this friendly feel framing the visit" (Eivind, ordinær)

Apart from positive personal characteristics, most of the fathers in both groups additionally expressed it as a major strength to have their questions answered adequately, and to receive 'good information'. "I gained trust in the nurse that came, and experienced the whole situation as good. This was due to

the fact that I felt she answered my questions adequately" (Simon, ordinary). The content of the things the fathers wondered about and appreciated being informed about, varied to some extent, but salient repeated themes in both groups included: The baby's weight gain and general wellbeing; being presented with a plan ahead with regards to consultation appointments at the clinic; breast feeding advice and guidance provided to the mother.

## 5.1.2 "Perhaps the calm atmosphere in the house would linger in the walls after she'd left..."

Almost all of the fathers in both groups characterized it as a primary strength to have the nurse visit them at home, in their own environment. Two fathers said that they did not mind the location of the consultation. Fathers in both groups reflected upon how they experienced it as less stressful to stay at home above leaving to the clinic. Many stated that they felt more 'at ease', 'comfortable' and 'safe' at home, and others expressed that being in their own environment made it easier to 'open-up' and share their experiences. "It has to do with the sort of informal and safe surroundings. It helps in opening up the conversation" (Vegard, ordinary). A salient reflection among several of the fathers also included that "I think it's easier to ask the silly questions in your own home" (Patrick, NBO), and 'It felt very safe to stay on our own arena. That she got to see how we acted at home, and were able to better target things if she saw any struggles' (Mathias, NBO). Some fathers also reflected upon how the nurse could get an understanding of the environment that the child lives in when conducting homevisiting, and stated this as positive: "Then there's something about seeing the parents too... At home. To see how everything works" (Andreas, NBO). The structure of the visit was characterized by all the fathers with expressions such as 'open-ended', 'informal', 'for the parents, not the nurse', with 'room to jump off the wagon' if the parents needed it instead of having to keep to a set list of themes to be discussed. "It was informal, a normal conversation. I liked that. You didn't feel that you were on a conveyor belt. She seemed sincerely interested" (Vegard, ordinary) "Of course she had things she needed to talk about, she has her list. But there was continually room for us to ask about the things we wondered about. This was probably the greatest strength" (Daniel, ordinary).

Differences between the groups were observed with regards to the stated experiences of how the nurse structured the visit. Fathers in both groups valued the open-ended informal tone, however six of the fathers in the NBO group expressed that they liked the combination of actual physical 'tests' with this open-ended feel. That it 'wasn't all just talk', but also entailing practical contents were the 'nurse showed her professional competence'. "It was sort of a good icebreaker, more than just 'hi'... with a smooth transition over to a more clinical examination [...] First gaining trust, followed by medical examinations... it felt very natural and reassuring" (Marius, NBO); "That you actually have this concrete plan of action, aside from all these feelings floating around. I think that contributed to my feelings of safety" (Filip, NBO)

## 5.1.3 "Personally I felt that she was really good at seeing <u>me</u> through it all. You know, as a father"

Several of the fathers in both groups, reported that they felt included, that the nurse 'saw' them as fathers and naturally included them in the conversation. One of the topics for discussion in both groups included how they could function as a support for the mother. Some fathers stated that this was something they already had thought about, others expressed that it was a good topic to clarify. "It was sort of like 'We in the Norwegian government expect that you, as a father, take the role as cuddle partner, diaper changer, and grocery shopper' just as a clarification. [...] I thought that was a cool way to put it" (Marius, NBO). However, to be seen individually, through their role as father – not solely as a support partner – was also thematized across both groups, although to a less degree, only being explicitly mentioned by four fathers: "Very naturally she asks mother 'How was the birth experience?', and then she turns towards me and asks me the same. That is sort of a nice way to be seen [...]" (Nikolai, ordinary): "We talked about the things I could do, as a father. The evening routines before bedtime and things like that, that it's a nice way to build an attachment with the child" (Andreas, NBO).

# 5.1.4 "So that mattered to me... witnessing how mom calmed down by the guidance she got..."

Although stating appreciation of being included and individually seen as a father, mother's wellbeing was a salient topic among many fathers in both groups. Most of the fathers to a great extent used pronouns in first person plural when describing their experiences, i.e. 'we' and 'us', above 'I' and 'me'. However, this was for the most part related to elaboration about certain topics: When talking about insecurities, and the child's wellbeing, most of the fathers uses 'we' and 'us', in addition to talking individually about the mothers insecurities, elaborating upon events in and out of the visit that had stressed the mother, or things that had calmed her down. However, mother's individual reactions with regards to positive emotions were not mentioned by any of the fathers, neither in the NBO group nor in the control group. When elaborating about how they positively experienced the NBO items in the NBO group, the fathers to a great extent used 'I' and 'me', to a lesser degree 'me' and 'us', and no mention of how the mother individually seemed to have experienced it. Hence, it was interpreted as though the fathers' to a greater degree were preoccupied with the mother's level of stress and insecurities, rather than other aspects of mothers' experiences: "And my experience is that the visit at least gave my wife this relief, or comfort (Isak, NBO): So it's important to me that mom is okay, and is kind of psychologically clarified, or not unbalanced" (Robert, NBO); "But I'm really preoccupied with mom, and witnessing her despair. I think that she kinda quick gets the feeling that she can't manage it. (Nikolai, ordinary); "It's tough when mother gets stressed out. Of course that'll affect the baby even more, you know. So it matters. If she's stressed, then I more easily become stressed... because she really holds the key... through having the food an sort of possessing the closest

relationship with the little squirt, at least for now. In some situations the father just won't be enough" (Fredrik, NBO)

As illustrated, reflections with regards to mothers insecurities, and to some extent the effect this will have on the baby occupied many of the fathers' experiences.

#### 5.1.5 "Just to be reassured that everything is okay..."

A few in both groups reported high degree of pre-visit self-efficacy, and stated that they did not learn anything new during the visit but that the main thing was to be reassured that the baby gained enough weight, and that everything was okay. Except these few, almost all of the fathers reported that they felt less confident in the parental role before the visit, and more confident and calm after the visit. "It was just a feeling of lowering your shoulders. Shoulders' tense and raised before the visit, shoulders lowered after (Eivind, ordinary). To have their questions answered by the nurse were stated as one of the primary reasons affecting their level of confidence, but also to receive confirmation that they had done things 'right' up until now and that the baby is developing normally. To receive a confirmation from the nurse that their child seems to be happy, thriving and gains weight were emphasized. "She informed us of how her weight development was supposed to progress in the days ahead, so that we could keep track of it. I felt mostly relieved I think, after the visit, that her weight was normal..." (Mathias, NBO); "You're reassured... that you have a child that is developing normally, and proves to be healthy and well. That there's nothing worrisome. He eats and everything sort of just progresses. For his part it just moves forward... perfectly" (Isak, NBO); "I sort of learned that he is like every other baby, that he develops normally [...] Just the simple things. I know it sounds crazy, but just that his weight increases because he eats. Simple as that" (Eivind, ordinary). The nurse were expressed as contributing to their feelings of parental confidence, by reporting higher feelings of 'selfassertiveness', 'calmness', 'more at ease' post-visit. "You gain a little trust in yourself... That you're not heading in the wrong direction, but that you just might make this work" (John, NBO). Few of the fathers in the control group elaborated further upon this. When prompted (ref. prompting questions in the interview protocol), they generally referred to a feeling of 'reassurance' that everything was okay with the baby: "[The nurse] contributed to a greater feeling of calmness. But it was perhaps a bit indirect. I didn't receive a pat on the shoulder for doing things right, or anything like that. It's more the feeling that everything develops the way it's supposed to be. That everything is normal"- (Eivind, ordinary). By contrast, in the NBO group, connections between enhanced feelings of parental selfefficacy and illustrative examples were more salient. As illustrated further in the next section.

#### 5.1.7 "She was really really good at handling our little girl..."

Although many similarities could be seen between the descriptions of the alliance between the groups, descriptions of the nurse as a 'role model' or other illustrative examples of the way the nurse handled

the child, were only salient in the NBO group. Fathers in the NBO group had more statements mutually coded on WAI/PSE and NBO items, as well as statements referring to the nurse-infant relationship (as shown through the coding on "level", ref. organizational coding categories defined in the methods section). "She seemed experienced with babies. Just to see someone that is more proficient than us... you know, handling her and... discerning her cries, what's hunger and what's something else ... In the absence of grandparents it was just nice to see how someone else was handling her" (Robert, NBO); "Talking to the baby, to make contact and get that connection, that the nurse was really skilled at. She helped us, showed us how to do it" (Patrick, NBO). "She personified the situations. Instead of saying "when you feed her", she said "when you are feeding" (plural), "when she's getting milk". Through her hands, eye gaze and words she included the child. So that was pretty nice. It actually means that she understands us as a unity, that it's not just theory but truly enacted" (Filip, NBO).

Fathers in the ordinary group equally termed the nurse as 'proficient' and 'highly competent', but to a much less degree relate this to specific examples, other than receiving good verbal information, or having their questions answered. "It is sort of reassuring... to get a visit from a person that is more competent than us. A person that seems comfortable in her profession and that is capable of answering our questions" (Eivind, ordinary). With fathers receiving ordinary visits examples of how the nurse handled the infant were few and less detailed, varied or salient as in the NBO group. The following statement is the only statement in this group reflecting an example of the nurse acting as a role model: "I think perhaps she showed us a few different ways to hold the baby. We asked a bit about that I think, how it worked. I we should sit a bit more straight or lying down [...] or how to place him on our shoulders for burping" (Lars, ordinary)

#### 5.1.8 "Like grimaces, or when she yawns... that it actually means something"

One of the primary differences between the groups were related to statements with regards to an understanding of the infant's individuality, their relationship to and interaction with the infant, which was a lot more salient and illustrated with specific examples among the fathers who had received NBO. The fathers in this group tended to refer more to aspects of their child alone, or aspects of their relationship with their child (ref. coded on "level"). The *infant* was more salient or personalized in the interviews of the fathers who received NBO, which also was the main impression when conducting the interviews. "I had settled on the idea that this child would be rather unstimulating for a long time.

Or... I mean, that it wouldn't be any activity... brain activity. But it was a reminder, to me at least, that this child is in learning. From now on and the rest of its life" (Marius, NBO); "Just that we got a few tips about specific traits of babies... What it actually means, how common they are and... yeah you know, just tips on how to read the baby better [...] Things that was totally unknown to me, before I actually had to relate to it... So it is kinda like ABC in baby technique" (Fredrik, NBO) Many in the

NBO-group expressed that they found it useful to receive specific 'tips and tricks' with regards to how they better could handle and understand their child. When asked to illustrate this with specific examples, these were often of practical nature: "The child communicates through crying, or physical movements with its hands or head, and facial expressions... So she was really good at explaining how the infant communicates with us" (Robert, NBO); "As an example, it's the use of my voice. She can be really fussy, so to use both my bodily contact, and even just my voice, so that she calms down" (Patrick, NBO); "I feel that I am more efficient now when interacting with the baby. More able to listen to his signals. The nurse provided many tips on how how you can dicerne between different types of cries. That you have to try and notice 'What does the baby want?'" (John, NBO). Most of the fathers reported to have used the things they learned in interaction with their infant post-visit. Several statements such as these were mutually be coded on PSE, suggesting that although fathers in both groups expressed enhanced feelings of confidence or calmness post-visit, there was qualitative differences between the groups – with fathers in the NBO group additionally reporting greater parental self-efficacy with regards to understanding their infant's cues, and the strategies they behaviorally could implement in order to respond to these: "I gather her arms and hold her a bit tight every time I change her diaper now, if she's stressed. Sometimes she just lays there and is happy, but if she fusses or gets annoyed then it works really well to fold her arms like that. Then I try to just give her some time to feel safe before I continue" (Robert, NBO); "One of the main things I learned was about keeping him in balance, to wrap him in a blanket or embrace him, to make him feel safe" (Thomas, NBO); "Before the visit, every time she made a sound we usually picked her up immediately and laid her to the breast, or something like that. Now, I think we use a bit more time to interpret her signals... if it's a closeness thing, or is she hungry, irritated, tired? That we're more comfortable with interpreting it. A bit more. Rather than just being very afraid right away..." (John, NBO). The infant's individual capacity and parent-infant interaction were to a much less degree thematized among the fathers receiving ordinary visit, although not totally absent. Three of the fathers reflected upon the importance of spending time with their child in order to better understand what her or she 'wants', and that taking time to get to know their child was the advice usually given by the nurse when asked about how to better understand the infant: "I guessed I learned that there are individual differences. That it's not like a car engine that works the same way in all cars, but a human being that needs considering and time to get to know" (Daniel, ordinary); "One thing is the importance of having contact with the baby... you know, stimulate his senses and stuff. But that you actually might get to the point where the kid gets overstimulated. That you have to give him breaks also. I don't think I'd thought about that before. So that was new..." (Christian, ordinary). Although less specific and practical of nature than that of the NBO group, the fathers in the control group stated that such advices felt calming and lowered their insecurities.

#### 5.1.9 "There was something there that triggered a sense of father's pride..."

The concept of attachment was not an explicitly emphasized theme of any of the fathers who received an ordinary visit, and only with three in the NBO group. It was in particular item no. 11 in the administration of the NBO that the fathers referred to in this regard. This item involves orientation towards voice in an awake and calm alert state, were the nurse typically place the infant on its back in her arms, having one or both of the parents call the infant's name to observe if the infant orients his or her head towards their voice. A sense of pride or admiration was expressed by some of these fathers when witnessing their infants' competencies on the NBO items (turning head towards their voice, and ability to habituate) statements that could be coded on the parent-to-infant attachment as "pleasure in proximity"; "And then you feel like "yes, success!" you know, that the relationship between me and the child as well, that someone else can see it too... that it's there." (Andreas, NBO); "Something that I truly enjoyed hearing was that it seems as though he has a good attachment to us. That he sort of trusts us... in that he seems patient and kinda knows that every time we pick him up we're about to take care of his eventual needs. And also, when the nurse held him, he searched for us, with his eyes, to where we were. Then you really felt... that you grew attached to him" (John, NBO);"It evoked these warm feelings, that we both actually made her turn and look us in the eyes. We thought so. You feel that you get this personal chemistry with the child' (Patrick, NBO). Others however, explicitly stated that 'nothing that the nurse did' could have made them more attached than they already were. Hence, there were no clear indications by the fathers' statements that the NBO contributed to greater parentto-infant attachment in the NBO group.

In sum, the main differences between the groups' reported strengths with regards to the WAI, and especially with regards to PSE, are *qualitative* more than *quantitative* differences. Fathers in both groups expressed that they experienced their relationship with the nurse as positive and generally felt more confident in their parental role post-visit. But additionally, fathers in the NBO group to a greater degree related this to a greater perceived competence and knowledge about their infant, as well as strategies to implement in response to the infant's behavioral cues (PSE), hence the higher amount codes on the categories related to infant behavior and cues (NBO items and infant state).

#### 5.2 Weaknesses

As shown in table 7 and 8 stated weaknesses were *not* a salient part of the fathers' interviews, and seven fathers (5 NBO, 2 ordinary) reported no experienced weaknesses at all. The few weaknesses that were mentioned were explicitly not given too much emphasized by the fathers, apart from the weakness presented by the two fathers in the following section below.

## 5.2.1 "You can be a little bit more professional in your method of communication..."

For the most part, expressed weaknesses were not given much emphasizing, apart from in three interviews. Two fathers (1 NBO, 1 control) emphasized aspects of their relationship with the nurse as a weakness, both coded "bond". "I think she could've been a bit more straightforward in her communication. It's hard to explain, but she had almost a childish tone in her voice. It became almost too sticky and sweet [...] It's kinda like I would've talked to someone a lot younger" (Filip, NBO); "She was a bit laidback. She shouldn't let herself become more laid back. It was a bit borderline. She didn't say anything like 'have you thought about this?' or 'have you done that?' (Erik, ordinary). Both of these fathers called for the nurse to show more authority. Although they both reported to have experienced the visit and the nurse as mainly positive, aspects of their relationship with her, as expressed in the statements above, continued to influence their reflections throughout the interview. In particular, the father who received NBO, devoted several minutes of his one hour long interview to the elaboration of a remark from the nurse with regards to mothers' breast feeding difficulties. "And it's those small things that I'm sure was said with only good intentions... but when she says 'if only you do it right', she right away stabs two knifes into the mommy heart... [...] We were actually really content with the visit, but that tiny comment overshadows everything when I now hear my wife talk about the visit (Filip, NBO). The weaknesses coded on WAI 'bond' in this father's interview, is emphasized as a relevant finding due to its lowest frequency of mutual coding on the NBO items/infant state and WAI/PSE, compared to the other interviews of fathers receiving NBO. This finding will be elaborated upon in the discussion below.

#### 5.2.2 "You know, I didn't really know the purpose of this visit..."

When asked what they considered to be the weaknesses with regards to the visit, nine (6 ordinary, 3 NBO) of the fathers expressed that they weren't sure of what to answer, because they did not know much of the visit's intention. Several also stated that they wished they could have been more prepared beforehand. "This is all very new to me... so I didn't' really have any expectations to it either" (Robert, NBO); "I really don't have anything to compare it with, to say it like that. So I don't feel that there were any weaknesses..." (Christian, ordinary). These responses prompted reflections with regards to opportunities and threats elaborated upon next.

### 5.3 Opportunities

# 5.3.1 "I don't think I have any foundation in claiming that things could've been done any differently..."

As elaborated upon under "weaknesses", lack of preparations and knowledge off the visits content and intention, led several fathers to reflect upon strategies the well-baby nurse could implement in order to

better prepare parents to the visit. "It would've been great to receive an agenda up front. Containing topics for discussion at the visit. That could've been an opportunity" (Filip, NBO); "I would've liked to know... just in a sentence or two, of the actual purpose of this visit..." (Magnus, ordinary). Propositions of examples on how to resolve this included suggestions that 1) the nurse could call or send an email in the day(s) before to ask if the parents had any special needs, or to present an outline of possible topics for discussion, 2) to provide the parents with an online platform that they could log on to and receive information 3) that the nurse initially at the visit verbally presented the agenda and a timeframe. This will be further elaborated upon under "threats" and "new themes" below.

### 5.3.2 "If there is anything to show... she really has the opportunity during that visit"

None of the fathers in the control group reported changes in attachment or closeness feelings in their relationship with their child post-visit. However, without prompted one said that he envisions that he could have grown more attached: "I feel that it could've happened, you know, if she would've said that I was important to him or something like that. But I can't remember anything like that" (Johannes, ordinary). The statements coded on MPAS in the interviews with fathers who received ordinary visit generally reflected enjoyment and longing to spend time with their child, not related to specific experiences at the visit, apart from a few statements which contents reflected grater calmness in hearing that they 'were important to their child' or something similar. A trend seen only with fathers receiving ordinary visit, was an expressed wish to talk in more practical terms about the child and/or their relationship with him or her. "I just thought she would've asked more how we managed things, if we are okay, or what routines we have implemented [...] provided us with more guidance... [At the hospital] I never got any practical guidance on how to handle him, or witness how it should be done" (Magnus, ordinary); "I honestly didn't learn that much about the child. I kinda missed topics relating to interplay and such" (Vegard, ordinary); "What I really want to learn more about is how to better understand him. But that's not realistic... that a nurse can teach us anything about that" (Johannes, ordinary). This last statement contains a reflection seen among a few other fathers in the ordinary group. Even though some of the fathers in this group uttered a wish to for the child to be more included in the visit, three stated that they considered the visit to be 'for the parents', and did not see a point in the child getting more attention from the nurse apart from the routine checks: "I necessarily don't think a well-baby nurse is in a position to teach me anything new about my child. Being it is the first time she met her" (Simon, ordinary) "[The child really doesn't need to be present] he doesn't understand anything of what's going on anyways" (Eivind, ordinary). By sum, fathers that received ordinary visits to an extent proposed for the nurse to further include their child, but also expressed somewhat ambivalence with regards to if this is possible in the current setting, and also if it is at all necessary.

#### 5.4 Threats

The majority of threats stated in both groups entailed coding on WAI subscales. However, fathers who received ordinary visits reflected more about these matters, with a considerable higher amount of stated threats on WAI were found in this group (71/98 statements, whereas 27/98 statements in the NBO group). The impression was that fathers in both groups struggled with reflecting upon threats (or limitations), as they did with weaknesses and opportunities. Their initial responses to a great extent were that they were not sure of what to expect, and therefore found it hard to reflect upon topics that could represent a threat to their experience of the visit. Another common answer was that they experienced the visit as mainly positive, and as such, no negative aspects could be considered. However, when prompted, frequent answers among fathers in both groups entailed aspects coded mostly on WAI 'bond' and 'goal'. Reflections regarding the use of less serious internet pages for information retrieval were also present.

# 5.4.1 "Actually, I'm a little unsure of what kind of services the well-baby clinic provides..."

Following the reflections with regards to their expectations to the well-baby visit under weaknesses and opportunities, fathers in both groups expressed an uncertainty about the visit's intention, and several reflected about how this influenced the degree to which the prepared themselves beforehand, but also the way they acted during the visit: "I'm not really sure if that visit is something I need to participate on, as father. I don't think we ever were asked about that, if I had to be there" (Magnus, ordinary); "Actually, I didn't know much of what it entailed, or what was going to happen" (Johannes, ordinary); "But of course, I don't know her competence either, and what she's able to answer" (Christian, ordinary); "I was kind of a bit unprepared" (Mathias, NBO)

### 5.4.2 "It's extremely person dependent..."

Most of the fathers stated that they experienced the visit as positive, but if they 'had to' reflect upon threats / limitations then this would entail aspects of the nurses personality, or their personal chemistry with her. They emphasized that this was only hypothetical, because they 'really experienced the whole thing as positive', but that the major factor contributing to this was their relationship with the nurse and her personality. "You're more vulnerable in your own home. It's sort of like a hybrid between a medical consultation and a friendly visit. Then the threshold for experiencing it as a trespassing is lower" (Mathias, NBO);"It might be considered hard to share our problems. If there's something with the child... that was wrong, and you're afraid that it's your fault. But the way she acted it felt kinda safe to talk about those things too..." (Vegard, ordinary); "A lack of that calm, friendly conversation... that would've ruined it for me. If it had been too clinical, it just wouldn't be comfortable" (Eivind, ordinary). The aspect of the nurse not being in a seemingly rush, but took her

time was – as presented under strengths – an important aspect in the fathers reflections of why they found it easy to 'open up' and share their thoughts and insecurities. All of the fathers in both groups stated that they experienced the nurse as 'taking her time' and several reflected upon some of the possible threats with regards to the 'growing use of a stopwatch in the healthcare system': "And if the nurse arrives, and is in a hurry, then I recon much of the communicative quality is ruined. Even though she still might be very professionally competent" (Marius, NBO); "Feeling that you're attended to, enhances you trust. This of course, will perhaps lower the threshold for initiating a future dialogue with the nurse. We at least, feel as though we wouldn't want to be of any nuisance". (Nikolai, ordinay)

# 5.4.3 "The authorities have entered your home to check if everything is okay..."

Another salient theme among the fathers was reflections with regards to having a 'stranger' visiting them at home. This was however not emphasized as a major theme, but rather mentioned as pre-visit reflections. Their actual (positive) experience of the nurse and the visit were predominant in their reflections, still many stated it as 'peculiar' or 'a feeling of being inspected': "Because it's kind of peculiar to have a represent of the state in your home... So it would be nice if she just briefly explains why she's there and what her intentions are" (Eivind, ordinary); "There's this public figure entering into your living room. Then there's something in you that really needs to be sure that this person only wants what's best for you. (Mathias, NBO); "It's still that feeling of being inspected..." (Erik, ordinary); "And I don't think it should be undermined that there is this authority figure that enters into your living room. She has a lot of formal power in that role, you know. That's why she perhaps is able to influence... and I think that's sort of important, that she uses that role..." (Marius, NBO).

Following the reflections of this last statement, of how the nurse should use her professional role, there also was an expressed wish and appreciation among fathers in both groups that the nurse should show her competence – through the topics discussed, body language and actions used at the visit – which is the topic in the following section.

## 5.4.4 "You need some clear professional competence that sort of cuts through all the noise..."

In an elaborative extension of suggestions on how to better develop the information material handed out to them (presented under "new themes" below), a salient theme in the fathers' reflections were how themselves or the mothers easily turn to random internet searching above more serious sources when in need of information. They reflect upon being aware of the potential risk this poses of finding information that is not scientific relevant, and calls for more easily accessible sources of knowledge based information. It was a general tendency among the fathers in both groups, on the one side to express a valuation of how the nurses' showed their professional competencies, and on the other side

devalue an experience of the nurse as not showing such competencies. "But often the problem is... that the information you find through using google, probably aren't what you should find... or want to find" (Magnus, ordinary); "When you're unsure about something, internet is sort of the easy way out. We probably should've used the books we got at the hospital instead" (Isak, NBO); "You know it's google massacre... [...] And what I care about, is that you sort of provide proper information about the things that there's a lot of information about. That [the nurse] is straight forward. Refer to research or something that provides you with a bit authority" (Erik, ordinary).

For the well-baby nurse to show her professional insight or knowledge was valued and proposed for by fathers across the groups. Though still keeping her 'warmth' and the 'openness to the parents needs', she should not become 'too laidback' or 'soft' in her expressions, but maintain a balance between the two, and let her talk be "straight-forward' and 'science based'. "It's important to me that it comes across as thorough... That her answers are anchored in scientific research, and I understand that the talk is in professional terms" (Simon, ordinary); "And when I'm talking about actual instructions, I mean like how much, how often. Don't start talking about how 'some people mean this, others this...', but be straight forward. It's similar to that of CPR. Don't give any circa number of heart compressions, just tell how many... I think we men like it like that" (Marius, NBO). Following this five fathers with ordinary visits expressed that although they experienced the 'open feel' of the visit as positive, to an extent it almost was 'too open', in that they almost felt as if the responsibility of filling up the consultations were on their shoulders. At the other end of the scale, a few fathers in the NBO group reflected about the importance of not 'putting anything more' into the visit, with the risk of 'losing some of the openness that was present'.

# 5.5 Salient stated SWOTs *not* mutually coded as MPAS, PSE, WAI or NBO items/infant state

A few topics were repeatedly stated on the SWOT dimension by fathers in both groups. First, the scope of the **information material** was mentioned as a weakness\_by several of the fathers. Only a few of the fathers stated that they found the material useful, most however stated the amount of brochures as a weakness: "She handed out <u>a ton</u> of papers and brochures... Can something be done about that?" (Mathias, NBO). Second, that the nurse presented a **concretized 'plan ahead'** including dates to future consultations, were a salient stated strength among several of the fathers in both groups. "Everything was sort of organized and prepared or the next six months. And for us, being sort of planning people with a lot going on, it feels good to get it down in the calendar straight away" (Eivind, ordinary). Four of the fathers elaborated a great deal about their **birth experience**, or other experiences at the hospital that had affected them negatively. All but one said that no one at the hospital had given them an invitation to talk about the birth and their experiences. None of them

reported to have received a visit from, or talked to a midwife, before the well-baby visit. Two expressed an additional well-baby visit from the midwife as an opportunity, for themselves, but also for the mother. Some expressed that they felt the nurse did not know enough about the birth and called for better information flow between hospital and well-baby clinic as an opportunity, whereas others expressed that this information had been transferred fluently, and that the nurse at the visit was up to date about their hospital stay.

### 5.6 Themes not captured by the initial template

The roughly 35 % (680) of the variance of statements not coded on the *a priori* categories entailed various statements in which contents' were detached from that of other participants or not emphasized by the participant, and hence excluded from further analysis. Apart from this, some were also captured as recurring new themes in the second part of the analysis. As described in the analysis section above, this part of the analysis revealed three themes that were self-initiated topics among several of the fathers in both groups. Similar to all of these themes were that they were highly prompted and shaped by the SWOT-questions.

#### 5.6.1 Expectations and degree of pre-knowledge

As somewhat elaborated upon in the analysis process, it was interpreted as though many of the fathers found it hard to reflect upon what they experienced as weaknesses, opportunities and threats. All reported the visit as positive, but as an extension of this evaluation many also stated that they were **not** sure of what to expect. With some this fuelled reflections regarding means that could have been implemented in order to better prepare them to the well-baby visit (opportunities), or how this lack of preparation or pre-knowledge influenced their experience of the visit (threat). Several of the fathers (6 NBO, 6 ordinary) had various degrees of reflections about the lack of pre-knowledge or expectations to the visit. These reflections were highly prompted by the question of weaknesses, and/or evoked further reflections when asked about opportunities and threats. As illustrated in the statements below, reflections with regards to lack of expectations and pre knowledge were typically linked to positive evaluations of the visit. "You know, it'was a positive thing... I had a really positive experience of the whole visit, really. But this is all very new to me, so I didn't really know what to expect of all this" (Fredrik, NBO); "Because I feel that the nurse that came was really thoughtful and caring, and helped us with everything we needed. I'm not sure how it could've been made any better" (Isak, NBO). As somewhat illustrated through the elaboration of the findings so far, this theme could roughly be divided into three different subthemes: Expectations with regards to 1) the well-baby visits' framework and content; 2) the nurses' professional competence; 3) what the well-baby clinic entails, and the services it provides. There were no salient differences between the two groups with regards to the lack of pre-knowledge and expectations. The theme of *expectations* were by several followed up

by reflections regarding online resources as an aim to gain better pre-visit knowledge, i.e. through web based pre-visit information about possible topics for discussion.

#### **5.6.2** Online resources

A salient theme among the fathers were various degrees of reflections about online resources. As mentioned above, through the use of SWOT, these additional categories could be structured either as a strength, weakness, opportunity or threat. This implied that statements themed 'online resources' could contain various meanings when simultaneously coded as opportunity or threat, as in the following examples:

(Opportunity)"And another thing, do you know of questback... and other simple web based resources? We use it at my work... and it would have been something to consider in order for the nurse to continually evaluate her own performance after each visit. You know... her professional competence, appearance and so on. Just general comments..." (Marius, NBO)

(Threat) "But often the real problem... is that the information I find [through googling], perhaps isn't the sources I should find... or want to find." (Magnus, ordinary)

How the use of online resources represents a threat, were elaborated upon above through the extended use of "googling" and wanting for a more science based and professional counterpart in the nurse at the visit. As an opportunity, several of the fathers suggested different uses of online resources in order to better ease the flow of information, and to improve the quality of the services delivered from the nurses' individually and the well-baby clinics in general: 1) to create a more user friendly and professional home page, in order to make the information material handed out at the visit more online based, because 'when in need for information, you use the internet any way': "And the clinic's new webpage is totally hopeless. They've sort of removed a lot to start on scratch. So then there's all these holes, and a lot of information is missing" (Magnus, ordinary); "Is there a webpage called 'helsesøster.no' or something? [...] You know, because your whole life is revolves around information acquisition through the internet..." (Marius, NBO); "Why in the world does a child get a health card in 2016? [...] A digital health card at the well-baby clinic would work just as good" (Erik, ordinary)... As illustrated above, 2) to develop a questback solution that the parents could use to evaluate the nurses' performance or other aspects of the visit so that the 'clinic may continually improve and develop their services' based on the feedback; 3) to introduce the child's "health card" (helsekortet) digitally, with log in opportunities for the parents to keep track of their child's development, instead of the paper based solutions that is presently used; Some of the fathers reported that they experienced the information flow between the hospital and the clinic as lacking, with the nurse not being properly informed about their birthing experience, hence they proposed for 4) the development of an online

journal, that could make it possible for the nurse to more efficiently retrieve information about the birth pre-visit. There were no salient differences between the two groups with regards to the theme of 'online resources'.

#### 5.6.3 Practicality preferences

This theme included statements were the participants are referring to a focus on tangible, concretized, and practical aspects, processes and advices. Simultaneous coding on the SWOTs made it possible to structure the data for scrutinizing along both past-present / inherent in the visit (strength and weaknesses) or plausible aspects or personal preferences (opportunities and threats). "Apart from all these 'soft' values... I consider it a strength that she also had this sort of checklist, in that she preformed all of these tests... regarding weight ... and hearing. And all the other things" (Filip, NBO); "Well, it was kind of a practical setting, and I think that's exactly what we needed. To get sort of tangible advices relatable to breastfeeding and nursing and things like that" (Daniel, ordinary). As illustrated by the examples above, fathers in both groups explicitly stated that they regarded practical procedures and specific advices as strengths with the visit. In addition, a salient theme among several of the fathers in the NBO group was reflections about how they experienced the 'balance between clinical examination and trust building' as a strength: "It is very okay to have things that are concretized, a "list" that you can check off. Then you know that you're doing your job... 'Okay, this is what I have to do'. Especially because in the beginning there's no routines at all, with anything. Everything sort of just floats" (Andreas, NBO): As somewhat apparent through the presentations of the findings so far, there were some salient differences between the two groups with regards their reflections about practicality preferences, with fathers receiving NBO expressing appreciation of the structure the 'clinical assessment' method brings into the visit, combined with how the nurse handles the child and presents the child to them. Although experiencing the visit as equally positive, fathers receiving ordinary visits to some degree called for more structure and a few also proposed for a higher degree of physical inclusion of the child, 'not just talking' about it.

### 6 Discussion

The following section is divided in five. First, the main results will be discussed in light of theory and existing research. Second, complimentary considerations of the suitability of the NBO in well-baby visit practice are presented. Third, limitations with regards to methodology are discussed, including reliability and objectivity considerations. Fourth, final reflections regarding researcher reflexivity and validity issues are considered, followed by implications for future research.

### **6.1** Discussion of the main findings

# **6.1.1** Becoming a father for the first time: A triadic approach to the father-infant relationship

Nyström and Öhrling (2004) found that salient themes in new fathers' reflections about their paternal role were 1) being confident as a father and as a partner; 2) living up to the new demands causes strain; 3) being prevented from achieving closeness to the child is hurtful; and 4) being the protector and the provider of the family. The unifying theme for these categories was 'living in a new and overwhelming world' (Nyström & Öhrling, 2004). An interesting finding is that despite the fathers' lack of elaboration upon the mothers' experience of the NBO, the mothers' level of stress and insecurities seemed to be of great importance to them, and for one father even seemed to overshadow their own experience of the well-baby visit: Many of the fathers state that because the mother felt more reassured and calm after the visit, they too felt calmer: 'If she's calm, I am calm'. A few similar studies conducted with mothers' experiences of the NBO, the mothers' reflections revolve around descriptions of the fathers (if he was present during the NBO) showed positive engagement and fascination when witnessing the eliciting of the items, and that he perhaps experienced gaining an 'arena in where he could be of equal importance to his child' (Cheetham, 2011, p. 56). The difference between mothers' reflections upon the father's experience of the NBO, and fathers' (lack of) reflections upon the mother's experience is interesting. In his definition of the 'motherhood constellation', Stern (1995) proposes that the first theme concerns a preoccupation of the baby's development, the life-growth theme, which truly is reflected through the fathers' statements: 'just to be reassured that everything is okay...' Preoccupations with the baby's weight and his or her well-being fall under this theme. Such a salient expression of mothers' wellbeing may entail an impression that her wellbeing is essential to the baby's wellbeing or *life-growth*, 'being that she is the one who has the food in this early phase'. This focus is also similar to Nyström and Öhrling's (2004) theme of 'being the protector and provider of the family'. Willingly embracing advices from the nurse such as 'taking care of everything all the practical chores' so as to free the mother to focus on nursing the child, further supports this view. By contrast to that of mothers, who enters into a dyadic relationship with their new infant (Stern, 1995), the findings in this sample therefore might suggest that new fathers experience their early relationship with their child as triadic, considering the mothers presence in the triad as essential for infant development (survival).

#### 6.1.2 The impact of perceived nurse-parent working alliance

Working with parents and their children in the newborn period demands a great degree of tenderness, humble attitude and respect toward the new relationships and family system that is establishing (Slinning & Sandtrø, 2016). Psychologically the openness in this period represents an intervention 'touchpoint par excellance' (Nugent, 2015), but it also entails high degree of vulnerability

(Slinning & Eberhard-Gran, 2010). This became salient with the father receiving NBO that experienced his wife becoming negatively preoccupied with one comment from the nurse that 'I'm sure were meant well, but that overshadows everything'. This father had the least amount of statements coded on NBO /infant state in his group, although giving a interview that lasted over an hour, reflecting to great extent about other matters. The findings show that the perceived quality of the relationship with the nurse was the greatest contributor to how the visit as a whole was experienced – among fathers in both groups. How this potentially influences the fathers perceptibility of the NBO guidance is illustrated by the example above.

#### 6.1.3 Valuing the nurses' physical handling of the child

A salient difference between the stated experiences of the fathers in the two groups, were with regards to how the nurse physically involved the child in the procedural steps of the visit. When asked to provide an example that illustrates why he considers the nurse to be a role model in the way she handled the baby, one father in the NBO group talks about the interaction between the nurse and the child while she's placing her on the weight: 'When she laid her on the scale, she talked to her, sort of were in the present and gained eye contact with her'. What makes this statement is interesting, is that this isn't specifically related to any of the 18 observations in the NBO method. All the babies (except one), in both groups, were weighed during the visit. Even so, not *one* of the fathers in the group receiving ordinary visit has statements reflecting a positive experience with the way the nurse physically handled the baby. Rather the opposite, in that some of them called for a higher physical involvement of the child. During a seminar for NBO-trained professionals aimed at sharing clinical experiences (NBO-seminar RBUP, 2016), several of the professionals present reported the experience of wearing a "NBO-lens" that shaped the way they saw both the baby and the parents, and influenced how they behaved and preformed their tasks. It was stated that 'this lens is impossible to remove'. This has later been repeated by other NBO-trained professionals (Slinning & Sandtrø, 2016). Following this, it seem as though you cannot not perform NBO if you are trained in it. This example illustrates how the use of NBO-trained nurses during well-baby visits, may possibly enhance the relational quality of even routine tasks, such as weighing the baby. 'She personified the situations (...) It actually means that she understands us as a unity, that it's not just theory but truly enacted'. Nugent (2015) argues that the specific challenge for the NBO trained clinician is to develop her own capacity for embodied mentalizing – putting the baby at center stage and becoming his or her 'voice', in order to make it possible for the parents to recognize their baby's communication repertoire. A few of the fathers expressed higher mentalizing abilities post-visit, shown trough reflections of the infant's internal affective state, whereas most of the fathers in the NBO group to a greater extent referred to learning specific 'tips and tricks' that they could implement when interacting with the infant.

#### 6.1.4 "So it's kinda like ABC in baby technique..."

Nugent (2015) describes the optimal implementation process of the NBO to that the 'individual elicited items disappear, so to speak, and that the baby is revealed, so that the items of the NBO are mere scaffolding, which supports the emergence of the baby as a person' (p. 5). This were only to some extent visible in the fathers interviews. The fathers in the NBO group vary between referring to their child as 'the baby / the child' and in more personalized tones 'her / him' when expressing how they experienced the eliciting of the NBO items. The statements mainly seem as though to entail fascination of their child's revealed abilities and individual traits, however to a less degree reflecting about the infant's intersubjective abilities or affects. The fathers are more "instrumental" in their descriptions of strategies they implement in order to understand the baby, rather than verbally reflecting about his or her internal states. It is well illustrated through the statement of one of the fathers, that it was similar to 'ABC in baby technique'. The findings show that the fathers receiving NBO expressed higher behavioral parental self-efficacy, than affective selfefficacy, suggests a more technical approach, were external behaviors and cues are responded to without perhaps giving the underlying affects or intersubjective processes to much evaluation. This more 'instrumental' approach bears similarity to the practicality preferences emerging as a salient theme. This implicates that well-baby nurses perhaps should include more concretized aspects in their consultations, in order to create greater positive engagement by fathers.

### **6.1.5** Parental confidence and perceived parental self-efficacy

Fathers in both groups equally report higher post-visit general feelings of parental confidence: 'After that visit I felt generally calmer and more comfortable with attending to my little girl'. Apart from reassurance on their child development, the fathers confirmation from the nurse that they had 'done a good job' were expressed as a salient strength. This suggests that general reassurance on parental abilities goes a long way in building parental confidence in this sample of new fathers. However, de Montigny and Lacharite (2005) suggest that although related, parental *confidence* and *self-efficacy* actually entail slightly different conceptualizations. Parental confidence is a 'non-descript term that refers to the strength of belief but does not necessarily specify what the certainty is about' (Bandura, 1997, p. 392). By contrast, self-efficacy entails personal judgments and beliefs on how to *organize and execute a set of situation specific tasks* related to parenting a child (as defined in the theoretical framework) (de Montigny & Lacharite, 2005). In this light, one could argue that the fathers in the NBO group reports higher expressed parental self-efficacy, in that they explicitly provide examples of specific "tasks to organize" as well as the actual strategies they would implement, whereas fathers who received ordinary visit only report general feelings of calmness reassurance in their parental role – or parental confidence.

#### **6.1.6 Information flow**

Most of the proposed opportunities with regards to the flow of information and online resources has already been implemented, or is in the process of implementation. The webpage <a href="https://www.helsestasjonstjenesten.no">www.helsestasjonstjenesten.no</a> was introduced a few years ago, and contains user friendly and easily accessible information for both parents and professionals with regards to the services of the well-baby clinic, relevant information about the prenatal and postpartum periods, child development 0-5 years etc. A digitalized version of the "health card" is also under development (Jordmorforbundet NSF, 2017). Some of the fathers expressed a need to talk about their birth experiences, and called for better transfer of information between the hospital and the clinic. However, an e-based journal (kjernejournalen) containing all relevant health based information of individual persons is in the process of national implementation (helsenorge.no/kjernejournal). A future topic of discussion is perhaps how, and to what extent the well-baby clinics will implement this in their routines.

#### 6.1.7 "But all in all, I was content"

"Perhaps I would've asked more myself, but I felt that everything was covered... You know, I don't really know what kind of competence she's supposed have either... and what kind of questions she's able to answer. <u>But all in all, I was content.</u>" (Fredrik, ordinary)

Although displaying a greater richness in their SWOTs, the fathers in the NBO group did not report a greater contentment of the visit. Fathers in both groups report to have got their questions answered, combined with an impression of the nurse ad their relationship with her as mainly positive. A recurring trend was however that they for the most part were not sure of what to expect of the visit or the nurse. And without any previous knowledge or expectations, the threshold of contentment may have seemed. Their positive impression of the nurse then became the benchmark of their experience of the visit, to a degree combined with the experience of having received adequate answers to their questions and worries. Hence, well-baby visits with the NBO does not necessarily seem to make the fathers in this sample generally *more* content with the visit. However, the NBO does *add* something qualitatively different to their experiences, with the fathers in this group entailing a higher actual perceived parental self-efficacy and expressed knowledge about their infant' individual competencies.

## 6.2 Complimentary considerations

It has been argued that the NBO is particularly suitable for midwives and nurses at well-baby clinics because it is integrates well with how they normally perform their clinical work (Slinning & Sandtrø, 2016). A complete NBO will normally cover most of the themes that is recommended covered at routine well-baby visits or in the early consultations at the clinic (Sosial og helsedirektoratet, 2003). Studies have shown that the NBO is experienced as a positive way of conducting consultations, and

clinicians have reported that it has helped them create a good relationship with parents (McQuiston, Kloczco, Johnson, O'Brian, & Nugent, 2006), as well as given them greater confidence in their work (McManus & Nugent, 2014).

In 2014, The Norwegian Directorate of Health published new national guidelines for professional care in the postpartum period ("Nytt liv og trygg barseltid for familien"; Helsedirektoratet, 2014). These acknowledge the existence of methods for which health care professionals may teach parents to understand and adjust their care giving to the infant's signals (p. 29). However, the effect of specific methods is not considered, nor which methods would be most suitable in a Norwegian setting (p. 29). The guidelines further advise that measures should be taken in order to investigate this. In a response to a consultation draft of the new guidelines sent out on official hearing pre-publication, it was noted that the mentioning of fathers (or partners) in the guidelines for the most part was limited as a supporting factor for the mother and/or infant (Reform, 2012).

Even though there are divergent results with regards to the effect of the NBO on parent-infant interaction in *low-risk* populations, arguments are proposed for the implementation of relationship-based methods such as the NBO on the bases that it may further enhance the clinical relationship to, and the professional trust in, the well-baby nurse, as well as a greater involvement of the father in the home visit's clinical dialogue (Slinning & Sandtrø, 2016). There should be no doubt that most parents in low-risk populations develop positive interactions with their children regardless of interventions targeting this. However, the findings in this study suggest that the knowledge about the infant's abilities and communicative competence promotes this in an *early phase* of the parent-child relationship that without NBO might have been initiated at a later stage.

# **6.3** Strengths and limitations of the present study

#### **6.3.1** Methodology

The methodology chosen in the present study does not fully capture the full depth in the fathers' experiences. There is a complexness of the material that perhaps will lead to other, more nuanced findings if coded differently or analyzed i.e. phenomenological. Saldaña (2013) argues that the different means taken in the coding of data will highly influence the interpreted findings, and that one should exercise caution when applying provisional coding, pointing out that 'your preconceptions of what to expect in the field may distort your objective (...) of what is "really" happening here' (p.146). One should therefore always be careful not to proclaim a high degree of assertiveness in the conclusions reached. However, the specific methods were chosen fully aware of the following limitations, as elaborated upon in the analysis section above. It is argued that the aims and objectives of the present study were properly framed and clarified in the research questions and introductory part of this report. Hence, although acknowledging the limitations with regards to how the methodology

chosen shapes the material and the subsequent interpretations of the fathers experiences, the findings still holds value as relevant: In a realist framework, peoples' cognitions are seen as *real* – as a part of reality in the same manner as physical objects (Maxwell, 2012). Hence gaining access to these processes through qualitative enquiry is considered as opening up a possibility to interpret causal relationships – as objects of reality, mental processes can take part in causal relationships. Apart from exploring first time fathers experiences with regards to the *a priori* themes derived from the theoretical framework of the NBO, the design of the study in utilizing SWOT-methodology to greater extent catches the mental processes involved the fathers' evaluations perhaps not other wised captured, through their struggles with answering the questions.

#### **6.3.2** Reliability and objectivity

Within a realist framework, *triangulation* can be used to assess the reliability of qualitative analysis (Madill et al., 2000). Triangulation refers to the use of multiple research methods, researchers, sources or theories in order to assess the consistency of the findings. Maxwell (2012) points to how triangulation reduces the risk that the conclusions reflect only the systematic biases or limitations of a specific source or method, and allows for a wider and more secure understanding of the issues investigated. This study entails several limitations with regards to reliability. Although somewhat controlled by another researcher, only one coder completed the coding process. In addition, the interviews transcriptions were not cross checked with the participants, nor any implementation of follow up interviews. The possibility to *observe* the fathers behavior at the visit – in addition to the post-visit interviews conducted in this study – would perhaps better have enabled some inferences about their experience of the visit, perhaps not obtainable by relying solely on the interview material. By sum, this study entails a risk of researcher bias. In order to confront this risk, continual attempts were made to maintain researcher reflexivity throughout the research process.

## 6.4 Researcher reflexivity

It is argued that actual lived experience never can be fully grasped in its immediate manifestation, but that reflexive analysis allows the researcher to have an ongoing conversation about the experience while simultaneously living the experience (Hertz, 1997): She becomes *aware* that she is experiencing the world. Following this, Finlay (2002) argues that these essentially subjective obstacles to an objective research process, through researcher reflexivity actually can be a valuable tool to promote rich *insight*; examine the *impact* of the position, perspective and presence of the researcher; *evaluate* the research process; and *enable public scrutiny* of the integrity of the research through offering a methodological log of research decisions. This concerns not only reflexivity, but is essentially linked to the transparency of a research report which entails how well the reader is presented with the steps taken in the process (Finlay, 2002). Considerations regarding researcher reflexivity were presented

initially, as well as occasionally throughout this report. These continual reflexive evaluations made me increasingly more aware of my own impact upon the data collection, choices made in the analysis, and interpretations of the findings. Although being a potential threat to reliability and perhaps validity of the conclusions reached, my position in the research process is still relevant in that I myself enters the scene as an actor, playing an individual part in the mutual exchange of mental processes, both with the fathers directly when interviewed, but also through the organization and interpretation of their stated experiences after hand. As so, from realist point of view, am I not only exploring the fathers' mental processes from the outside, but also exploring my own role in these processes. A role that would have had different consequences for these processes had it been played by someone else. Through my reflexive reflections throughout this report, I am inviting the reader in to watch and evaluate how I played my part.

### 6.5 Implications for future research / clinical work

The sample of fathers in this study had relatively high socio-economic status. As so, they were considered to be part of a non-risk population, entailing buffering factors such as stable relationship dyads with the mother and high education. Although studies have been conducted internationally on home visit interventions with an aim to enhance the quality of the father-infant relationship in *medium* or *high risk-populations* (Sierau et al., 2012). More research is still needed on this population in the Scandinavian countries in general, and with NBO in particular: Expectant fathers have shown greater intuitive parenting behavior when they possess a greater amount of human capital and more progressive beliefs about parent roles (Schoppe-Sullivan et al., 2014). In being a method that supports the intuitive parenting of parents, the NBO could potentially prove to have a greater impact on fathers with lower human capital in medium to high-risk populations. This should be explored further.

Future studies could also take advantage of the use of focus groups in order to better create a climate for prompting participants' reflections (Jansson, Petersson, & Uden, 2001).

# 7 Conclusions

The direct assessment of fathers, rather than a reliance on maternal report on fathers' involvement with children, is becoming an increasingly standard research protocol (Bocknek, Hossain, & Roggman, 2014). In this regard, the current study has been a contribution to this growing body of research. Getting fathers involved early creates better foundation for positive developmental spirals. The fathers in the current study stated that they were equally content with the well-baby visit, but comparison of their evaluations showed that the fathers receiving NBO expressed higher perceived parental self.-efficacy, entailing a greater understanding of infant cues and which strategies to implement in order to best respond to these cues. By conclusion, the findings in this study suggest that the Newborn

Behavioral Observation method is well suited in the setting of well-baby visits, but that the main contributor to the fathers' perceptibility of the contents of the NBO still is perceived nurse-parent working alliance, in which quality were the most essential in all the fathers' experience of the visit as positive.

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## **Attachments**

#### **APPENDIX A:**

Consolidated criteria for reporting qualitative studies (COREQ): 32-item checklist (Tong et al., 2007)

No. Item	Guide questions/description	Reported on Page #
Domain 1: Research team and reflexivity		
Personal Characteristics		
1. Interviewer/facilitator	Which author/s conducted the interview or focus group?	Methods
2. Credentials	What were the researcher's credentials?	Master student

	E.g. PhD, MD	
3. Occupation	What was their occupation at the time of the study?	Preface
4. Gender	Was the researcher male or female?	Female
5. Experience and training	What experience or training did the researcher have?	Preface / methods
Relationship with participants		
6. Relationship established	Was a relationship established prior to study commencement?	Methods
7. Participant knowledge of the interviewer	What did the participants know about the researcher? e.g. personal goals, reasons for doing the research	Methods
8. Interviewer characteristics	What characteristics were reported about the inter viewer/facilitator? e.g. Bias, assumptions, reasons and interests in the research topic	Methods
Domain 2: study design		
Theoretical framework		
9. Methodological orientation and Theory	What methodological orientation was stated to underpin the study? e.g. grounded theory, discourse analysis, ethnography, phenomenology, content analysis	Aims and objectives
Participant selection		
10. Sampling	How were participants selected? e.g. purposive, convenience, consecutive, snowball	Methods
11. Method of approach	How were participants approached? e.g. face-to-face, telephone, mail, email	Methods
12. Sample size	How many participants were in the study?	Aims / Methods

13. Non-participation	How many people refused to participate or dropped out? Reasons?	Methods
Setting		
14. Setting of data collection	Where was the data collected? e.g. home, clinic, workplace	Methods
15. Presence of non- participants	Was anyone else present besides the participants and researchers?	Methods
16. Description of sample	What are the important characteristics of the sample? e.g. demographic data, date	Methods
Data collection		
17. Interview guide	Were questions, prompts, guides provided	Methods,
	by the authors? Was it pilot tested?	No pilot
18. Repeat interviews	Were repeat inter views carried out? If yes, how many?	N/A
19. Audio/visual recording	Did the research use audio or visual recording to collect the data?	Methods
20. Field notes	Were field notes made during and/or after the inter view or focus group?	Methods
21. Duration	What was the duration of the interviews or focus group?	Methods
22. Data saturation	Was data saturation discussed?	Methods
23. Transcripts returned	Were transcripts returned to participants for comment and/or correction?	N/A
Domain 3: analysis and findings		
Data analysis		
24. Number of data coders	How many data coders coded the data?	Methods
25. Description of the coding tree	Did authors provide a description of the coding tree?	N/A

26. Derivation of themes	Were themes identified in advance or derived from the data?	Theoretical framework / Methods
27. Software	What software, if applicable, was used to manage the data?	Excel
28. Participant checking	Did participants provide feedback on the findings?	N/A
Reporting		
29. Quotations presented	Were participant quotations presented to illustrate the themes/findings? Was each quotation identified? e.g. participant number	Findings
30. Data and findings consistent	Was there consistency between the data presented and the findings?	Findings
31. Clarity of major themes	Were major themes clearly presented in the findings?	Analysis / Findings
32. Clarity of minor themes	Is there a description of diverse cases or discussion of minor themes?	Findings

### **APPENDIX B:**

# **APPENDIX C:**

**APPENDIX D:** 

**APPENDIX E:**