



## Review

# What about fathers? A review of a fathers' peer support group on a Neonatal Intensive Care Unit

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## ABSTRACT

The following presents the findings of a small-scale pilot study to investigate fathers experiences of attending a support group on the Neonatal Intensive Care Unit at Addenbrooke's Hospital, Cambridge. The group was set-up in January 2018 to enable a safe and supportive space for fathers with a baby on the neonatal unit. Emerging themes are discussed, including the value of the shared group experience, enjoyment and feelings of validation and inclusion of being an active family member. Implications for future clinical practice are addressed, with recommendations for other neonatal units that may be considering running such groups.

## 1. Introduction

The following presents the findings of a small-scale pilot study to reflect on the experiences for fathers attending a peer support group on a level three Neonatal Intensive Care Unit (NICU). This is a pilot study as this group was novel to the unit and the design was considered to be appropriate in terms of ascertaining the usefulness of a fathers group, with the view to conducting a larger scale study thereafter. The group was run on a 42-bed tertiary NICU at Addenbrooke's Hospital, Cambridge.

Parents with babies who require admission to a NICU can experience a range of psychological distress, including posttraumatic stress symptoms, low mood and anxiety (Miles et al., 1992; Jackson et al., 2003; Carter et al., 2005; Roque et al., 2017; Winter et al., 2018). There is an abundance of research investigating the impact of having a baby on NICU for mothers (Davis et al., 2003; Woodward et al., 2014; Davila and Segre, 2018; Geller et al., 2018; Vinall et al., 2018; Lotterman et al., 2019). Research suggests that mothers on NICUs are given more attention compared to fathers (Wereszczak, Miles and Holditch-Davis, 1997; Holditch-Davis and Miles, 2000; Adama et al., 2017; Valizadeh et al., 2018). However, there is a dearth of research regarding the psychological implications of having a pre-term baby on the NICU for fathers (Sullivan, 1999; Lundqvist and Jakobsson, 2003; Pohlman, 2005; Lundqvist et al., 2007; Fisher et al., 2018).

Studies have found that fathers with a baby on NICU have felt that the emphasis of care is on the mother, causing them to feel that their needs are insignificant (Jackson et al., 2003; Lindberg et al., 2007; Hollywood and Hollywood, 2011; Adama et al., 2017). Due to this, some fathers may be less engaged in their baby's care during their visits to the NICU (Frank and Spencer, 2003; Jackson et al., 2003; Johnson, 2008). The literature suggests that fathers of pre-term infants are more

vulnerable to experiencing psychological distress compared to fathers with term infants (Rimmerman and Sheran, 2001; Cyr-Alves et al., 2018; Prouhet et al., 2018). Sloan, Rowe and Jones (2008) found that fathers on the NICU experience high levels of emotional exhaustion, suggesting that fathers are in need of emotional support.

Fathers on NICUs are likely to experience high levels of stress, social isolation (Kim et al., 2016) and traumatic stress symptoms (Lasiuk et al., 2013; Alexander et al., 2016). Despite this, research suggests that they are unlikely to seek help and support (Thomson-Salo et al., 2017). Findings from previous studies have highlighted that NICU fathers have reported to feel excluded in comparison to mothers, and have been described as the 'forgotten parent' (Arnold et al., 2013; Thomson-Salo et al., 2017). Most NICU fathers often feel pressured to being "the strong one" (Fisher et al., 2018). They feel under pressure to continue with life outside of NICU, such as returning to work and managing care of other siblings. This can lead to difficulties visiting their new-born on NICU, therefore exacerbating cycles of feeling stressed, as well as being isolated from their partner and infant/s (Wong et al., 2015).

Matricardi et al. (2013) evaluated the effect of a parents stress reduction programme and concluded that fathers needs were different from those of mothers. The authors concluded that further research is needed to explore interventions which consider the needs of fathers, as limited research exists on this. There are few studies which have examined the use of peer support groups for fathers on the NICU and the usefulness of this.

### 1.1. Parental support groups

Social support is considered to be a protective factor against psychological distress for parents with a child in hospital (Coppola et al., 2013; Carty et al., 2018). Bragadottir (2008) found that fathers who

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had taken part in peer support groups reported that they were a helpful experience which also brought them hope. Jones and Neil Urban (2003) also found that fathers reported benefits of the opportunity to share their experiences with others and that they particularly valued information and advice sharing with one another.

Hall et al. (2015) suggest that the emotional and social support for families is essential for parents with a baby in a NICU. The authors also note that parents of NICU babies will be more prepared for their NICU experience if they have emotional support, particularly if the support comes from other parents who have been through a similar experience. Peer support groups for parents in the NICU offers a shared experience in which parents can relate to one another, and can foster a sense of safety and comfort. Peer support groups in a NICU can enable parents to share their fears and seek validation from one another (Bracht et al., 2013; Taheri et al., 2018; Sabnis et al., 2019). Fisher et al. (2018) suggest that neonatal units should encourage emotional support for fathers, including the opportunity for them to attend peer support groups.

This NICU fathers group at Addenbrooke's Hospital was developed in January 2018 following a father's reported experiences of how "forgotten" and "left out" he felt during his baby's admission during a session with the NICU clinical psychologist. Further to this feedback, the NICU clinical psychologist sought to set up a fathers only support group. The NICU clinical psychologist is female and made the assumption that fathers may be more inclined to attend with a male facilitator to run the group. These assumptions were discussed with the wider NICU clinical psychology team (all female) and NICU team (mixed genders) and it was decided that the inclusion of a male co-facilitator could be useful in terms of recruitment for the fathers group. This led to the clinical psychologist utilising the help of a male hospital chaplain to co-facilitate this group. There were no issues reported by the fathers concerning the fact that the male chaplain was a religious leader and this did not appear to impact on group attendance or participation.

## 2. Method

The NICU at Addenbrooke's Hospital has 12 rooms ranging from intensive care, through to high dependency rooms and special care baby units. The NICU is affiliated with the Sick Children's Trust who offers eight rooms for families to live in during their baby's admission. These rooms are offered on a need by need basis. Therefore, a limited number of parents with a baby in our NICU are able to sleep within close proximity of their infant.

Posters to advertise the group were put up across the NICU to promote fathers to attend and leaflets about the group were left by the cot side. The nursing team and neonatologists also encouraged fathers on the unit attend the group. The NICU breast-feeding specialist who runs a weekly 'Cake and Chat' group, where fathers were welcome to attend, also promoted the fathers-only group. The group offered snacks, including pizza and cake, for the fathers.

A total of 40 fathers attended groups between January and October 2018. The number of fathers per group has varied, with overall numbers averaging as 4 per group. During the time of the study, only one group has been cancelled due to no attendance. The fathers who have attended have all actively had a baby in the NICU at Addenbrooke's Hospital at the time of attending the group. All participants attended at least one group. Groups were held in NICU, either in the 'quiet room' (a room in the NICU dedicated to parents and staff to use for time out), or in the 'parents room' (a room in the NICU for parents to use to make food, or to relax in). Groups were offered twice per month (one during lunch time from 1pm to 2pm, and the other after working hours from 6pm to 7pm). Sessions were led by the NICU clinical psychologist and co-facilitated by the hospital chaplain. There were no exclusion criteria.

As this was a small-scale pilot investigation and not a formal research study, the sessions were not audio recorded, nor was

demographic data of the fathers and their baby collected. In order to review the effectiveness of the group, fathers were asked to complete a semi-structured feedback questionnaire which was created by the clinical psychologist in order to establish their experiences of attending the group (see Appendix one). The questionnaire was based on the findings of research read by the clinical psychologist in terms of establishing the importance of how best to meet the needs of NICU fathers (Jackson et al., 2003; Lindberg et al., 2007; Sloan et al., 2008; Hollywood and Hollywood, 2011; Matricardi et al., 2013; Adama et al., 2017). As such, the questionnaire is not a validated measure and was therefore created by the clinical psychologist out of curiosity for how best to meet the needs of NICU fathers at Addenbrooke's Hospital.

The feedback questionnaire asked fathers to say what they found helpful or unhelpful about the group, which parts of it stood out to them, and what it was like to share their experiences with other NICU fathers. At the end of each group, the facilitators would meet to debrief about the emerging themes from the group and once the facilitators agreed on the themes, the chaplain would write these up as a brief summary. The debriefing process after each group helped the facilitators to discuss their understanding of how the group went and to reflect on what they both felt went well and less well.

Data from the feedback questionnaires and the notes taken by the two facilitators at the end of each group were analysed and interpreted by the current author. The current author read through the data from the feedback questionnaires and notes taken from the group a number of times. An excel spread sheet was used in order to record the data, and in highlighting the common patterns and themes from the data. This process enabled the current author to conduct thematic analysis by coding and categorising key words and emerging themes, as well as reviewing and defining the themes (Braun and Clarke, 2006). Thematic analysis was chosen by the current author in order to identify core patterns and themes from the data in order to interpret and make sense of the needs of NICU fathers (Clarke and Braun, 2013; Vaismoradi et al., 2013).

## 3. Results

Four core themes emerged from the thematic analysis:

1. Duration of stay on the unit as a coping mechanism.
2. Pressures of needing to be "the strong one".
3. Feelings of helplessness.
4. The value of the shared experience from meeting other fathers on the NICU.

### 3.1. Duration of stay on the unit as a coping mechanism

When the fathers first attend the group, it is likely that they do not know each other. The facilitators thank the fathers for attending and ask them to share their story of their NICU experience if they feel able to. This then generates conversations about the other father's experiences on the NICU thus far. Fathers reported that they have valued having a male facilitator present at the group, as it helped them to feel more comfortable and at ease.

A particularly powerful theme from the group was when there was a mixture of fathers on different NICU journeys in terms of length of stay. For example, in one group, there was a father whose baby had just been admitted 24 h prior to the group. During the same group, there was a father with a baby who had been on the unit for several weeks and was soon to be discharged home. The father with the baby who had just been admitted reflected on how powerful it was to hear the other 'longer term' fathers talk about their NICU journey. They were able to share what helped them to cope in order to get through the NICU experience, which led to feelings of "hope" in terms of getting through it, as well as giving themselves "permission to be vulnerable".

### 3.2. Pressures of needing to be “the strong one”

Another common theme, which emerged from the group, was the expressed isolation, in terms of fathers feeling the need to be “the strong one”. Some of the fathers described being “the one who holds everything together” and that this can often feel “like living between two worlds”. Other fathers reflected on the challenges of having other siblings at home to look after. This led to discussions about worries about how they will balance visiting their baby in NICU, alongside looking after other siblings, managing their job and looking after the family home.

### 3.3. Feelings of helplessness

A common theme discussed in the group relates to feelings of helplessness. The NICU fathers reflected on how hard it was for them to witness their partner experiencing a traumatic birth, and not feeling able to help or protect them during those moments. Some of the fathers talked about not being able to be at the birth due to their partner needing a general anaesthetic, and how hard this was for them in terms of not knowing what to do during the waiting moments. The fathers expressed feelings of guilt around leaving their partner to visit their baby in NICU, and vice versa, and how “stuck” they felt in terms of not knowing who to be with when their partner would be at one end of the hospital and their baby in the NICU at the other end of the hospital. Some fathers shared stories of the helplessness they experienced due to the difficulties they and their partner experienced on the lead up to their baby’s admission to NICU. This has included stories of difficulties conceiving, previous miscarriages and previous neonatal deaths.

### 3.4. The value of the shared experience from meeting other fathers on the NICU

One of the main themes, which have emerged from the thematic analysis, was the overall shared experience of meeting other NICU fathers. The NICU fathers described the group to be powerful in that “Listening to other dads stories of their journey so far, was reassuring that you’re not alone”. The shared experience of meeting other fathers in a similar situation was particularly helpful, stating that “It’s good to meet dads that have been here a while and who have already gone through the same experiences”. The fathers felt that “It was encouraging to hear other stories/experiences of having a baby in NICU” and “I really enjoyed meeting other dads in the same situation as myself”.

The NICU fathers expressed enjoyment from the opportunity to meet others in that “It was nice to speak to other dads about their experiences” and “It was a nice hour to meet other dads in similar situations”. The fathers described how positive the group was, due to the chance to “have a laugh and share stories”. Some fathers said that “It made me feel good” and “It is good to share experiences”. Those who attended reported that “It helped me and helped others” and “It was good meeting unfamiliar faces that you can now connect with”.

The group appeared to be empowering for fathers in that “It is good to be recognised as an important part of the family” and that “It was comforting”. Emerging themes captured feelings of hope, feeling welcomed, and the chance to connect with others, as they reported feeling “very welcome”. Some fathers expressed that the group experience “was reassuring and gave me hope”. The fathers reported the hope for the group to continue. Some stated, “I really enjoyed the group and hope that it continues as it will benefit other fathers” and “I think it is superb that this fathers group exists and I hope it continues”.

## 4. Conclusion

These results highlight the value that NICU fathers support groups can have. Lunchtime groups were better attended than the evening groups, with fathers feeding back that the evening groups were harder

to attend due to needing to get back home to collect the other siblings. The thematic analysis illustrated a shared lived experience among the fathers. This included feelings of recognition as an important part of the family, feeling welcomed and included, as well as feeling able to laugh and meet other fathers. Our findings suggest that fathers groups on NICU provide a safe and supportive space for them to meet and support one another during their NICU journey. It is also possible that the peer support aspect of the group may help them to overcome feelings of social isolation. Given Kim et al. (2016) reported the vulnerabilities of NICU fathers to experience social isolation, our findings that the fathers group can help to overcome this appears to be important in meeting the needs of NICU fathers. The findings of this study are therefore in line with recommendations by Fisher et al. (2018) in terms of the importance for providing peer to peer support for NICU fathers and for fathers to be equally involved in their baby’s care as the mothers are.

Previous studies by Arnold et al. (2012), Kuschel (2014), Thomson-Salo et al. (2014, 2017), Adama et al. (2017) and Valizadeh et al. (2018) have documented vulnerabilities of NICU fathers, and have highlighted that NICU fathers have been described to be ‘the forgotten parent’. However, the findings of our group indicated that group participation helped fathers to feel more visible on NICU, and to be an active part of their baby’s NICU admission.

The findings from the current study are in line with other studies which illustrate the value of support groups for parents (Stewart et al., 1994; Dunham et al., 1998; Jones and Neil-Urban, 2003; Nicholas, 2003; Foreman et al., 2006; Bragadottir, 2008; Sargent, 2009; Taheri et al., 2018; Sabnis et al., 2019). The current study also reflects findings of Jones and Neil Urban (2003), who also reported that attendance at peer support groups for fathers leads to benefits of sharing experiences with others. Our NICU fathers group provides a shared experience in which they can relate to one another, leading to feelings of comfort and validation. This is similar to other findings which have also reported similar experiences for parent support groups (Bracht et al., 2013; Carty et al., 2018; Taheri et al., 2018).

### 4.1. Limitations

Although the current study reflects the positive experiences for NICU fathers in attending support groups, there are a number of limitations to be considered. The fathers who attended the group were self-selected in that they all agreed to participate. Demographic information relating to the fathers was not collected, nor was any objective, quantitative outcomes. It would be helpful for any future studies to include the collection of such outcomes in order to help with data analysis. In addition to this, we have not followed up the effects of attending the group to investigate whether the group continued to have a positive lasting effect for the fathers. Further, the group was only offered twice per month due to lack of staff resources. It is possible that a more frequent group, such as a weekly one on the same day and time, could have increased the numbers of attendees.

A further limitation was that recruitment for the group felt challenging at times. For example, it took a long time out of the clinical psychologist’s day to walk around all 42 cots to speak with fathers and to tell them about the group. The clinical psychologist was only contracted to work 18 h per week, therefore it was not always easy to spend as much time that was needed in visiting fathers to talk to them about the group and to recruit them. The male chaplain was not funded by NICU, therefore was only ever able to help recruit on the day and time of the actual group, meaning the clinical psychologist was the main person doing all of the recruitment. Further, the male chaplain was rarely already known to the fathers on the unit, which could possibly impact on recruitment in terms of some fathers feeling reluctant to attend if they did not know both facilitators. In order to overcome this, other NICUs that are interested in setting up a father’s group would benefit from having a designated team of staff who are funded by the unit to take responsibility for the recruitment of the fathers group. The

facilitators of the group should take the time to meet the fathers prior to the group to build rapport to enable the fathers to know in advance who will be running the group, particularly if one member of staff is not funded by NICU, or is not often on the NICU.

#### 4.2. Implications for future practice

This small scale pilot study has illustrated the value in NICUs offering father support groups. Staff on NICUs with an interest in setting up and running such groups would benefit from administrative support in helping to promote the advertisement of such groups across the unit. For example, posters with the date and times of the groups could be placed up across the unit a few days prior to the group. The opportunity to hold regular groups is important, such as weekly at the same time. This would enable fathers to have the consistency of the group and in knowing when the group will be on.

Daytime groups appear to be more realistic for fathers to attend, particularly for those with other children. Other NICUs would also benefit from the collaborative approach for all staff to promote the group to fathers on a regular basis. Providing snacks, such as pizzas, for fathers was well valued by the attendees. Therefore, other NICUs considering these groups would benefit from offering snacks and refreshments. Given the feedback from some of the fathers that attended our group, it is also worth a male facilitator being present for such groups.

This study was a small-scale pilot investigation in order to explore the effectiveness of a peer support group for NICU fathers. The findings suggest the usefulness of such groups for NICU fathers. Further research would benefit from a larger scale study in order to further explore this and to add to the literature in terms of what helps NICU fathers to feel supported. It would also be of interest to explore mother's experiences of their male partner's attending such groups, and what our NICU parents think about gender specific peer support groups.

Based on the findings of the current study and in line with the above implications, the following recommendations are given for other NICUs which may be interested in running peer support groups for fathers:

- Involve all NICU staff in the recruitment of fathers to attend the group. Having a dedicated team of funded NICU staff to take responsibility for the recruitment could be very helpful.
- Allow plenty of time for recruitment. For example, it is helpful to start the recruitment process at least two weeks before the first group. Regular verbal reminders given to fathers about the group date, time and location are helpful. Any staff member recruiting for the fathers group should aim to devote at least two hours per week to the recruitment process. This would include time taken to print leaflets and posters, as well as visiting fathers by the cot side to tell them about the group, build rapport with them, and encourage them to attend.
- Use posters and leaflets to help advertise the group. Leaflets are useful when left by the baby's cot-side if parents are not there at the time of recruitment.
- The use of a male facilitator should be considered, ideally a member of staff who is funded by the NICU. If this cannot be possible, it may be helpful to approach other departments in the hospital, such as chaplaincy, to enquire if a male facilitator could help to co-facilitate with a female member of staff from NICU.
- Facilitators of the group should take the time to build rapport with the fathers before they attend a group.
- Set regular days, times and locations for the group to be held. Try to offer the group in a room on the NICU in order to help the father to feel within close proximity to his baby and partner.
- Provide snacks and refreshments during the group.
- Demographic data including the father's age, occupation, length of time on the unit, their baby's health condition, where they live, and whether they have any other children would be useful to ascertain.
- Use a feedback questionnaire at the end of the group to learn from

the fathers about what they feel needs to be considered in future groups for them to feel as helpful as possible.

- Create a relaxed, friendly and un-structured approach for the group.

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#### Appendix A. Supplementary data

Supplementary data to this article can be found online at <https://doi.org/10.1016/j.jnn.2019.05.003>.

#### References

- Adama, E.A., Sundin, D., Bayes, S., 2017. Ghanaian fathers' experiences of caring for preterm infants; a journey of exclusion. *J. Neonatal Nurs.* 23 (6), 275–281.
- Alexander, A., Clarke, P., Hobbs, L., Mastroiannopoulou, K., 2016. Post-traumatic stress symptoms in fathers of very low birth weight infants at 2 to 4 years post-partum. In: 6th Congress of the European Academy of Paediatric Societies (EAPS).
- Arnold, L., Sawyer, A., Rabe, H., Abbott, J., Gyte, G., Duley, L., Ayers, S., 2013. Parents' first moments with their very preterm babies: a qualitative study. *Br. Med. J. Open* 3 (4), 1–7.
- Bracht, M., O'Leary, L., Lee, S.K., O'Brien, K., 2013. Implementing family-integrated care in the NICU: a parent education and support program. *Adv. Neonatal Care* 13 (2), 115–126.
- Bragadóttir, H., 2008. Computer-mediated support group intervention for parents. *J. Nurs. Scholarsh.* 40 (1), 32–38.
- Braun, V., Clarke, V., 2006. Using thematic analysis in psychology. *Qual. Res. Psychol.* 3, 77–101.
- Carter, J.D., Mulder, R.T., Bartram, A.F., Darlow, B.A., 2005. Infants in a neonatal intensive care unit: parental response. *Arch. Dis. Child. Fetal Neonatal Ed.* 90 (2), F109–F113.
- Carty, C.L., Soghier, L.M., Kritikos, K.I., Tuchman, L.K., Jiggetts, M., Glass, P., Streisand, R., Fratantoni, K.R., 2018. The Giving Parents Support Study: a randomized clinical trial of a parent navigator intervention to improve outcomes after neonatal intensive care unit discharge. *Contemp. Clin. Trials* 70, 117–134.
- Clarke, V., Braun, V., 2013. Teaching thematic analysis: overcoming challenges and developing strategies for effective learning. *Psychol.* 26 (2), 120–123.
- Coppola, G., Cassibba, R., Bosco, A., Papagna, S., 2013. In search of social support in the NICU: features, benefits and antecedents of parents' tendency to share with others the premature birth of their baby. *J. Matern. Fetal Neonatal Med.* 26 (17), 1737–1741.
- Cyr-Alves, H., Macken, L., Hyrkas, K., 2018. Stress and symptoms of depression in fathers of infants admitted to the NICU. *J. Obstet. Gynecol. Neonatal Nurs.* 47 (2), 146–157.
- Davila, R.C., Segre, L.S., 2018. A nurse-based model of psychosocial support for emotionally distressed mothers of infants in the NICU. *J. Obstet. Gynecol. Neonatal Nurs.* 47 (1), 114–121.
- Davis, L., Edwards, H., Mohay, H., Wollin, J., 2003. The impact of very premature birth on the psychological health of mothers. *Early Hum. Dev.* 73 (1–2), 61–70.
- Dunham, P.J., Hurshman, A., Litwin, E., Gusella, J., Ellsworth, C., Dodd, P.W., 1998. Computer-mediated social support: Single young mothers as a model system. *Am. J. Community Psychol.* 26 (2), 281–306.
- Fisher, D., Khashu, M., Adama, E.A., Feeley, N., Garfield, C.F., Ireland, J., Koliouli, F., Lindberg, B., Nørgaard, B., Provenzi, L., Thomson-Salo, F., 2018. Fathers in neonatal units: improving infant health by supporting the baby-father bond and mother-father coparenting. *J. Neonatal Nurs.* 24 (6), 306–312.
- Foreman, T., Willis, L., Goodenough, B., 2006. Hospital-based support groups for parents of seriously unwell children: An example from pediatric oncology in Australia. *Soc. Work Groups* 28 (2), 3–21.
- Franck, L.S., Spencer, C., 2003. Parent visiting and participation in infant caregiving activities in a neonatal unit. *Birth* 30 (1), 31–35.
- Geller, P.A., Bonacquisti, A., Patterson, C.A., 2018. Maternal experience of neonatal intensive care unit hospitalization: trauma exposure and psychosocial responses. In: *Motherhood in the Face of Trauma*. Springer, Cham, pp. 227–247.
- Hall, S.L., Ryan, D.J., Beatty, J., Grubbs, L., 2015. Recommendations for peer-to-peer support for NICU parents. *J. Perinatol.* 35 (S1), S9.
- Holditch-Davis, D., Miles, M.S., 2000. Mothers' stories about their experiences in the neonatal intensive care unit. *Neonatal network* 19 (3), 13–21.
- Hollywood, M., Hollywood, E., 2011. The lived experiences of fathers of a premature baby on a neonatal intensive care unit. *J. Neonatal Nurs.* 17 (1), 32–40.
- Jackson, K., Ternestedt, B.M., Schollin, J., 2003. From alienation to familiarity: experiences of mothers and fathers of preterm infants. *J. Adv. Nurs.* 43 (2), 120–129.
- Johnson, A.N., 2008. Engaging fathers in the NICU: taking down the barriers to the baby. *J. Perinat. Neonatal Nurs.* 22 (4), 302–306.
- Jones, J.B., Neil-Urban, S., 2003. Father to father: focus groups of fathers of children with cancer. *Soc. Work. Health Care* 37 (1), 41–61.

- Kim, H.N., Wyatt, T.H., Li, X., Gaylord, M., 2016. Use of social media by fathers of premature infants. *J. Perinat. Neonatal Nurs.* 34 (4), 359–366.
- Lasiuk, G.C., Comeau, T., Newburn-Cook, C., 2013. Unexpected: an interpretive description of parental traumas associated with preterm birth. *Bio Med Central (BMC) pregnancy and childbirth* 13 (1), S13.
- Lindberg, B., Axelsson, K., Öhring, K., 2007. The birth of premature infants: experiences from the fathers' perspective. *J. Neonatal Nurs.* 13 (4), 142–149.
- Lotterman, J.H., Lorenz, J.M., Bonanno, G.A., 2019. You can't take your baby home yet: a longitudinal study of psychological symptoms in mothers of infants hospitalized in the NICU. *J. Clin. Psychol. Med. Settings* 26 (1), 116–122.
- Lundqvist, P., Jakobsson, L., 2003. Swedish men's experiences of becoming fathers to their preterm infants. *Neonatal Network* 22 (6), 25–31.
- Lundqvist, P., Westas, L.H., Hallström, I., 2007. From distance toward proximity: fathers lived experience of caring for their preterm infants. *J. Paediatr. Nurs.* 22 (6), 490–497.
- Matricardi, S., Agostino, R., Fedeli, C., Montiroso, R., 2013. Mothers are not fathers: differences between parents in the reduction of stress levels after a parental intervention in a NICU. *Acta Paediatr.* 102 (1), 8–14.
- Miles, M.S., Funk, S.G., Kasper, M.A., 1992. The stress response of mothers and fathers of preterm infants. *Res. Nurs. Health* 15 (4), 261–269.
- Nicholas, D.B., 2003. Participant perceptions of online groupwork with fathers of children with spina bifida. *Soc. Work Groups: Soc. Justice Through Pers. Commun. Soc. Change* 227–240.
- Pohlman, S., 2005. The primacy of work and fathering preterm infants: findings from an interpretive phenomenological study. *Adv. Neonatal Care* 5 (4), 204–216.
- Prouhet, P.M., Gregory, M.R., Russell, C.L., Yaeger, L.H., 2018. Fathers' stress in the neonatal intensive care unit: a systematic review. *Adv. Neonatal Care* 18 (2), 105–120.
- Rimmerman, A., Sheran, H., 2001. The transition of Israeli men to fatherhood: a comparison between new fathers of pre-term/full-term infants. *Child Fam. Soc. Work* 6 (3), 261–267.
- Roque, A.T.F., Lasiuk, G.C., Radünz, V., Hegadoren, K., 2017. Scoping review of the mental health of parents of infants in the NICU. *J. Obstet. Gynecol. Neonatal Nurs.* 46 (4), 576–587.
- Sabnis, A., Fojo, S., Nayak, S.S., Lopez, E., Tarn, D.M., Zeltzer, L., 2019. Reducing parental trauma and stress in neonatal intensive care: systematic review and meta-analysis of hospital interventions. *J. Perinatol.* 1–12.
- Sargent, A.N., 2009. Predictors of needs in mothers with infants in the neonatal intensive care unit. *J. Reprod. Infant Psychol.* 27 (2), 195–205.
- Sloan, K., Rowe, J., Jones, L., 2008. Stress and coping in fathers following the birth of a preterm infant. *J. Neonatal Nurs.* 14 (4), 108–115.
- Stewart, M.J., Ritchie, J.A., McGrath, P., Thompson, D., Bruce, B., 1994. Mothers of children with chronic conditions: supportive and stressful interactions with partners and professionals regarding caregiving burdens. *Can. J. Nurs. Res. Revue canadienne de recherche en sciences infirmières* 26 (4), 61–82.
- Sullivan, J.R., 1999. Development of father-infant attachment in fathers of preterm infants. *Neonatal network: Nucleosides Nucleotides* 18 (7), 33–39.
- Taheri, M., Nikfarid, L., Farahani, A.S., Shakeri, N., 2018. The effect of a peer-group support intervention program on the tensions of mothers with premature neonates admitted to the intensive care units in Babol, Iran. *Adv. Nurs. Midwifery* 28 (2), 15–19.
- Thomson-Salo, F., Kuschel, C.A., Kamlin, O.F., Cuzzilla, R., 2017. A fathers' group in NICU: recognising and responding to paternal stress, utilising peer support. *J. Neonatal Nurs.* 23 (6), 294–298.
- Vaismoradi, M., Turunen, H., Bondas, T., 2013. Content analysis and thematic analysis: implications for conducting a qualitative descriptive study. *Nurs. Health Sci.* 15 (3), 398–405.
- Valizadeh, S., Mirlashari, J., Navab, E., Higman, W., Ghorbani, F., Dowling, D., Thibeau, S., 2018. Fathers: the lost ring in the chain of family-centered care. *Adv. Neonatal Care* 18 (1), E3–E11.
- Vinall, J., Noel, M., Disher, T., Caddell, K., Campbell-Yeo, M., 2018. Memories of infant pain in the neonatal intensive care unit influence posttraumatic stress symptoms in mothers of infants born preterm. *Clin. J. Pain* 34 (10), 936–943.
- Wereszczak, J., Miles, M.S., Holditch-Davis, D., 1997. Maternal recall of the neonatal intensive care unit. *Neonatal Network: Nucleosides Nucleotides* 16 (4), 33–40.
- Winter, L., Colditz, P.B., Sanders, M.R., Boyd, R.N., Pritchard, M., Gray, P.H., Whittingham, K., Forrest, K., Leeks, R., Webb, L., Marquart, L., 2018. Depression, Posttraumatic Stress and Relationship Distress in Parents of Very Preterm Infants. *Archives of Women's Mental Health*, pp. 1–7.
- Wong, P., Liamputtong, P., Koch, S., Rawson, H., 2015. Families' experiences of their interactions with staff in an Australian intensive care unit (ICU): a qualitative study. *Intensive Crit. Care Nurs.* 31 (1), 51–63.
- Woodward, L.J., Bora, S., Clark, C.A., Montgomery-Hönger, A., Pritchard, V.E., Spencer, C., Austin, N.C., 2014. Very preterm birth: maternal experiences of the neonatal intensive care environment. *J. Perinatol.* 34 (7), 555.