Evaluation of a Paediatric Trauma Social Worker Service

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\section*{ABSTRACT}
Injury is the leading cause of hospitalisation of children in Australia and can cause ongoing physical and psychological morbidity. Hospital staff provide excellent physical care to injured children, but there is a need for models of care that improve psychosocial care. To address this gap, a trauma support social work service was trialled at an Australian paediatric trauma hospital, to guide families of injured children through the healthcare system from the day of the child’s injury to 6 months following discharge. A mixed methods approach was used to evaluate the service and used a range of data sources—trauma registry records, the Trauma Support Coordinator (TSC) journal, staff surveys, and interviews. Findings from this small study suggest the TSC was able to improve the coordination of care, provide information, and meet the emotional needs of families of injured children. Ways to improve the effectiveness and acceptance of the TSC role were also identified.

\section*{IMPLICATIONS}
- Injured children should be allocated a dedicated TSC for their entire stay in hospital to provide continuity of care for the child and their family.
- Situating the TSC role in the Emergency Department will allow for early contact with families when support is most crucial.
- Incorporation of the TSC role into the social work roster will reduce “doubling up” of psychosocial services offered to families.

In Australia, injury (e.g., from transport collisions, falls etc.) is the leading cause of death for young people and children aged 1–14 years (Australian Institute of Health and Welfare, 2020) and remains a leading cause of hospitalisation and long-term...
disability among children in many countries (Flavin et al., 2006; Guice et al., 2007; Hedstrom et al., 2012; Martinez et al., 2010). Hospitalisation of Australian children aged 1–16 years due to injury has not reduced in 10 years and is more than double the number of hospital admissions for cancer, diabetes, and cardiovascular disease combined (Mitchell et al., 2017). Consequences of childhood injury include economic hardship, social disadvantage, and educational and developmental delays that affect the whole family (Lyons et al., 2010).

After the initial crisis passes, parents must come to terms with the longer term implications of their child’s injury and learn about their care needs. During this time, parents experience emotions ranging from sadness and loneliness to feelings of shock, grief, guilt, and helplessness (Carnevale, 1999; Foster et al., 2017; Leidy et al., 2005; Noyes, 1999) and between 10% and 30% of parents of critically injured children develop post-traumatic stress disorder (PTSD) (Daviss et al., 2000; Rees et al., 2004). Parents can continue to have unmet information and emotional support needs across the care trajectory from the time of the injury, to their child’s return home, and integration back in to the community (Foster et al., 2019; Kirk et al., 2015).

Psychosocial support for injured children provided in Australian paediatric trauma hospitals appears to be inadequate. Findings from a 2014 multicentre study showed that hospital staff were most confident that the physical, medical, and health needs of the injured children they cared for were met (92.5%), somewhat less confident that families’ psychosocial needs were being met (82.1%), and least confident that the children’s psychosocial needs were being met (68.2%). The least accessible services reported were clinical psychology and family counselling, mental health, and behaviour management services (Curtis, Foster et al., 2016a). Time constraints often meant medical and nursing staff gave priority to the child’s medical and physical needs over their psychosocial needs and therefore highly valued the role of the social worker in providing psychosocial care for families (Alisic et al., 2014).

However, in all Australian paediatric trauma centres, children and their families were transferred to a different social worker each time they moved locations in the hospital, generally transferring three to five times, and no routine follow-up support services post-discharge for the child or their families were identified (Curtis, Foster et al., 2016a). These findings reflect a 2015 international review of the social work, medical, nursing, and psychology literature around models of care delivery for families of critically ill children. This review concluded a model that provides continuity across the span of care is required, and there is need to describe how best to design, implement, and sustain models of care for critically ill children and their families (Curtis, Foster et al., 2016a). This is a major gap in care as studies have shown that post-discharge, families can experience a decline in health or even suffer new health problems (Aggar et al., 2017; Leidy et al., 2005; Tomlinson et al., 1995).

To address this gap in care, the study site employed a Trauma Support Coordinator (TSC) for a 12-month trial. This small-scale study built on work by Curtis, Foster et al. (2016a, 2016b) and sought to determine the feasibility and need for a TSC. The role was based on family-centred care principles and intended to enhance the existing social work service to provide a dedicated, consistent psychosocial support person to coordinate and navigate the trauma journey for the child and their family during hospital admission and post-discharge.
Study Aims and Objectives

The aim of the study was to describe and evaluate the implementation of the TSC role. In particular, the study was designed to explore: (1) activities and processes associated with the TSC role; (2) satisfaction and experience of staff with the TSC role; and (3) contextual factors at the hospital (political, social, organisational, and individual) that support or hinder the implementation and conduct of the TSC role.

Method

Development of the TSC Role

The development of the TSC role was informed by the needs and potential solutions identified through: (1) an integrative review of models of care for families of critically ill children (Curtis, Foster et al., 2016b); (2) the findings of a multisite staff survey of clinicians caring for injured children (Curtis, Foster et al., 2016a); and (3) interviews with two parents of a severely injured child. To ensure the role met the needs of the study site, the role was refined following discussions with key stakeholders who formed a TSC working party (trauma director, trauma nurse coordinator, social work manager, trauma social worker, and hospital executive director) and a two-month observation of processes at the study site. All severely injured children and their families were tracked through their hospital stay and the number and different types of wards, clinical specialties, and clinical staff each child and family encountered during their hospital stay were recorded. The TSC working party jointly determined that the role should be filled by a social worker who would coordinate the psychosocial care of the child and their family from the time they were admitted to hospital to family and societal reintegration as the child progressed through the healthcare system over a period of 6–12 months. The role was based on family-centred care principles (Mikkelsen & Frederiksen, 2011; Shields et al., 2012) and used a case management approach. The role was similar to the support provision of breast cancer nurses in their case management of families affected by breast cancer (Freund et al., 2008), where nurses provide physical, psychological, and emotional support from the time of diagnosis and throughout treatment. The three critical elements of the TSC role were relationship, support, and coordination, described in Table 1.

Implementation of the TSC Role

Prior to the commencement of the TSC service, staff education was conducted by the trauma service and social work department to raise awareness of the role and explain the referral process. The trauma service and social work department also maintained regular clinical and educational presence throughout the hospital and were thus able to continuously promote the role to regular staff members as well as to new clinicians when staff rotations occurred. Further, multi-injured patients require a collaborative model of care amongst the various health care providers (physicians, nurses, social workers, psychologists, pharmacists, dietitians, and others) to provide team-based care (Ambrose-Miller & Ashcroft, 2016). Barriers to collaboration included such things as:
lack of role clarity (where health professionals take part in interprofessional teams without a clear understanding of their role or the roles of their colleagues); power dynamics (where power inequities between different health professionals affect team decision making); and poor communication (Ambrose-Miller & Ashcroft, 2016). However, these barriers can be minimised by a social worker with “a strong sense of what social work can provide to the team” and who has “the ability to communicate that vision in the work that they do” (Ambrose-Miller & Ashcroft, 2016). As such, the TSC role was filled in December 2014 by an existing social work staff member with strong communication skills, a working knowledge of the study site, and extensive experience providing comprehensive psychosocial care to injured children and their families.

### Evaluation of the TSC Role

The study was conducted over a 12-month period (December 2014 to November 2015) at The Women’s and Children’s Hospital, Adelaide, a 295-bed, Level 1 paediatric trauma hospital in Australia. Ethics approval was granted (HREC/15/WCHN/107). The study was a mixed methods process evaluation (Hanson et al., 2008; Polit & Beck, 2012) with an embedded implementation component. The approach involved researchers and practitioners working together from the beginning of the project. The collaboration provided opportunities to improve the intervention through direct feedback, promoting better on-the-ground understanding of the change process (Braithwaite et al., 2018). The research process was informed by knowledge translation principles (Curtis, Fry, et al., 2016) and the knowledge to action cycle (Graham et al., 2006). Data sources included: (1) medical and trauma registry records (for demographic and injury information); (2) a journal kept by the TSC (documenting their experience and daily activities); (3) staff surveys (to collect information about staff experience of working alongside the TSC); and (4) staff interviews (to collect information about the perceived benefits and challenges of the role). The study design initially included interviews with parent participants three times.
months after their child was discharged from hospital; however, most parents (14) were unable to be contacted and 3 declined to participate.

Data Analysis

Data from the four data sources were analysed concurrently to develop a deeper understanding of the context and mechanisms of operation of the TSC role. Qualitative data from the TSC journal, free text responses from the staff survey, and transcripts of the key personnel interviews were imported into NVIVO v10 and analysed using directed content analysis to determine categories (Hsieh & Shannon, 2005). Interview responses were initially coded separately by two researchers and then discussed together until consensus was reached and concepts were grouped to form emerging, and then, final themes. Information, such as the number of injured children presenting to the study site along with their demographic and injury information, was extracted from the study site trauma registry and summarised.

Results

Four staff members (the trauma nurse coordinator, the trauma social work manager, a trauma social worker, and the TSC) were interviewed. Five staff members (a doctor, a nurse, two chaplains, and a staff member who wished their role to remain anonymous) completed the survey and the TSC completed a journal. The sections below describe the TSC’s interactions with families followed by staff perceptions of the role including challenges of the role and suggestions for role improvement.

The TSC Role

Over a period of 12 months the TSC engaged closely with 17 of 22 eligible children and their families. The TSC did not engage with five families for several reasons: the child had a short admission leading to minimal opportunity for the TSC to engage with the family; time restraints meant the TSC did not have the capacity to provide support for multiple families concurrently; and the TSC was on annual leave. The included children were aged from 6 months to 17 years. All children referred had sustained major injuries with the exception of one child who did not have major injuries but was referred to the TSC by the Trauma Nurse, who had concerns about the child’s emotional wellbeing. One family, whose child had been admitted prior to the commencement of the TSC role, made contact with the TSC while their child was still in hospital 6 months after the child’s admission. One family’s child died while in hospital.

TSC and Family Interaction and Intervention

Families interacted with the TSC between 1 and 5 times during their hospital stay and post-discharge. The TSC engaged with parents, grandparents, aunts and uncles, as well as siblings. On all but one occasion, the contact was initiated by the TSC rather than the families. The focus of engaging with families predominantly centred around containment of parental anxiety, fear, uncertainty, and feelings of being overwhelmed within the medical setting. The TSC reported that all families approached were accepting of this
service and were able to open up about their feelings and the issues they faced. Post-
discharge, the TSC followed-up families via telephone to check whether they required
ongoing support. It was often difficult for the TSC to reach families after they were dis-
charged from hospital and where a family could not be reached, the TSC would leave
their details for the family to contact them, if they so wished.

**TSC Engagement with Hospital and Other Staff**

The TSC worked parallel to, and independently of, the attending clinical social
workers offering psychosocial care to critically injured children and their families
across all treating paediatric clinics within the hospital. The TSC interacted with a
substantial number of hospital staff members, which included nurses, medical
officers, and physiotherapists. Interactions between these staff members and the
TSC often involved the relay of information the TSC had gathered from their inter-
actions with the family or other staff members. For example, the TSC consulted with
the Aboriginal liaison officer to confirm the cultural significance of the family return-
ing home as soon as possible to participate in a relative’s funeral and relayed the
information to the paediatric surgery clinical practice consultant, leading to the
child’s discharge the following morning. Where the TSC was the first point of
contact for a family, they informed other staff members (e.g., after-hours social
worker and neurosurgery social worker) of a child’s imminent admission. The TSC
arranged education sessions with the ward educator and manager that improved
understanding of and collaboration with the TSC role.

The TSC also interacted with a number of external providers to connect families with
community services or gather information on their behalf. For example, the TSC contacted
Centacare (a Catholic community service agency) to connect a family with counselling ser-
vices; and contacted a public adult hospital and private hospital to obtain information for a
family with multiple injured family members across the State. On another occasion the
Emergency Department (ED) social worker from another hospital contacted the TSC to
refer a child and family.

**Staff Perceptions of the TSC Role**

From interview data three main themes were identified: positives of the role, challenges of
the role, and suggestions for role improvement.

**Positives of the Role**

All staff interviewed perceived the TSC role as being beneficial to critically injured children
and their families. Staff believed it was helpful to have one point of contact for families
from admission into hospital right though to after discharge. The benefit of having the
same dedicated trauma staff member supporting a family during their whole hospital
stay meant stronger relationships and better rapport could be built between staff and
the family and families did not have to repeat their story to different treating teams.

Families need support, by one person, throughout their journey in hospital … this person is a
trusted “anchor” for the patient and their family. [This person] can tell different teams the
story, without the family having to repeat [themselves]. (Survey responder 3)
Staff also felt that having one person dedicated to looking after the psychosocial needs of families rather than several social workers would reduce confusion for treating teams. The TSC, being a consistent point of contact for the family, was able to provide an up-to-date overview of the family situation when needed. “[It is] useful for the team to have a person that they can go to because they do get a bit confused with the 5 different people doing the [social worker] job” (Interviewee 4).

Another distinguishing factor between the TSC and social work services was that the TSC had scope to follow-up with families after their child had been discharged from hospital. A follow-up telephone call to see how families were doing post-discharge with the provision of continued psychosocial support if required was viewed as a major advantage by staff. “[The TSC] was contacting people after they had left hospital and I think that that part of it is very valuable … [Social Work] don’t have the capacity to follow families up” (Interviewee 4).

The TSC also reported that parents and families expressed gratitude for the care they received from him while they were in hospital and during follow-up. Families were especially grateful for the information the TSC provided including what to expect while their child was in hospital and following discharge.

Follow-up discussion with mother who expressed that the family were coping very well post-accident … Mother was thankful [for my] involvement and follow up—said that it was really helpful at a time when she didn’t know “what was going on”. (TSC journal)

**Challenges of the Role**

Staff identified several challenges of the role including not overwhelming families with multiple psychosocial support services, lack of a defined role, role encroachment upon other social work services, and the part-time hours of the position. Staff identified that families could have been confused by being attended by both the TSC and a member of the social work department. There was a concern that families would be overwhelmed by the amount of psychosocial support they received from two different parties and the resulting duplication of services. “[The social worker was] already working with the families, and then there’s another person involved … [when] there’s two workers there, there is some potential confusion, it’s quite awkward” (Interviewee 3).

Some staff were unsure exactly what the TSC role involved and its point of difference with the social worker role. There was a feeling that the TSC role was underdeveloped and poorly defined. Staff who did not understand what the role involved found it difficult to work collaboratively with the TSC. Although they acknowledged there was initial communication regarding the role, they felt the information was rather broad and general and they were not able to separate the role of the TSC from the services of the social workers.

It can be quite tricky to navigate how to do [the TSC] role whilst not detracting or imposing yourself upon [the social worker] … the dilemma was, trying to clarify … the point of difference for [staff on the] wards, as to why it is they would call [the TSC] as opposed to the social worker. (Interviewee 1)

Staff reported difficulties for both the TSC and social workers as they worked alongside one another. There was a perceived overlap between the TSC and social worker roles, for example, both roles involved providing psychological support for families, counselling,
grief management, and linking to agencies. This led to the feeling that the TSC role encroached upon the social work role and that the TSC role compromised the social workers’ relationship with clients. These negative sentiments were expressed by both the TSC and the social workers and were also observed by those who worked closely with them.

For example a social worker was a bit hostile towards him [the TSC] thinking that he was taking over their job … I think it’s a bit hard having two people kind of doing the same job because you feel, I would feel like I was stepping on someone else’s toes a little bit. (Interviewee 2)

Another reported issue was the part-time nature of the TSC role. The TSC worked at 0.6 full-time equivalent (FTE) hours for the first eight months and at 0.2 FTE for the last four months. This reduction in hours was not planned but eventuated as a result of unforeseen budget and staffing issues. There was a common belief among staff interviewed that for the TSC role to be successful it needed to be a full-time position as this would mean the TSC could engage with families as soon as they were admitted to hospital and provide a seamless support service during their hospital stay and post-discharge. The part-time nature of the role contributed to limitations of scope, not just engaging with clients and clinics (outpatient appointments, team and family meetings), but also within the Trauma Service.

It needs to be a full time position … if a trauma [patient] came in say Thursday or Friday, [the TSC] wouldn’t get to see them [until] Monday … by then the family has been in the hospital for four or five days. (Interviewee 2)

**Staff Suggestions for Role Improvement**

Staff believed the TSC role would have better suited a larger hospital and that feedback about the performance and achievements of the TSC role was required. They also recommended re-defining the role and suggested using the TSC purely for follow-up of children after they have been discharged from hospital or incorporating the role in the Emergency Department (ED) to case manage immediate family needs.

Although staff believed there was a need for a TSC, they felt the role in its current form lacked clear guidelines and boundaries. The social workers indicated they were not given clear guidelines on how to work with the TSC. Staff believed there was a need to re-define the role especially in light of existing services that the TSC role overlapped with. “There needs to be really clear guidelines on who does what, otherwise people are just doing the same task and that can get really confusing for parents and for other staff” (Interviewee 4).

An alternate view was that the TSC role could be incorporated into the ED where the TSC becomes part of a broader team and network of relationships. The TSC would then be able to attend to all Level 1 and Level 2 traumas as they present to hospital. Being located in the ED would optimise the effectiveness of the TSC as they would have the best chance for early contact with families.

[It should] be a position focused within ED and trauma … so that person is the primary person for the initial point of [psychosocial care] … the ED trauma team, the consultants, registrars, nurses, admin, everyone [would know] who [the TSC is] and know what their job is. (Interviewee 1)
Discussion

This small-scale study built on work by Curtis, Foster et al. (2016a, 2016b) and sought to determine the feasibility and need for a TSC. Alongside the trauma service and existing hospital services, the TSC guided families of severely injured children through the healthcare system, assisting families to access the medical, social, and financial services they needed throughout their hospitalisation and post-discharge. With the exception of a reduction in FTE hours over time, the TSC role was implemented as planned.

This study supports the findings from other trials with this population that any social work intervention needs to conduct ongoing family appraisal as issues related to their child’s injury arise over time, particularly to improve coordination across care transitions (such as hospital discharge) to ensure continuity of care and integration of support (Kirk et al., 2015). Any intervention should focus on parental need for information, emotional support, and access to community-based services (Jones et al., 2018), and the longer term benefits of social work intervention evaluated (Hickey et al., 2018). Current in-hospital models require redesigning to reduce the ongoing fragmentation of psychosocial care for critically ill children and their families.

In this trial, the TSC carried out key components of the role based on family-centred care principles. The family-centred care approach considers the impact of the child’s admission on all family members and aims to involve the family in all aspects of care (Mikkelsen & Frederiksen, 2011; Shields et al., 2012). The service provided by the TSC revolved around four main concepts: (1) parental participation in their child’s care; (2) partnership and collaboration between the healthcare team and parents in decision-making; (3) family-friendly environments that normalise family functioning within the healthcare setting; and (4) care of family members as well as of the admitted child (Franck & Callery, 2004). The TSC was able to engage with a large proportion of families who met the criteria for TSC intervention. Qualifying families were either identified by the TSC himself or referred to him by other health care professionals.

The TSC also interacted with a range of staff within and external to the hospital. Staff saw the value in having a TSC assisting families throughout their stay in hospital and post-discharge; however, they also identified barriers to role implementation. The main barriers identified were similar to those reported in the literature for new models of care in hospital settings including a lack of time (part-time nature of role), confusing and complex guidelines (more defined role needed), and an unsupportive organisational culture (due to encroachment on social work services) (Haynes & Haines, 1998; Wallis, 2012). The success of any intervention will be dependent on the comprehensiveness of its implementation strategy, the relevance to the context and setting, and engagement with key stakeholders (Curtis, Fry, et al., 2016).

In this pilot, the TSC worked in parallel to the hospital’s existing clinical social workers. This led to duplication of services provided by the TSC and the social workers, for example, counselling and advice in relation to social, emotional, and practical needs of the child and family. However, the key distinguishing feature of the TSC role was that the TSC followed families across the continuum of the patient pathway from admission to post-discharge, rather than handing care over at each phase, for example, from intensive care to the ward or clinical specialty such as orthopaedic or neurosurgical. The relationship was maintained with families across all treating paediatric clinics and when the
child returned home. This model could be applied to other complex areas of health care where similar fragmentation exists.

To prevent duplication of services, once the TSC role is established (i.e., outside of this pilot) it is expected that families would be serviced by either the TSC or a social worker depending on families’ needs and trauma pathway. This would most likely resolve feelings of role encroachment and duplication of services. Alternatively, one could consider the possibility of changing the way the Social Work Department currently operates, for example, situating a social worker in the Emergency Department where most children with major injuries are admitted would allow for early contact with families when support is most crucial. Then, allowing the same social worker to “follow” families as they transition to different wards would provide better continuity of care. Finally, follow-up with families post-discharge would enable families to receive continued support in the community. This is especially important as some families continue to struggle with the consequences of their child’s injury up to a year after discharge from hospital (Foster et al., 2019). Any future TSC role should be full-time to ensure effectiveness and be embedded within the existing social work structure with clear role delineation to prevent duplication of work.

There were several limitations to this implementation evaluation. As families were not formally interviewed it is difficult to ascertain how well the role was received by families. However informal feedback provided by families to the TSC was positive with many families saying they were grateful for the care they received while they were in hospital. Other family follow-up research conducted in Australia highlights the difficulties of recruiting this vulnerable population (Foster et al., 2019; Hickey et al., 2018). The role was implemented in a part-time capacity, not enabling early contact with some families. This created a gap in service and confusion regarding the function of the role. The low trauma activity at the study site (an exception during the data collection period) resulted in a smaller than expected number of families being serviced by the TSC and therefore also limited feedback from families. Finally, the low staff survey response rate could be an indication of a lack of interaction with, exposure to, and knowledge of, the TSC role.

**Conclusion**

Informal feedback provided by families to the TSC suggests the TSC role may be able to coordinate care, provide information about resources, and meet the emotional needs of families of injured children while they are in hospital. The role was mostly well received by a large number of hospital staff members. A better defined TSC role (especially in relation to the social work role), having the role full-time, and incorporating the role into the social work roster or situating it within the ED may further increase support for the role. As a result of this pilot study a TSC role was established at Queensland Children’s Hospital, Brisbane, Australia in July 2017 and has been well received by families and staff. Formal evaluation (up to 12-months post injury) is in progress.

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