Life-story work in long-term care facilities for older people: an integrative review

MR. OWEN DOODY (Orcid ID : 0000-0002-3708-1647)

Article type : Review

Title: Life-story work in long-term care facilities for older people: An integrative review.

MS CAROLINE DORAN, MS MARIA NOONAN, DR OWEN DOODY

Short Title: Life-story work

Author Details:

Caroline DORAN

MSc, Grad Dip,BSc, RGN

Clinical Nurse Manager 3,

HSE Older Persons Services

The Meath Community Unit

1-9 Heytesbury St

Dublin 8

Ireland

This article has been accepted for publication and undergone full peer review but has not been through the copyediting, typesetting, pagination and proofreading process, which may lead to differences between this version and the Version of Record. Please cite this article as doi: 10.1111/jocn.14718

MS Maria NOONAN

MSc, BSc, RGN, RNT, RM

Lecturer,

Department of Nursing and Midwifery

University of Limerick

Limerick

Ireland

Corresponding Author:

Dr Owen DOODY

PHD, MSC, BSc, RNID

Lecturer

Department of Nursing and Midwifery

University of Limerick

Limerick

Ireland

Email: owen.doody@ul.ie

Conflicts of Interest

No conflict of interest has been declared by the authors.

Funding

This research received no specific grant from any funding agency in the public, commercial, or not-for-profit sectors.

What does this paper contribute to the wider global clinical community?

- This review adds clarity and strengthens the evidence base for the use of life-story work which can bring meaning and quality to the lives of people living in long-term care.
- A planned approach for the implementation of life-story work creates a positive experience for residents, families and staff.
- Life-story work creates a deep understanding of the person been care for and explain resident responses.
- Education and support of staff is required to facilitate staff engagement, development and self-awareness in life-story work.

Abstract

Aim: To systematically review the literature regarding the experience of older people, families and staff using life-story work in residential care facilities for older people.

Background: Life-story work has been promoted as an approach to enhance care provided and involves collecting memories and moments that are important to the person assisting them to regain their sense of self.

Design: An integrative review utilising the PRISMA reporting guidelines where seven databases; Scopus, Embase, CINAHL, MEDLINE, PsychInfo, Psych Articles, Cochrane were searched within the timeframe; 1st January 2006 to 14th March 2016. Data was reviewed

using Whittemore & Knalf's (2005) methodological approach for integrative reviews. Analysis was conducted utilising Braun & Clarke's (2006) six phases to identify, analyse and record themes within the data.

Results: Thirteen articles were reviewed and the review found that life-story work has been introduced using a range of different approaches, with no common approach. Thematic analysis identified two; maintaining identity and building and maintaining relationships.

Conclusion: The review extends the current evidence on the experience of using life-story work in long-term aged care facilities for older people. Life-story work has the potential to enhance person centred care in long-term care. However, improving the process of implementation of life story work will require education, time and resources and a commitment from service providers and managers.

Relevance to clinical practice: Staff who undertake life-story work with residents need to be equipped with the skills to recognise and manage the challenges and issues that may potentially arise. Further research into the successful implementation of life-story work and how it can be resourced is required.

Key words: life, life story, long-term care, nursing, older person, residential care,

Introduction

Everybody has a life-story, past experiences and relationships form our lived story, which shapes our identity and makes us who we are today (Linde 1993, Randall 2014). Life-story work is a biographical approach in health and social care that gives people the chance to express their life history and experience (McKeown *et al.* 2006). The aim of life-story work is to capture experiences that are significant to the individual and these can be recorded in many formats including a written book, a book of photographs, a collage or digital format and this information informs the persons care plan (Kindell *et al*. 2014). Life-story approaches have many benefits for the person, family and staff such as improved well-being, enhanced relationships, better communication and safeguarding personal identity (McKeown *et al.* 2006, Edvardsson *et al*. 2009, Buckley *et al*. 2014). Different professionals (e.g. social work, nursing) use life-story work across care settings such as; older people (Bakken *et al.* 2009), intellectual disability (Moya 2010) and dementia care (Kellett *et al.* 2010). Through seeing a person's life-story; healthcare workers can make a link between the person's life experiences and what is happening in the present, and develop a better understanding of the person and what is important to them (Thompson 2011, McAdams & McLean 2013). While life-story work is seen as beneficial, staff perceived life-story work as time consuming and in reality success implementation requires organisational support which incorporates a planned approach that includes education and supervision for staff (McKeown *et al.* 2015). Although reviews of life-story work in health and social care (McKeown *et al.* 2006), use of life-story work in dementia (Moos & Bjorn 2006, Grøndahl *et al*. 2017) and life-story resources in dementia (Kindell *et al*. 2014) have been conducted, evidence is lacking within the general older person population and confusion exists regarding life-story work. This confusion is compounded by the use of reminiscence (recalling the past) and life review work which generally involves individual sessions, steered through their life experiences to evaluate these life experiences (Thorgrimsdottir and Bjornsdottir 2016). Within life-story work there is an end product such as a life story book which is not the focus or outcome of the reminiscence or life review process. However, reminiscence or life review can support the development of a life story book. This paper presents an integrative review of life-story work in residential care facilities for older people where an end product is identified.

Background

People living in long-term care facilities are a unique group, often they are not acutely ill but they do require assistance and support due to their functional or cognitive decline (Kelly *et al.* 2005). Older people relocate to long-term care facilities for a variety of reasons including a loss of functional ability due to chronic illness or a decline in cognition or even a combination of both. Entering a long-term facility can have profound implications on a person's self-view and sense of identity (Dennerstein *et al.* 2017). The use of life-story work has been identified as one approach to maintain a person's human rights (Equality and Human Rights Commission 2011) and promote person-centeredness (McKeown *et al.* 2010, McCormack *et al.* 2012). A systematic review of the literature by Brownie & Nancarrow (2013) suggests that person-centred care is synonymous with high quality healthcare and identified as the gold standard of care for older people. The idea of person-centred care and its connection to older people can be attributed to Kitwood (1997) who drew on the seminal work of Carl Rogers (1951) in the area of person-centred counselling. Kitwood (1997) developed the concept of person-centred care and applied it to caring for people with dementia. However, it quickly became an approach to practice for all aspects of caring for older people (McCormack *et al.* 2010, Edvardsson *et al.* 2011). The use of life-story work can support person-centred care, through enabling carers develop an understanding of the person for whom they are caring for and seeing beyond behaviours that challenge (McKeown *et* al. 2010). Thereby ensuring personhood is maintained at the heart of care and promoting a person-centred care ethic (Baldwin 2009).

There are many terms used interchangeably in reference to life-story work such as; life history and biographical approach, and other terms such as life review and reminiscence that share similarities (Gaughan *et al.* 2016). While these terms are used interchangeably, differences exist in their approach and uses in the healthcare environment (Day 2016). Within this review, the focus is on life-story work, which is an approach of working with a person and/or their family to find out about their life, record that information to produce an end product and then use the information and end product in their care (McKeown *et al.* 2015). Remembering ones story can involve some invention and interpretation (Randall 2010) as the person presents their interpretations/reproductions of fact (Randall 2012). Nonetheless we are our life stories (Randall, 2014) and there are many descriptions on how life-story work should be carried out and templates available to present life-story work, for example

multimedia, memory boxes, collages, a collection of photographs, or most commonly used a life-story book (Kindell *et al.* 2014). Previous literature reviews (Moos & Bjorn 2006, McKeown *et al.* 2006, Kindell *et al*. 2014, Grøndahl *et al*. 2017) identified issues related to life-story work, resources used and the need for further research in this area. However, no review has synthesised the evidence on life-story work relating to older persons since McKeown *et al.* (2006) as the focus of the other reviews were specific to dementia patients and care. Thereby this review was undertaken and considered papers in which an end product (e.g. book, collage) was evident as part of the life-story work and care process with older people, in order to identify the experiences of life-story work for older people in residential care from the person, family and staffs perspective.

The review

Aim

To explore and synthesise the literature on the experience of older people, families and staff using life-story work with older people living in residential care.

Design

Whittemore & Knafl (2005) five stage framework; problem formulation, literature search, data evaluation, data analysis and presentation was utilised as a methodological approach allowing for concurrent synthesis of qualitative and quantitative research methods. Where data from papers meeting the inclusion criteria were interpreted, summarised and grouped together during analysis to form succinct themes (Whittemore & Knafl 2005). This process was enacted through developing the review question, searching the databases, identifying papers for inclusion, appraising the papers, extracting data, analysing the data and synthesising the data to present findings. To enhance transparency in reporting this review, the PRISMA checklist (Supplementary File 1) and PRISMA flow diagram (Moher *et al.* 2009) and Kahn *et al.* (2003) PEO format (Population, Exposure, Outcome) were utilised to frame the research question (Aslam & Emmanuel 2010). Where older people living in

residential care facilities were taken as the Population, life-story work as the Exposure, and older people, families and staff experience as the Outcome.

Search method

The search strategy was conducted over three steps. Firstly a scoping of existing literature was conducted to explore the extent of the literature on life-story work and identify relevant search terms and appropriate parameters. The next step involved using the identified search terms across the electronic databases; CINAHL (Cumulative Index to Nursing and Allied Health Literature), Medline, PsychINFO, PsychArticles, Scopus, EMBASE and Cochrane. These terms were searched within title or abstract in CINAHL, MEDLINE, Psych INFO and Psych Articles. While Scopus, Embase and Cochrane accommodated searches using title, abstract or keyword. Thirdly further searching was conducted of included references and cited authors from papers reviewed. The timeframe 1st January 2006 to 14th March 2016 was selected as previous reviews (McKeown *et al.* 2006; Moos and Bjorn 2006) were published in 2006 and formed a baseline of knowledge on this topic. The search terms utilised related to older persons, long-term care and life-story work and the process and inclusion criteria are highlighted in table 1.

Search outcome and screening

The search strategy identified 460 papers, following a search of key authors two further papers were identified and nine papers identified from reference list of papers. Figure 1 describes the search and inclusion process across four steps: identification, screening, eligibility and included papers. Results were exported to Endnote and all duplicates were removed (n=128). Within the screening process the lead author screened all articles and the co-authors screen 50% each resulting in 320 further papers excluded during title and abstract review stage. The remaining 23 papers for full text review went through the same process and following full text review 10 papers were excluded as they did not meet the inclusion criteria; 4 were carried out in settings other than long-term care for older people, one was theoretical with no direct reference to life-story work in practice, one specifically related to reminiscence, one focused on treatment for depression, one on spiritual reminiscence, one

focused on environment i.e. the building, and one on developing a framework for staff to use narrative practice. For inclusion and exclusion of paper both screening authors met to discuss and reach a consensus and the third author was available if a consensus was not reach. Consensus was reach for all papers and a total of 13 papers were included in the final review accounting for twelve individual studies as McKeown *et al*. (2010) and (2015) report on the same study participants, with the 2010 paper addressing the use and the 2015 paper addressing the challenges.

Quality appraisal

Quality appraisal of papers were assessed using Critical Appraisal Skills Programmes Checklist (CASP 2014) for both qualitative and quantitative papers (qualitative, RCTs, cohort studies) by two authors. Each criterion was recorded as 'yes', 'no' or 'unclear' and results of the appraisal were discussed between both reviewers to form a consensus and the third author was available if a consensus was not reach. Consensus was reach for all papers and all were found to be of good methodological quality, and table 2 displays the findings of the quality appraisal.

Data abstraction

Data extraction and analysis for this review was based on the framework for data analysis for integrative reviews by Whittemore & Knafl (2005). Within this process data reduction, representation and comparison was conducted to support analyses of the data. The first step was to classify the data into subgroups by type of evidence and begin by analysing all qualitative studies and then quantitative studies. Within the data extraction process the authors aimed to extract relevant data pertaining to; author, year, title, country, aim, design, sample, data collection, data analysis, summary of findings and quality assurance and compile into a data extraction table creating a summary of studies (table 3).

Synthesis

Findings of the included studies were summarised as text and tables, which permitted a systematic comparison of specific issues or variables among the primary sources (Whittemore & Knafl, 2005). Given the heterogeneity of the included studies a descriptive thematic synthesis guided by Braun & Clarke (2006) six phases framework was deemed most appropriate; familiarising with the data, generate initial coding, search for themes, review themes, define and name themes and finally producing the report/themes occurred. Synopses of both the qualitative and quantitative findings from each primary study formed the data for analysis and these findings were not deconstructed prior to synthesis. Papers were read and reread repeatedly to facilitate familiarisation with the data with line by line coding of the extracted data from each primary study. Initial coding took place and resulted in codes that had a common point of reference and unified ideas being collated into potential themes (Buetow 2010). This inductive process was verified by all authors and involved identifying and comparing concepts, identifying patterns, consolidating and categorised descriptive themes, which were then clustered around common dimensions of life-story work and grouped to from the two analytical themes presented in the synthesis of findings

Findings

Descriptive characteristics of included papers

Of the thirteen papers (twelve studies), ten examined the experience of life-story of people living with dementia (Egan *et al.* 2007, Russell & Timmons 2009, Buron 2010, Kellett *et al.* 2010, Ervin *et al.* 2013, McKeown *et al*. 2010/2015 Subramaniam *et al.* 2014, Heggestad & Slettebo 2015, Eritz *et al.* 2016), while the other three did not specify if the residents had a cognitive impairment (Wills & Day 2008, Bakken *et al.* 2009, Phenice & Griffore 2013). International representation was evident with; four from the United Kingdom, two each from Australia, Canada and Norway, and one each from New Zealand, Republic of Ireland and the United States of America. Participants within studies were residents (N=150, range 4-73, mean 16) (Egan *et al.* 2007, Wills & Day 2008, Russell & Timmons 2009, Buron 2010, McKeown *et al*. 2010/2015, Phenice & Griffore 2013, Subramaniam *et al.* 2014, Heggestad & Slettebo 2015, Eritz *et al.* 2016), staff (N=184, range 7-99, mean 26) (Egan *et al.* 2007,

Bakken *et al.* 2009, Buron 2010, Kellett *et* al. 2010, McKeown *et al*. 2010/2015, Ervin *et al.* 2013, Eritz *et al.* 2016) and families (N=25, range 3-12, mean 6) (Wills and Day 2008, Kellett *et al.* 2010, McKeown *et al*. 2010/2015, Ervin *et al.* 2013). Within reporting the participants, McKeown *et al*. (2010/2015) were only counted once as the papers report on the same sample. All studies were conducted in residential aged care facilities; however there is no indication within the studies regarding the culture of the care environment (person-centred environment, task orientated approach). Some of the studies included staff who had attended education sessions on life-story work (Bakken *et al.* 2009, Ervin *et al.* 2013) other studies did not specify if staff had received any training or education on life-story work. It is also unclear from the studies what level of qualifications staff participants had, with some studies including nursing staff (Wills & Day 2008, Buron 2010) and others a mixture of nursing and care assistants (Egan *et al*. 2007, Bakken *et al.* 2009, Eritz *et al*. 2016) or not specified (Ervin *et al.* 2013). Life-story products within the review ranged from; life-story/life-history narratives (Egan *et* al. 2007, Bakken *et al*. 2009, Russell & Timmons 2009, Martin *et al*. 2016 – included photography), life-story collage (Buron 2010), life-story telling/life-story telling recording (Ervin *et al*. 2013, Heggestad & Slettebo 2015), family bibliography (Kellet *et al.* 2010), objects from life (Phenice & Griffore 2013), life review sessions with life-story book (Subramaniam *et al.* 2014) and life-story book (Willis & Day 2008, McKeown *et al*. 2010/2015).

Identified themes

Two overarching themes were identified; maintaining identity and building and maintaining relationships.

Maintaining identity

All of the studies reported that staff who took part in the life-story work process developed a better sense of knowing the resident as a person. This 'knowing' went much deeper than knowing the persons' name, age and diagnosis to considering the attributes that define the person. 'Knowing' was conceptualised in terms of knowing the persons medical history, their past, their personal preferences and their beliefs and values (Egan *et al.* 2007, Wills & Day

2008, Bakken *et al.* 2009, Russell & Timmons 2009, Buron 2010, Kellett *et al.* 2010, Ervin *et al.* 2013, Phenice and Griffore 2013, Subramaniam *et al.* 2014, Heggestad & Slettebo 2015, Eritz *et al.* 2016). Carrying out life-story work enabled staff and family participants to see the individuality and uniqueness of each person (Bakken *et al.* 2009, Russell &Timmons 2009, Kellett *et al.* 2010). Staff gained a deeper knowledge of the individual as a result of engaging in life-story work (Egan *et al.* 2007, Wills & Day 2008, Bakken *et al.* 2009, Russell & Timmons 2009, Buron 2010, Kellett *et al.* 2010, McKeown *et al*. 2010/2015, Ervin *et al.* 2013, Phenice & Griffore 2013, Subramaniam *et al.* 2014; Heggestad & Slettebo 2015, Eritz *et al.* 2016). Understanding and knowing the person as an individual with a story and in the context of their whole life rather than as a resident, provided the individual with a voice and promoted a sense of self, value and pride (Wills & Day 2008, Phenice & Griffore 2013). Life-story work enabled the person preserve and enhance their dignity as life-story work was seen as a mean of humanising the person through portraying their story and creating understanding of the person in the present by knowing their past (Russell & Timmons 2009, Ervin *et al. 2015,* Heggestad & Slettebo 2015). The use of life-story work was linked to a reduction in incidences of aggressive behaviour and an increase in the quality of care delivered to residents, indicating that greater understanding of the person led to a change in the approach of staff which resulted in a change in response from the resident (Egan *et al.* 2007, Subramaniam *et al.* 2014, Eritz *et al.* 2016).

Life-story work created an opportunity for the person to tell the story of their life and their unique identity. Heggestad & Slettebo (2015) interpreted life-story telling as a way of trying to make coherence in a chaotic world and a way for the person to be seen and heard. This provides a means to maintain and promote the dignity and identity of the person and acknowledges that the resident's values and culture is important for self-esteem and maintenance of identity. Residents enjoyed talking about the past, and this validated their identity through expressions of their pride and values (Wills & Day 2008). Life-story work allowed for the fact that each person has a story to tell, a different way of telling it, and a different reason for telling their story (Russell & Timmons 2009) which supported the individuality and uniqueness of each individual (Wills & Day 2008, Phenice & Griffore 2013). Creating life-story work embraced the individual's identity, as memories of life experiences collected served as anchors to the person's identity and a time or culture that no longer exists (Phenice & Griffore 2013). Life-story work enabled staff to organise activities

that would be of interest to the individual, or that might spark something in them (Ervin *et al* 2013). In addition, life-story work facilitated families to see beyond the disease to see the person and help them to become aware and understand the persons past, in order for them to support and contribute to the present care for their relative (Kellett *et al.* 2010).

Building and maintaining relationships

Life-story work facilitated relationships to develop and be maintained within all papers reviewed. Relationships would struggle to develop and be maintained without effective communication. Life-story work was seen as a communication link that opened the conversation (McKeown *et al*. 2010/2015, Phenice & Griffore 2013) which in turn facilitated effective relationship development. It was evident that communication in some form is possible regardless of the cognitive ability of the person. In some instances the person can work collaboratively to develop the life-story or in the case of a person having a severe cognitive impairment a life-story book can be used as a prompt (Subramaniam *et al.* 2014). Life-story work aided communication between all people involved and led to better communication and quality interactions between staff, families and residents (Wills & Day 2008, Erivn *et al.* 2013). This open communication enabled relationships develop, where both staff and families developed a better understanding of the person in their care and saw the person rather than a recipient of care and thereby facilitating better relationships (Wills & Day 2008, Bakken *et al.* 2009, Kellett *et al.* 2010, Ervin *et al.* 2013, Eritz *et al.* 2016).

Life-story work with families assisted them to interact with their loved one, experience an increased sense of satisfaction with the care process, improve their relationship with their family member and staff, and feel valued (Kellett *et al.* 2010). Life-story work helped families appreciate the accomplishments of their relative and gave them the strength to cope with the impact of ageing/dementia (Kellett *et al.* 2010, Subramaniam *et al.* 2014, Eritz *et al.* 2016). Engaging in life-story work stimulated memories and conversation between family members and the person (Kellett *et al.* 2010), improved family relationships (Ervin *et al.* 2013) and gave a voice to the person who could now share their stories with their family members which resulted in them leaving a legacy for generations to come (Wills & Day 2008).

Life-story work assisted staff to appreciate the person as a member of a family unit, to understand the person and their family and strengthened staff resident relationship (Bakken *et al.* 2009, Kellett *et al.* 2010, McKeown *et al*. 2010/2015, Ervin *et al.* 2013). Life-story work was used as a point of reference for staff to communicate with residents and their families (Kellett *et al.* 2010). Individuals experienced better care practices, better quality of life and relationship warmth due to enhanced relationships between staff, residents and families (Subramaniam *et al.* 2014, Eritz *et al.* 2016). Overall the improvement of knowledge and attitudes supported staff develop relationships. Producing a product such as a life-story book enabled staff, family and the individual to spend quality time, have meaningful conversations and gain new information each time they engaged with the life-story product. Evident across the studies highlight that there is varying abilities to engage in the process and that supports, education and time are required for staff to engage in life-story work.

Discussion

As the population of older people increases due to people living longer, worldwide research in the area of residential care for older people has become increasingly important. The focus of this review has been to explore the experience of older people, families and staff using life-story work with people living in long-term care for older persons. The findings highlight, that the use of life-story work can have positive benefits for all those involved including supporting the older person in long-term care to maintain their identity and build effective relationships. However, it is unclear from the literature if the life-story work is an 'intervention' or an 'activity' as the approaches taken differs across the studies. The range of terminology used in the primary studies differs greatly which results in a lack of clarity about what life-story work means in practice and there is scope for a concept analysis on the topic. In addition, this review highlights that limited life-story work has been completed beyond the dementia population and this area warranted further exploration.

Life-story work means different things to different people, for the older person it appears that they enjoy telling their story as it gives them an opportunity to reinforce their sense of identity, self-esteem and supports their pride in self and their life (McKeown *et al.* 2006, Bakken *et al.* 2009, Thompson 2011, McKeown *et al.* 2015). Similar to findings to McKeown *et al.* (2006, 2010) staff reported that they developed an increased understanding

and insight into the person's world which helped them recognise the unique identity of each person. When nurses have an understanding of the person's life-story and the rich tapestry that make up the persons history, then a reciprocal relationship can develop that can enable the person reach their full capabilities (Buckley *et al*. 2014). For families; using life-story work reassured them about the care their relative received, they felt that staff had a better understanding of their relative, they were involved in giving the information and they developed a good working relationship with staff (McKeown *et al.* 2010, Thompson 2011).

Life-story work has been identified as a means of improving quality of life, maintaining personhood and supporting relationships (Gibson & Carson 2010, McKeown *et al.* 2006, 2010). Findings from this review suggest that life-story supports older people to maintain their identity in the context of living in long-term care facilities**.** Likewise life-story is recognised as a means of people maintaining their identity in other health and social care disciplines such as mental health (Moya & Arnold 2012, Thompson 2011) and intellectual disability (Bai *et al.* 2014). Understanding and valuing people is a key element of person-centred care, which is often difficult when working with older persons, particularly those with dementia or those with complex needs who may not be able to articulate their needs, fears and expectations of care (Campbell 2014). McCormack and McCance (2010) suggest that using the person's life-story is one means of understanding and valuing the person and this approach helps to respect the intrinsic worth of the person. Utilising life-story work supports the person to feel part of a social network and create a sense of cultural belonging (Wills & Day 2008). People with dementia may feel lost in the present (Heggestad and Slettebo 2015) and through life-story work the person may develop feelings of belonging and safety by promoting identity and self-esteem (Karlsson *et al.* 2014). This is important as identity and personhood may be lost during memory decline (Jetten *et al.* 2010). However, Subramanaim *et al*. (2014) highlights improvements in memory tests post development of a life-story book, this may be as a result of the fact that items within life-story books have a memory attached to them (Phenice & Griffore 2013).

Life-story work enhances opportunities for communication with both older people and families, which enhances the capacity of older people to build and maintain relationships with families and staff. Such relationships are relevant as they are associated with psychological well-being and maintaining identity and self-esteem (Cooney *et al.* 2013). Developing such relationships and understanding is essential in instances of vulnerability where the risk of

personhood can be discounted such as; people with more advanced dementia being considered 'less a person' and regularly referred to in the past tense (Eritz *et al.* 2016). Within practice the use of life-story work assisted the assessment process through providing information to support the expressed needs and wishes of the individual (Wills & Day 2008). However, knowing the person alone is not enough as this information has to be translated into practice if it is to have any impact on person-centred care (Edvardsson *et al.* 2010). Life-story work is seen as improving personal well-being, perceived personal health, creating a sense of personal and community connectedness as life-story work can be used to enhance social interaction (Bai *et al.* 2014). As happiness and life satisfaction potentially predict self-rated health, which is associated with physical and mental health there is a case for the use of life-story work in contributing to better quality of life across all older person care environments (Siahpush *et al.* 2008).

It is difficult to measure how behaviours response to attitude change but within the studies reviewed staff attitudes towards personhood changed as a result of the life-story work, with staff interacting with individuals in a different manner resulting in the individual's behaviours changing (Eritz *et al.* 2016). When working with individuals with dementia, behaviour is regarded as a communication of an unmet need and the response of staff to that behaviour may result in either a positive or a negative outcome for the resident (Edvardsson *et al.* 2008). It is difficult to attribute reductions in aggressive behaviours and agitation to life-story work, which may have resulted from the change in approach by staff due to the knowledge gained, greater insight into people's needs and behaviours and changes in attitudes as a result of life-story work (Egan *et al.* 2007, Wills & Day 2008, Eritz *et al.* 2016). Also of note is that individuals were less aggressive when they were involved in life-story work (Heggestad & Slettebo 2015) and that staff altered their strategies to overcome behaviours after engaging in life-story work (Ervin *et al.* 2013). Furthermore life-story work challenges attitudes and stereotyping (Bakken *et al.* 2009) and while carrying out a life-story work staffs beliefs about older peoples abilities can be challenged, suggesting that a life-story approach may be a more ethical approach to care (McKeown *et al.* 2010).

Education has been highlighted as an important support for staff in supporting life-story work (Bakken *et al.* 2009, Gibson & Carson 2010, Ervin *et al.* 2013). However, there is also a suggestion that the attitudes and attributes which work best with life-story work as not always obtained through education and training but are more likely to be inherent to the individual

person (Sheard 2010). Thereby training and development for staff should concentrate on developing staff self-awareness and emotional intelligence instead of competencies (Sheard 2010). Challenges such as a lack of time are identified as contributing to life-story work not being used in practice (Gibson & Carson 2010). However, in reality life-story work requires little additional time and consideration needed to be given to what we prioritise, as the issue is not the amount of time available but how it is utilised (Bakken *et* al. 2009). This has to be considered in the context that aged care settings can often be task-oriented thereby limiting opportunities to engage in meaningful conversations (Bennett *et al*. 2016). However, life-story work must be given greater importance (Bakken *et al.* 2009) especially in light of the fact that Dugmore *et al.* (2015) in their systematic review found that staff viewed psychological interventions including life-story work, as not being 'real work'.

Barriers to introducing life-story work include, a lack of a standard format for collecting information (Bakken *et al.* 2009, McKeown *et al.* 2015) and the available resources may not be suited to the person developing their own life-story (Kindell *et al.* 2014). Furthermore, resources are reported as interventions or templates within the literature which can be completed as an activity. Moya & Arnold (2012) developed a life-story toolkit resource in mental health suggesting its suitability in any setting, which entailed developing a poster or story outlining the positive things in the person's life through written memories, photographs or memorabilia. While life-story interventions or templates may be useful there is a risk of them becoming another form to be completed, box to be ticked, questions to be answered. Thereby, becoming another nursing chore and resulting in the creative aspect of the person's life being missed (Kindell *et al.* 2014). Educational programmes need to focus on the application of life-story work and emphasise the challenges and ethical issues (Gaughan *et al.* 2016) and further research is required regarding the contribution of life-story work to quality of life (Berendonk and Caine 2015).

The reviewed studies highlight that it must always be remembered, that life-story work is not for everyone, and often individuals and their carers may be reluctant to engage in the process (Wills & Day 2008, Kellett *et al.* 2010, Ervin *et al.* 2013, Subramaniam *et al.* 2014). For instance family carers may not yet have come to terms with the life changes that dementia and long-term care can bring (Kellett *et al.* 2010) or some people may have had traumatic lives and memories that they do not want to revisit (Wills & Day 2008). However, what was evident within this review was that while participants may have found recalling experiences

raised emotions they still wished to continue and tell their story (Bakken *et al.* 2009). However, it is important that people are given choice and that they can refuse to participate or withdraw from the life-story work at any time, as there is little guidance on managing a difficult situation when a resident becomes upset (Kindell *et al.* 2014).

Conclusion

A life-story book is a person's own personal account of their life-story and the process is as important as the product at the end (Gibson 2005). Life-story work results in a tangible outcome facilitating people to leave a legacy to their families that they can pass onto the younger generation (Johnston & Narayanasamy 2016). Our review suggests that life-story work has the potential to enhance person-centred care in long-term aged care facilities and improve the care environment for the person (Osterholm and Hyden 2016). However, success depends on how staff interact with families and residents, and the allocation of sufficient time by the organisation for staff to engage in life-story work (Lawrence *et al.* 2012). This integrative review highlights that carrying out life-story supports personal identity and relationships. However, it is important to recognise that life-story work requires resources, time and education if it is to be implemented well and the evidence from the literature supports the importance and value of providing education, training and support to staff prior to carrying out life-story work (Bakken *et al.* 2009, Gibson & Carson 2010, Ervin *et al.* 2013). Thereby the commitment of service providers and managers is necessary for life-story work to be sustained in practice (Gibson &d Carson 2010). However, none of the studies reviewed made reference to management's perspective of life-story work thus there is a need to examine the context, culture and leadership in the organisation (Thompson 2011).

Limitations of this review

The search was limited to English language sources and relevant publications containing useful information may exist in other languages, leading to publication bias. Also the studies included in this review were conducted in seven different countries and the approach to caring for older people may differ between these countries. Thus it was not possible to capture the differences from the studies. This review focused on exploring the experience of

using life-story work in residential services for older people. This could potentially mean that other important issues may not have been considered, for example looking at using life-story work in residential care for people with intellectual disabilities, mental health problems or people with dementia. The use of different terminology may have meant that relevant articles were excluded. Despite these limitations the review provides a comprehensive overview of the experience of using life-story work in residential aged care facilities that can be added to the current body of knowledge around life-story work and give direction to further research in the area.

Relevance to clinical practice

Life-story work assists in supporting and informing a person's care and is a beneficial activity for staff, older people, people with dementia and their family: facilitate relationships, supporting person-centeredness; improving communication, and facilitating self-pride of the person and their life. Staff working with older people undertaking life-story work need to be equipped with the skills and knowledge to recognise and manage the challenges and issues that may potentially arise. Challenges such as; inconsistent implementation of life-story work, application of theory in relation to listening to narratives, dealing with emotions that may arise in the process highlight that careful planning, education and support is required to support the implementation of life-story work in practice. Further research into the successful implementation of life-story work as a nursing intervention with older people is required to support staff in co-creating life-story work in a systematic way. Moreover guidance is required for staff as to how they can use biographical information within individual care planning and care practices. Life-story work as an intervention assists in maintaining a sense of self and identity and should be supported by care organisations through supporting staff education, providing appropriate resources to enable staff to recognise and foster older person's narratives.

References

Aslam S. & Emmanuel P. (2010) Formulating a researchable question: a critical step for facilitating good clinical research. I*ndian Journal of Sexually Transmitted Diseases and AIDS* **31**, 47-50.

Bai X., Ho D.W., Fung K., Tang L., He M., Young K.W. & Kwok T. (2014) Effectiveness of a life-story work program on older adults with intellectual disabilities. *Clinical Interventions in Aging* **9**, 1865-1872.

Bakken L., Lerdal A. & Harding T. (2009) Norwegian healthcare workers' experience with implementing life-story work in a nursing home. *Klinisk Sygepleje* **23**, 12 – 18.

Baldwin C. (2009) Toward a person-centred ethic in dementia care: doing right or being good. In: Downs M. & Bowers B. Excellence in Dementia Care: Research into Practice. Maidenhead: McGraw Hill Education, pp. 103-118.

Bennett M.K., Ward E.C. & Scarinci N.A. (2016) Exploratory investigation of communication management in residential-aged care: a comparison of staff knowledge, documentation and observed resident–staff communication. *International Journal of Language & Communication Disorders* **51**, 296-309.

Braun V. & Clarke V. (2006) Using thematic analysis in psychology. *Qualitative Research in Psychology* **3**, 77-101.

Brownie S. & Nancarrow S. (2013) Effects of person-centered care on residents and staff in aged-care facilities: a systematic review. *Clinical Interventions in Aging* **8**, 1-10.

Buckley C., McCormack B. & Ryan A. (2014) Valuing narrative in the care of older people: A framework of narrative practice for older adult residential care settings. *Journal of Clinical Nursing* **23**, 2565-2577.

Buetow S. (2010) Thematic analysis and its reconceptualization as 'saliency analysis'. *Journal of Health Services Research & Policy* **15**, 123-125.

Buron B. (2010) Life history collages: Effects on nursing home staff caring for residents with dementia. *Journal of Gerontological Nursing* **36**, 38-48.

Campbell A. (2014) What are the factors that influence person centred care in public residential care settings for older people. Doctoral dissertation, National University of Ireland, Galway. Online available 13 January 2018 https://aran.library.nuigalway.ie/bitstream/handle/10379/4443/Phd%20Feb%202014%20ACampbell.pdf?sequence=1&isAllowed=y

Cooney A., Dowling M., Gannon M.E., Dempsey L. & Murphy K. (2013) Exploration of the meaning of connectedness for older people in long-term care in context of their quality of life: a review and commentary. *International Journal of Older People Nursing* 9,192-199.

Critical Appraisal Skills Programme (CASP) 2014. *CASP Checklists* (URL used) Oxford: CASP.

Day M.R. (2016) A Life Story Book Intervention for Nursing Home Residents: Practice Development Project. *Journal of the All Ireland Gerontological Nurses Association* **3**, 4-7.

Dennerstein M., Bhar S.S. & Castles J.J. (2017) A randomized controlled trial examining the impact of aged care residents' written life-stories on aged care staff knowledge and attitudes. *International Psychogeriatrics*, 1-9. doi:10.1017/S1041610217002800

Dugmore O., Orrell M. & Spector A. (2015) Qualitative studies of psychosocial interventions for dementia: a systematic review. *Ageing & Mental Health* **19**, 955-967.

Edvardsson D. & Nordvall K. (2008) Lost in the present but confident of the past: experiences of being in a psychogeriatric unit as narrated by persons with dementia. *Journal of Clinical Nursing* **17**, 491–498.

Edvardsson D., Fetherstonhaugh D. & Nay R. (2010) Promoting a continuation of self and normality: person-centred care as described by people with dementia, their family members and aged care staff. *Journal of Clinical Nursing* **19**, 2611 -2618.

Edvardsson D., Fetherstonhaugh D. & Nay R. (2011) The Tool for Understanding Residents' Needs as Individual Persons (TURNIP): construction and initial testing. *Journal of Clinical Nursing* ***19*****-20**, 2890-2896.

Edvardsson D., Petersson L., Sjogre, K., Lindkvist M. & Sandman P.O. (2014) Everyday activities for people with dementia in residential aged care: associations with

person-centredness and quality of life. *International Journal of Older People Nursing* **9**, 269-276.

Edvardsson D., Sandman P.O., Nay R. & Karlsson S. (2009) Predictors of job strain in residential dementia care nursing staff. *Journal of Nursing Management*, **17**, 59-65.

Egan M.Y., Munroe S., Hubert C., Rossiter T., Gauthier A., Eisner M. & Rodrigue C. (2007) Caring for residents with dementia and impact of life history knowledge. *Journal of Gerontological Nursing* **33**, 24-30.

Equality and Human Rights Commission. (2011). Close to home-an inquiry into older people and human rights in home care. London: EHRC.

Eritz H., Hadjistavropoulos T., Williams J., Kroeker K., Martin R.R., Lix L.M. & Hunter P.V. (2016) A life history intervention for individuals with dementia: a randomised controlled trial examining nursing staff empathy, perceived patient personhood and aggressive behaviours. *Ageing and Society* **36**, 2061-6089.

Ervin K.E., Cross M. & Koschel A. (2013) Working together in lifestory telling for residents in aged care facilities: A qualitative study of staff/family collaboration in aged care. *Journal of Nursing Education and Practice* **3**, 102.

Gaughan A., Woods B., Subramaniam P., Milton S., Tottie J., Drummond G., Shaw J., Broster P., Sutton J., Thompson R. & Metcalfe V. (2016) *Life story work with people with dementia: Ordinary lives, extraordinary people*. London: Jessica Kingsley Publishers.

Gibson F. (2005) *Fit for life: the contribution of life-story work*. In M. Marsall (Ed.), Perspectives on rehabilitation and dementia (pp. 175–179). Jessica Kingsley Publishers: London.

Gibson F. & Carson Y. (2010) Life-story work in practice: aiming for enduring change. *Journal of Dementia Care* **18**, 20-22.

Grøndahl V.A., Persenius M., Bååth C. & Helgesen A.K. (2017) The use of life stories and its influence on persons with dementia, their relatives and staff–a systematic mixed studies review. *BMC Nursing* **16**, 28.

Heggestad A.K.T. & Slettebo A. (2015) How individuals with dementia in nursing homes maintain their dignity through life-storytelling–a case study. *Journal of Clinical Nursing* **24**, 2323-2330.

Jetten J., Haslam C., Pugliese C., Tonks J. & Haslam S.A. (2010) Declining autobiographical memory and the loss of identity: effects on well-being. *Journal of Clinical and Experimental Neuropsychology* **32**, 408–416.

Johnston B. & Narayanasamy M. (2016) Exploring psychosocial interventions for people with dementia that enhance personhood and relate to legacy- an integrative review. *BMC Geriatrics* **16**, 77.

Kahn KS., Kunz R., Kleijnen J. & Antes A. (2003) *Systematic reviews to support evidence-based medicine: how to review and apply findings of healthcare research*. Royal Society of Medicine. Press, London.

Karlsson E., Savenstedt S., Axelsson K. & Zingmark K. (2014) Stories about life narrated by people with Alzheimer's disease. *Journal of Advanced Nursing* **70**, 2791-2799.

Kellett U., Moyle W., McAllister M., King C. & Gallagher F. (2010) Life stories and biography: a means of connecting family and staff to people with dementia. *Journal of Clinical Nursing* **19**, 1707-1715.

Kelly B., Tolson D, Schofield I & Booth J (2005) Describing gerontological nursing: an academic exercise or prerequisite for progress? *Journal of Clinical Nursing* **14**, 13-28.

Kindell J. Burrow S., Wilkinson R. & Keady J. (2014) Life-story resources in dementia care: a review. *Quality in Ageing and Older Adults* **15**, 151-161.

Kitwood, T. (1997) *Dementia reconsidered: The person comes first*. New York: Open

University Press.

Lawrence V., Fossey J., Ballard C., Moniz-Cook E. & Murray J. (2012) Improving quality of life for people with dementia in care homes: making psychosocial interventions work. *The British Journal of Psychiatry* **201**, 344-351.

Linde C. (1993) *Life Stories: The creation of coherence*. Oxford: Oxford University Press

McAdams D.P. & McLean K.C. (2013) Narrative identity. *Current Directions in Psychological Science*, **22**, 233-238.

McCormack B. & McCance T. (2010) *Person- Centred Nursing Theory and Practice*. Oxford: Wiley-Blackwell.

McCormack B., Dewing J., Breslin L., Coyne- Nevin A., Kennedy K., Manning M., Peelo-Kilroe L. & Tobin C. (2010) Developing person-centred practice: nursing outcomes arising from changes to the care environment in residential settings for older people. *International Journal of Older People Nursing* **5**, 93–107.

McCormack B., Roberts T., Meyer J., Morgan D. & Boscart V. (2012) Appreciating the 'person'in long-term care. *International Journal of Older People Nursing* **7**, 284-294.

McKeown J., Clarke A. & Repper J. (2006) Life-story work in health and social care: Systematic literature review. *Journal of Advanced Nursing* **55**, 237-247.

McKeown J., Clarke A., Ingleton C., Ryan T. & Repper J. (2010) The use of life-story work with people with dementia to enhance person-centred care. *International Journal of Older People Nursing* **5**,148-158.

McKeown J., Ryan T., Ingleton C. & Clarke A. (2015) 'You have to be mindful of whose story it is': The challenges of undertaking life-story work with people with dementia and their family carers. *Dementia* **14**, 238-256.

Moher D., Liberati A., Tetzlaff J. & Altman D.G. The PRISMA Group (2009) Preferred Reporting Items for Systematic Reviews and Meta-Analyses: The PRISMA Statement. PLoS Med 6(7): e1000097. doi:10.1371/journal.pmed.1000097

Moos I. & Björn A. (2006) Use of the life-story in the institutional care of people with dementia: a review of intervention studies. *Ageing and Society* **26**, 431-454.

Moya H. & Arnold P. (2012) 'A Life-story Tool kit to Support Recovery from Mental Distress. *Mental Health Practice* **16**, 14-18.

Moya, H. (2010) Identities on paper. Constructing lives for people with intellectual disabilities in life-story books. *Narrative Inquiry* **19**, 135–153.

Österholm J.H. & Hydén L.C. (2016) Autobiographical occasions in assessment meetings involving persons with dementia. *Qualitative Social Work*, Early View DOI: 10.1177/1473325016653466.

Phenice L. A. & Griffore R. J. (2013) The Importance of Object Memories for Older Adults. *Educational Gerontology* **39**, 741-749.

Randall W.L. (2014) *The stories we are: An essay on self-creation*. 2nd ed. Toronto: University of Toronto Press.

Randall W.L. (2012) *Beyond healthy aging: The practice of narrative care in gerontology*. In: English L.M. *Adult education and health*. Toronto: University of Toronto Press. pp.178-192.

Randall W.L. (2010) The narrative complexity of our past: In praise of memory's sins. *Theory & Psychology*, **20**, 147-169.

Rogers C. (1951) *Client Centred Therapy*. Constable, London.

Russell C. & Timmons S. (2009) Life-story work and nursing home residents with dementia. *Nursing Older People* **21**, 28-32.

Sheard D. (2010) The task is the mask: solving the riddle of being person centred. *Journal of Dementia and Mental Health Care of Older People* **15**, 3-6.

Siahpush M., Spittal M. & Singh G.K. (2008) Happiness and life satisfaction prospectively predict self-rated health, physical health, and the presence of limiting, long-term health conditions. *American Journal of Health Promotion* **23**, 18-26.

Subramaniam P., Woods B. & Whitaker C. (2014) Life review and life-story books for people with mild to moderate dementia: a randomised controlled trial. *Aging & Mental Health* **18**, 363-375.

Thompson R. (2011) Using life-story work to enhance care. *Nursing Older People* **23**, 16-21.

Thorgrimsdottir S.H. & Bjornsdottir K. (2016) Reminiscence work with older people: the development of a historical reminiscence tool. *International Journal of Older People Nursing* **11**, 70-79.

Tong A., Flemming K.,McInnes E., Oliver S. & Craig J. (2012) Enhancing transparency in reporting the synthesis of qualitative research: ENTREQ. *BMC Medical Research Methodology* 12, 38. doi: 10.1186/1471-2288-12-181.

Whittemore R. & Knafl K. (2005) The integrative review: Updated methodology. *Journal of Advanced Nursing* **52**, 546-553.

Wills T. & Day M. (2008) Valuing the person's story: use of life-story books in a continuing care setting. *Clinical Interventions in Ageing* **3**, 547–552.

Table 1: Search process and inclusion criteria

Databases search
Databases -Scopus , Embase, MEDLINE, CINAHL, PsycINFO, PsychARTICLES, Cochrane. Timeline - 01 January 2006 – 14 March 2016.
Key Search Terms
TI (Older person OR gerontology OR aged OR ageing OR aging OR elderly) OR AB (Older person OR gerontology OR aged OR ageing OR aging OR elderly) TI (Nursing home OR residential care OR long term care OR aged care OR elderly OR long stay) OR AB (Nursing home OR residential care OR long term care OR aged care OR elderly OR long stay TI (Life stor* OR life history OR Narrative OR Biograph*) OR AB (Life stor* OR life history OR Narrative OR Biograph*) Age Groups: Aged: 65+ years; Language: English
Eligibility Criteria
Paper from peer reviewed journals from 01 Jan 2006 to 14 March 2016 Studies focused on life-story work and older people in residential care facilities Papers written in English Included participants who were 65yrs or more living in a residential care facility Studies where life-story work was utilised with older people in aged care facilities and end product evident
Exclusion Criteria
Studies with a population under the age of 65 Studies in languages other than English. Papers that refer to the development of a life-story tool/resource/framework Studies where the results do not identify the use of life-story work Mental Health settings Intellectual disability settings Acute care settings Community care settings Unpublished studies

Table 2: Critical appraisal of papers

Authors	Q1	Q2	Q3	Q4	Q5	Q6	Q7	Q8	Q9	Q10	Q11	Q12
Bakken, Lerdal &Harding 2009	yes	yes	yes	yes	yes	no	yes	yes	yes	yes	NA	NA
Egan *et al.* 2007	yes	yes	yes	yes	yes	no	yes	no	yes	yes	NA	NA
Ervin *et al.* 2013	yes	yes	yes	yes	yes	No	yes	yes	yes	yes	NA	NA
Heggestad and Slettebo 2015	yes	yes	yes	yes	yes	yes	yes	yes	yes	yes	NA	NA
Kellett *et al.* 2010	yes	yes	yes	yes	yes	no	yes	yes	yes	yes	NA	NA
McKeown *et al.* (2010)	yes	yes	yes	yes	yes	yes	yes	yes	yes	yes	NA	NA
McKeown *et al.* (2015)	yes	yes	yes	yes	yes	yes	yes	yes	yes	yes	NA	NA
Phenice and Griffore 2013	yes	yes	yes	yes	yes	yes	no	yes	yes	yes	NA	NA
Russell and Timmons 2009	yes	yes	yes	yes	yes	no	yes	no	yes	yes	NA	NA
Wills and Day 2008	yes	yes	yes	yes	yes	yes	yes	yes	yes	yes	NA	NA
Eritz *et al.* 2016	yes	yes	yes	yes	yes	No	yes	yes	yes	yes	NA	NA
Subramaniam *et al.* 2014	yes	yes	yes	yes	yes	yes	yes	yes	yes	yes	yes	NA
Eritz *et al.* 2016	yes	yes	yes	yes	yes	yes	yes	yes	yes	yes	yes	NA
Buron 2010	yes	yes	yes	yes	yes	yes	results table 3	yes	yes	yes	No	see *
Egan *et al.* 2007	yes	yes	yes	yes	yes	yes	results table 3	unclear	yes	yes	yes	see **

*Buron (2010) showed that making life-story information available to staff does lead to greater staff knowledge about the resident. The implications for practice are positive as improved staff knowledge of residents may lead to improved relationships and staff job satisfaction (Buron 2010).

**Egan *et al.* (2007) found a moderate reduction in resident aggressive behaviour following the life-story work. Half of the staff reported a change in their own approach to care as a direct result of knowing more about the resident and their life.

Table 3: Data extraction

Author, Publication year, Title, and Country	Study aim	Methodology / design	Sample strategy and size	Data collection method/product used	Analytical approach	Summary of main findings and quality assurance
Bakken, Lerdal, Harding (2009) Norwegian healthcare workers experience with implementing life-story work into a nursing home. Norway	To describe the experience of a group of health care workers in applying life-story work in nursing practice.	Qualitative hermeneutic study.	8 members of staff (mix of nursing staff and care workers).	Semi structured interviews with the 8 staff members. Life story narrative.	Thematic analysis.	Findings: Life-story work may be a way to overcome negative stereotyping. Strengthened relationships between staff and residents. Staff reported better understanding of the residents.
Buron (2010) Life History Collages Effects on nursing home staff caring for people with dementia USA	This study evaluated the effects of person-centred life history collages on nursing staff knowledge about individual residents living with dementia and staff perceptions of individualized care practices.	Quantitative quasi-experimental design	Convenience samples of 5 residents with dementia (3 intervention, 2 control) and 36 nursing staff members (18 intervention, 18 control).	Staff completed a pre-test and post-test questionnaire. It was administered to both groups (control and intervention) measuring their knowledge of the residents' past history, likes and dislikes. Life story collages.	A self-rated measurement of individualised care tool (Chapell et al 2007) was then administered to staff to assess their perceptions of person-centred care practices practice.	The intervention group's knowledge improved significantly more than the control group's at post-test ($p < 0.01$), and at 3 weeks post-intervention ($p < 0.001$). The intervention group demonstrated a 6- fold increase in knowledge of residents' jobs/careers and a 1.9-fold increase in knowledge of the residents' family at 3 weeks post-intervention. The sample size may not have been sufficient to detect changes in perception of practice following intervention. The measurement instrument had not been previously tested for validity and reliability. The measurement scale used was a subjective scale measuring the perceptions of staff about their knowledge of residents rather than their actual knowledge.
Egan, Munroe, Hubert, Rossiter, Gauthier, Eisner, Fulford, Neilson, Daros, Rodrigue (2007) Caring for residents with dementia, impact of life history.	To investigate: If sharing knowledge of resident life history with staff is associated with (a) decreased frequency of problem behaviours, and (b) change in staff perception of residents and staff interaction	Mixed methods of qualitative and quantitative.	10 staff (3 nursing, 7 care assistants). 4 residents with dementia.	Data was collected every 2 hours on 4 residents and recorded behaviour was recorded for 14 days pre introduction of the life history and for 21 days after. 10 staff members were	Quantitative aggression was measured pre and post life-story work intervention, celeration line analysis used to map change in behaviours.	Life-story work has the potential to improve quality of life for residents in long term care and to decrease aggressive behaviour. Care must be taken when dealing with sensitive aspects of residents' story. Celeration line analysis indicated a decrease in verbal aggression for 2 residents and decrease in physical aggression for one resident. However, analysis was not possible

Canada	with residents.			interviewed using open ended interviews. Life history narrative	Qualitative-content analysis of staff interviews.	for 2 residents due to low frequency of aggressive behaviour at baseline. Small sample size (n=4) and did not include a control group.
Eritz, Hadjistavropoulos, Williams, Kroeker, Martin, Lix, Hunter (2016) A life history intervention for individuals with dementia: a randomised controlled trial examining nursing staff empathy, perceived patient personhood and aggressive behaviours. Canada	To see if an intervention involving sharing resident life histories may be effective in reducing aggressive behaviours and improving quality of life.	Mixed method of qualitative and quantitative. (Randomised controlled trial, survey and qualitative analysis of open responses and staff interviews).	73 residents with dementia 99 staff (mixed group of qualified nurses and care assistants).	Qualitative data semi-structured interviews. Quantitative data - measures used aggression/agitation (Aggression Behaviour Scale ABS and Cohen-Mansfield Agitation Inventory CMAI); nurse empathy and personhood (Jefferson Scale of Physician Empathy Healthcare Professionals – JSPE- HP, Personhood in Dementia Questionnaire - PDQ); medications (fewer PRN medications); and QOL (Alzheimer's Disease-Related Quality of Life - ADRQL). Cognitive Performance Scale - CPS used to indicate dementia severity. Life history narrative and photographs.	Qualitative analysis of staff interviews and handwritten responses to open questions. Statistical evaluation of quantitative data using mixed-effects multiple regression models to test if Life History (LH) group had better outcomes than the Medical History (MH) group after intervention. Independent t-tests conducted if model significant.	ABS score, the LH group, $t(39) = -4.11$, $p < 0.01$ and the MH group, $t(39) = -3.12$, $p < 0.01$ were both significantly different from zero. The JSPE scores difference between the LH and MH groups were statistically significant, $F(2, 221) = 5.76$, $p < 0.01$. Empathy scores decreasing at a greater rate for the MH group post-intervention and the LH group. PDQ change scores, the LH and MH groups was statistically significant, $F(1,223) = 10.59$, $p < 0.01$, with PDQ scores increasing at post-intervention for the LH group and decreasing for the MH group. The LH group was found to be significantly different from zero, $t(223) = 2.85$, $p < 0.01$, while the MH group was not. PDQ change scores post-intervention to follow-up, resulted in a statistically significant difference between the LH group and MH group, $F(1, 211) = 6.44$, $p < 0.05$, with PDQ scores decreasing at follow-up for the LH group and increasing for the MH group. T- Tests indicated that this change in scores was significantly different from zero for the LH group, $t(211) = -2.62$, $p < 0.05$. ADRQL change scores difference between the LH and MH groups was statistically significant, $F(1, 35) = 9.52$, $p < 0.01$. Scores on the ADRQL increased at post- intervention for both the LH and MH groups, but at a greater rate for the LH group. The change in the LH group's ADRQL scores was found to be significantly different from zero, $t(35)=2.71$, $p < 0.05$. The estimate of the total effect was found to be statistically significant, with a test statistic of -3.54, $p <$ 0.001. Mediation difference between the LH and MH groups on the ABS indicated an

						estimate of total effect to be statistically significant, with a test statistic of −2.57, p <0.05. Significant negative correlations were found between the CPS and the ADRQL at baseline, r(71) = −0.48, p < 0.01 intervention, r(66) = −0.42, p < 0.01, and follow-up, r(67) = −0.44, p < 0.01, indicating that with increased cognitive impairment, QOL declines. Qualitative data revealed differences in staffs' use of language for residents with severe dementia, compared to those with mild/moderate dementia. Staff got to know the person with mild/moderate dementia and showed genuine interest in the person's wellbeing. Personhood perception for those with severe dementia was lessened (residents were referred to in the past tense). When staff learned about the person's history they gained more respect for the person. Research design strong (RCT) also evaluation across three time points, with a control group. Showed the benefit of life history intervention on QOL and improvements in staff perception of personhood and staff verbal interactions with residents but not on aggressive behaviours.
Ervin, Cross, Koschel (2013) Working together in life-story telling for residents in aged care facilities: A qualitative study of staff/family collaboration in aged. Australia	To explore staff and family perceptions of working together to undertake life-story telling for residents with dementia, and whether life-story telling as an intervention improved care	Qualitative narrative enquiry.	Semi structured interviews with interview guide. 12 staff and 12 family members of residents.	Semi structured interviews with interview guide. Life-story telling activities including posters, quilts and booklets.	Thematic analysis.	Four themes identified: staff/family relationships and communication, care needs insight and strategies, staff training, and family participation. Found life-story work is important for person-centred care and for staff family relationships.
Heggestad and Slettebø (2015) How individuals with dementia in nursing homes maintain	To present and discuss findings on what individuals with dementia do by	Qualitative phenomenological and hermeneutic design. It reports 3	3 life stories/case histories based on participant observation with 5	By participant observation and interview. Life-story telling	Narrative analysis.	Life-story work carried out through story telling is an important way of preserving dignity for people in residential care. This is a means of respecting the lives they lead and

their dignity through life-storytelling – a case study. Norway.	themselves to maintain or promote their dignity of identity when they live in a nursing home.	life stories based on participant observation and interviews with 5 residents. Case Study design with narrative analysis.	residents with dementia in 2 residential care units. 15 residents participated in the overall study.	recordings.		facilitating them to be an active participant in their own lives
Kellett, Moyle, McAllister, King, Gallagher (2010) Life-stories and biography: a means of connecting family and staff to people with dementia. Australia.	To assess the Family Biography Workshop (FBW) designed to support family and staff to co-construct the history of the person with dementia in residential care.	A qualitative descriptive approach exploring the understanding of life-story work for families and relatives in care roles.	The FBW process involved 7 family caregivers, 7 staff and 1 researcher working collaboratively through a series of six weekly two-hour sessions.	Focus group interviews. Family biography.	Thematic analysis.	Range of findings in relation to the experience for family – feeling of satisfaction at being able to contribute to the care of the resident by passing on information. Resident- this study found that residents were better socially stimulated by staff and their families using their personal knowledge. All participants including staff participated in a less superficial way which improved relationships and promoted partnerships
McKeown, Clarke, Ingleton, Ryan, Repper (2010) The use of life story work with people with dementia to enhance person centred care. United Kingdom	To explore the use of taking a life-story work with people with dementia.	Qualitative, multiple case study.	A sample of 4 people with dementia, 12 professional staff and 3family.	Conversations, observations, interviews, and documentary analysis. Three cases developed a life story book and one a pen picture.		Life-story work can enhance person-centred care. For the patient it instilled a sense of pride and enjoyment in their lives and gave them a voice. For the family it support them uphold their relative's personhood. For staff: it enabled them see the person.
McKeown, Ryan, Ingleton, Clarke (2015) You have to be mindful of whose story it is' the challenges of undertaking life story work with people with dementia and their family carers United Kingdom	To critically appraise some of the challenges that may emerge through the process of undertaking Life story work	Qualitative, multiple case study.	A sample of 4 people with dementia, 12 professional staff and 3family.	Conversations, observations, interviews, and documentary analysis. Three cases developed a life story book and one a pen picture.	Framework analysis.	Highlights the experiences of people with dementia, family careers and care staff in using life story work. Several challenges may occur such as who's story is it, disclosure and under and overuse of life story. Quality of boos varied.
Phenice, Griffore	This study explores the	Qualitative	11 residents.	A structured	Thematic analysis.	Objects and their memories can stimulate

(2013) The importance of object memories for older adults. New Zealand.	roles and functions of object memories in the lives of elders in a residential home.	ethnographic.		interview format was used to guide the process. Objects from life to create memories.		cognition and provide essential motivation for well-being. Recalling familiar memories can help older people minimise some of the losses they experience and give them a feeling of being respected.
Russell, Timmons (2009) Life-story work and nursing home residents with dementia. United Kingdom.	The study aimed to listen to the stories of nursing home residents with dementia to gain insight into their understanding of themselves.	Qualitative narrative.	5 participants with mild to moderate dementia.	Unstructured interviews. Life story narrative.	Narrative analysis.	Individuality of each participant was shown by the acknowledgement that they each had a different story to tell.
Subramaniam, Woods, Whitaker (2014) Life review and life-story books for people with mild to moderate dementia: a randomised controlled trial. United Kingdom.	To evaluate the effect of different pathways for developing a life-story book (LSB) for people with dementia.	Quantitative randomised control trial	23 people with dementia (level of dementia measured) 2 groups. Gift group and life review group.	Pre and post measures taken using; Clinical dementia rating (CDR) scale, Quality of life–Alzheimer's disease (QOL–AD), The Autobiographical Memory Interview, Extended version (AMI-E), The Geriatric Depression Scale (GDS-12R), Quality of the caregiving relationship questionnaire (QCPR), Approaches to Dementia Questionnaire (ADQ), Staff knowledge of care-recipient questionnaire Life review sessions with life story book.	Statistical analysis to measure quality of life. Baseline differences between groups demographic assessed by Fisher's exact test for categorical variables and independent samples t-test for continuous variables. One-way between-group analyses of covariance (ANCOVA) used with baseline score entered as a covariate.	At the 12-week assessment, the primary outcome variable, QOL–AD showed a significant improvement in scores for the life review group, in comparison with the 'gift' group who were receiving usual care during this period [$F(1, 20) = 5.11$, $p = 0.035$]. The receipt of a life story book produced either through a life review process or by the participant's relative is associated with increased QOL among participants relative to the initial baseline assessment ($p = 0.007$). ANOVA with post hoc paired t-tests compared scores on the ADQ scale/sub-scales across the three time-points indicated statistically significant differences between time-points. Where staff attitudes towards the person with dementia had improved scores that were significantly higher at the final follow-up compared with initial baseline scores ($p < 0.001$), and these scores as well as person-centred attitudes improved significantly between the intermediate assessment and the final follow-up ($p \leq 0.001$). QoL-AD reported to be valid and reliable when used with people with mild to moderate dementia.

Wills, Day (2008) Valuing the person's story: Use of life-story books in a continuing care setting. Rep of Ireland.	The purpose of this study was to engage residents in developing life-story books in a nursing home setting - story books with residents and their families.	A qualitative descriptive exploratory design.	5 residents and 3 family carers participated.	Focus groups interviews. Life story book.	Thematically analysed.	The central themes from the data analysis related to the social construction of people's lives, social roles and religious values, relationships and loss, and sense of self. The use of Life-story books in this study gave a voice to older people, and gave them the opportunity to write and narrate their story. It allowed them to share their stories with residents, family and staff. Life-story books make an important contribution in meeting the individual needs of older people.

Figure 1: PRISMA 2009 Flow Diagram