

1. FULL PROJECT TITLE

Improving skills and care standards in the clinical support workforce: a realist synthesis of workforce development interventions

2. SUMMARY OF RESEARCH

The NHS and its social care partners are under pressure to develop new service models, processes, roles and expertise in the care of older people. One in five people are estimated to be aged over 65 by 2033 (Wise, 2010), while 70% of the health budget is spent on those over 65 (Oliver, 2010). Multiple, long term conditions afflicting older people may be associated with a complex mix of interventions and approaches, including specific needs around communication and cognition, which will shape the design of both hospital and community based care interventions. However, NHS care standards have been criticised (CQC, 2011; Parliamentary and Health Service Ombudsman, 2011), while others accuse services of 'ageist' practices and attitudes (Tadd et al., 2011).

Assistant care workers support the work of the regulated, professional workforce in their day to day duties. However, present use and development of assistant care workers has been somewhat ad hoc, with a range of practices and approaches adopted due to the various roles performed (Nancarrow et al., 2010) and differences between NHS Trusts (Spilsbury et al., 2009). In parallel, clinical support workers have also become an undervalued resource (Schneider et al., 2010).

This review will fill a gap in the evidence base by identifying the interventions that have the potential to enhance the skills and care standards in the clinical support workforce for older people. We are specifically interested in uncovering how and why workforce development interventions may impact, and on whom, to guide workforce development policy and practice.

2.1. Review question & aims

How can workforce development interventions improve skills and care standards of clinical support workers within older people's health services?

1. Identify support worker development interventions from different public services and to synthesise evidence of impact.
2. Identify the mechanisms through which these interventions deliver support workforce and organisational improvements to benefit the care of older people.
3. Investigate the contextual characteristics that mediate the potential impact of these mechanisms on clinical care standards for older people.
4. Develop an explanatory framework that synthesises review findings of relevance to services delivering care to older people.
5. Recommend improvements for the design and implementation of workforce development interventions for clinical support workers.

2.2. Approach

We will undertake a realist synthesis to address the review question and aims. Realist enquiry is based on causal and contingent explanations that identify underlying attributes contributing to a particular outcome in a number of specific (but not identical) phenomena. As workforce development is context dependent and complex, a realist review will facilitate an understanding of how different workforce interventions may work in different settings to result in impacts/outcomes.

Our realist synthesis will be conducted in four phases over 18 months:

Phase 1: Programme theory development

We will construct a theoretical framework, i.e. the review's programme theories, from the underpinning literature on learning and workforce development in consultation with stakeholders, including educators, practitioners, managers, and patients. The framework will provide a provisional explanation of the impact of interventions by bringing together separate but interlinked disciplines, each with their own literature, theory and approaches. These include:

- Learning and role progression – the professional development from novice to expert (e.g. Dreyfus & Dreyfus, 1980, 1985)
- Multiple levels of intervention, learning & role progression - connections between different interventions and functions being performed (e.g. Pratt et al. 1999)
- Learning theory, theories of adult learning and theories of transformational learning - how individuals learn new processes and ideas (e.g. Bloom, 1956; Kolb, 1984; Senge, Sharmer et al. 2005)
- Workforce behaviour change (e.g. Michie et al., 2009; Prochaska & DiClemente, 1982), practice development (e.g. McCormack et al 2007), and closing the gap between evidence and practice (Rycroft-Malone et al 2002; Nutley et al 2007)
- Organisational and other contextual influences – structural factors affecting the implementation of learning and practices (e.g. Easterby-Smith, 1997; Raelin, 1997; Dewing 2008)

Phase 2: Retrieval, review and synthesis

Guided by the programme theories we will search for relevant research related to interventions for developing the support workforce. Initially, we will target health and social care services specific to older people and then expand our search to evidence from workforce development interventions in related fields that use assistant workers (police and education). Finally, we will refine our search across generalist health services that may be accessed by older people (e.g. primary care, general practice).

The review process will involve screening for relevance, data extraction and charting to identify what appears to work, for whom, how and in what contexts.

Phase 3: Testing and refining programme theories

We will draw on the input of various stakeholders including patients and families, managers, policy makers, practitioners and researchers to 'test out' our synthesis findings and refine the programme theories, and establish their practical relevance/potential.

Phase 4: Actionable recommendations

We will use our synthesis findings to formulate recommendations about improvements to current workforce development interventions. These may include:

- Helping develop interventions with multiple impacts and outcomes for the workforce, older people, organisations and policy.
- Building infrastructure supports for workforce development interventions such as accreditation, quality assurance and role regulation.
- Creating possible synergy between personal / career aspirations and intervention provision.
- Understanding the cognitive, attitudinal and instrumental impacts of interventions.

Working with relevant stakeholders we will tailor our outputs towards managers (in the NHS and beyond), patients, educators, clinical support workers and their colleagues so they can be used to improve existing practices.

2.3. Benefits to the NHS

The increasing pressures to provide effective health and social care for older people will be an enduring concern for the NHS. By presenting a series of improvements for interventions to develop support workers, this review will provide evidence for the NHS to meet these demands and to increase the potential to deliver better quality care.

The team is ideally placed to carry out this review being experts in health, social care, justice, and older people research, implementation/service improvement, practice development, education/learning, realist synthesis, and patient and public involvement. The research team will be supported by a steering group and advised by stakeholders, including patient and public involvement.

3. BACKGROUND AND RATIONALE

This review will investigate what interventions at individual, team and organisational levels are more likely to work in ensuring a knowledgeable and skilled support workforce for older people – herein called workforce development interventions. Our definition of workforce development includes the support required to equip those providing care to older people with the right skills, knowledge and behaviours to deliver safe and high quality services (Skills for Care 2011). The review will also identify how and why these interventions may (or may not) work, in what situations and for whom.

The NHS is under pressure to develop new service models, processes, roles and expertise for older people's health care due to an increasing older person population. These people have distinctive care needs that require significant NHS resources. Research suggests that older people require care that focuses on personal care and / or mobility difficulties, which encompasses both health and social care functions (Shield et al., 2006). Given the increasing demands on health and social care for older people the findings from a number of studies point to the need for improving the skills and training used to develop clinical support workers (CQC 2011, Skills for Care 2011). Furthermore, recommendations from the

Commission on Dignity in Care for Older People include the need to shift to more work-based approaches to learning and development, including for interventions for the healthcare assistant workforce (Delivering Dignity, 2012).

A variety of support worker roles are increasingly being used to deliver health and social care, and other public services. Some have sought to categorise the different types of role assistant care workers perform, which include direct care, indirect care, administration and facilitation (Kessler et al., 2010; Moran et al., 2010). Such a focus is not necessarily role substitution, or an initiative to reduce costs because there is evidence to show that assistant care workers can enhance patient experiences by improving the contact between patients and care practitioners (Nancarrow et al., 2010; Wakefield et al., 2009). However, there is evidence to suggest that support workers are not used as effectively as possible and are often undervalued (Kessler et al., 2010; Schneider et al., 2010).

Additionally, there is not a unified body of evidence to indicate how to enhance interventions for improving the skills and care standards in the support workforce. In part, this has been hampered by there being no common definition of the assistant care workers role because of the variety of duties that they perform (Nancarrow et al., 2005), and also as a result of the different models that NHS Trusts and other services have adopted (Spilsbury et al., 2009). This diversity and lack of clarity means that often assistant care workers are 'figuring it out in the moment' - delivering care on a moment by moment basis depending on the context in which they are operating and the people they are caring for, which may not be evidence-based (Janes et al., 2008).

The lack of clarity and diversity in roles and care setting has resulted in a gap in knowledge about what makes for effective interventions for the development of the clinical support workforce. This project will fill this gap by providing actionable findings from a realist synthesis of different evidence bases (health, social care, policing, education) in order to uncover the mechanisms underpinning training/development interventions that if implemented, could result in improving the care provided by support workers.

3.1. Evidence –Why the research is needed now?

Our proposal responds to the commissioned work stream 12/129. There have been a recent series of investigations and high profile cases which questioned current practices towards care for older people. These include a recent Care Quality Commission report (Dignity and Nutrition inspection programme: national overview [2011]) which identified concerns over the skills, training and availability of the care workforce within hospital settings to deliver dignified and appropriate care. This followed from several other critical reports of the standards of care offered to older patients within the NHS, including a particularly shocking investigation by the Parliamentary and Health Service Ombudsman (Care and Compassion Report on ten investigations into NHS care of older people [2011]). Additionally there is a lack of clarity about the role of support workers, with their roles developing organically rather than systematically - consequently their preparation and development has tended to be ad hoc. Finally, there is no synthesis of existing evidence about interventions for developing the health and social care support workforce for older patients. This is urgently needed if service standards are to improve and is the focus of this proposal.

Our work will be of direct benefit to health and social care services in providing a resource to inform the development of support workers, and helping to address some of the failures in caring for older people identified by previous investigations (CQC, 2011; Tadd et al., 2011; Commission on Dignity in Care, 2012). The increasing numbers of older people in the UK population who require care provision means the development of a suitable support care workforce will remain a long term priority for NHS managers and other third sector organisations that provide care to NHS patients/residents. Improving the effectiveness of workforce development for the clinical support workforce, means the NHS and its social care partners could enhance the standards of care offered to older people. However, there is an urgent need to consider more effective ways of workforce development for assistant care workers, which move beyond the 'single-loop' (i.e. traditional didactic methods of training) approach to learning. New and innovative approaches to development are required if they are to have a sustainable impact on individual's practice and development.

3.2. Importance of the research in terms of benefits to patients and the NHS

The findings of the review will be important to NHS decision makers in a number of ways.

Findings from this review have the potential to improve care provision for older people through enhanced training and development of the clinical support workforce, including care of older people's physical, social and psychological needs. Previous investigations have called for standards of NHS care for older people to be improved (Parliamentary & Health Service Ombudsman, 2011), and others have accused the NHS of 'ageist' practices and attitudes (Tadd et al., 2011; Commission on Dignity in Care, 2012). Likewise, the preferences and experiences of older people towards their care may not be reflected in care policies, structures and practices (Gott et al., 2008; Rudd et al., 2007). Findings from this review will provide an evidence base upon which to develop appropriate care interventions of relevance to older people (and where appropriate their families/carers). Specifically, we will provide information about what interventions may work better in particular contexts and why.

Clinical support workers can help address the demands of NHS efficiency by supporting the work of the regulated, professional workforce in day to day activities. Training and education interventions for support workers now need improving in order to enhance the quality of care and to result in improved service delivery. This can be expected to include the training, education and support offered to both support workers and their supervisors (Keeney et al., 2005), and should also reflect the physical and emotional demands of providing care for patients with terminal and/or debilitating conditions (Schneider et al., 2010).

A greater proportion of the UK population is increasing in age – by 2033 it is estimated one in five people will be over 65 (Wise, 2010) and older people are the largest users of the NHS (70% of the health budget is spent on those over 65 [Oliver, 2010]). Therefore, care provision for older people is a long term issue, and points to the need for associated workforce development.

Currently there is a gap in synthesised knowledge about the effectiveness of workforce development interventions for support workers. Previous work on the development of professionals has focused on advancing workers from novices to experts (e.g. Dreyfus and Dreyfus five stages of career development [1985]). Additionally, these models of education have focussed on professionals who are already highly educated and with additional years of experience to build on, which is usually not the case for the clinical support workforce. Additionally, much of this work focuses on how professionals' learn, including the different processes for adopting new practices, rather than on considering structural barriers for example. Synergies are now needed between worker development strategies and opportunities for job and role development. A central tenet of our review will be the potential for synergy between individual support workers, interventions to support them, their role progression, and the organisational context in which they work.

The findings from this review will relate to workforce interventions for developing clinical support workers across different service settings, so will be of interest beyond the care of older people within the NHS. Decision makers should find our findings of interest through suggested enhancements and reforms of interventions developing support workers, which may improve care and deliver performance benefits.

Transferability of research outputs will be enhanced through developing theoretically informed statements about 'what works' in workforce development within this context. Attention to modes of delivery, and the contextual influences on intervention impacts will mean barriers and enablers can be identified and subsequently used to inform implementation strategies. Knowledge mobilisation will be embedded in our approach to the review and through end of grant dissemination activities (see dissemination section).

The HS&DR Programme is developing a body of research concerning both care needs of older people and use of assistant care workers. This work has so far focused on care needs in particular situations (e.g. care for dementia (Bond et al., 2009)) or in acute trusts (Tadd et al., 2011), and has examined the relationships between the assistant care and professional workforces (e.g. Schneider et al., 2010; Spilsbury et al., 2011; Kessler et al., 2010). Only one study has specifically examined support workers for *older people* (Nancarrow et al., 2010), but this focused on relationships rather than interventions. Our proposal responds to the specific HS&DR Programme commissioned call about interventions for improving skills and care standards in the assistant care workforce for older people. The proposal is also relevant to the standards that are being developed for realist and meta-narrative evidence syntheses, funded by the NIHR (RAMESES). The team are members of the RAMESES jiscmail list, and have undertaken realist reviews that are of a consistent quality with these evolving (and soon to be published) standards. Therefore, our study will add to the evidence base by considering the workforce development interventions and their impacts for developing the assistant care workforce for working with older people, and, has the potential to contribute to the methodological evidence base about conducting realist reviews.

4. AIMS AND OBJECTIVES

Informed by preparatory searching and discussions with relevant stakeholder, we will address the following review question and aims.

How can workforce development interventions improve skills and care standards of clinical support workers within older people's health services?

1. Identify support worker development interventions from different public services and to synthesise evidence of impact.
2. Identify the mechanisms through which these interventions deliver support workforce and organisational improvements to benefit the care of older people.
3. Investigate the contextual characteristics that mediate the potential impact of these mechanisms on clinical care standards for older people.
4. Develop an explanatory framework that synthesises review findings of relevance to services delivering care to older people.
5. Recommend improvements for the design and implementation of workforce development interventions for clinical support workers.

5. RESEARCH PLAN

5.1. Review approach

A systematic realist review will be conducted because it is the most appropriate approach to answer the review question and aims. Conventional, Cochrane-style reviews tend to focus on evidence of effectiveness with narrowly focussed questions; in contrast, realist review draws on a heterogeneous evidence base to establish whether interventions work or not, in what contexts and for whom (Pawson, 2006; Rycroft-Malone et al., 2012). Realist synthesis methods have been developing (Greenhalgh et al., 2011) including through the work of members of this project team (Rycroft-Malone et al. 2012, McCormack et al., in review), and are becoming increasingly popular because of the potential to unpack complex, contextually contingent issues, such as in the case of this proposal about workforce development. Realist synthesis also offers the potential to provide practical solutions to, and/or explanations about, challenging problems and issues.

The analytical task within this review will be to construct causal explanations of workforce development interventions for assistant care workers, and how they operate to impact on delivering high quality care services for older people. These causal explanations are expressed as relationships between mechanisms, context, and outcomes (often abbreviated to *C-M-O*) – i.e. how particular contexts have triggered or fired off mechanisms to generate an observed outcome. Therefore a realist review produces recommendations such as - in situations a, complex intervention b, modified in this way and taking account of contingencies, may be appropriate in achieving x,y,z outcomes (Greenhalgh et al., 2011).

Our review will be conducted in 4 phases over 18 months:

1. Programme theory development.
2. Evidence search, retrieval, review and extraction.

3. Programme theory testing and refinement through evidence synthesis.
4. Development of actionable recommendations.

Whilst these phases are described sequentially, in fact in practice there is considerable iteration between them; furthermore stakeholder engagement is embedded throughout the project.

5.2. Theoretical framework

Realist reviews are systematic and theory-driven. The review will test a programme theory, which will be a mid-range explanatory account of how interventions work through the application of theories of learning, staff and workforce development approaches. The programme theories will be developed in the first phase of the review (more detail in the methods section below). Our initial work suggests that we will be drawing on interlinked theoretical disciplines for the development of the programme theories each with their own literature, approaches and concerns, including:

- Learning and role progression – the professional development from novice to expert (e.g. Dreyfus & Dreyfus, 1980, 1985)
- Multiple levels of intervention, learning & role progression - connections between different interventions and functions being performed (e.g. Pratt et al 1999)
- Learning theory, theories of adult learning and theories of transformational learning - how individuals learn new processes and ideas (e.g. Bloom, 1956; Kolb, 1984; Senge et al., 2005)
- Workforce behaviour change (e.g. Michie et al., 2009; Prochaska & DiClemente, 1982), practice development (e.g. McCormack et al., 2007), and closing the gap between evidence and practice (Rycroft-Malone et al., 2002; Nutley et al.)
- Organisational and other contextual influences – structural factors affecting the implementation of learning and practices (e.g. Easterby-Smith, 1997; Raelin, 1997; Dewing 2008)

Additionally, we are interested in identifying the different impacts that workforce interventions could potentially have, including to knowledge, attitudes, skills and behaviour. However we recognise that, for example, an increase of knowledge about an issue may not result in a change of behaviour (i.e. better standards of care) but may be a pre-cursor to behaviour change. Therefore, in this review we will conceptualise impact as a continuum ranging from conceptual to instrumental or direct impacts: i.e. from awareness, knowledge and understanding, attitudes and perceptions, to practice change (Nutley et al 2007).

5.3. Review Strategy

The following sections provide details of the proposed approach to this review using the accepted phases of realist synthesis (Pawson, 2006), which includes information about the search strategy, inclusion and exclusion criteria, quality appraisal, data extraction and approach to synthesis and programme theory refinement.

Phase 1: Development of programme theory

The programme theory (i.e. the hypotheses about why particular support worker development interventions may work [or not]) is fundamental to realist review. This will be developed through stakeholder engagement, and a scope of the literature including relevant extant theory. The development of programme theory is a deliberative process including a mixture of desk work and discussion. We will hold a theory building workshop with relevant stakeholders including educators, practitioners, managers and patients to identify and prioritise the theory that will be tested in the review. The emergent theories are expressed as contexts, mechanisms and outcomes (C-M-O) threads.

A realist synthesis tests programme theories relevant to the review topic, as such there is the opportunity to include heterogeneous evidence from different services in order to fully test and refine them. Older people access a wide range of generalist and specialist services to address their needs. Our approach will be to target services specific to older people in the first instance across hospital, community and third sector care sectors, with a focus on workforce development interventions. The range of mechanisms identified from this first sweep of the literature will be complemented by searches for clinical support worker development interventions in related public fields; social care, policing and education. We will then broaden our search and analysis to include general health services including primary care to check transferability to general services.

Output from phase 1: the identification of contexts, mechanisms and outcomes (i.e. theories), which are then tested and refined in Phase 2 and 3. At this stage we will also submit the review protocol for open access publication.

Phase 2: Retrieval, review and synthesis

Our review process will involve screening for relevance to the programme theory/ies and data extracted on bespoke extraction forms so that the CMO's are populated with evidence. Outcomes vary according to how interventions have been implemented; therefore the synthesis will include the conditions that make for successful implementation.

In the first instance we will target evidence relevant to the health and social care support workforce, including those working in the third sector (e.g. Age UK, The Alzheimer's Society). The health and social care assistant workforce has been defined by Saks and Allsop (2007) as those 'who provide face to face care or support of a personal or confidential nature to service users in a clinical or therapeutic setting, community facilities or domiciliary, but who do not hold a qualification accredited by a professional association and are not formally regulated by a statutory body'. We will focus on interventions that address the knowledge and skills required by this workforce to contribute to health and social care for older people (over 65) in both generalist and specialist settings.

We will also target different public service literatures where assistant workforce roles have been developed and enacted, such as in policing and teaching. Realist synthesis provides an ideal approach for testing emerging findings from one body of literature to another, and in

providing the opportunity to see if other literatures offer different learning and mechanisms, which are transferable to the health and social assistant care workforce.

Search strategy

One strength of realist synthesis is that the evidence base to be reviewed and synthesised can be broad and eclectic (Pawson, 2006). In fact, a diversity of evidence provides an opportunity for richer mining and greater explanation. The potential of including different types of evidence is important when we consider the potential sources of information that will be relevant to answering the question and aims of this review. We theorise that there will be transferable lessons from other public services where the assistant practitioner role has been developing and implemented including social care, policing, and education, therefore we will be searching these different evidence bases. Additionally, it is also likely that much relevant evidence exists in unpublished form, and therefore we will seek to maximise opportunities for identifying this literature, through for example, communication with relevant organisations.

Our search will be limited to material from 1986 to 2013, which includes the last two major workforce development shifts within the health and social care workforce, and references managed in Endnote. We intend to include material indexed in the major health, social and welfare databases:

Health and Social care:

Cochrane Library, Campbell Collaboration, ZETOC, MEDLINE, EMBASE, CINAHL, AMED, National Research Register IBSS, HMIC, ASSIA, CSA Sociological Abstracts, Social Work Abstracts, Social Policy and Practice, Social Care Online.

Teaching:

Jorum, Sociology of Education Abstracts, Teaching Reference Centre, ERIC.

Policing:

National Criminal Justice Reference Service Abstracts, Association of Chief Police Officers in England, Association of police officers, National policing improvement agency, Police Oracle

Cross-referencing from previous reviews, with forward citation analysis for key research studies (defined in terms of theory relevance) will be completed via Science Citation Index.

Client group keywords will be developed from previous systematic reviews and adapted for each information source. The search terms for workforce development interventions and health settings will be constructed from a mix of database specific 'keywords' identified in the scoping work completed to underpin this proposal.

The search for references will be augmented by searches for support worker role evaluations or intervention research which makes specific reference to embedded implementation, internet-based searches for grey literature, such as workforce development project reports; national inspection and regulation quality reports; evaluative information about these initiatives held in the public domain will be requested. We will also

use snowballing techniques and draw on the expertise of the project steering group, other key researchers and educators, and organisations to ensure we have not missed evidence that might be relevant, but not visible through traditional and hand searching methods.

Findings from preliminary searching

At this initial stage, we identified two sets of search terms (see Appendix 1). One set focused on the various definitions describing support workers within the literature; this set was constructed from definitions used in past studies identified during our initial scoping work and on previous systematic reviews (e.g. CAHE, 2006). The second set of search terms focused on different interventions used for workforce development, whilst not explicitly targeting specific interventions. We searched for exact phrases or terms where possible and used truncation symbols to maximise the search results. Further keywords have been identified and will be added to a fuller search strategy. We will also revise the search terms for the sectors targeted.

We conducted an initial trial of our search strategy to demonstrate that there is sufficient (depth and breadth) of available literature to review. For this initial scoping search we chose to search three databases (Medline, ERIC and Social Services Abstracts) using a selection of our search terms detailed above and searching for these words in the abstract only. We also added the phrase “teaching assistant*” and removed references to nursing when searching the education (ERIC) database. Further databases and sources have been identified and will be added to the full search strategy.

Our search returned 1342 results in Medline, 1826 results in ERIC and 157 results in Social Services abstracts. The titles of some examples of relevant literature that could be included in the review are included in Appendix 1. If we were to expand our search strategy to a full list of keywords, searching titles in addition to abstracts and including a wider variety of databases (including those containing grey literature), we will find more evidence for possible inclusion.

Inclusion/Exclusion Criteria

Our search strategy will be purposive in order to test and refine the programme theories from phase 1, requiring an inclusive (all types of research and non-research, including policy and guidelines) and pragmatic approach to finding and evaluating evidence. Therefore we will be interested in finding evidence relevant to the following:

Reports of:

- Workforce, practice and/or organisational development interventions (and also in combinations) based on a scoping search using staff development and clinical support workers within a health context examples include orientation programmes, clinical education programmes, competency frameworks, certification, nursing assistant champions, storytelling, delegation, or embedded within role evaluation and intervention research.
- Setting – recognising the age of the health care population, it would not be helpful to only sample the assistant care workforce entirely within services exclusive to older people. However, analytical approaches will prioritise those setting specific to older people and test

the transferability of findings to the wider health service context. We will search for evidence from different international contexts.

- Additional searches will also be conducted of assistant care worker roles in the following public service fields; social care, policing and education.

In contrast to other review processes, in a realist synthesis evidence is not excluded (unless it does not relate to the programme theory or theories), however in this review we will not search for or include evidence that may have limited transferability to the NHS such as health systems within low income countries.

Review and extraction

Consistent with Pawson's (2006) suggestion, the test for inclusion will be: is the evidence provided 'good and relevant enough' to be included (considering issues of sample size, data collection, data analysis, and claims made). Discrepancies in opinions about the relevance of articles will be resolved through discussion amongst the project team.

The programme theories being 'tested' through the review are made visible through the data extraction forms (Rycroft-Malone et al 2012). A bespoke set of data extraction forms will be developed based on the content of the programme theory, which thereby provides a template to interrogate the theories. If the evidence meets the test of relevance (described above), data will be extracted using the bespoke form and then checked by a second member of the team.

Synthesis

The analytical task is in synthesising, across the extracted information the relationships between Mechanisms (e.g. underlying processes, structures, and entities), Contexts (e.g. conditions, types of setting, organisational configurations) and Outcomes (i.e. intended and unintended consequences and impact). Through our previous experience of realist review (Rycroft-Malone et al 2012; McCormack et al in review), and building on the suggestions of Pawson (2006) and principles of realist enquiry we have developed an approach to synthesis that includes:

1. Organisation of extracted information into evidence tables representing the different bodies of literature (e.g. health, teaching, social care, policing)
2. Theming across the evidence tables in relation to emerging demi-regularities (patterns) amongst C-M-Os – seeking confirming and disconfirming evidence.
3. Linking these demi-regularities to develop hypotheses.

This aspect of the review process is resource intensive and reliant on discussion and deliberation, including consultation with a wider group of stakeholders, both of which are built into our project plan.

The resultant hypotheses act as synthesised statements of findings around which a narrative can be developed summarising the nature of the context, mechanism and outcome links, and the characteristics of the evidence underpinning them.

Outputs from Phase 2: 1) a comprehensive evidence base related to workforce development for the assistant practitioner workforce, which we will make publicly available, 2) a set of hypotheses supported by relevant evidence to be refined in Phase 3.

Phase 3: Test and refine programme theory/ies (validation)

To enhance the trustworthiness of the resultant hypotheses and to facilitate the development of a final review narrative we will conduct up to 10 semi-structured audio-recorded telephone interviews with stakeholders. These participants will be purposively sampled to obtain different perspectives relevant to the review question including from service delivery managers, policy makers, education providers, commissioners, and support workers. An interview schedule will be developed based on the findings that have emerged from the synthesis process and will aim to elicit stakeholder's views on their resonance.

Additionally PPI participants will be asked to assess the relevance of the mechanism-context-outcome threads from a service user perspective. This activity will be undertaken on an on-going basis by view of their involvement in this project on the project team and the advisory group

Outputs from Phase 3: a refined set of hypotheses with accompanying evidence-based narrative.

Phase 4: Actionable recommendations

We will work with the Project Advisory Group including PPI participants to develop a set of actionable recommendations and the development of an evidence informed framework of what works for whom and in what context in relation to workforce development interventions for the clinical support workforce for older people. This will be achieved through one face to face meeting, and virtual meetings via teleconference.

Using our synthesis findings, we will recommend a series of improvements to current workforce development practices. These will likely involve the following issues:

- The synergy between interventions and personal / career aspirations.
- Developing and targeting different interventions with multiple impacts and outcomes for the workforce, older people, organisations and policy.
- The potential of different modes of delivery of learning and development programmes.
- Understanding the cognitive, attitudinal and instrumental impacts of an intervention.

During this phase we will hold a knowledge mobilisation event with a group of stakeholders to ensure the recommendations we develop are both relevant and actionable.

Outputs from Phase 4: a report of the review including relevant and actionable findings. During this phase we will also write a paper for open access publication.

6. DISSEMINATION AND OUTPUTS

6.1. Integrated knowledge mobilisation:

Knowledge mobilisation is integral to our proposal and way of working; this will be facilitated throughout the project life time in the methods and approaches we will use. To ensure maximum impact we will also draw on our national and international networks, and link with investigators of other relevant NIHR funded projects.

Knowledge mobilisation is facilitated through engagement in the research process, this is also consistent with realist enquiry, in that stakeholder engagement (including with the assistant care workforce) takes place throughout the conduct of the review. Engagement with relevant stakeholders from start to finish should increase the potential of this research to be relevant and potentially usable. Stakeholders will include practitioners, managers, patients and the public, researchers and policy makers.

6.2. End of grant dissemination:

A number of products will be produced and processes engaged in as part of end of grant dissemination activity, including the following:

- A final and full research report, illustrated with vignettes of different practical examples / case studies to make findings relevant to NHS managers, and a new framework for skills development for the assistant care workforce for older people.
- An executive summary of the final report, suitable for use as a separate report for briefing NHS managers.
- A lay summary of the final report, suitable for use as a separate report for briefing the public.
- Benchmarking or quality assurance framework for interventions.
- 2 open access publications: 1) a review protocol, and 2) a findings paper that sets out an implementation plan of workforce development interventions training in the clinical support workforce.
- Conference presentation at a UK national conference.
- A YouTube presentation of the main findings, including a discussion with stakeholders about their relevance to practice and policy.
- Open access articles in professional and academic journals.

Through this review we will answer questions that have practical relevance to service delivery and decision makers, including identifying what the core ingredients of support worker development interventions should be, how they should be implemented and what should be the expected impacts on care standards and quality. Specifically we will:

- 1) Provide a clear description of the interventions that have been used and evaluated for improving the skills and care standards in the clinical support workforce. This will include how they work in practice and their intended and unintended outcomes to enable NHS decision makers and policy makers to have an understanding of the range of strategies available, and the core assumptions about how they are supposed to work.

2) Provide a clear explanation of the contextual influences underlying the challenges of designing and implementing support care workforce development interventions. Understanding context is not a central feature of traditional reviews in contrast, for realist inquiry it is central. How programmes and interventions are affected by the context in which they are implemented is critical to the outcomes they achieve, a detailed explanation of this will provide service managers and policy makers with the information they need to address these issues locally.

3) Develop an evidence informed framework of what works for whom and in what context in relation to interventions for improving skills and care standards in the assistant care workforce for older people. This could be used by managers and organisations to reform and enhance the assistant care worker function by helping identify appropriate development interventions for different roles and to implement and evaluate new models of learning and development. For example, findings about effective interventions could be used to develop clear career development paths, and for improving the supervision and / or support offered to the workforce. This framework will be linked to personal development and career development frameworks, including the NHS Knowledge and Skills Framework, in order to promote implementation and maximise utility. In particular, we will suggest tailored mechanisms and interventions suitable for developing assistant care workers, which can be used to strengthen these frameworks, and which may be of relevance across public services.

7. PLAN OF INVESTIGATION AND TIMETABLE

Phase	Tasks	Month																	
		1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16	17	18
Phase 1	Programme Theory Development																		
	Theory building workshop with stakeholders including PPI's			*															
	MS 1 Project Advisory Group meeting 1 – review of programme theory				*														
	MS2 Study protocol submitted for publication				*														
Phase 2	Retrieval, Review & Synthesis																		
	Stakeholders involvement in data collection, analysis and synthesis				*	*	*	*	*	*	*	*	*	*	*	*	*	*	*
	MS 3 Monthly targets for retrieval & extraction				*	*	*	*	*	*	*	*	*	*	*	*	*	*	*
	Project Advisory Group meeting 2								*										
	MS4 Interim report to Project Advisory Group													*					
Phase 3	Test and Refine Programme Theory																		
	Stakeholders involvement in validation process													*	*	*			
	Semi structured interviews													*	*	*			
	MS5 Project Advisory Group Meeting 3 – validation of work															*			
Phase 4	Actionable Recommendations & Write Up																		
	Knowledge mobilisation event																	*	
	Project Advisory Group meeting 4																	*	
	MS6 Completion of project report																		*
	Write paper for publication																		*

8. PROJECT MANAGEMENT

Bangor University will act as the sponsor for the study, and it will be conducted from the School of Healthcare Sciences – a research group engaged in generating high quality evidence and syntheses about health services and healthcare interventions, funded by the NIHR, EU and various Charities.

The Research Officer will be supervised by the Chief Investigators (JRM & CB), through weekly meetings, and on-going contact in between as necessary. JRM and CB have a track record of working together and in supervising staff and students.

The **Project Management Group** comprising the Co-Chief Investigators, co-investigators and research fellow, and two PPI representatives, will be responsible for managing the project, and meeting milestones. This group will be chaired by JRM and will meet via teleconference monthly to review progress against milestones, plan work, discuss methods/analyses, keep a risk register and anticipate/resolve any problems. To do this, the group will receive and review reports from the Chief Investigator.

A **Project Advisory Group** (co-chaired by the Co-Chief Investigators and one PPI representative) will meet every six months to advise on policy and organisational engagement, the development and progress of research plans, dissemination and implementation. In addition to the project team, membership of this group will be by invitation to relevant organisations including: Skills for Health; Health Education England / Local Education and Training Boards (England); National Leadership and Innovation Agency for Healthcare (Wales); NHS Education for Scotland; Royal College of Nursing (agreement to participate - Lesley Duff); the Independent Care Home Sector (Pendine Park, North Wales); City and Guilds (Vocational Qualifications); and Coleg Llandrillo (Further Education). Representatives from non-health organisations include North Wales Police (with whom we are currently working on an effective policing project), Skills for Care and Age UK.

9. ETHICS

Ethical approval will not be required to undertake this review. The interviews to be conducted as part of Phase 3 will be undertaken with staff, and therefore are unlikely to require ethical approval.

10. PATIENT AND PUBLIC INVOLVEMENT

Public discourses around health care emphasise the importance of embedding themes such as dignity and patient-centredness into workforce development and related research. As Chair of the Board of Trustees for Age Northern Ireland (AGENI), BMC has facilitated a critical commentary of our proposal from AGENI members, and specifically our plans for PPI. We will recruit two members of the public and/or patients to the project team (in line with INVOLVE best practice) to assist with review analysis and theory-building, and to enhance dissemination and implementation activities. These members will participate in all stages of the project including refining questions, developing the programme theory underpinning the review (e.g. advising on impact and outcomes from a service user perspective), helping

with priority setting within the review, reviewing evidence, leading on the discussion of evidence summaries for a lay audience, and supporting implementation activities (e.g. knowledge mobilisation event). PPI representatives will join representatives of advocacy organisations as constituent members of the Project Advisory Group. PPI representatives will be recruited from either a pre-existing, experienced PPI group (supporting the NIHR CLAHRC evaluation - 09/1809/1072), and/or from the networks of project team members. Funding has been included for this level of involvement in the review.

11. EXPERTISE AND JUSTIFICATION OF SUPPORT REQUIRED

The research team is a highly productive multi-disciplinary collaborative group, with unique expertise and a track record in understanding training and development issues within health and social care, older person research, public service improvement, and realist synthesis.

Prof Jo Rycroft-Malone, Joint Chief Investigator (JRM)

<http://www.bangor.ac.uk/healthcaresciences/research/people/jorm.php.en>

Dr Christopher Burton, Joint Chief Investigator (CB)

<http://www.bangor.ac.uk/healthcaresciences/research/people/cb.php.en>

Dr Diane Seddon, Bangor University, Co-Investigator (DS)

<http://www.bangor.ac.uk/so/staff/seddon.php.en>

Prof Brendan McCormack, University of Ulster, Co-Investigator (BMc)

<http://www.science.ulster.ac.uk/inr/profiles/b.mccormack.php>

Prof Sandra Nutley, University of St Andrews, Co-Investigator (SN)

<http://www.standrews.ac.uk/management/aboutus/people/academic/sandranutley/>

Dr Beth Hall, Bangor University, Information Scientist (BH)

JRM is an internationally recognised implementation researcher having conducted theory development research, trials and process evaluations, including realist evaluation (funded by NIHR, EU and CIHR). She has successfully delivered on time and within budget, numerous projects funded by EC, NIHR and MRC. She will co project manage and co-supervise the research officer. She is an experienced researcher in using realist evaluation (e.g. SDO project 08/1405/078), and realist synthesis (e.g. Welsh Office Research & Development funded Realist Synthesis of integrated care, and Rycroft-Malone, McCormack et al Implementation Science - Realist synthesis: illustrating the method for implementation research - highly accessed). A number of her papers in Implementation Science and other journals continue to be highly accessed and highly cited. JRM is also the current chair of NICE's Implementation Strategy Group, and sits on the Canadian Institutes for Health Research (CIHR) Knowledge Translation Research panel.

CB will be co-chief investigator, sharing responsibility for project management and co-supervision with JRM. JRM and CB are research programme directors and have worked together successfully for a number of years including on projects related to realist enquiry. CB has experience of realist synthesis, evaluation of complex interventions and specialises in the development and design of health support services and in evaluating the impacts of integrated health and social care provision. In addition, he has a track record in supporting stroke service development within the NHS (National Clinical Guidelines; National Stroke Strategy, Stroke Specific Education Framework).

DS has extensive research experience with assistant care workers and their management, dementia care, and the health and social care interface, and has led reviews of national policy implementation.

BMcC is an internationally recognised older person researcher. He has extensive research and practical experience of older persons service delivery, policy development (as previous Head of Gerontological Nursing for the RCN), and in research through projects with care homes in the UK and internationally. In addition he is recognised internationally for his work in practice development that is underpinned by theories of transformational learning and development. He has professional postgraduate qualification in adult learning. He is also Chairman of Age Northern Ireland and a trustee of AgeUK.

SN is an internationally known academic with extensive experience in public management reform including within health, social care, justice and education. Her research has focused on practitioner and organisational development, and the lessons for to be gained from sharing knowledge across sectors. She is particularly concerned with methods for improving the use of research evidence.

BH is an information scientist/librarian with experience of supporting systematic reviewing; she will support our search for evidence.

12. REFERENCES

- Bond, J., Bamford, C., Arksey, H., Poole, M., Kirkley, C., Hughes, J. & Corner, L.,** (2009), Person- and carer-centred respite care for people with dementia: developing methods of evaluating the effectiveness of different models Final Report, NIHR Service Delivery and Organisation programme
- Bloom, B.,** (1956), The taxonomy of educational objectives: The classification of educational goals. Handbook I, Cognitive Domain. London, Longman
- Care Quality Commission,** (2010), Dignity and nutrition inspection programme: national overview
- Commission for delivering on Dignity** (2012) Delivering Dignity. Securing dignity in care for older people in hospitals and care homes, Joint Report from Independent Commission on Dignity
- Dewing J** (2008) Chapter 15 Becoming and Being Active Learners and Creating Active Learning Workplaces: The Value of Active Learning in International Practice Development in Nursing and Healthcare pp 273-294 B McCormack, K Manley and V Wilson (eds) Oxford Blackwells
- Dreyfus, H. & Dreyfus, S.,** (1985), Mind over machine: The power of human intuition and expertise in the era of the computer, New York, Free Press
- Dreyfus S.E. & Dreyfus, H.L.,** (1980), A five stage model of the mental activities involved in directed skill acquisition (unpublished Report supported by the Air Force Office of Scientific Research), Berkley, University of California
- Easterby-Smith, M.,** (1997), Disciplines of Organizational Learning: Contributions and Critiques, Human Relations, 50:9, pp. 1085-1113
- Gott, M., Small, N., Barnes, S., Payne, S. & Seamark, D.,** (2008), Older people's views of a good death in heart failure: Implications for palliative care provision, Social Science & Medicine, 67, pp. 1113–1121
- Greenhalgh T, Wong G, Westrop G & Pawson R** (2011) Protocol- realist and meta-narrative evidence synthesis: Evolving Standards (RAMESES) BMC Medical Research Methodology, 11:115
- Janes, N., Sidani, S., Cott, C. & Rappolt, S.,** (2008), Figuring it Out in the Moment: A Theory of Unregulated Care Providers' Knowledge Utilization in Dementia Care Settings, Worldviews on Evidence-Based Nursing, first quarter, pp. 13-24
- Keeney, S., Hasson, F. & McKenna, H.,** (2005), Health care assistants: the views of managers of health care agencies on training and employment, Journal of Nursing Management, 13, pp 83–92
- Kessler, I., Heron, P., Dopson, S., Magee, H., Swain, D. & Janet Askham, J.,** (2010), The Nature and Consequences of Support Workers in a Hospital Setting, Final report, NIHR Service Delivery and Organisation programme
- Kolb, D.A.,** (1984), Experiential learning. Experience as the source of learning and development. Englewood Cliffs, Prentice Hall.

McCormack B, Wright J, Dewer B, Harvey G and Ballintine K (2007) A realist synthesis of evidence relating to practice development: Findings from the literature review. *Practice Development in Health Care*, 6, 1: 25-55

Michie, S., Fixsen, D., Grimshaw, J.M. & Eccles, M.P., (2009), Specifying and reporting complex behaviour change interventions: the need for a scientific method, *Implementation Science*, 4:40

Moran, A., Enderby, P. & Nancarrow, S., (2010), Defining and identifying common elements of and contextual influences on the roles of support workers in health and social care: a thematic analysis of the literature, *Journal of Evaluation in Clinical Practice*, 17, pp 1191–1199

Nancarrow, S.A., Enderby, P., Moran, A.M., Dixon, S., Parker, S., Bradburn, M., Mitchell, C., John, A. & McClimens, A., (2010), The relationship between workforce flexibility and the costs and outcomes of older peoples' services, Final report, NIHR Service Delivery and Organisation programme

Nancarrow, S.A., Shuttleworth, P., Tongue, A. & Brown, L., (2005), Support workers in intermediate care, *Health and Social Care in the Community*, 13 (4), pp 338–344

Nutley S, Walters I, & Davies HTO (2007) Using Evidence. How Research Can Inform Public Services. Policy Press: Bristol

Oliver, D., (2010). Dodderly but a little too dear? – A defence of improving care. [Online]. Available at <http://www.battleofideas.org.uk/index.php/2010/battles/5401> [Accessed 20 October 2010]

Parliamentary & Health Service Ombudsman, (2011), Care and compassion? Report of the Health Service Ombudsman on ten investigations into NHS care of older people, TSO, London

Pawson R (2006) Evidence-based policy: A realist perspective. London: Sage

Prochaska, J.O. & DiClemente, C.C., (1982), Transtheoretical therapy: towards a more integrative model of change, *Psychotherapy: theory, research and practice*, 19 (3), pp. 276-288

Raelin, J.A., (1997) Work-based learning in practice, *Journal of Workplace Learning*, 10 (6/7), pp. 280-283

Rudd, A.G., Hoffman, A., Down, C., Pearson, M. & Lowe, D., (2007), Access to stroke care in England, Wales and Northern Ireland: the effect of age, gender and weekend admission, *Age and Aging*, 36, pp. 247-255

Rycroft-Malone, J. Kitson, A. Harvey, G. McCormack, B. Seers, K. Titchen, A. & Estabrooks, C. (2002) Ingredients for change: Revisiting a conceptual framework, *Quality and Safety in Health Care*, 11, 174 – 180

Rycroft-Malone J, McCormack B et al (2012) Realist synthesis: illustrating the method for implementation research. *Implementation Science*, 7:33

Saks, M., & Allsop, J., (2007), Social Policy, Professional Regulation and Health Support Work in the UK. *Social Policy and Society*, 6 (2), pp. 165-177

Schneider, J., Scales, K., Bailey, S. & Lloyd, J., (2010), Challenging care: the role and experience of Health Care Assistants in dementia wards, Final report, NIHR Service Delivery and Organisation programme

Shield, F., Enderby, P. & Nancarrow, S., (2006), Stakeholder views of the training needs of an interprofessional practitioner who works with older people, *Nurse Education Today*, 26, pp 367–376

Skills for Care (2011) Capable, Competent, Skilled. A Workforce Development Strategy. Skills for Care, Leeds.

Spilsbury K, Adamson J, Atkin K, Bartlett C, Bloor K, Borglin G, Carr-Hill, R., McCaughan, D., McKenna, H., Stuttard, L. & Wakefield, A., (2010), Evaluation of The Development and Impact of Assistant Practitioners Supporting the Work of Ward-Based Registered Nurses in Acute NHS (Hospital) Trusts in England, Final report, NIHR Service Delivery and Organisation programme

Spilsbury, K., Stuttard, L., Adamson, J., Atkin, K., Borglin, G., McCaughan, D., McKenna, H., Wakefield, A. & Carr-Hill, R., (2009), Mapping the introduction of Assistant Practitioner roles in Acute NHS (Hospital) Trusts in England, *Journal of Nursing Management*, 17, pp 615–626

Tadd, W., Hillman, A., Calnan, S., Calnan, M., Bayer, A. & Read, S., (2011) Dignity in Practice: An exploration of the care of older adults in acute NHS Trusts, NIHR Service Delivery and Organisation Programme

Wakefield, A., Spilsbury, K., Atkin, K., McKenna, H., Borglin, G. & Stuttard, L., (2009), Assistant or substitute: Exploring the fit between national policy vision and local practice realities of assistant practitioner job descriptions, *Health Policy*, 90, pp 286–295

Wise, J., (2010), Number of 'oldest old' has doubled in the past 25 years, *British Medical Journal*, 340, pp. 1266

14. FLOW DIAGRAM/PROJECT PLAN

See Gantt chart above.

15. ACKNOWLEDGEMENT

Prof Brendan McCormack is Chair of the Trustees for the charity Age Northern Ireland.

We are not aware of any other conflicts, or potential conflicts of interest.

Appendix 1

Preliminary search results

Health (medline)

ab("support work*" or assistant* or auxiliar* or "support staff*" or unlicense* or "unregulated worker") AND ab(Train* OR learn* OR educat* OR develop* OR "emotional support" OR "peer support" OR wellbeing OR health OR "career break*" OR counselling OR "access to information" OR mentorship OR supervision OR "work-based training" OR "staff development" OR "orientation programme*" OR "clinical education programme*" OR "nursing assistant champion*" OR storytelling OR incentive* OR reward*) 1342 results

Examples of the literature:

ABERNETHY, M.P., 2009. Introduction to an integrated competence framework for health-care support workers and nurses working in menopause. *Menopause International*, **15**(4), pp. 157-159.

ADAMIDIS, S.H., 2000. A survey of the delegation of orthodontic tasks and the training of chairside support staff in 22 European countries. *Journal of orthodontics*, **27**(3), pp. 279-282.

ANSELMI, P.M., 2006. [Quality of procedures delivered by nursing assistants]. *Revista De Saúde Pública*, **40**(5), pp. 843-850.

ANTHONY MK, STANDING T and HERTZ, J.E., 2000. Factors influencing outcomes after delegation to unlicensed assistive personnel. *The Journal of nursing administration*, **30**(10), pp. 474-481.

ARVEY SR and FERNANDEZ, M.E., 2012. Identifying the core elements of effective community health worker programs: a research agenda. *American Journal of Public Health*, **102**(9), pp. 1633-1637.

ASHWILL, J., 1998. The patient care assistant program: the nursing profession's and a community college's response to educating unlicensed assistive personnel. *Journal of continuing education in nursing*, **29**(3), pp. 126-129.

BAILEY, S.M., 1991. Preparing health care assistants. *Nursing Standard (Royal College Of Nursing (Great Britain): 1987)*, **5**(24), pp. 38-40.

BLUNDELL, H.R., 2007. The role of Clinical Support Workers in reducing junior doctors' hours and improving quality of patient care. *Journal of evaluation in clinical practice*, **13**(3), pp. 449-452.

BUDDEN, J.S., 2012. A national survey of medication aides: education, supervision, and work role by work setting. *Geriatric nursing (New York, N.Y.)*, **33**(6), pp. 454-464.

CALLAHAN, B., 2004. Creation of a geriatric workshop for nursing assistants and patient-care associates. *Journal For Nurses In Staff Development: JNSD: Official Journal Of The National Nursing Staff Development Organization*, **20**(2), pp. 69-75.

CARVER, S., 1997. Orderlies and aides merging into O.R. attendants. *Canadian operating room nursing journal*, **15**(3), pp. 16-18.

CASHAVELLY BJ, DONELAN K, BINDA KD, MAILHOT JR, CLAIR-HAYES KA and MARAMALDI, P., 2008. The forgotten team member: meeting the needs of oncology support staff. *The oncologist*, **13**(5), pp. 530-538.

- COWAN DT, ROBERTS JD, FITZPATRICK JM, WHILE AE and BALDWIN, J., 2004. The approaches to learning of support workers employed in the care home sector: an evaluation study. *Nurse education today*, **24**(2), pp. 98-104.
- EVANS, C.F., 1998. Providing support for qualified nurses. *Nursing Standard (Royal College Of Nursing (Great Britain): 1987)*, **12**(19), pp. 39-41.
- FERGUSON WJ, LEMAY CA, HARGRAVES JL, GORODETSKY T and CALISTA, J., 2012. Developing community health worker diabetes training. *Health education research*, **27**(4), pp. 755-765.
- GIBSON, B.D., 2008. Perspectives of personal support workers and ventilator-users on training needs. *Patient education and counseling*, **71**(2), pp. 244-250.
- GRIGGS, C., 2012. Mentoring community-based trainee assistant practitioners: a case study. *British journal of community nursing*, **17**(7), pp. 328-332.
- GURSKY BS and RYSER, B.J., 2007. A training program for unlicensed assistive personnel. *The Journal Of School Nursing: The Official Publication Of The National Association Of School Nurses*, **23**(2), pp. 92-97.
- HUANG CC, BLAKE A, EDWARDS RL, LIU CW, NOLAN RB, RUSEN B and THOMPSON, D., 2010. Professional knowledge of child support staff: evidence from the New Jersey child support training program. *Evaluation review*, **34**(1), pp. 3-18.
- JACKSON, H.M., 2000. Health care support workers in the critical care setting. *Nursing in critical care*, **5**(1), pp. 31-39.
- JACKSON, R.G., 1999. Developing the role of the generic healthcare support worker: phase 1 of an action research study. *International journal of nursing studies*, **36**(4), pp. 323-334.
- JOHNSON CS and NOEL, M., 2007. Level of empowerment and health knowledge of home support workers providing care for frail elderly. *Home health care services quarterly*, **26**(3), pp. 61-80.
- JOHNSON, S.H., 1996. Teaching nursing delegation: analyzing nurse practice acts. *Journal of continuing education in nursing*, **27**(2), pp. 52-58.
- KEEFE JM, KNIGHT L, MARTIN-MATTHEWS A and LÉGARÉ, J., 2011. Key issues in human resource planning for home support workers in Canada. *Work (Reading, Mass.)*, **40**(1), pp. 21-28.
- KLIMMEK RK, NOYES E, EDINGTON-SAUNDERS K, LOGUE C, JONES R and WENZEL, J., 2012. Training of community health workers to deliver cancer patient navigation to rural African American seniors. *Progress In Community Health Partnerships: Research, Education, And Action*, **6**(2), pp. 167-174.
- KONTOS PC, MILLER KL and MITCHELL, G.J., 2010. Neglecting the importance of the decision making and care regimes of personal support workers: a critique of standardization of care planning through the RAI/MDS. *The Gerontologist*, **50**(3), pp. 352-362.
- KUPPERSCHMIDT, B.R., 2002. Unlicensed assistive personnel retention and realistic job previews. *Nursing economic\$,* **20**(6), pp. 279-283.
- LAUNONEN, K.K., 2012. Assessing the communication skills of carers working with multiple learning disabilities: a case study. *International journal of language & communication disorders / Royal College of Speech & Language Therapists*, **47**(6), pp. 685-695.
- LYNCH, M.S., 2004. Who supports the support workers? Cross-sectional survey of support workers' experience and views. *European Journal Of Human Genetics: EJHG*, **12**(3), pp. 251-254.

- MARTINEAU, M.J., 2010. Support workers in social care in England: a scoping study. *Health & Social Care In The Community*, **18**(3), pp. 316-324.
- MAXWELL AE, DANA O LL, CAYETANO RT, CRESPI CM and BASTANI, R., 2012. Evaluating the training of filipino american community health advisors to disseminate colorectal cancer screening. *Journal of community health*, **37**(6), pp. 1218-1225.
- MCCANN JC, DAVIS SE, TRAINOR DJ, WALLER DK and GREENBLATT, R.B., 1990. Restructuring support staff classification levels for academic health sciences library positions. *Bulletin of the Medical Library Association*, **78**(3), pp. 293-301.
- MCGUIRE EC, HOWELL KM, KUHLMAN DS and ESSELMAN, C.R., 1995. Design and implementation of a health care technician program. *Journal of nursing care quality*, **9**(3), pp. 20-28.
- MEAH, S.J., 2012. 'Think differently and be prepared to demonstrate trust': findings from public hearings, England, on supporting lay people in public health roles. *Health promotion international*, **27**(2), pp. 284-294.
- MOORE, T.R., 2012. A community-academic partnership to plan and implement an evidence-based lay health advisor program for promoting breast cancer screening. *Journal of health care for the poor and underserved*, **23**(2), pp. 109-120.
- MOSELEY LG, DAVIES M and EVANS, L.E., 2007. The training needs of health care support workers: results of a study of workers and their managers. *Journal of Clinical Nursing*, **16**(12), pp. 2280-2286.
- NANCARROW, M.A., 2012. Are we using support workers effectively? the relationship between patient and team characteristics and support worker utilisation in older people's community-based rehabilitation services in England. *Health & Social Care In The Community*, **20**(5), pp. 537-549.
- NOONE SJ and HASTINGS, R.P., 2009. Building psychological resilience in support staff caring for people with intellectual disabilities: pilot evaluation of an acceptance-based intervention. *Journal Of Intellectual Disabilities: JOID*, **13**(1), pp. 43-53.
- NYBERG DB and CAMPBELL, J.L., 1997. An orientation program for unlicensed assistive personnel. *AORN Journal*, **66**(3), pp. 445.
- ORMANDY, J.M., 2004. The role and accountability of senior health care support workers in intensive care units. *Intensive & Critical Care Nursing: The Official Journal Of The British Association Of Critical Care Nurses*, **20**(3), pp. 123-132.
- OSBORN, T., 2012. Training health visiting support staff to detect likelihood of possible postnatal depression. *Community Practitioner: The Journal Of The Community Practitioners' & Health Visitors' Association*, **85**(4), pp. 24-27.
- OUTHWAITE, D.A., 2005. Learning resource needs of UK NHS support staff. *Health Information And Libraries Journal*, **22**(4), pp. 253-261.
- PARSONS MB, REID DH and GREEN, C.W., 1996. Training basic teaching skills to community and institutional support staff for people with severe disabilities: a one-day program. *Research in developmental disabilities*, **17**(6), pp. 467-485.
- PROSSER, S.C., 2007. A research evaluation of health support workers in a Sure Start project. *Community Practitioner: The Journal Of The Community Practitioners' & Health Visitors' Association*, **80**(11), pp. 32-35.
- RADCLIFFE, I., 1996. Teaching RNs how to select a nursing assistant partners. *Recruitment, retention & restructuring report*, **9**(1), pp. 1-5.

- RANDALL, S., 2011. Preparing clinical support workers for the long-term conditions agenda. *Nursing Standard (Royal College Of Nursing (Great Britain): 1987)*, **25**(25), pp. 35-39.
- REINSCHMIDT, I.M., 2012. Establishing a professional profile of community health workers: results from a national study of roles, activities and training. *Journal of community health*, **37**(2), pp. 529-537.
- REMSBURG RE, RICHARDS M, MYERS S, SHOEMAKER D, RADU C, DOANE L and GREEN, K., 2001. Creating a career ladder for nursing assistants in long-term care. *Geriatric nursing (New York, N.Y.)*, **22**(6), pp. 318-325.
- RHÉAUME, A., 2003. The changing division of labour between nurses and nursing assistants in New Brunswick. *Journal of advanced nursing*, **41**(5), pp. 435-443.
- RUSSO JM and LANCASTER, D.R., 1995. Evaluating unlicensed assistive personnel models. Asking the right questions, collecting the right data. *The Journal of nursing administration*, **25**(9), pp. 51-57.
- SALMOND, S.W., 1997. Delivery-of-care systems using clinical nursing assistants: making it work. *Nursing administration quarterly*, **21**(2), pp. 74-84.
- SALMOND, S.W., 1995. Models of care using unlicensed assistive personnel. Part II: Perceived effectiveness. *Orthopaedic nursing / National Association of Orthopaedic Nurses*, **14**(6), pp. 47-58.
- SCHEPIS MM, REID DH, OWNBEY J and PARSONS, M.B., 2001. Training support staff to embed teaching within natural routines of young children with disabilities in an inclusive preschool. *Journal of applied behavior analysis*, **34**(3), pp. 313-327.
- SCHULMAN-GREEN D, HARRIS D, XUE Y, LOSETH DB, CZAPLINSKI C, DONOVAN C and MCCORKLE, R., 2005. Unlicensed staff members' experiences with patients' pain on an inpatient oncology unit: implications for redesigning the care delivery system. *Cancer nursing*, **28**(5), pp. 340-347.
- SIMPSON, A., 1999. Creating alliances: the views of users and carers on the education and training needs of community mental health nurses. *Journal of psychiatric and mental health nursing*, **6**(5), pp. 347-356.
- SIMS-GOULD J and MARTIN-MATTHEWS, A., 2010. Strategies used by home support workers in the delivery of care to elderly clients. *Canadian Journal On Aging = La Revue Canadienne Du Vieillessement*, **29**(1), pp. 97-107.
- SPELLBRING AM and RYAN, J.W., 2003. Medication administration by unlicensed caregivers. A model program. *Journal of gerontological nursing*, **29**(6), pp. 48-54.
- SPUNT, B.N., 1999. Competency-based education: maximize the performance of your unlicensed assistive personnel. *Journal of continuing education in nursing*, **30**(6), pp. 254-259.
- STREATHER, A.G., 2004. A training programme for healthcare support workers. *Nursing Standard (Royal College Of Nursing (Great Britain): 1987)*, **18**(43), pp. 33-37.
- STUTTARD, S.K., 2009. Mapping the introduction of assistant practitioner roles in acute NHS (hospital) trusts in England. *Journal of nursing management*, **17**(5), pp. 615-626.
- TEST DW, FLOWERS C, HEWITT A and SOLOW, J., 2004. Training needs of direct support staff. *Mental retardation*, **42**(5), pp. 327-337.
- THOMAS SA, BARTER M and MCLAUGHLIN, F.E., 2000. State and territorial boards of nursing approaches to the use of unlicensed assistive personnel. *JONA'S healthcare law, ethics and regulation*, **2**(1), pp. 13-21.
- THORNLEY, C., 2000. A question of competence? Re-evaluating the roles of the nursing auxiliary and health care assistant in the NHS. *Journal of Clinical Nursing*, **9**(3), pp. 451-458.

- VALENTINE, S.J., 2004. Staff views on the extended role of health care assistants in the critical care unit. *Intensive & Critical Care Nursing: The Official Journal Of The British Association Of Critical Care Nurses*, **20**(5), pp. 249-256.
- WALTON JC and WASZKIEWICZ, M., 1997. Managing unlicensed assistive personnel: tips for improving quality outcomes. *Medsurg Nursing: Official Journal Of The Academy Of Medical-Surgical Nurses*, **6**(1), pp. 24-28.
- WATERMAN, S.E., 2007. Crossing professional and organizational boundaries: the implementation of generic rehabilitation assistants within three organizations in the northwest of England. *Disability and rehabilitation*, **29**(9), pp. 751-759.
- WILLS, C.T., 2012. Engaging with marginalized communities: the experiences of London health trainers. *Perspectives In Public Health*, **132**(5), pp. 221-227.
- WOOD AJ, SCHUURS SB and AMSTERS, D.I., 2011. Evaluating new roles for the support workforce in community rehabilitation settings in Queensland. *Australian Health Review: A Publication Of The Australian Hospital Association*, **35**(1), pp. 86-91.
- WORKMAN, B.A., 1996. An investigation into how the health care assistants perceive their role as 'support workers' to the qualified staff. *Journal of advanced nursing*, **23**(3), pp. 612-619.
- YIN, S.R., 2007. The role of support staff in pediatric palliative care: their perceptions, training, and available resources. *Journal of palliative care*, **23**(1), pp. 44-50.

Social care (Social Services Abstracts)

ab("support work*" OR assistant*or auxiliar* OR "support staff*" OR unlicense* OR "unregulated worker") AND ab(Train* OR learn* OR educat* OR develop* OR "emotional support" OR "peer support" OR wellbeing OR health OR "career break*" OR counselling OR "access to information" OR mentorship OR supervision OR "work-based training" OR "staff development" OR "orientation programme*" OR "clinical education programme*" OR "nursing assistant champion*" OR storytelling OR incentive* OR reward*) 157 results

Examples of the literature:

- BUTLER, S.S., SIMPSON, N., BRENNAN, M. and TURNER, W., 2010. Why Do They Leave? Factors Associated With Job Termination Among Personal Assistant Workers in Home Care. *Journal of Gerontological Social Work*, **53**(8), pp. 665-681.
- CLARINI, J. and GREENWALD, M., 2004. Process and Product in Designing a New Curriculum: The Training of Special Care Counselors at Vanier College. *Child & Youth Care Forum*, **33**(4), pp. 247-256.
- DENTON, M.A., ZEYTIKOGU, I.U. and DAVIES, S., 2002. Working in Clients' Homes: The Impact on the Mental Health and Well-Being of Visiting Home Care Workers. *Home health care services quarterly*, **21**(1), pp. 1-27.
- EVANS, G., FELCE, D., PAIVA, S.D. and TODD, S., 1992. Observing the Delivery of a Domiciliary Support Service. *Disability, Handicap & Society*, **7**(1), pp. 19-34.
- FOSSEN, C.M., 2001. Including Support Staff in Diversity Skills Training. *New Global Development*, **17**(1), pp. 17-23.
- KEMP, P., 1997. Supporting the Supporters: The Learning and Supervision Needs of Unqualified Support Staff in a Supported Housing Scheme for People with Mental Health Problems. *Educational Action Research*, **5**(2), pp. 193-210.
- MANTHORPE, J., MARTINEAU, S., MORIARTY, J., HUSSEIN, S. and STEVENS, M., 2010. Support workers in social care in England: a scoping study. *Health & Social Care in the Community*, **18**(3), pp. 316-324.
- NANCARROW, S.A., SHUTTLEWORTH, P., TONGUE, A. and BROWN, L., 2005. Support Workers in Intermediate Care. *Health & Social Care in the Community*, **13**(4), pp. 338-344.
- PALMER-HOUSE, K.E., *The perceived impact of strengths-based family worker training: Workers' learning that helped empower families.*
- PARLALIS, S.K., 2011. Organizational Changes and Job Satisfaction among Support Staff. *Journal of Social Service Research*, **37**(2), pp. 197-216.
- RICCIARDI, J.N., 2005. Achieving Human Service Outcomes Through Competency-Based Training. A Guide for Managers. *Behavior modification*, **29**(3), pp. 488-507.
- SHARMAN, Z., MCLAREN, A.T., COHEN, M. and OSTRY, A., 2008. "We Only Own the Hours": Discontinuity of Care in the British Columbia Home Support System. *Canadian Journal on Aging/La Revue Canadienne du Vieillessement*, **27**(1), pp. 89-99.
- SIEGEL, E.O., YOUNG, H.M., MITCHELL, P.H. and SHANNON, S.E., 2008. Nurse Preparation and Organizational Support for Supervision of Unlicensed Assistive Personnel in Nursing Homes: A Qualitative Exploration. *The Gerontologist*, **48**(4), pp. 453-463.

SIMS-GOULD, J., BYRNE, K., CRAVEN, C., MARTIN-MATTHEWS, A. and KEEFE, J., 2010. Why I Became a Home Support Worker: Recruitment in the Home Health Sector. *Home health care services quarterly*, **29**(4), pp. 171-194.

Education (ERIC)

ab("Teaching assistant" OR "support work*" OR assistant*or auxiliar* OR "support staff*" OR unlicense* OR "unregulated worker") AND ab(Train* OR learn* OR educat* OR develop* OR "emotional support" OR "peer support" OR wellbeing OR health OR "career break*" OR counselling OR "access to information" OR mentorship OR supervision OR "work-based training" OR "staff development" OR "orientation programme*" OR storytelling OR incentive* OR reward*) 1826 results

Examples of the literature:

ABBOTT, L., MCCONKEY, R. and DOBBINS, M., 2011. Key Players in Inclusion: Are We Meeting the Professional Needs of Learning Support Assistants for Pupils with Complex Needs? *European Journal of Special Needs Education*, **26**(2), pp. 215-231.

ABBOTT, R.D., 1989. Review of Research on TA Training. *New Directions for Teaching and Learning*, , pp. 111-124.

ALLEN, R.R. and RUETER, T., 1990. *Teaching Assistant Strategies: An Introduction to College Teaching*. Kendall/Hunt Publishing Company, 2460 Kerper Blvd., P.O. Box 539, Dubuque, IA 52004-0539

ARANTOWICZ, E.J. and LOMICKA, L., 2001. Understanding the Experiences of Teaching Assistant Peer Coordinators. *Journal of Graduate Teaching Assistant Development*, **8**(3), pp. 115-121.

ARD, J., 1989. Grounding an ITA Curriculum: Theoretical and Practical Concerns. *English for Specific Purposes*, **8**(2), pp. 125-138.

AZEVEDO, M.M., 1990. Professional Development of Teaching Assistants: Training Versus Education. *ADFL Bulletin*, **22**(1), pp. 24-28.

BAUER, G. and TANNER, M., 1994. *Current Approaches to International TA Preparation in Higher Education: A Collection of Program Descriptions*. Center for Instructional Development and Research, International Teaching Assistant Program, 124 Parrington Hall, DC-07, University of Washington, Seattle, WA 98195

BEDFORD, J., GODDARD, G., OBADAN, F. and MOWAT, P., 2006. How Gaining Higher Level Teaching Assistant Status Impacts on the Teaching Assistant's Role in English Schools. *Management in Education*, **20**(1), pp. 6-10.

BOLLIS-PECCI, T.S. and WALKER, K.L., 2000. Peer Mentoring Perspectives in GTA Training: A Conceptual Road Map. *Journal of Graduate Teaching Assistant Development*, **7**(1), pp. 27-37.

BORROWMAN, S., 1999. *First-Year Training for First-Year Composition: TA Training from the Inside*.

BUERKEL-ROTHFUSS, N.L. and GRAY, P.L., 1990. Graduate Teaching Assistant Training in Speech Communication and Noncommunication Departments: A National Survey. *Communication Education*, **39**(4), pp. 292-307.

BURGESS, H. and MAYES, A.S., 2009. An Exploration of Higher Level Teaching Assistants' Perceptions of Their Training and Development in the Context of School Workforce Reform. *Support for Learning*, **24**(1), pp. 19-25.

BURGESS, H. and MAYES, A.S., 2007. Supporting the Professional Development of Teaching Assistants: Classroom Teachers' Perspectives on Their Mentoring Role. *Curriculum Journal*, **18**(3), pp. 389-407.

- BURK, J.E., 2001. Preparing the Professoriate: Instructional Design Training for GTAs. *Journal of Graduate Teaching Assistant Development*, **8**(1), pp. 21-26.
- BUTT, G. and LANCE, A., 2005. Modernizing the Roles of Support Staff in Primary Schools: Changing Focus, Changing Function. *Educational Review*, **57**(2), pp. 139-149.
- COULBECK, J., 2009. Knowing Me, Knowing You: Professional Development for Support Staff. *School Business Affairs*, **75**(11), pp. 8-11.
- DOIDGE, J., HARDWICK, B. and WILKINSON, J., 1998. *Developing Support and Allied Staff in Higher Education*. Kogan Page, 120 Pentonville Road, London, N1 9JN, England, United Kingdom (16.99 British pounds).
- DONLEY, M., CHAN, J. and WEBBER, L., 2012. Disability Support Workers' Knowledge and Education Needs about Psychotropic Medication. *British Journal of Learning Disabilities*, **40**(4), pp. 286-291.
- FURNISS, K.A., LOVERSEED, A., LIPPOLD, T. and DODD, K., 2012. The Views of People Who Care for Adults with Down's Syndrome and Dementia: A Service Evaluation. *British Journal of Learning Disabilities*, **40**(4), pp. 318-327.
- GIANGRECO, M.F., 2010. Utilization of Teacher Assistants in Inclusive Schools: Is It the Kind of Help that Helping Is All about? *European Journal of Special Needs Education*, **25**(4), pp. 341-345.
- GORSUCH, G.J., 2006. Discipline-Specific Practica for International Teaching Assistants. *English for Specific Purposes*, **25**(1), pp. 90-108.
- GRAVES, S., 2011. Performance or Enactment? The Role of the Higher Level Teaching Assistant in a Remodelled School Workforce in England. *Management in Education*, **25**(1), pp. 15-20.
- GURSKY, B.S. and RYSER, B.J., 2007. A Training Program for Unlicensed Assistive Personnel. *Journal of School Nursing*, **23**(2), pp. 92-97.
- HAMMERSLEY-FLETCHER, L. and LOWE, M., 2011. From General Dogsboddy to Whole-Class Delivery--The Role of the Primary School Teaching Assistant within a Moral Maze. *Management in Education*, **25**(2), pp. 78-81.
- HARTNAGEL, D., 1986. Supporting the Support Staff. *College and University*, **61**(4), pp. 275-281.
- HASH, V., 2002. A Recipe for Support Staff Professional Development. *Inquiry*, **7**(1), pp. 8-10.
- HATTON, C., WIGHAM, S. and CRAIG, J., 2009. Developing Measures of Job Performance for Support Staff in Housing Services for People with Intellectual Disabilities. *Journal of Applied Research in Intellectual Disabilities*, **22**(1), pp. 54-64.
- HEWITT, A. and LARSON, S., 2007. The Direct Support Workforce in Community Supports to Individuals with Developmental Disabilities: Issues, Implications, and Promising Practices. *Mental retardation and developmental disabilities research reviews*, **13**(2), pp. 178-187.
- IACONO, T., 2010. Addressing Increasing Demands on Australian Disability Support Workers. *Journal of Intellectual & Developmental Disability*, **35**(4), pp. 290-295.
- JONES, L., 2002. Suggestions for Maintaining Quality in Rehabilitation Teaching Services. *RE:view*, **34**(2), pp. 51-54.
- KAUFMAN, D., BROWNWORTH, B. and BURTON, J., 2006. *Professional Development of International Teaching Assistants*. Teachers of English to Speakers of Other Languages, 700 South Washington Street Suite 200, Alexandria, VA 22314.

- KONTOS, P.C., MILLER, K. and MITCHELL, G.J., 2010. Neglecting the Importance of the Decision Making and Care Regimes of Personal Support Workers: A Critique of Standardization of Care Planning through the RAI/MDS. *Gerontologist*, **50**(3), pp. 352-362.
- KOST, C.R., 2008. Innovations in Teaching Assistant Development: An Apprenticeship Model. *Foreign Language Annals*, **41**(1), pp. 29-60.
- LAWRENZ, F., 1992. Training the Teaching Assistant. *Journal of College Science Teaching*, **22**(2), pp. 106-109.
- LITAROWSKY, J.A., MURPHY, S.O. and CANHAM, D.L., 2004. Evaluation of an Anaphylaxis Training Program for Unlicensed Assistive Personnel. *Journal of School Nursing*, **20**(5), pp. 279-284.
- MAIN, E.C., 1994. *Teaching Assistant Training and Teaching Opportunity (TATTO) Program*.
- MCMANUS, D.A., 2002. Developing a Teaching Assistant Preparation Program in the School of Oceanography, University of Washington. *Journal of Geoscience Education*, **50**(2), pp. 158-168.
- MEYERS, S.A. and PRIETO, L.R., 2000. Using Active Learning To Improve the Training of Psychology Teaching Assistants. *Teaching of Psychology*, **27**(4), pp. 283-284.
- MILLER, R.H. and DAVIS, S.H., 1990. *Support Staff Involvement in Library Planning: A Staff Development Activity*.
- MILLS, N., 2011. Teaching Assistants' Self-Efficacy in Teaching Literature: Sources, Personal Assessments, and Consequences. *Modern Language Journal*, **95**(1), pp. 61-80.
- MONI, K.B., JOBLING, A. and VAN KRAAYENOORD, C.E., 2007. "They're a Lot Cleverer than I Thought": Challenging Perceptions of Disability Support Staff as They Tutor in an Adult Literacy Program. *International Journal of Lifelong Education*, **26**(4), pp. 439-459.
- NOONE, S.J. and HASTINGS, R.P., 2009. Building psychological resilience in support staff caring for people with intellectual disabilities. Pilot evaluation of an acceptance-based intervention. *Journal of Intellectual Disabilities*, **13**(1), pp. 43-53.
- NOTARIANNI-GIRARD, D., 1999. Transfer of Training in Teaching Assistant Programs. *Journal of Graduate Teaching Assistant Development*, **6**(3), pp. 119-147.
- NYQUIST, J.D., 1989. The Challenge of TA Training in the 1990s. *New Directions for Teaching and Learning*, , pp. 7-14.
- PARK, C., 2004. The Graduate Teaching Assistant (GTA): Lessons from North American Experience. *Teaching in Higher Education*, **9**(3), pp. 349-361.
- PENWELL, R.A., ELSAWA, S.F. and PITZER, T., 2004. Cooperative and Active Learning in Undergraduate Biological Laboratories at FIU--Implications to TA Teaching and Training. *Bioscene: Journal of College Biology Teaching*, **30**(2), pp. 9-12.
- PUCCIO, P.M., 1986. *TAs Help TAs: Peer Counseling and Mentoring*.
- REAGAN, S.B., 1988. Teaching TAs to Teach: Show, Don't Tell. *Writing Program Administration*, **11**(3), pp. 41-51.
- ROBINSON, J.B., 2000. New Teaching Assistants Facilitate Active Learning in Chemistry Laboratories: Promoting Teaching Assistant Learning through Formative Assessment and Peer Review. *Journal of Graduate Teaching Assistant Development*, **7**(3), pp. 147-162.

- ROSE, R. and O'NEILL, A., 2009. Classroom Support for Inclusion in England and Ireland: An Evaluation of Contrasting Models. *Research in Comparative and International Education*, **4**(3), pp. 250-261.
- RUSHIN, J.W., 1997. *Graduate Teaching Assistant Training: A Basis for Improvement of College Biology Teaching and Faculty Development*.
- RUSSELL, J.A., 2009. A Survey of Basic Instructional Program Graduate Teaching Assistant Development and Support Processes. *Research quarterly for exercise and sport*, **80**(4), pp. 792-795.
- SCHEPIS, M.M., OWNBEY, J.B., PARSONS, M.B. and REID, D.H., 2000. Training Support Staff for Teaching Young Children with Disabilities in an Inclusive Preschool Setting. *Journal of Positive Behavior Interventions*, **2**(3), pp. 170-178.
- SEQUEIRA, D. and COSTANTINO, M., 1989. Issues in ITA Training Programs. *New Directions for Teaching and Learning*, , pp. 79-86.
- SPRAGUE, J. and NYQUIST, J.D., 1989. TA Supervision. *New Directions for Teaching and Learning*, , pp. 37-53.
- STOCKDALE, D.L. and WOCHOK, Z.S., 1974. *Training TA's to Teach*.
- SVINICKI, M.D., 1989. The Development of TAs: Preparing for the Future while Enhancing the Present. *New Directions for Teaching and Learning*, .
- TANG, L. and SANDELL, K., 2000. Going beyond Basic Communication Issues: New Pedagogical Training of International TAs in SMET Fields at Two Ohio Universities. *Journal of Graduate Teaching Assistant Development*, **7**(3), pp. 163-172.
- TEMPLE, F.N., ISAAC, A.L., ADAMS, A.B., HAUGHLAND, L.D., ENGLESTOFT, C. and GARCIA, F.P., 2003. Development of a Peer Based, Department-Specific Teaching Assistant Manual and Orientation. *Journal of Graduate Teaching Assistant Development*, **9**(2), pp. 75-80.
- TEST, D.W., FLOWERS, C., HEWITT, A. and SOLOW, J., 2004. Training Needs of Direct Support Staff. *Mental Retardation: A Journal of Practices, Policy and Perspectives*, **42**(5), pp. 327-337.
- THORON, A.C., MYERS, B.E., HARDER, A., STEDMAN, N. and ROBERTS, G.T., 2012. An Analysis of Teaching Competencies of Junior Faculty with Different Levels of Graduate Teaching Assistant Experiences. *Journal of Natural Resources and Life Sciences Education*, **41**(1), pp. 1-6.
- TICE, S.L., 1997. *The Relationships between Faculty Preparation Programs and Teaching Assistant Development Programs. Preparing Future Faculty. Occasional Paper No. 4*. Preparing Future Faculty, 1818 R Street, NW, Washington, DC 20009;.
- TUCKER, S., 2009. Perceptions and Reflections on the Role of the Teaching Assistant in the Classroom Environment. *Pastoral Care in Education*, **27**(4), pp. 291-300.
- VANVALKENBURG, J. and ARNETT, C., 2000. The Professionalization of Teaching Assistants: Can It Be Accomplished? *Unterrichtspraxis/Teaching German*, **33**(1), pp. 1-6.
- VOLKMANN, M.J. and ZGAGACZ, M., 2004. Learning to Teach Physics through Inquiry: The Lived Experience of a Graduate Teaching Assistant. *Journal of Research in Science Teaching*, **41**(6), pp. 584-602.
- VOM SAAL, D., 1988. A University-wide Assessment and Training Program for International Teaching Assistants. *Journal of Agronomic Education (JAE)*, **17**(2), pp. 68-72.
- WATTERS, L., MCKENZIE, K. and WRIGHT, R., 2012. The Impact of Staff Training on the Knowledge of Support Staff in Relation to Bereavement and People with an Intellectual Disability. *British Journal of Learning Disabilities*, **40**(3), pp. 194-200.

WEST, A., 2004. Supporting the Supporters: A Framework for Assisting Academic Staff in Their Support of Students. Perspective. *Perspectives London policy and practice in higher education*, **8**(4), pp. 108-112.

WILLIAMS, V., PONTING, L., FORD, K. and RUDGE, P., 2010. Skills for Support: Personal Assistants and People with Learning Disabilities. *British Journal of Learning Disabilities*, **38**(1), pp. 59-67.

WINDLEY, D. and CHAPMAN, M., 2010. Support Workers within Learning/Intellectual Disability Services Perception of Their Role, Training and Support Needs. *British Journal of Learning Disabilities*, **38**(4), pp. 310-318.

YOUNG, S.L. and BIPPUS, A.M., 2008. Assessment of Graduate Teaching Assistant (GTA) Training: A Case Study of a Training Program and Its Impact on GTAs. *Communication Teacher*, **22**(4), pp. 116-129.