

Very Late Onset Schizophrenia-like Psychosis (VLOSLP); A Clinical Update for Nurses

Psychosis symptoms (delusions and hallucinations) are multifactorial in origin and, in later life occur in the context of schizophrenia, delirium, dementia, delusional and schizophrenia-like disorders, mood disorders, and alcohol or substance abuse. In this paper, we provide a clinical overview of very late (after 60yrs) onset schizophrenia-like psychosis (VLOSLP); summarising the literature on treatment options and reflecting on the role of the MHN.

Preoccupying multi-modal hallucinations and delusions and a lack of insight are characteristic features in VLOSLP and it is not uncommon for those referred to mental health services to refuse an initial assessment, and to decline or discontinue treatment. Early intervention and outreach services are an integral part of service infrastructure for younger people experiencing schizophrenia but are generally not available for older adults with VLOSLP. Increased awareness of the clinical presentation, key features and evidence-based treatment options will assist MHNs to confidently recognise this often under-diagnosed disorder and to adopt a more assertive role in terms of engagement and follow up.

The current consensus is that VLOSLP symptoms are best managed with low dosage atypical antipsychotic medication, but the very-late onset patient group have greater susceptibility to therapeutic and adverse effects of antipsychotic drugs compared to those with earlier illness onset. Such issues increase the likelihood of non-compliance and disengagement with services. The role of the frontline MHN is pertinent, particularly in terms of developing rapport, facilitating engagement, discussing medication, supporting compliance and competently monitoring emergent side effects. Pragmatic research involving people with VLOSLP is required to increase the evidence base for treatment and improve outcomes of care.

Keywords: Very Late Onset Schizophrenia-like Psychosis (VLOSLP), mental health nursing, older adults, therapeutic relationship, engagement.

It has long been acknowledged that psychotic illness can lead to alienation, discrimination and isolation (Burke & Shome 1998), and that older people with psychosis represent one of the most disenfranchised groups in relation to health care (Mitford et al 2010). In the Older Adult mental health setting nurses encounter two main groups with a schizophrenia diagnosis – people with early-onset schizophrenia (EOS) who have grown old and those who experience the onset of psychosis in later life, either as a late-onset (over 40 years) schizophrenia (LOS, or a very late-onset (after 60 years) schizophrenia-like psychosis (VLOSLP).

Older people with schizophrenia have been somewhat neglected historically by the scientific research community (Folsom 2006, Cohen et al 2008,) and there is a significant gap between the high prevalence of psychotic disorders in the elderly and the availability of evidenced-based treatments (Reinhardt & Cohen 2015). This leaves health care systems ill prepared to deal with the predicted substantial growth in the older population (Cohen, Meesters & Zhao 2015).

Drawing on the published literature and on the authors' clinical and research experience, the paper reflects on VLOSLP from a person-centered, biopsychopharmosocial mental nursing perspective (Clarke and Clarke 2014); describing clinical presentation and treatment interventions. A search of PubMed and CINAHL using 'very late -onset schizophrenia –like psychosis' and a range of related terms combined with '(mental health/psychiatric) nursing revealed very little attention specifically relating to mental health nursing care of this patient group, although information is available in relation to generically supporting older people experiencing psychosis and /or schizophrenia.

Diagnostic issues.

VLOSLP is described as 'schizophrenia-like' as it typically presents with positive symptoms (prominent delusions and multimodal hallucinations), in the absence of formal thought disorder and negative symptoms that are typically seen in EOS, but with greater sensory disturbance (Howard et al, 2000; Kohler et al, 2007). In contrast to EOS, VLOSLP occurs more commonly in women (after adjusting for gender differences in mortality), and is less associated with familial occurrences, or childhood trauma (Reeves & Brister 2008). Those with VLOSLP typically describe distressing delusional beliefs and hallucinations, often of a persecutory nature, which have a profound impact on the person's daily life and wellbeing. Also characteristic of VLOSLP are 'partition' delusions which involves belief that structures which normally act as barriers to movement, sight and sound (for example 'walls, floors, ceilings, and doors')(Howard et al, 1992) become permeable, allowing a person to be observed, harmed, stolen from and even sexually assaulted.

The exact onset of VLOSLP can be hard to establish. Zarit and Zarit (2012) suggest a two-stage process, characterised by initial suspicion, irritability and ideas of reference, which then erupts into more dramatic visual and auditory hallucinations and delusional interpretation of life events. Cross-sectional studies have found that social isolation (Island et al 1994, Almeida et al 1995, Hasset 1999) and sensory deficits are common (Hassett 1997, Eissa et al 2013) in VLOSLP, although no direct causal link has been established, and it is equally possible that the tendency to isolate oneself or failure to acknowledge or correct sensory deficits are part of a prodromal phase. The aetiological contribution of 'neurodegeneration' or 'organic' factors to VLOSLP remains unclear (Barak et al 2002, Brodaty et al 2003, Palmer et al 2001, Jones et al 2005), and increased first service contact rates in older adults from ethnic minority groups, suggests that psychosocial stressors may be equally important (Reeves et al, 2001; Mitter 2005). Historically the nosology of late-onset and very late-onset schizophrenia like psychosis (VLOSLP) has been contentious (Sharma et al 2014). The long history of differing opinions about age of onset, confusion about diagnostic criteria and challenges of differential diagnosis have resulted in varied and often conflicting findings (Pearman & Batra 2015).

Consensus on diagnosis, nomenclature, treatment guidelines and future research guidelines was only reached in 2000, following an International Late-Onset Schizophrenia Group Consensus group meeting (Howard et al 2000), in which VLOSLP was defined as a 'schizophrenia-like' psychosis with onset after 60 years, which cannot be attributed either to a primary affective disorder or focal or progressive structural brain abnormalities (see Box 1).

VLOSLP is estimated to affect around 34,000 of the UK population with 2,800 new service contacts per year (Howard et al 2000). The prevalence of late life schizophrenia at the age of 95 is 2.4% and the number of people with this disorder is likely to increase (Royal College of Psychiatrists (R.C.Psych), 2012). The Royal College of Psychiatrists (R.C.Psych) are trying to improve the recognition of schizophrenia in older people, pointing out that VLOSLP may be regarded as eccentricity or misdiagnosed as dementia (R.C.Psych 2012). Jeste, Blazer & First (2005) call for aging-appropriate diagnostic criteria for major disorders such as schizophrenia in later life in order to reduce the accuracy of epidemiological data, improve diagnosis and facilitate study of premorbid indicators, neurobiological underpinnings, prognosis and management.

In VLOSLP a multi-modal treatment approach involving individual care planning, judicious prescribing of antipsychotic medication, psychological support, education, family and community resources is essential, but is not yet supported by a robust evidence base (Reinhardt & Cohen 2015). Those who do access services are not necessarily served well. For example, a recent UK audit found that 54% of people assessed and diagnosed with VLOSLP failed to engage with services or were lost to follow up, with only 28% taking antipsychotic drug treatment at the point of discharge (Lam et al 2016).

Presentation (see Box 2)

People with VLOSLP typically lack insight into their illness and, as a result, their presentation to mental health services is largely initiated by others (GP, neighbours, family, emergency services) and is often an indication that the experience is leading to increased distress, disturbing feelings, thoughts and behaviours (Byrne

2007). People experiencing symptoms of VLOSLP can feel frightened, distressed, outraged or simply overwhelmed by their experiences and referral to mental health services can provoke uncertainty, hostility and fear. Subtlety, patience and tenacity may be required before a person agrees to an initial assessment, and psychotic symptoms can hinder communication, provoke frustration and lead to a lack of connection for both parties. Our experience with this patient group has taught us that sufficient time needs to be invested in the engagement process and several visits or attempts to visit are required before seemingly therapeutic progress is achieved. People experiencing persecutory beliefs and hallucinations can become defensive or antagonistic and frustrated when encountering people who disbelieve them. A non-judgemental approach and active listening to complaints about neighbours' intrusions can diffuse the anger and distress associated with delusional beliefs, and decrease the likelihood provoking a confrontation or repeated calls to emergency services (Howard 1999). Relationship building and engagement are integral aspects of a dynamic process associated with, but not limited to, the initial stages of the nurse/patient relationship (Ryrie & Norman 2013). In patients with VLOSLP, who represent the most difficult to engage group of older people with psychosis, developing a therapeutic alliance is particularly challenging (Lam et al 2016).

The therapeutic relationship that is so fundamental to mental health nursing requires a complex interplay of specialised skills that need to be continually developed and refined: conveying understanding and empathy; accepting individuality; providing support; being there/being available; being genuine; promoting equality; demonstrating respect; maintaining clear boundaries and having self-awareness (Dziopa & Ahern 2008). Such skills and practice should not be under-estimated or taken for granted. Quality therapeutic relationships improve outcome in terms of mediating care such as increased treatment adherence but also in terms of direct benefit of the relationship itself (Priebe & McCabe 2008). MHNs need to take an assertive role in developing best-practice care for older adults living with VLOSLP and ensure that sufficient time and effort is directed towards the engagement process.

Co-morbid medical problems, particularly cardiovascular and cerebrovascular disease, are common in elderly people, and this has both diagnostic and prognostic implications (Kennedy & Frazier 1999, Auslander, Perry, & Jeste, 2002). Talaslahti et al (2015) found higher standard mortality rates in VLOSLP patients compared to those with EOS; which was largely accounted for by 'physical comorbidities' and 'accidents' in those with VLOSLP. MHNs should adopt an integrated approach whereby physical and mental health issues are regarded as equally important. Physical health assessment and care needs to be acceptable to the patient and is likely to be governed by the rapport and level of trust established. The rationale for tests and investigation need to be fully explained and consent given (or declined).

Clinical management of older patients with a new onset disorder (Lubman and Castle, 2002) includes; taking a comprehensive history (including medications), physical examination (including neurological), blood tests, structural imaging and cognitive screening. Where possible a collateral history should be obtained from family, GP or other available source. Before a diagnosis of VLOSLP is made the differential diagnoses must be considered and excluded or monitored (Box 4). In old age psychiatry, treatment is guided by the principle of minimum intervention, aiming to identify and reverse components of the illness where possible, and reduce the secondary impact of delusional symptoms on a person's ability to function (Zarit & Zarit 2012).

Risk Assessment

Elderly people with psychosis represent a highly vulnerable group. Florid symptoms may affect capacity and lead them to make unsafe decisions or engage in behaviours that can threaten their personal wellbeing or endanger others (Talaslahti et al, 2014). The experience of persecutory delusional beliefs can lead people to isolate themselves, adopt extreme measures to protect themselves (multiple locks, weapons) or contemplate suicide. Depressive symptoms are frequent in older people with schizophrenia and there is an association of depressive symptoms and positive symptoms (Zisook et al 1999) which need consideration when assessing (suicide) risk regardless of the patients age (Meesters 2014). Nutritional status may be

compromised if the person is experiencing preoccupying symptoms and if there are fears that food and drink has been tampered with. The MHN should assess for physical signs of illness or self-neglect and/or skin problems (in particular when there are potential risks of the person developing pressure ulcers). Ideas of persecution and a perception of a hostile social environment increase anxiety and stress, and can disrupt family and social relationship, as delusional beliefs are often directed towards those in close personal or physical proximity (Gwyther & Steffens 2007). Social isolation can be identified as a risk factor as can an over stimulating social environment.

The comprehensive risk assessment needs to be able to identify, record, share and respond to abuse, harm and neglect and MHNs have a pivotal role to assess the safety of the home environment and work in close communication with the multidisciplinary team. Many people are best cared for at home but those who are vulnerable and at risk may require admission for assessment and/or treatment. Based on their case register study of older people with VSLOSLP. Talaslahti et al (2016) recommend long term and comprehensive outpatient care to reduce the need for psychiatric hospitalisation with observations of physical illness to reduce the risk of premature long-term residential care.

Additional barriers

Where VLOSLP symptoms arise in the context of sensory impairment, remedial action should be taken. In our experience, it is not unusual for those presenting with VLOSLP to have neglected routine health visits for example to the optician and audiologist (Howard et al, 2000). Delusional persecutory beliefs may provoke the person to stop using the phone, reduce use of radio/ TV or computer so that channels of communication from the social world are reduced. Being a member of a migrant group is a risk factor for VLOSP (Reeves et al 2001; Mitter et al, 2005) and language may act as an additional barrier to communication. Awareness of cultural and ethnic differences in explanatory models of illness, idioms of distress, treatment expectations and adherence is crucial (NICE 2014). Key to this process is striving to understand the cultural context of a

person's experiences and their interpretation (Reeves et al, 2003), respecting diversity and avoiding a 'one size fits all' approach to the therapeutic alliance (Priebe & McCabe 2008).

Managing care

Essential MHN responsibilities include liaison and maintaining clear channels of communication between the patient (and carers), health professionals and other agencies involved, accurate reporting and recording of information and care-planning. The specific role of the MHN will be guided in part by their skill level and competencies. Working with patients experiencing psychotic symptoms can be challenging and organisational structures need to include adequate clinical training and supervision. The National Institute for Health and Care Excellence (NICE) recommendations for schizophrenia and psychosis, whilst not specifically targeted at people with schizophrenia over the age of 60 years, have relevance for nurses working with older adults (NICE [CG178] 2014).

The MHN should work from the person's perspective to clarify their concerns, understand what grounds their beliefs are held and how ideas have developed. Willingness to listen with empathic response and acknowledgement of distress relating to psychotic experiences is required rather than challenging the reality of them. Non-judgemental active listening provides validity to the experience, allows emotional ventilation and signals genuine concern. An approach to patients experiencing VLOSLP is usefully informed by the Cognitive Behavioral for psychosis (CBT-p) model which adopts a continuum approach to symptoms thus placing them in a less stigmatizing context and allowing movement on this continuum (Sivec & Montesano 2012a). Particular strategies used in CBT-p designed to develop of the therapeutic alliance (regarded as critically important), to formulate shared understanding and promote coping with symptoms (Sivec & Montesano 2012b) would appear relevant.

MNH needs to be confident in their theoretical knowledge of psychopathology and ability to elicit and monitor symptoms and associated risks. Assessment and evaluation of symptoms (and treatment response)

can be enhanced through the use of validated rating scales, such as the Brief Psychiatric Rating Scale (BPRS) (Overall & Gorham 1962); which has been used in clinical trials of antipsychotic treatment in VLOSLP (Psarros et al 2009, Howard et al submitted paper 2017). Clinicians can be trained in less than a day to use the BPRS reliably and its use with this patient group is appropriate; with Hostility, Suspiciousness, Hallucinations, Unusual Thought Content, Tension, and Uncooperativeness items being particularly relevant to VLOSLP (Page 9 ATLAS Protocol Version 2 Dated 05/05/2015).

Pharmacological interventions and monitoring

In a recovery-based MH service, medication is one strand of recovery support that can be offered (Slade & Davidson 2011). The nurse's role requires awareness and knowledge of the potential effects of ageing on how psychotropic drugs are metabolised and cleared from the body, and the nature and prevalence of potential adverse effects (Clibbens 2005). Informed choice is relevant and individual capacity for decisions about treatment should be assessed. Discussing psychotropics can create tension within the nurse-patient relationship (Marland et al 2011) with most people being justifiably wary of antipsychotic medication and those experiencing paranoia additionally suspicious. The lack of insight that accompanies VSOSLP means that the patient is unlikely to accept that s(he) has a psychotic illness that could respond to treatment. Individual attitudes about medication need to be explored using the persons own terminology with a clear rationale for why trying the medication has been proposed; for example, reducing anxiety levels, sleeping better, providing peace of mind and ability to cope. MHN should not shy away from open discussion about antipsychotics; sharing current evidence, explaining dosage recommendations for older people and monitoring of treatment effects including possible side effects. Conversations should not be hurried and the issue may need to be revisited at a pace set by the patient; for example:

“Do you know why the doctor has asked you to try the medication? (*Listen and discuss*)

“How do you feel about that” “What do you think of that suggestion?” (*use genuine curiosity*)

“We know from research and our work with other people who are going through similar experiences as yourself, that sometimes as well as having someone to talk to, medication can help... it’s not always easy to explain but some people find that when they take a tablet like this (known as an antipsychotic) they feel more able to manage the situation they are in.” (*discuss response*).

Those involved with discussions about medication experience less coercion and feelings of powerlessness (Freeman 2002); and increased adherence to medication in patients with schizophrenia is associated with a perceived stronger alliance between patient and clinician (Dolder et al 2002, McCabe et al 2012).

Antipsychotic medication should be considered within a clearly defined treatment plan that weighs up the risk and benefits of the intervention (Chahine et al 2010). The underlying mechanisms of antipsychotic drug sensitivity in VLOSLP are not yet fully understood, as research in older people with schizophrenia rarely distinguishes between patients on the basis of age of illness onset. Furthermore, the focus of research is often directed towards those with dementia, who are at greatest risk of antipsychotic related morbidity and mortality (Reeves et al 2017). Decisions around dosage are often further complicated by concurrent medical problems and associated drug treatments (Chan, Lam, & Chen, (2011). ECG screening is recommended for people with significant cardiac risks and individual patient assessment should take account of co-morbid medical conditions or concomitant medications that might increase the risk of adverse drug effects (Reeves & Brister 2008, Chahine et al, 2010). Assessment of renal and liver function is also recommended prior to starting antipsychotic therapy (Arbus et al 2011).

Prescribing for people with VLOSLP is particular challenging, as they are exquisitely sensitive to antipsychotic drug side effects (Reeves et al 2002; Howard et al 2008), which increases the risk of non-compliance and subsequent disengagement (Lam et al, 2016). The general consensus (Howard et al, 2000, Alexopoulos 2004) is that doses as low as 20% of those prescribed to people with EOS (and 50% of those prescribed to people with LOS) can be sufficient to relieve symptoms and minimise side effects in VLOSLP. This has been recently

confirmed in a randomised, placebo-controlled trial, which 100mg/day amisulpride was effective and largely well tolerated in VLOSLP (Howard et al 2017 submitted paper), which argues for a more assertive approach to engagement and antipsychotic drug treatment

Monitoring of symptoms and side effects (See Box *)

Antipsychotic drug related side effects (falls, sedation, extrapyramidal side effects, postural hypotension) are greater following the use of first generation antipsychotics (haloperidol) in older people, and second-generation antipsychotics are thus preferred, particularly for those with VLOSLP who are at greater risk of EPSE than those with an earlier onset illness (Essali & Ali 2012). However, weight gain, diabetes and metabolic syndrome can be serious complications of antipsychotic therapy (in particular clozapine and olanzapine) and require careful monitoring (Chahine et al 2010). Vigilance is required when reviewing compliance and side effects. The MHN should record pulse and both lying and standing blood pressure and elicit any signs of dizziness, or postural drop. Patients with VLOSLP are second only to those with dementia in their sensitivity to EPSE (Reeves et al 2017) and MHNs should be confident in their ability to identify emergent EPSE, both by observation of gait, facial expression and salivation, and direct examination of the wrist and elbow to elicit rigidity.

Other side effects of antipsychotic to be considered include; Xerostoma (dry mouth) which is associated with increased risk of dental disease and reduced quality of life (Kisely et al 2011); constipation and urinary retention associated with medication such as clozapine and olanzapine due to the drug's higher anticholinergic properties (Chahine et al 2010); and unwanted drowsiness or sedation which can increase the falls risk. The MHN should work collaboratively with the patient and with the medical team to establish the optimal effective and acceptable treatment. Ritchie et al (2010) found that older adults with schizophrenia who complied with antipsychotic therapy in the first 6 months had increased long term adherence rates, which supports the importance of engaging people in the early stage of treatment.

Medication management (of both psychiatric and physical health medicines) is an important component of health self-management for older adults with schizophrenia and nurses can encourage informed adherence through the use of open communication and routine patient education (including practical measures such as routine and structure, bubble packs and updated medication lists (Leutwyler et al 2013).

Non-pharmacological interventions

The MHN can promote activities that enhance self-esteem and develop coping skills from a positive stance, focussing on personal strengths and ability not just areas of need. In the absence of controlled trial data, it is difficult to draw firm conclusions or to evaluate the potential contribution of the non-drug components of patient care, including engagement with members of the Community Mental Health Team and Social Services staff (Howard 2008). Although the evidence base for effective non-pharmacological interventions for people with VLOSLP is yet to be established RCTs involving cognitive remediation therapy, CBT and social skills programmes carried out in LOS, have demonstrated improvement in relation to cognitive deficits, social relatedness, mood and psychosis (Cohen, Meesters and Zhao 2015) and psychological approaches in adjunct with antipsychotic medication have also been acknowledged as beneficial (Clare & Giblin 2008).

Results of pilot studies such as Helping Older People Experience Success—Individually Tailored (HOPES–I) support the feasibility of and suggest potential benefits of an individually tailored living skills training program with older people with serious mental illness including schizophrenia (though not specifically very late onset) (Pratt et al, 2017); an exploratory study, which evaluated the cognitive aetiology of persecutory delusion formation and maintenance in VLOSLP, showed evidence of mentalizing errors but not the other cognitive biases described in EOS. The authors argued for the development of new cognitive models for psychotic symptoms, which could be used to guide psychological interventions (Moore et al 2006).

Studies have shown that nurses and case managers with brief training can deliver Cognitive Behavioral techniques for psychosis (CBt-p) with positive effects to younger patients with schizophrenia spectrum

disorders (Sivec & Montesano, 2012). Such approaches could be trialled and adapted for use with older people with VLOSLP as increasing the MHNs repertoire of skills to respond effectively to psychotic experience could be beneficial in terms of continuation of care. Such training would also inform a structured phased approach to delivering support: with attention to the engagement process (using strategies such as normalising and shared formulation (For process examples of clinical practice see, Sivec & Montesano, 2012)

Caregiver support

Caregivers of patients living with psychosis can face considerable difficulties including the challenge of dealing with a range of unusual or bizarre symptoms that can be hard to understand and cope with on an emotional and practical level (Kuipers, 2010). Long standing paranoia can lead to conflict and part of the MHN role is to support family members, to enable them to reframe and deal with such issues (Lubman & Castle, 2002). Alternatively, relatives may need help and support to create distance and 'mental space' between themselves and the person, to minimise negative interactions and/or reduce risk. The carers' support plan should include psychoeducation, strategies for coping, and advice about how to respond to delusional beliefs, or ongoing hallucinations.

Limited capacity for interpersonal relationships is noted in people experiencing VLOSLP (Hasset, 1999) and care packages should be aimed at promoting a social environment that is not over-stimulating or against the person's wishes, whilst avoiding social isolation. Relationships may need to be re-appraised and re-negotiated between the patient and caregivers (Kuipers, 2010).

On-going support

The MHN is required to work alongside the patient to develop an understanding of their illness experience, consider how 'wellness' can be achieved, and evaluate care received. A stress-vulnerability model can be used to help a person make sense of why a psychosis may have developed, and recognising stress triggers

may enable people to reduce the likelihood of relapse (Freeman 2002). Although research on relapse prevention is almost entirely focused on those with an earlier onset of schizophrenia, it seems likely that those with VLOSLP would benefit from approaches that empower and respect the individual. Blanchard et al (2009) propose a re-integrative model for Old Age Psychiatry that enables the person to come to terms with loss, adapt and emerge with a new concept of self, sense of meaning and empowerment. The MHN has a role to challenge assumption about disability, mental illness and older adults and be assertive in helping to develop interventions that recognize and foster personal development for older adults with schizophrenia (Sorrell and Collier 2011). Service pathways and the discharge process need to be planned and collaboratively discussed with the patient, GP and relevant agencies (including treatment summary, follow up advice, warning signs of relapse, crisis plan and future goals). It is important that the person knows how to access help in the future and a low threshold for re-referral for patients with VSLOSLP should be considered. Those who remain on anti-psychotic medication will require continued monitoring of symptoms, compliance and side effects. Without effective integrated community-based mental health services, older adults are unlikely to receive much needed treatment and it is important that nurses, alongside other health care professionals, researchers, and policy makers, step up to the challenge and continue to advocate for and develop an improved collaborative age adapted mental health care system that can address unmet need in this group (Sorrell 2016).

Conclusion

The consensus on management of VLOSLP is that atypical antipsychotic medication is the cornerstone of treatment, and advises physical screening, the use of very low doses, and ongoing safety monitoring. However, it is important to remember the therapeutic context that needs to be in place *before* such medications can be prescribed and monitored effectively. The therapeutic relationship is fundamental. Gaining trust of people experiencing psychosis translates into really listening to their story, 'getting inside their world', acknowledging their beliefs and why they hold them (Freeman 2002). Building trust and

sustaining this relationship is a crucial part of the MHN role, and requires compassion and strong collaborative multi-professional team work. Medication is *never* a stand-alone treatment, rather it is an adjunct to good quality mental health care that integrates bio-psychosocial aspects of well-being. Much can potentially be achieved with non-pharmacological interventions for older people experiencing psychosis (Karim & Bryne 2005). Outcomes for care need to be judged not only on the presence or absence on symptoms but on issues such as quality of life, subjective wellbeing and how the person is able to function socially (Vahia et al 2007).

Research on schizophrenia has largely focussed on EOS (Kohler et al 2007, Collier & Sorrell 2011), and the literature on mental health nursing in older adults focuses on dementia and depression, with a relative absence of information on VLOSLP. This discrepancy needs to be addressed in order to understand the antecedents, illness course, and successful management and intervention strategies (Hasset 1999, Reeves & Brister 2008). Older patients should not be denied either the therapeutic optimism, or the assertive treatment and early interventions that are available to younger patients with schizophrenia (Burke & Shome 1998, Mitford et al 2010). MNHs have a responsibility to challenge ageism and negative attitudes towards older people with schizophrenia (Collier & Sorrell 2011). MHNs play a pivotal role in engaging and supporting people with VLOSLP, formulating individualised care plans and working to increase resilience. Clinically meaningful randomised studies are needed to help guide clinicians in their management of elderly people with schizophrenia. On a broader level, nurses can endeavour to raise the profile of this highly vulnerable group, and collaborate with other professionals to optimise engagement and contribute to much needed clinically meaningful randomised studies that can guide management and service delivery.

Add to ref

Medication Adherence among Older Adults with Schizophrenia

Leutwyler, Heather C, PhD, FNP-BC, CNS; Fox, Patrick J, PhD, MSW; Wallhagen, Margaret, PhD, GNP-BC, AGSF, FAAN.

Journal of Gerontological Nursing; Thorofare39.2 (Feb 2013): 26-34; quiz 35.

Sivec HJ, Montesano VL. Cognitive behavioral therapy for psychosis in clinical practice. *Psychotherapy (Chic)*. 2012

Jun;49(2):258-70.