Focus

Schizophrenia in old age

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The issue of schizophrenia in older people has not received much attention, perhaps because younger adults tend to grab the limelight. However, schizophrenia starting in early adult life, "early onset schizophrenia" (EOS), may become chronic and continue into old age and schizophrenia may also begin in old age. Fifteen per cent of new cases occur after age 40 and 6 per cent after age 60. Cases beginning after 45 years are termed "late onset schizophrenia" (LOS).

An estimated 1 per cent of people over 65 have schizophrenia. As the population ages, the absolute numbers of older people with the illness can be expected to rise. What has yet to be determined is the effect of newer, assertive treatments of younger people with schizophrenia on disability in later life.

Early onset schizophrenia

The current state of knowledge about older people with EOS applies to a cohort which had vastly different experiences of treatment and social attitudes from today's younger generation with schizophrenia. Despite the primitive and sometimes inhumane treatments these people received, the outcomes are surprisingly good.

Three main longitudinal studies of 25-32 years' duration show roughly similar outcomes, ie, an improvement in symptomatology in 60-70 per cent of patients.1-3
These were characterised by reductions in hallucinations, bizarre behaviour, depressed mood and delusions. On the negative side some show reduced volition, lesser production of speech and flattening of
expression.

The changes in cognition occurring after a long duration of schizophrenia do not amount to dementia and are different from Alzheimer's

Key points

- Schizophrenia that begins in young adult life often continues into old age but symptoms diminish in intensity
- Schizophrenia may occur for the first time in old age, but mood and organic disorders are more common causes of first episode psychosis in older people
- Older people with schizophrenia tend to be socially isolated and unlikely to present for treatment. They may be non-compliant with management
- Tardive dyskinesia occurs commonly in elderly people treated with traditional antipsychotic medication. Patients should be reviewed carefully to avoid this
- Attempts should be made to reduce or stop traditional antipsychotics or to change to an atypical medication such as risperidone

disease, presenting with more frontal lobe symptomatology and a slower progression. Cerebral atrophy is present on CT scanning in both younger and older people with schizophrenia but it is not clear how this translates into symptoms. Some studies showed that, socially, people with EOS growing old did well, having some social contacts and being generally satisfied with life.1

After 30 years of illness, although 84 per cent were prescribed medication, only 25 per cent reported taking it as directed and another 25 per cent took it only when they had symptoms.1

Several reasons for improvement with advancing age have been postulated. Firstly, there are fewer social pressures on older people, eg, to establish one's identity, find a job and a partner. Secondly, there may be greater tolerance of unusual behaviour in the elderly. Thirdly, changes in neurotransmitter levels occurring with age may result in restoration of the correct balance between dopamine, noradrenaline, serotonin and others to reduce positive symptoms.

Many older people with EOS spent years in institutions and were subsequently placed in rest home care. They are usually not in contact with mental health services and their medical and psychiatric needs are met by GPs.

Old age and long term institutionalisation are not reasons to regard these people as "irretrievable" and it is worth trying the newer medications if positive symptoms are present and cause distress. Older people often do very well on small doses of the atypical neuroleptics risperidone, clozapine and olanzapine.

They warrant consideration of rehabilitation, albeit slow, and resocialisation into the community. These people have often become estranged from family and have limited ability to advocate for themselves. They depend on the goodwill of rest home managers and staff to ensure they receive suitable treatment and are not exploited. If applicable, carers might consider the appointment of a welfare guardian under the PPPR Act or arrange independent support via a volunteer organisation such as Age Concern.

Late onset schizophrenia

After years of debate DSM IIIR removed the age limit disallowing the first diagnosis of schizophrenia after age 45. Late onset schizophrenia (previously known as "late paraphrenia") is aetiologically a controversial concept as other disorders in late life may present very similarly and it is difficult to differentiate between them.

Although LOS has very similar phenomena to EOS, it presents different characteristics, eg, in the older age group the illness presents much more commonly in women, who are four to 60 times as likely to develop schizophrenia than men.4 Usually schizophrenia is of the paranoid type and delusions and hallucinations occur in the setting of a well-preserved personality and affective response. Thought disorder is rare.

This group commonly have "partition delusions" – the belief that people, objects or radiation can pass through what would normally constitute a barrier, eg, the person is being watched through the walls or that rays of gas are being directed into the house.

People developing LOS are likely to have married later than the population average, have fewer children and to be pessimistic, self-referential, sensitive people. Hearing impairment occurs in 25-40 per cent.5 LOS develops very gradually with the person becoming increasingly isolated and suspicious. Often they go for years undiagnosed in the community because their symptoms are not disruptive enough to be noticed.

Examination will evidence a clear sensorium with normal cognitive function and absence of typical depressive symptomatology. There is a dearth of longitudinal data on cognitive outcome to indicate if LOS is qualitatively different from EOS or a variant of the same disease.

Delusional disorder presents with non-bizarre delusions, and hallucinations tend to be less common and related to the delusional theme. Functioning is not markedly impaired. The differentiation from late-onset schizophrenia may be difficult to make.

The most likely cause of psychotic symptoms developing for the first time in later life is an organic disorder such as dementia or delirium, or a severe affective disorder such as melancholic depression. The history and examination will generally point towards these other diagnoses.

Causes of organic delusions and hallucinations include delirium (drug induced, infection, metabolic disturbances, etc) or dementia (particularly dementia of Lewy body type, Alzheimer's disease and vascular dementia).

Neurological examination, CT head scan and laboratory testing are usually indicated. The GP will probably want to consult a psychiatrist specialising in old age to assist in diagnosis.

Lack of insight

Unfortunately people with schizophrenia often lack insight and are reluctant to cooperate with investigation. Because they are seldom dangerous or markedly self-neglectful they mostly do not justify compulsory assessment and treatment under the Mental Health Act. The GP or mental health team needs to develop a rapport in order to encourage the person to accept the appropriate management. If the person trusts the GP but refuses psychiatric input it may be possible to investigate and treat via telephone consultation with the mental health team.

Few people recover without treatment and the illness can go on to become chronic with residual negative symptoms.

At least 50 per cent show at least a partial response to medication, though non-compliance may be as high as 75 per cent. The response is better using depot medication, probably because of improved compliance.6 Doses tend to be lower than those for younger people or with EOS because of the greater risk of side effects. Often the therapeutic alliance is fragile and may be broken if side effects occur.

Side effects of treatment

In this age group the lower potency drugs (chlorpromazine and thioridazine) cause hypotension and cardiac problems. They should be used with caution and only if other properties, such as sedation, are desired. The major side effects are extrapyramidal (parkinsonian) and tardive dyskinesia.

The higher potency antipsychotics (eg, haloperidol, trifluoperazine and large doses of risperidone) are most likely to cause parkinsonian side effects, including leg restlessness (akathisia) and tardive problems. They may exacerbate a pre-existing proneness to idiopathic Parkinson's symptoms which occur commonly in the over 80 age group. Management of side effects with anticholinergic drugs such as benztropine is not without risk; in particular they cause increased confusion or frank delirium.

Tardive dyskinesia presents as involuntary choreiform athetoid or rhythmic movements of the tongue, jaw or extremities. It may develop in association with the

use of neuroleptic medication but can be idio-pathic in old age. It is often irreversible even after medication is stopped.

It is especially common in older women, reported rates being around 26 per cent after a year's treatment.7-9 If severe, tardive dyskinesia can interfere with chewing, swallowing and even breathing, sometimes resulting in choking.

On a more mundane level, strange movements make the person look odd and oro-buccal tardive dyskinesia makes it difficult to keep dentures in place. This dooms the patient to a soft (and potentially boring) diet. If the living situation is one where meals are the most interesting event of the day, even this pleasure is diminished.

Tardive dyskinesia is best avoided by using the smallest effective antipsychotic dose, using the newer antipsychotic medication and checking regularly for subtle, early signs, such as tongue movements, lip puckering or leg movements, especially when concentrating. If tardive dyskinesia develops, antipsychotics need to be withdrawn gradually as abrupt discontinuation will result in a worsening of movements. The GP may wish to request specialist input to manage this.

Some of the newer agents have a better profile of side effects and avoid the above complications. Older people often do well on small doses of the atypical neuroleptics risperidone, clozapine and olanzapine. Respiridone is available to GPs but the others must be accessed via specialist mental health services.

Whatever medication is chosen, the old adage "start low and go slow" applies in the treatment of schizophrenia in the elderly. A common daily starting dose is of 0.5mg haloperidol or preferably ris-peridone, with a very gradual increase, monitoring therapeutic response and side effects. In doses up to 1.5mg daily ris-peridone does not usually cause extrapyramidal side effects.

Some people with early onset schizophrenia (perhaps 60 per cent) will manage without medication, but if psychotic symptoms recur after withdrawal, then risperidone can be instituted.

In summary, the older person with schizophrenia presents a challenge because of complex physical, psychological and social issues in management. The aware GP is the best person to manage the patient, but requires adequate backup from local mental health services for older people.

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