**NAME OF DOCUMENT** | Prevention, Diagnosis and Management of Delirium in Older People in Acute and Sub Acute Care  
---|---  
**TYPE OF DOCUMENT** | Procedure  
---|---  
**DOCUMENT NUMBER** | SESLHDPR/345  
---|---  
**DATE OF PUBLICATION** | November 2015  
---|---  
**RISK RATING** | Medium Risk  
---|---  
**LEVEL OF EVIDENCE** | NSQHS Standards 1.2, 1.5, 2.2, 9.1, 9.2, 9.3 and 10 EQuIP Standards 11.6 and 12.1  
---|---  
**REVIEW DATE** | November 2018  
---|---  
**FORMER REFERENCE(S)** | Prevention, Diagnosis and Management of Delirium in Older People in Acute and Sub Acute Care SESIAHS PD 209  
---|---  
**EXECUTIVE SPONSOR or EXECUTIVE CLINICAL SPONSOR** | Prof Peter Gonski  
Director Aged Care and Rehabilitation  
[mailto:peter.gonski@sesiahs.health.nsw.gov.au](mailto:peter.gonski@sesiahs.health.nsw.gov.au)  
---|---  
**AUTHOR** | Janine Masso  
District CNC Dementia/Delirium (acute)  
[mailto:janine.masso@sesiahs.health.nsw.gov.au](mailto:janine.masso@sesiahs.health.nsw.gov.au)  
---|---  
**POSITION RESPONSIBLE FOR THE DOCUMENT** | Kimberley Thomsett  
Clinical Stream Nurse Manager  
Aged Care, Rehabilitation and Medicine  
---|---  
**KEY TERMS** | Delirium, older people, deteriorating patient  
---|---  
**SUMMARY** | This procedure provides staff with information and tools to assist in prevention, identification and management of delirium in older people.
1. **POLICY STATEMENT**

In the absence of a State Policy Directive in the subject of Delirium, SESLHD has identified the need to develop a consistent evidence-based approach to preventing, diagnosing and managing delirium in older people in acute and sub-acute care across SESLHD facilities. Hence, this procedure has been developed to address this need contributing to the improvement of health outcomes in the quality of life for older patients. **This procedure should be read in conjunction with local facility pathways for the management of older people with cognitive impairment.**

Some of the additional benefits of this consistent approach are:
- Improved quality and safety outcomes in older patients with delirium
- Enhanced patient-centred care
- Reduction of hospitalisation related costs
- Reduction in admissions to Aged Care Facilities
- Strengthened knowledge and practice of patient-centred care principles.

SESLHD is committed to involving patients, carers and their families in the development of Care Plans that consider patients’ needs and preferences. SESLHD clinicians are also committed to educating patients regarding their risks of developing delirium and addressing the concerns of patients, carers and their families. This procedure’s consistent approach to preventing, identifying and managing delirium in older patients integrates the principles of person-centred care.

**Scope:**

This procedure relates to, but is not limited to; people aged over 65 years. It is relevant to other adults who have complex co-morbidities. Delirium is not isolated to patients in aged care wards and all health professionals should be aware of delirium risks and management.

This procedure does not include the management of children, or to young people withdrawing from drugs or alcohol.

2. **BACKGROUND**

Delirium is an acute confusional state and is a common and serious condition in older people. It is characterised by a disturbance in attention and awareness and a change in cognition that develops over a short period of time. Delirium can fluctuate during the course of the day. Evidence from history, medical examination or laboratory findings can show that the disturbance is a direct physiological consequence of another medical condition, drug withdrawal or intoxication.

**Delirium is considered a medical emergency. Diagnosis and treatment of the underlying cause is paramount. Delirium is often not recognised by clinicians and is often poorly managed.**

Rates of falls, incontinence and pressure injury are more than trebled in hospitalised persons with delirium. Depression, significant distress and post-traumatic stress disorder have been associated with survivors of delirium.
2.1 Definitions

**Delirium:** a disturbance of consciousness, attention, cognition and perception that develops over a short period of time, usually hours or days, and tends to fluctuate during the course of the day.

**Hypoactive delirium:** a subtype of delirium with symptoms of a hypoactive level of psychomotor activity that may be accompanied by sluggishness and lethargy that approaches stupor.

**Hyperactive delirium:** a subtype of delirium with symptoms of a hyperactive level of psychomotor activity that may be accompanied by strong mood changes, agitation, and/or refusal to co-operate with medical care.

**Disturbance in attention:** reduced ability to direct, focus, sustain and shift attention.

**Disturbance in awareness:** the person has a reduced orientation to the environment and their place in the environment.

**Disturbance in cognition:** memory deficit, disorientation, language, visuospatial ability or perception.

**Fluctuate:** continually changing or shifting unpredictably.

**Tardive Dyskinesia:** characterised by abnormal tongue movements, lip pursing, grimacing, blinking, and gyrating motions of the face and extremities, this disorder may be triggered by psychotropic drugs.

3. RESPONSIBILITIES

3.1 Supervisors and Senior Medical Officers will be responsible for:
- Training medical staff in this procedure and its implementation
- Monitoring compliance with this procedure
- Providing ongoing training and support to medical staff implementing this procedure.

3.2 Medical Staff across SESLHD will be responsible for:
- Familiarising themselves with this procedure
- Implementing it consistently throughout their practice.

3.3 Nursing managers across SESLHD will be responsible for:
- Ensuring nurses are trained in the use of the recommended screening tools
- Providing ongoing training and support to nursing staff implementing this procedure
- Monitoring compliance with this procedure.

3.4 Nurses across SESLHD will be responsible for:
- Familiarising themselves with this procedure and local delirium/confusion management pathways
- Implementing it consistently throughout their practice
4. **PROCEDURE**

4.1 **Prevention of Delirium**

The prevention of delirium is possible and more efficacious than early detection and treatment.

Patients over the age of 65 years who are capable of completing a cognitive screen should have a cognitive assessment including a validated screening tool such as the Mini Mental State Examination (MMSE) or the Abbreviated Mental Test Score (AMTS) [(Appendix A)] on admission or at pre-admission clinic.

The Rowland Universal Dementia Assessment (RUDAS) may be used for people from culturally and linguistically diverse backgrounds (CALD). Obtaining a baseline score enables monitoring of cognition.

Multiple interventions have been shown to assist in the prevention of delirium. They include:

- Managing sensory deficits
- Mobilising the patient as soon as possible
- Promoting sleep
- Maintaining hydration
- Pain management
- Providing an orientating environment.

Timely treatment of infection and electrolyte imbalance and review of medications also contribute to the prevention of delirium.

4.2 **Detection and Diagnosis of Delirium**

4.2.1 **Signs and Symptoms of Delirium**

Signs and symptoms of delirium may fluctuate throughout the day and may include:

- Difficulty focusing or sustaining attention
- Impaired recent memory
- Disturbance of sleep/wake cycle
- Speech or language disturbance
- Disorientation to time or place
- Disturbance in psychomotor behaviour
  - increased eg. agitation
  - decreased eg. sluggishness
- Mood swings
- Misinterpretations of the senses/hallucinations/illusions
4.2.2 Assessment
The underlying cause of delirium is often multi-factorial. Infections such as urinary tract infections and pneumonia, electrolyte imbalance and pain are common causes of delirium however a rigorous assessment is required to identify the cause or causes of each individual case of delirium so that appropriate treatment can be commenced.

Assessment should be based on a biopsychosocial framework and include a detailed history of the onset and course of the confusion, previous episodes of confusion, sensory deficits, safety issues, alcohol use and social and environmental circumstances. Pre-morbid functional activities of daily living, symptoms of underlying causes and co-morbid illnesses should also be included.

The assessment process should also pay particular attention to the following:

- Mental/cognitive status
- Full physical assessment including history and examination
- Clinical investigations
- Medication review
- Drug and alcohol assessment, with a referral for a Drug and Alcohol consultation if required

Patients over the age of 65 years and Aboriginal and Torres Strait Islanders over aged 45, who are capable of completing a cognitive screen, should have a cognitive assessment including a validated screening tool such as the Mini Mental State Examination (MMSE) or the Abbreviated Mental Test Score (AMTS) (Appendix A) on admission or at pre-admission clinic.

The Rowland Universal Dementia Assessment (RUDAS) may be used for people from culturally and linguistically diverse backgrounds (CALD). Obtaining a baseline score enables monitoring of cognition.

An abnormal result should prompt further evaluation. The Confusion Assessment Method (CAM) is used widely as a screening tool for delirium (Appendix A). It is recommended that the CAM be repeated whenever there is an acute change in the person’s cognitive function during admission.

It is recommended that training is provided for staff required to use cognitive assessment tools.

4.2.3 Diagnosis
The clinical diagnosis of delirium is based on a detailed history, examination and relevant investigations. Establishing previous functional and cognitive status and recent events, such as falls or medication changes, is essential.

Other conditions may mimic delirium and differentiating these requires sound clinical judgement. These conditions include:

- Dementia
- Depression/mania
- Effects of and withdrawal from drugs.
4.2.4 Investigations
The clinical picture should guide investigations. The following investigations may be indicated in patients with delirium in order to identify the underlying cause:
- Full blood count
- Urea and electrolytes
- Liver function tests
- Glucose
- Calcium
- Albumin and protein
- Cardiac enzymes
- MSU
- Chest X-Ray
- ECG
- Bladder scan and/or abdominal X-ray
- Magnesium and phosphorus levels,
- C-reactive protein (CRP)
- Drug toxicity
- Drug and alcohol screen.

Other tests may be considered, including blood gases, thyroid function, B12 and folate, CT brain, VDRL, lumbar puncture and CSF examination and EEG.

4.2.5 Medications
Some medications may decrease cognitive function and worsen confusion, including:
- Drugs with anticholinergic effects
- Anticonvulsants, eg phenytoin, carbamazepine, valproate
- Anti-Parkinson drugs, eg levodopa, rotigotine, pergolide, bromocriptine
- Alcohol
- Antipsychotics
- Opioids
- Benzodiazepines
- Corticosteroids (high dose)
- Cardiovascular medications, eg digoxin, metoprolol, propranolol
- Some anti-bacterials and antivirals, eg aciclovir, trimethoprim with sulfamethoxazole, ciprofloxacin.

5. MANAGEMENT OF DELIRIUM

5.1 Non-Pharmacological Management of Delirium
The confusion associated with delirium can produce behavioural symptoms which may put the patient, staff and others at risk. A behaviour monitoring chart assists in identifying possible triggers of behaviour that places people at risk and can also be a means of identifying strategies that maintain the patient’s comfort and so be useful in planning individualised care. Family members should be encouraged to
stay with patients (as appropriate) to provide reassurance, orientation and emotional comfort.

Information about the person’s history and preferences can be collected on a Person Centred Profile form or a TOP5 form. This information can be used to promote person-centred care and incorporated into their care plan.

Non-pharmacological management of delirium includes optimal management of the following domains, which are based on known precipitating factors. These include:

- **Hydration and nutrition**: oral diet and fluids should be encouraged and fluid balance and food intake charts should be routinely in place.

- **Mobility**: a falls risk assessment should be attended routinely and a mobility assessment conducted when appropriate. Bed and chair alarm devices may be useful for acutely delirious patients. Safe mobility should be encouraged.

- **Bowel and bladder function**: a stool chart and urine output should be monitored and a toileting regime may be included in the care plan. Remove IDC as soon as no longer clinically required.

- **Sleep**: good sleep routines should be promoted, eg. some quiet time without electronic devices or mental stimulation prior to sleep time, ensure room is comfortable temperature and darkened, avoid caffeine prior to sleep time.

- **Sensory input**: ensure that spectacles, dentures and hearing aids are in place if they are usually required.

- **Pain**: pain should be assessed and managed appropriately, a non-verbal pain assessment tool should be used for patients who are unable to communicate well (Appendix B and Appendix C).

- **Promoting cognition**: provide an environment which supports orientation; consider the use of calendars and clocks and lighting appropriate to the time of day and an environment that is not over or under stimulating, encourage family to bring a few familiar objects.

- **Communication**: use clear and simple language, giving one message at a time to assist understanding. Provide visual cues with verbal messages to assist communication eg. show the meal and talk about it being lunchtime.

- **Family/Carers**: discuss patient’s individual likes and dislikes, social history and usual routine, encourage family/carer to stay with patient when possible. Provide delirium brochure to assist family/carer with an understanding of delirium.

- **Emotional well-being**: provide reassurance and support to the patient and family/carer.

### 5.2 Safety

Delirium is a fluctuating condition. Potential risks should be identified and interventions included in the care plan to ensure the safety of the patients, visitors and staff. Risks include falls, removal of necessary medical equipment e.g. IV lines and physical aggression due to delusions or misperceptions. Risks should be re-evaluated on a regular basis.
Do not assume a patient with delirium will remember any instructions; their safety relies on staff observation.

5.3 Pharmacological Management of Behavioural Symptoms of Delirium

Medication may be required if non-pharmacological management strategies have been implemented and the patient is experiencing severe agitation or psychotic symptoms which are causing the patient distress or that constitute a safety risk to the patient or others.

Consultation with a geriatrician or psycho-geriatrician is recommended whenever possible. If a geriatrician or psycho-geriatrician is not available, consultation must be made with a senior medical officer with experience in the management of geriatric syndromes.

The use of psychotropic medications requires informed consent from the patient’s ‘person responsible’.

- Antipsychotic medications may exacerbate the delirium and therefore the minimum effective dose should be used for the shortest possible time.
- These medications should be reviewed daily.
- The oral route of administration is recommended.
- Monitor vital signs after administration of any drug which causes sedation.
- Monitor for adverse effects.
- When an antipsychotic medication is newly prescribed to assist the management of delirium a plan should be developed and documented for a review and cessation of the medication when it is no longer required.

Antipsychotic drugs have a wide range of potentially serious adverse effects, some of which may be irreversible:

- Older people are particularly susceptible to tardive dyskinesia (dose-related) with conventional antipsychotics.
- People with Lewy body dementia frequently suffer severe adverse effects when given antipsychotics.
- Atypical antipsychotics, eg risperidone, olanzapine, aripiprazole and quetiapine, have a lower risk of tardive dyskinesia but sedation and postural hypotension can occur.
- Antipsychotics (particularly olanzapine) may be associated with weight gain and increased risk of type 2 diabetes.
- All antipsychotics have been associated with an increased risk of death compared with placebo in people with dementia; assess risks and benefits. Deaths in studies were largely due to cardiovascular events (especially stroke). The greatest risk was in the first 40 days and with higher doses. (AMH 2013)
5.3 Physical Restraint
It is recognised that restraint is a precipitating factor for delirium and increases morbidity and mortality. Restraints should only be used as a last resort to maintain the safety of the patient, staff or others. Alternative methods of management should be tried whenever possible before consideration of restraint.

It is recommended that all staff members are provided with education about restraint use and the requirements of the SESLHD Restraint Policy PD 111 to ensure restraint is only used in appropriate situations.

5.4 Discharge Planning
Diagnosis of delirium should be noted in the discharge letter along with a request for the GP to provide a follow up cognitive screen. Carers/family should be provided with printed information to assist their understanding of delirium and early future recognition of delirium. (Delirium Brochure Appendix E)

5.5 Education for clinical staff
Delirium education should be provided for all clinical staff on a regular basis. Education regarding cognitive screening should be attended by all clinicians who have this responsibility.

The District Dementia/Delirium CNC is available to support positions who have local responsibility for this education.

6. DOCUMENTATION

- Abbey Pain Scale (Appendix C)
- Abbreviated Mental Test Score (AMTS) order no. SMR060.926 (Appendix A)
- Behaviour Management Log - order no. SMR110.060
- Confusion Assessment Method –(CAM) order no. SMR060.926 (Appendix A)
- Confusion Assessment Method – ICU (CAM-ICU) (Appendix D)
- Delirium Brochure order no. 2HACI08 (Appendix E)
- Delirium Pathway (Appendix F)
- Delirium Risk Assessment Tool order no. SMR060.926 (Appendix A)
- Mini Mental Status Examination (MMSE) - order no. SEI060.310
- Pain Assessment in Advanced Dementia (PAINAD) (Appendix B)
- Person-centred Profile - order no. SES060.159
- Rowland Universal Dementia Assessment (RUDAS) - order no.SM060.925
- TOP 5 Toolkit - Clinical Excellence Commission NSW Health

7. AUDIT
This procedure will be audited annually by the SESLHD CNC Dementia/Delirium using medical records audits.
8. REFERENCES


- Australian Health Ministers Advisory Council 2007 ‘Clinical Practice Guidelines for the Management of Delirium In Older People’

- Australian Medicines Handbook Pty Ltd. (AMH) Aged Care Companion, last modified by AMH: July 2013, Online edition viewed 10/01/2014

- British Geriatrics Society: Delirium, diagnosis, prevention and management. NICE Guidelines

- Delirium in Older People, Australian and New Zealand Society for Geriatric Medicine Position Statement 13, Revised 2012


- Inouye, S, Westendorp RGJ, Saczynski JS 2013, ‘Delirium in elderly people’, thelancet.com Published online August 28, 2013


- NSW Ministry of Health PD2013 049 ‘Recognition and management of patients who are clinically deteriorating’


- SESLHDPR/483 - Restraint use with Adult Patients


## REVISION AND APPROVAL

<table>
<thead>
<tr>
<th>Date</th>
<th>Revision No.</th>
<th>Author and Approval</th>
</tr>
</thead>
<tbody>
<tr>
<td>Jan 2009</td>
<td>0</td>
<td>Colleen McKinnon Area Dementia/Delirium CNC. Approved by Executive Sponsor Elizabeth Koff, Director Clinical Operations and Clinical Council 28 January 2009.</td>
</tr>
<tr>
<td>Jan 2014</td>
<td>1</td>
<td>Janine Masso District CNC Dementia/Delirium (Acute)</td>
</tr>
<tr>
<td>April 2015</td>
<td>2</td>
<td>Converted to procedure and revised by District Policy Officer. Author to continue review as a procedure.</td>
</tr>
<tr>
<td>June 2015</td>
<td>2</td>
<td>Janine Masso - Revised as a Procedure</td>
</tr>
<tr>
<td>July 2015</td>
<td>2</td>
<td>Updates endorsed by Peter Gonski, Executive Sponsor</td>
</tr>
<tr>
<td>August 2015</td>
<td>2</td>
<td>Changes made as requested by SESLHD Drug and Quality Use of Medicines Committee and endorsed by Executive Sponsor – November 2015</td>
</tr>
</tbody>
</table>
### DELIRIUM SCREEN FOR OLDER ADULTS

This form incorporates the Abbreviated Mental Test scores (AMTS), Delirium Risk Assessment Tool (DRAT) and Confusion Assessment Method (CAM).

**Abbreviated Mental Test Score (AMTS)**
Establish baseline cognition by completing the Abbreviated Mental Test OR MMSE for all presentations 65 years + (45+ ATS1). Repeat with any change in cognition behaviour or LOC. Score 1 for each correct answer.

<table>
<thead>
<tr>
<th>QUESTION</th>
<th>Time</th>
<th>Date</th>
</tr>
</thead>
<tbody>
<tr>
<td>1. How old are you?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>2. What is the time (nearest hour)?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>3. What year is it?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>4. What is the name of this place?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>5. Can the patient recognize two relevant persons? (eg. nurse / doctor or relative)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>6. What is your date of birth?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>7. When did the second World War start? (1939)</td>
<td></td>
<td></td>
</tr>
<tr>
<td>8. Who is the current Prime Minister?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>9. Count down backwards from 20 to 1</td>
<td></td>
<td></td>
</tr>
<tr>
<td>10. Can you remember the address I gave you?</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**TOTAL SCORE**

Signature

- A score of 7 or less indicates cognitive impairment
- All patients require a Delirium Risk Assessment using DRAT (see over page)

Does the person have a history of any recent / sudden change in behaviour, cognition, loss of consciousness or functional abilities (including falls)?

- [ ] Yes - Please do CAM
- [ ] No - Please do DRAT

Signature: __________________________ Date: ____________

Print full name: ____________________ Designation: ____________

---

COMPLIANCE WITH THIS DOCUMENT IS MANDATORY

This Procedure is intellectual property of South Eastern Sydney Local Health District. Procedure content cannot be duplicated.
DELIURIM SCREEN FOR OLDER ADULTS

Delirium Risk Assessment Tool (DRAT)

Assessment to be completed on admission, pre & post op, and when there is a change in behaviour.

Pre morbid RISK factors
Tick & add score

- ≥ 70 yrs
- PLUS
- Visual impairment (unable to read large print on newspaper with glasses)
- Severe illness (nurses’ opinion including mental illness / depression)
- Cognitive impairment AMTS < 7/10 or MMSE < 25/30 or past history of memory or cognitive deficit
- Dehydration (scanty, concentrated urine, fever, thirst, dry mucous membranes or raised creatinine/urea)

WARNING: these factors increase risk

- Mechanical restraint
- Malnutrition
- 3 new medications added in 24hrs
- IDC
- Iatrogenic event (procedure, infection complications, falls etc)

If your patient is ≥ 70 yrs and has at least one of the above risk factors = RISK OF DELIRIUM

IF CHANGE IN BEHAVIOUR – RECOMMENDED INVESTIGATIONS

- CAM
- Medical review
- History (incl. family)
- Physical exam
- Medication review
- Bloods
- MSU

CONFUSION ASSESSMENT METHOD (CAM)
The CAM is a validated tool to be used in assisting with the differential diagnosis of delirium. It should be used for any older person who appears to be disoriented / confused or who has any change in behaviour or LOC. It is important that the CAM is used in conjunction with a formal cognitive assessment (e.g. AMTS/MMSE), good clinical and medical assessment, together with baseline cognition information from carers/family or the community or residential aged care service.

1. Acute onset and fluctuating course
   - No
   - Yes
   - Uncertain, Specify:

2. Inattention
   - No
   - Yes
   - Uncertain, Specify:

3. Disorganised thinking
   - No
   - Yes
   - Uncertain, Specify:

4. Altered level of consciousness
   - No
   - Yes
   - Uncertain, Specify:

Delirium is present if features 1 and 2 AND either 3 or 4 are present.

Delirium symptoms: □ not present □ present

Date: / / 

Medical Officer notified? □ Yes □ No

Signature: ________________

Date: ________________

Designation: ________________

Page 2 of 2
Appendix B:

Pain Assessment in Advanced Dementia (PAINAD)

<table>
<thead>
<tr>
<th></th>
<th>0</th>
<th>1</th>
<th>2</th>
<th>Score</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Breathing, independent of vocalisation</strong></td>
<td>Normal</td>
<td>Occasional laboured breathing</td>
<td>Noisy laboured breathing</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Short period of hyperventilation</td>
<td>Long Period of hyperventilation</td>
<td></td>
</tr>
<tr>
<td><strong>Negative vocalisation</strong></td>
<td>None</td>
<td>Occasional moan or groan</td>
<td>Repeated troubled calling out</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Low-level speech with a negative or disapproving quality</td>
<td>Loud moaning or groaning</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Crying</td>
<td></td>
</tr>
<tr>
<td><strong>Facial expression</strong></td>
<td>Smiling, or inexpressive</td>
<td>Sad</td>
<td>Facial Grimacing</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Frightened</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Frown</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Body language</strong></td>
<td>Relaxed</td>
<td>Tense</td>
<td>Rigid</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Distressed</td>
<td>Fists clenched</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Pacing</td>
<td>Knees pulled up</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td>Fidgeting</td>
<td>Pulling or pushing away</td>
<td></td>
</tr>
<tr>
<td></td>
<td></td>
<td></td>
<td>Striking out</td>
<td></td>
</tr>
<tr>
<td><strong>Consolability</strong></td>
<td>No need to console</td>
<td>Distracted or reassured by voice or touch</td>
<td>Unable to console, distress or reassure</td>
<td></td>
</tr>
</tbody>
</table>

PAINAD Item Descriptions

Breathing
- **Normal breathing** is characterised by effortless, quiet, rhythmic (smooth) respirations.
- **Occasional laboured breathing** is characterised by episodic bursts of harsh, difficult or wearing respirations.
- **Short period of hyperventilation** is characterised by intervals of rapid, deep breaths lasting a short period of time.
- **Noisy laboured breathing** is characterised by negative sounding respirations on inspiration or expiration. They may be loud, gurgling, wheezing. They appear strenuous or wearing.
- **Long period of hyperventilation** is characterised by an excessive rate and depth of respirations lasting a considerable time.

Negative Vocalisation
- **None**: speech or vocalisation has a neutral or pleasant quality
- **Occasional moan or groan**: mournful or murmuring sounds, wails or laments. Groaning is characterised by louder than usual inarticulate involuntary sounds, often beginning and ending abruptly.
- **Low level speech with a negative or disapproving quality**: muttering, mumbling, whining, grumbling or swearing in a low volume with a complaining, sarcastic or caustic tone.
- **Repeated troubled calling out**: phrases or words being used over and over in a tone that suggests anxiety, uneasiness or distress.
- **Loud moaning**: mournful or murmuring sounds, wails or laments in much louder than usual volume.
- **Loud groaning**: louder than usual inarticulate involuntary sounds, often beginning or ending abruptly.
- **Crying**: utterance of emotion accompanied by tears. There may be sobbing or quiet weeping.

Facial Expression
- **Smiling or inexpressive**: Smiling is characterised by upturned corners of the mouth, brightening of the eyes and a look of pleasure or contentment. Inexpressive refers to a neutral, at ease, relaxed or blank look.
- **Sad** is characterised by an unhappy, lonesome, sorrowful, or dejected look. There may be tears in the eyes.
- **Frightened** is characterised by a look of fear, alarm or heightened anxiety. Eyes appear wide open.
- **Frown** is characterised by a downward turn of the corners of the mouth. Increased facial wrinkling in the forehead and around the mouth may appear.
- **Facial grimacing** is characterised by a distorted, distressed look. The brow is more wrinkled as is the area around the mouth. Eyes may be squeezed shut.

Body Language
- **Relaxed** is characterised by a calm, restful, mellow appearance. The person seems to be taking it easy.
- **Tense** is characterised by a strained, apprehensive or worried appearance. The jaw may be clenching (exclude any contractures).
- **Distressed pacing** is characterised by activity that seems unsettled. There may be a fearful, worried or disturbed element present. The rate may be faster or slower.
- **Fidgeting** is characterised by restless movement. Squirming about or wiggling in the chair may occur. The person might be hitching a chair across the room. Repetitive touching, tugging or rubbing body parts can also be observed.
- **Rigid** is characterised by stiffening of the body. The arms and/or legs are tight and inflexible. The trunk may appear straight and unyielding (exclude any contractures).
- **Fists clenched** is characterised by tightly closed hands. They may be opened and closed repeatedly or held tightly shut.
- **Knees pulled up** is characterised by flexing the legs and drawing the knees up toward the chest. An overall troubled appearance (exclude any contractures).
- **Pulling or pushing away** is characterised by resistiveness upon approach or to care. The person is trying to escape by yanking or wrenching him or herself free or shoving you away.
- **Striking out** is characterised by hitting, kicking, grabbing, punching, biting or other form of personal assault.

Consolability
- **No need to console** is characterised by a sense of well being. The person appears content.
- **Distracted or reassured by voice or touch** is characterised by a disruption in the behaviour when the person is spoken to or touched. The behaviour stops during the period of interaction with no indication that the person is at all distressed.
- **Unable to console, distract or reassure** is characterised by the inability to soothe the person or stop behaviour with words or actions. No amount of comforting, verbal or physical will alleviate the behaviour.
Appendix C: Abbey Pain Scale

For measurement of pain in people with dementia who cannot verbalise pain.

How to use scale: While observing the patient score questions 1 to 6.
Document when last pain relief was given and score in progress notes.

<table>
<thead>
<tr>
<th>Question</th>
<th>Description</th>
<th>Score</th>
</tr>
</thead>
<tbody>
<tr>
<td>Q1</td>
<td>Vocalisation eg whimpering, groaning, crying</td>
<td>Absent = 0</td>
</tr>
<tr>
<td>Q2</td>
<td>Facial expression eg looking tense, frowning, grimacing, looking frightened</td>
<td>Absent = 0</td>
</tr>
<tr>
<td>Q3</td>
<td>Change in body language eg fidgeting, rocking, guarding part of body, withdrawn</td>
<td>Absent = 0</td>
</tr>
<tr>
<td>Q4</td>
<td>Behavioural Change eg increased confusion, refusing to eat, alteration in usual patterns</td>
<td>Absent = 0</td>
</tr>
<tr>
<td>Q5</td>
<td>Physiological change eg temperature, pulse or blood pressure outside normal limits, perspiring, flushing or pallor</td>
<td>Absent = 0</td>
</tr>
<tr>
<td>Q6</td>
<td>Physical changes eg skin tears, pressure areas, arthritis, contractures, previous injuries</td>
<td>Absent = 0</td>
</tr>
</tbody>
</table>

Add scores for 1 - 6 and record here.

<table>
<thead>
<tr>
<th>Pain Score</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>0-2</td>
<td>No pain</td>
</tr>
<tr>
<td>3-7</td>
<td>Mild</td>
</tr>
<tr>
<td>8-13</td>
<td>Moderate</td>
</tr>
<tr>
<td>14+</td>
<td>Severe</td>
</tr>
</tbody>
</table>

Now tick the box which matches the type of pain

- Acute
- Chronic
- Acute on Chronic

Abbey, J; De Bellis, A; Piller, N; Esterman, A; Giles, L; Parker, D and Lowcay, B. Funded by the JH & JD Gunn Medical Research Foundation 1998 – 2002

This document may be reproduced with this acknowledgment retained.
Appendix D

The Confusion Assessment Method for the Intensive Care Unit (CAM-ICU)
Worksheet

<table>
<thead>
<tr>
<th>Feature 1: Acute onset or fluctuating course</th>
<th>Score</th>
<th>Check here if present</th>
</tr>
</thead>
<tbody>
<tr>
<td>Is the patient different than his/her baseline mental status? OR Has the patient had any fluctuation in mental status in the past 24 hours as evidenced by fluctuation on a sedation scale (i.e., RASS), GCS, or previous delirium assessment?</td>
<td>Either question Yes →</td>
<td>□</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Feature 2: Inattention</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Letters Attention Test (See training manual for alternate Pictures)</td>
<td>Number of Errors &gt;2</td>
<td>□</td>
</tr>
<tr>
<td>Directions: Say to the patient,  “I am going to read you a series of 10 letters. Whenever you hear the letter “A”, indicate by squeezing my hand.” Read letters from the following letter list in a normal tone 3 seconds apart. S A V E A H A R T</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Errors are counted when patient fails to squeeze on the letter “A” and when the patient squeezes on any letter other than “A.”</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Feature 3: Altered Level of Consciousness</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Present if the Actual RASS score is anything other than alert and calm (zero)</td>
<td>RASS anything other than zero →</td>
<td>□</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Feature 4: Disorganised Thinking</th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Yes/No Questions (See training manual for alternate set of questions)</td>
<td>Combined number of errors &gt;1</td>
<td>□</td>
</tr>
<tr>
<td>1. Will a stone float on water? 2. Are there fish in the sea? 3. Does one pound weigh more than two pounds? 4. Can you use a hammer to pound a nail?</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Errors are counted when the patient incorrectly answers a question. Command Say to patient: “Hold up this many fingers” (Hold 2 fingers in front of patient) “Now do the same thing with the other hand” (Do not repeat number of fingers) “If pt is unable to move both arms, for 2nd part of command ask patient to “Add one more finger”</td>
<td></td>
<td></td>
</tr>
<tr>
<td>An error is counted if patient is unable to complete the entire command.</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Overall CAM-ICU</th>
<th>Criteria met</th>
<th>CAM-ICU Positive Delirium present</th>
</tr>
</thead>
<tbody>
<tr>
<td>Feature 1 plus 2 and either 3 or 4 = CAM-ICU positive</td>
<td>CAM-ICU negative No delirium</td>
<td></td>
</tr>
</tbody>
</table>

Copyright © 2002, E. Wesley Ely, MD, MPH and Vanderbilt University, all rights reserved.

Author’s permission not required for clinical use when copyright statement is included. http://www.icudelirium.org/delirium/monitoring.html viewed 20/01/14
Appendix E

**DELIUM**

**How can you help care for someone with delirium?**

It is essential for people with delirium to be treated and supported. 

- **Speak loudly and clearly**
- **Be clear about your instructions**
- **Encourage and assist**
- **Provide a comfortable and safe environment**
- **Monitor and manage**
- **Simplify and streamline**
- **Make use of aids**
- **Use alternative methods**

If you have any concerns or questions about delirium, talk to your local doctor or ask your hospital staff.

**CONTACTS**

- **RIS/Neuron Careline**
  - 1800 724 632
  - My aged care information line 1800 500 853
  - www.myagedcare.gov.au

- **National Dementia Helpline**
  - 1800 700 500

- **CARE Australia**
  - www.careaustralia.com.au

- **Alzheimer's Australia**
  - www.alzheimers.org.au

**NSW Agency for Clinical Innovation**

Care of confused hospitalized older persons: program www.health.nsw.gov.au

**Delirium**

Delirium is a common medical problem that is characterized by changes in mental function and occurs more often among older people. When delirium occurs, people are confused and may be agitated, agitated or quiet and disoriented.

The onset of delirium is always sudden. It usually only lasts for a few days but may persist for longer periods. It can be a serious condition.

This brochure provides information for people who have experienced delirium and for their family members.

**Who is at risk of developing delirium?**

- People who are elderly
- Have dementia
- Are 80 years of age or more
- Suffer from depression
- Have poor eyesight
- Are taking multiple medications
- Are having a surgical procedure or heart or hip surgery

**What are the symptoms of delirium?**

People with delirium may:
- Appear confused and forgetful
- Be unable to pay attention
- Be different from their normal selves
- Be either very agitated or quiet and withdrawn or sleepy
- Be unable to remember things or events
- Have changes in their sleeping patterns
- Feel afraid, irritable, angry or sad
- Use things that are not theirs, but that seem very real to them
- Lose control of their bladder or bowels

**How common is delirium?**

About one-fifth of older people admitted to hospital, and close to half of the residents in aged care facilities will experience delirium at some stage of their care.

**What causes delirium?**

Common causes of delirium in older people include:

- Infection (including urinary tract infection)
- Injuries (in males or females)
- Multiple physical illnesses
- Medications
- Drug-related conditions
- Sensory loss
- Medications, including over-the-counter medications
- Heavy alcohol consumption
- Nutritional deficiencies or malnutrition, particularly protein deficiency

**How does delirium start?**

This can happen very quickly, usually over hours or days. A person's behavior can also fluctuate during the course of a single day. Delirium is characterized by an interaction of delirium and behavioral changes.

**How long does delirium last?**

Delirium usually only lasts for a few days but sometimes it will continue for weeks or even months. If delirium is not identified quickly, it can lead to serious complications such as falls, pressure ulcers, longer lengths of stay in hospital, and even death.

**Will delirium recur?**

People who have experienced delirium do have a higher risk of experiencing delirium again.

**How is delirium treated?**

Delirium is generally associated with an underlying physical illness, however, it is not always possible to identify the cause. Staff will do a thorough medical assessment to look for and treat the underlying cause of the delirium. Treatment also includes reducing the risk of complications and helping symptoms.

**Role of family carers**

- Family members can provide valuable information to the staff caring for the person with delirium.
- It is important to notify staff of any sudden changes in a person's mental or physical condition.

This Procedure is intellectual property of South Eastern Sydney Local Health District. Procedure content cannot be duplicated.
Appendix F

Dementia Management Pathway

On presentation to hospital and at pre-admission – Complete a cognitive assessment for all people who meet **any** of the following criteria:

- aged over 65 years
- have known cognitive impairment
- have severe illness
- a hip fracture
- concerns about cognition raised by others

In ED - AMTS & CAM
And obtain cognitive history

**Positive CAM Delirium Screen In ED**
Urgent medical assessment
Medication review
Alert added to eMR
Include delirium risk in every clinical handover
Non-pharmacological management plan documented & implemented
**Family/carer to assist if able**
Refer to local protocols for management of delirium

CAM +ve

**Positive CAM Delirium Screen In Ward**
Delirium monitored – repeat AMTS & CAM
**Investigate cause of delirium**
Medication review
Information from family to support management
Family education/delirium - verbal & brochure
Consider patient’s environment
Behaviour monitoring log
Refer to local protocols for management of delirium

**Discharge planning**
Education for carer/family to monitor for future episodes of delirium
Ensure delirium is noted in GP D/C Summary
Ask GP to consider referral for cognitive assessment 3/12 after discharge

**Positive Risk**
Risk documented in medical record
**Risk** Included in handover
Preventative strategies implemented on admission
Monitored for delirium during admission
Alert added to eMR

**Positive Risk Ward responsibilities**
Risk identified at each clinical handover
Follow local delirium protocols
Preventative strategies implemented
Continue to monitor for delirium
Watch for change in behaviour – if noted repeat AMTS & CAM

-ve Delirium Risk Screen

In Pre admission Clinics AMTS & DRAT

Risk screen +ve