

Long-Term Care Survey Alert

Resident Assessment: Have Trouble Detecting Early Signs Of Dehydration?

These inside clinical tips will help.

To detect early dehydration in nursing home residents, nurses have to throw out the old rules and use ones that apply specifically to the frail elderly.

The true clinical signs of dehydration that nurses are taught to monitor do not develop until the dehydration is quite advanced, cautions **Cil Bullard**, a nursing consultant with **Monnette LTC Services** in Smithfield, VA. These include dry mucous membranes, cracked lips, severely decreased urine output and marked thirst.

In assessing elderly nursing home residents for dehydration, the typical skin pinch test to check skin turgor isnt reliable due to age-related changes to the skin, cautions **Janet Mentes**, a geriatric nurse practitioner and assistant professor at the **University of California School of Nursing at Los Angeles**.

Yet if a nurse familiar with the particular residents daily typical skin turgor detects a decrease in skin turgor, thats clinically valid, Bullard adds.

Here are some good parameters for detecting dehydration in the elderly:

Urine color. For continent residents, a darker urine color can give you a heads up that someone is heading into fluid deficit. Mentes has done a couple of studies with a urine color chart which can be useful in assessing older people with normal renal function indicators (serum creatinine ≤ 1.2 mg/dl). Theres a strong correlation between urine color and specific gravity, Mentes notes. **Tip:** Strong urine odor suggests hydration problems, which could clue surveyors into care deficit in a facility, cautions nursing consultant **Kurt Haas**, president of **Kurt P. Haas & Associates** and former chief of Ohios state survey bureau.

Oral assessment. Check the elderly residents oral mucous membranes to see if they are pale and dry, which indicates dehydration. Also check the amount of saliva and whether the tongue is furrowed, Mentes suggests. **Tip:** Dont do this assessment first thing in the morning as the resident may be a mouth breather and the mouth will be dry. Also, some medications can dry the mucous membranes, including those with anticholinergic effects (Benadryl, some antidepressants, etc.).

Urinary tract infections. It is very common for dehydration and UTIs to occur together, Bullard cautions. So if you detect one, then look for the other. Constipation may signal that the resident could use a higher fluid intake.

Also look for dehydration in residents who become confused, dizzy, develop a low-grade fever and/or show an unexplained decline in self-care ability, Bullard suggests.

How effective are fluid intake records? When accurate, the I&O sheet is one of the best ways to determine someone is developing a fluid imbalance, Mentes says. People take most of their fluids at mealtimes, so if you can teach CNAs to do a good estimate at each meal, then you can identify residents who have changed their intake, Mentes notes. **Tip:** Even if I&O sheets arent that accurate, most CNAs who work with the same residents usually know that a resident isnt drinking/eating like he normally does.

Flag Residents at Risk for Dehydration

Identify residents at risk for dehydration so staff can monitor them more closely. For example, some residents with dementia who drink OK when they are well may quit drinking when they have a cold or when their fluid intake requirements increase in hot weather. And if staff don't stay on top of that, the resident will become dehydrated, Mentes cautions.

One of the major red flags for risk of dehydration is previous dehydration, Mentis says. So if you know a resident newly admitted to the facility has had dehydration before, monitor the person more closely than usual and ensure they drink adequate fluids.

In addition, certain medications predispose the resident to fluid imbalance. Diuretics and laxatives top the list, but certain antibiotics can cause diarrhea, which depletes fluid and electrolytes, says **Thomas Clark**, spokesman for the **American Society for Consultant Pharmacists**. Digoxin can cause anorexia or nausea, which will cause someone to eat/drink less.

Chlorpropamide (Diabinese), which inhibits anti-diuretic hormone, can cause dehydration but it's on the [government's] list of drugs that should be avoided, if possible, in nursing home residents, Clark adds.

Tips: Use a color-coding system to identify residents at the highest risk of dehydration, suggests Bullard. Approaches she's seen work include placing a blue napkin on trays of residents at risk for dehydration or a blue dot on the MAR. One facility places plants in rooms of at-risk residents with a placard that reads: Please water me so I may remain healthy and beautiful.