

Dehydration Risk Awareness Tool (RAT)

Presented by:
The Virginia Department of Behavioral Health and
Developmental Services
The Office of Integrated Health
Health Supports Network

Who benefits from this training

DSP's and caregivers- you will learn important risk factors associated with dehydration, learn to recognize signs and symptoms, and how to report and document.

Support Coordinators-you will learn important risk factors associated with dehydration, understand the signs and symptoms that DSP's and caregivers are going to recognize and provide in documentation, and learn diagnosis that may be associated with risk factors.

Objectives



- 1. Define dehydration.
- 2. State (4) signs and symptoms of dehydration.
- 3. Identify (3) causes of dehydration
- 4. State (3) risk factors for dehydration.
- 5. List one diagnostic test used by physicians to determine dehydration.
- 6. Identify (2) interventions used to correct dehydration.
- 7. List (2) complications caused by unidentified dehydration.
- 8. State (2) interventions to prevent dehydration.

Terms & Definitions

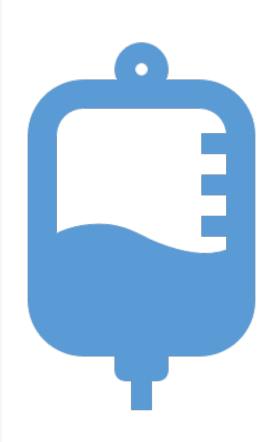
Electrolytes-are minerals in the body that have an electric

charge. They have many important jobs, including helping to

keep a balance of fluids in the body.

Hyponatremia - is a low sodium concentration in the blood.

UTI- refers to a urinary tract infection.



What is Dehydration?

Dehydration is condition caused by the loss of too much fluid from the body. It happens when loss of fluids is greater than fluids that are taken in, and the body does not have enough fluids to work properly.

There are 2 types of dehydration; water loss dehydration (hyperosmolar, due either to increased sodium or glucose) and salt and water loss dehydration (hyponatremia)(Rolands, 2019).

Signs and Symptoms

- Feeling thirsty
- •Dry mouth, tongue or skin
- Poor skin turgor
- Muscle cramps
- Constipation
- Headache
- Tiredness or lethargy
- Irritability
- Decreased urine output or dark, concentrated urine
- Dizziness or fainting
- Sweating less than usual
- Rapid heartbeat or breathing
- Confusion or disorientation
- Low blood pressure (orthostatic hypotension)

URINE COLOR

Very Good

Good

Fair

Light Dehydrated

Dehydrated

Very Dehydrated

Severe Dehydrated

Causes of Dehydration

- Diarrhea
- Vomiting
- Sweating too much
- Fever
- Not drinking enough
- Urinating too much (Can be caused by certain medications and illnesses)



Diagnosis & Treatment

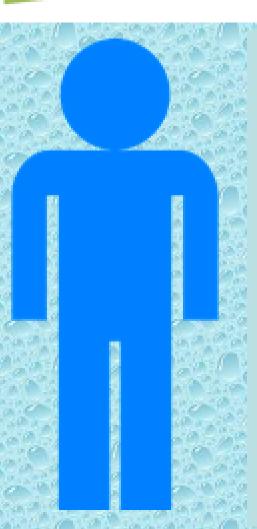
Diagnosis requires an evaluation of the Individual and laboratory testing, clinical assessment, and knowledge of the Individual's medical history (Rolands, 2019).

How to treat...

- Encourage to drink water or other hydrating beverages.
- IV (intravenous) fluids should begin as soon as possible in a hospital or emergency care setting. IV fluids are usually a saline solution, made of water, sodium, and other electrolytes. By receiving fluids through an IV rather than by drinking them, the body can absorb them more quickly and recover faster (Thomas, et al., 2008).

Treating severe dehydration usually requires more than providing water or other beverages.

Water & Proper Hydration



Why Drink Water?

- ➤Removes toxins
- ➤ Raises energy level
- ➤Helps you lose weight
- ➤ Promotes healthy skin
- ➤Helps digestion
- ➤Can help prevent constipation
- ➤Building block of new cells
- ➤ Helps maintain body temperature
- Acts as a shock absorber
- ➤ Main ingredient in saliva
- ➤Keeps joints lubricated

(Peckenpaugh, 2010, Healthline, 2019)

Importance of reporting change

Many individuals with intellectual are at risk for dehydration due to being unable to verbalize thirst, being immobile and unable to get a drink when desired and being reliant on others to provide hydration. According to a literature study completed in , the prevalence of dehydration ranged from 44%-75% for people suffering with difficulty swallowing (dysphagia) (Reber et al, 2019).

Although thickening liquids may address the dysphagia issue, thickening agents decrease desire for drinking due to texture and coating in mouth. Individuals with orders for thickened liquids should be monitored to ensure they are receiving adequate hydration (Reber et al., 2019)

Any changes or recognition that an individual has signs and symptoms on dehydration should be reported immediately. The individual should be taken to their PCP or an Urgent Care if issue is found on a weekend. Document your findings in daily note and who it was reported to.



DSP's connect the dots....



Situation:

Sam is attending summer camp. The weather has been wonderful, 80 degrees all week. Sam is so excited that he doesn't like to stop and eat or drink. Sam refuses to wear his hat while participating in the activities. In the afternoon Sam verbalizes that he feels funny. Sam's breathing becomes more rapid and he stops participating. Sam verbalizes he is thirsty and is offered water. Staff notifies the camp nurse.

Example only: follow your agency documentation standards.

Example of a daily note:

04/13/20 Sam attended summer camp today. Staff encouraged Sam to wear a hat due to the weather, but he refused. Staff encouraged Sam to drink water throughout the day, but Sam refused. Sam ate only 25% of his lunch. At 1:30pm that he felt funny and staff observed him sitting and not participating in the group activities. Staff observed Sam breathing fast. Sam reported he was thirsty and was given water. Staff reported observations to camp nurse.

Way to go DSP, you recognized a change!

DSP's connect the dots....

Use the RAT tool to help staff be aware of risks and also prompt changes that need to occue with plans and support instructions. The RAT can help providers be proactive.

If the person does not meet criteria in A (above), consider if these common indicators for **dehydration** occurred in the past year. (Check all that apply.)

Refuses to drink water
Requires assistance to be fed (food or liquid)
Has experienced diarrhea
Has experienced unexplained weight loss
Has experienced dry mouth
Has experienced strong smelling or darkened urine
Is prescribed laxatives or enemas (daily or PRN / prescription or OTC)
Has experienced vomiting
Is prescribed routine diuretic medication

You are the boots on the ground! Based on your daily observations you may recognize a change in statue that would require evaluation. If you notice any of the risk factors listed below for dehydration, report and document it quickly.

Case Study

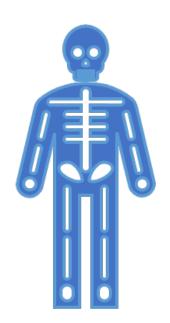
Jane lives in a group home with three other individuals. She enjoys going out into the community and loves to eat out. Jane is diagnosed with moderate intellectual disability, Seizures, and Paranoid Schizophrenia. Jane also has frequent urinary tract infections due to becoming dehydration. Jane's urologist has ordered that she consume at least 2000ml daily to help produce frequent urination. This requires staff to prompt and encourage throughout the day. Although Jane likes to be social, sometimes the paranoia keeps her from participating fully in activities. She has auditory hallucinations which make her fearful of others.

Jane becomes fearful of food and drink at times. Fearing that staff have not washed their hands when preparing, she will refuse to eat or drink. Jane likes food that is individually wrapped. If she finds spots on the utensils at mealtimes she will refuse to eat or drink. Jane enjoys drinking tea and coffee; however caffeine increases her seizure activity.

Apply what you learned

State (3) ways you could help Jane meet or exceed her daily recommendation for fluid intake and help her avoid becoming dehydrated.

- 1.
- 2.
- 3._____





Connect the dots with the RAT Tool...

SC's- as you are completing the RAT tool keep in mind there are key diagnoses and situations you need to incorporate in discussion with providers and caregivers to ensure risk factors are being recognized.

Individuals who have fluid restrictions (Polydipsia).

Individual's that receive their nutrition and fluids through a gastrostomy tube.

Individuals who are unable to control their body temperature.

Individuals with behaviors that have decrease access to water.

RAT TOOL

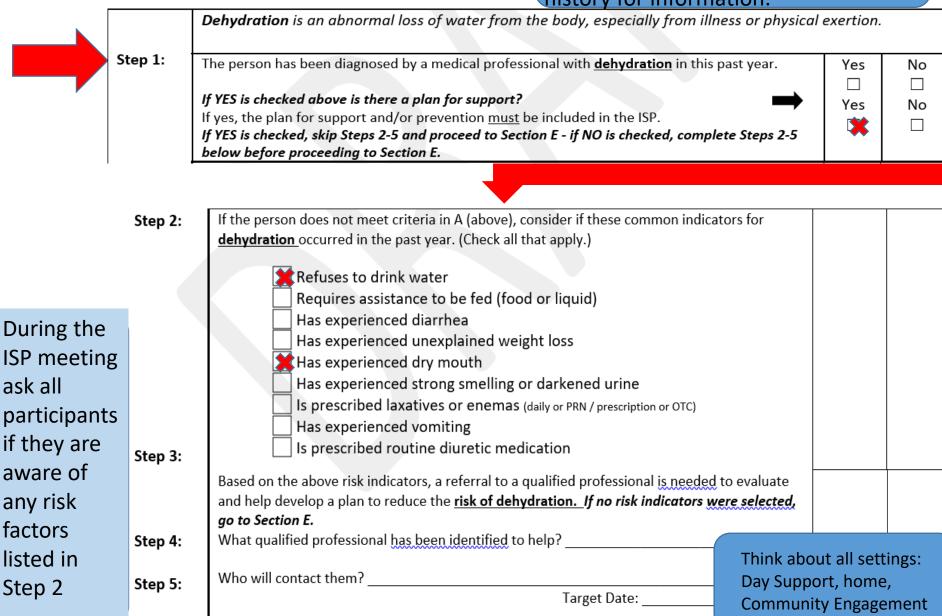
Individuals who do not sweat or sweat excessively.

Older Individuals that have lost their thirst perception.

Individual's with
Dementia who forget to
drink fluids.

Individuals who receive thickened liquids or refuse to drink liquids.

Prior to ISP meeting, review discharge summaries, medical reports, and health history for information.



Dehydration continued...

WHO CAN HELP?



There are a number of healthcare professionals that can provide guidance toward reducing risk and possible adverse events. The PCP is the gate keeper to accessing other healthcare professionals.

Healthcare professionals that can assess, diagnose and prescribe treatment include but are not limited to:

- Primary Care Practitioner (PCP)
- Urologist
- Dietician/Nutritionist



References

- Chadwick, D., Jolliffe, J., & Goldbart, J. (2003). Evidence based practice: A challenge for speech and language therapists. Caregiver knowledge and barriers to their compliance with dysphagia management strategies. Proceedings of the 5th European PLOL Congress. Edinburgh, UK. Retrieved from file:///C:/Users/dbk75942/Downloads/Dysphagiamanagementforadultswithlear ning disabilities- Fullpaperfor5thEuropeanCPLOLCongress2003.pdf
- Healthline. (2019). What you need to know about dehydration. Retrieved from https://www.healthline.com/health/dehydration
- Healthline. (2019). What is the average (and ideal) percentage of water in your body? Retrieved from: https://www.healthline.com/health/body-water-percentage#body-water-storage
- Kunst, K., & University of North Carolina. (March, 2020). The Fatal Four in IDD: Dehydration Signs and Risk Factors. Retrieved from https://www.relias.com/blog/the-fatal-four-how-dangerous-is-dehydration

References

- Mayo Clinic. (2016). Dehydration can lead to serious complications. Retrieved from https://newsnetwork.mayoclinic.org/discussion/dehydration-can-lead-to-serious-complications/
- Mayo Clinic. (2019). *Dehydration: Signs and symptoms*. Retrieved from https://www.mayoclinic.org/diseases-conditions/dehydration/symptoms-causes/syc-20354086
- Medline Plus. (2019). Dehydration. Retrieved from https://medlineplus.gov/dehydration.html
- Reber, E., Gomes, F., Dahn, I., Vasiloglou, M., & Stanga, Z. (2019). Management of dehydration in persons suffering swallowing difficulties. *J Clin Med 8*(11), 1923. doi: 10.3390/jcm8111923.
- Rolands, J. (2019, November). Severe Dehydration: Symptoms, Causes & Treatment. Retrieved from https://www.healthline.com/health/severe-dehydration
- Thomas, D. R., Cote, T. R., Lawhorne, L., Levenson, S. A., Rubenstein, L. Z., Smith, D. A., ... Morley, J. E. (2008). Understanding Clinical Dehydration and Its Treatment. *Journal of the American Medical Directors Association*, *9*(5), 292–301. doi: 10.1016/j.jamda.2008.03.006
- Peckenpaugh, N. (2010). Nutrition Essentials and Diet Therapy. Saunders, St. Louis, Mossouri.