

My patient is a 61-year-old female who is a full code and lives at home with her husband. She is on standard precautions and is allergic to hydralazine. She attended a doctor's appointment when the doctor sent her to the hospital due to her abnormal lab values: **Hgb, BUN**. She is in the hospital with a diagnosis of AKI and anemia with a history of AKI, TIA, anemia, HTN, and DM. She was admitted on January 23rd and is experiencing some anxiety and sadness. She recently had a procedure with nephrovascular who placed a **INSERT HERE**. In addition, she is now receiving hemodialysis in attempts to help her kidney function. She is on a renal diet as well as a 1200mL daily fluid restriction.

The article titled "Acute kidney injury: A nursing challenge" explains how kidney injuries affect the day-to-day life and the importance of prevention and maintenance. The renal system comprises the ureters and urethra which filter urine and excrete waste products. Risk factors and comorbidities can make someone more susceptible to AKI, for example, an older adult with sepsis. There are many causes of AKI, but hypotension, hypovolemia, high BUN/creatinine, and reduced perfusion are a few of the main reasons. AKI doesn't usually have immediate signs as it occurs later due to downstream effects such as fluid overload. There are three stages, stage one with a serum creatinine of 1.5-1.9 times baseline, stage two where serum creatinine is 2.0 to 2.9 times baseline, and stage three where serum creatinine is 3.0 times baseline. Renal dose adjustment is based on the severity of the diagnosis. Hemodynamic support may be used and may include IV fluids. Nephrotoxic drugs play a role in 20% to 30 % of AKI cases. It is important to monitor for hyperglycemia as it is an anxiety response. AKI is common in hospitalized patients, especially those who are critically ill. Nurses play a role in applying skills to best screen, manage, and prevent AKI.

Informatics used in the clinical setting play a key role in documenting and collecting data. Without our electronic documentation, it would be very difficult to organize and maintain documentation. Electronic documentation also allows us to easily refer to past patients and any concerns that may arise pertaining them. This also comes to play when surveyors are auditing units and ensuring things are documented correctly and that the care pertained to and was necessary for their treatment.

Using technology in the healthcare field ensure that the patients are receiving quality care with the best equipment. For instance, it is very easy to use IV pumps and initiating an IV pump medication only takes a few minutes. The EHR allows me to research any pertinent information I may need to know about my patient with only a few clicks and all the information is in one spot. Some barriers I have noticed with healthcare technology is when the computers are down it makes things incredibly difficult very fast, and that quick access is not always as attainable.

I created a culture of safety for my patient by sticking with her through a procedure and the start of her dialysis. In addition, I talked to her about her life and created a positive environment and I could tell she felt safe with me given her responses and body language. Finally, I ensured she had her lunch tray ordered and asked her if she needed anything before I left for the day, letting her know that I'd be back in the morning.

Resources:

Lim F, Li A. Acute kidney injury: A nursing challenge. *American Nurse Journal*. 2023;18(6):06-12. doi:10.51256/anj062306
<https://www.myamericannurse.com/acute-kidney-injury-challenge/>