Avoiding IV Complications

Problem
The majority of patients admitted to the hospital will likely require some type of intravenous access. Peripheral IV insertion and management is an important part of nursing education and training. The nurse must also be knowledgeable regarding the indications for IV therapy and the possible complications that can result from IV insertions.

Consequence
Failure to correctly insert and maintain a peripheral IV significantly increases the risk of infection and other complications.

Solution
Here are some suggestions on what to watch for and how to avoid IV problems.

- To minimize complications, aseptic techniques should be practiced when inserting an IV; some facilities require the use of sterile techniques for IV insertion.
- The first step in an IV insertion is proper hand washing.
- Be conscientious about using clean and sterile supplies.
- The IV insertion site should be scrubbed thoroughly with the appropriate antiseptic solution, such as alcohol, chlorohexidene, or betadine solution.
- The IV catheter that is inserted must be sterile; therefore, the cap should not be removed until just prior to insertion to prevent contamination of the catheter.
- After the IV is safely and appropriately inserted, the site should be covered with a sterile adhesive dressing.
- If tape is used to secure the IV line, it is especially important to ensure that the tape is clean, and not from a roll that has been picked up from the patient’s bed.
- Using tape or dressings that are not clean can greatly increase the risk of infection, both local and systemic; systemic infections are more serious and can be life threatening.
• Monitor the IV site for complications such as infection, infiltration, extravasation, phlebitis and clotting.

• The IV site should be flushed routinely, and observed closely; without regular flushes, the catheter may occlude.

• Infection can occur if aseptic technique is not followed during insertion, dressing changes or if the site is used for an extended period of time.

• Be familiar and follow institution-specific policies and procedures regarding IV catheter placement, monitoring and management.

• Don’t be afraid to ask for assistance if you are unsure about IV insertion, monitoring and appropriate responses to complications.

References

Avoiding Common Nursing Errors, Lisa Marcucci, MD, Editor, Lippincott Williams and Wilkins, 2010