

IV Catheter Protocol

Supplies Needed:

- IV Catheter (always place the largest bore of catheter as possible, 22g in cats and dogs less than 10 pounds, 20g or 18g in large dogs)
- 2-3 pieces of 1 inch porous tape- prepared length to go around patient leg at least 2 but not more than 3 times
- Premade containers of chlorhexidine scrub and saline scrub
- T-port that is already primed with saline flush
- Syringe with saline flush prepared and labeled
- 2 inch Vet wrap
- Catheter guard and Calmer Collar *Dogs only*
- Gold clippers
- Catheter kit nearby for extra supplies

Placing the IV Catheter:

- 1) IV Catheter placement should always be attempted after a patient's surgical admission exam unless the patient has known FAS or begins to show FAS and needs pre-mediations.
- 2) Make sure your hands are freshly washed before proceeding with catheter placement.
- 3) Choose which limb you are going to place the IV catheter in- front limbs are best for surgical procedures while hind limbs are best for dental procedures. Cats always have catheters placed in the cephalic veins. Doctors may have specific requests on where an IV catheter should be placed. (IE saphenous catheters for eye surgeries)
- 4) Shave the area where the IV catheter is going to be placed with clean clippers. Gold clippers only!
- 5) Scrub area where catheter is going to be placed, scrub at least 3 times for each scrub alternating between the saline and chlorhexidine
- 6) Once the catheter is in place, put the cap back on until you are ready to secure the t-port. Tape catheter into place using one piece of tape underneath the catheter, sticky side down, wrapped around the leg, and tabbed. Make sure to pinch the tape where the catheter is located so that it is well secured and that the tape is slid all the way up under the catheter to about the insertion point. Then secure with a second piece of tape under the catheter, wrapped around the leg, and tabbed.
- 7) Once taped into place, secure the t-port onto the catheter. Always confirm that the t-port was primed before use. Make sure the line is clamped shut until fluids are started, and give injections or flush directly into the catheter port. Use a third piece of tape to secure the t-port, with the extension port to the lateral aspect of the limb.
- 8) Flush the catheter to make sure it is patent with up to 1ml of saline flush.
- 9) Apply vet wrap and then cover with a catheter guard and use a calmer collar to keep canine patients from chewing at IV catheter.
 - a) Do not place guard or calmer collar on cats unless they are chewing at their catheter

* Everytime an IV fluid bag is opened it should be have a piece of 1 inch porous tape placed vertically down the bag and marked with time and date of when fluids were started, and checked regularly to be updated to ensure fluids are being administered at an appropriate rate.

IV Catheter Care and Use:

- 1) A small amount of 70% isopropyl alcohol on a gauze square should be used to clean the catheter port before injecting drugs or fluids into the t-port
- 2) Patient's IV catheters should be checked at least twice daily for pain or swelling. In hospitalized patients with long term IV catheters they should be checked hourly. If the bandage is wet or dirty it should be changed.
- 3) When we disconnect IV fluid lines, the connection sites should be wiped with single use alcohol wipes and capped with an injection cap on the catheter port and a needle on the fluid line.
- 4) The injection port should always be flushed with sterile saline before and after injecting patient medications into the port and/or when giving multiple medications through the port at one time. Make sure to flush with approximately 0.5ml of saline after each different medication is given before moving onto the next to ensure they do not mix.
- 5) Make sure the line is unclamped on the t-port when running IV fluid therapy through the line, and clamped when the patient is not attached to fluids or is receiving medications in the direct port.

Sources:

“Placement and maintenance of peripheral intravenous catheters to prevent infection”- AAHA guidelines

<https://www.aaha.org/aaha-guidelines/infection-control-configuration/protocols/intravenous-catheter-placement-and-maintenance2/>

<https://www.dvm360.com/view/fluid-therapy-small-animals-veterinary-technicians-role>

Youtube video I watched with interesting tape technique- all the CVTs use a universal way of taping so they are familiar with the set up when they need to remove the tape or fix something:

https://www.youtube.com/watch?v=wt_K1beUZEI