

New York State Board for Nursing Guidance for Licensed Practical Nurses (LPNs) who provide Intravenous (IV) Therapy Services to Patients

The New York State Board for Nursing is providing the following training and practice guidance for LPNs who provide IV Therapy in order to promote safe, effective patient care. This guidance is based on evidence-based practice standards and New York State laws that govern training and practice requirements for LPNs who administer IV solutions and IV drugs. **Clinicians who supervise LPNs** and health care employers are encouraged to consider additional evidence-based research and practice standards specific to an LPN's IV Therapy practice setting or patient population served.

IV Therapy Training and Competency Assessments

New York's Nurse Practice Act allows an LPN to provide IV Therapy services only if the LPN is appropriately trained and clinically competent to do so. New York law requires IV Training for LPNs who provide IV Therapy in hospitals, nursing homes, diagnostic and treatment centers, ambulatory surgery centers, dialysis facilities, home care agencies, and hospice programs. The training must include supervised clinical experiences and competency assessments. LPNs must complete additional IV Training at least annually. (See, New York State Department of Health regulations 10 NYCRR §400.15 and §700.4.)

The State Board of Nursing **has determined that it is essential** that all LPNs complete IV Therapy Training (regardless of the practice setting) and demonstrate clinical competency before providing IV Therapy. The State Board of Nursing's guidance on IV Therapy Training is in a document entitled "The Practice of IV Therapy by Licensed Practical Nurses Essential Course Content."

IV Therapy Practice

IV Therapy requires interprofessional collaboration among clinicians who prescribe, prepare, dispense, and/or administer IV Therapy. In health facilities, LPNs provide IV Therapy under the onsite supervision of an RN, nurse practitioner (NP), clinical nurse specialist (CNS), physician, dentist (for dental patients), or a podiatrist (for podiatry patients). The supervising clinician remains responsible for the clinical management of IV Therapy provided by the LPN and for ensuring that the LPN's assignments are consistent with their scope of practice and abilities. The supervising clinician must perform patient assessments and other clinical services that the LPN is not authorized or able to perform. The supervising clinician must also be available to personally intervene to ensure timely and appropriate care to a patient receiving IV Therapy from the LPN.

LPNs should provide IV Therapy in accordance with their employer's IV Therapy policies and procedures. The LPN must consult with their supervising clinician as needed, to ensure that their patient receives good quality IV Therapy, as prescribed. The chart below identifies IV Therapy services that an LPN (who is trained and has demonstrated competency in IV Therapy) may provide under appropriate supervision in a health care facility. The chart also identifies tasks that require clinical judgement that are beyond the scope of practice of LPNs and cannot be performed by an LPN regardless of their degree of education, experience, or supervision. Definitions of terms used in the chart are below.

Definitions

Peripheral Intravenous Catheter (PIVC): an intravenous infusion catheter that is inserted into a peripheral vein (a vein in any limb, external jugular vein, or scalp vein) with the distal tip placed in a peripheral vein. PIVCs include:

- Short Peripheral Intravenous Catheter (Short PIVC): a catheter (3-6 cm in length) that is inserted in a superficial peripheral vein (usually in the arm or hand).
- Midline Catheter (ML): a catheter (15-25 cm in length) that is inserted in an upper arm vein with the terminal tip placed at level of the axilla (children and adult patients).
- Long Peripheral Intravenous Catheter (Long PIVC): a catheter (15-25 cm in length) that is inserted in a peripheral vein when a Short PIVC is not long enough to cannulate an available vein.

Central Venous Access Device (CVAD): an intravenous infusion catheter that is inserted in a vein in the upper or lower limbs or a large chest or groin vein with the distal tip placed in the superior or inferior vena cava. CVADs may be tunneled, non-tunneled, or implanted, and also include peripherally inserted central catheters (PICCs).

IV THERAPY SERVICES PROVIDED BY LPNs

PIVCs & IV Lines that Terminate in Peripheral Veins

LPNs May Perform The Following Tasks:

LPNs may prepare/reconstitute and label IV drugs and IV solutions, as prescribed, provided that the LPN administers the IV drug or IV solution to their patient during the same shift that they prepare it.

LPNs may set up IV equipment, solutions, and drugs for IV infusion.

LPNs may insert a Short PIVC in a superficial peripheral vein in a patient's arm, hand, leg, foot, or scalp.

LPNs may administer IV solutions through PIVCs and monitor and adjust IV solution flow rates, as prescribed.

LPNs may perform routine saline and heparin flushes through a PIVC, per facility protocol or as prescribed.

LPNs may administer certain IV drugs through a PIVC (including secondary intermittent IV drug infusions) as prescribed, except as noted in the column to the right.

LPNs may monitor a patient's response to IV Therapy and report complications.

LPNs may change dressings on PIVC insertion sites and monitor and report vascular access site complications.

LPNs may draw blood from a PIVC.

LPNs may discontinue IV Therapy and remove a PIVC.

NOT within LPN's Scope of Practice.

LPNs may not compound or prepare IV drugs or IV solutions that the LPN does not plan to administer to their patient on the same shift that they prepared it.

LPNs may not insert IV Catheters in a patient's femoral, jugular, or umbilical vein or insert MLs or Long PIVCs.

LPNs may not administer any drugs or solutions by IV push method (other than flushes).

LPNs may not administer intravenously to a patient:

- the first dose of any drug
- drugs that require hemodynamic monitoring or titration
- drugs for moderate or deep sedation or anesthesia
- antineoplastic agents
- experimental drugs
- drugs administered by direct IV push
- drugs that are not US FDA approved and not manufactured in the U.S.

CAVDs and Central Lines

(Clinical settings other than outpatient chronic renal dialysis facilities).

LPNs may Perform the following Tasks:

LPNs may assemble and set up IV equipment, solutions, and drugs for IV infusion through a CVAD.

LPNs may verify or monitor IV flow rates for the RN or clinician assigned to administer IV solutions and/or IV drugs to the patient.

NOT within LPN's Scope of Practice:

LPNs may not Insert or remove CAVDs (including PICCs).

LPNs may not change CAVD dressings and/or dead-end caps or positive pressure end caps on any CAVD.

LPNs may not access or flush any CAVD port, or access or flush ports on central lines.

LPNs may not administer IV drugs or solutions through a CAVD.

LPNs may not draw blood from a CAVD or central line.

CAVDs and Central Lines

Outpatient Chronic Renal Dialysis Facilities

LPNs may provide the following services to patients receiving hemodialysis through a CAVD:

- Initiate and discontinue hemodialysis through a CVAD.
- Monitor and adjust flow rates of CAVDs/lines.
- Administer IV solutions, including boluses of IV solutions solely for plasma volume expansion.
- Administer IV drugs except for: (a) the first dose of a drug, (b) drugs administered by direct IV push, (c) drugs unrelated to the provision of hemodialysis services.
- Change CVAD dressings and/or heparin lock caps.
- Draw blood from a CVAD.
- Flush a CVAD line.

NOT within LPN's Scope of Practice:

LPNs may not insert or remove CAVDs.

LPNs may not administer boluses of IV drugs by direct IV push (other than boluses for plasma volume expansion).

This Guidance does not apply to therapies using intraosseous, subcutaneous, intraspinal, or arterial access devices, or blood or blood component donation or transfusions. New York State law does not allow LPNs to administer blood transfusions in hospitals, nursing homes, diagnostic and treatment centers, dialysis facilities, ambulatory surgery centers, home care agencies, and hospice programs. (See, 10 NYCRR §400.15 and §700.4.)

For additional information, please contact the State Board for Nursing by mail: New York State Education Building – Office of the Professions, 89 Washington Ave., Board for Nursing Office, Second Floor, West Wing, Albany, NY 12234, phone: 518-474-3817, extension 120, or email; nursebd@nysed.gov.

References:

New York State Education Law Article 139 (Nurse Practice Act)

New York State Department of Health Regulations 10 NYCRR §400.15 and §700.4.)

"Infusion Nursing Standards of Practice" (Infusion Nurses Society, 2024).

"NICA Minimum Standards for In-Office Infusion (National Infusion Center Association, 2019).