

PET/CT



PET/CT (Positron Emission Tomography) combines the functional information of a PET scan with the anatomical information of a CT (Computed Tomography) scan. PET scans can detect changes in cellular function, such as; how your cells are utilizing nutrients like sugar and oxygen (this is called metabolic changes). This can pinpoint metabolic activity in cells. CT scans capture cross-sectional images of the body. Once the PET and CT are combined the CT provides more anatomical details of the body to see where the metabolic changes are occurring. This safe and painless technique can provide information for your physician to make an early diagnosis. PET/CT uses small quantities of radioactive materials, called isotope, that are targeted to specific organ systems or tissues within the body. The isotope is introduced into the body by being injected into a vein.

All PET/CT technologists at Cumberland Medical Center are registered with the American Registry of Radiologic Technologists® (ARRT) and/or Certified Nuclear Medicine Technologist (CNMT).

Exam Information:

- Please wear comfortable clothing (nothing metallic such as underwire bras, belts, zippers, buttons, etc.).
- Please bring a current written list of medications
- Arrive 30 minutes prior to your scheduled appointment to register
- **Always inform the technologist if you are pregnant, may be pregnant, and/or currently breastfeeding**
- Do not use nicotine (or nicotine chewing gum) the day of the scan
- Avoid strenuous physical activity (heavy lifting, vigorous exercise, etc.) for 24 hours prior to the scan
- PET/CT exams will require you to be NPO (without food and/or drink) for six hours; however water is acceptable
- If you are diabetic, please contact your ordering provider to determine the safest way to prepare for your exam
- Please drink 32 ounces of plain water about one to two hours prior to scan

PET/CT (cont)



Upon arrival to the Diagnostic Center on Hayes Street, you will be registered and escorted to the PET/CT mobile unit where you will be asked about your medical history. The technologist will start an IV or use a butterfly needle to inject the isotope. Once injected the patient will be asked to wait in the injection suite of the mobile unit for one hour while the isotope distributes. During this time, you will be asked to relax and be as still as possible. The radiotracer will take about an hour to reach the right cells in your body. You must avoid movement and/or activity (even talking) because it can interrupt the radiotracer's functionality. You will then lie on a comfortable table that moves slowly through the scanner for approximately 20-45 minutes.

Please call (931) 459-7196 if you have questions regarding your exam preparation. A technologist will explain your procedure prior to the exam and help answer questions. If requested by your physician, a CD will be provided prior to your discharge. If you have scheduling concerns, please call (931) 459-7040.

*Results should be available within 48 hours, either through your personal patient portal or your ordering provider