Heart PET/CT or PET/MR Perfusion Scan with NH₃ (Ammonia)

Dear patient

We welcome you to your appointment in our service, taking place in the near future. Please bring your insurance document or a copy of your insurance certificate with you.

What is a PET/CT or PET/MR?
(Positron Emission Tomography), CT (Computed Tomography and MR (Magnetic Resonance Imaging) all produce cross-sectional images of your body. In PET/CT and PET/MR, two of the examinations are combined within one scanner.

PET: a small dose of radioactive tracer (here 13N-NH₃) - given to the patient - sends rays from within the body. The PET scanner localizes the tracers’ whereabouts and represents it in cross-sectional images of the patient.

CT: X-rays travel through the patient and are weakened. The weakening is a measure of the densities of various body tissues. The reconstructed cross-sectional CT-images depict these densities throughout the patient.

MR: the patient - placed in the scanner - is exposed to a strong and additionally to a weaker and variable magnetic field. Radio waves are sent into the patient, interact with body tissues and produce other radio waves. As they characterize tissues of the patient, the waves are recorded and reconstructed into cross-sectional images.

Preparation for a Heart PET/CT or PET/MR
- Stop intake of fluids and food for at least 6 hours (unsweetened mineral water ok, NO gum, NO candies)
- Stop intake of fluids and food containing caffeine for 12 hours (no coffee, no black tea, no chocolate, no energy drinks, no Colas)
- Take medications as prescribed (please bring list of medications you are taking on a regular basis)
- In case of existing/possible pregnancy or if you breast-feed, please contact staff.

If you have experienced claustrophobia in the past, please let our medical technicians know. If you have any questions prior to the examination, contact us at +41 (0) 44 255 1818 (option 3).

It is important, that you arrive on time for the examination. Tracers are ready made and will decay, if not used on time.

Heart NH₃-PET/CT or PET/MR examination
In the PET-Center, our technicians await you. Total examination time is approximately 1 hour and is performed in two steps: During the stress perfusion examination, your heart will be stressed with some medication in order to assess heart perfusion during stress conditions. Immediately after the first examination, we measure rest perfusion of your heart. Prior to both examination portions you will receive an injection of radioactive Ammonia, the tracer measuring perfusion distribution in your heart.

During both examination periods it is important that you lay still so as not to disturb image acquisition.

After the NH₃-PET/CT or a PET/MR exam
You should not be accompanied by children or adolescents to the exam.

Reporting
Evaluating your PET/CT or PET/MR exam takes time. Thus, no results can be given immediately after the exam. However, a detailed report will be sent to your physician by the end of the examination day.

Please note
If you need to cancel or delay your appointment, please contact us one working day prior to the exam at the latest. Otherwise, we are obliged to charge you for any costs generated. Contact: +41 44 255 18 18 (option 3).