



<b>Title</b>	<b>Positron Emission Tomography (PET) in Belgium: an Update</b>
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## Aim

To answer the following research questions: What is the diagnostic accuracy and clinical effectiveness of PET and PET/CT? What are the clinical indications for PET and PET/CT? Which programming criteria are used in other countries? Can the number of patients requiring a PET scan be estimated in Belgium?

## Conclusions and results

During the past 4 years, the body of evidence for new indications currently not reimbursed in Belgium (eg, primary staging of head and neck cancer and cervical cancer) has increased, although the quality of this evidence did not improve. By allowing reimbursement of PET scans through the nomenclature code *scintigraphy double tomography*, the programming of PET scanners had only a minor influence on the real number of PET examinations in Belgium. Two methods are available to align the number of PET scanners to the clinical needs: (i) programming and (ii) accreditation criteria and reimbursement modalities. In Belgium, a programming of PET scanners based on a calculation of the needs is impossible in the short run.

## Recommendations

- Calculating the number of PET scans needed is impossible in the short run and is therefore not recommended as a means of programming PET scanners in Belgium.
- An alternative to programming would be to regulate the number of PET scanners:
  - by setting accreditation criteria that are strict enough, and strictly monitored the application to assure the quality of examinations;
  - by determining reimbursement criteria that limit the reimbursable indications to those that are based on scientific evidence.
- Reimbursement of PET examinations is conditional upon registration of the indication in a unique,

authorized, and standardized registry. This mandatory registration should allow for follow-up of whether the proposed system corresponds to the actual needs.

- The list of reimbursed indications for PET and PET/CT should be updated every 3 years, with special attention to new tracers and new imaging modalities. For this update, the research question should be expanded to other imaging techniques, to allow a systematic positioning of PET and PET/CT towards these techniques.
- If an oncological indication supported by inconclusive scientific evidence is added to this list, reimbursement should be linked to the multidisciplinary oncological consult.
- Compliance with these reimbursement criteria should be checked systematically.
- Reimbursement of PET scans through the nomenclature code *scintigraphy double tomography* should be abandoned to allow transparent and controlled follow-up of the number of PET investigations.

## Methods

We systematically reviewed HTA reports, systematic reviews, meta-analyses, RCTs, and diagnostic and prognostic studies. Search dates: January-May 2009. Databases: CRD database (HTA database, DARE, NHS EED), MEDLINE, EMBASE, and websites of HTA agencies.