



Highest photon beam energy used in external beam radiotherapy

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Rationale

The use of high energy photon beams in EBRT is at the origin of activation of some elements of the treatment head of the linac gantry.

Some RT departments in France use energies up to 25 MV for the treatment of large patients in the pelvic or abdominal areas.

The question :

What is the highest photon beam energy used in external beam radiotherapy in your country?



Answers

15 countries answered the survey :

Belgium,
Czech Republic,
Germany,
Greece,
Ireland,
Luxembourg,
Malta,
Norway,
Romania,
Slovenia,
Spain,
Sweden,
Switzerland,
The Netherlands,
UK

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10 MV : Malta

15 MV : The Netherlands*, Slovenia, Romania, Norway (except 1 case), Ireland (in public centres)

18 MV : Spain, Czech Republic, Ireland (private facilities), Switzerland, Greece (except 1 case), Luxembourg, Sweden

20 MV : Germany (higher energies would be an exceptional case)

23 MV : Belgium (few systems)

25 MV : UK* (in a minority of centres)

Most clinical installations use up to 15 – 18 MV : Sweden, Belgium, Ireland, Germany

Most popular energy used about 10 MV : UK, The Netherlands, Luxembourg

* high energies are no longer required with IMRT and ARC therapy