

GLOSSARY (Vol. 1)

Absorbed dose	The energy released in tissue during radiotherapy, measured in gray (Gy).
Adenocarcinoma	Cancer arising from a glandular organ.
Adjuvant	Treatment of suspected, but unconfirmed, disease.
Adjuvant therapy	Use of another form of treatment in addition to the primary treatment.
Anaplastic	Very poorly differentiated, immature tumor, often with a rapid course.
Application	In this context, the use of radiation sources.
Benign	Non-malignant.
Biopsy	Removing a piece of tissue for examination, eg, by surgical excision.
BIPM	Bureau International Poids Mesure. International standards laboratory in Paris.
Boost	Extra radiation dose delivered to a smaller region of the radiation field, eg, to the primary tumor site.
Brachytherapy	Treatment whereby a radioactive source, which is sealed in a container, is placed directly on or in the patient.
CT	Computed tomography
Curative	Treatment aimed at curing the patient.
Differentiation grade	The maturity grade of tumor tissue. Well-differentiated tumor; rather large similarity to normal healthy tissue. Poorly differentiated tumor; looks immature, little or no similarity to healthy tissue. Moderately differentiated tumor refers to the middle group. Well-differentiated tumors often have a slower course and better prognosis than poorly differentiated tumors.
Dosimetry	Measuring the radiation dose distribution in the body.
Dose Rate	Speed with which the radiation dose is given.
Endoluminal	In a tubular-shaped space, ie, in the esophagus.
EORTC	European Organisation for Research and Treatment of Cancer.
ESTRO	European Society of Therapeutic Radiation.
Etiology	Cause.
EU	European Union.
External	Outer.
External Audit	Evaluation by external reviewers.
Extirpate	To remove or destroy completely.
Fractionation	Dose distribution, ie, radiation dose per treatment and treatment frequency.
Hematopoietic Growth Factors	A group of substances within the body which affect the maturity of blood cells in bone marrow, some of these substances are now available as drugs.
Histopathologic	Microscopic tissue diagnosis.
Hyperfractionation	Radiotherapy with increased number of fractions (treatment occasions), but with reduced fractionation dose, compared to standard radiotherapy treatment, eg, two or three radiotherapy treatments per day instead of one.
IAEA	International Atomic Energy Agency.
ICRP	International Commission on Radiation Physics.
ICRU	International Commission on Radiation Units and Measurements.
Indicated	Called for.
Inextirpable	Not able to be extirpated; inoperable.
Interstitial	Treatment where the radiation source is placed direct into the tissue, eg, radioactive needles inserted in a tumor.
Intracavitary	Inside a cavity of the body, eg, radiotherapy where sealed radiation sources are placed in the cavity of the uterus.
In vivo	In the living body or organism, ie, studies of conditions in the patient.
Ionization	In radiotherapy, radiation energy is released and absorbed in tissue, and an electron is knocked out of a tissue molecule, thereby creating an electrical charge.
Isodose	Same dose, the isodose curve is a curve that connects points with the same dose. To have equal doses of radiation in different areas.
keV	Kilo (thousand) electron volts, unit to indicate the energy of individual particles.

KTH	Kungliga Tekniska Högskolan (Royal Swedish Institute of Technology)
kV	Kilo (thousand) volts
Linear Accelerator	Type of treatment apparatus for external radiotherapy.
Malignant	Virulent.
Morbidity	State of being diseased.
Morphology	Science of structure and form without regard to function.
Mortality	State of being mortal. Death rate.
MeV	Mega (million) electron volts, unit to indicate the energy of individual particles.
MRI	Magnetic resonance imaging.
Mucositis	Inflammation of mucous membrane; eg, caused by ionizing radiation.
Multidisciplinary	Several disciplines together.
Mutilating	Disfiguring.
MV	Mega (million) volts.
NCI	National Cancer Institute (Bethesda, MD, USA).
Neoadjuvant	Treatment of suspected, but unconfirmed, tumor diffusion, given prior to other tumor treatment, eg, surgery.
OECD	Organization of Economic Cooperation and Development.
PET	Positron Emission Tomography.
Palliative	Supportive, symptom-relieving non-curative treatment.
Palpable	Perceptible by touch.
Phantom	A model of a body with radiation absorbing characteristics, similar to those of a human, that can be used for radiation dose measurements.
Photon Radiation	Particle radiation with photons.
Placebo	“Sugar pill”, ie, inactive-substance.
Postoperative	Following surgery.
Potentiate	Increase potency, strengthen.
Prophylactic	Preventive.
QALY	Quality Adjusted Life Years.
Radical	Definitive, curative treatment.
Radiotherapist	Physician, specialist in radiotherapy, in Sweden, oncologist.
Radionuclide	Unstable atom that disintegrates by emission of electromagnetic radiation. Energy is released during disintegration, eg, gamma rays that can be used for medical purposes.
Radiotherapist	Physician specialized in radiotherapy. In Sweden, an oncologist.
Randomize	Statistical method, ie, patients from a well-defined group are randomly assigned to two or more treatment alternatives.
Regression	Return toward a former state, eg, shrinkage of a tumor.
Relapse	Recurrence, eg, return of tumor after a disease-free period.
Remission	Return toward a former state, eg, shrinkage of a tumor. Used in expressions such as complete remission (disappearance of a tumor), and partial remission (disappearance of at least half of a tumor).
Resectable	Able to be removed by surgical means.
Response	Reply.
RPC	Radiological Physics Center (Houston, TX, USA).
Scintigraphy	A diagnostic method whereby radioactive substances (radionuclides) are introduced into the patient so that a diagnostic device can identify and image certain processes in the body.
Significant	Statistical term indicating the mathematical confirmation that a demonstrated difference is “true” and not a result of chance.
Squamous cell carcinoma	Cancer arising from squamous cells, ie, epithelial cells, eg, in skin, oral cavity, throat, lung, etc.
SPECT	Single Photon Emission Computed Tomography, a diagnostic method based on combining scintigraphy and CT.
SSI	Statens Strålskydds Institute (Sweden’s National Radiation Protection Institute).
Stem Cells	Cells that, after division and differentiation, develop into mature cells.
Target volume	Volume targeted, ie, defined region of tissue at which radiation is directed.
Telegamma	Distant gamma, ie, gamma ray treatments with a radiation source outside of the = external radiotherapy.

Teleradium	Distant radium, i.e., radium treatments with the radiation source outside of the body = external radiotherapy.
Tomography	Method used to image selected planes of tissue in the body, see CT.