

# **Tomographic Anthropomorphic Models**

## **Part II:**

### **Organ Doses from Computed Tomographic Examinations in Paediatric Radiology**

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## *Abstract*

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This report provides a catalogue of organ dose conversion factors resulting from computed tomographic (CT) examinations of children.

Two radiation qualities and two exposure geometries were simulated as well as the use of asymmetrical beams. The use of further beam shaping devices was not considered.

The organ dose conversion factors are applicable to babies at the age of ca. 2 months and to children between 5 and 7 years but can be used for other ages as well with the appropriate adjustments. For the calculations, the patients were represented by the GSF tomographic anthropomorphic models BABY and CHILD. The radiation transport in the body was simulated using a Monte Carlo method. The doses are presented as conversion factors of mean organ doses per air kerma free in air on the axis of rotation.

Mean organ dose conversion factors are given per organ and per scanned body section of 1 cm height. The mean dose to an organ resulting from a particular CT examination can be estimated by summing up the contributions to the organ dose from all relevant sections.

To facilitate the selection of the appropriate sections, a table is given which relates the tomographic models' coordinates to certain anatomical landmarks in the human body.

## ***1. Introduction***

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Computed tomography (CT) is used increasingly over the last years, for adults as well as for children. It offers a high diagnostic capability, but the dose to the patients is high compared to conventional radiography. As children undergoing radiological examinations are at higher risk than adults exposed to comparative diagnostic procedures, the necessity arises to assess the doses to individual organs resulting from CT examinations in paediatrics.

Although there are published data on doses from CT examinations, most of them deal with measurements in standard phantoms and do not provide a risk relevant description of patient exposure. More recently, organ doses from CT examinations of adult patients were published /1-5/.

For constant control desk settings, the organ doses to children are substantially higher than those for adults from a single CT slice of equal width, due to the smaller body diameter. On the other hand, the length of the scanned body region usually is considerably smaller. This emphasises the necessity not to rely on adult organ dose data but to obtain separate ones for children.

Being applied for special cases rather than for routine examinations, CT is a technique with a high degree of variability and often operated at "non-standard" situations. For that reason, the doses were calculated for separate body sections of 1 cm height at positions varying contiguously from the top of the head down to the bottom of the trunk. The results form a data basis from which organ doses for individual paediatric examinations can be derived by suitably combining the calculated values. This is a procedure similar to that proposed recently for the determination of organ doses resulting from CT examinations of adult patients /2,4,5/.

## ***2. Exposure conditions considered***

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### **2.1. Type of CT scanners and scan geometries**

A field study conducted by the GSF /6,7/ showed that all CT scanners operated in Germany are rotate-only systems. The distance of the focus to the axis of rotation is usually either 70 cm or 76 cm. Comparisons showed that the organ doses do not differ significantly for these two distances. Therefore, the calculations were performed for a focus-to-axis distance of 75 cm; they are equally applicable for all distances between 70 cm and 85 cm.

The angle of rotation is mostly 360°; an angle of 180° is also often used. In the case of the smaller angle, the beam usually impinges at the front side of the body. For the calculations performed for this catalogue, both angles, 360° and 180°, were considered, and organ dose conversion factors are presented for both situations. For 180° rotation, anterior radiation incidence was modelled. For posterior incidence, the appropriate organ dose conversion factors can be obtained from those given (as it will be discussed in section 5.2.1.).

In Germany, the use of beam shaping devices between focus and patient is rare; therefore, use of such devices was not modelled. Scans are, however, often performed using an asymmetrical beam, that means the beam is 25 cm wide on one side of the central axis and only 10 cm on the other side. Consequently, only a circle of radius 10 cm around the axis of rotation is symmetrically irradiated, the area outside is not. Due to their small body size, babies are lying entirely within the fully irradiated part of the beam; therefore, asymmetrical beams need not be considered for patients at this age. Older children are broad enough that part of their body is not symmetrically irradiated. This leads to markedly lower doses outside the 10 cm field. For the respective tissues, additional tables for scans using asymmetrical beams are also given.

## 2.2. Radiation qualities

Two radiation qualities were considered covering a wide energy range and allowing inter- or extrapolation for beam qualities deviating from those given. The respective spectra are characterised in table 1. In the above mentioned field study, no radiation qualities were found with tube voltages below 80 kV; some scanners were operated at tube voltages above 125 kV, the maximum value being at 137 kV. Previously published data /4/ showed that the organ dose conversion factors for 137 kV tube voltage are similar to those for 125 kV due to the close resemblance of the respective spectra and could, therefore, easily be estimated from those given for 80 kV and 125 kV by linear extrapolation based on mean photon energy ( $\bar{E}_{\text{photon}}$ ) or half value layer (HVL) in aluminium.

**Table 1:** Radiation qualities considered

Tube voltage (kV)	Filtration (mm)	$\bar{E}_{\text{photon}}$ (keV)	HVL (mm Al)
80	2.2 Al + 0.20 Cu	50.5	5.38
125	2.2 Al + 0.20 Cu	64.4	7.94

### ***3. Calculational method***

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The organ dose conversion factors were calculated using a computer code simulating photon transport in various media. For this procedure, three main components are necessary: a model of the radiation source, a technique to simulate the radiation interactions and energy depositions and a model of the human body.

According to the irradiation conditions mentioned above, the radiation source was modelled as a point source rotating around the longitudinal axis of the body; the beam size at the axis of rotation was 1 cm in height and 50 cm in width for the symmetrical beam (for asymmetrical beams, the width was reduced on one side). To simulate the x ray spectra as they emerge from the x ray tube, a semi-empirical method was used considering the target material, inherent as well as added filtration, air path, target angle and tube voltage /8/.

#### **3.1. Monte Carlo method**

The radiation transport in the phantoms was calculated using a Monte Carlo code following individual photon histories. For each single particle history, the parameters influencing its actual course are selected randomly from their probability distributions. The radiation interaction processes considered were photoelectric absorption and Compton scattering. The cross section data for the radiation interactions were taken from the Oak Ridge National Laboratory /9/. The energy was regarded as being deposited at the point of photon interaction; secondary particles were not followed ("Kerma approximation"). A more detailed description of the photon transport code used is given elsewhere /10/.

The absorbed doses were obtained by dividing the total amount of energy deposited in an organ by the mass of this organ. It is to be emphasised that

all doses presented in this catalogue are mean doses averaged over the whole organ or tissue, not doses only to that part of the organ included in the CT slice and irradiated directly.

The number of individual photon histories followed per single CT slice was 1.000.000; the Monte Carlo calculations were performed on an Intel Hypercube IPSC.

### **3.2. Human phantoms**

The models of the human body used for the calculations were the GSF tomographic paediatric models "BABY" and "CHILD" which were constructed from whole body CT data of real patients /10,11/.

Each organ and tissue of these "voxel" models consists of volume elements (= voxels), derived from the CT data. Therefore, the location and shape of the organs and tissues is accurately modelled. Special care is given to the modelling of the red bone marrow as it is very sensitive to radiation and is related to leukaemia risk. The relative amount of bone marrow in each voxel within the skeleton can be estimated from the CT numbers of the respective bone pixels (= picture elements). Thus, the spatial resolution of the red bone marrow can be assessed with a resolution as fine as the voxel size, i.e. 2.9 mm<sup>3</sup> for the baby and 19 mm<sup>3</sup> for the child.

The baby was eight week old when it was scanned and represents, thus, babies from new-born up to several months. The child was seven years old; it was, however, slightly small for its age and can be regarded as representative for the age between five and seven years.

Being reconstructed from CT data, the phantoms are primarily made up as a matrix of rows, columns and slices containing the respective volume elements. Using the appropriate voxel dimensions with respect to width, depth and height, this matrix can be related to a Cartesian co-ordinate system. The x-axis is directed across the columns from the phantoms' right towards their left side, the y-axis is directed across the rows from the front towards the back and the z-axis across the slices from the top of the head down to the feet. The origin is at the upper right frontal corner of this ma-

trix. Consequently, height 0 is at the vertex; increasing slice coordinates are related to body regions further down.

The relation of the phantoms' z-coordinates (i.e. height) to certain anatomical landmarks is given in Appendix A for the baby and in Appendix C for the child. The main body characteristics of BABY and CHILD are listed in table 2.

**Table 2:** Body characteristics of the phantoms

	BABY eight week old	CHILD seven year old
Weight (kg)	4.2	21.7
Height (cm)	57	115
Body width (cm)	21.8	33.1
Front to back distance (cm)	12.2	17.6

A detailed description of the construction technique and the phantoms, including the organ masses and tissue compositions, is given in /10/.

## ***4. Description of the data presented***

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Organ dose conversion factors (in this case as mean absorbed dose to an organ, normalised to air kerma free in air on the axis of rotation) were calculated for separate body sections of 1 cm height at positions varying contiguously from the top of the head down to several centimetres below the bottom of the trunk. In Appendices B, D and E, tables of dose conversion factors per single section are listed for a number of organs. (Appendix B shows the data for the baby phantom and Appendix D those for the seven year old child; in Appendix E the data for asymmetrical irradiation of the seven year old child are given.)

### **4.1. Organs considered**

The organs and tissues considered in this catalogue are the following:

adrenals	lungs	spleen
bladder	oesophagus	stomach
brain	ovaries	testes
breasts	pancreas	thymus
colon	red bone marrow	thyroid
eye lenses	skeleton	tissue
kidneys	skin	uterus
liver	small intestine	

The dose to the red bone marrow is given both as dose to the red bone marrow in the single bones listed below and as mean dose to the whole amount of red bone marrow distributed in the body.

The bones for which the dose to the red bone marrow is listed separately are:

arm bones	ribs
clavicles	scapulae
cranium	cervical spine
leg bones	thoracic spine
mandible	lumbar spine and sacrum
pelvis	sternum

The dose to the skeleton is given as mean dose to the entire skeleton, including both mineral bone and bone marrow.

## 4.2. Table description

For each of the organs considered, separate tables of dose conversion factors are given in Appendix B for the baby and in Appendices D and E for the child phantom. Each of these tables contains 7 columns.

The first column describes the single sections with respect to their z-coordinate within the phantom. Together with the relation of the phantoms' z-coordinates to certain anatomical landmarks (which are given in Appendix A for the baby and in Appendix C for the child), this characterises the position of the respective section in the body unequivocally. It should be noted that increasing z-coordinates are oriented downwards in the body.

The next column shows the percentage of the organ volume included in the single section, i.e. the ratio of the organ being directly irradiated during scanning a respective 1 cm wide slice. For smaller organs, this value is zero for most sections; for tissues spread throughout the body (as e.g. skin, skeleton and red bone marrow) at each single slice position certain proportions are directly irradiated.

Two pairs of columns of conversion factors are following, one pair for each of the two radiation qualities considered. Within each of these pairs, the first column presents conversion factors for full 360° rotation of the fan beam, the second column those for 180° rotation around the front side of the body. The conversion factors listed in the tables represent mean organ doses normalised to air kerma free in air on the axis of rotation, resulting from a scan of the respective body section.

The last column in each table presents an average value of the standard deviations of the conversion factors (expressed in percentage) estimated from the Monte Carlo calculation.

The length of the tables varies due to the different dimensions of the organs in height. The organ dose conversion factors are highest at scan positions where part of the organ is directly irradiated and decrease rapidly above and below this region. The sections are listed only as long as the respective conversion factors amount to at least 0.00005 and are omitted beyond these borders. Doses resulting from slices outside the region listed in the tables can be neglected as their contribution is insignificant.

## ***5. Derivation of organ doses for individual examinations***

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### **5.1. Instructions for the use of the organ dose conversion factors**

The dose values of this catalogue are presented as organ dose conversion factors, i.e. organ absorbed doses normalised to the air kerma free in air at the axis of rotation.

Mean organ doses for individual examinations can be calculated according to the formula

$$D(\text{organ}) = K_{air} \cdot \sum_{z_l}^{z_u} f(\text{organ}, z)$$

by summing up the values of  $f(\text{organ}, z)$  as listed in the tables of Appendix B, D or E and multiplying the resulting sum with  $K_{air}$ , the air kerma free in air on the axis of rotation.  $z_l$  and  $z_u$  indicate the lower and upper boundaries of the scanned region. For easier orientation, approximate positions of anatomical landmarks are indicated in Appendices A and C.

Examinations can be treated in one step using the above equation as long as the dose on the axis remains constant. Sections in which  $K_{air}$  is changed are to be treated separately and the sum of the resulting values of  $D(\text{organ})$  gives the total value for the whole examination.

This procedure is independent of the actual slice width used. Calculations performed in order to study the effect of slice width on the organ dose conversion factors revealed no significant differences between the doses resulting from one single slice of 1 cm width and those resulting from summation of five contiguous slices of 2 mm width /4/.

For reliable determination of organ doses,  $K_{air}$  should be based on measurements at the respective unit using suitable dosimeters and considering the influence of geometric effects like overlapping of adjacent slices or spaces between them. The CT Dose Index (CTDI) is the most suitable quantity in this context. It should be noted, however, that the organ dose conversion factors of this report refer to the CTDI measured free in air and not in a phantom. If dose measurements are not possible or if only rough estimates of organ doses are intended, values from literature can be used for  $K_{air}$ . Also in these cases, the use of CTDI values measured free in air has to be ensured. Table 3 presents literature values of  $K_{air}$  for some spectra likely to be used in CT examinations /12,13/. These values should be used with caution, however, as a field study covering 120 CT units in Germany revealed that actual dose measurements may differ markedly from the literature values even for the same nominal conditions /6,7/. Therefore, actual measurements of  $K_{air}$  should be preferred whenever possible.

**Table 3:** Literature values for dose free in air at 75 cm distance, normalised to 100 mAs /12,13/.

Tube voltage (kV)	Filtration (mm)	$K_{air}$ (mGy)	Reference
80	2.2 Al + 0.20 Cu	4.4	/12/
125	2.2 Al + 0.20 Cu	14.4	/12/
125	2.0 Al + 0.25 Cu	13.2	/12/
137	2.2 Al + 0.20 Cu	17.6	/12/
125	2.0 Al + 0.40 Cu	9.6	/12/
125	2.5 Al + 0.40 Cu	11.0	/13/
120	5.0 Al + 0.50 Cu	6.7	/13/

## 5.2. Situations different from those considered in the calculation

Strictly speaking, the organ dose conversion factors presented in this catalogue are valid only for the same exposure conditions for which they

were calculated with respect to exposure geometry, patient size and internal geometry and beam quality. Individual situations are likely to differ from that simulated in the calculation with respect to some of these conditions. In the following, some possibilities are shown to adjust the tabulated values to the individual examination under consideration.

### 5.2.1. Exposure geometry

In the tables, the height ranges of the scanned body sections are given in integer centimetre values. In cases where  $z_l$  and  $z_u$  are not integer, appropriate proportions of the conversion factors for the respective slices have to be taken for summation. This is, for example, of consequence in those rare situations when the necessity arises to estimate organ doses from single CT scans with slices thickness less than 1 cm. In these cases, the values of  $f(\text{organ}, z)$  are to be multiplied with the ratio of the actual slice width and 1 cm. In the case of very thin slices of 1 or 2 mm, however, it should be considered that the real slice width is often considerably larger than the nominal one /7,14/.

Conversion factors for both full  $360^\circ$  rotation of the fan beam and  $180^\circ$  rotation around the front side of the body are listed in the tables. These geometries were found to be the most common /6,7/. There might be some cases where a  $180^\circ$  rotation around the rear body side is performed. For these exceptional situations, organ dose conversion factors can be reconstructed from those given: as the conversion factors for  $360^\circ$  rotation present the arithmetic mean of  $180^\circ$  rotations around the frontal and the rear body side, values  $D(\text{organ}, z, 180^\circ_{p.a.})$  for the latter  $180^\circ$  rotation can be calculated from those given,  $D(\text{organ}, z, 360^\circ)$  and  $D(\text{organ}, z, 180^\circ_{a.p.})$ , as follows:

$$D(\text{organ}, z, 180^\circ_{p.a.}) = 2 \bullet D(\text{organ}, z, 360^\circ) - D(\text{organ}, z, 180^\circ_{a.p.})$$

With respect to focus-to-axis distance, the organ dose conversion factors which were calculated for a distance of 75 cm are equally suitable for all distances between 70 cm and 85 cm.

The dose conversion factors presented in the tables of Appendices B and D were calculated for irradiation with symmetrical beams. Scans are, how-

ever, often performed using an asymmetrical beam, that means the beam extends to the full width only on one side of the central axis and to a restricted width on the other side. Consequently, only a smaller circle around the axis of rotation is symmetrically irradiated, the area outside is not. As already mentioned above, babies are, due to their small body size, lying entirely within the fully irradiated part of the beam; therefore, asymmetrical beams need not be considered for patients at this age. Older children are broad enough that more lateral body regions are not symmetrically irradiated. Conversion factors for relevant tissues in this region are given in Appendix E for irradiation with asymmetrical beams; the doses to other tissues are not affected.

### **5.2.2. Patient size and internal geometry**

Although the phantoms used for the dose calculations represent a realistic patient geometry since they were constructed from whole body CT data of real persons, they are unlikely to resemble in detail any individual patient under consideration as human anatomy differs from patient to patient.

Since the depth dose curves resulting from rotational scans are very flat in the vicinity of the rotational centre, errors due to discrepancies in the radial position of a centrally located organ between patient and phantom remain small.

For a patient for whom the location of an organ relative to the given anatomical landmarks deviates from that in the phantoms with respect to height, this can be accounted for by considering the respective organ dose conversion factors for sections shifted accordingly.

Doses for patients with body sizes different than those of the phantoms can be estimated from the conversion factors given for the child and the baby phantoms by interpolation. The best method for this would be to evaluate the organ doses for the child and the baby phantom separately, summing up the conversion factors for those sections representing the scanned body region with respect to the anatomical landmarks, irrespective of the actual height of the scanned body region. Suitable interpolation between these summed up organ doses should then be made.

### 5.2.3. Radiation quality

For radiation qualities other than those given in table 1 for which the conversion factors were calculated, doses can be derived from those given by inter- or extrapolation, using the mean photon energy or the half value layer of the radiation quality in question. To facilitate inter- or extrapolation, table 4 presents the latter parameters for some spectra likely to be used for CT examinations.

**Table 4:** Description of some typical radiation qualities used for CT examinations

Tube voltage (kV)	Filtration (mm)	$\bar{E}_{photon}$ (keV)	HVL (mm Al)
80 (*)	2.2 Al + 0.20 Cu	50.5	5.38
125 (*)	2.2 Al + 0.20 Cu	64.4	7.94
125	2.0 Al + 0.25 Cu	65.1	8.25
137	2.2 Al + 0.20 Cu	66.0	8.06
125	2.0 Al + 0.40 Cu	68.5	9.34
125	2.5 Al + 0.40 Cu	68.7	9.42
120	5.0 Al + 0.50 Cu	70.1	9.97

(\*) Spectra used for the calculations of this report

### 5.2.4. Doses to the directly irradiated part of an organ

As already mentioned above, the organ doses  $D(organ)$  evaluated by the method described above are mean organ doses, i.e. they are averaged over the entire organ, not only that part that was directly irradiated. For organs or tissues expanding beyond the borders of the examination (e.g. skin), there might, in some cases, arise the necessity to assess doses to only that part of the organ which was directly irradiated. This can be achieved by the following procedure: The ratio of the organ which was directly irradiated

during an individual examination can be evaluated by summing up the organ volume ratios  $r(\text{organ}, z)$  given in percentage in the second column of the conversion factor table for the respective body sections. Dividing this percentage ratio by 100 results in the ratio  $R_{\text{direct}}$  of the organ volume located in the beam.

$$R_{\text{direct}} = \frac{1}{100} \bullet \sum_{z_l}^{z_u} r(\text{organ}, z)$$

The mean dose to the directly irradiated part of the organ,  $D_{\text{direct}}(\text{organ})$ , can then be approximated by dividing the mean organ dose,  $D(\text{organ})$ , by this volume ratio:

$$D_{\text{direct}}(\text{organ}) \approx \frac{D(\text{organ})}{R_{\text{direct}}} .$$

This results in a slight overestimation of the dose to the directly irradiated part of the organ, as the dose to parts of the organ adjacent to the scanned region, due to scattered radiation, is considered to be deposited in the part of the organ located in the beam. This overestimation, however, is expected to be insignificant compared to other sources of error.

### 5.3. Sources of errors and limitations of the method

Some of the main sources of error result from applying the dose values presented in the tables in Appendices B, D and E for situations deviating from those simulated in the calculations. They can be suppressed following the instructions given above.

Systematic errors from simulating the physical events in a human phantom by Monte Carlo methods cannot be analysed quantitatively. However, there is evidence that these errors, in general, are below 10% and do not exceed 15%. This statement is based on results comparing measured dose values at 28 sites in an Alderson-Rando phantom undergoing a CT ex-

amination with corresponding values calculated for a three dimensional reconstruction of the same phantom /15/.

A true limitation of the method is due to the fact that the Monte Carlo calculation could not simulate situations in which the length axis of the phantom is not parallel to the axis of rotation. This is, e.g., the case for scans across the head in order to avoid direct irradiation of the eye lenses. These situations are not properly reflected by the dose conversion factors presented in the tables.

This is also the case for the use of beam shaping devices other than restricting the beam to an asymmetrical shape. The use of beam shaping devices was not modelled in the calculations due to being relatively rare in Germany and might result in organ doses deviating significantly from those given in this catalogue.

## ***6. Conclusions***

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This catalogue contains data from which doses to selected organs and tissues can be estimated for CT examinations of children and babies. Despite certain limitations, the organ dose conversion factors presented in extended tables are directly applicable to form a realistic estimate of the doses to individual patients. Guidance for the use of the tabulated values is given and some possible modifications to adjust the tabulated values to situations differing from those simulated are also shown.

The organ dose conversion factors were calculated for scans of separate body sections at positions varying contiguously throughout the body from the top of the head down to below the bottom of the trunk. The height of each single section is 1 cm. Thus, these values can be used as a data basis from which organ doses for a large variety of examination situations in CT, a technique with low level of standardisation, can be assessed.

### ***Availability of data***

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Upon request, a diskette containing all tables given in this catalogue, together with a FORTRAN programme for the summation procedure, can be provided.

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## *References*

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- /1/ Kramer, R., Veit, R., Drexler, G.: Körperdosiskonversionsfaktoren für computertomographische Untersuchungen. *Strahlenschutz in Forschung und Praxis* XX, 177-189, Thieme, Stuttgart (1980)
- /2/ Panzer, W., Zankl, M.: A method for estimating embryo doses resulting from CT examinations. *Brit. J. Radiol.*, Vol. 62, 936-939 (1989)
- /3/ Jessen, K.A., Christensen, J.J., Jørgensen, J., Petersen, J., Sørensen, E.W.: Determination of collective effective dose equivalents due to computed tomography in Denmark in 1989. *Radiat. Prot. Dosim.*, Vol. 43, No. 1/4, 37-40 (1992)
- /4/ Zankl, M., Panzer, W., Drexler, G.: The calculation of dose from external photon exposures using reference human phantoms and Monte Carlo methods, Part VI: Organ doses from computed tomographic examinations. *GSF-Bericht 30/91*. GSF - Forschungszentrum für Umwelt und Gesundheit GmbH, München, Germany (1991)
- /5/ Jones, D.G., Shrimpton, P.C.: A national survey of CT practice in the UK, Part 3: Normalised organ doses calculated using Monte Carlo techniques. Report No. NRPB-R250. National Radiological Protection Board, Chilton, UK (1991)
- /6/ Panzer, W., Scheurer, C., Drexler, G., Regulla, D.: Feldstudie zur Ermittlung von Dosiswerten bei der Computertomographie. *Fortschr. Röntgenstr.* 149 (5), 534-538 (1988)
- /7/ Panzer, W., Scheurer, C., Zankl, M.: Dose to patients in CT examinations. Results and consequences from a field study in the Federal Republic of Germany. *BIR Report 20: Optimization of Image Quality and Patient Exposure in Diagnostic Radiology* (Eds. B.M. Moores,

- B.F. Wall, H. Eriskat and H. Schibilla). British Institute of Radiology, London, UK. 185-188 (1989)
- /8/ Birch, R., Marshall, M.: Computation of Bremsstrahlung X-ray spectra and comparison with spectra measured with a Ge(Li) detector. *Phys. Med. Biol.*, Vol. 24, 505-517 (1979)
- /9/ Knight, J.N., Roussin, R.W.: Photon interaction data DLC-99/HUGO. Radiation Shielding Information Center. Oak Ridge National Laboratory, Oak Ridge, Tennessee (1983)
- /10/ Veit, R., Zankl, M., Petoussi, N., Mannweiler, E., Williams, G., Drexler, G.: Tomographic anthropomorphic models, Part I: Construction technique and description of models of an 8 week old baby and a 7 year old child. GSF-Bericht No. 3/89. Gesellschaft für Strahlen- und Umweltforschung mbH, München, Germany (1989)
- /11/ Zankl, M., Veit, R., Williams, G., Schneider, K., Fendel, H., Petoussi, N., Drexler, G.: The construction of computer tomographic phantoms and their application in radiology and radiation protection. *Radiat. Environ. Biophys.*, Vol. 27, 153-164 (1988)
- /12/ Shrimpton, P.C., Jones, D.G., Hillier, M.C., Wall, B.F., Le Heron, J.C., Faulkner, K.: Survey of CT practice in the UK. Part 2: Dosimetric aspects. NRPB Report No. NRPB-R249. National Radiological Protection Board, Chilton, UK (1991)
- /13/ Mika, N., Reiss, K.H.: Tabellen zur Röntgendiagnostik. Siemens AG, Erlangen (1969)
- /14/ Birch, R., Marshall, M., Ardran, G.M.: Catalogue of spectral data for diagnostic x-rays. The Hospital Physicists' Association, Scientific Report Series 30 (1979)
- /15/ Veit, R., Panzer, W., Zankl, M., Scheurer, C.: Vergleich berechneter und gemessener Dosen an einem anthropomorphen Phantom. *Z. Med. Phys.* Vol. 2, 123-126 (1992)



# **Appendix A**

## **Anatomical Data of the BABY phantom**

**Table A.1: Approximate anatomical landmarks of the BABY phantom**

Object	Height (cm)
Skull	0.0 - 12.0
Cervical spine	10.0 - 12.4
Thoracic spine	12.4 - 27.2
Lumbar spine (+ sacrum)	27.2 - 36.4
Iliac crest	31.6
Bottom of pelvis	37.6
Top of femur head	35.2

**Table A.2: Height range of some soft tissue organs**

Organ	Height (cm)
Adrenals	24.4 - 26.8
Bladder	33.2 - 36.4
Brain	0.0 - 9.6
Colon	27.6 - 41.2
Kidneys	25.6 - 30.8
Liver	20.8 - 29.2
Lungs	15.2 - 23.2
Ovaries	33.2 - 34.0
Pancreas	25.6 - 26.8
Small intestine	26.0 - 33.2
Spleen	22.4 - 27.2
Stomach	23.2 - 27.2
Testes	37.2 - 38.8
Thymus	14.4 - 19.2
Thyroid	12.8 - 14.4
Uterus	33.2 - 34.4

# **Appendix B**

## **Organ Dose Conversion Factors for the BABY phantom**

**Table B. 1: Adrenals**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1		*	*	.0001	*	1.95
1 to 2		*	*	*	.0001	3.12
2 to 3		*	.0001	.0001	.0001	5.47
3 to 4		*	.0001	*	.0002	6.47
4 to 5		.0001	.0001	.0001	.0001	8.94
5 to 6		.0001	.0002	.0005	.0002	12.24
6 to 7		.0001	.0001	.0003	.0004	13.76
7 to 8		.0002	.0002	.0004	.0003	15.59
8 to 9		.0002	.0003	.0003	.0005	16.88
9 to 10		.0005	.0005	.0007	.0006	16.13
10 to 11		.0006	.0007	.0009	.0009	17.59
11 to 12		.0008	.0008	.0010	.0010	15.70
12 to 13		.0005	.0012	.0013	.0017	15.42
13 to 14		.0010	.0015	.0020	.0019	14.20
14 to 15		.0013	.0022	.0022	.0034	11.25
15 to 16		.0018	.0024	.0033	.0036	10.01
16 to 17		.0030	.0033	.0042	.0046	8.66
17 to 18		.0048	.0052	.0055	.0053	7.47
18 to 19		.0067	.0053	.0078	.0075	6.61
19 to 20		.0084	.0074	.0104	.0097	5.69
20 to 21		.0109	.0109	.0138	.0144	4.94
21 to 22		.0170	.0149	.0190	.0197	4.18
22 to 23		.0258	.0236	.0304	.0294	3.41
23 to 24		.0427	.0365	.0492	.0439	2.74
24 to 25	17.8	.1430	.0964	.1647	.1163	1.78
25 to 26	56.5	.3182	.1986	.3723	.2376	1.28
26 to 27	25.7	.1825	.1164	.2063	.1376	1.63
27 to 28		.0475	.0391	.0527	.0472	2.67
28 to 29		.0283	.0254	.0340	.0308	3.26
29 to 30		.0175	.0182	.0219	.0210	3.99
30 to 31		.0120	.0125	.0151	.0153	4.76
31 to 32		.0089	.0090	.0113	.0107	5.65
32 to 33		.0058	.0057	.0071	.0077	6.77
33 to 34		.0037	.0041	.0045	.0046	8.55

**Table B. 1: Adrenals (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0023	.0027	.0034	.0028	10.27
35 to 36		.0021	.0015	.0026	.0025	11.90
36 to 37		.0013	.0015	.0021	.0018	13.12
37 to 38		.0011	.0009	.0013	.0014	14.60
38 to 39		.0007	.0010	.0011	.0011	15.92
39 to 40		.0005	.0006	.0009	.0008	17.30
40 to 41		.0003	.0004	.0006	.0005	15.12
41 to 42		.0002	.0001	.0003	.0002	12.60
42 to 43		.0002	.0002	.0002	.0002	11.93
43 to 44		.0001	.0001	.0002	.0002	6.62
44 to 45		.0001	*	.0002	*	4.08

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B. 2: Bladder**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
7 to 8		*	*	.0001	*	3.12
8 to 9		*	*	.0001	*	3.91
9 to 10		*	*	.0002	.0001	5.66
10 to 11		*	.0001	.0001	.0001	6.44
11 to 12		.0001	*	.0001	.0001	6.14
12 to 13		.0001	.0001	.0001	.0001	7.14
13 to 14		.0001	.0001	.0002	.0001	9.92
14 to 15		.0001	.0002	.0003	.0002	12.99
15 to 16		.0001	.0003	.0002	.0002	10.68
16 to 17		.0003	.0003	.0004	.0006	17.59
17 to 18		.0003	.0002	.0006	.0006	16.19
18 to 19		.0004	.0004	.0004	.0006	16.32
19 to 20		.0004	.0005	.0009	.0009	17.32
20 to 21		.0008	.0007	.0008	.0008	17.13
21 to 22		.0010	.0007	.0016	.0011	15.71
22 to 23		.0010	.0012	.0020	.0020	14.06
23 to 24		.0013	.0020	.0023	.0023	12.52
24 to 25		.0017	.0022	.0031	.0038	10.31
25 to 26		.0030	.0036	.0039	.0042	8.92
26 to 27		.0049	.0047	.0062	.0058	7.36
27 to 28		.0061	.0066	.0075	.0092	6.38
28 to 29		.0084	.0088	.0113	.0110	5.49
29 to 30		.0128	.0136	.0142	.0171	4.62
30 to 31		.0191	.0196	.0222	.0238	3.79
31 to 32		.0300	.0303	.0330	.0336	3.14
32 to 33		.0419	.0504	.0496	.0560	2.56
33 to 34	21.9	.1931	.2578	.2093	.2827	1.34
34 to 35	35.5	.2765	.3585	.3061	.3811	1.14
35 to 36	32.6	.2350	.2584	.2678	.2840	1.27
36 to 37	9.9	.1031	.1004	.1156	.1142	1.89
37 to 38		.0331	.0359	.0374	.0368	2.99
38 to 39		.0200	.0198	.0239	.0253	3.76
39 to 40		.0142	.0146	.0162	.0156	4.59
40 to 41		.0084	.0082	.0103	.0094	5.91

**Table B. 2: Bladder** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
41 to 42		.0039	.0040	.0050	.0050	8.43
42 to 43		.0014	.0018	.0015	.0016	13.79
43 to 44		.0014	.0010	.0012	.0010	15.51
44 to 45		.0010	.0007	.0008	.0009	16.02

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B. 3: Brain**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1	2.4	.0276	.0287	.0314	.0322	0.34
1 to 2	8.1	.0685	.0711	.0795	.0813	0.23
2 to 3	13.7	.1015	.1028	.1178	.1195	0.19
3 to 4	16.9	.1190	.1204	.1396	.1412	0.17
4 to 5	18.1	.1243	.1249	.1462	.1467	0.17
5 to 6	17.1	.1155	.1149	.1361	.1361	0.17
6 to 7	12.4	.0886	.0838	.1051	.1009	0.20
7 to 8	7.5	.0593	.0550	.0709	.0667	0.24
8 to 9	3.3	.0319	.0289	.0398	.0369	0.31
9 to 10	0.4	.0140	.0128	.0181	.0170	0.45
10 to 11		.0084	.0082	.0108	.0108	0.57
11 to 12		.0054	.0052	.0071	.0071	0.71
12 to 13		.0038	.0038	.0051	.0052	0.84
13 to 14		.0027	.0027	.0037	.0037	0.99
14 to 15		.0021	.0022	.0030	.0030	1.09
15 to 16		.0016	.0017	.0024	.0024	1.24
16 to 17		.0012	.0013	.0018	.0019	1.41
17 to 18		.0009	.0010	.0014	.0015	1.62
18 to 19		.0007	.0007	.0011	.0011	1.85
19 to 20		.0005	.0005	.0008	.0008	2.11
20 to 21		.0003	.0004	.0006	.0006	2.54
21 to 22		.0003	.0003	.0005	.0005	2.88
22 to 23		.0002	.0002	.0004	.0004	3.08
23 to 24		.0002	.0002	.0003	.0003	3.43
24 to 25		.0002	.0002	.0003	.0003	3.83
25 to 26		.0001	.0001	.0002	.0002	4.33
26 to 27		.0001	.0001	.0002	.0002	4.90
27 to 28		.0001	.0001	.0001	.0001	5.56
28 to 29		.0001	.0001	.0001	.0001	6.34
29 to 30		*	*	.0001	.0001	7.21
30 to 31		*	*	.0001	.0001	8.35

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B. 4: Breast**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1		.0001	.0001	.0001	*	0.90
1 to 2		.0002	.0001	.0004	.0006	1.78
2 to 3		.0003	.0004	.0004	.0006	2.18
3 to 4		.0005	.0007	.0006	.0008	2.89
4 to 5		.0008	.0007	.0008	.0010	4.39
5 to 6		.0010	.0013	.0012	.0016	5.38
6 to 7		.0013	.0014	.0019	.0023	6.64
7 to 8		.0021	.0021	.0027	.0028	7.16
8 to 9		.0023	.0035	.0031	.0033	8.01
9 to 10		.0025	.0041	.0054	.0058	8.83
10 to 11		.0067	.0069	.0071	.0094	8.77
11 to 12		.0065	.0088	.0091	.0104	8.25
12 to 13		.0085	.0104	.0101	.0103	7.98
13 to 14		.0089	.0095	.0115	.0119	7.05
14 to 15		.0113	.0140	.0167	.0150	5.86
15 to 16		.0211	.0265	.0255	.0319	4.38
16 to 17		.0475	.0680	.0545	.0678	2.96
17 to 18	100.0	.6410	1.001	.6840	1.029	1.06
18 to 19		.0653	.0941	.0780	.0955	3.18
19 to 20		.0342	.0411	.0381	.0465	4.53
20 to 21		.0189	.0226	.0214	.0259	5.60
21 to 22		.0128	.0143	.0150	.0181	6.58
22 to 23		.0089	.0116	.0132	.0144	7.38
23 to 24		.0069	.0082	.0077	.0097	8.30
24 to 25		.0058	.0053	.0070	.0073	8.82
25 to 26		.0038	.0042	.0051	.0061	8.14
26 to 27		.0032	.0024	.0034	.0036	7.86
27 to 28		.0018	.0019	.0024	.0022	6.49
28 to 29		.0013	.0018	.0015	.0020	6.14
29 to 30		.0012	.0008	.0020	.0016	4.48
30 to 31		.0006	.0009	.0020	.0011	3.66
31 to 32		.0004	.0008	.0007	.0004	1.92
32 to 33		.0003	.0004	.0008	.0004	1.93
33 to 34		.0003	.0002	.0001	.0005	1.25

**Table B. 4: Breast (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0003	.0002	.0002	.0002	0.58
35 to 36		.0001	.0001	.0002	.0002	0.82
36 to 37		*	.0002	.0002	.0002	0.62
37 to 38		.0001	.0002	.0002	.0003	0.83
38 to 39		*	.0001	.0003	.0002	0.48
39 to 40		.0001	.0001	.0002	.0001	0.78
40 to 41		.0001	*	.0003	*	0.34
41 to 42		.0001	.0001	*	.0001	0.24
42 to 43		*	*	*	*	0.14
43 to 44		*	*	*	.0003	0.09
44 to 45		.0001	*	.0001	*	0.10

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B. 5: Colon**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
2 to 3		*	*	*	.0001	4.30
3 to 4		*	*	*	*	6.25
4 to 5		*	*	*	*	5.61
5 to 6		*	*	*	.0001	5.58
6 to 7		*	*	*	.0001	7.45
7 to 8		.0001	.0001	.0001	.0002	10.88
8 to 9		*	*	.0001	.0001	10.95
9 to 10		.0001	.0002	.0002	.0002	13.10
10 to 11		.0001	.0002	.0002	.0004	16.83
11 to 12		.0003	.0001	.0003	.0003	17.06
12 to 13		.0001	.0003	.0004	.0004	17.03
13 to 14		.0003	.0002	.0005	.0003	16.90
14 to 15		.0004	.0005	.0005	.0007	14.78
15 to 16		.0004	.0005	.0008	.0010	14.42
16 to 17		.0007	.0006	.0008	.0009	13.02
17 to 18		.0011	.0011	.0015	.0013	10.74
18 to 19		.0011	.0013	.0020	.0019	9.33
19 to 20		.0019	.0019	.0025	.0025	8.09
20 to 21		.0021	.0022	.0030	.0030	7.41
21 to 22		.0030	.0032	.0037	.0037	6.23
22 to 23		.0046	.0042	.0050	.0057	5.28
23 to 24		.0063	.0069	.0077	.0078	4.37
24 to 25		.0092	.0100	.0123	.0114	3.59
25 to 26		.0138	.0143	.0162	.0169	3.04
26 to 27		.0199	.0225	.0244	.0252	2.53
27 to 28	2.2	.0420	.0481	.0485	.0536	1.86
28 to 29	17.4	.1292	.1648	.1428	.1740	1.13
29 to 30	15.5	.1338	.1463	.1460	.1611	1.15
30 to 31	15.9	.1330	.1367	.1448	.1477	1.17
31 to 32	12.7	.1063	.1157	.1237	.1257	1.26
32 to 33	6.7	.0671	.0705	.0757	.0785	1.56
33 to 34	4.7	.0501	.0514	.0596	.0573	1.79
34 to 35	4.2	.0487	.0419	.0522	.0484	1.92
35 to 36	4.6	.0457	.0393	.0548	.0457	1.98

**Table B. 5: Colon** (continued)

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
36 to 37	4.0	.0406	.0365	.0469	.0397	2.10
37 to 38	3.8	.0369	.0344	.0396	.0392	2.21
38 to 39	3.2	.0321	.0290	.0370	.0335	2.38
39 to 40	2.6	.0274	.0220	.0290	.0274	2.64
40 to 41	2.2	.0233	.0188	.0260	.0214	2.91
41 to 42	0.3	.0062	.0061	.0062	.0070	5.19
42 to 43		.0012	.0009	.0014	.0013	11.35
43 to 44		.0007	.0007	.0011	.0009	13.03
44 to 45		.0009	.0006	.0007	.0008	14.19

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B. 6: Eye lenses**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1		.0014	.0022	.0015	.0024	11.16
1 to 2		.0010	.0039	.0054	.0025	19.75
2 to 3		.0050	.0059	.0075	.0091	16.92
3 to 4		.0079	.0098	.0109	.0136	15.08
4 to 5		.0163	.0173	.0188	.0207	12.09
5 to 6		.0257	.0356	.0324	.0367	9.19
6 to 7	12.3	.1313	.1845	.1369	.1933	4.58
7 to 8	63.0	.4933	.7631	.5494	.7960	2.40
8 to 9	24.7	.2277	.3648	.2269	.3634	3.58
9 to 10		.0248	.0328	.0258	.0430	9.23
10 to 11		.0166	.0187	.0173	.0217	12.63
11 to 12		.0072	.0113	.0133	.0089	16.08
12 to 13		.0052	.0062	.0056	.0064	16.89
13 to 14		.0021	.0019	.0042	.0038	15.53
14 to 15		.0015	.0015	.0028	.0042	14.93
15 to 16		.0020	.0018	.0014	.0024	15.21
16 to 17		.0013	.0007	.0031	.0030	12.50
17 to 18		.0012	.0009	.0024	.0019	12.40
18 to 19		.0007	.0014	.0018	.0015	9.80
19 to 20		.0013	.0016	.0014	.0023	9.86
20 to 21		.0007	.0002	.0002	.0019	6.36
21 to 22		.0003	.0001	.0006	.0013	4.22
22 to 23		.0004	.0014	.0005	.0011	6.50
23 to 24		.0001	.0002	.0004	.0010	3.75
24 to 25		.0002	.0006	.0003	.0004	3.04
25 to 26		.0003	.0002	.0002	.0005	3.44
26 to 27		.0002	.0001	.0003	*	1.56
27 to 28		*	.0002	*	.0004	1.56
28 to 29		.0004	.0002	.0001	*	2.35
29 to 30		.0003	.0002	.0002	*	1.95
30 to 31		*	.0002	.0002	.0002	1.17
31 to 32		*	.0002	*	.0001	0.78
32 to 33		.0001	.0004	*	.0001	1.56
33 to 34		*	.0002	*	*	0.78

**Table B. 6: Eye lenses (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		*	*	.0002	*	0.78
35 to 36		*	*	*	*	0.00
36 to 37		*	*	*	*	0.00
37 to 38		*	*	.0005	.0002	0.67
38 to 39		*	*	*	*	0.00
39 to 40		*	.0002	*	*	0.39
40 to 41		.0004	.0004	*	*	1.17
41 to 42		.0006	*	*	*	0.39
42 to 43		.0003	*	*	.0002	1.17

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B. 7: Kidneys**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
2 to 3		*	*	*	.0001	16.33
3 to 4		*	*	.0001	.0001	16.42
4 to 5		.0001	.0001	.0001	.0001	16.50
5 to 6		.0001	.0001	.0002	.0001	14.12
6 to 7		.0001	.0001	.0002	.0002	13.66
7 to 8		.0001	.0001	.0002	.0002	12.16
8 to 9		.0001	.0001	.0003	.0003	10.25
9 to 10		.0002	.0002	.0004	.0004	9.00
10 to 11		.0003	.0003	.0005	.0005	7.84
11 to 12		.0004	.0004	.0006	.0006	7.11
12 to 13		.0005	.0005	.0008	.0008	6.11
13 to 14		.0006	.0007	.0010	.0009	5.44
14 to 15		.0009	.0009	.0014	.0013	4.59
15 to 16		.0013	.0013	.0020	.0019	3.90
16 to 17		.0018	.0017	.0025	.0026	3.36
17 to 18		.0024	.0022	.0032	.0033	2.97
18 to 19		.0031	.0032	.0041	.0042	2.59
19 to 20		.0042	.0041	.0054	.0056	2.26
20 to 21		.0052	.0054	.0069	.0070	1.99
21 to 22		.0073	.0073	.0093	.0094	1.72
22 to 23		.0114	.0113	.0136	.0140	1.42
23 to 24		.0170	.0168	.0207	.0202	1.17
24 to 25		.0269	.0249	.0313	.0292	0.97
25 to 26	3.2	.0585	.0471	.0667	.0556	0.72
26 to 27	22.1	.1616	.1143	.1812	.1345	0.48
27 to 28	28.0	.2078	.1475	.2291	.1705	0.43
28 to 29	25.3	.1959	.1469	.2174	.1688	0.44
29 to 30	18.6	.1462	.1165	.1616	.1336	0.49
30 to 31	2.8	.0541	.0477	.0610	.0541	0.74
31 to 32		.0259	.0243	.0289	.0275	1.00
32 to 33		.0154	.0155	.0185	.0178	1.25
33 to 34		.0097	.0096	.0119	.0115	1.55
34 to 35		.0063	.0061	.0080	.0078	1.89
35 to 36		.0045	.0043	.0058	.0057	2.24

**Table B. 7: Kidneys** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
36 to 37		.0032	.0032	.0043	.0041	2.60
37 to 38		.0023	.0023	.0032	.0031	3.02
38 to 39		.0016	.0017	.0024	.0024	3.52
39 to 40		.0012	.0012	.0018	.0018	4.16
40 to 41		.0008	.0008	.0012	.0012	4.96
41 to 42		.0004	.0004	.0006	.0007	6.92
42 to 43		.0002	.0002	.0003	.0003	9.93
43 to 44		.0002	.0002	.0002	.0002	11.79
44 to 45		.0001	.0001	.0002	.0001	14.09

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B. 8: Liver**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
1 to 2		.0001	*	.0001	.0001	9.58
2 to 3		.0001	.0001	.0001	.0001	7.46
3 to 4		.0001	.0001	.0002	.0002	6.13
4 to 5		.0002	.0002	.0002	.0002	5.29
5 to 6		.0002	.0002	.0004	.0003	4.57
6 to 7		.0003	.0003	.0004	.0004	4.04
7 to 8		.0003	.0004	.0006	.0006	3.49
8 to 9		.0005	.0005	.0007	.0008	3.01
9 to 10		.0007	.0007	.0010	.0011	2.53
10 to 11		.0010	.0010	.0013	.0014	2.21
11 to 12		.0012	.0013	.0017	.0017	1.97
12 to 13		.0017	.0017	.0023	.0023	1.69
13 to 14		.0022	.0023	.0030	.0030	1.48
14 to 15		.0031	.0032	.0042	.0042	1.24
15 to 16		.0042	.0046	.0057	.0058	1.06
16 to 17		.0058	.0062	.0076	.0078	0.92
17 to 18		.0082	.0085	.0103	.0105	0.79
18 to 19		.0112	.0118	.0138	.0142	0.68
19 to 20		.0155	.0169	.0188	.0198	0.58
20 to 21	0.1	.0227	.0248	.0262	.0284	0.49
21 to 22	4.4	.0564	.0653	.0637	.0724	0.32
22 to 23	19.3	.1343	.1622	.1528	.1783	0.22
23 to 24	20.4	.1492	.1785	.1684	.1961	0.20
24 to 25	17.0	.1369	.1591	.1542	.1743	0.22
25 to 26	17.5	.1352	.1579	.1519	.1722	0.22
26 to 27	10.6	.0994	.1134	.1107	.1239	0.25
27 to 28	6.6	.0704	.0769	.0790	.0842	0.30
28 to 29	3.9	.0467	.0495	.0524	.0547	0.36
29 to 30	0.3	.0190	.0195	.0220	.0222	0.54
30 to 31		.0111	.0113	.0133	.0132	0.69
31 to 32		.0072	.0073	.0088	.0089	0.85
32 to 33		.0046	.0047	.0058	.0059	1.04
33 to 34		.0029	.0030	.0038	.0039	1.28
34 to 35		.0020	.0021	.0027	.0027	1.54

**Table B. 8: Liver** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
35 to 36		.0016	.0016	.0022	.0022	1.73
36 to 37		.0013	.0013	.0017	.0018	1.93
37 to 38		.0010	.0010	.0014	.0014	2.17
38 to 39		.0008	.0008	.0011	.0012	2.43
39 to 40		.0006	.0006	.0009	.0009	2.76
40 to 41		.0004	.0004	.0006	.0006	3.40
41 to 42		.0002	.0002	.0003	.0004	4.49
42 to 43		.0001	.0001	.0002	.0002	6.26
43 to 44		.0001	.0001	.0001	.0001	7.45
44 to 45		*	.0001	.0001	.0001	9.42

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B. 9: Lungs**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1		.0001	.0001	.0001	.0001	12.75
1 to 2		.0002	.0002	.0003	.0003	8.75
2 to 3		.0003	.0003	.0004	.0004	6.98
3 to 4		.0004	.0004	.0006	.0007	5.87
4 to 5		.0005	.0006	.0009	.0009	4.91
5 to 6		.0007	.0008	.0012	.0012	4.27
6 to 7		.0010	.0010	.0015	.0015	3.68
7 to 8		.0014	.0014	.0021	.0021	3.14
8 to 9		.0021	.0019	.0028	.0028	2.67
9 to 10		.0031	.0030	.0041	.0042	2.21
10 to 11		.0045	.0045	.0057	.0057	1.89
11 to 12		.0063	.0062	.0078	.0078	1.61
12 to 13		.0094	.0099	.0116	.0119	1.32
13 to 14		.0137	.0146	.0165	.0171	1.11
14 to 15		.0213	.0228	.0253	.0267	0.89
15 to 16	5.2	.0502	.0561	.0594	.0638	0.63
16 to 17	11.1	.0826	.0894	.0959	.1010	0.51
17 to 18	15.1	.1077	.1171	.1243	.1330	0.45
18 to 19	16.9	.1214	.1298	.1386	.1454	0.43
19 to 20	17.1	.1254	.1330	.1424	.1495	0.43
20 to 21	16.8	.1323	.1424	.1484	.1552	0.41
21 to 22	13.5	.1101	.1170	.1232	.1281	0.45
22 to 23	4.0	.0550	.0523	.0613	.0592	0.62
23 to 24	0.2	.0244	.0244	.0286	.0282	0.85
24 to 25		.0157	.0161	.0187	.0187	1.03
25 to 26		.0105	.0109	.0130	.0130	1.23
26 to 27		.0074	.0075	.0093	.0093	1.47
27 to 28		.0052	.0054	.0067	.0066	1.73
28 to 29		.0037	.0038	.0048	.0048	2.05
29 to 30		.0026	.0026	.0035	.0036	2.40
30 to 31		.0018	.0019	.0026	.0025	2.80
31 to 32		.0013	.0012	.0018	.0019	3.40
32 to 33		.0009	.0009	.0013	.0012	4.03
33 to 34		.0006	.0006	.0009	.0009	4.84

**Table B. 9: Lungs** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0004	.0004	.0007	.0007	5.69
35 to 36		.0003	.0003	.0005	.0005	6.46
36 to 37		.0003	.0003	.0005	.0005	6.94
37 to 38		.0002	.0002	.0004	.0004	7.85
38 to 39		.0002	.0002	.0003	.0003	8.59
39 to 40		.0002	.0002	.0003	.0002	9.69
40 to 41		.0001	.0001	.0002	.0001	11.59
41 to 42		.0001	*	.0001	.0001	14.33
42 to 43		*	*	.0001	*	16.76

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.10: Oesophagus**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1		.0001	*	.0002	.0002	1.00
1 to 2		.0004	.0002	.0004	.0003	1.01
2 to 3		.0004	.0003	.0007	.0008	1.00
3 to 4		.0006	.0004	.0009	.0011	1.00
4 to 5		.0010	.0009	.0012	.0013	1.01
5 to 6		.0014	.0013	.0022	.0016	1.01
6 to 7		.0018	.0018	.0028	.0026	0.99
7 to 8		.0023	.0024	.0040	.0035	1.08
8 to 9		.0037	.0032	.0050	.0050	1.14
9 to 10		.0056	.0052	.0073	.0076	1.18
10 to 11		.0096	.0086	.0114	.0107	1.18
11 to 12		.0143	.0128	.0179	.0166	1.18
12 to 13	5.4	.0424	.0442	.0509	.0506	1.10
13 to 14	8.9	.0646	.0696	.0747	.0833	1.08
14 to 15	8.9	.0623	.0685	.0736	.0831	1.03
15 to 16	8.9	.0630	.0691	.0765	.0810	1.00
16 to 17	8.9	.0643	.0670	.0765	.0804	0.95
17 to 18	8.9	.0649	.0672	.0779	.0783	0.91
18 to 19	8.9	.0654	.0669	.0798	.0798	0.89
19 to 20	8.9	.0647	.0664	.0782	.0798	0.90
20 to 21	8.9	.0697	.0706	.0812	.0827	0.94
21 to 22	8.9	.0672	.0665	.0776	.0789	0.99
22 to 23	8.9	.0600	.0599	.0734	.0711	1.04
23 to 24	5.4	.0391	.0398	.0501	.0503	1.08
24 to 25		.0167	.0170	.0211	.0200	1.12
25 to 26		.0118	.0116	.0132	.0147	1.17
26 to 27		.0080	.0074	.0099	.0099	1.18
27 to 28		.0058	.0054	.0069	.0072	1.15
28 to 29		.0037	.0038	.0051	.0052	1.12
29 to 30		.0024	.0027	.0035	.0037	1.07
30 to 31		.0013	.0019	.0023	.0025	1.01
31 to 32		.0011	.0016	.0017	.0017	0.93
32 to 33		.0008	.0010	.0014	.0014	0.83
33 to 34		.0005	.0006	.0008	.0008	0.71

**Table B.10: Oesophagus** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0004	.0004	.0006	.0004	0.59
35 to 36		.0002	.0003	.0004	.0004	0.47
36 to 37		.0002	.0004	.0003	.0006	0.38
37 to 38		.0002	.0002	.0002	.0004	0.29
38 to 39		.0002	.0002	.0002	.0003	0.23
39 to 40		.0001	.0002	.0002	.0002	0.20
40 to 41		*	.0001	.0002	.0001	0.20
41 to 42		.0001	*	.0001	.0001	0.18
42 to 43		*	.0001	.0001	.0001	0.18

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.11: Ovaries**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
9 to 10		*	*	.0001	.0002	1.17
10 to 11		*	*	*	.0002	0.78
11 to 12		.0003	.0001	.0002	.0003	2.31
12 to 13		*	*	.0005	.0006	3.43
13 to 14		.0002	.0002	.0003	*	3.13
14 to 15		*	.0003	.0001	.0002	3.52
15 to 16		.0005	.0005	.0005	.0002	6.52
16 to 17		.0006	.0003	.0008	.0008	7.24
17 to 18		.0003	.0005	.0008	.0013	8.83
18 to 19		.0008	.0007	.0007	.0010	9.93
19 to 20		.0006	.0010	.0009	.0017	13.68
20 to 21		.0008	.0007	.0032	.0008	14.06
21 to 22		.0014	.0008	.0013	.0015	14.81
22 to 23		.0015	.0018	.0015	.0020	16.78
23 to 24		.0024	.0031	.0036	.0042	17.36
24 to 25		.0031	.0036	.0034	.0043	18.10
25 to 26		.0043	.0037	.0073	.0061	16.32
26 to 27		.0073	.0069	.0087	.0087	14.29
27 to 28		.0068	.0110	.0128	.0152	12.34
28 to 29		.0143	.0142	.0157	.0197	10.42
29 to 30		.0191	.0214	.0257	.0233	8.83
30 to 31		.0352	.0351	.0326	.0347	7.14
31 to 32		.0487	.0500	.0530	.0535	5.81
32 to 33		.0792	.0882	.0885	.0936	4.65
33 to 34	100.0	.5463	.6695	.6272	.7282	1.95
34 to 35		.0975	.1030	.1064	.1169	4.29
35 to 36		.0466	.0498	.0492	.0602	6.04
36 to 37		.0289	.0293	.0331	.0348	7.45
37 to 38		.0194	.0181	.0194	.0224	9.31
38 to 39		.0119	.0112	.0154	.0154	12.14
39 to 40		.0107	.0105	.0091	.0122	13.31
40 to 41		.0043	.0043	.0060	.0060	17.30
41 to 42		.0017	.0033	.0027	.0018	16.44
42 to 43		.0009	.0013	.0014	.0012	12.35
43 to 44		.0003	.0007	.0005	.0008	7.91
44 to 45		.0002	.0006	.0002	.0004	4.58

**Table B.12: Pancreas**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
1 to 2		*	*	.0001	.0001	5.76
2 to 3		.0001	*	.0001	.0001	8.09
3 to 4		.0001	.0001	.0002	.0001	10.26
4 to 5		.0001	.0001	.0002	.0002	11.12
5 to 6		.0002	.0002	.0001	.0003	14.47
6 to 7		.0002	.0002	.0002	.0004	16.83
7 to 8		.0002	.0002	.0005	.0005	16.96
8 to 9		.0002	.0004	.0005	.0005	17.42
9 to 10		.0004	.0004	.0006	.0004	17.01
10 to 11		.0005	.0005	.0007	.0009	16.75
11 to 12		.0007	.0007	.0009	.0011	14.69
12 to 13		.0010	.0008	.0013	.0011	13.81
13 to 14		.0010	.0012	.0017	.0014	12.63
14 to 15		.0015	.0019	.0026	.0023	9.87
15 to 16		.0025	.0025	.0029	.0030	8.52
16 to 17		.0033	.0033	.0046	.0047	7.30
17 to 18		.0044	.0039	.0060	.0062	6.33
18 to 19		.0062	.0062	.0083	.0082	5.47
19 to 20		.0087	.0085	.0104	.0103	4.65
20 to 21		.0104	.0108	.0126	.0138	4.19
21 to 22		.0167	.0163	.0192	.0188	3.49
22 to 23		.0230	.0247	.0275	.0306	2.87
23 to 24		.0371	.0393	.0412	.0459	2.34
24 to 25		.0596	.0648	.0679	.0727	1.88
25 to 26	36.4	.2286	.2484	.2642	.2822	1.09
26 to 27	63.6	.3403	.3706	.3984	.4159	0.90
27 to 28		.0702	.0736	.0753	.0814	1.79
28 to 29		.0441	.0453	.0486	.0483	2.22
29 to 30		.0273	.0282	.0320	.0335	2.73
30 to 31		.0177	.0177	.0208	.0209	3.38
31 to 32		.0118	.0125	.0138	.0140	4.02
32 to 33		.0071	.0086	.0096	.0095	4.97
33 to 34		.0050	.0055	.0060	.0061	6.02
34 to 35		.0037	.0035	.0046	.0040	7.07

**Table B.12: Pancreas** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
35 to 36		.0024	.0027	.0030	.0030	8.53
36 to 37		.0019	.0018	.0026	.0028	10.00
37 to 38		.0012	.0012	.0017	.0018	11.71
38 to 39		.0009	.0010	.0016	.0019	12.54
39 to 40		.0008	.0006	.0013	.0011	15.08
40 to 41		.0006	.0005	.0010	.0008	16.37
41 to 42		.0004	.0004	.0007	.0005	16.83
42 to 43		.0001	.0002	.0004	.0003	13.22
43 to 44		.0001	.0001	.0002	.0001	13.13
44 to 45		.0002	.0001	.0001	.0001	11.73

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.13: Red bone marrow in the arm bones**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1		.0001	*	*	*	14.14
1 to 2		.0001	.0001	.0001	.0001	18.33
2 to 3		.0001	.0001	.0002	.0002	16.65
3 to 4		.0002	.0002	.0003	.0003	13.51
4 to 5		.0002	.0002	.0004	.0005	11.81
5 to 6		.0004	.0003	.0004	.0006	10.41
6 to 7		.0004	.0004	.0006	.0007	9.52
7 to 8		.0004	.0005	.0008	.0009	8.64
8 to 9		.0008	.0006	.0011	.0010	7.34
9 to 10		.0009	.0009	.0014	.0014	6.55
10 to 11		.0013	.0013	.0018	.0018	5.61
11 to 12		.0015	.0017	.0022	.0021	5.16
12 to 13		.0028	.0028	.0038	.0039	3.92
13 to 14		.0064	.0067	.0080	.0077	2.72
14 to 15	6.1	.0349	.0349	.0418	.0430	1.33
15 to 16	9.0	.0504	.0515	.0636	.0650	1.08
16 to 17	12.5	.0650	.0684	.0821	.0857	0.96
17 to 18	7.9	.0484	.0494	.0602	.0606	1.10
18 to 19	4.3	.0319	.0314	.0405	.0390	1.32
19 to 20	4.8	.0343	.0329	.0439	.0411	1.29
20 to 21	8.5	.0559	.0488	.0665	.0610	1.08
21 to 22	4.8	.0364	.0325	.0433	.0394	1.31
22 to 23	4.8	.0345	.0287	.0423	.0342	1.37
23 to 24	5.6	.0370	.0324	.0447	.0406	1.30
24 to 25	3.2	.0244	.0234	.0301	.0284	1.54
25 to 26	2.9	.0228	.0225	.0269	.0277	1.58
26 to 27	4.8	.0321	.0335	.0389	.0404	1.35
27 to 28	4.8	.0319	.0336	.0376	.0408	1.36
28 to 29	0.2	.0061	.0067	.0075	.0080	2.77
29 to 30	3.2	.0221	.0255	.0267	.0298	1.59
30 to 31	4.2	.0288	.0322	.0343	.0379	1.40
31 to 32	2.7	.0194	.0223	.0232	.0261	1.70
32 to 33	4.3	.0281	.0322	.0342	.0363	1.44
33 to 34	1.3	.0094	.0106	.0119	.0126	2.45

**Table B.13: Red bone marrow in the arm bones (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35	0.1	.0019	.0018	.0022	.0022	5.19
35 to 36		.0011	.0012	.0014	.0013	6.28
36 to 37		.0010	.0010	.0014	.0012	6.56
37 to 38		.0007	.0008	.0010	.0012	7.38
38 to 39		.0006	.0006	.0009	.0009	8.18
39 to 40		.0005	.0005	.0006	.0007	9.27
40 to 41		.0004	.0003	.0005	.0006	10.77
41 to 42		.0002	.0002	.0003	.0003	14.39
42 to 43		.0001	.0002	.0002	.0002	17.76
43 to 44		.0001	.0001	.0001	.0001	17.76
44 to 45		*	*	.0001	.0001	13.83

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.14: Red bone marrow in the clavicles**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1		.0001	.0002	.0003	.0002	11.35
1 to 2		.0002	.0003	.0008	.0007	15.62
2 to 3		.0007	.0006	.0009	.0009	16.14
3 to 4		.0007	.0008	.0013	.0012	16.37
4 to 5		.0014	.0009	.0027	.0015	15.04
5 to 6		.0014	.0016	.0026	.0028	14.23
6 to 7		.0025	.0025	.0042	.0040	11.18
7 to 8		.0033	.0040	.0056	.0054	9.99
8 to 9		.0049	.0057	.0068	.0080	8.34
9 to 10		.0082	.0074	.0119	.0113	6.81
10 to 11		.0124	.0136	.0154	.0151	5.59
11 to 12		.0201	.0197	.0235	.0248	4.57
12 to 13	6.6	.0549	.0594	.0728	.0719	2.94
13 to 14	24.9	.1397	.1743	.1778	.2088	1.86
14 to 15	67.7	.2857	.3713	.3572	.4610	1.33
15 to 16	0.8	.0415	.0463	.0490	.0591	3.19
16 to 17		.0228	.0262	.0295	.0312	4.16
17 to 18		.0141	.0151	.0190	.0203	5.12
18 to 19		.0097	.0098	.0133	.0145	6.17
19 to 20		.0077	.0072	.0101	.0098	6.97
20 to 21		.0049	.0055	.0077	.0072	8.34
21 to 22		.0035	.0034	.0052	.0043	9.92
22 to 23		.0031	.0031	.0042	.0043	10.52
23 to 24		.0024	.0025	.0032	.0033	12.24
24 to 25		.0017	.0017	.0025	.0023	13.96
25 to 26		.0014	.0015	.0023	.0019	14.85
26 to 27		.0009	.0010	.0015	.0015	17.27
27 to 28		.0004	.0008	.0009	.0011	18.07
28 to 29		.0005	.0005	.0009	.0010	17.45
29 to 30		.0004	.0004	.0007	.0005	17.61
30 to 31		.0003	.0003	.0005	.0007	14.30
31 to 32		.0003	.0002	.0005	.0002	12.80
32 to 33		.0001	.0002	.0001	.0002	4.95
33 to 34		.0001	.0001	.0001	.0001	7.42

**Table B.14: Red bone marrow in the clavicles (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0001	.0002	.0003	*	6.82
35 to 36		.0001	*	.0001	.0004	5.08
36 to 37		.0001	*	.0002	.0001	3.76
37 to 38		*	*	*	.0001	3.13
38 to 39		*	.0001	*	*	2.24
39 to 40		*	*	*	.0001	1.56
40 to 41		*	*	.0001	.0001	1.85

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.15: Red bone marrow in the cranium**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1	6.7	.0379	.0358	.0468	.0443	0.66
1 to 2	6.9	.0428	.0399	.0526	.0493	0.60
2 to 3	6.5	.0430	.0434	.0531	.0538	0.58
3 to 4	6.2	.0428	.0443	.0542	.0538	0.57
4 to 5	6.0	.0443	.0451	.0554	.0558	0.56
5 to 6	7.2	.0505	.0533	.0635	.0665	0.52
6 to 7	10.2	.0620	.0680	.0785	.0852	0.47
7 to 8	10.4	.0612	.0584	.0792	.0767	0.49
8 to 9	22.0	.0881	.0895	.1182	.1204	0.41
9 to 10	18.1	.0709	.0744	.0958	.0998	0.45
10 to 11		.0154	.0157	.0206	.0207	0.87
11 to 12		.0089	.0090	.0120	.0124	1.11
12 to 13		.0057	.0060	.0080	.0082	1.35
13 to 14		.0037	.0039	.0050	.0055	1.66
14 to 15		.0028	.0030	.0039	.0042	1.86
15 to 16		.0022	.0023	.0031	.0032	2.13
16 to 17		.0016	.0017	.0024	.0025	2.43
17 to 18		.0012	.0013	.0019	.0019	2.76
18 to 19		.0009	.0009	.0014	.0015	3.21
19 to 20		.0007	.0007	.0011	.0012	3.67
20 to 21		.0005	.0005	.0008	.0008	4.42
21 to 22		.0003	.0004	.0006	.0006	5.05
22 to 23		.0003	.0003	.0005	.0005	5.34
23 to 24		.0002	.0003	.0004	.0004	6.02
24 to 25		.0002	.0002	.0003	.0003	6.59
25 to 26		.0002	.0002	.0003	.0003	7.40
26 to 27		.0001	.0001	.0002	.0002	8.66
27 to 28		.0001	.0001	.0002	.0002	10.30
28 to 29		.0001	.0001	.0001	.0001	11.27
29 to 30		.0001	.0001	.0001	.0001	12.16
30 to 31		*	*	.0001	.0001	14.96
31 to 32		*	*	.0001	.0001	16.16

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.16: Red bone marrow in the leg bones**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
15 to 16		*	*	.0001	.0001	17.33
16 to 17		.0001	*	.0001	.0001	16.18
17 to 18		.0001	.0001	.0001	.0001	17.22
18 to 19		.0001	.0001	.0001	.0001	17.44
19 to 20		.0001	.0001	.0001	.0002	15.53
20 to 21		.0001	.0001	.0001	.0002	15.50
21 to 22		.0001	.0001	.0002	.0002	13.46
22 to 23		.0002	.0002	.0003	.0003	11.66
23 to 24		.0002	.0003	.0003	.0004	10.09
24 to 25		.0003	.0003	.0005	.0004	8.86
25 to 26		.0003	.0004	.0006	.0006	7.93
26 to 27		.0005	.0004	.0008	.0007	6.93
27 to 28		.0006	.0006	.0009	.0010	6.24
28 to 29		.0008	.0008	.0011	.0012	5.62
29 to 30		.0011	.0011	.0014	.0015	4.74
30 to 31		.0013	.0013	.0019	.0020	4.24
31 to 32		.0017	.0017	.0025	.0024	3.74
32 to 33		.0024	.0023	.0034	.0034	3.22
33 to 34		.0034	.0034	.0043	.0044	2.75
34 to 35		.0055	.0057	.0073	.0069	2.20
35 to 36	1.1	.0145	.0141	.0179	.0174	1.47
36 to 37	10.5	.0521	.0515	.0668	.0637	0.84
37 to 38	12.1	.0627	.0614	.0796	.0773	0.76
38 to 39	10.4	.0626	.0620	.0769	.0784	0.76
39 to 40	5.4	.0406	.0417	.0503	.0509	0.92
40 to 41	3.4	.0306	.0338	.0373	.0411	1.03
41 to 42	7.5	.0490	.0536	.0609	.0659	0.85
42 to 43	7.5	.0509	.0526	.0615	.0628	0.85
43 to 44	3.4	.0282	.0288	.0347	.0351	1.11
44 to 45	3.4	.0279	.0287	.0345	.0342	1.11

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.17: Red bone marrow in the mandible**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1		.0003	.0003	.0007	.0005	15.45
1 to 2		.0009	.0009	.0014	.0014	10.91
2 to 3		.0014	.0014	.0022	.0024	8.45
3 to 4		.0021	.0024	.0033	.0038	6.93
4 to 5		.0030	.0034	.0044	.0050	6.01
5 to 6		.0050	.0048	.0073	.0070	4.94
6 to 7		.0063	.0075	.0099	.0110	4.12
7 to 8		.0104	.0120	.0131	.0154	3.38
8 to 9		.0154	.0196	.0230	.0267	2.65
9 to 10	20.0	.0982	.1375	.1285	.1711	1.24
10 to 11	17.5	.1042	.1241	.1293	.1505	1.24
11 to 12	39.5	.1882	.2469	.2348	.3061	0.93
12 to 13	22.9	.1237	.1782	.1550	.2120	1.12
13 to 14		.0139	.0169	.0178	.0210	2.97
14 to 15		.0096	.0116	.0133	.0135	3.52
15 to 16		.0076	.0091	.0111	.0120	3.86
16 to 17		.0060	.0078	.0083	.0090	4.37
17 to 18		.0044	.0060	.0065	.0075	4.93
18 to 19		.0036	.0040	.0047	.0048	5.72
19 to 20		.0026	.0028	.0039	.0043	6.52
20 to 21		.0019	.0022	.0027	.0029	7.72
21 to 22		.0015	.0015	.0023	.0023	8.72
22 to 23		.0011	.0011	.0019	.0019	9.87
23 to 24		.0009	.0011	.0015	.0018	10.54
24 to 25		.0007	.0007	.0010	.0011	12.92
25 to 26		.0005	.0007	.0008	.0010	14.18
26 to 27		.0004	.0004	.0008	.0010	15.29
27 to 28		.0003	.0003	.0006	.0004	17.71
28 to 29		.0002	.0003	.0003	.0004	17.51
29 to 30		.0001	.0001	.0003	.0003	16.18
30 to 31		.0001	.0001	.0002	.0002	15.96
31 to 32		.0001	.0001	.0002	.0002	12.98
32 to 33		.0001	.0001	*	.0001	12.99
33 to 34		*	*	.0001	*	9.04

**Table B.17: Red bone marrow in the mandible** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0001	*	*	.0001	5.68
35 to 36		*	*	.0001	.0001	7.82
36 to 37		*	*	.0001	.0001	6.04
37 to 38		*	*	.0001	*	6.53
38 to 39		*	*	*	.0001	3.13
39 to 40		*	*	.0001	*	4.96
40 to 41		*	*	*	*	3.91
41 to 42		*	*	*	*	1.56
42 to 43		*	*	*	*	2.34
43 to 44		*	*	*	*	0.78
44 to 45		*	*	*	.0001	2.34

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.18: Red bone marrow in the pelvis**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
5 to 6		*	*	*	.0001	4.57
6 to 7		*	*	*	*	6.11
7 to 8		*	*	*	*	5.72
8 to 9		*	*	.0001	*	10.07
9 to 10		*	*	.0001	.0001	9.80
10 to 11		*	*	.0001	.0001	12.58
11 to 12		*	*	.0001	.0001	12.80
12 to 13		.0001	*	.0002	.0001	16.54
13 to 14		.0001	.0001	.0001	.0001	14.89
14 to 15		.0001	.0001	.0001	.0002	15.99
15 to 16		.0001	.0001	.0002	.0002	17.24
16 to 17		.0002	.0001	.0003	.0003	16.28
17 to 18		.0002	.0002	.0005	.0004	14.44
18 to 19		.0003	.0003	.0005	.0006	13.98
19 to 20		.0003	.0004	.0007	.0007	12.67
20 to 21		.0004	.0006	.0008	.0009	11.38
21 to 22		.0006	.0006	.0011	.0011	9.78
22 to 23		.0009	.0009	.0014	.0015	8.32
23 to 24		.0012	.0013	.0020	.0021	6.95
24 to 25		.0018	.0019	.0025	.0027	6.13
25 to 26		.0026	.0026	.0034	.0040	5.11
26 to 27		.0034	.0034	.0050	.0045	4.47
27 to 28		.0046	.0048	.0065	.0064	3.87
28 to 29		.0064	.0068	.0091	.0091	3.29
29 to 30		.0098	.0095	.0141	.0133	2.74
30 to 31		.0160	.0148	.0209	.0194	2.24
31 to 32	1.7	.0312	.0284	.0402	.0363	1.71
32 to 33	20.7	.1084	.0941	.1382	.1219	1.01
33 to 34	33.0	.1580	.1466	.2015	.1851	0.84
34 to 35	18.3	.1076	.1118	.1391	.1382	0.97
35 to 36	12.4	.0794	.0816	.0981	.1016	1.12
36 to 37	12.4	.0690	.0654	.0882	.0838	1.23
37 to 38	1.4	.0224	.0220	.0295	.0289	1.96
38 to 39		.0110	.0108	.0149	.0140	2.64

**Table B.18: Red bone marrow in the pelvis (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
39 to 40		.0075	.0071	.0097	.0091	3.25
40 to 41		.0042	.0042	.0060	.0057	4.10
41 to 42		.0022	.0022	.0029	.0031	5.77
42 to 43		.0007	.0007	.0011	.0011	9.99
43 to 44		.0005	.0005	.0007	.0007	11.82
44 to 45		.0005	.0005	.0007	.0006	12.72

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.19: Red bone marrow in the ribs**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1		*	*	.0001	.0001	16.18
1 to 2		.0001	.0001	.0002	.0002	16.18
2 to 3		.0002	.0001	.0003	.0003	13.47
3 to 4		.0002	.0002	.0005	.0004	11.40
4 to 5		.0003	.0003	.0005	.0005	10.38
5 to 6		.0004	.0004	.0007	.0006	8.93
6 to 7		.0005	.0005	.0010	.0010	7.64
7 to 8		.0009	.0008	.0012	.0012	6.21
8 to 9		.0010	.0010	.0017	.0016	5.41
9 to 10		.0016	.0017	.0023	.0025	4.46
10 to 11		.0024	.0022	.0032	.0034	3.83
11 to 12		.0033	.0033	.0047	.0046	3.27
12 to 13		.0054	.0053	.0076	.0073	2.59
13 to 14		.0083	.0081	.0109	.0109	2.16
14 to 15	2.3	.0198	.0182	.0260	.0245	1.53
15 to 16	8.2	.0410	.0390	.0543	.0506	1.11
16 to 17	10.5	.0533	.0486	.0698	.0628	1.00
17 to 18	10.5	.0575	.0548	.0749	.0711	0.94
18 to 19	12.5	.0679	.0651	.0869	.0815	0.88
19 to 20	14.8	.0782	.0708	.0998	.0916	0.84
20 to 21	12.3	.0738	.0657	.0913	.0858	0.86
21 to 22	10.5	.0644	.0581	.0806	.0739	0.92
22 to 23	8.3	.0522	.0466	.0646	.0596	1.01
23 to 24	5.0	.0349	.0295	.0457	.0372	1.23
24 to 25	2.8	.0234	.0177	.0291	.0231	1.52
25 to 26	1.8	.0162	.0114	.0202	.0154	1.82
26 to 27	0.4	.0080	.0068	.0107	.0087	2.34
27 to 28		.0040	.0039	.0058	.0052	2.99
28 to 29		.0028	.0026	.0038	.0037	3.65
29 to 30		.0019	.0018	.0030	.0027	4.21
30 to 31		.0014	.0014	.0018	.0020	4.98
31 to 32		.0010	.0009	.0013	.0013	5.97
32 to 33		.0006	.0006	.0010	.0010	7.05
33 to 34		.0004	.0004	.0006	.0007	9.01

**Table B.19: Red bone marrow in the ribs (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0003	.0003	.0004	.0005	10.67
35 to 36		.0003	.0002	.0004	.0004	11.59
36 to 37		.0002	.0002	.0003	.0003	13.10
37 to 38		.0002	.0002	.0003	.0003	14.06
38 to 39		.0001	.0002	.0003	.0002	14.35
39 to 40		.0001	.0001	.0002	.0001	16.50
40 to 41		.0001	.0001	.0001	.0001	17.85
41 to 42		*	*	*	.0001	16.09
42 to 43		*	*	*	*	9.83
43 to 44		*	*	.0001	*	10.26

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.20: Red bone marrow in the scapulae**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1		.0002	.0001	.0001	.0002	12.31
1 to 2		.0002	.0002	.0002	.0003	18.44
2 to 3		.0004	.0002	.0005	.0005	17.89
3 to 4		.0005	.0005	.0006	.0009	14.32
4 to 5		.0006	.0007	.0011	.0010	13.76
5 to 6		.0010	.0007	.0015	.0016	11.11
6 to 7		.0011	.0013	.0018	.0019	9.59
7 to 8		.0017	.0016	.0028	.0027	8.25
8 to 9		.0025	.0022	.0031	.0036	7.07
9 to 10		.0034	.0032	.0056	.0043	6.08
10 to 11		.0047	.0042	.0068	.0070	5.19
11 to 12		.0073	.0061	.0097	.0092	4.28
12 to 13		.0153	.0136	.0191	.0171	3.12
13 to 14	4.7	.0493	.0393	.0605	.0490	1.93
14 to 15	32.9	.1474	.1022	.1882	.1392	1.22
15 to 16	31.6	.1471	.1024	.1855	.1398	1.21
16 to 17	18.8	.1004	.0680	.1249	.0943	1.44
17 to 18	10.2	.0614	.0417	.0761	.0572	1.82
18 to 19	1.8	.0234	.0179	.0296	.0267	2.65
19 to 20		.0102	.0094	.0144	.0132	3.59
20 to 21		.0063	.0066	.0098	.0092	4.36
21 to 22		.0045	.0047	.0065	.0071	5.10
22 to 23		.0034	.0035	.0052	.0048	5.76
23 to 24		.0025	.0025	.0040	.0040	6.56
24 to 25		.0019	.0017	.0030	.0031	7.64
25 to 26		.0012	.0016	.0026	.0021	8.87
26 to 27		.0010	.0011	.0016	.0019	10.24
27 to 28		.0008	.0007	.0012	.0009	12.67
28 to 29		.0007	.0005	.0009	.0011	13.53
29 to 30		.0003	.0005	.0005	.0009	16.43
30 to 31		.0002	.0003	.0005	.0005	16.49
31 to 32		.0002	.0003	.0004	.0003	15.92
32 to 33		.0001	.0002	.0003	.0002	18.51
33 to 34		.0001	*	.0002	.0001	14.50

**Table B.20: Red bone marrow in the scapulae (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		*	*	.0001	.0001	9.54
35 to 36		*	.0001	.0001	.0001	11.07
36 to 37		.0001	*	.0001	.0001	7.47
37 to 38		*	*	.0001	.0001	7.91
38 to 39		*	.0001	.0001	.0001	7.59
39 to 40		*	.0001	.0001	.0001	10.05
40 to 41		*	*	.0001	*	6.17

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.21: Red bone marrow in the cervical spine**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1		.0004	.0003	.0006	.0008	17.40
1 to 2		.0010	.0009	.0011	.0015	13.78
2 to 3		.0015	.0016	.0029	.0022	10.74
3 to 4		.0021	.0026	.0034	.0030	9.00
4 to 5		.0037	.0031	.0052	.0052	7.64
5 to 6		.0052	.0047	.0071	.0062	6.23
6 to 7		.0069	.0060	.0100	.0090	5.42
7 to 8		.0111	.0086	.0147	.0142	4.47
8 to 9		.0159	.0120	.0232	.0202	3.72
9 to 10		.0316	.0232	.0419	.0360	2.75
10 to 11	37.4	.1633	.1171	.2089	.1559	1.45
11 to 12	45.2	.1997	.1445	.2547	.1941	1.32
12 to 13	17.3	.0940	.0791	.1212	.1044	1.77
13 to 14		.0254	.0252	.0327	.0330	2.92
14 to 15		.0156	.0157	.0211	.0208	3.61
15 to 16		.0096	.0101	.0132	.0140	4.51
16 to 17		.0067	.0076	.0092	.0088	5.33
17 to 18		.0040	.0041	.0066	.0065	6.53
18 to 19		.0033	.0034	.0044	.0049	7.62
19 to 20		.0021	.0029	.0042	.0046	8.53
20 to 21		.0016	.0017	.0027	.0029	10.11
21 to 22		.0014	.0012	.0024	.0022	11.10
22 to 23		.0011	.0015	.0020	.0017	12.23
23 to 24		.0010	.0010	.0011	.0014	14.31
24 to 25		.0009	.0006	.0012	.0009	14.84
25 to 26		.0004	.0006	.0010	.0012	16.52
26 to 27		.0004	.0004	.0007	.0007	16.62
27 to 28		.0002	.0003	.0007	.0004	15.57
28 to 29		.0003	.0002	.0006	.0004	17.00
29 to 30		.0002	.0002	.0002	.0005	15.04
30 to 31		.0001	.0001	.0003	.0004	15.54
31 to 32		.0001	.0002	.0001	.0001	11.25
32 to 33		.0001	.0001	.0001	*	7.01
33 to 34		*	*	.0001	.0001	5.64
34 to 35		*	*	*	*	4.24
35 to 36		*	*	*	*	3.52

**Table B.22: Red bone marrow in the thoracic spine**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1		.0001	*	.0001	.0002	16.28
1 to 2		.0001	.0001	.0002	.0003	14.13
2 to 3		.0002	.0002	.0003	.0004	12.12
3 to 4		.0003	.0003	.0005	.0005	10.31
4 to 5		.0005	.0004	.0008	.0007	8.88
5 to 6		.0005	.0005	.0010	.0010	7.57
6 to 7		.0008	.0009	.0015	.0013	6.13
7 to 8		.0011	.0011	.0020	.0019	5.33
8 to 9		.0018	.0016	.0028	.0027	4.41
9 to 10		.0027	.0024	.0042	.0037	3.66
10 to 11		.0042	.0039	.0061	.0056	3.01
11 to 12		.0072	.0061	.0096	.0088	2.44
12 to 13	4.5	.0260	.0218	.0341	.0293	1.45
13 to 14	7.8	.0400	.0348	.0539	.0473	1.18
14 to 15	8.9	.0430	.0344	.0571	.0455	1.16
15 to 16	8.3	.0416	.0314	.0550	.0432	1.18
16 to 17	6.9	.0379	.0291	.0505	.0404	1.23
17 to 18	7.7	.0401	.0298	.0533	.0420	1.21
18 to 19	6.8	.0382	.0285	.0512	.0398	1.23
19 to 20	7.7	.0413	.0292	.0537	.0405	1.21
20 to 21	6.4	.0386	.0295	.0512	.0402	1.23
21 to 22	6.1	.0363	.0262	.0476	.0368	1.28
22 to 23	5.4	.0328	.0219	.0436	.0302	1.35
23 to 24	5.8	.0318	.0217	.0439	.0305	1.36
24 to 25	4.9	.0290	.0197	.0398	.0275	1.43
25 to 26	6.1	.0305	.0201	.0410	.0281	1.43
26 to 27	5.0	.0262	.0170	.0348	.0244	1.54
27 to 28	1.7	.0130	.0098	.0176	.0139	2.03
28 to 29		.0049	.0049	.0073	.0065	2.80
29 to 30		.0032	.0031	.0048	.0044	3.42
30 to 31		.0021	.0021	.0033	.0031	4.11
31 to 32		.0016	.0014	.0021	.0021	4.91
32 to 33		.0010	.0009	.0014	.0014	5.94
33 to 34		.0006	.0006	.0009	.0009	7.45

**Table B.22: Red bone marrow in the thoracic spine (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0005	.0005	.0005	.0006	8.89
35 to 36		.0003	.0003	.0005	.0005	10.50
36 to 37		.0002	.0002	.0004	.0004	11.55
37 to 38		.0002	.0002	.0003	.0003	12.23
38 to 39		.0001	.0001	.0002	.0003	15.07
39 to 40		.0001	.0001	.0002	.0002	16.62
40 to 41		.0001	*	.0002	.0001	18.95
41 to 42		.0001	*	.0001	.0001	16.36
42 to 43		*	*	.0001	.0001	10.72
43 to 44		*	*	*	.0001	10.98

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.23: Red bone marrow in the lumbar spine**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
4 to 5		*	*	*	.0001	5.08
5 to 6		*	*	*	.0001	6.55
6 to 7		.0001	*	*	.0001	9.52
7 to 8		*	*	.0001	.0001	11.16
8 to 9		.0001	*	*	.0002	11.11
9 to 10		.0001	*	.0001	.0001	12.46
10 to 11		.0001	.0001	.0001	.0002	17.07
11 to 12		.0001	.0002	.0003	.0002	19.51
12 to 13		.0001	.0001	.0002	.0004	17.55
13 to 14		.0002	.0002	.0003	.0004	18.28
14 to 15		.0003	.0004	.0005	.0005	16.26
15 to 16		.0004	.0005	.0007	.0006	15.55
16 to 17		.0005	.0005	.0011	.0008	13.20
17 to 18		.0006	.0007	.0012	.0010	11.72
18 to 19		.0009	.0009	.0015	.0014	10.35
19 to 20		.0014	.0014	.0019	.0017	8.91
20 to 21		.0014	.0018	.0024	.0023	7.87
21 to 22		.0019	.0024	.0032	.0033	6.85
22 to 23		.0030	.0031	.0050	.0042	5.76
23 to 24		.0049	.0045	.0070	.0072	4.70
24 to 25		.0069	.0067	.0093	.0087	4.05
25 to 26		.0102	.0100	.0136	.0136	3.35
26 to 27		.0166	.0140	.0209	.0188	2.78
27 to 28	10.7	.0617	.0367	.0785	.0527	1.77
28 to 29	17.0	.0880	.0554	.1117	.0757	1.49
29 to 30	15.5	.0873	.0575	.1093	.0801	1.47
30 to 31	17.1	.0870	.0637	.1130	.0860	1.44
31 to 32	17.3	.0866	.0667	.1121	.0894	1.43
32 to 33	10.1	.0624	.0509	.0829	.0657	1.63
33 to 34	7.8	.0472	.0385	.0643	.0516	1.86
34 to 35	4.0	.0325	.0247	.0424	.0314	2.28
35 to 36	0.6	.0126	.0110	.0164	.0145	3.26
36 to 37		.0066	.0061	.0090	.0082	4.23
37 to 38		.0043	.0043	.0058	.0055	5.02

**Table B.23: Red bone marrow in the lumbar spine (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
38 to 39		.0028	.0025	.0039	.0043	6.23
39 to 40		.0019	.0019	.0032	.0028	7.48
40 to 41		.0011	.0012	.0021	.0018	9.33
41 to 42		.0007	.0006	.0008	.0009	12.62
42 to 43		.0003	.0002	.0004	.0004	16.31
43 to 44		.0002	.0002	.0003	.0004	17.30
44 to 45		.0002	.0002	.0002	.0002	17.71

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.24: Red bone marrow in the sternum**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1		.0001	.0001	.0003	*	1.94
1 to 2		.0001	.0003	.0001	.0004	6.12
2 to 3		.0004	.0004	.0009	.0007	12.76
3 to 4		.0005	.0006	.0007	.0008	13.33
4 to 5		.0007	.0009	.0008	.0012	17.22
5 to 6		.0010	.0008	.0018	.0007	16.73
6 to 7		.0010	.0008	.0016	.0030	16.87
7 to 8		.0026	.0023	.0025	.0028	16.95
8 to 9		.0035	.0027	.0050	.0047	15.51
9 to 10		.0056	.0039	.0053	.0072	13.50
10 to 11		.0062	.0067	.0086	.0103	11.29
11 to 12		.0102	.0104	.0093	.0126	9.65
12 to 13		.0128	.0165	.0177	.0192	7.92
13 to 14		.0143	.0189	.0196	.0257	7.35
14 to 15	7.9	.0560	.0847	.0641	.0984	4.20
15 to 16	47.0	.2131	.3242	.2423	.3768	2.29
16 to 17	7.0	.0720	.0983	.0828	.1141	3.74
17 to 18	24.2	.1278	.2007	.1579	.2272	2.85
18 to 19	10.4	.0685	.1025	.0832	.1247	3.81
19 to 20	3.5	.0326	.0486	.0444	.0614	5.22
20 to 21		.0123	.0138	.0124	.0145	8.73
21 to 22		.0083	.0097	.0100	.0122	10.02
22 to 23		.0065	.0055	.0088	.0089	11.90
23 to 24		.0041	.0043	.0078	.0077	12.93
24 to 25		.0035	.0033	.0041	.0035	15.71
25 to 26		.0023	.0021	.0033	.0034	16.80
26 to 27		.0019	.0019	.0028	.0021	17.40
27 to 28		.0008	.0014	.0026	.0016	16.59
28 to 29		.0004	.0009	.0017	.0009	17.75
29 to 30		.0002	.0011	.0009	.0011	11.98
30 to 31		.0002	.0003	.0011	.0002	12.70
31 to 32		.0001	.0005	.0005	.0005	9.75
32 to 33		.0001	.0001	.0005	.0003	6.46
33 to 34		.0001	.0001	.0002	.0002	5.47

**Table B.24: Red bone marrow in the sternum (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0002	*	.0001	.0002	3.01
35 to 36		.0001	*	.0001	.0001	2.35
36 to 37		.0001	*	.0002	.0002	4.62
37 to 38		.0001	.0002	.0002	*	3.91
38 to 39		.0001	.0001	.0001	.0001	3.13
39 to 40		.0001	.0002	*	.0003	1.92
40 to 41		*	*	.0001	*	1.17
41 to 42		*	*	.0001	.0001	1.56
42 to 43		*	*	*	*	0.00
43 to 44		*	*	.0001	*	0.78

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.25: Red bone marrow in the whole body**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1	2.5	.0140	.0132	.0173	.0164	0.65
1 to 2	2.6	.0159	.0148	.0195	.0183	0.60
2 to 3	2.4	.0160	.0161	.0198	.0201	0.58
3 to 4	2.3	.0160	.0166	.0203	.0202	0.57
4 to 5	2.2	.0166	.0169	.0209	.0211	0.56
5 to 6	2.6	.0191	.0201	.0241	.0252	0.51
6 to 7	3.8	.0235	.0257	.0299	.0323	0.46
7 to 8	3.8	.0234	.0224	.0304	.0296	0.47
8 to 9	8.1	.0338	.0343	.0455	.0463	0.40
9 to 10	7.3	.0305	.0327	.0411	.0437	0.41
10 to 11	1.2	.0130	.0128	.0170	.0166	0.61
11 to 12	2.1	.0144	.0151	.0185	.0196	0.59
12 to 13	1.5	.0121	.0132	.0158	.0168	0.63
13 to 14	1.2	.0106	.0103	.0139	.0135	0.68
14 to 15	3.4	.0187	.0174	.0239	.0225	0.54
15 to 16	3.7	.0200	.0182	.0258	.0238	0.52
16 to 17	3.5	.0197	.0180	.0256	.0235	0.53
17 to 18	3.0	.0176	.0162	.0228	.0211	0.55
18 to 19	2.5	.0153	.0140	.0199	.0182	0.59
19 to 20	2.7	.0162	.0142	.0210	.0187	0.58
20 to 21	2.7	.0172	.0149	.0215	.0194	0.58
21 to 22	2.1	.0141	.0121	.0178	.0157	0.63
22 to 23	1.8	.0123	.0101	.0157	.0130	0.68
23 to 24	1.6	.0107	.0087	.0140	.0115	0.72
24 to 25	1.1	.0081	.0065	.0106	.0086	0.81
25 to 26	1.1	.0075	.0060	.0096	.0080	0.85
26 to 27	1.0	.0073	.0064	.0095	.0083	0.85
27 to 28	1.0	.0072	.0062	.0091	.0081	0.87
28 to 29	0.6	.0048	.0038	.0063	.0051	1.05
29 to 30	0.8	.0062	.0055	.0080	.0072	0.92
30 to 31	1.0	.0070	.0065	.0090	.0083	0.87
31 to 32	0.9	.0069	.0063	.0088	.0081	0.88
32 to 33	1.8	.0109	.0102	.0140	.0128	0.72
33 to 34	2.1	.0113	.0106	.0146	.0134	0.70

**Table B.25: Red bone marrow in the whole body (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35	1.1	.0078	.0078	.0102	.0097	0.82
35 to 36	0.8	.0070	.0070	.0087	.0088	0.85
36 to 37	2.3	.0122	.0119	.0156	.0149	0.68
37 to 38	2.0	.0113	.0111	.0144	.0141	0.69
38 to 39	1.6	.0106	.0105	.0132	.0134	0.73
39 to 40	0.8	.0069	.0071	.0086	.0087	0.87
40 to 41	0.5	.0051	.0056	.0063	.0069	0.99
41 to 42	1.2	.0079	.0086	.0098	.0106	0.84
42 to 43	1.2	.0081	.0084	.0098	.0100	0.84
43 to 44	0.5	.0045	.0046	.0055	.0056	1.11
44 to 45	0.5	.0044	.0046	.0055	.0054	1.11

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.26: Skeleton (whole body)**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1	2.0	.0522	.0504	.0482	.0465	0.35
1 to 2	2.5	.0809	.0767	.0752	.0717	0.31
2 to 3	2.8	.1019	.1014	.0947	.0948	0.29
3 to 4	3.0	.1180	.1191	.1105	.1113	0.27
4 to 5	3.1	.1261	.1295	.1181	.1216	0.26
5 to 6	3.4	.1320	.1374	.1251	.1298	0.25
6 to 7	3.9	.1323	.1397	.1281	.1346	0.23
7 to 8	3.9	.1242	.1232	.1218	.1220	0.24
8 to 9	7.2	.1470	.1519	.1489	.1536	0.20
9 to 10	6.2	.1259	.1343	.1288	.1363	0.22
10 to 11	1.4	.0683	.0674	.0695	.0693	0.31
11 to 12	1.9	.0688	.0718	.0699	.0724	0.30
12 to 13	1.4	.0591	.0616	.0603	.0629	0.32
13 to 14	1.2	.0560	.0538	.0569	.0557	0.34
14 to 15	3.0	.0846	.0794	.0844	.0802	0.28
15 to 16	3.5	.0974	.0893	.0971	.0894	0.26
16 to 17	3.5	.1008	.0920	.0999	.0925	0.27
17 to 18	3.1	.0960	.0884	.0949	.0884	0.27
18 to 19	2.7	.0899	.0846	.0884	.0836	0.29
19 to 20	2.9	.0918	.0837	.0898	.0828	0.29
20 to 21	2.7	.0897	.0813	.0868	.0795	0.29
21 to 22	2.3	.0810	.0708	.0780	.0695	0.31
22 to 23	2.0	.0743	.0616	.0719	.0606	0.33
23 to 24	1.8	.0690	.0554	.0670	.0549	0.36
24 to 25	1.4	.0583	.0463	.0566	.0460	0.40
25 to 26	1.3	.0524	.0418	.0509	.0420	0.41
26 to 27	1.1	.0453	.0391	.0444	.0389	0.42
27 to 28	1.0	.0397	.0344	.0388	.0343	0.44
28 to 29	0.6	.0264	.0210	.0271	.0221	0.52
29 to 30	0.9	.0389	.0359	.0376	.0350	0.46
30 to 31	1.2	.0469	.0441	.0441	.0420	0.43
31 to 32	1.0	.0425	.0403	.0407	.0387	0.43
32 to 33	1.9	.0626	.0594	.0588	.0557	0.35
33 to 34	2.0	.0546	.0504	.0529	.0489	0.36

**Table B.26: Skeleton (whole body) (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35	1.0	.0349	.0338	.0343	.0331	0.43
35 to 36	0.8	.0312	.0312	.0306	.0308	0.44
36 to 37	1.9	.0463	.0446	.0448	.0432	0.36
37 to 38	1.6	.0440	.0428	.0430	.0414	0.37
38 to 39	1.3	.0389	.0393	.0379	.0382	0.38
39 to 40	0.8	.0297	.0306	.0285	.0295	0.45
40 to 41	0.5	.0214	.0227	.0206	.0220	0.52
41 to 42	0.9	.0271	.0288	.0257	.0271	0.45
42 to 43	1.0	.0297	.0304	.0274	.0279	0.45
43 to 44	0.5	.0206	.0206	.0189	.0190	0.57
44 to 45	0.6	.0236	.0241	.0218	.0219	0.56

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.27: Skin (whole body)**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1	0.8	.0069	.0070	.0075	.0075	0.75
1 to 2	1.1	.0098	.0099	.0107	.0107	0.62
2 to 3	1.4	.0116	.0118	.0129	.0130	0.56
3 to 4	1.5	.0129	.0128	.0143	.0145	0.54
4 to 5	1.6	.0137	.0137	.0151	.0153	0.52
5 to 6	1.6	.0141	.0144	.0159	.0159	0.51
6 to 7	1.7	.0150	.0149	.0166	.0167	0.50
7 to 8	2.0	.0170	.0181	.0190	.0199	0.46
8 to 9	2.6	.0201	.0225	.0225	.0247	0.43
9 to 10	1.9	.0170	.0179	.0188	.0199	0.47
10 to 11	1.8	.0167	.0179	.0183	.0194	0.47
11 to 12	1.6	.0157	.0162	.0172	.0177	0.49
12 to 13	1.7	.0163	.0162	.0178	.0179	0.48
13 to 14	1.9	.0174	.0177	.0189	.0193	0.46
14 to 15	1.9	.0184	.0182	.0200	.0200	0.45
15 to 16	2.0	.0196	.0190	.0213	.0208	0.44
16 to 17	2.2	.0206	.0201	.0226	.0221	0.43
17 to 18	2.4	.0227	.0219	.0249	.0242	0.41
18 to 19	2.9	.0257	.0251	.0281	.0273	0.38
19 to 20	2.9	.0264	.0256	.0288	.0280	0.38
20 to 21	2.6	.0244	.0237	.0268	.0259	0.40
21 to 22	2.6	.0248	.0239	.0268	.0261	0.39
22 to 23	2.6	.0242	.0234	.0266	.0258	0.40
23 to 24	2.6	.0241	.0234	.0264	.0257	0.40
24 to 25	2.6	.0240	.0234	.0263	.0255	0.40
25 to 26	2.5	.0237	.0232	.0258	.0254	0.40
26 to 27	2.5	.0234	.0230	.0255	.0252	0.40
27 to 28	2.4	.0229	.0226	.0249	.0247	0.41
28 to 29	2.3	.0223	.0224	.0243	.0242	0.41
29 to 30	2.3	.0220	.0222	.0239	.0242	0.42
30 to 31	2.4	.0224	.0229	.0244	.0248	0.41
31 to 32	2.3	.0223	.0226	.0240	.0242	0.41
32 to 33	2.4	.0217	.0219	.0236	.0238	0.42
33 to 34	1.6	.0161	.0158	.0176	.0170	0.49

**Table B.27: Skin (whole body) (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35	1.5	.0149	.0145	.0162	.0156	0.51
35 to 36	1.6	.0158	.0156	.0170	.0168	0.49
36 to 37	1.7	.0171	.0172	.0187	.0184	0.47
37 to 38	1.9	.0185	.0185	.0200	.0200	0.45
38 to 39	2.1	.0198	.0201	.0215	.0219	0.44
39 to 40	2.1	.0205	.0207	.0219	.0224	0.43
40 to 41	2.3	.0217	.0217	.0233	.0232	0.42
41 to 42	2.3	.0215	.0210	.0228	.0225	0.43
42 to 43	1.4	.0146	.0145	.0154	.0154	0.52
43 to 44	1.3	.0133	.0133	.0141	.0141	0.54
44 to 45	1.3	.0127	.0127	.0135	.0135	0.56

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.28: Small intestine**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
4 to 5		*	*	.0001	.0001	17.35
5 to 6		.0001	*	.0001	.0001	15.41
6 to 7		.0001	*	.0001	.0001	15.55
7 to 8		.0001	.0001	.0001	.0002	13.49
8 to 9		.0001	.0001	.0001	.0002	11.74
9 to 10		.0002	.0002	.0003	.0003	9.67
10 to 11		.0002	.0002	.0003	.0004	8.53
11 to 12		.0002	.0002	.0003	.0004	8.10
12 to 13		.0003	.0003	.0005	.0006	6.95
13 to 14		.0004	.0004	.0006	.0006	6.17
14 to 15		.0005	.0006	.0008	.0009	5.20
15 to 16		.0008	.0008	.0012	.0012	4.41
16 to 17		.0010	.0012	.0016	.0016	3.80
17 to 18		.0014	.0015	.0019	.0021	3.38
18 to 19		.0019	.0019	.0026	.0027	2.91
19 to 20		.0026	.0026	.0034	.0036	2.53
20 to 21		.0031	.0034	.0043	.0042	2.29
21 to 22		.0044	.0047	.0058	.0060	1.94
22 to 23		.0064	.0069	.0082	.0088	1.62
23 to 24		.0099	.0105	.0118	.0128	1.34
24 to 25		.0146	.0161	.0169	.0186	1.12
25 to 26		.0214	.0245	.0248	.0282	0.92
26 to 27	2.1	.0424	.0520	.0484	.0570	0.69
27 to 28	14.3	.1138	.1472	.1278	.1584	0.44
28 to 29	15.0	.1368	.1821	.1499	.1936	0.41
29 to 30	19.7	.1656	.2123	.1809	.2252	0.38
30 to 31	21.4	.1715	.2196	.1903	.2330	0.37
31 to 32	15.8	.1364	.1775	.1506	.1875	0.42
32 to 33	10.2	.0918	.1179	.1024	.1264	0.50
33 to 34	1.3	.0316	.0375	.0354	.0405	0.81
34 to 35		.0143	.0165	.0171	.0186	1.14
35 to 36		.0097	.0105	.0117	.0122	1.38
36 to 37		.0068	.0072	.0084	.0086	1.63
37 to 38		.0047	.0052	.0062	.0063	1.92

**Table B.28: Small intestine** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
38 to 39		.0037	.0037	.0047	.0046	2.23
39 to 40		.0026	.0027	.0035	.0035	2.59
40 to 41		.0017	.0018	.0025	.0024	3.14
41 to 42		.0010	.0011	.0014	.0014	4.21
42 to 43		.0005	.0006	.0007	.0007	5.90
43 to 44		.0003	.0003	.0004	.0005	7.34
44 to 45		.0003	.0002	.0004	.0003	8.44

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.29: Spleen**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
1 to 2		*	*	.0001	*	16.82
2 to 3		*	.0001	.0001	.0001	16.34
3 to 4		.0001	.0001	.0002	.0001	17.15
4 to 5		.0001	.0001	.0002	.0002	15.91
5 to 6		.0002	.0002	.0003	.0003	15.01
6 to 7		.0002	.0002	.0003	.0004	13.17
7 to 8		.0003	.0002	.0004	.0005	10.90
8 to 9		.0004	.0003	.0006	.0006	9.77
9 to 10		.0005	.0006	.0008	.0009	8.33
10 to 11		.0008	.0008	.0009	.0011	7.41
11 to 12		.0009	.0011	.0013	.0013	6.38
12 to 13		.0012	.0013	.0018	.0019	5.61
13 to 14		.0015	.0016	.0020	.0022	5.07
14 to 15		.0021	.0023	.0029	.0034	4.19
15 to 16		.0031	.0034	.0041	.0047	3.55
16 to 17		.0046	.0046	.0058	.0061	3.04
17 to 18		.0059	.0060	.0080	.0082	2.64
18 to 19		.0084	.0085	.0107	.0106	2.28
19 to 20		.0117	.0121	.0150	.0150	1.94
20 to 21		.0167	.0167	.0203	.0197	1.67
21 to 22		.0242	.0240	.0281	.0272	1.41
22 to 23	4.8	.0639	.0587	.0729	.0685	0.95
23 to 24	27.8	.1887	.1594	.2123	.1825	0.61
24 to 25	25.7	.1932	.1737	.2164	.1935	0.60
25 to 26	21.4	.1753	.1711	.1943	.1895	0.61
26 to 27	17.7	.1466	.1456	.1604	.1589	0.66
27 to 28	2.6	.0509	.0504	.0561	.0557	1.04
28 to 29		.0230	.0229	.0264	.0259	1.45
29 to 30		.0148	.0147	.0167	.0168	1.80
30 to 31		.0095	.0096	.0114	.0111	2.20
31 to 32		.0065	.0064	.0074	.0076	2.68
32 to 33		.0041	.0042	.0051	.0054	3.23
33 to 34		.0028	.0026	.0032	.0036	3.97
34 to 35		.0019	.0020	.0023	.0024	4.74

**Table B.29: Spleen** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
35 to 36		.0014	.0015	.0018	.0018	5.52
36 to 37		.0012	.0011	.0016	.0015	6.01
37 to 38		.0009	.0008	.0012	.0012	6.84
38 to 39		.0008	.0007	.0010	.0010	7.64
39 to 40		.0006	.0006	.0008	.0009	8.37
40 to 41		.0004	.0003	.0006	.0006	10.32
41 to 42		.0003	.0002	.0003	.0003	13.47
42 to 43		.0002	.0001	.0001	.0003	15.99
43 to 44		.0001	.0001	.0002	.0002	17.00
44 to 45		.0001	.0001	.0001	.0001	16.70

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.30: Stomach**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
1 to 2		*	.0001	.0001	*	5.50
2 to 3		.0001	.0001	.0001	.0001	10.72
3 to 4		.0001	.0001	.0002	.0002	11.32
4 to 5		.0001	.0001	.0001	.0002	14.53
5 to 6		.0001	.0001	.0002	.0002	16.51
6 to 7		.0003	.0002	.0003	.0002	18.09
7 to 8		.0003	.0002	.0005	.0002	16.03
8 to 9		.0004	.0003	.0004	.0005	16.57
9 to 10		.0007	.0004	.0005	.0007	16.73
10 to 11		.0005	.0006	.0012	.0009	14.16
11 to 12		.0007	.0007	.0010	.0010	13.77
12 to 13		.0010	.0012	.0016	.0018	11.35
13 to 14		.0014	.0013	.0019	.0021	10.06
14 to 15		.0018	.0019	.0025	.0027	8.43
15 to 16		.0027	.0026	.0037	.0042	7.09
16 to 17		.0040	.0039	.0052	.0054	5.97
17 to 18		.0046	.0057	.0070	.0064	5.30
18 to 19		.0073	.0080	.0091	.0092	4.44
19 to 20		.0099	.0108	.0121	.0125	3.83
20 to 21		.0123	.0148	.0169	.0166	3.34
21 to 22		.0192	.0214	.0226	.0250	2.79
22 to 23		.0320	.0369	.0363	.0405	2.21
23 to 24	11.4	.0976	.1195	.1091	.1291	1.40
24 to 25	26.1	.1906	.2542	.2135	.2705	1.01
25 to 26	28.0	.2188	.3076	.2375	.3253	0.94
26 to 27	30.0	.2231	.3252	.2417	.3394	0.93
27 to 28	4.6	.0722	.0936	.0781	.1023	1.57
28 to 29		.0280	.0346	.0330	.0363	2.34
29 to 30		.0202	.0206	.0203	.0237	2.90
30 to 31		.0127	.0135	.0147	.0161	3.49
31 to 32		.0083	.0085	.0091	.0096	4.36
32 to 33		.0051	.0056	.0064	.0064	5.27
33 to 34		.0035	.0034	.0042	.0040	6.48
34 to 35		.0021	.0022	.0029	.0034	8.22

**Table B.30: Stomach** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
35 to 36		.0017	.0016	.0027	.0025	8.98
36 to 37		.0014	.0013	.0017	.0022	10.15
37 to 38		.0014	.0010	.0015	.0013	11.67
38 to 39		.0011	.0008	.0014	.0014	12.67
39 to 40		.0007	.0007	.0011	.0010	14.23
40 to 41		.0006	.0005	.0007	.0006	15.74
41 to 42		.0004	.0004	.0003	.0005	17.80
42 to 43		.0002	.0002	.0003	.0003	18.69
43 to 44		.0001	.0002	.0002	.0002	13.15
44 to 45		.0001	.0001	.0002	.0001	10.28

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.31: Testes**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
9 to 10		*	*	.0001	.0001	1.56
10 to 11		*	*	.0001	*	1.56
11 to 12		*	*	*	*	1.48
12 to 13		*	*	*	.0002	2.73
13 to 14		.0001	.0001	.0001	*	2.62
14 to 15		.0001	.0001	.0002	.0001	4.58
15 to 16		*	*	.0001	.0001	4.69
16 to 17		.0002	.0001	*	.0001	5.78
17 to 18		.0001	*	.0002	.0001	4.97
18 to 19		.0002	.0001	.0002	.0002	9.22
19 to 20		.0001	.0001	.0004	.0002	7.95
20 to 21		.0004	.0003	.0002	.0003	9.42
21 to 22		.0001	.0002	.0005	.0006	11.85
22 to 23		.0004	.0004	.0007	.0005	13.72
23 to 24		.0004	.0004	.0009	.0009	15.65
24 to 25		.0008	.0009	.0012	.0010	16.33
25 to 26		.0007	.0008	.0014	.0013	16.84
26 to 27		.0015	.0013	.0019	.0025	16.36
27 to 28		.0021	.0018	.0018	.0028	15.37
28 to 29		.0019	.0029	.0025	.0033	13.71
29 to 30		.0031	.0027	.0048	.0047	12.34
30 to 31		.0034	.0049	.0048	.0057	10.19
31 to 32		.0060	.0064	.0073	.0084	8.54
32 to 33		.0072	.0095	.0099	.0109	7.40
33 to 34		.0105	.0114	.0128	.0142	6.37
34 to 35		.0163	.0177	.0177	.0186	5.34
35 to 36		.0266	.0297	.0282	.0313	4.20
36 to 37		.0427	.0523	.0481	.0524	3.30
37 to 38	23.5	.2354	.3555	.2487	.3723	1.51
38 to 39	76.5	.5424	.8645	.5888	.8801	1.01
39 to 40		.0455	.0542	.0487	.0559	3.29
40 to 41		.0234	.0234	.0259	.0236	4.71
41 to 42		.0095	.0100	.0125	.0112	7.01
42 to 43		.0039	.0037	.0045	.0047	11.86
43 to 44		.0024	.0022	.0021	.0028	14.67
44 to 45		.0020	.0027	.0028	.0015	14.93

**Table B.32: Thymus**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1		.0001	.0001	.0002	.0002	16.76
1 to 2		.0002	.0003	.0005	.0004	11.44
2 to 3		.0005	.0004	.0007	.0007	9.07
3 to 4		.0007	.0007	.0010	.0012	7.69
4 to 5		.0009	.0010	.0013	.0015	6.47
5 to 6		.0012	.0013	.0020	.0020	5.54
6 to 7		.0017	.0018	.0028	.0028	4.77
7 to 8		.0024	.0026	.0036	.0040	4.02
8 to 9		.0039	.0038	.0050	.0051	3.32
9 to 10		.0059	.0058	.0074	.0076	2.74
10 to 11		.0091	.0088	.0113	.0115	2.29
11 to 12		.0127	.0132	.0151	.0153	1.95
12 to 13		.0189	.0210	.0217	.0245	1.59
13 to 14		.0251	.0298	.0295	.0334	1.38
14 to 15	6.9	.0683	.0922	.0791	.1028	0.88
15 to 16	19.3	.1355	.1916	.1564	.2084	0.65
16 to 17	29.7	.1972	.2781	.2241	.3023	0.55
17 to 18	24.1	.1675	.2241	.1926	.2446	0.60
18 to 19	17.9	.1362	.1849	.1522	.2034	0.65
19 to 20	2.1	.0476	.0596	.0531	.0645	1.04
20 to 21		.0235	.0271	.0272	.0304	1.43
21 to 22		.0165	.0188	.0203	.0210	1.67
22 to 23		.0126	.0137	.0154	.0163	1.91
23 to 24		.0092	.0098	.0113	.0119	2.23
24 to 25		.0065	.0067	.0081	.0086	2.62
25 to 26		.0045	.0050	.0060	.0065	3.06
26 to 27		.0033	.0032	.0043	.0045	3.64
27 to 28		.0024	.0023	.0032	.0032	4.25
28 to 29		.0018	.0017	.0024	.0024	4.90
29 to 30		.0012	.0012	.0018	.0017	5.90
30 to 31		.0009	.0010	.0013	.0011	6.88
31 to 32		.0007	.0005	.0008	.0009	8.32
32 to 33		.0005	.0003	.0007	.0007	9.49
33 to 34		.0003	.0002	.0004	.0004	11.57

**Table B.32: Thymus** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0002	.0002	.0003	.0003	13.16
35 to 36		.0001	.0002	.0003	.0002	14.93
36 to 37		.0002	.0002	.0002	.0002	15.69
37 to 38		.0001	.0001	.0002	.0001	17.87
38 to 39		.0001	.0001	.0001	.0002	16.09
39 to 40		.0001	.0001	.0001	.0001	15.88
40 to 41		.0001	.0001	.0001	.0001	18.40
41 to 42		*	.0001	.0001	.0001	13.77
42 to 43		*	*	*	*	10.96
43 to 44		*	*	*	.0001	10.24

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.33: Thyroid**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1		.0002	.0004	.0005	.0005	13.24
1 to 2		.0003	.0008	.0009	.0011	15.59
2 to 3		.0014	.0015	.0017	.0017	15.96
3 to 4		.0017	.0022	.0030	.0031	13.85
4 to 5		.0026	.0024	.0042	.0041	11.89
5 to 6		.0033	.0042	.0054	.0049	10.03
6 to 7		.0045	.0052	.0070	.0077	8.49
7 to 8		.0069	.0064	.0111	.0114	7.55
8 to 9		.0113	.0112	.0145	.0137	5.93
9 to 10		.0179	.0162	.0205	.0209	4.94
10 to 11		.0280	.0301	.0332	.0342	3.92
11 to 12		.0431	.0491	.0544	.0523	3.18
12 to 13	6.1	.1027	.1239	.1150	.1355	2.18
13 to 14	71.1	.4913	.7476	.5242	.7758	1.06
14 to 15	22.9	.1982	.2968	.2109	.3174	1.61
15 to 16		.0424	.0592	.0529	.0589	3.08
16 to 17		.0267	.0329	.0337	.0401	3.82
17 to 18		.0204	.0200	.0215	.0258	4.68
18 to 19		.0132	.0135	.0163	.0189	5.52
19 to 20		.0099	.0114	.0121	.0137	6.35
20 to 21		.0068	.0078	.0087	.0095	7.55
21 to 22		.0052	.0055	.0067	.0070	8.64
22 to 23		.0044	.0047	.0070	.0059	8.91
23 to 24		.0035	.0035	.0053	.0055	10.23
24 to 25		.0029	.0024	.0035	.0040	12.27
25 to 26		.0016	.0022	.0026	.0026	14.61
26 to 27		.0011	.0016	.0020	.0023	15.51
27 to 28		.0007	.0010	.0012	.0013	17.65
28 to 29		.0005	.0006	.0009	.0011	18.81
29 to 30		.0004	.0005	.0011	.0008	19.28
30 to 31		.0004	.0005	.0007	.0007	16.06
31 to 32		.0003	.0003	.0004	.0005	15.41
32 to 33		.0003	.0003	.0004	.0001	12.18
33 to 34		.0001	.0001	.0002	.0002	7.94

**Table B.33: Thyroid** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0001	.0002	.0001	.0001	5.83
35 to 36		.0001	*	.0002	.0002	5.61
36 to 37		.0001	*	.0002	.0002	4.11
37 to 38		*	.0001	*	*	4.30
38 to 39		*	.0002	.0002	*	2.74
39 to 40		.0001	*	.0001	.0001	3.84
40 to 41		*	*	*	.0001	3.52
41 to 42		*	*	*	*	0.78
42 to 43		*	*	*	*	0.78
43 to 44		.0001	*	*	*	0.78

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.34: Tissue (whole body)**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1	0.4	.0036	.0037	.0041	.0041	0.30
1 to 2	0.6	.0049	.0051	.0056	.0057	0.25
2 to 3	0.6	.0052	.0053	.0060	.0061	0.25
3 to 4	0.6	.0057	.0057	.0066	.0067	0.23
4 to 5	0.7	.0066	.0066	.0079	.0078	0.22
5 to 6	0.8	.0080	.0079	.0094	.0094	0.20
6 to 7	1.2	.0107	.0109	.0126	.0128	0.18
7 to 8	1.6	.0131	.0133	.0154	.0156	0.17
8 to 9	1.8	.0151	.0149	.0176	.0176	0.16
9 to 10	2.4	.0193	.0189	.0223	.0220	0.15
10 to 11	2.7	.0226	.0227	.0255	.0257	0.14
11 to 12	2.4	.0215	.0214	.0244	.0243	0.15
12 to 13	2.7	.0239	.0238	.0269	.0268	0.14
13 to 14	2.8	.0250	.0251	.0280	.0280	0.13
14 to 15	3.2	.0271	.0273	.0306	.0309	0.12
15 to 16	3.4	.0280	.0286	.0319	.0322	0.12
16 to 17	3.3	.0281	.0283	.0320	.0320	0.12
17 to 18	3.3	.0285	.0285	.0322	.0322	0.12
18 to 19	3.1	.0275	.0271	.0310	.0306	0.12
19 to 20	3.0	.0263	.0259	.0297	.0292	0.12
20 to 21	2.3	.0226	.0222	.0253	.0249	0.13
21 to 22	2.4	.0226	.0224	.0254	.0253	0.13
22 to 23	2.2	.0212	.0207	.0239	.0233	0.13
23 to 24	2.2	.0212	.0207	.0239	.0233	0.13
24 to 25	2.3	.0217	.0211	.0244	.0238	0.13
25 to 26	2.2	.0209	.0200	.0236	.0226	0.13
26 to 27	2.4	.0215	.0208	.0242	.0236	0.13
27 to 28	2.2	.0209	.0201	.0234	.0226	0.13
28 to 29	2.2	.0211	.0202	.0236	.0226	0.14
29 to 30	2.1	.0204	.0189	.0227	.0212	0.15
30 to 31	2.2	.0207	.0192	.0231	.0216	0.15
31 to 32	2.2	.0208	.0196	.0232	.0220	0.15
32 to 33	2.0	.0194	.0187	.0218	.0211	0.16
33 to 34	1.9	.0186	.0183	.0208	.0205	0.16

**Table B.34: Tissue (whole body) (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35	2.0	.0197	.0192	.0218	.0213	0.16
35 to 36	2.3	.0221	.0217	.0244	.0241	0.15
36 to 37	2.6	.0239	.0238	.0265	.0264	0.13
37 to 38	2.8	.0258	.0256	.0285	.0283	0.13
38 to 39	3.0	.0271	.0267	.0298	.0294	0.12
39 to 40	3.1	.0278	.0275	.0304	.0301	0.12
40 to 41	2.8	.0259	.0257	.0281	.0279	0.12
41 to 42	1.9	.0193	.0191	.0208	.0206	0.15
42 to 43	1.3	.0132	.0131	.0142	.0142	0.18
43 to 44	1.1	.0116	.0115	.0124	.0123	0.19
44 to 45	1.0	.0102	.0101	.0110	.0109	0.20

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table B.35: Uterus**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
9 to 10		.0001	*	*	.0002	4.55
10 to 11		.0001	.0001	.0001	.0001	3.76
11 to 12		.0002	*	.0001	.0001	3.86
12 to 13		.0001	.0001	.0004	.0002	8.19
13 to 14		.0001	.0001	.0003	.0004	9.36
14 to 15		.0002	.0002	.0004	.0006	13.31
15 to 16		.0003	.0002	.0003	.0003	13.53
16 to 17		.0003	.0004	.0005	.0007	17.55
17 to 18		.0003	.0004	.0007	.0009	17.16
18 to 19		.0005	.0008	.0011	.0008	17.24
19 to 20		.0008	.0004	.0010	.0007	17.62
20 to 21		.0008	.0008	.0013	.0013	17.24
21 to 22		.0015	.0012	.0016	.0019	15.95
22 to 23		.0017	.0017	.0021	.0023	14.85
23 to 24		.0022	.0027	.0038	.0033	12.31
24 to 25		.0039	.0034	.0054	.0048	10.59
25 to 26		.0050	.0050	.0063	.0067	8.96
26 to 27		.0071	.0065	.0098	.0095	7.89
27 to 28		.0101	.0093	.0115	.0111	6.65
28 to 29		.0135	.0143	.0167	.0152	5.65
29 to 30		.0197	.0201	.0241	.0226	4.74
30 to 31		.0282	.0285	.0331	.0354	4.01
31 to 32		.0450	.0464	.0496	.0509	3.21
32 to 33		.0749	.0783	.0767	.0857	2.58
33 to 34	80.0	.4475	.5437	.5258	.5948	1.14
34 to 35	20.0	.1849	.2147	.2126	.2291	1.73
35 to 36		.0546	.0598	.0628	.0649	2.89
36 to 37		.0341	.0319	.0358	.0401	3.71
37 to 38		.0199	.0185	.0236	.0252	4.70
38 to 39		.0137	.0133	.0148	.0171	5.68
39 to 40		.0081	.0093	.0100	.0108	7.12
40 to 41		.0060	.0052	.0070	.0068	8.81
41 to 42		.0026	.0017	.0038	.0034	13.10
42 to 43		.0014	.0011	.0018	.0015	16.95
43 to 44		.0007	.0012	.0011	.0011	15.90
44 to 45		.0007	.0005	.0006	.0003	15.41

# **Appendix C**

## **Anatomical Data**

**of the CHILD phantom**

**Table C.1: Approximate anatomical landmarks of the CHILD phantom**

Object	Height (cm)
Skull	0.0 - 17.6
Cervical spine	15.2 - 20.0
Thoracic spine	20.0 - 40.0
Lumbar spine	40.0 - 51.2
Sacrum	51.2 - 57.6
Iliac crest	48.0
Bottom of pelvis	63.2
Top of femur head	56.8

**Table C.2: Height range of some soft tissue organs**

Organ	Height (cm)
Adrenals	36.8 - 39.2
Bladder	52.8 - 60.8
Brain	0.8 - 20.
Colon (asc. + tranv.)	41.6 - 50.4
Colon (desc. + sigmoid)	41.6 - 59.2
Kidneys	36.8 - 47.2
Liver	31.2 - 44.8
Lungs	21.6 - 34.4
Ovaries	48.4 - 51.2
Pancreas	36.8 - 41.6
Small intestine	38.4 - 54.4
Spleen	32.0 - 43.2
Stomach	34.4 - 43.2
Testes	62.4 - 64.0
Thymus	22.4 - 27.2
Thyroid	20.0 - 22.4
Uterus	51.2 - 54.4

# **Appendix D**

## **Organ Dose Conversion Factors**

**for the CHILD phantom**

**Table D. 1: Adrenals**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
5 to 6		*	*	.0001	*	3.76
6 to 7		*	*	*	*	4.62
7 to 8		.0001	*	.0001	.0001	6.47
8 to 9		*	*	*	*	4.57
9 to 10		*	.0001	.0001	.0002	10.90
10 to 11		*	.0001	.0001	.0001	9.25
11 to 12		.0001	.0001	.0002	.0001	12.05
12 to 13		.0001	.0001	.0002	.0001	14.28
13 to 14		.0001	.0001	.0002	.0001	13.51
14 to 15		.0002	.0001	.0002	.0002	12.40
15 to 16		.0001	.0002	.0002	.0003	17.01
16 to 17		.0002	.0002	.0004	.0003	17.57
17 to 18		.0002	.0003	.0005	.0005	19.02
18 to 19		.0002	.0002	.0005	.0006	17.44
19 to 20		.0003	.0004	.0006	.0007	17.54
20 to 21		.0006	.0006	.0010	.0012	14.97
21 to 22		.0008	.0009	.0013	.0012	9.53
22 to 23		.0010	.0016	.0023	.0022	11.35
23 to 24		.0014	.0015	.0024	.0022	10.62
24 to 25		.0021	.0020	.0031	.0037	9.07
25 to 26		.0024	.0026	.0040	.0042	8.43
26 to 27		.0031	.0030	.0053	.0054	7.44
27 to 28		.0038	.0043	.0060	.0062	6.86
28 to 29		.0048	.0056	.0079	.0080	6.07
29 to 30		.0067	.0066	.0088	.0096	5.55
30 to 31		.0077	.0078	.0115	.0125	4.94
31 to 32		.0097	.0109	.0145	.0151	4.38
32 to 33		.0137	.0136	.0192	.0187	3.87
33 to 34		.0183	.0193	.0249	.0266	3.38
34 to 35		.0249	.0230	.0333	.0339	3.01
35 to 36		.0326	.0303	.0437	.0408	2.70
36 to 37	10.5	.0590	.0534	.0743	.0662	2.19
37 to 38	51.1	.1202	.1051	.1637	.1382	1.64
38 to 39	33.7	.0920	.0851	.1247	.1141	1.81

**Table D. 1: Adrenals (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
39 to 40	4.7	.0468	.0438	.0624	.0572	2.36
40 to 41		.0296	.0275	.0406	.0361	2.83
41 to 42		.0229	.0225	.0314	.0301	3.12
42 to 43		.0170	.0167	.0240	.0247	3.53
43 to 44		.0140	.0130	.0182	.0195	3.90
44 to 45		.0110	.0103	.0145	.0143	4.46
45 to 46		.0075	.0080	.0116	.0106	5.03
46 to 47		.0056	.0062	.0084	.0090	5.71
47 to 48		.0043	.0048	.0070	.0071	6.26
48 to 49		.0029	.0030	.0056	.0050	7.39
49 to 50		.0026	.0029	.0037	.0041	8.25
50 to 51		.0025	.0021	.0034	.0032	9.23
51 to 52		.0016	.0014	.0025	.0022	10.77
52 to 53		.0010	.0012	.0019	.0022	12.11
53 to 54		.0006	.0007	.0020	.0022	13.53
54 to 55		.0006	.0006	.0010	.0012	14.88
55 to 56		.0005	.0004	.0009	.0011	16.53
56 to 57		.0005	.0002	.0008	.0010	16.55
57 to 58		.0002	.0003	.0007	.0006	17.63
58 to 59		.0003	.0001	.0006	.0004	18.38
59 to 60		.0001	.0002	.0005	.0003	16.35
60 to 61		.0002	.0001	.0006	.0002	15.00
61 to 62		.0002	.0001	.0002	.0001	11.40
62 to 63		.0001	.0001	.0001	.0001	10.04
63 to 64		.0001	.0001	.0002	.0001	11.86
64 to 65		*	.0001	.0002	.0002	9.34
65 to 66		.0001	*	*	*	5.82

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D. 2: Bladder**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
23 to 24		*	*	.0001	*	13.42
24 to 25		*	*	.0001	*	15.61
25 to 26		*	*	.0001	.0001	16.12
26 to 27		*	*	.0001	.0001	16.77
27 to 28		.0001	*	.0001	.0001	17.13
28 to 29		.0001	.0001	.0001	.0001	17.61
29 to 30		.0001	.0001	.0002	.0001	16.70
30 to 31		.0001	.0001	.0002	.0002	15.34
31 to 32		.0001	.0001	.0002	.0002	15.16
32 to 33		.0001	.0001	.0002	.0002	14.50
33 to 34		.0001	.0002	.0003	.0004	12.15
34 to 35		.0002	.0002	.0004	.0004	10.91
35 to 36		.0003	.0003	.0005	.0005	9.62
36 to 37		.0003	.0004	.0007	.0008	8.34
37 to 38		.0005	.0005	.0007	.0009	7.48
38 to 39		.0006	.0006	.0011	.0011	6.65
39 to 40		.0008	.0009	.0012	.0013	5.95
40 to 41		.0009	.0009	.0018	.0018	5.30
41 to 42		.0012	.0013	.0021	.0022	4.64
42 to 43		.0014	.0018	.0026	.0028	4.22
43 to 44		.0021	.0023	.0031	.0034	3.71
44 to 45		.0027	.0028	.0045	.0046	3.32
45 to 46		.0032	.0039	.0055	.0058	2.93
46 to 47		.0046	.0052	.0069	.0076	2.54
47 to 48		.0058	.0070	.0086	.0103	2.26
48 to 49		.0082	.0095	.0109	.0128	1.99
49 to 50		.0107	.0127	.0145	.0168	1.74
50 to 51		.0134	.0179	.0191	.0230	1.53
51 to 52		.0188	.0264	.0250	.0330	1.31
52 to 53	4.2	.0377	.0573	.0472	.0672	1.01
53 to 54	16.4	.0795	.1258	.0929	.1452	0.74
54 to 55	11.4	.0731	.1094	.0857	.1251	0.75
55 to 56	13.8	.0825	.1226	.0956	.1376	0.71
56 to 57	14.0	.0834	.1249	.0974	.1392	0.70

**Table D. 2: Bladder** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
57 to 58	13.4	.0764	.1152	.0913	.1295	0.73
58 to 59	11.9	.0649	.0966	.0795	.1108	0.78
59 to 60	9.1	.0488	.0714	.0605	.0837	0.89
60 to 61	5.8	.0317	.0413	.0408	.0518	1.10
61 to 62		.0156	.0192	.0214	.0246	1.43
62 to 63		.0111	.0129	.0155	.0171	1.69
63 to 64		.0083	.0097	.0113	.0125	1.96
64 to 65		.0062	.0067	.0087	.0088	2.28
65 to 66		.0045	.0049	.0066	.0068	2.62

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D. 3: Brain**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1	0.1	.0044	.0044	.0057	.0057	0.60
1 to 2	1.7	.0151	.0151	.0199	.0199	0.33
2 to 3	4.7	.0305	.0304	.0393	.0393	0.24
3 to 4	7.2	.0435	.0438	.0555	.0562	0.21
4 to 5	9.5	.0538	.0546	.0686	.0698	0.19
5 to 6	10.8	.0604	.0617	.0772	.0788	0.17
6 to 7	11.6	.0643	.0657	.0822	.0838	0.17
7 to 8	12.1	.0670	.0680	.0851	.0865	0.17
8 to 9	12.3	.0659	.0666	.0840	.0851	0.17
9 to 10	11.3	.0590	.0591	.0761	.0759	0.18
10 to 11	8.7	.0457	.0428	.0600	.0567	0.20
11 to 12	6.1	.0342	.0297	.0450	.0402	0.23
12 to 13	2.4	.0202	.0163	.0272	.0231	0.29
13 to 14	0.5	.0106	.0091	.0149	.0134	0.38
14 to 15	0.3	.0073	.0061	.0104	.0093	0.46
15 to 16	0.2	.0049	.0041	.0073	.0065	0.55
16 to 17	0.2	.0035	.0029	.0053	.0047	0.64
17 to 18	0.1	.0025	.0021	.0039	.0035	0.74
18 to 19	0.1	.0020	.0017	.0030	.0027	0.82
19 to 20	0.1	.0017	.0015	.0026	.0023	0.88
20 to 21		.0015	.0014	.0023	.0022	0.95
21 to 22		.0012	.0011	.0018	.0018	0.72
22 to 23		.0011	.0011	.0018	.0017	1.10
23 to 24		.0009	.0009	.0014	.0015	1.22
24 to 25		.0007	.0007	.0011	.0012	1.37
25 to 26		.0005	.0005	.0009	.0010	1.54
26 to 27		.0004	.0004	.0007	.0008	1.75
27 to 28		.0003	.0003	.0006	.0006	1.96
28 to 29		.0002	.0003	.0005	.0005	2.17
29 to 30		.0002	.0002	.0004	.0004	2.42
30 to 31		.0001	.0002	.0003	.0003	2.70
31 to 32		.0001	.0001	.0002	.0003	3.00
32 to 33		.0001	.0001	.0002	.0002	3.20
33 to 34		.0001	.0001	.0002	.0002	3.51

**Table D. 3: Brain** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0001	.0001	.0002	.0002	3.84
35 to 36		.0001	.0001	.0001	.0001	4.19
36 to 37		*	.0001	.0001	.0001	4.61
37 to 38		*	*	.0001	.0001	5.03
38 to 39		*	*	.0001	.0001	5.63
39 to 40		*	*	.0001	.0001	6.22
40 to 41		*	*	.0001	.0001	6.81

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D. 4: Breast**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1		*	*	.0001	*	0.00
1 to 2		*	*	*	*	0.00
2 to 3		.0001	*	.0001	.0001	0.00
3 to 4		.0001	*	.0001	.0001	0.00
4 to 5		*	*	.0001	.0002	0.14
5 to 6		.0002	*	.0002	.0001	0.41
6 to 7		.0001	.0001	.0001	.0001	0.69
7 to 8		.0001	.0001	.0003	.0002	1.10
8 to 9		.0001	.0002	.0002	.0002	1.93
9 to 10		.0001	.0001	.0001	.0003	2.48
10 to 11		.0002	.0003	.0003	.0003	2.89
11 to 12		.0004	.0003	.0004	.0007	4.70
12 to 13		.0005	.0005	.0004	.0006	5.23
13 to 14		.0006	.0005	.0006	.0008	4.99
14 to 15		.0005	.0006	.0009	.0013	6.71
15 to 16		.0007	.0013	.0011	.0018	9.14
16 to 17		.0011	.0014	.0013	.0010	10.36
17 to 18		.0013	.0016	.0011	.0014	11.34
18 to 19		.0017	.0022	.0022	.0019	12.79
19 to 20		.0014	.0017	.0020	.0027	15.29
20 to 21		.0017	.0023	.0024	.0027	17.43
21 to 22		.0018	.0020	.0026	.0030	19.55
22 to 23		.0019	.0029	.0037	.0040	20.79
23 to 24		.0030	.0038	.0049	.0060	22.52
24 to 25		.0042	.0054	.0059	.0071	23.93
25 to 26		.0060	.0082	.0091	.0088	22.03
26 to 27		.0089	.0117	.0105	.0132	22.35
27 to 28		.0116	.0179	.0152	.0200	22.21
28 to 29		.0171	.0270	.0216	.0307	20.68
29 to 30		.0330	.0517	.0382	.0545	18.77
30 to 31	62.5	.2199	.3761	.2519	.4101	10.80
31 to 32	37.5	.3665	.6256	.4008	.6690	5.59
32 to 33		.0442	.0741	.0511	.0787	11.49
33 to 34		.0247	.0413	.0295	.0482	18.34

**Table D. 4: Breast (continued)**

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
34 to 35		.0156	.0250	.0230	.0292	21.19
35 to 36		.0122	.0182	.0169	.0213	22.34
36 to 37		.0084	.0124	.0126	.0152	23.57
37 to 38		.0067	.0092	.0098	.0112	23.92
38 to 39		.0049	.0071	.0064	.0096	22.27
39 to 40		.0038	.0053	.0066	.0063	21.46
40 to 41		.0027	.0035	.0047	.0056	20.07
41 to 42		.0025	.0026	.0030	.0043	17.90
42 to 43		.0021	.0021	.0025	.0034	15.93
43 to 44		.0012	.0013	.0027	.0022	13.19
44 to 45		.0008	.0015	.0015	.0020	10.11
45 to 46		.0007	.0010	.0020	.0019	8.38
46 to 47		.0008	.0007	.0008	.0010	7.34
47 to 48		.0007	.0005	.0009	.0013	6.53
48 to 49		.0003	.0004	.0007	.0004	6.19
49 to 50		.0003	.0002	.0009	.0005	4.73
50 to 51		.0002	.0003	.0003	.0003	3.63
51 to 52		.0001	.0001	.0004	.0003	2.14
52 to 53		.0001	.0002	.0002	.0004	1.10
53 to 54		.0001	.0001	.0002	.0004	1.93
54 to 55		.0001	*	.0002	.0002	1.66
55 to 56		*	.0001	.0001	.0001	1.24
56 to 57		*	*	.0001	.0002	1.65
57 to 58		*	*	*	*	1.06
58 to 59		*	*	.0001	*	0.38
59 to 60		.0001	*	.0001	*	0.28
60 to 61		*	*	*	.0002	0.83
61 to 62		*	*	.0001	*	0.83

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D. 5: Colon (ascending and transverse)**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
10 to 11		*	*	.0001	*	17.79
11 to 12		*	*	*	.0001	16.69
12 to 13		*	*	.0001	*	16.72
13 to 14		*	*	.0001	.0001	16.00
14 to 15		*	*	.0001	.0001	15.28
15 to 16		.0001	.0001	.0001	.0001	13.84
16 to 17		.0001	.0001	.0001	.0001	13.93
17 to 18		.0001	.0001	.0002	.0001	12.24
18 to 19		.0001	.0001	.0002	.0002	12.29
19 to 20		.0001	.0001	.0002	.0002	10.67
20 to 21		.0001	.0001	.0003	.0003	9.35
21 to 22		.0002	.0002	.0004	.0004	5.60
22 to 23		.0003	.0003	.0005	.0005	6.71
23 to 24		.0003	.0004	.0007	.0007	6.05
24 to 25		.0005	.0005	.0009	.0008	5.26
25 to 26		.0006	.0006	.0010	.0010	4.84
26 to 27		.0007	.0007	.0011	.0013	4.43
27 to 28		.0008	.0010	.0016	.0016	3.98
28 to 29		.0011	.0012	.0018	.0020	3.56
29 to 30		.0014	.0015	.0024	.0025	3.15
30 to 31		.0018	.0020	.0029	.0030	2.82
31 to 32		.0021	.0025	.0035	.0038	2.55
32 to 33		.0029	.0032	.0046	.0053	2.22
33 to 34		.0039	.0046	.0061	.0071	1.92
34 to 35		.0052	.0062	.0078	.0090	1.68
35 to 36		.0069	.0085	.0102	.0115	1.48
36 to 37		.0093	.0112	.0132	.0153	1.30
37 to 38		.0121	.0152	.0173	.0202	1.14
38 to 39		.0166	.0203	.0222	.0265	1.00
39 to 40		.0222	.0286	.0293	.0354	0.87
40 to 41		.0312	.0407	.0397	.0491	0.76
41 to 42	12.2	.0684	.0962	.0848	.1139	0.55
42 to 43	23.4	.1050	.1513	.1280	.1767	0.46
43 to 44	35.3	.1322	.1827	.1599	.2129	0.41

**Table D. 5: Colon (ascending and transverse) (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
44 to 45	16.6	.0932	.1257	.1124	.1444	0.48
45 to 46	5.2	.0583	.0754	.0699	.0878	0.59
46 to 47	1.3	.0366	.0465	.0445	.0550	0.71
47 to 48	1.3	.0297	.0375	.0365	.0448	0.78
48 to 49	1.8	.0256	.0335	.0317	.0400	0.83
49 to 50	2.0	.0216	.0288	.0268	.0344	0.90
50 to 51	0.8	.0136	.0175	.0172	.0220	1.10
51 to 52		.0075	.0097	.0108	.0126	1.40
52 to 53		.0054	.0067	.0081	.0093	1.62
53 to 54		.0041	.0049	.0059	.0071	1.87
54 to 55		.0030	.0035	.0047	.0053	2.16
55 to 56		.0023	.0025	.0035	.0040	2.48
56 to 57		.0017	.0019	.0027	.0032	2.85
57 to 58		.0013	.0014	.0021	.0024	3.23
58 to 59		.0009	.0010	.0018	.0018	3.67
59 to 60		.0007	.0008	.0013	.0014	4.17
60 to 61		.0006	.0006	.0011	.0010	4.76
61 to 62		.0004	.0005	.0008	.0008	5.57
62 to 63		.0004	.0003	.0006	.0006	6.09
63 to 64		.0002	.0003	.0005	.0005	7.04
64 to 65		.0002	.0002	.0004	.0004	8.18
65 to 66		.0001	.0001	.0003	.0002	9.27

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D. 6: Colon (descending and sigmoid)**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
16 to 17		*	*	*	.0001	15.24
17 to 18		*	*	*	.0001	15.29
18 to 19		*	*	*	*	16.96
19 to 20		*	*	.0001	.0001	16.05
20 to 21		*	.0001	.0001	.0001	17.51
21 to 22		.0001	.0001	.0001	.0001	12.78
22 to 23		.0001	.0001	.0002	.0002	14.71
23 to 24		.0001	.0002	.0003	.0003	12.27
24 to 25		.0002	.0002	.0003	.0003	12.13
25 to 26		.0002	.0002	.0004	.0004	11.39
26 to 27		.0002	.0003	.0005	.0005	10.04
27 to 28		.0002	.0003	.0004	.0005	9.38
28 to 29		.0004	.0004	.0008	.0007	8.11
29 to 30		.0005	.0005	.0009	.0009	7.18
30 to 31		.0006	.0007	.0009	.0010	6.59
31 to 32		.0007	.0007	.0012	.0013	5.85
32 to 33		.0009	.0011	.0016	.0016	5.24
33 to 34		.0012	.0013	.0022	.0021	4.54
34 to 35		.0016	.0019	.0027	.0029	3.96
35 to 36		.0023	.0025	.0035	.0037	3.47
36 to 37		.0028	.0035	.0044	.0049	3.04
37 to 38		.0040	.0046	.0054	.0062	2.71
38 to 39		.0051	.0060	.0073	.0080	2.36
39 to 40		.0071	.0087	.0100	.0110	2.03
40 to 41		.0106	.0117	.0137	.0147	1.77
41 to 42	1.5	.0183	.0234	.0230	.0274	1.38
42 to 43	5.4	.0337	.0442	.0403	.0500	1.09
43 to 44	9.0	.0488	.0597	.0574	.0683	0.95
44 to 45	5.1	.0414	.0494	.0489	.0568	1.01
45 to 46	5.2	.0434	.0490	.0503	.0567	1.00
46 to 47	5.8	.0455	.0532	.0534	.0625	0.97
47 to 48	6.8	.0484	.0594	.0585	.0683	0.94
48 to 49	6.4	.0454	.0579	.0553	.0674	0.95
49 to 50	6.3	.0432	.0563	.0524	.0669	0.96

**Table D. 6: Colon (descending and sigmoid) (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
50 to 51	5.7	.0396	.0533	.0489	.0632	0.99
51 to 52	5.8	.0365	.0492	.0459	.0601	1.01
52 to 53	4.5	.0310	.0370	.0395	.0468	1.10
53 to 54	6.9	.0316	.0299	.0409	.0389	1.15
54 to 55	5.6	.0300	.0237	.0397	.0313	1.22
55 to 56	5.5	.0323	.0203	.0404	.0280	1.26
56 to 57	5.1	.0315	.0180	.0382	.0247	1.33
57 to 58	4.8	.0262	.0162	.0336	.0225	1.41
58 to 59	3.8	.0223	.0125	.0279	.0178	1.57
59 to 60	0.6	.0119	.0072	.0154	.0103	1.96
60 to 61		.0072	.0054	.0092	.0081	2.29
61 to 62		.0052	.0042	.0069	.0060	2.60
62 to 63		.0037	.0033	.0057	.0050	2.93
63 to 64		.0030	.0024	.0041	.0038	3.32
64 to 65		.0022	.0019	.0035	.0030	3.78
65 to 66		.0017	.0015	.0024	.0024	4.34

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D. 7: Eye lenses**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1		.0002	.0002	.0002	.0001	2.74
1 to 2		.0006	.0006	.0007	.0009	9.74
2 to 3		.0005	.0017	.0014	.0025	15.39
3 to 4		.0021	.0022	.0037	.0030	17.18
4 to 5		.0033	.0032	.0037	.0045	17.18
5 to 6		.0025	.0051	.0064	.0083	16.46
6 to 7		.0049	.0067	.0091	.0095	14.89
7 to 8		.0070	.0086	.0096	.0166	12.87
8 to 9		.0108	.0151	.0111	.0191	11.50
9 to 10		.0122	.0183	.0194	.0269	9.75
10 to 11		.0210	.0361	.0355	.0424	7.46
11 to 12		.0620	.1002	.0711	.1049	4.92
12 to 13	100.0	.6736	1.161	.7196	1.161	1.73
13 to 14		.0358	.0496	.0419	.0613	6.43
14 to 15		.0196	.0322	.0232	.0270	8.55
15 to 16		.0105	.0140	.0130	.0195	11.29
16 to 17		.0071	.0077	.0080	.0092	14.93
17 to 18		.0036	.0043	.0070	.0062	17.16
18 to 19		.0037	.0033	.0031	.0041	18.27
19 to 20		.0010	.0014	.0020	.0017	15.35
20 to 21		.0018	.0009	.0016	.0026	15.18
21 to 22		.0008	.0011	.0011	.0015	15.27
22 to 23		.0007	.0007	.0015	.0019	12.84
23 to 24		.0007	.0009	.0014	.0019	10.85
24 to 25		.0008	.0006	.0013	.0011	9.95
25 to 26		.0003	.0009	.0014	.0008	8.07
26 to 27		.0007	.0003	.0018	.0024	9.30
27 to 28		.0003	.0012	.0015	.0018	10.04
28 to 29		.0003	.0005	.0003	.0008	6.22
29 to 30		.0009	.0008	.0001	.0010	8.38
30 to 31		.0002	.0009	.0004	.0009	5.34
31 to 32		.0003	.0002	.0011	.0008	5.56
32 to 33		.0004	.0004	.0002	.0002	3.72
33 to 34		.0004	.0001	.0002	.0009	3.38

Table D. 7: Eye lenses (continued)

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
34 to 35		.0004	.0002	.0006	.0005	3.79
35 to 36		.0007	.0004	.0005	.0001	5.86
36 to 37		.0002	.0003	.0001	*	1.96
37 to 38		*	.0001	.0006	.0003	3.52
38 to 39		*	.0003	.0003	.0002	2.35
39 to 40		.0001	.0001	.0001	.0007	2.32
40 to 41		.0001	.0005	.0002	.0002	3.91
41 to 42		*	*	.0003	.0002	1.95
42 to 43		*	.0003	.0003	*	1.48
43 to 44		*	.0003	.0002	.0002	1.95
44 to 45		*	.0001	*	.0002	1.17
45 to 46		.0003	*	*	*	1.56
46 to 47		*	*	.0003	*	0.78
47 to 48		*	*	*	*	0.39
48 to 49		*	*	*	*	0.39
49 to 50		*	.0001	*	*	0.39
50 to 51		*	*	*	*	0.00
51 to 52		*	*	*	*	0.39
52 to 53		*	*	.0003	*	0.39
53 to 54		*	*	*	*	0.00
54 to 55		*	*	*	*	0.00
55 to 56		*	*	*	*	0.00
56 to 57		*	*	*	*	0.00
57 to 58		*	*	*	*	0.00
58 to 59		*	*	.0001	*	0.39
59 to 60		*	*	*	*	0.00
60 to 61		*	*	*	*	0.00
61 to 62		*	*	*	*	0.00
62 to 63		*	*	*	*	0.00
63 to 64		.0001	*	*	*	0.39

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D. 8: Kidneys**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
10 to 11		*	*	.0001	.0001	13.70
11 to 12		*	*	.0001	.0001	11.85
12 to 13		*	*	.0001	.0001	11.88
13 to 14		*	*	.0001	.0001	10.55
14 to 15		*	.0001	.0001	.0001	9.91
15 to 16		.0001	.0001	.0001	.0001	8.94
16 to 17		.0001	.0001	.0002	.0002	8.31
17 to 18		.0001	.0001	.0002	.0002	7.82
18 to 19		.0001	.0001	.0002	.0002	6.83
19 to 20		.0001	.0002	.0003	.0003	5.85
20 to 21		.0002	.0002	.0004	.0004	4.91
21 to 22		.0002	.0003	.0005	.0005	3.03
22 to 23		.0004	.0004	.0007	.0007	3.64
23 to 24		.0005	.0005	.0009	.0010	3.28
24 to 25		.0006	.0007	.0011	.0012	2.94
25 to 26		.0008	.0008	.0014	.0014	2.63
26 to 27		.0009	.0010	.0017	.0018	2.38
27 to 28		.0012	.0013	.0020	.0021	2.17
28 to 29		.0014	.0015	.0025	.0026	1.95
29 to 30		.0019	.0019	.0031	.0031	1.75
30 to 31		.0023	.0023	.0038	.0038	1.58
31 to 32		.0030	.0029	.0048	.0046	1.43
32 to 33		.0040	.0039	.0061	.0060	1.24
33 to 34		.0054	.0052	.0084	.0079	1.09
34 to 35		.0074	.0067	.0108	.0102	0.96
35 to 36		.0098	.0087	.0140	.0127	0.85
36 to 37	0.2	.0139	.0115	.0192	.0166	0.74
37 to 38	1.8	.0221	.0164	.0289	.0226	0.62
38 to 39	5.2	.0362	.0236	.0457	.0324	0.53
39 to 40	8.2	.0502	.0318	.0621	.0422	0.47
40 to 41	12.4	.0686	.0415	.0838	.0545	0.42
41 to 42	15.0	.0815	.0508	.0986	.0662	0.38
42 to 43	15.6	.0863	.0569	.1037	.0729	0.38
43 to 44	16.9	.0876	.0620	.1048	.0783	0.37

**Table D. 8: Kidneys** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
44 to 45	13.2	.0726	.0554	.0878	.0700	0.39
45 to 46	7.8	.0516	.0421	.0634	.0528	0.44
46 to 47	3.4	.0331	.0290	.0416	.0366	0.52
47 to 48	0.4	.0199	.0178	.0257	.0234	0.64
48 to 49		.0135	.0125	.0180	.0166	0.75
49 to 50		.0098	.0092	.0135	.0130	0.86
50 to 51		.0074	.0069	.0103	.0101	0.98
51 to 52		.0054	.0052	.0080	.0077	1.12
52 to 53		.0039	.0039	.0061	.0059	1.27
53 to 54		.0029	.0029	.0045	.0046	1.45
54 to 55		.0022	.0022	.0035	.0036	1.66
55 to 56		.0017	.0017	.0027	.0027	1.90
56 to 57		.0013	.0013	.0022	.0023	2.14
57 to 58		.0010	.0010	.0017	.0018	2.42
58 to 59		.0007	.0007	.0014	.0013	2.77
59 to 60		.0006	.0006	.0010	.0010	3.13
60 to 61		.0004	.0004	.0008	.0008	3.54
61 to 62		.0003	.0003	.0006	.0006	4.06
62 to 63		.0002	.0002	.0005	.0005	4.69
63 to 64		.0002	.0002	.0004	.0003	5.41
64 to 65		.0001	.0001	.0003	.0003	6.12
65 to 66		.0001	.0001	.0002	.0002	7.07

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D. 9: Liver**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
5 to 6		*	*	.0001	.0001	8.51
6 to 7		*	*	.0001	.0001	7.45
7 to 8		*	*	.0001	.0001	6.78
8 to 9		.0001	.0001	.0001	.0001	5.78
9 to 10		.0001	.0001	.0001	.0001	5.11
10 to 11		.0001	.0001	.0002	.0002	4.66
11 to 12		.0001	.0001	.0002	.0002	4.14
12 to 13		.0001	.0001	.0002	.0002	3.81
13 to 14		.0002	.0002	.0003	.0003	3.46
14 to 15		.0002	.0002	.0004	.0004	3.07
15 to 16		.0003	.0003	.0005	.0005	2.79
16 to 17		.0003	.0004	.0006	.0006	2.49
17 to 18		.0004	.0004	.0007	.0007	2.28
18 to 19		.0005	.0005	.0008	.0008	2.10
19 to 20		.0007	.0007	.0011	.0011	1.81
20 to 21		.0009	.0010	.0015	.0015	1.52
21 to 22		.0011	.0011	.0017	.0017	0.95
22 to 23		.0016	.0017	.0025	.0025	1.17
23 to 24		.0021	.0022	.0032	.0034	1.02
24 to 25		.0027	.0029	.0041	.0043	0.91
25 to 26		.0033	.0037	.0050	.0055	0.81
26 to 27		.0043	.0048	.0063	.0069	0.73
27 to 28		.0055	.0062	.0079	.0087	0.64
28 to 29		.0071	.0079	.0099	.0109	0.57
29 to 30		.0091	.0105	.0126	.0141	0.50
30 to 31		.0118	.0134	.0158	.0175	0.45
31 to 32	0.6	.0176	.0203	.0228	.0256	0.38
32 to 33	5.2	.0341	.0417	.0433	.0515	0.28
33 to 34	10.3	.0524	.0668	.0654	.0806	0.23
34 to 35	12.7	.0643	.0802	.0791	.0958	0.22
35 to 36	12.9	.0680	.0821	.0830	.0981	0.21
36 to 37	13.0	.0710	.0869	.0863	.1031	0.21
37 to 38	12.7	.0711	.0863	.0857	.1016	0.21
38 to 39	10.7	.0650	.0793	.0787	.0928	0.22

**Table D. 9: Liver** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
39 to 40	8.4	.0567	.0694	.0679	.0808	0.23
40 to 41	5.9	.0461	.0549	.0554	.0642	0.25
41 to 42	4.1	.0355	.0422	.0431	.0496	0.28
42 to 43	2.3	.0248	.0286	.0304	.0341	0.33
43 to 44	1.0	.0162	.0181	.0207	.0224	0.39
44 to 45	0.2	.0101	.0111	.0134	.0144	0.49
45 to 46		.0070	.0076	.0096	.0102	0.58
46 to 47		.0052	.0055	.0074	.0076	0.67
47 to 48		.0038	.0040	.0056	.0058	0.76
48 to 49		.0029	.0030	.0043	.0044	0.87
49 to 50		.0022	.0023	.0034	.0034	1.00
50 to 51		.0016	.0017	.0026	.0027	1.13
51 to 52		.0012	.0013	.0021	.0022	1.28
52 to 53		.0010	.0010	.0016	.0016	1.46
53 to 54		.0007	.0007	.0012	.0013	1.67
54 to 55		.0005	.0006	.0010	.0010	1.89
55 to 56		.0004	.0004	.0008	.0008	2.15
56 to 57		.0003	.0003	.0006	.0006	2.40
57 to 58		.0003	.0003	.0005	.0005	2.70
58 to 59		.0002	.0002	.0004	.0004	3.05
59 to 60		.0002	.0002	.0003	.0003	3.50
60 to 61		.0001	.0001	.0002	.0002	4.02
61 to 62		.0001	.0001	.0002	.0002	4.55
62 to 63		.0001	.0001	.0001	.0001	5.19
63 to 64		*	*	.0001	.0001	6.07
64 to 65		*	*	.0001	.0001	6.78
65 to 66		*	*	.0001	.0001	7.97

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.10: Lungs**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
2 to 3		*	*	.0001	.0001	10.51
3 to 4		.0001	.0001	.0001	.0001	8.81
4 to 5		.0001	.0001	.0002	.0002	7.65
5 to 6		.0001	.0001	.0002	.0002	6.65
6 to 7		.0001	.0001	.0003	.0003	5.76
7 to 8		.0002	.0002	.0004	.0004	5.05
8 to 9		.0002	.0002	.0004	.0005	4.53
9 to 10		.0003	.0003	.0006	.0006	4.08
10 to 11		.0004	.0004	.0007	.0007	3.59
11 to 12		.0006	.0005	.0009	.0009	3.12
12 to 13		.0007	.0006	.0011	.0011	2.84
13 to 14		.0008	.0008	.0014	.0014	2.57
14 to 15		.0011	.0010	.0017	.0016	2.31
15 to 16		.0014	.0013	.0021	.0021	2.06
16 to 17		.0018	.0016	.0026	.0025	1.85
17 to 18		.0024	.0022	.0033	.0033	1.61
18 to 19		.0032	.0031	.0045	.0043	1.40
19 to 20		.0050	.0048	.0067	.0064	1.14
20 to 21		.0079	.0082	.0105	.0104	0.91
21 to 22	0.1	.0100	.0105	.0131	.0135	0.55
22 to 23	1.2	.0175	.0183	.0228	.0236	0.63
23 to 24	3.7	.0264	.0275	.0340	.0350	0.54
24 to 25	6.7	.0386	.0410	.0488	.0497	0.46
25 to 26	9.4	.0485	.0530	.0612	.0644	0.41
26 to 27	10.6	.0549	.0607	.0689	.0735	0.39
27 to 28	10.4	.0590	.0656	.0732	.0794	0.38
28 to 29	10.2	.0595	.0645	.0731	.0785	0.38
29 to 30	10.5	.0612	.0656	.0754	.0794	0.38
30 to 31	14.3	.0740	.0776	.0901	.0936	0.35
31 to 32	14.6	.0718	.0738	.0878	.0892	0.35
32 to 33	7.0	.0467	.0457	.0581	.0556	0.42
33 to 34	1.3	.0249	.0245	.0318	.0309	0.53
34 to 35	0.1	.0160	.0158	.0209	.0206	0.64
35 to 36		.0115	.0113	.0156	.0154	0.74

**Table D.10: Lungs** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
36 to 37		.0085	.0085	.0120	.0119	0.85
37 to 38		.0065	.0065	.0093	.0092	0.96
38 to 39		.0050	.0050	.0073	.0072	1.08
39 to 40		.0038	.0038	.0057	.0057	1.22
40 to 41		.0029	.0030	.0044	.0046	1.37
41 to 42		.0023	.0023	.0036	.0037	1.54
42 to 43		.0017	.0018	.0028	.0029	1.74
43 to 44		.0014	.0014	.0022	.0022	1.96
44 to 45		.0010	.0011	.0017	.0018	2.20
45 to 46		.0008	.0008	.0014	.0015	2.47
46 to 47		.0006	.0006	.0011	.0011	2.81
47 to 48		.0005	.0005	.0008	.0009	3.18
48 to 49		.0004	.0004	.0007	.0007	3.59
49 to 50		.0003	.0003	.0006	.0006	3.99
50 to 51		.0002	.0002	.0004	.0004	4.54
51 to 52		.0002	.0002	.0004	.0004	5.06
52 to 53		.0001	.0002	.0003	.0003	5.49
53 to 54		.0001	.0001	.0002	.0002	6.17
54 to 55		.0001	.0001	.0002	.0002	7.32
55 to 56		.0001	.0001	.0001	.0001	7.91
56 to 57		.0001	.0001	.0001	.0001	9.12
57 to 58		*	*	.0001	.0001	10.17
58 to 59		*	*	.0001	.0001	11.46
59 to 60		*	*	.0001	.0001	13.01
60 to 61		*	*	*	*	14.72
61 to 62		*	*	.0001	*	15.24

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.11: Oesophagus**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
1 to 2		*	*	.0001	.0001	0.39
2 to 3		.0001	*	.0001	.0001	0.43
3 to 4		.0001	*	.0001	.0001	0.44
4 to 5		.0001	.0001	.0002	.0003	0.47
5 to 6		.0001	.0001	.0003	.0002	0.51
6 to 7		.0002	.0002	.0003	.0004	0.64
7 to 8		.0002	.0002	.0004	.0006	0.75
8 to 9		.0003	.0003	.0006	.0006	0.88
9 to 10		.0003	.0002	.0008	.0008	1.04
10 to 11		.0006	.0005	.0012	.0010	1.22
11 to 12		.0007	.0005	.0010	.0014	1.37
12 to 13		.0008	.0008	.0016	.0019	1.49
13 to 14		.0014	.0012	.0019	.0023	1.59
14 to 15		.0017	.0017	.0024	.0028	1.65
15 to 16		.0023	.0020	.0035	.0030	1.66
16 to 17		.0030	.0030	.0048	.0046	1.62
17 to 18		.0047	.0040	.0062	.0060	1.57
18 to 19		.0067	.0060	.0087	.0083	1.51
19 to 20		.0104	.0100	.0135	.0135	1.44
20 to 21		.0158	.0166	.0189	.0219	1.33
21 to 22	3.8	.0283	.0372	.0348	.0424	1.16
22 to 23	9.6	.0489	.0618	.0584	.0728	1.01
23 to 24	9.6	.0458	.0567	.0581	.0708	0.90
24 to 25	9.6	.0478	.0541	.0614	.0709	0.80
25 to 26	9.6	.0459	.0553	.0603	.0722	0.75
26 to 27	9.6	.0473	.0556	.0624	.0708	0.73
27 to 28	9.6	.0469	.0547	.0617	.0708	0.76
28 to 29	9.6	.0456	.0519	.0620	.0678	0.77
29 to 30	9.6	.0432	.0497	.0577	.0647	0.82
30 to 31	9.6	.0434	.0456	.0569	.0595	0.89
31 to 32	9.6	.0401	.0405	.0518	.0538	0.98
32 to 33		.0180	.0195	.0238	.0260	1.12
33 to 34		.0139	.0141	.0192	.0197	1.26
34 to 35		.0106	.0112	.0155	.0146	1.39

**Table D.11: Oesophagus** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
35 to 36		.0084	.0083	.0119	.0124	1.50
36 to 37		.0064	.0066	.0087	.0099	1.60
37 to 38		.0053	.0049	.0072	.0073	1.69
38 to 39		.0039	.0039	.0057	.0061	1.72
39 to 40		.0026	.0031	.0044	.0044	1.74
40 to 41		.0019	.0025	.0037	.0037	1.70
41 to 42		.0018	.0016	.0030	.0028	1.66
42 to 43		.0014	.0014	.0024	.0020	1.57
43 to 44		.0008	.0011	.0019	.0017	1.45
44 to 45		.0007	.0008	.0015	.0015	1.32
45 to 46		.0007	.0006	.0010	.0012	1.17
46 to 47		.0004	.0006	.0010	.0011	1.03
47 to 48		.0003	.0004	.0008	.0009	0.89
48 to 49		.0002	.0003	.0005	.0006	0.76
49 to 50		.0002	.0003	.0004	.0006	0.65
50 to 51		.0002	.0002	.0004	.0003	0.54
51 to 52		.0001	.0001	.0002	.0003	0.47
52 to 53		.0001	.0001	.0003	.0003	0.40
53 to 54		.0001	.0001	.0003	.0002	0.34
54 to 55		.0001	.0001	.0001	.0001	0.28
55 to 56		.0001	.0001	.0001	.0002	0.24
56 to 57		*	.0001	.0001	.0002	0.22
57 to 58		.0001	*	.0001	.0001	0.18
58 to 59		*	*	.0001	.0001	0.14
59 to 60		*	*	.0001	*	0.09

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.12: Ovaries**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
8 to 9		*	*	.0001	*	0.78
9 to 10		*	*	*	*	0.00
10 to 11		*	*	*	*	1.17
11 to 12		*	*	*	*	1.17
12 to 13		*	*	*	*	1.56
13 to 14		*	*	.0001	*	1.17
14 to 15		*	.0001	*	*	1.57
15 to 16		*	*	*	.0001	1.16
16 to 17		*	*	*	.0001	2.62
17 to 18		*	*	.0001	*	2.35
18 to 19		*	.0001	*	.0002	3.91
19 to 20		*	*	.0001	.0002	5.08
20 to 21		.0001	*	*	*	2.74
21 to 22		*	*	.0001	*	8.00
22 to 23		*	.0001	.0001	.0001	7.80
23 to 24		*	.0001	.0001	.0001	8.38
24 to 25		.0002	*	.0003	.0002	11.35
25 to 26		.0002	.0001	.0005	.0002	12.73
26 to 27		.0001	.0003	.0004	.0002	11.97
27 to 28		.0001	.0001	.0005	.0006	15.43
28 to 29		.0003	.0002	.0008	.0003	16.29
29 to 30		.0002	.0003	.0009	.0005	16.34
30 to 31		.0004	.0003	.0006	.0005	19.01
31 to 32		.0006	.0004	.0008	.0008	17.89
32 to 33		.0004	.0005	.0013	.0009	17.76
33 to 34		.0008	.0009	.0013	.0014	16.49
34 to 35		.0011	.0013	.0016	.0017	14.73
35 to 36		.0014	.0016	.0024	.0024	13.07
36 to 37		.0022	.0021	.0030	.0028	11.36
37 to 38		.0019	.0022	.0029	.0042	11.35
38 to 39		.0028	.0032	.0049	.0044	9.55
39 to 40		.0035	.0046	.0065	.0054	8.34
40 to 41		.0042	.0055	.0083	.0080	7.45
41 to 42		.0067	.0077	.0097	.0111	6.40

Table D.12: Ovaries (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
42 to 43		.0076	.0092	.0130	.0127	5.87
43 to 44		.0101	.0120	.0158	.0152	5.18
44 to 45		.0137	.0187	.0181	.0209	4.54
45 to 46		.0184	.0231	.0263	.0265	3.95
46 to 47		.0252	.0318	.0333	.0373	3.45
47 to 48		.0355	.0422	.0459	.0526	3.01
48 to 49	6.3	.0565	.0754	.0753	.0872	2.46
49 to 50	43.7	.1301	.1778	.1683	.2098	1.76
50 to 51	43.7	.1240	.1750	.1643	.2126	1.78
51 to 52	6.3	.0530	.0746	.0671	.0902	2.51
52 to 53		.0309	.0420	.0410	.0509	3.11
53 to 54		.0231	.0315	.0274	.0384	3.57
54 to 55		.0164	.0225	.0246	.0283	4.05
55 to 56		.0134	.0159	.0173	.0229	4.59
56 to 57		.0091	.0112	.0141	.0143	5.41
57 to 58		.0077	.0087	.0115	.0117	6.02
58 to 59		.0061	.0063	.0080	.0078	7.08
59 to 60		.0041	.0043	.0059	.0065	8.10
60 to 61		.0029	.0034	.0049	.0042	9.40
61 to 62		.0025	.0029	.0033	.0044	10.32
62 to 63		.0017	.0021	.0025	.0031	12.14
63 to 64		.0013	.0013	.0023	.0018	13.76
64 to 65		.0013	.0010	.0017	.0016	15.57
65 to 66		.0007	.0008	.0011	.0013	16.58

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.13: Pancreas**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
5 to 6		*	*	*	.0001	12.40
6 to 7		*	*	*	.0001	15.57
7 to 8		*	*	*	.0001	15.83
8 to 9		*	*	.0001	.0001	15.84
9 to 10		*	*	.0001	.0001	17.98
10 to 11		.0001	*	.0001	.0001	16.35
11 to 12		*	.0001	.0001	.0001	16.55
12 to 13		.0001	.0001	.0001	.0001	17.10
13 to 14		.0001	.0001	.0002	.0002	15.51
14 to 15		.0001	.0001	.0002	.0002	13.89
15 to 16		.0001	.0002	.0003	.0002	13.43
16 to 17		.0001	.0001	.0003	.0003	12.35
17 to 18		.0002	.0002	.0004	.0004	10.81
18 to 19		.0002	.0002	.0004	.0005	10.37
19 to 20		.0003	.0003	.0006	.0006	9.15
20 to 21		.0005	.0004	.0008	.0009	7.22
21 to 22		.0005	.0005	.0011	.0009	4.64
22 to 23		.0008	.0009	.0015	.0015	5.51
23 to 24		.0010	.0011	.0019	.0019	5.04
24 to 25		.0014	.0014	.0025	.0024	4.38
25 to 26		.0018	.0018	.0027	.0031	3.98
26 to 27		.0021	.0022	.0035	.0038	3.53
27 to 28		.0027	.0029	.0044	.0046	3.19
28 to 29		.0036	.0037	.0053	.0060	2.84
29 to 30		.0046	.0049	.0068	.0071	2.53
30 to 31		.0056	.0063	.0086	.0090	2.26
31 to 32		.0071	.0079	.0106	.0120	2.03
32 to 33		.0097	.0116	.0137	.0151	1.76
33 to 34		.0122	.0151	.0182	.0201	1.55
34 to 35		.0170	.0201	.0232	.0269	1.36
35 to 36		.0224	.0271	.0301	.0343	1.20
36 to 37	1.3	.0315	.0377	.0418	.0491	1.04
37 to 38	9.2	.0534	.0611	.0697	.0794	0.87
38 to 39	27.2	.0894	.1093	.1153	.1369	0.70

**Table D.13: Pancreas** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
39 to 40	35.4	.1087	.1297	.1357	.1637	0.64
40 to 41	15.9	.0733	.0883	.0917	.1071	0.76
41 to 42	11.0	.0565	.0676	.0730	.0855	0.84
42 to 43		.0310	.0358	.0401	.0453	1.06
43 to 44		.0237	.0269	.0308	.0348	1.19
44 to 45		.0173	.0202	.0238	.0261	1.35
45 to 46		.0134	.0148	.0181	.0197	1.54
46 to 47		.0104	.0108	.0142	.0150	1.76
47 to 48		.0078	.0082	.0107	.0116	1.99
48 to 49		.0059	.0060	.0083	.0089	2.29
49 to 50		.0043	.0048	.0067	.0071	2.55
50 to 51		.0032	.0035	.0051	.0056	2.94
51 to 52		.0025	.0028	.0040	.0043	3.26
52 to 53		.0018	.0020	.0029	.0032	3.80
53 to 54		.0013	.0015	.0023	.0026	4.34
54 to 55		.0010	.0011	.0018	.0018	4.96
55 to 56		.0008	.0008	.0014	.0015	5.63
56 to 57		.0005	.0007	.0011	.0012	6.43
57 to 58		.0004	.0005	.0009	.0009	7.16
58 to 59		.0004	.0004	.0007	.0008	8.24
59 to 60		.0003	.0003	.0005	.0005	8.70
60 to 61		.0002	.0002	.0004	.0004	10.58
61 to 62		.0002	.0002	.0003	.0003	11.75
62 to 63		.0001	.0001	.0002	.0003	13.72
63 to 64		.0001	.0001	.0002	.0002	14.96
64 to 65		.0001	.0001	.0002	.0001	17.47
65 to 66		*	.0001	.0001	.0001	18.13

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.14: Red bone marrow in the arm bones**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
3 to 4		*	*	.0001	.0001	12.21
4 to 5		*	*	.0001	.0001	11.22
5 to 6		.0001	.0001	.0001	.0001	9.61
6 to 7		.0001	.0001	.0002	.0001	8.26
7 to 8		.0001	.0001	.0002	.0002	7.41
8 to 9		.0001	.0001	.0003	.0003	6.39
9 to 10		.0001	.0002	.0003	.0003	6.03
10 to 11		.0002	.0002	.0003	.0003	5.51
11 to 12		.0002	.0002	.0004	.0004	5.30
12 to 13		.0003	.0003	.0004	.0004	4.87
13 to 14		.0003	.0003	.0005	.0005	4.55
14 to 15		.0004	.0004	.0005	.0005	4.25
15 to 16		.0004	.0004	.0006	.0006	4.19
16 to 17		.0004	.0004	.0006	.0006	4.12
17 to 18		.0004	.0004	.0006	.0006	3.99
18 to 19		.0004	.0004	.0006	.0006	3.99
19 to 20		.0005	.0005	.0009	.0008	3.49
20 to 21	0.2	.0035	.0038	.0046	.0049	1.50
21 to 22	3.1	.0132	.0158	.0173	.0202	0.55
22 to 23	7.9	.0317	.0385	.0422	.0497	0.54
23 to 24	7.8	.0291	.0354	.0396	.0469	0.56
24 to 25	4.0	.0180	.0219	.0248	.0290	0.69
25 to 26	1.9	.0110	.0127	.0151	.0174	0.85
26 to 27	1.3	.0082	.0093	.0114	.0128	0.96
27 to 28	1.2	.0073	.0080	.0103	.0111	1.02
28 to 29	1.2	.0070	.0075	.0097	.0103	1.06
29 to 30	1.2	.0066	.0070	.0095	.0098	1.09
30 to 31	1.2	.0067	.0067	.0092	.0094	1.10
31 to 32	1.2	.0067	.0067	.0095	.0093	1.10
32 to 33	1.2	.0069	.0066	.0096	.0094	1.10
33 to 34	1.2	.0070	.0066	.0099	.0090	1.10
34 to 35	1.3	.0075	.0065	.0103	.0091	1.08
35 to 36	1.6	.0093	.0076	.0124	.0104	1.00
36 to 37	1.7	.0106	.0087	.0140	.0117	0.95

**Table D.14: Red bone marrow in the arm bones (continued)**

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
37 to 38	2.6	.0149	.0121	.0194	.0161	0.83
38 to 39	3.5	.0200	.0153	.0252	.0205	0.74
39 to 40	4.3	.0229	.0184	.0297	.0236	0.69
40 to 41	4.7	.0245	.0185	.0316	.0246	0.67
41 to 42	4.3	.0229	.0170	.0292	.0228	0.70
42 to 43	3.1	.0174	.0135	.0228	.0179	0.77
43 to 44	2.1	.0123	.0101	.0162	.0138	0.88
44 to 45	1.4	.0091	.0078	.0122	.0105	0.99
45 to 46	1.2	.0078	.0069	.0102	.0094	1.06
46 to 47	1.0	.0066	.0060	.0088	.0080	1.13
47 to 48	0.9	.0058	.0055	.0078	.0072	1.20
48 to 49	0.7	.0050	.0046	.0067	.0062	1.28
49 to 50	0.7	.0046	.0045	.0063	.0060	1.31
50 to 51	0.7	.0051	.0050	.0070	.0069	1.25
51 to 52	0.9	.0060	.0060	.0079	.0079	1.17
52 to 53	1.3	.0080	.0087	.0101	.0109	1.02
53 to 54	2.2	.0120	.0135	.0157	.0172	0.84
54 to 55	2.5	.0140	.0152	.0175	.0192	0.80
55 to 56	2.3	.0133	.0154	.0170	.0192	0.81
56 to 57	3.1	.0167	.0196	.0210	.0243	0.72
57 to 58	3.5	.0187	.0219	.0236	.0276	0.68
58 to 59	2.7	.0150	.0179	.0191	.0226	0.74
59 to 60	2.6	.0147	.0171	.0185	.0214	0.75
60 to 61	2.4	.0139	.0158	.0175	.0200	0.78
61 to 62	1.9	.0116	.0130	.0147	.0162	0.85
62 to 63	1.3	.0085	.0091	.0109	.0116	1.00
63 to 64	1.5	.0089	.0091	.0113	.0114	1.00
64 to 65	0.8	.0053	.0056	.0065	.0070	1.28
65 to 66	0.3	.0021	.0022	.0028	.0027	1.94

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.15: Red bone marrow in the clavicles**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
1 to 2		.0001	.0001	.0001	.0001	16.24
2 to 3		.0001	.0001	.0003	.0003	16.37
3 to 4		.0002	.0002	.0003	.0003	16.49
4 to 5		.0003	.0003	.0004	.0004	16.26
5 to 6		.0002	.0002	.0006	.0006	14.92
6 to 7		.0004	.0003	.0011	.0007	13.44
7 to 8		.0006	.0004	.0010	.0009	11.61
8 to 9		.0007	.0005	.0011	.0013	10.20
9 to 10		.0008	.0009	.0015	.0015	9.22
10 to 11		.0010	.0009	.0020	.0018	8.20
11 to 12		.0016	.0011	.0026	.0023	7.18
12 to 13		.0019	.0017	.0027	.0028	6.46
13 to 14		.0023	.0022	.0036	.0033	5.80
14 to 15		.0030	.0024	.0043	.0042	5.32
15 to 16		.0038	.0035	.0054	.0051	4.67
16 to 17		.0048	.0042	.0067	.0065	4.30
17 to 18		.0058	.0056	.0085	.0077	3.79
18 to 19		.0074	.0066	.0099	.0104	3.48
19 to 20		.0115	.0117	.0160	.0146	2.81
20 to 21	24.1	.1041	.1259	.1318	.1552	1.06
21 to 22	29.8	.1007	.1391	.1323	.1744	0.69
22 to 23	21.3	.0851	.1317	.1101	.1671	1.07
23 to 24	24.8	.0774	.1258	.1060	.1636	1.12
24 to 25		.0188	.0248	.0261	.0325	2.07
25 to 26		.0122	.0149	.0168	.0203	2.55
26 to 27		.0082	.0101	.0123	.0150	3.03
27 to 28		.0065	.0074	.0098	.0114	3.41
28 to 29		.0047	.0058	.0080	.0090	3.80
29 to 30		.0040	.0044	.0061	.0061	4.33
30 to 31		.0031	.0032	.0052	.0055	4.72
31 to 32		.0026	.0026	.0040	.0041	5.36
32 to 33		.0021	.0022	.0033	.0038	5.76
33 to 34		.0017	.0018	.0030	.0031	6.12
34 to 35		.0014	.0012	.0024	.0022	7.16

**Table D.15: Red bone marrow in the clavicles (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
35 to 36		.0009	.0011	.0018	.0019	7.99
36 to 37		.0009	.0008	.0016	.0016	8.80
37 to 38		.0006	.0007	.0014	.0011	9.66
38 to 39		.0006	.0007	.0010	.0009	11.02
39 to 40		.0004	.0005	.0007	.0009	12.23
40 to 41		.0004	.0003	.0007	.0005	13.61
41 to 42		.0003	.0002	.0005	.0005	14.72
42 to 43		.0002	.0002	.0004	.0003	15.87
43 to 44		.0002	.0002	.0003	.0004	16.33
44 to 45		.0001	.0001	.0002	.0002	17.09
45 to 46		.0001	.0001	.0002	.0002	17.97
46 to 47		.0001	.0001	.0001	.0002	17.49
47 to 48		*	*	.0002	.0002	14.23
48 to 49		*	*	.0001	.0002	13.22
49 to 50		*	*	.0001	.0001	15.81
50 to 51		*	*	*	.0001	11.51
51 to 52		*	*	.0001	*	7.76
52 to 53		*	*	*	.0001	9.38

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.16: Red bone marrow in the cranium**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1	5.4	.0247	.0244	.0327	.0327	0.46
1 to 2	9.9	.0400	.0401	.0547	.0550	0.35
2 to 3	8.1	.0372	.0385	.0501	.0516	0.35
3 to 4	6.8	.0334	.0353	.0447	.0472	0.37
4 to 5	5.2	.0276	.0298	.0373	.0399	0.39
5 to 6	4.1	.0233	.0243	.0317	.0329	0.42
6 to 7	3.5	.0212	.0218	.0289	.0298	0.44
7 to 8	2.8	.0186	.0192	.0257	.0267	0.46
8 to 9	2.5	.0181	.0194	.0254	.0268	0.46
9 to 10	4.4	.0243	.0272	.0336	.0371	0.40
10 to 11	6.8	.0302	.0350	.0421	.0483	0.37
11 to 12	6.9	.0289	.0307	.0410	.0433	0.38
12 to 13	13.2	.0387	.0373	.0557	.0545	0.35
13 to 14	10.7	.0348	.0323	.0499	.0470	0.37
14 to 15	6.2	.0238	.0254	.0343	.0363	0.42
15 to 16	2.8	.0131	.0151	.0196	.0219	0.54
16 to 17	0.5	.0062	.0070	.0096	.0106	0.73
17 to 18	0.2	.0038	.0042	.0060	.0066	0.92
18 to 19		.0021	.0021	.0034	.0035	1.21
19 to 20		.0015	.0015	.0025	.0025	1.42
20 to 21		.0014	.0014	.0023	.0023	1.48
21 to 22		.0011	.0011	.0017	.0017	1.12
22 to 23		.0010	.0010	.0016	.0017	1.73
23 to 24		.0008	.0009	.0014	.0015	1.88
24 to 25		.0006	.0007	.0011	.0012	2.10
25 to 26		.0005	.0006	.0009	.0010	2.33
26 to 27		.0004	.0005	.0007	.0008	2.58
27 to 28		.0003	.0004	.0006	.0006	2.92
28 to 29		.0003	.0003	.0005	.0005	3.15
29 to 30		.0002	.0002	.0004	.0004	3.59
30 to 31		.0002	.0002	.0003	.0004	3.95
31 to 32		.0001	.0001	.0003	.0003	4.36
32 to 33		.0001	.0001	.0002	.0002	4.77
33 to 34		.0001	.0001	.0002	.0002	5.04

**Table D.16: Red bone marrow in the cranium (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0001	.0001	.0002	.0002	5.63
35 to 36		.0001	.0001	.0002	.0002	5.87
36 to 37		.0001	.0001	.0001	.0001	6.53
37 to 38		*	.0001	.0001	.0001	7.07
38 to 39		*	*	.0001	.0001	7.98
39 to 40		*	*	.0001	.0001	8.91
40 to 41		*	*	.0001	.0001	9.72

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.17: Red bone marrow in the leg bones**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
40 to 41		*	*	.0001	.0001	8.09
41 to 42		*	*	.0001	.0001	7.39
42 to 43		*	*	.0001	.0001	6.61
43 to 44		*	*	.0001	.0001	6.03
44 to 45		*	.0001	.0001	.0001	5.39
45 to 46		.0001	.0001	.0001	.0001	4.70
46 to 47		.0001	.0001	.0002	.0002	4.23
47 to 48		.0001	.0001	.0002	.0002	3.81
48 to 49		.0001	.0001	.0003	.0003	3.39
49 to 50		.0002	.0002	.0004	.0003	2.92
50 to 51		.0003	.0003	.0005	.0005	2.54
51 to 52		.0003	.0003	.0006	.0006	2.22
52 to 53		.0005	.0005	.0008	.0008	1.94
53 to 54		.0007	.0006	.0010	.0011	1.67
54 to 55		.0009	.0009	.0014	.0015	1.43
55 to 56		.0013	.0013	.0020	.0020	1.22
56 to 57	0.1	.0020	.0021	.0030	.0032	1.01
57 to 58	0.9	.0039	.0043	.0057	.0063	0.76
58 to 59	2.2	.0064	.0072	.0094	.0103	0.62
59 to 60	3.3	.0090	.0096	.0131	.0138	0.55
60 to 61	2.9	.0088	.0087	.0126	.0127	0.56
61 to 62	2.1	.0075	.0073	.0109	.0105	0.60
62 to 63	1.5	.0061	.0059	.0087	.0085	0.65
63 to 64	1.0	.0047	.0048	.0068	.0068	0.72
64 to 65	0.6	.0037	.0039	.0055	.0056	0.78
65 to 66	0.5	.0032	.0033	.0047	.0048	0.84

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.18: Red bone marrow in the mandible**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1		*	*	.0001	.0001	17.85
1 to 2		.0001	.0001	.0002	.0003	15.70
2 to 3		.0002	.0002	.0004	.0005	11.64
3 to 4		.0003	.0003	.0006	.0007	9.80
4 to 5		.0004	.0004	.0010	.0009	8.54
5 to 6		.0006	.0006	.0012	.0013	7.41
6 to 7		.0008	.0007	.0016	.0016	6.61
7 to 8		.0011	.0011	.0022	.0023	5.72
8 to 9		.0013	.0013	.0028	.0028	5.02
9 to 10		.0016	.0018	.0037	.0039	4.43
10 to 11		.0025	.0027	.0045	.0048	3.80
11 to 12		.0034	.0036	.0060	.0069	3.25
12 to 13		.0054	.0055	.0092	.0102	2.65
13 to 14	1.9	.0126	.0132	.0196	.0203	1.96
14 to 15	5.3	.0255	.0265	.0358	.0386	1.46
15 to 16	9.4	.0384	.0415	.0565	.0590	1.20
16 to 17	16.1	.0583	.0620	.0833	.0900	1.00
17 to 18	18.4	.0674	.0793	.0986	.1118	0.91
18 to 19	22.9	.0840	.1095	.1184	.1520	0.81
19 to 20	17.6	.0683	.0923	.0973	.1281	0.89
20 to 21	8.4	.0426	.0622	.0558	.0790	1.12
21 to 22		.0067	.0089	.0093	.0115	1.67
22 to 23		.0050	.0063	.0072	.0091	2.80
23 to 24		.0043	.0062	.0066	.0085	2.89
24 to 25		.0038	.0048	.0063	.0071	3.14
25 to 26		.0032	.0042	.0048	.0056	3.43
26 to 27		.0026	.0035	.0039	.0052	3.78
27 to 28		.0019	.0027	.0035	.0040	4.14
28 to 29		.0018	.0022	.0030	.0035	4.53
29 to 30		.0014	.0019	.0023	.0029	5.00
30 to 31		.0011	.0014	.0020	.0024	5.54
31 to 32		.0010	.0011	.0016	.0017	6.03
32 to 33		.0008	.0008	.0014	.0014	6.76
33 to 34		.0005	.0007	.0011	.0012	7.52

**Table D.18: Red bone marrow in the mandible** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0004	.0006	.0010	.0009	8.45
35 to 36		.0004	.0005	.0008	.0009	9.00
36 to 37		.0003	.0003	.0006	.0008	10.18
37 to 38		.0002	.0003	.0005	.0006	11.03
38 to 39		.0002	.0002	.0004	.0005	12.11
39 to 40		.0002	.0002	.0003	.0004	13.08
40 to 41		.0001	.0002	.0002	.0003	15.05
41 to 42		.0001	.0001	.0002	.0002	16.50
42 to 43		.0001	.0001	.0002	.0002	17.56
43 to 44		.0001	.0001	.0002	.0002	17.45
44 to 45		.0001	*	.0001	.0001	16.79
45 to 46		*	*	.0001	.0001	18.60
46 to 47		*	*	.0001	.0001	16.97
47 to 48		*	*	*	*	13.55
48 to 49		*	*	*	*	13.81
49 to 50		*	*	*	*	10.76
50 to 51		*	*	.0001	*	10.63

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.19: Red bone marrow in the pelvis**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
25 to 26		*	*	.0001	.0001	13.28
26 to 27		*	*	.0001	.0001	12.59
27 to 28		*	*	.0001	.0001	11.41
28 to 29		*	*	.0001	.0001	10.36
29 to 30		*	*	.0001	.0001	9.23
30 to 31		*	.0001	.0001	.0001	8.59
31 to 32		.0001	.0001	.0002	.0002	7.66
32 to 33		.0001	.0001	.0002	.0002	6.68
33 to 34		.0001	.0001	.0003	.0003	6.09
34 to 35		.0002	.0001	.0003	.0003	5.29
35 to 36		.0002	.0002	.0004	.0004	4.76
36 to 37		.0003	.0003	.0005	.0005	4.30
37 to 38		.0003	.0003	.0007	.0007	3.68
38 to 39		.0004	.0004	.0009	.0009	3.30
39 to 40		.0005	.0006	.0011	.0010	2.98
40 to 41		.0007	.0007	.0014	.0014	2.61
41 to 42		.0009	.0010	.0017	.0017	2.31
42 to 43		.0012	.0012	.0021	.0022	2.07
43 to 44		.0016	.0015	.0027	.0027	1.83
44 to 45		.0021	.0020	.0035	.0034	1.62
45 to 46		.0027	.0027	.0045	.0044	1.43
46 to 47		.0037	.0035	.0060	.0057	1.25
47 to 48		.0052	.0048	.0080	.0075	1.08
48 to 49	0.6	.0085	.0075	.0121	.0113	0.90
49 to 50	3.6	.0161	.0137	.0234	.0203	0.70
50 to 51	6.3	.0230	.0195	.0333	.0284	0.60
51 to 52	8.8	.0293	.0261	.0423	.0377	0.53
52 to 53	9.4	.0310	.0308	.0450	.0442	0.50
53 to 54	9.5	.0311	.0331	.0459	.0480	0.50
54 to 55	8.1	.0296	.0333	.0430	.0477	0.50
55 to 56	8.1	.0295	.0339	.0429	.0490	0.50
56 to 57	9.6	.0309	.0355	.0453	.0512	0.50
57 to 58	8.0	.0272	.0296	.0400	.0427	0.53
58 to 59	6.9	.0240	.0254	.0355	.0369	0.56

**Table D.19: Red bone marrow in the pelvis (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
59 to 60	7.7	.0239	.0254	.0352	.0372	0.56
60 to 61	6.6	.0217	.0238	.0319	.0344	0.58
61 to 62	4.3	.0162	.0163	.0239	.0242	0.67
62 to 63	2.3	.0111	.0108	.0163	.0159	0.80
63 to 64	0.3	.0062	.0061	.0093	.0093	1.00
64 to 65		.0042	.0041	.0064	.0064	1.19
65 to 66		.0030	.0030	.0046	.0046	1.39

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.20: Red bone marrow in the ribs**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
3 to 4		*	*	.0001	.0001	15.34
4 to 5		*	*	.0001	.0001	13.90
5 to 6		*	*	.0001	.0001	11.45
6 to 7		*	*	.0001	.0001	10.53
7 to 8		.0001	.0001	.0002	.0002	8.92
8 to 9		.0001	.0001	.0002	.0002	8.02
9 to 10		.0001	.0001	.0003	.0002	7.39
10 to 11		.0002	.0002	.0004	.0003	6.61
11 to 12		.0002	.0002	.0005	.0004	5.85
12 to 13		.0003	.0002	.0005	.0005	5.24
13 to 14		.0003	.0003	.0006	.0006	4.84
14 to 15		.0004	.0003	.0007	.0006	4.52
15 to 16		.0005	.0004	.0009	.0008	4.01
16 to 17		.0006	.0006	.0011	.0010	3.64
17 to 18		.0008	.0007	.0013	.0012	3.23
18 to 19		.0011	.0011	.0017	.0018	2.80
19 to 20		.0019	.0017	.0029	.0027	2.17
20 to 21	0.5	.0040	.0038	.0059	.0054	1.60
21 to 22	2.4	.0070	.0061	.0099	.0090	0.87
22 to 23	2.3	.0102	.0085	.0154	.0130	1.09
23 to 24	8.0	.0157	.0119	.0228	.0177	0.93
24 to 25	3.7	.0158	.0116	.0226	.0177	0.92
25 to 26	5.8	.0204	.0146	.0295	.0216	0.83
26 to 27	4.9	.0204	.0150	.0292	.0222	0.82
27 to 28	6.2	.0245	.0173	.0345	.0262	0.76
28 to 29	6.1	.0261	.0198	.0357	.0285	0.73
29 to 30	7.3	.0290	.0223	.0408	.0323	0.69
30 to 31	7.2	.0314	.0251	.0425	.0350	0.66
31 to 32	6.8	.0307	.0252	.0416	.0351	0.67
32 to 33	6.6	.0292	.0244	.0402	.0342	0.67
33 to 34	6.6	.0299	.0264	.0406	.0360	0.66
34 to 35	6.6	.0295	.0262	.0397	.0359	0.67
35 to 36	6.0	.0270	.0232	.0367	.0312	0.70
36 to 37	4.4	.0220	.0192	.0292	.0262	0.77

**Table D.20: Red bone marrow in the ribs (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
37 to 38	3.2	.0169	.0147	.0229	.0202	0.86
38 to 39	2.7	.0143	.0119	.0190	.0166	0.95
39 to 40	1.6	.0094	.0079	.0130	.0110	1.13
40 to 41	0.7	.0058	.0048	.0080	.0068	1.40
41 to 42	0.4	.0038	.0032	.0057	.0049	1.65
42 to 43	0.1	.0023	.0021	.0034	.0033	1.99
43 to 44		.0015	.0015	.0025	.0024	2.30
44 to 45		.0012	.0011	.0020	.0019	2.59
45 to 46		.0009	.0009	.0016	.0015	2.92
46 to 47		.0007	.0006	.0012	.0011	3.32
47 to 48		.0005	.0005	.0009	.0009	3.79
48 to 49		.0004	.0004	.0007	.0007	4.26
49 to 50		.0003	.0003	.0006	.0006	4.84
50 to 51		.0003	.0002	.0004	.0004	5.39
51 to 52		.0002	.0002	.0004	.0004	5.84
52 to 53		.0001	.0001	.0003	.0003	6.79
53 to 54		.0001	.0001	.0002	.0002	7.47
54 to 55		.0001	.0001	.0002	.0002	8.79
55 to 56		.0001	.0001	.0001	.0002	9.75
56 to 57		.0001	.0001	.0001	.0001	10.65
57 to 58		*	*	.0001	.0001	12.38
58 to 59		*	*	.0001	.0001	12.75
59 to 60		*	*	*	.0001	14.81

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.21: Red bone marrow in the scapulae**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
1 to 2		*	*	.0001	.0001	16.26
2 to 3		.0001	.0001	.0001	.0002	13.90
3 to 4		.0001	.0001	.0002	.0002	12.58
4 to 5		.0002	.0002	.0003	.0003	10.12
5 to 6		.0002	.0002	.0004	.0004	8.97
6 to 7		.0003	.0002	.0006	.0004	8.01
7 to 8		.0004	.0003	.0007	.0006	7.08
8 to 9		.0005	.0004	.0007	.0007	6.41
9 to 10		.0006	.0005	.0010	.0009	5.70
10 to 11		.0007	.0006	.0012	.0011	5.15
11 to 12		.0009	.0007	.0014	.0012	4.74
12 to 13		.0011	.0009	.0017	.0015	4.41
13 to 14		.0012	.0010	.0020	.0015	4.17
14 to 15		.0013	.0011	.0021	.0018	4.00
15 to 16		.0014	.0012	.0022	.0020	3.83
16 to 17		.0015	.0014	.0025	.0022	3.60
17 to 18		.0019	.0016	.0028	.0027	3.34
18 to 19		.0020	.0019	.0030	.0030	3.15
19 to 20		.0044	.0039	.0058	.0054	2.30
20 to 21	1.6	.0208	.0173	.0267	.0227	1.15
21 to 22	18.7	.0654	.0473	.0861	.0675	0.48
22 to 23	34.5	.1049	.0697	.1425	.1023	0.59
23 to 24	17.5	.0609	.0421	.0852	.0617	0.74
24 to 25	9.2	.0408	.0281	.0565	.0418	0.88
25 to 26	5.5	.0281	.0189	.0398	.0287	1.03
26 to 27	3.9	.0221	.0138	.0309	.0215	1.16
27 to 28	3.4	.0192	.0113	.0266	.0177	1.26
28 to 29	2.9	.0159	.0090	.0227	.0136	1.41
29 to 30	2.4	.0129	.0069	.0180	.0110	1.57
30 to 31	0.5	.0061	.0044	.0088	.0071	2.01
31 to 32		.0035	.0029	.0054	.0049	2.40
32 to 33		.0025	.0024	.0041	.0040	2.69
33 to 34		.0019	.0019	.0033	.0034	3.02
34 to 35		.0015	.0015	.0027	.0026	3.35

**Table D.21: Red bone marrow in the scapulae (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
35 to 36		.0012	.0012	.0022	.0019	3.80
36 to 37		.0009	.0008	.0016	.0015	4.30
37 to 38		.0007	.0007	.0014	.0013	4.77
38 to 39		.0005	.0005	.0010	.0010	5.39
39 to 40		.0004	.0004	.0008	.0008	6.02
40 to 41		.0003	.0004	.0007	.0006	6.83
41 to 42		.0003	.0003	.0005	.0005	7.52
42 to 43		.0002	.0002	.0005	.0004	8.64
43 to 44		.0001	.0002	.0003	.0003	9.59
44 to 45		.0001	.0001	.0004	.0003	10.45
45 to 46		.0001	.0001	.0002	.0002	12.15
46 to 47		.0001	.0001	.0002	.0002	12.98
47 to 48		.0001	*	.0001	.0002	14.28
48 to 49		*	*	.0001	.0001	16.43
49 to 50		*	*	.0001	.0001	16.13
50 to 51		*	*	.0001	.0001	17.34
51 to 52		*	*	.0001	.0001	17.23
52 to 53		*	*	*	.0001	16.69

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.22: Red bone marrow in the cervical spine**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1		.0001	.0001	.0001	.0001	17.29
1 to 2		.0002	.0002	.0003	.0003	12.37
2 to 3		.0003	.0002	.0005	.0006	9.50
3 to 4		.0004	.0004	.0008	.0008	7.98
4 to 5		.0005	.0005	.0011	.0011	6.70
5 to 6		.0008	.0006	.0015	.0014	5.88
6 to 7		.0009	.0009	.0020	.0020	5.22
7 to 8		.0013	.0013	.0026	.0025	4.49
8 to 9		.0017	.0016	.0036	.0031	4.03
9 to 10		.0023	.0021	.0041	.0039	3.59
10 to 11		.0031	.0027	.0054	.0054	3.10
11 to 12		.0041	.0036	.0073	.0068	2.75
12 to 13		.0061	.0050	.0104	.0090	2.32
13 to 14		.0097	.0076	.0155	.0129	1.92
14 to 15		.0162	.0117	.0243	.0189	1.57
15 to 16	20.5	.0667	.0406	.0943	.0634	0.93
16 to 17	22.2	.0794	.0491	.1118	.0745	0.87
17 to 18	19.0	.0794	.0510	.1102	.0754	0.86
18 to 19	18.8	.0801	.0564	.1101	.0831	0.83
19 to 20	19.5	.0708	.0608	.0990	.0864	0.84
20 to 21		.0191	.0211	.0275	.0293	1.33
21 to 22		.0103	.0119	.0155	.0168	1.18
22 to 23		.0072	.0086	.0118	.0126	2.00
23 to 24		.0055	.0063	.0083	.0096	2.32
24 to 25		.0038	.0046	.0065	.0070	2.68
25 to 26		.0029	.0033	.0050	.0055	3.06
26 to 27		.0022	.0026	.0041	.0043	3.42
27 to 28		.0019	.0020	.0034	.0035	3.82
28 to 29		.0015	.0016	.0026	.0028	4.18
29 to 30		.0012	.0013	.0023	.0024	4.70
30 to 31		.0007	.0012	.0018	.0019	5.30
31 to 32		.0008	.0009	.0015	.0014	5.61
32 to 33		.0007	.0007	.0014	.0013	5.97
33 to 34		.0006	.0006	.0011	.0012	6.76

**Table D.22: Red bone marrow in the cervical spine (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0005	.0005	.0010	.0009	7.19
35 to 36		.0003	.0004	.0007	.0008	8.13
36 to 37		.0003	.0003	.0005	.0006	9.31
37 to 38		.0003	.0002	.0005	.0006	10.16
38 to 39		.0002	.0002	.0004	.0004	11.45
39 to 40		.0001	.0001	.0003	.0004	12.55
40 to 41		.0001	.0001	.0002	.0002	14.26
41 to 42		.0001	.0001	.0002	.0002	15.79
42 to 43		.0001	.0001	.0002	.0001	15.83
43 to 44		.0001	.0001	.0001	.0002	17.15
44 to 45		*	.0001	.0001	.0002	17.08
45 to 46		*	*	.0001	.0001	16.31
46 to 47		*	*	.0001	.0001	17.58
47 to 48		*	*	.0001	.0001	15.93
48 to 49		*	*	.0001	*	12.70

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.23: Red bone marrow in the thoracic spine**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
3 to 4		*	*	.0001	.0001	13.97
4 to 5		*	*	.0001	.0001	11.94
5 to 6		*	.0001	.0001	.0001	11.22
6 to 7		.0001	.0001	.0002	.0001	9.79
7 to 8		.0001	.0001	.0002	.0002	8.60
8 to 9		.0001	.0001	.0003	.0002	7.67
9 to 10		.0002	.0002	.0004	.0003	6.77
10 to 11		.0002	.0002	.0005	.0004	5.91
11 to 12		.0003	.0002	.0006	.0005	5.22
12 to 13		.0004	.0003	.0007	.0006	4.66
13 to 14		.0005	.0004	.0009	.0008	4.13
14 to 15		.0007	.0005	.0012	.0011	3.72
15 to 16		.0008	.0007	.0015	.0014	3.29
16 to 17		.0012	.0011	.0020	.0018	2.81
17 to 18		.0019	.0016	.0029	.0026	2.34
18 to 19		.0029	.0025	.0046	.0039	1.87
19 to 20		.0058	.0050	.0085	.0074	1.38
20 to 21	5.3	.0193	.0185	.0266	.0260	0.84
21 to 22	4.5	.0168	.0162	.0243	.0230	0.60
22 to 23	4.9	.0174	.0157	.0254	.0231	0.89
23 to 24	2.2	.0170	.0136	.0249	.0215	0.91
24 to 25	4.3	.0162	.0126	.0241	.0195	0.93
25 to 26	4.7	.0168	.0122	.0252	.0191	0.93
26 to 27	4.5	.0168	.0120	.0252	.0188	0.93
27 to 28	4.3	.0170	.0121	.0251	.0189	0.92
28 to 29	4.7	.0178	.0120	.0262	.0190	0.91
29 to 30	4.7	.0176	.0117	.0260	.0184	0.92
30 to 31	3.0	.0157	.0103	.0232	.0165	0.95
31 to 32	4.8	.0186	.0122	.0276	.0192	0.90
32 to 33	4.3	.0175	.0109	.0264	.0176	0.93
33 to 34	5.7	.0194	.0112	.0289	.0186	0.92
34 to 35	5.9	.0196	.0110	.0289	.0182	0.93
35 to 36	6.7	.0203	.0112	.0304	.0184	0.92
36 to 37	6.3	.0196	.0107	.0290	.0173	0.94

**Table D.23: Red bone marrow in the thoracic spine (continued)**

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
37 to 38	5.4	.0182	.0100	.0263	.0160	0.98
38 to 39	6.5	.0185	.0099	.0271	.0163	0.98
39 to 40	7.3	.0179	.0094	.0270	.0154	1.00
40 to 41		.0067	.0047	.0101	.0079	1.34
41 to 42		.0046	.0036	.0073	.0060	1.55
42 to 43		.0033	.0028	.0054	.0048	1.76
43 to 44		.0025	.0022	.0042	.0037	1.98
44 to 45		.0019	.0016	.0031	.0030	2.25
45 to 46		.0014	.0013	.0025	.0023	2.51
46 to 47		.0011	.0010	.0020	.0018	2.88
47 to 48		.0008	.0007	.0015	.0015	3.31
48 to 49		.0006	.0006	.0011	.0011	3.74
49 to 50		.0004	.0005	.0008	.0009	4.19
50 to 51		.0004	.0004	.0008	.0007	4.69
51 to 52		.0003	.0003	.0006	.0006	5.32
52 to 53		.0002	.0002	.0005	.0004	5.89
53 to 54		.0001	.0002	.0004	.0004	6.58
54 to 55		.0001	.0001	.0003	.0003	7.51
55 to 56		.0001	.0001	.0002	.0002	8.59
56 to 57		.0001	.0001	.0002	.0002	10.02
57 to 58		.0001	.0001	.0001	.0001	11.02
58 to 59		*	*	.0001	.0001	12.21
59 to 60		*	*	.0001	.0001	13.66
60 to 61		*	*	.0001	.0001	14.92
61 to 62		*	*	.0001	.0001	15.78

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.24: Red bone marrow in the lumbar spine**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
15 to 16		*	*	*	.0001	17.09
16 to 17		*	*	.0001	*	15.15
17 to 18		*	*	.0001	.0001	15.22
18 to 19		*	*	.0001	.0001	14.56
19 to 20		*	*	.0001	.0001	12.19
20 to 21		*	.0001	.0001	.0001	10.97
21 to 22		.0001	.0001	.0001	.0002	6.74
22 to 23		.0001	.0001	.0002	.0002	8.16
23 to 24		.0001	.0001	.0003	.0003	7.53
24 to 25		.0002	.0002	.0004	.0004	6.54
25 to 26		.0002	.0002	.0004	.0005	5.89
26 to 27		.0002	.0003	.0006	.0005	5.23
27 to 28		.0003	.0003	.0006	.0007	4.73
28 to 29		.0004	.0004	.0008	.0009	4.30
29 to 30		.0005	.0005	.0010	.0010	3.81
30 to 31		.0006	.0007	.0012	.0013	3.48
31 to 32		.0008	.0008	.0015	.0015	3.17
32 to 33		.0010	.0011	.0020	.0021	2.74
33 to 34		.0014	.0015	.0026	.0027	2.43
34 to 35		.0019	.0019	.0034	.0035	2.11
35 to 36		.0025	.0025	.0044	.0044	1.87
36 to 37		.0033	.0032	.0058	.0055	1.65
37 to 38		.0044	.0041	.0073	.0069	1.48
38 to 39		.0060	.0052	.0100	.0086	1.31
39 to 40		.0086	.0070	.0136	.0114	1.14
40 to 41	7.9	.0217	.0133	.0322	.0207	0.86
41 to 42	8.3	.0249	.0159	.0366	.0250	0.80
42 to 43	8.1	.0265	.0172	.0388	.0265	0.77
43 to 44	7.8	.0277	.0194	.0401	.0299	0.75
44 to 45	10.0	.0316	.0215	.0458	.0328	0.70
45 to 46	7.2	.0277	.0211	.0411	.0320	0.72
46 to 47	9.1	.0305	.0230	.0449	.0353	0.69
47 to 48	8.1	.0292	.0233	.0435	.0348	0.70
48 to 49	9.9	.0309	.0236	.0459	.0356	0.69

**Table D.24: Red bone marrow in the lumbar spine (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
49 to 50	10.0	.0288	.0225	.0424	.0340	0.71
50 to 51	11.2	.0264	.0207	.0402	.0322	0.74
51 to 52	2.5	.0127	.0114	.0199	.0181	0.95
52 to 53		.0072	.0071	.0119	.0112	1.17
53 to 54		.0052	.0053	.0088	.0087	1.33
54 to 55		.0039	.0040	.0067	.0068	1.51
55 to 56		.0031	.0030	.0052	.0053	1.71
56 to 57		.0023	.0022	.0041	.0042	1.95
57 to 58		.0017	.0017	.0030	.0033	2.22
58 to 59		.0013	.0013	.0024	.0024	2.54
59 to 60		.0010	.0009	.0019	.0018	2.88
60 to 61		.0007	.0007	.0015	.0015	3.26
61 to 62		.0006	.0005	.0011	.0011	3.74
62 to 63		.0004	.0004	.0009	.0009	4.28
63 to 64		.0003	.0003	.0006	.0007	4.85
64 to 65		.0002	.0002	.0005	.0005	5.56
65 to 66		.0002	.0002	.0004	.0004	6.38

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.25: Red bone marrow in the sacrum**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
22 to 23		*	*	*	.0001	16.72
23 to 24		*	*	.0001	*	19.59
24 to 25		*	*	.0001	.0001	18.49
25 to 26		*	*	.0001	.0001	17.01
26 to 27		*	*	.0001	.0001	17.05
27 to 28		*	.0001	.0001	.0001	16.01
28 to 29		*	*	.0001	.0001	15.85
29 to 30		.0001	*	.0002	.0002	14.66
30 to 31		.0001	.0001	.0002	.0002	14.18
31 to 32		.0001	.0001	.0003	.0002	12.30
32 to 33		.0001	.0002	.0003	.0003	11.44
33 to 34		.0002	.0002	.0004	.0004	9.93
34 to 35		.0002	.0002	.0005	.0005	9.27
35 to 36		.0003	.0003	.0006	.0006	8.08
36 to 37		.0004	.0004	.0008	.0008	6.84
37 to 38		.0005	.0005	.0010	.0010	6.29
38 to 39		.0006	.0006	.0013	.0013	5.60
39 to 40		.0008	.0008	.0015	.0014	5.06
40 to 41		.0011	.0010	.0021	.0020	4.43
41 to 42		.0014	.0013	.0024	.0025	3.94
42 to 43		.0017	.0017	.0032	.0031	3.53
43 to 44		.0024	.0020	.0041	.0038	3.15
44 to 45		.0030	.0028	.0052	.0050	2.77
45 to 46		.0038	.0035	.0067	.0063	2.49
46 to 47		.0054	.0048	.0088	.0080	2.17
47 to 48		.0073	.0062	.0117	.0102	1.92
48 to 49		.0098	.0082	.0157	.0128	1.69
49 to 50		.0141	.0104	.0216	.0170	1.47
50 to 51		.0204	.0144	.0302	.0229	1.27
51 to 52	39.1	.0691	.0436	.1046	.0715	0.81
52 to 53	31.2	.0686	.0373	.0991	.0602	0.84
53 to 54	15.4	.0515	.0244	.0717	.0392	0.97
54 to 55	8.2	.0388	.0190	.0527	.0299	1.09
55 to 56	4.8	.0280	.0142	.0380	.0223	1.24

**Table D.25: Red bone marrow in the sacrum** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
56 to 57	1.1	.0158	.0100	.0224	.0160	1.48
57 to 58	0.3	.0100	.0072	.0150	.0119	1.72
58 to 59		.0067	.0052	.0105	.0089	2.00
59 to 60		.0048	.0039	.0080	.0067	2.27
60 to 61		.0036	.0032	.0062	.0055	2.58
61 to 62		.0028	.0023	.0044	.0042	2.93
62 to 63		.0019	.0017	.0037	.0033	3.39
63 to 64		.0017	.0015	.0025	.0025	3.77
64 to 65		.0012	.0011	.0022	.0020	4.29
65 to 66		.0009	.0008	.0015	.0016	4.96

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.26: Red bone marrow in the sternum**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
1 to 2		*	*	.0001	*	10.36
2 to 3		*	*	.0001	.0001	13.57
3 to 4		.0001	*	.0001	.0002	16.11
4 to 5		.0001	.0001	.0001	.0002	18.21
5 to 6		.0001	.0001	.0001	.0002	19.53
6 to 7		.0001	.0001	.0002	.0002	17.30
7 to 8		.0002	.0001	.0003	.0003	16.07
8 to 9		.0002	.0002	.0004	.0004	15.13
9 to 10		.0002	.0003	.0005	.0004	13.43
10 to 11		.0003	.0003	.0007	.0006	12.17
11 to 12		.0004	.0005	.0007	.0008	10.68
12 to 13		.0006	.0005	.0011	.0010	9.53
13 to 14		.0009	.0007	.0014	.0013	8.03
14 to 15		.0010	.0011	.0018	.0017	7.15
15 to 16		.0014	.0015	.0023	.0027	6.24
16 to 17		.0020	.0019	.0031	.0031	5.38
17 to 18		.0029	.0028	.0044	.0045	4.61
18 to 19		.0038	.0040	.0057	.0058	3.95
19 to 20		.0048	.0053	.0062	.0071	3.54
20 to 21		.0056	.0077	.0083	.0096	3.15
21 to 22		.0056	.0075	.0078	.0100	2.13
22 to 23		.0083	.0110	.0114	.0143	2.65
23 to 24		.0147	.0226	.0206	.0290	1.98
24 to 25	23.3	.0767	.1285	.0986	.1620	1.00
25 to 26	20.3	.0701	.1206	.0927	.1483	1.03
26 to 27	10.6	.0476	.0807	.0625	.0990	1.22
27 to 28	7.9	.0428	.0691	.0544	.0883	1.28
28 to 29	10.8	.0514	.0879	.0654	.1083	1.18
29 to 30	7.8	.0414	.0688	.0530	.0842	1.30
30 to 31	4.9	.0315	.0524	.0412	.0638	1.45
31 to 32	11.6	.0509	.0876	.0649	.1056	1.19
32 to 33	2.7	.0202	.0325	.0263	.0409	1.79
33 to 34		.0082	.0114	.0119	.0157	2.58
34 to 35		.0058	.0079	.0089	.0110	3.01

**Table D.26: Red bone marrow in the sternum (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
35 to 36		.0042	.0060	.0073	.0080	3.43
36 to 37		.0032	.0042	.0050	.0064	3.95
37 to 38		.0024	.0032	.0044	.0048	4.49
38 to 39		.0020	.0022	.0029	.0035	5.18
39 to 40		.0014	.0015	.0024	.0030	5.83
40 to 41		.0011	.0014	.0019	.0020	6.51
41 to 42		.0009	.0009	.0014	.0016	7.46
42 to 43		.0007	.0007	.0012	.0014	8.21
43 to 44		.0005	.0006	.0010	.0009	9.24
44 to 45		.0004	.0005	.0008	.0009	10.40
45 to 46		.0003	.0003	.0006	.0006	12.09
46 to 47		.0003	.0002	.0005	.0004	12.95
47 to 48		.0001	.0002	.0004	.0004	15.18
48 to 49		.0001	.0001	.0002	.0002	17.25
49 to 50		.0001	.0001	.0002	.0003	16.82
50 to 51		.0001	.0001	.0002	.0002	18.54
51 to 52		.0001	.0001	.0002	.0002	18.95
52 to 53		.0001	*	.0001	.0001	16.70
53 to 54		*	*	.0001	.0001	16.44
54 to 55		*	*	.0001	.0001	14.41
55 to 56		*	*	.0001	*	10.48
56 to 57		*	*	*	*	11.96
57 to 58		*	*	.0001	*	10.40

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.27: Red bone marrow in the whole body**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1	1.0	.0045	.0045	.0060	.0060	0.46
1 to 2	1.8	.0074	.0074	.0101	.0101	0.35
2 to 3	1.5	.0069	.0071	.0092	.0095	0.35
3 to 4	1.3	.0062	.0065	.0083	.0087	0.36
4 to 5	1.0	.0051	.0055	.0069	.0074	0.39
5 to 6	0.8	.0043	.0045	.0059	.0061	0.42
6 to 7	0.6	.0040	.0041	.0054	.0056	0.44
7 to 8	0.5	.0035	.0036	.0049	.0051	0.45
8 to 9	0.5	.0034	.0037	.0049	.0051	0.45
9 to 10	0.8	.0046	.0051	.0064	.0071	0.40
10 to 11	1.2	.0057	.0066	.0080	.0092	0.36
11 to 12	1.3	.0055	.0058	.0079	.0083	0.37
12 to 13	2.4	.0074	.0071	.0108	.0105	0.34
13 to 14	2.0	.0069	.0064	.0100	.0094	0.36
14 to 15	1.2	.0052	.0054	.0075	.0078	0.39
15 to 16	1.0	.0043	.0043	.0064	.0063	0.43
16 to 17	0.7	.0036	.0032	.0053	.0049	0.47
17 to 18	0.6	.0034	.0030	.0049	.0045	0.49
18 to 19	0.6	.0034	.0032	.0049	.0048	0.49
19 to 20	0.6	.0033	.0033	.0047	.0047	0.49
20 to 21	0.7	.0043	.0046	.0059	.0062	0.43
21 to 22	1.5	.0059	.0058	.0080	.0080	0.25
22 to 23	2.3	.0088	.0086	.0122	.0119	0.31
23 to 24	2.0	.0075	.0076	.0106	.0106	0.34
24 to 25	1.4	.0060	.0061	.0084	.0085	0.37
25 to 26	1.2	.0051	.0049	.0073	.0069	0.39
26 to 27	0.9	.0044	.0040	.0063	.0058	0.43
27 to 28	0.9	.0044	.0038	.0063	.0056	0.43
28 to 29	1.0	.0045	.0039	.0063	.0057	0.43
29 to 30	1.0	.0044	.0038	.0063	.0055	0.43
30 to 31	0.8	.0041	.0036	.0058	.0051	0.44
31 to 32	0.9	.0044	.0040	.0062	.0056	0.43
32 to 33	0.8	.0039	.0033	.0057	.0049	0.45
33 to 34	0.9	.0040	.0033	.0058	.0048	0.45

**Table D.27: Red bone marrow in the whole body (continued)**

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
34 to 35	0.9	.0040	.0032	.0057	.0047	0.46
35 to 36	0.9	.0041	.0032	.0059	.0046	0.46
36 to 37	0.8	.0039	.0030	.0056	.0044	0.47
37 to 38	0.8	.0040	.0031	.0056	.0044	0.47
38 to 39	0.9	.0044	.0033	.0061	.0048	0.46
39 to 40	1.0	.0046	.0034	.0064	.0049	0.45
40 to 41	1.0	.0047	.0034	.0065	.0049	0.45
41 to 42	1.0	.0045	.0033	.0063	.0048	0.47
42 to 43	0.8	.0040	.0029	.0057	.0043	0.49
43 to 44	0.7	.0035	.0027	.0051	.0041	0.51
44 to 45	0.8	.0035	.0027	.0051	.0040	0.51
45 to 46	0.6	.0031	.0026	.0047	.0039	0.52
46 to 47	0.7	.0033	.0027	.0049	.0042	0.51
47 to 48	0.6	.0033	.0028	.0050	.0043	0.50
48 to 49	0.8	.0038	.0031	.0055	.0047	0.48
49 to 50	1.1	.0045	.0037	.0066	.0056	0.44
50 to 51	1.5	.0052	.0043	.0078	.0065	0.42
51 to 52	2.1	.0062	.0052	.0092	.0078	0.38
52 to 53	1.8	.0063	.0055	.0091	.0081	0.38
53 to 54	1.6	.0062	.0058	.0089	.0085	0.37
54 to 55	1.3	.0059	.0059	.0083	.0084	0.37
55 to 56	1.2	.0056	.0059	.0080	.0084	0.38
56 to 57	1.3	.0060	.0066	.0085	.0093	0.37
57 to 58	1.5	.0062	.0068	.0088	.0096	0.36
58 to 59	1.7	.0062	.0069	.0090	.0097	0.36
59 to 60	2.1	.0070	.0075	.0100	.0106	0.34
60 to 61	1.9	.0066	.0069	.0093	.0098	0.36
61 to 62	1.3	.0053	.0054	.0076	.0076	0.39
62 to 63	0.8	.0040	.0040	.0057	.0057	0.45
63 to 64	0.5	.0031	.0031	.0044	.0044	0.50
64 to 65	0.3	.0022	.0023	.0031	.0032	0.58
65 to 66	0.2	.0016	.0016	.0023	.0024	0.67

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.28: Skeleton (whole body)**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1	0.8	.0142	.0141	.0141	.0142	0.27
1 to 2	1.6	.0269	.0275	.0272	.0278	0.20
2 to 3	1.4	.0312	.0321	.0312	.0321	0.19
3 to 4	1.3	.0337	.0351	.0338	.0349	0.19
4 to 5	1.2	.0356	.0368	.0356	.0367	0.20
5 to 6	1.1	.0368	.0380	.0369	.0379	0.21
6 to 7	1.1	.0379	.0389	.0381	.0390	0.22
7 to 8	1.0	.0381	.0393	.0383	.0396	0.22
8 to 9	1.0	.0383	.0394	.0386	.0398	0.22
9 to 10	1.2	.0391	.0403	.0400	.0413	0.20
10 to 11	1.5	.0403	.0415	.0418	.0432	0.18
11 to 12	1.6	.0378	.0387	.0401	.0411	0.19
12 to 13	2.3	.0381	.0387	.0413	.0421	0.18
13 to 14	2.0	.0348	.0364	.0379	.0395	0.19
14 to 15	1.3	.0289	.0316	.0318	.0345	0.21
15 to 16	1.2	.0269	.0295	.0300	.0325	0.22
16 to 17	1.0	.0255	.0280	.0281	.0305	0.24
17 to 18	0.9	.0232	.0249	.0253	.0271	0.25
18 to 19	0.8	.0217	.0236	.0236	.0256	0.25
19 to 20	0.7	.0199	.0224	.0217	.0241	0.25
20 to 21	0.7	.0205	.0221	.0221	.0236	0.23
21 to 22	1.3	.0243	.0246	.0262	.0263	0.13
22 to 23	2.0	.0332	.0331	.0358	.0356	0.17
23 to 24	1.9	.0315	.0308	.0344	.0336	0.18
24 to 25	1.4	.0288	.0273	.0317	.0300	0.19
25 to 26	1.3	.0274	.0249	.0301	.0277	0.21
26 to 27	1.1	.0266	.0240	.0292	.0267	0.22
27 to 28	1.1	.0274	.0241	.0298	.0267	0.22
28 to 29	1.1	.0277	.0249	.0299	.0274	0.22
29 to 30	1.2	.0275	.0250	.0299	.0272	0.22
30 to 31	1.0	.0265	.0245	.0286	.0265	0.22
31 to 32	1.1	.0268	.0252	.0288	.0270	0.22
32 to 33	1.0	.0265	.0239	.0284	.0258	0.23
33 to 34	1.0	.0261	.0230	.0280	.0249	0.23

**Table D.28: Skeleton (whole body) (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35	1.0	.0253	.0218	.0271	.0236	0.23
35 to 36	1.0	.0244	.0204	.0262	.0221	0.23
36 to 37	0.9	.0233	.0190	.0250	.0207	0.24
37 to 38	0.8	.0220	.0175	.0235	.0192	0.25
38 to 39	0.9	.0218	.0168	.0233	.0184	0.24
39 to 40	0.9	.0211	.0155	.0226	.0173	0.24
40 to 41	0.9	.0193	.0139	.0209	.0158	0.25
41 to 42	0.8	.0178	.0129	.0195	.0149	0.25
42 to 43	0.7	.0168	.0124	.0185	.0143	0.26
43 to 44	0.6	.0155	.0119	.0172	.0138	0.27
44 to 45	0.7	.0159	.0123	.0176	.0141	0.27
45 to 46	0.6	.0154	.0125	.0171	.0143	0.28
46 to 47	0.7	.0160	.0131	.0178	.0150	0.27
47 to 48	0.6	.0162	.0137	.0181	.0155	0.27
48 to 49	0.7	.0175	.0149	.0195	.0168	0.26
49 to 50	1.0	.0201	.0171	.0222	.0193	0.24
50 to 51	1.3	.0220	.0191	.0244	.0214	0.22
51 to 52	1.7	.0242	.0217	.0269	.0242	0.21
52 to 53	1.6	.0251	.0235	.0278	.0259	0.20
53 to 54	1.4	.0256	.0250	.0281	.0272	0.20
54 to 55	1.2	.0237	.0241	.0260	.0263	0.20
55 to 56	1.0	.0214	.0224	.0237	.0248	0.21
56 to 57	1.1	.0221	.0240	.0245	.0262	0.20
57 to 58	1.3	.0239	.0262	.0263	.0284	0.20
58 to 59	1.5	.0261	.0288	.0284	.0309	0.19
59 to 60	1.8	.0280	.0306	.0304	.0326	0.19
60 to 61	1.6	.0271	.0288	.0291	.0307	0.19
61 to 62	1.3	.0247	.0257	.0265	.0273	0.21
62 to 63	0.9	.0213	.0220	.0227	.0232	0.23
63 to 64	0.6	.0178	.0184	.0188	.0195	0.26
64 to 65	0.4	.0138	.0145	.0150	.0156	0.30
65 to 66	0.3	.0111	.0116	.0123	.0128	0.34

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.29: Skin (whole body)**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1	0.2	.0019	.0018	.0021	.0021	0.76
1 to 2	0.4	.0029	.0028	.0032	.0031	0.62
2 to 3	0.5	.0036	.0035	.0040	.0039	0.54
3 to 4	0.5	.0040	.0040	.0045	.0044	0.51
4 to 5	0.6	.0043	.0043	.0049	.0049	0.49
5 to 6	0.6	.0044	.0045	.0051	.0051	0.48
6 to 7	0.6	.0046	.0046	.0053	.0053	0.47
7 to 8	0.6	.0048	.0049	.0055	.0056	0.46
8 to 9	0.7	.0050	.0051	.0058	.0059	0.45
9 to 10	0.7	.0051	.0052	.0058	.0059	0.45
10 to 11	0.7	.0054	.0055	.0061	.0062	0.44
11 to 12	0.7	.0058	.0056	.0065	.0064	0.43
12 to 13	0.6	.0053	.0050	.0059	.0057	0.45
13 to 14	0.7	.0056	.0056	.0064	.0063	0.44
14 to 15	0.6	.0055	.0055	.0061	.0061	0.44
15 to 16	0.6	.0052	.0054	.0059	.0060	0.45
16 to 17	0.5	.0048	.0049	.0053	.0055	0.47
17 to 18	0.5	.0048	.0049	.0053	.0055	0.47
18 to 19	0.5	.0048	.0049	.0053	.0055	0.47
19 to 20	0.7	.0059	.0058	.0065	.0064	0.43
20 to 21	1.0	.0079	.0082	.0088	.0091	0.36
21 to 22	1.0	.0066	.0069	.0074	.0077	0.26
22 to 23	0.9	.0080	.0081	.0089	.0089	0.36
23 to 24	1.0	.0084	.0085	.0094	.0094	0.35
24 to 25	1.0	.0087	.0086	.0097	.0096	0.34
25 to 26	1.0	.0092	.0089	.0101	.0099	0.34
26 to 27	1.0	.0094	.0091	.0105	.0102	0.33
27 to 28	1.3	.0106	.0103	.0120	.0115	0.31
28 to 29	1.4	.0111	.0107	.0125	.0120	0.31
29 to 30	1.4	.0110	.0106	.0124	.0120	0.31
30 to 31	1.3	.0110	.0106	.0124	.0119	0.31
31 to 32	1.3	.0110	.0105	.0123	.0117	0.31
32 to 33	1.3	.0108	.0103	.0121	.0116	0.31
33 to 34	1.3	.0106	.0103	.0120	.0115	0.31

**Table D.29: Skin (whole body) (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35	1.3	.0106	.0102	.0120	.0115	0.31
35 to 36	1.3	.0106	.0101	.0118	.0113	0.31
36 to 37	1.3	.0105	.0100	.0118	.0113	0.31
37 to 38	1.3	.0105	.0102	.0119	.0114	0.31
38 to 39	1.3	.0106	.0102	.0118	.0115	0.31
39 to 40	1.3	.0106	.0102	.0119	.0115	0.31
40 to 41	1.3	.0106	.0102	.0119	.0115	0.31
41 to 42	1.2	.0106	.0102	.0119	.0115	0.31
42 to 43	1.2	.0106	.0102	.0118	.0114	0.31
43 to 44	1.2	.0105	.0101	.0117	.0113	0.31
44 to 45	1.2	.0105	.0101	.0116	.0112	0.31
45 to 46	1.2	.0104	.0100	.0115	.0111	0.32
46 to 47	1.2	.0103	.0099	.0115	.0110	0.32
47 to 48	1.2	.0102	.0097	.0113	.0108	0.33
48 to 49	1.2	.0102	.0097	.0112	.0108	0.33
49 to 50	1.2	.0100	.0097	.0112	.0108	0.33
50 to 51	1.2	.0102	.0098	.0113	.0108	0.33
51 to 52	1.2	.0103	.0098	.0113	.0109	0.33
52 to 53	1.2	.0103	.0098	.0114	.0110	0.33
53 to 54	1.2	.0102	.0098	.0114	.0111	0.33
54 to 55	1.2	.0102	.0099	.0113	.0111	0.32
55 to 56	1.2	.0104	.0102	.0116	.0114	0.32
56 to 57	1.2	.0105	.0104	.0117	.0117	0.31
57 to 58	1.3	.0108	.0106	.0120	.0119	0.31
58 to 59	1.3	.0109	.0108	.0122	.0122	0.31
59 to 60	1.3	.0111	.0111	.0125	.0125	0.31
60 to 61	1.3	.0112	.0112	.0125	.0126	0.31
61 to 62	1.4	.0115	.0116	.0130	.0129	0.30
62 to 63	1.4	.0116	.0115	.0130	.0129	0.30
63 to 64	1.3	.0109	.0110	.0123	.0123	0.31
64 to 65	1.1	.0100	.0099	.0110	.0110	0.33
65 to 66	1.1	.0096	.0095	.0106	.0105	0.33

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.30: Small intestine**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
14 to 15		*	*	.0001	.0001	9.05
15 to 16		*	*	.0001	.0001	8.12
16 to 17		*	*	.0001	.0001	7.57
17 to 18		*	*	.0001	.0001	7.30
18 to 19		*	*	.0001	.0001	6.62
19 to 20		.0001	.0001	.0001	.0001	6.02
20 to 21		.0001	.0001	.0002	.0002	5.17
21 to 22		.0001	.0001	.0002	.0002	3.22
22 to 23		.0001	.0001	.0003	.0003	3.95
23 to 24		.0002	.0002	.0003	.0003	3.53
24 to 25		.0002	.0002	.0004	.0004	3.16
25 to 26		.0003	.0003	.0005	.0005	2.79
26 to 27		.0003	.0004	.0006	.0007	2.50
27 to 28		.0004	.0005	.0008	.0008	2.24
28 to 29		.0005	.0006	.0010	.0010	2.02
29 to 30		.0007	.0008	.0012	.0013	1.80
30 to 31		.0008	.0009	.0014	.0016	1.62
31 to 32		.0011	.0012	.0018	.0020	1.45
32 to 33		.0014	.0016	.0023	.0026	1.26
33 to 34		.0018	.0022	.0030	.0034	1.10
34 to 35		.0025	.0030	.0039	.0044	0.97
35 to 36		.0033	.0040	.0050	.0058	0.85
36 to 37		.0044	.0055	.0066	.0076	0.74
37 to 38		.0059	.0074	.0084	.0101	0.64
38 to 39	0.3	.0085	.0109	.0115	.0143	0.55
39 to 40	1.0	.0125	.0165	.0166	.0210	0.47
40 to 41	2.9	.0200	.0270	.0255	.0330	0.38
41 to 42	3.9	.0268	.0370	.0333	.0439	0.33
42 to 43	3.1	.0308	.0440	.0376	.0513	0.31
43 to 44	4.2	.0396	.0591	.0474	.0674	0.28
44 to 45	6.8	.0525	.0798	.0623	.0899	0.25
45 to 46	11.2	.0678	.1021	.0801	.1150	0.23
46 to 47	10.3	.0677	.1014	.0799	.1142	0.23
47 to 48	9.9	.0659	.0972	.0782	.1100	0.24

**Table D.30: Small intestine** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
48 to 49	8.9	.0616	.0917	.0735	.1046	0.25
49 to 50	7.5	.0546	.0827	.0658	.0950	0.26
50 to 51	8.7	.0544	.0844	.0653	.0957	0.25
51 to 52	9.5	.0527	.0841	.0637	.0961	0.25
52 to 53	6.6	.0428	.0690	.0513	.0786	0.28
53 to 54	4.1	.0302	.0478	.0366	.0550	0.32
54 to 55	1.0	.0159	.0233	.0201	.0277	0.43
55 to 56		.0092	.0126	.0122	.0157	0.55
56 to 57		.0065	.0085	.0089	.0111	0.65
57 to 58		.0047	.0060	.0068	.0081	0.76
58 to 59		.0035	.0042	.0052	.0059	0.87
59 to 60		.0026	.0030	.0040	.0045	1.01
60 to 61		.0019	.0022	.0031	.0034	1.17
61 to 62		.0014	.0016	.0024	.0026	1.33
62 to 63		.0011	.0012	.0018	.0019	1.54
63 to 64		.0008	.0009	.0014	.0015	1.76
64 to 65		.0006	.0007	.0011	.0011	2.01
65 to 66		.0005	.0005	.0008	.0009	2.33

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.31: Spleen**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
5 to 6		*	*	.0001	*	15.73
6 to 7		*	*	.0001	.0001	14.87
7 to 8		*	*	.0001	.0001	13.44
8 to 9		*	*	.0001	.0001	11.77
9 to 10		*	*	.0001	.0001	10.95
10 to 11		.0001	.0001	.0001	.0001	9.40
11 to 12		.0001	.0001	.0001	.0002	8.79
12 to 13		.0001	.0001	.0002	.0002	8.42
13 to 14		.0001	.0001	.0002	.0002	7.18
14 to 15		.0001	.0001	.0003	.0003	6.88
15 to 16		.0002	.0002	.0003	.0003	6.13
16 to 17		.0002	.0002	.0004	.0004	5.54
17 to 18		.0002	.0003	.0004	.0005	5.20
18 to 19		.0003	.0003	.0006	.0006	4.56
19 to 20		.0005	.0004	.0007	.0007	4.01
20 to 21		.0006	.0007	.0011	.0011	3.31
21 to 22		.0008	.0008	.0013	.0013	2.03
22 to 23		.0012	.0012	.0018	.0020	2.50
23 to 24		.0015	.0016	.0025	.0026	2.20
24 to 25		.0020	.0021	.0032	.0032	1.94
25 to 26		.0026	.0027	.0039	.0040	1.75
26 to 27		.0032	.0033	.0050	.0050	1.55
27 to 28		.0040	.0044	.0060	.0061	1.39
28 to 29		.0052	.0055	.0078	.0078	1.24
29 to 30		.0069	.0070	.0097	.0098	1.10
30 to 31		.0087	.0089	.0122	.0123	0.99
31 to 32		.0117	.0118	.0162	.0157	0.88
32 to 33	3.3	.0237	.0237	.0303	.0308	0.65
33 to 34	6.0	.0345	.0350	.0441	.0443	0.56
34 to 35	8.3	.0459	.0447	.0571	.0564	0.51
35 to 36	8.7	.0524	.0516	.0652	.0636	0.48
36 to 37	9.1	.0592	.0574	.0722	.0700	0.46
37 to 38	11.4	.0686	.0658	.0832	.0804	0.44
38 to 39	13.7	.0785	.0765	.0944	.0922	0.41

**Table D.31: Spleen** (continued)

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
39 to 40	13.2	.0789	.0833	.0938	.0971	0.40
40 to 41	12.1	.0743	.0816	.0874	.0939	0.40
41 to 42	8.2	.0584	.0653	.0687	.0748	0.45
42 to 43	5.2	.0417	.0471	.0496	.0550	0.51
43 to 44	0.8	.0211	.0226	.0261	.0275	0.68
44 to 45		.0133	.0137	.0168	.0176	0.83
45 to 46		.0096	.0098	.0125	.0129	0.97
46 to 47		.0071	.0071	.0096	.0097	1.11
47 to 48		.0051	.0054	.0071	.0073	1.28
48 to 49		.0039	.0041	.0056	.0058	1.45
49 to 50		.0029	.0030	.0043	.0045	1.65
50 to 51		.0022	.0023	.0035	.0034	1.87
51 to 52		.0016	.0017	.0027	.0028	2.12
52 to 53		.0013	.0013	.0021	.0022	2.38
53 to 54		.0010	.0010	.0016	.0017	2.73
54 to 55		.0007	.0007	.0012	.0013	3.14
55 to 56		.0006	.0006	.0009	.0010	3.54
56 to 57		.0004	.0005	.0008	.0007	4.00
57 to 58		.0004	.0003	.0006	.0007	4.50
58 to 59		.0003	.0003	.0005	.0005	5.11
59 to 60		.0002	.0002	.0004	.0004	5.64
60 to 61		.0001	.0001	.0003	.0003	6.51
61 to 62		.0001	.0001	.0002	.0003	7.56
62 to 63		.0001	.0001	.0002	.0002	8.39
63 to 64		.0001	.0001	.0001	.0002	9.53
64 to 65		*	.0001	.0001	.0001	11.53
65 to 66		*	*	.0001	.0001	12.27

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.32: Stomach**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
7 to 8		*	*	.0001	.0001	16.29
8 to 9		*	*	.0001	.0001	17.46
9 to 10		*	*	.0001	.0001	16.12
10 to 11		.0001	.0001	.0002	.0002	14.27
11 to 12		.0001	.0001	.0001	.0001	13.68
12 to 13		.0001	.0001	.0001	.0002	12.55
13 to 14		.0001	.0001	.0002	.0002	11.92
14 to 15		.0001	.0001	.0003	.0003	9.99
15 to 16		.0002	.0002	.0003	.0003	8.92
16 to 17		.0002	.0003	.0003	.0004	8.34
17 to 18		.0002	.0003	.0004	.0004	7.72
18 to 19		.0003	.0003	.0004	.0005	7.11
19 to 20		.0003	.0004	.0006	.0006	6.49
20 to 21		.0004	.0004	.0007	.0008	5.53
21 to 22		.0005	.0005	.0009	.0009	3.51
22 to 23		.0007	.0007	.0013	.0013	4.37
23 to 24		.0010	.0011	.0015	.0016	3.73
24 to 25		.0012	.0013	.0021	.0021	3.37
25 to 26		.0015	.0018	.0025	.0028	2.97
26 to 27		.0020	.0023	.0032	.0035	2.66
27 to 28		.0026	.0029	.0040	.0045	2.34
28 to 29		.0033	.0039	.0050	.0056	2.08
29 to 30		.0044	.0053	.0064	.0073	1.83
30 to 31		.0058	.0070	.0082	.0094	1.62
31 to 32		.0075	.0093	.0105	.0126	1.42
32 to 33		.0104	.0134	.0141	.0173	1.22
33 to 34		.0145	.0198	.0193	.0246	1.05
34 to 35	3.6	.0280	.0405	.0351	.0487	0.81
35 to 36	6.3	.0413	.0605	.0506	.0701	0.68
36 to 37	10.7	.0621	.0944	.0738	.1072	0.57
37 to 38	11.8	.0726	.1130	.0863	.1270	0.53
38 to 39	12.4	.0812	.1274	.0944	.1430	0.51
39 to 40	14.9	.0892	.1431	.1033	.1601	0.49
40 to 41	14.7	.0925	.1470	.1045	.1641	0.48

**Table D.32: Stomach** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
41 to 42	13.0	.0842	.1389	.0969	.1526	0.50
42 to 43	10.6	.0709	.1153	.0808	.1271	0.54
43 to 44	1.9	.0311	.0483	.0372	.0536	0.76
44 to 45		.0172	.0239	.0215	.0281	0.98
45 to 46		.0123	.0163	.0159	.0200	1.14
46 to 47		.0086	.0115	.0119	.0145	1.33
47 to 48		.0067	.0082	.0093	.0106	1.52
48 to 49		.0048	.0058	.0071	.0082	1.75
49 to 50		.0037	.0045	.0055	.0062	1.99
50 to 51		.0027	.0033	.0042	.0047	2.27
51 to 52		.0020	.0025	.0031	.0037	2.62
52 to 53		.0015	.0018	.0024	.0028	3.02
53 to 54		.0011	.0013	.0018	.0023	3.42
54 to 55		.0008	.0010	.0014	.0016	3.94
55 to 56		.0006	.0007	.0011	.0013	4.43
56 to 57		.0005	.0005	.0009	.0010	5.05
57 to 58		.0004	.0004	.0007	.0009	5.72
58 to 59		.0003	.0003	.0006	.0007	6.37
59 to 60		.0002	.0003	.0005	.0005	7.27
60 to 61		.0002	.0002	.0003	.0004	8.19
61 to 62		.0001	.0002	.0003	.0003	9.28
62 to 63		.0001	.0001	.0002	.0002	10.71
63 to 64		.0001	.0001	.0002	.0001	12.35
64 to 65		.0001	.0001	.0001	.0001	13.74
65 to 66		*	*	.0001	.0001	15.48

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.33: Testes**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
25 to 26		*	*	*	.0001	1.17
26 to 27		*	*	*	*	0.00
27 to 28		*	*	*	*	0.78
28 to 29		*	*	.0001	*	0.39
29 to 30		*	*	*	*	0.39
30 to 31		*	*	*	*	0.78
31 to 32		.0001	*	*	*	1.17
32 to 33		*	*	*	*	1.56
33 to 34		*	*	.0001	*	1.96
34 to 35		*	*	*	*	2.35
35 to 36		*	.0001	*	.0001	3.74
36 to 37		.0001	*	.0001	.0001	3.39
37 to 38		*	*	.0001	.0003	5.41
38 to 39		*	*	.0002	.0002	4.29
39 to 40		.0001	*	.0002	.0001	5.36
40 to 41		.0001	.0001	.0002	.0002	6.81
41 to 42		.0002	.0001	.0002	.0001	7.41
42 to 43		.0002	.0001	.0002	.0005	10.91
43 to 44		.0002	.0003	.0003	.0006	13.42
44 to 45		.0003	.0004	.0004	.0004	14.27
45 to 46		.0005	.0006	.0007	.0006	17.99
46 to 47		.0004	.0004	.0004	.0007	13.06
47 to 48		.0009	.0007	.0012	.0009	17.81
48 to 49		.0007	.0009	.0011	.0015	17.38
49 to 50		.0009	.0013	.0016	.0019	17.74
50 to 51		.0012	.0016	.0026	.0022	15.51
51 to 52		.0016	.0017	.0026	.0035	15.09
52 to 53		.0019	.0025	.0030	.0035	13.45
53 to 54		.0026	.0032	.0046	.0046	11.73
54 to 55		.0033	.0045	.0061	.0062	10.24
55 to 56		.0053	.0060	.0060	.0080	9.26
56 to 57		.0057	.0075	.0078	.0117	8.20
57 to 58		.0080	.0100	.0099	.0127	7.08
58 to 59		.0102	.0156	.0131	.0191	6.11

**Table D.33: Testes** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
59 to 60		.0162	.0212	.0201	.0269	5.07
60 to 61		.0223	.0343	.0275	.0415	4.29
61 to 62		.0395	.0639	.0433	.0694	3.37
62 to 63	37.5	.2724	.5051	.2890	.4989	1.45
63 to 64	62.5	.3874	.7158	.4128	.7269	1.23
64 to 65		.0350	.0506	.0370	.0500	3.78
65 to 66		.0232	.0293	.0277	.0324	4.50

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.34: Thymus**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
1 to 2		*	.0001	.0001	.0001	17.62
2 to 3		.0001	.0001	.0001	.0002	17.00
3 to 4		.0001	.0001	.0002	.0002	15.14
4 to 5		.0002	.0001	.0003	.0003	13.08
5 to 6		.0002	.0002	.0003	.0004	11.66
6 to 7		.0003	.0002	.0005	.0004	10.09
7 to 8		.0003	.0003	.0006	.0007	9.17
8 to 9		.0004	.0004	.0008	.0008	8.16
9 to 10		.0005	.0005	.0009	.0010	7.38
10 to 11		.0007	.0006	.0012	.0014	6.44
11 to 12		.0009	.0009	.0016	.0018	5.62
12 to 13		.0012	.0012	.0022	.0021	4.91
13 to 14		.0017	.0015	.0028	.0026	4.29
14 to 15		.0023	.0022	.0035	.0037	3.74
15 to 16		.0030	.0030	.0046	.0043	3.28
16 to 17		.0044	.0039	.0064	.0060	2.84
17 to 18		.0064	.0060	.0090	.0081	2.40
18 to 19		.0092	.0085	.0124	.0121	2.03
19 to 20		.0139	.0142	.0178	.0179	1.65
20 to 21		.0199	.0229	.0238	.0268	1.38
21 to 22		.0227	.0294	.0279	.0339	0.84
22 to 23	5.6	.0546	.0813	.0657	.0913	0.85
23 to 24	17.4	.0889	.1300	.1085	.1516	0.70
24 to 25	28.9	.1134	.1560	.1430	.1859	0.64
25 to 26	29.9	.1095	.1505	.1367	.1795	0.65
26 to 27	16.2	.0737	.0984	.0929	.1201	0.76
27 to 28	2.0	.0356	.0454	.0457	.0560	1.03
28 to 29		.0243	.0294	.0310	.0359	1.22
29 to 30		.0182	.0211	.0239	.0284	1.40
30 to 31		.0135	.0153	.0194	.0202	1.58
31 to 32		.0109	.0116	.0151	.0165	1.77
32 to 33		.0090	.0093	.0122	.0135	1.94
33 to 34		.0072	.0077	.0103	.0110	2.15
34 to 35		.0054	.0056	.0080	.0083	2.44

**Table D.34: Thymus** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
35 to 36		.0040	.0042	.0062	.0064	2.75
36 to 37		.0031	.0034	.0050	.0052	3.11
37 to 38		.0021	.0026	.0040	.0043	3.51
38 to 39		.0019	.0019	.0029	.0030	3.97
39 to 40		.0015	.0015	.0025	.0024	4.47
40 to 41		.0012	.0012	.0019	.0020	4.94
41 to 42		.0009	.0010	.0015	.0015	5.50
42 to 43		.0007	.0008	.0013	.0013	6.07
43 to 44		.0005	.0006	.0011	.0010	6.94
44 to 45		.0004	.0004	.0007	.0008	8.07
45 to 46		.0003	.0004	.0007	.0007	9.13
46 to 47		.0003	.0002	.0005	.0004	9.73
47 to 48		.0002	.0002	.0003	.0005	10.83
48 to 49		.0001	.0002	.0003	.0003	12.65
49 to 50		.0001	.0001	.0002	.0002	14.43
50 to 51		.0001	.0001	.0002	.0002	14.92
51 to 52		.0001	.0001	.0001	.0002	16.00
52 to 53		.0001	*	.0002	.0002	17.50
53 to 54		.0001	*	.0001	.0001	16.83
54 to 55		.0001	*	.0001	.0001	16.47
55 to 56		*	*	.0001	.0001	16.44
56 to 57		*	*	*	.0001	16.28

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.35: Thyroid**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1		*	*	*	.0001	6.19
1 to 2		.0001	.0001	.0002	.0002	12.36
2 to 3		.0001	.0002	.0003	.0004	18.41
3 to 4		.0002	.0003	.0006	.0005	17.82
4 to 5		.0004	.0003	.0006	.0005	17.51
5 to 6		.0005	.0005	.0010	.0010	16.48
6 to 7		.0006	.0005	.0009	.0014	15.08
7 to 8		.0008	.0008	.0015	.0015	13.15
8 to 9		.0010	.0011	.0016	.0018	12.12
9 to 10		.0013	.0011	.0021	.0026	10.75
10 to 11		.0015	.0014	.0027	.0029	9.60
11 to 12		.0025	.0021	.0037	.0038	8.22
12 to 13		.0030	.0029	.0053	.0051	7.09
13 to 14		.0046	.0045	.0071	.0062	6.03
14 to 15		.0064	.0059	.0092	.0088	5.30
15 to 16		.0080	.0080	.0128	.0111	4.59
16 to 17		.0123	.0116	.0175	.0153	3.87
17 to 18		.0199	.0187	.0267	.0245	3.15
18 to 19		.0327	.0288	.0398	.0361	2.60
19 to 20		.0532	.0548	.0601	.0615	2.05
20 to 21	35.4	.2071	.3131	.2328	.3397	1.08
21 to 22	49.9	.2586	.4448	.2857	.4655	0.64
22 to 23	14.7	.1150	.1944	.1281	.2025	1.39
23 to 24		.0316	.0448	.0401	.0542	2.39
24 to 25		.0208	.0282	.0275	.0369	2.86
25 to 26		.0162	.0191	.0215	.0269	3.31
26 to 27		.0119	.0143	.0167	.0201	3.76
27 to 28		.0092	.0103	.0135	.0144	4.23
28 to 29		.0073	.0083	.0107	.0120	4.73
29 to 30		.0053	.0063	.0095	.0095	5.24
30 to 31		.0045	.0046	.0066	.0073	5.99
31 to 32		.0036	.0037	.0066	.0052	6.55
32 to 33		.0033	.0031	.0050	.0052	6.99
33 to 34		.0025	.0030	.0037	.0043	7.82

**Table D.35: Thyroid** (continued)

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35		.0024	.0027	.0029	.0032	8.59
35 to 36		.0015	.0015	.0024	.0032	9.57
36 to 37		.0016	.0011	.0021	.0025	10.61
37 to 38		.0009	.0011	.0015	.0016	12.42
38 to 39		.0009	.0007	.0018	.0009	12.80
39 to 40		.0006	.0009	.0010	.0012	15.01
40 to 41		.0006	.0006	.0008	.0008	14.88
41 to 42		.0003	.0002	.0006	.0007	17.47
42 to 43		.0003	.0003	.0005	.0005	17.92
43 to 44		.0002	.0003	.0004	.0004	15.90
44 to 45		.0001	.0002	.0002	.0003	17.37
45 to 46		.0001	.0001	.0004	.0004	18.19
46 to 47		.0001	.0001	.0002	.0003	14.00
47 to 48		*	.0001	.0002	.0001	12.60
48 to 49		*	*	.0002	.0001	10.19
49 to 50		*	.0001	*	.0001	9.06
50 to 51		*	*	.0001	.0001	7.91
51 to 52		*	*	*	*	4.87
52 to 53		*	.0001	.0001	.0001	6.69
53 to 54		*	*	*	.0001	3.02
54 to 55		*	.0001	*	.0001	4.62
55 to 56		*	*	*	*	2.62
56 to 57		*	*	*	*	3.13
57 to 58		*	*	*	*	1.96
58 to 59		*	*	*	*	2.35
59 to 60		*	*	*	.0001	2.34
60 to 61		*	*	*	.0001	2.74

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.36: Tissue (whole body)**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1	0.0	.0003	.0004	.0004	.0004	0.53
1 to 2	0.0	.0003	.0003	.0004	.0004	0.52
2 to 3	0.0	.0003	.0003	.0004	.0004	0.53
3 to 4	0.0	.0003	.0003	.0004	.0004	0.56
4 to 5	0.0	.0003	.0003	.0004	.0004	0.54
5 to 6	0.0	.0004	.0004	.0005	.0005	0.49
6 to 7	0.1	.0005	.0005	.0007	.0007	0.45
7 to 8	0.1	.0006	.0006	.0008	.0008	0.41
8 to 9	0.1	.0007	.0007	.0010	.0010	0.36
9 to 10	0.1	.0011	.0011	.0014	.0015	0.31
10 to 11	0.2	.0017	.0019	.0022	.0024	0.24
11 to 12	0.3	.0023	.0026	.0029	.0032	0.22
12 to 13	0.4	.0029	.0031	.0036	.0038	0.20
13 to 14	0.6	.0041	.0041	.0050	.0051	0.18
14 to 15	0.7	.0050	.0048	.0059	.0058	0.17
15 to 16	0.7	.0052	.0049	.0061	.0060	0.17
16 to 17	0.7	.0051	.0049	.0060	.0059	0.17
17 to 18	0.6	.0050	.0049	.0060	.0059	0.18
18 to 19	0.6	.0049	.0047	.0058	.0056	0.19
19 to 20	0.6	.0055	.0052	.0065	.0062	0.17
20 to 21	1.0	.0078	.0076	.0090	.0088	0.14
21 to 22	1.2	.0075	.0074	.0089	.0087	0.08
22 to 23	1.3	.0092	.0091	.0110	.0109	0.12
23 to 24	1.5	.0104	.0103	.0123	.0123	0.12
24 to 25	1.6	.0111	.0112	.0132	.0132	0.11
25 to 26	1.7	.0117	.0119	.0138	.0139	0.11
26 to 27	1.7	.0119	.0122	.0141	.0143	0.11
27 to 28	1.6	.0115	.0118	.0136	.0138	0.11
28 to 29	1.5	.0109	.0110	.0130	.0129	0.11
29 to 30	1.4	.0105	.0103	.0125	.0122	0.12
30 to 31	1.3	.0101	.0097	.0120	.0115	0.12
31 to 32	1.2	.0097	.0092	.0116	.0110	0.12
32 to 33	1.3	.0100	.0097	.0120	.0116	0.12
33 to 34	1.4	.0100	.0097	.0120	.0116	0.12

**Table D.36: Tissue (whole body) (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35	1.3	.0095	.0092	.0115	.0111	0.12
35 to 36	1.3	.0094	.0091	.0113	.0110	0.12
36 to 37	1.2	.0091	.0086	.0109	.0104	0.12
37 to 38	1.1	.0088	.0083	.0106	.0101	0.12
38 to 39	1.1	.0086	.0082	.0104	.0099	0.12
39 to 40	1.1	.0088	.0084	.0106	.0102	0.12
40 to 41	1.1	.0091	.0088	.0109	.0105	0.12
41 to 42	1.2	.0094	.0091	.0112	.0109	0.12
42 to 43	1.3	.0100	.0097	.0118	.0115	0.12
43 to 44	1.3	.0106	.0103	.0125	.0122	0.12
44 to 45	1.4	.0109	.0105	.0128	.0124	0.12
45 to 46	1.4	.0109	.0102	.0129	.0121	0.12
46 to 47	1.4	.0111	.0104	.0131	.0124	0.12
47 to 48	1.4	.0113	.0106	.0134	.0126	0.12
48 to 49	1.4	.0113	.0106	.0133	.0126	0.12
49 to 50	1.5	.0112	.0106	.0133	.0127	0.12
50 to 51	1.5	.0112	.0105	.0133	.0126	0.12
51 to 52	1.5	.0110	.0103	.0132	.0124	0.12
52 to 53	1.5	.0111	.0103	.0134	.0125	0.12
53 to 54	1.6	.0113	.0104	.0136	.0126	0.12
54 to 55	1.6	.0116	.0107	.0140	.0131	0.12
55 to 56	1.6	.0119	.0109	.0142	.0132	0.12
56 to 57	1.6	.0120	.0108	.0142	.0131	0.12
57 to 58	1.6	.0120	.0108	.0143	.0132	0.12
58 to 59	1.6	.0120	.0109	.0144	.0133	0.12
59 to 60	1.6	.0119	.0110	.0143	.0134	0.12
60 to 61	1.7	.0122	.0115	.0146	.0139	0.12
61 to 62	1.7	.0122	.0118	.0147	.0142	0.12
62 to 63	1.7	.0123	.0120	.0146	.0143	0.12
63 to 64	1.6	.0123	.0120	.0145	.0142	0.12
64 to 65	1.5	.0122	.0119	.0142	.0139	0.12
65 to 66	1.4	.0119	.0116	.0138	.0135	0.12

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table D.37: Uterus**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
21 to 22		*	*	.0001	.0001	17.90
22 to 23		*	*	.0001	.0001	12.46
23 to 24		.0001	*	*	*	12.59
24 to 25		*	.0001	.0001	.0001	16.23
25 to 26		*	.0001	.0001	.0002	17.16
26 to 27		.0001	.0001	.0001	.0001	16.40
27 to 28		*	.0001	.0001	.0002	17.62
28 to 29		.0001	.0001	.0003	.0003	16.88
29 to 30		.0002	.0001	.0003	.0004	15.79
30 to 31		.0002	.0002	.0002	.0003	16.38
31 to 32		.0002	.0002	.0006	.0004	13.95
32 to 33		.0003	.0003	.0007	.0005	13.36
33 to 34		.0003	.0003	.0006	.0007	11.58
34 to 35		.0005	.0005	.0008	.0009	10.60
35 to 36		.0006	.0006	.0010	.0013	9.25
36 to 37		.0008	.0010	.0015	.0016	7.77
37 to 38		.0009	.0011	.0017	.0020	7.06
38 to 39		.0013	.0014	.0023	.0025	6.39
39 to 40		.0017	.0017	.0030	.0029	5.66
40 to 41		.0022	.0024	.0037	.0038	4.99
41 to 42		.0028	.0031	.0052	.0047	4.39
42 to 43		.0038	.0043	.0054	.0061	3.94
43 to 44		.0049	.0053	.0074	.0086	3.45
44 to 45		.0066	.0068	.0097	.0100	3.08
45 to 46		.0082	.0094	.0122	.0135	2.70
46 to 47		.0112	.0123	.0148	.0171	2.39
47 to 48		.0146	.0174	.0208	.0228	2.08
48 to 49		.0196	.0230	.0253	.0300	1.85
49 to 50		.0256	.0314	.0342	.0405	1.62
50 to 51		.0342	.0428	.0440	.0541	1.42
51 to 52	2.2	.0526	.0692	.0669	.0852	1.18
52 to 53	57.1	.1502	.2297	.1976	.2729	0.75
53 to 54	38.2	.1215	.1749	.1531	.2115	0.83
54 to 55	2.5	.0483	.0666	.0603	.0792	1.22

**Table D.37: Uterus (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
55 to 56		.0332	.0426	.0408	.0517	1.44
56 to 57		.0235	.0297	.0301	.0375	1.67
57 to 58		.0170	.0209	.0228	.0266	1.93
58 to 59		.0121	.0150	.0164	.0196	2.26
59 to 60		.0093	.0103	.0125	.0146	2.60
60 to 61		.0066	.0078	.0095	.0107	2.98
61 to 62		.0048	.0055	.0074	.0079	3.44
62 to 63		.0039	.0040	.0060	.0059	3.95
63 to 64		.0029	.0029	.0044	.0047	4.58
64 to 65		.0019	.0024	.0035	.0032	5.22
65 to 66		.0015	.0015	.0025	.0025	6.16

An asterisk as table entry means that the conversion factor is less than 0.00005.

# **Appendix E**

**Selected**

**Organ Dose Conversion Factors**

**for the CHILD phantom**

**(Scan Using an Asymmetrical Fan Beam)**

**Table E. 1: Red bone marrow in the arm bones**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
2 to 3		*	*	.0001	*	13.10
3 to 4		*	*	.0001	.0001	10.68
4 to 5		*	.0001	.0001	.0001	9.07
5 to 6		.0001	.0001	.0001	.0001	8.03
6 to 7		.0001	.0001	.0002	.0002	6.93
7 to 8		.0001	.0001	.0002	.0002	6.18
8 to 9		.0001	.0001	.0003	.0002	5.54
9 to 10		.0002	.0001	.0003	.0003	5.05
10 to 11		.0002	.0002	.0003	.0003	4.69
11 to 12		.0002	.0002	.0004	.0004	4.42
12 to 13		.0003	.0003	.0004	.0004	4.15
13 to 14		.0003	.0003	.0005	.0005	3.86
14 to 15		.0003	.0003	.0006	.0006	3.64
15 to 16		.0004	.0004	.0006	.0006	3.55
16 to 17		.0004	.0004	.0006	.0006	3.44
17 to 18		.0004	.0004	.0007	.0007	3.39
18 to 19		.0004	.0004	.0007	.0007	3.35
19 to 20		.0005	.0005	.0008	.0008	3.03
20 to 21	0.2	.0030	.0036	.0040	.0048	1.33
21 to 22	3.1	.0088	.0118	.0115	.0153	0.55
22 to 23	7.9	.0262	.0324	.0351	.0421	0.50
23 to 24	7.8	.0240	.0286	.0323	.0375	0.52
24 to 25	4.0	.0148	.0171	.0201	.0229	0.65
25 to 26	1.9	.0088	.0100	.0124	.0134	0.80
26 to 27	1.3	.0065	.0072	.0093	.0101	0.91
27 to 28	1.2	.0059	.0064	.0083	.0090	0.97
28 to 29	1.2	.0055	.0058	.0079	.0082	1.00
29 to 30	1.2	.0053	.0055	.0074	.0076	1.03
30 to 31	1.2	.0051	.0051	.0072	.0072	1.06
31 to 32	1.2	.0051	.0050	.0072	.0071	1.06
32 to 33	1.2	.0052	.0048	.0073	.0069	1.07
33 to 34	1.2	.0052	.0047	.0072	.0068	1.07
34 to 35	1.3	.0055	.0048	.0077	.0068	1.06
35 to 36	1.6	.0066	.0055	.0091	.0077	0.99

**Table E. 1: Red bone marrow in the arm bones (continued)**

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
36 to 37	1.7	.0075	.0063	.0102	.0087	0.94
37 to 38	2.6	.0103	.0086	.0138	.0115	0.84
38 to 39	3.5	.0139	.0107	.0177	.0143	0.74
39 to 40	4.3	.0160	.0122	.0205	.0162	0.69
40 to 41	4.7	.0174	.0116	.0224	.0154	0.69
41 to 42	4.3	.0161	.0110	.0210	.0149	0.71
42 to 43	3.1	.0127	.0084	.0165	.0115	0.79
43 to 44	2.1	.0089	.0066	.0121	.0089	0.89
44 to 45	1.4	.0068	.0053	.0090	.0072	1.00
45 to 46	1.2	.0057	.0046	.0076	.0063	1.06
46 to 47	1.0	.0048	.0040	.0065	.0055	1.14
47 to 48	0.9	.0044	.0037	.0056	.0051	1.18
48 to 49	0.7	.0037	.0033	.0049	.0044	1.26
49 to 50	0.7	.0035	.0031	.0049	.0043	1.27
50 to 51	0.7	.0038	.0036	.0052	.0048	1.23
51 to 52	0.9	.0045	.0047	.0060	.0061	1.12
52 to 53	1.3	.0059	.0067	.0078	.0086	0.99
53 to 54	2.2	.0092	.0105	.0118	.0134	0.81
54 to 55	2.5	.0101	.0105	.0131	.0132	0.80
55 to 56	2.3	.0101	.0111	.0128	.0138	0.79
56 to 57	3.1	.0132	.0154	.0166	.0192	0.69
57 to 58	3.5	.0145	.0158	.0183	.0198	0.67
58 to 59	2.7	.0114	.0121	.0146	.0154	0.74
59 to 60	2.6	.0112	.0126	.0145	.0157	0.73
60 to 61	2.4	.0104	.0107	.0131	.0134	0.78
61 to 62	1.9	.0085	.0086	.0108	.0107	0.86
62 to 63	1.3	.0061	.0060	.0079	.0078	1.00
63 to 64	1.5	.0067	.0065	.0085	.0080	0.99
64 to 65	0.8	.0040	.0037	.0050	.0048	1.27
65 to 66	0.3	.0016	.0011	.0021	.0016	2.02

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table E. 2: Red bone marrow in the clavicles**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1		*	*	.0001	*	12.92
1 to 2		.0001	.0001	.0002	.0001	18.85
2 to 3		.0001	.0001	.0002	.0002	17.69
3 to 4		.0002	.0001	.0004	.0002	15.78
4 to 5		.0003	.0002	.0005	.0005	14.40
5 to 6		.0003	.0003	.0007	.0006	12.40
6 to 7		.0005	.0003	.0008	.0007	10.77
7 to 8		.0004	.0005	.0011	.0009	9.52
8 to 9		.0008	.0006	.0012	.0013	8.49
9 to 10		.0009	.0007	.0014	.0014	7.82
10 to 11		.0011	.0010	.0019	.0017	6.87
11 to 12		.0015	.0014	.0022	.0022	6.15
12 to 13		.0018	.0015	.0026	.0030	5.53
13 to 14		.0025	.0022	.0037	.0033	4.90
14 to 15		.0033	.0028	.0045	.0043	4.39
15 to 16		.0039	.0034	.0055	.0051	3.98
16 to 17		.0047	.0044	.0065	.0061	3.62
17 to 18		.0057	.0054	.0087	.0081	3.23
18 to 19		.0072	.0068	.0100	.0098	2.93
19 to 20		.0116	.0115	.0163	.0160	2.36
20 to 21	24.1	.1004	.1224	.1305	.1556	0.91
21 to 22	29.8	.0658	.0803	.0879	.1021	0.72
22 to 23	21.3	.0822	.1324	.1121	.1650	0.91
23 to 24	24.8	.0777	.1284	.1032	.1651	0.95
24 to 25		.0182	.0237	.0248	.0336	1.77
25 to 26		.0110	.0149	.0158	.0200	2.20
26 to 27		.0084	.0102	.0120	.0137	2.55
27 to 28		.0062	.0073	.0093	.0112	2.88
28 to 29		.0050	.0056	.0077	.0085	3.26
29 to 30		.0037	.0043	.0063	.0068	3.66
30 to 31		.0030	.0032	.0052	.0049	4.08
31 to 32		.0023	.0024	.0038	.0037	4.66
32 to 33		.0018	.0023	.0036	.0039	4.93
33 to 34		.0017	.0015	.0028	.0026	5.49

**Table E. 2: Red bone marrow in the clavicles (continued)**

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
34 to 35		.0013	.0013	.0024	.0021	5.96
35 to 36		.0009	.0009	.0017	.0022	6.74
36 to 37		.0008	.0007	.0014	.0015	7.79
37 to 38		.0006	.0007	.0012	.0012	8.58
38 to 39		.0005	.0005	.0008	.0008	9.75
39 to 40		.0004	.0004	.0007	.0008	10.88
40 to 41		.0003	.0003	.0006	.0005	12.50
41 to 42		.0002	.0003	.0004	.0005	12.86
42 to 43		.0002	.0002	.0004	.0004	14.20
43 to 44		.0001	.0002	.0003	.0003	16.55
44 to 45		.0001	.0002	.0002	.0002	17.31
45 to 46		.0001	.0001	.0002	.0002	17.26
46 to 47		.0001	.0001	.0002	.0002	18.84
47 to 48		.0001	.0001	.0001	.0001	18.67
48 to 49		*	*	.0001	.0001	15.08
49 to 50		*	*	.0001	*	14.12
50 to 51		*	*	.0001	.0001	11.56
51 to 52		*	*	*	*	8.20
52 to 53		*	*	*	*	10.35
53 to 54		*	*	*	*	8.22
54 to 55		*	*	.0001	*	6.52
55 to 56		*	*	*	*	8.20
56 to 57		*	*	*	*	5.86
57 to 58		*	*	*	*	3.18
58 to 59		*	*	*	*	2.07
59 to 60		*	*	*	.0001	4.20

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table E. 3: Red bone marrow in the scapulae**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
1 to 2		*	*	.0001	.0001	14.66
2 to 3		.0001	.0001	.0001	.0001	12.17
3 to 4		.0001	.0001	.0002	.0002	10.22
4 to 5		.0002	.0001	.0003	.0003	8.66
5 to 6		.0002	.0002	.0004	.0004	7.80
6 to 7		.0003	.0002	.0006	.0005	6.84
7 to 8		.0003	.0004	.0007	.0006	5.80
8 to 9		.0005	.0004	.0009	.0007	5.25
9 to 10		.0006	.0005	.0010	.0009	4.73
10 to 11		.0007	.0006	.0011	.0012	4.36
11 to 12		.0009	.0006	.0014	.0012	4.03
12 to 13		.0010	.0009	.0018	.0014	3.73
13 to 14		.0013	.0010	.0019	.0017	3.49
14 to 15		.0013	.0011	.0022	.0018	3.35
15 to 16		.0015	.0012	.0022	.0021	3.19
16 to 17		.0016	.0014	.0025	.0023	3.04
17 to 18		.0018	.0016	.0027	.0027	2.86
18 to 19		.0020	.0019	.0031	.0030	2.66
19 to 20		.0042	.0039	.0062	.0056	1.94
20 to 21	1.6	.0189	.0163	.0249	.0222	1.00
21 to 22	18.7	.0411	.0320	.0556	.0466	0.50
22 to 23	34.5	.1015	.0672	.1394	.0994	0.50
23 to 24	17.5	.0585	.0409	.0813	.0606	0.64
24 to 25	9.2	.0375	.0271	.0531	.0406	0.76
25 to 26	5.5	.0261	.0178	.0374	.0269	0.89
26 to 27	3.9	.0209	.0134	.0295	.0203	1.01
27 to 28	3.4	.0177	.0108	.0251	.0167	1.11
28 to 29	2.9	.0146	.0084	.0210	.0132	1.23
29 to 30	2.4	.0122	.0066	.0173	.0105	1.38
30 to 31	0.5	.0058	.0040	.0087	.0064	1.75
31 to 32		.0030	.0027	.0050	.0044	2.14
32 to 33		.0023	.0022	.0038	.0037	2.36
33 to 34		.0019	.0018	.0032	.0030	2.62
34 to 35		.0014	.0014	.0027	.0024	2.97

**Table E. 3: Red bone marrow in the scapulae (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
35 to 36		.0012	.0011	.0019	.0020	3.29
36 to 37		.0008	.0008	.0015	.0016	3.72
37 to 38		.0006	.0006	.0013	.0012	4.24
38 to 39		.0005	.0005	.0009	.0010	4.81
39 to 40		.0004	.0004	.0008	.0008	5.29
40 to 41		.0003	.0003	.0007	.0006	5.88
41 to 42		.0002	.0002	.0005	.0006	6.74
42 to 43		.0002	.0002	.0004	.0004	7.74
43 to 44		.0002	.0002	.0003	.0003	8.32
44 to 45		.0001	.0001	.0003	.0003	9.40
45 to 46		.0001	.0001	.0002	.0002	10.95
46 to 47		.0001	.0001	.0002	.0002	11.50
47 to 48		.0001	.0001	.0001	.0001	12.86
48 to 49		*	*	.0001	.0001	13.99
49 to 50		*	*	.0001	.0001	15.60
50 to 51		*	*	.0001	.0001	16.48
51 to 52		*	*	.0001	*	17.51
52 to 53		*	*	.0001	*	17.42

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table E. 4: Red bone marrow in the whole body**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1	1.0	.0045	.0045	.0060	.0060	0.38
1 to 2	1.8	.0074	.0074	.0101	.0101	0.30
2 to 3	1.5	.0069	.0071	.0092	.0095	0.30
3 to 4	1.3	.0061	.0065	.0083	.0087	0.31
4 to 5	1.0	.0052	.0055	.0070	.0074	0.33
5 to 6	0.8	.0043	.0045	.0059	.0062	0.35
6 to 7	0.6	.0039	.0040	.0054	.0055	0.37
7 to 8	0.5	.0034	.0035	.0048	.0049	0.38
8 to 9	0.5	.0034	.0036	.0048	.0050	0.38
9 to 10	0.8	.0046	.0051	.0063	.0069	0.34
10 to 11	1.2	.0057	.0066	.0081	.0091	0.30
11 to 12	1.3	.0056	.0058	.0080	.0084	0.31
12 to 13	2.4	.0074	.0071	.0108	.0106	0.28
13 to 14	2.0	.0069	.0064	.0100	.0095	0.30
14 to 15	1.2	.0052	.0054	.0075	.0078	0.33
15 to 16	1.0	.0044	.0042	.0064	.0063	0.36
16 to 17	0.7	.0036	.0032	.0053	.0049	0.40
17 to 18	0.6	.0034	.0030	.0048	.0046	0.42
18 to 19	0.6	.0034	.0032	.0048	.0047	0.41
19 to 20	0.6	.0033	.0033	.0047	.0048	0.41
20 to 21	0.7	.0042	.0045	.0058	.0062	0.36
21 to 22	1.5	.0043	.0044	.0059	.0061	0.24
22 to 23	2.3	.0081	.0079	.0113	.0110	0.27
23 to 24	2.0	.0069	.0069	.0098	.0096	0.29
24 to 25	1.4	.0055	.0056	.0078	.0078	0.32
25 to 26	1.2	.0048	.0046	.0069	.0065	0.34
26 to 27	0.9	.0042	.0037	.0060	.0055	0.37
27 to 28	0.9	.0042	.0036	.0060	.0052	0.37
28 to 29	1.0	.0042	.0037	.0061	.0054	0.37
29 to 30	1.0	.0042	.0036	.0060	.0052	0.38
30 to 31	0.8	.0039	.0034	.0056	.0049	0.38
31 to 32	0.9	.0042	.0038	.0059	.0054	0.37
32 to 33	0.8	.0038	.0031	.0054	.0046	0.39
33 to 34	0.9	.0038	.0031	.0054	.0045	0.39

**Table E. 4: Red bone marrow in the whole body (continued)**

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
34 to 35	0.9	.0038	.0030	.0054	.0045	0.40
35 to 36	0.9	.0038	.0029	.0055	.0043	0.40
36 to 37	0.8	.0036	.0027	.0052	.0040	0.42
37 to 38	0.8	.0035	.0027	.0050	.0040	0.42
38 to 39	0.9	.0038	.0028	.0054	.0041	0.42
39 to 40	1.0	.0039	.0028	.0055	.0041	0.42
40 to 41	1.0	.0040	.0027	.0056	.0040	0.43
41 to 42	1.0	.0038	.0026	.0055	.0040	0.43
42 to 43	0.8	.0035	.0024	.0050	.0037	0.45
43 to 44	0.7	.0032	.0023	.0047	.0037	0.46
44 to 45	0.8	.0032	.0024	.0048	.0037	0.46
45 to 46	0.6	.0029	.0023	.0044	.0036	0.46
46 to 47	0.7	.0031	.0025	.0046	.0039	0.45
47 to 48	0.6	.0032	.0026	.0047	.0040	0.44
48 to 49	0.8	.0036	.0029	.0053	.0045	0.42
49 to 50	1.1	.0043	.0035	.0064	.0054	0.38
50 to 51	1.5	.0051	.0042	.0075	.0063	0.36
51 to 52	2.1	.0061	.0051	.0089	.0076	0.33
52 to 53	1.8	.0060	.0053	.0088	.0078	0.32
53 to 54	1.6	.0058	.0055	.0085	.0080	0.31
54 to 55	1.3	.0054	.0053	.0079	.0077	0.32
55 to 56	1.2	.0052	.0054	.0075	.0078	0.33
56 to 57	1.3	.0055	.0061	.0079	.0087	0.32
57 to 58	1.5	.0057	.0062	.0082	.0088	0.31
58 to 59	1.7	.0058	.0062	.0085	.0089	0.31
59 to 60	2.1	.0066	.0070	.0094	.0100	0.30
60 to 61	1.9	.0062	.0064	.0088	.0090	0.31
61 to 62	1.3	.0050	.0048	.0071	.0069	0.34
62 to 63	0.8	.0037	.0036	.0054	.0052	0.39
63 to 64	0.5	.0028	.0028	.0040	.0040	0.44
64 to 65	0.3	.0020	.0020	.0030	.0029	0.51
65 to 66	0.2	.0015	.0015	.0022	.0022	0.58

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table E. 5: Skeleton (whole body)**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice cm	Volume ratio %	Conversion factors				Coeff. of var. %
		80 kV		125 kV		
		360°	180°	360°	180°	
0 to 1	0.8	.0141	.0142	.0142	.0142	0.22
1 to 2	1.6	.0269	.0274	.0272	.0278	0.17
2 to 3	1.4	.0311	.0322	.0313	.0322	0.16
3 to 4	1.3	.0337	.0350	.0338	.0350	0.16
4 to 5	1.2	.0356	.0367	.0356	.0367	0.17
5 to 6	1.1	.0367	.0377	.0367	.0378	0.17
6 to 7	1.1	.0376	.0386	.0378	.0385	0.17
7 to 8	1.0	.0376	.0387	.0378	.0388	0.19
8 to 9	1.0	.0377	.0388	.0382	.0392	0.18
9 to 10	1.2	.0388	.0399	.0396	.0408	0.17
10 to 11	1.5	.0400	.0413	.0416	.0431	0.15
11 to 12	1.6	.0378	.0387	.0401	.0411	0.16
12 to 13	2.3	.0381	.0388	.0412	.0420	0.15
13 to 14	2.0	.0349	.0364	.0378	.0396	0.16
14 to 15	1.3	.0289	.0316	.0318	.0346	0.17
15 to 16	1.2	.0269	.0294	.0299	.0326	0.19
16 to 17	1.0	.0256	.0279	.0281	.0307	0.20
17 to 18	0.9	.0231	.0249	.0253	.0272	0.21
18 to 19	0.8	.0217	.0237	.0236	.0256	0.21
19 to 20	0.7	.0200	.0225	.0217	.0241	0.21
20 to 21	0.7	.0200	.0219	.0216	.0234	0.19
21 to 22	1.3	.0182	.0187	.0197	.0202	0.13
22 to 23	2.0	.0313	.0312	.0338	.0336	0.15
23 to 24	1.9	.0296	.0286	.0323	.0314	0.16
24 to 25	1.4	.0270	.0252	.0297	.0279	0.17
25 to 26	1.3	.0257	.0231	.0283	.0258	0.18
26 to 27	1.1	.0250	.0223	.0275	.0249	0.19
27 to 28	1.1	.0256	.0225	.0281	.0249	0.19
28 to 29	1.1	.0259	.0232	.0282	.0256	0.19
29 to 30	1.2	.0258	.0232	.0280	.0254	0.19
30 to 31	1.0	.0248	.0228	.0267	.0246	0.19
31 to 32	1.1	.0250	.0234	.0268	.0252	0.19
32 to 33	1.0	.0247	.0222	.0265	.0241	0.20
33 to 34	1.0	.0242	.0213	.0260	.0231	0.20

**Table E. 5: Skeleton (whole body) (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35	1.0	.0234	.0201	.0252	.0220	0.20
35 to 36	1.0	.0225	.0186	.0241	.0204	0.21
36 to 37	0.9	.0212	.0174	.0229	.0191	0.21
37 to 38	0.8	.0197	.0157	.0214	.0173	0.22
38 to 39	0.9	.0192	.0148	.0208	.0165	0.22
39 to 40	0.9	.0182	.0133	.0198	.0151	0.22
40 to 41	0.9	.0164	.0114	.0181	.0133	0.23
41 to 42	0.8	.0151	.0106	.0168	.0126	0.23
42 to 43	0.7	.0143	.0100	.0160	.0120	0.24
43 to 44	0.6	.0132	.0097	.0149	.0117	0.25
44 to 45	0.7	.0137	.0102	.0155	.0121	0.25
45 to 46	0.6	.0132	.0104	.0150	.0122	0.25
46 to 47	0.7	.0139	.0110	.0157	.0129	0.24
47 to 48	0.6	.0142	.0116	.0160	.0134	0.24
48 to 49	0.7	.0157	.0128	.0176	.0148	0.22
49 to 50	1.0	.0183	.0151	.0205	.0173	0.21
50 to 51	1.3	.0202	.0172	.0226	.0196	0.19
51 to 52	1.7	.0224	.0197	.0251	.0223	0.18
52 to 53	1.6	.0234	.0214	.0261	.0240	0.18
53 to 54	1.4	.0237	.0227	.0261	.0251	0.17
54 to 55	1.2	.0217	.0214	.0242	.0238	0.18
55 to 56	1.0	.0197	.0202	.0222	.0226	0.18
56 to 57	1.1	.0203	.0217	.0227	.0241	0.18
57 to 58	1.3	.0217	.0232	.0241	.0255	0.17
58 to 59	1.5	.0236	.0252	.0260	.0274	0.17
59 to 60	1.8	.0255	.0270	.0278	.0291	0.17
60 to 61	1.6	.0246	.0253	.0267	.0272	0.17
61 to 62	1.3	.0222	.0222	.0241	.0239	0.18
62 to 63	0.9	.0190	.0187	.0205	.0201	0.21
63 to 64	0.6	.0157	.0157	.0170	.0169	0.23
64 to 65	0.4	.0126	.0128	.0139	.0140	0.26
65 to 66	0.3	.0105	.0105	.0118	.0117	0.29

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table E. 6: Skin (whole body)**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1	0.2	.0019	.0018	.0021	.0021	0.65
1 to 2	0.4	.0028	.0028	.0032	.0032	0.52
2 to 3	0.5	.0035	.0035	.0040	.0039	0.46
3 to 4	0.5	.0039	.0039	.0045	.0045	0.43
4 to 5	0.6	.0043	.0043	.0049	.0049	0.41
5 to 6	0.6	.0044	.0044	.0050	.0050	0.41
6 to 7	0.6	.0045	.0045	.0052	.0051	0.40
7 to 8	0.6	.0047	.0047	.0054	.0054	0.39
8 to 9	0.7	.0049	.0049	.0056	.0057	0.38
9 to 10	0.7	.0050	.0051	.0057	.0058	0.38
10 to 11	0.7	.0053	.0053	.0059	.0061	0.37
11 to 12	0.7	.0057	.0055	.0064	.0063	0.37
12 to 13	0.6	.0053	.0049	.0060	.0056	0.38
13 to 14	0.7	.0057	.0056	.0063	.0062	0.37
14 to 15	0.6	.0054	.0054	.0060	.0061	0.38
15 to 16	0.6	.0052	.0054	.0057	.0060	0.38
16 to 17	0.5	.0048	.0049	.0053	.0055	0.39
17 to 18	0.5	.0048	.0049	.0053	.0055	0.39
18 to 19	0.5	.0048	.0049	.0053	.0055	0.39
19 to 20	0.7	.0058	.0058	.0065	.0064	0.36
20 to 21	1.0	.0076	.0080	.0084	.0089	0.31
21 to 22	1.0	.0049	.0054	.0055	.0059	0.25
22 to 23	0.9	.0072	.0074	.0080	.0082	0.32
23 to 24	1.0	.0075	.0076	.0084	.0084	0.31
24 to 25	1.0	.0077	.0077	.0085	.0085	0.31
25 to 26	1.0	.0079	.0079	.0088	.0087	0.30
26 to 27	1.0	.0082	.0080	.0091	.0089	0.30
27 to 28	1.3	.0092	.0091	.0103	.0101	0.28
28 to 29	1.4	.0096	.0094	.0108	.0106	0.28
29 to 30	1.4	.0096	.0094	.0108	.0105	0.28
30 to 31	1.3	.0096	.0093	.0108	.0105	0.28
31 to 32	1.3	.0095	.0092	.0106	.0104	0.28
32 to 33	1.3	.0093	.0090	.0105	.0102	0.28
33 to 34	1.3	.0092	.0089	.0104	.0101	0.29

**Table E. 6: Skin (whole body) (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35	1.3	.0092	.0089	.0103	.0101	0.28
35 to 36	1.3	.0091	.0089	.0103	.0100	0.29
36 to 37	1.3	.0091	.0089	.0103	.0100	0.29
37 to 38	1.3	.0091	.0089	.0104	.0100	0.28
38 to 39	1.3	.0092	.0090	.0104	.0101	0.28
39 to 40	1.3	.0092	.0090	.0103	.0101	0.28
40 to 41	1.3	.0092	.0090	.0104	.0101	0.28
41 to 42	1.2	.0092	.0090	.0103	.0100	0.28
42 to 43	1.2	.0092	.0090	.0103	.0100	0.29
43 to 44	1.2	.0092	.0088	.0102	.0099	0.29
44 to 45	1.2	.0091	.0088	.0101	.0098	0.29
45 to 46	1.2	.0090	.0087	.0101	.0097	0.29
46 to 47	1.2	.0089	.0086	.0100	.0096	0.29
47 to 48	1.2	.0089	.0085	.0099	.0095	0.29
48 to 49	1.2	.0088	.0084	.0099	.0094	0.30
49 to 50	1.2	.0088	.0084	.0098	.0093	0.30
50 to 51	1.2	.0088	.0084	.0099	.0093	0.30
51 to 52	1.2	.0089	.0083	.0099	.0094	0.30
52 to 53	1.2	.0089	.0083	.0099	.0094	0.30
53 to 54	1.2	.0088	.0083	.0099	.0094	0.30
54 to 55	1.2	.0089	.0084	.0099	.0094	0.30
55 to 56	1.2	.0090	.0086	.0101	.0097	0.29
56 to 57	1.2	.0091	.0088	.0102	.0099	0.29
57 to 58	1.3	.0093	.0090	.0105	.0101	0.28
58 to 59	1.3	.0094	.0091	.0106	.0102	0.28
59 to 60	1.3	.0096	.0093	.0108	.0105	0.28
60 to 61	1.3	.0097	.0094	.0109	.0105	0.27
61 to 62	1.4	.0099	.0095	.0111	.0106	0.27
62 to 63	1.4	.0100	.0095	.0111	.0106	0.27
63 to 64	1.3	.0095	.0092	.0106	.0103	0.28
64 to 65	1.1	.0090	.0085	.0100	.0095	0.29
65 to 66	1.1	.0088	.0082	.0097	.0091	0.30

An asterisk as table entry means that the conversion factor is less than 0.00005.

**Table E. 7: Tissue (whole body)**

Mean organ dose normalised to air kerma free in air on the axis of rotation and average coefficients of variance per single 1 cm wide slice; the volume ratio of the organ located within each single slice is also shown.

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
0 to 1	0.0	.0003	.0004	.0004	.0004	0.45
1 to 2	0.0	.0003	.0003	.0004	.0004	0.44
2 to 3	0.0	.0003	.0003	.0004	.0004	0.44
3 to 4	0.0	.0003	.0003	.0004	.0004	0.47
4 to 5	0.0	.0003	.0003	.0004	.0004	0.46
5 to 6	0.0	.0004	.0004	.0006	.0005	0.41
6 to 7	0.1	.0005	.0004	.0007	.0006	0.38
7 to 8	0.1	.0006	.0006	.0008	.0008	0.34
8 to 9	0.1	.0007	.0007	.0010	.0010	0.31
9 to 10	0.1	.0011	.0011	.0014	.0015	0.26
10 to 11	0.2	.0017	.0019	.0022	.0024	0.20
11 to 12	0.3	.0023	.0025	.0029	.0032	0.18
12 to 13	0.4	.0029	.0031	.0036	.0038	0.17
13 to 14	0.6	.0041	.0041	.0050	.0051	0.15
14 to 15	0.7	.0050	.0047	.0059	.0058	0.14
15 to 16	0.7	.0051	.0049	.0061	.0060	0.14
16 to 17	0.7	.0050	.0049	.0060	.0059	0.15
17 to 18	0.6	.0050	.0049	.0060	.0059	0.15
18 to 19	0.6	.0048	.0047	.0058	.0056	0.15
19 to 20	0.6	.0055	.0053	.0065	.0063	0.14
20 to 21	1.0	.0076	.0075	.0088	.0087	0.12
21 to 22	1.2	.0058	.0058	.0068	.0069	0.08
22 to 23	1.3	.0086	.0087	.0103	.0104	0.11
23 to 24	1.5	.0095	.0097	.0114	.0115	0.10
24 to 25	1.6	.0102	.0104	.0121	.0123	0.09
25 to 26	1.7	.0105	.0109	.0125	.0128	0.09
26 to 27	1.7	.0107	.0111	.0127	.0131	0.09
27 to 28	1.6	.0103	.0107	.0123	.0127	0.09
28 to 29	1.5	.0098	.0099	.0117	.0118	0.09
29 to 30	1.4	.0094	.0094	.0113	.0111	0.09
30 to 31	1.3	.0091	.0088	.0108	.0105	0.10
31 to 32	1.2	.0087	.0084	.0104	.0100	0.10
32 to 33	1.3	.0091	.0088	.0109	.0106	0.10
33 to 34	1.4	.0091	.0089	.0110	.0107	0.10

**Table E. 7: Tissue (whole body) (continued)**

Slice	Volume ratio	Conversion factors				Coeff. of var.
		80 kV		125 kV		
cm	%	360°	180°	360°	180°	%
34 to 35	1.3	.0087	.0084	.0105	.0102	0.10
35 to 36	1.3	.0085	.0083	.0103	.0101	0.10
36 to 37	1.2	.0082	.0078	.0100	.0095	0.10
37 to 38	1.1	.0080	.0076	.0097	.0092	0.11
38 to 39	1.1	.0078	.0074	.0095	.0090	0.11
39 to 40	1.1	.0080	.0077	.0097	.0093	0.11
40 to 41	1.1	.0083	.0080	.0099	.0097	0.10
41 to 42	1.2	.0086	.0083	.0103	.0100	0.10
42 to 43	1.3	.0091	.0088	.0108	.0105	0.10
43 to 44	1.3	.0097	.0095	.0115	.0113	0.09
44 to 45	1.4	.0100	.0097	.0118	.0115	0.09
45 to 46	1.4	.0100	.0094	.0119	.0112	0.10
46 to 47	1.4	.0103	.0097	.0122	.0115	0.10
47 to 48	1.4	.0105	.0099	.0125	.0117	0.10
48 to 49	1.4	.0105	.0098	.0125	.0117	0.10
49 to 50	1.5	.0105	.0098	.0125	.0118	0.10
50 to 51	1.5	.0104	.0097	.0125	.0117	0.10
51 to 52	1.5	.0103	.0094	.0124	.0115	0.10
52 to 53	1.5	.0104	.0094	.0126	.0115	0.10
53 to 54	1.6	.0105	.0095	.0127	.0116	0.10
54 to 55	1.6	.0109	.0099	.0132	.0121	0.10
55 to 56	1.6	.0112	.0100	.0134	.0122	0.10
56 to 57	1.6	.0111	.0099	.0134	.0120	0.10
57 to 58	1.6	.0112	.0099	.0134	.0121	0.10
58 to 59	1.6	.0112	.0099	.0134	.0122	0.10
59 to 60	1.6	.0111	.0100	.0134	.0122	0.10
60 to 61	1.7	.0114	.0105	.0137	.0128	0.10
61 to 62	1.7	.0115	.0109	.0138	.0131	0.10
62 to 63	1.7	.0116	.0111	.0139	.0133	0.10
63 to 64	1.6	.0118	.0112	.0139	.0133	0.10
64 to 65	1.5	.0117	.0113	.0138	.0132	0.10
65 to 66	1.4	.0115	.0110	.0133	.0128	0.10

An asterisk as table entry means that the conversion factor is less than 0.00005.