

Table A.21. Conversion coefficients<sup>a</sup> for the ambient dose equivalent,  $H^*(10)$ , and directional dose equivalent,  $H'(0.07,0^\circ)$ , from photon fluence and air kerma free-in-air

Photon energy (MeV)	$H^*(10)/K_a$ (Sv/Gy)	$H'(0.07,0^\circ)/K_a$ (Sv/Gy)	$K_a/\Phi$ (pGy cm <sup>2</sup> )	$H^*(10)/\Phi$ (pSv cm <sup>2</sup> )	$H'(0.07,0^\circ)/\Phi$ (pSv cm <sup>2</sup> )
0.010	0.008	0.95	7.60	0.061	7.20
0.015	0.26	0.99	3.21	0.83	3.19
0.020	0.61	1.05	1.73	1.05	1.81
0.030	1.10	1.22	0.739	0.81	0.90
0.040	1.47	1.41	0.438	0.64	0.62
0.050	1.67	1.53	0.328	0.55	0.50
0.060	1.74	1.59	0.292	0.51	0.47
0.080	1.72	1.61	0.308	0.53	0.49
0.100	1.65	1.55	0.372	0.61	0.58
0.150	1.49	1.42	0.600	0.89	0.85
0.200	1.40	1.34	0.856	1.20	1.15
0.300	1.31	1.31	1.38	1.80	1.80
0.400	1.26	1.26	1.89	2.38	2.38
0.500	1.23	1.23	2.38	2.93	2.93
0.600	1.21	1.21	2.84	3.44	3.44
0.800	1.19	1.19	3.69	4.38	4.38
1	1.17	1.17	4.47	5.20	5.20
1.5	1.15	1.15	6.12	6.90	6.90
2	1.14	1.14	7.51	8.60	8.60
3	1.13	1.13	9.89	11.1	11.1
4	1.12	1.12	12.0	13.4	13.4
5	1.11	1.11	13.9	15.5	15.5
6	1.11	1.11	15.8	17.6	17.6
8	1.11	1.11	19.5	21.6	21.6
10	1.10	1.10	23.2	25.6	25.6

<sup>a</sup>Data compiled from *ICRU Report 47* (1992a) using Hubbell and Seltzer (1995). The  $K_a/\Phi$  data are slightly different from those used for the protection quantities (see Table A.1) which used earlier data from Hubbell (1982).