

**Table 24: One-, Two-, Three-, Four-, Five-, and Ten-Year Relative Survival Rates<sup>a,b</sup> For Selected Malignant Brain and Central Nervous System Tumors by Age Groups, SEER 17 Registries, 1995-2007**

Histology	Age Group	# Cases	1-Yr	2-Yr	3-Yr	4-Yr	5-Yr	10-Yr
Pilocytic astrocytoma	0-14	1,366	98.7%	98.6%	98.2%	97.7%	97.3%	96.1%
	0-19	1,644	98.4%	98.4%	97.8%	97.3%	96.8%	95.6%
	20-44	491	96.8%	95.2%	94.0%	92.3%	91.0%	87.9%
	45-54	88	94.3%	88.0%	88.0%	84.0%	82.4%	72.4%
	55-64	40	95.4%	84.0%	81.0%	81.0%	81.0%	c
	65-74	22	c	c	c	c	c	c
	75+	c	c	c	c	c	c	c
Protoplasmic & fibrillary astrocytoma	0-14	89	93.1%	84.3%	84.3%	84.3%	84.3%	82.1%
	0-19	110	94.4%	85.1%	85.1%	85.1%	85.1%	79.6%
	20-44	243	91.6%	81.4%	72.3%	64.7%	58.5%	40.7%
	45-54	81	71.6%	52.8%	49.4%	41.6%	39.5%	c
	55-64	96	55.1%	29.5%	21.7%	c	c	c
	65-74	58	c	c	c	c	c	c
	75+	38	c	c	c	c	c	c
Anaplastic astrocytoma	0-14	150	59.7%	43.5%	34.0%	33.1%	32.0%	27.7%
	0-19	200	63.7%	44.5%	35.2%	34.4%	33.6%	30.1%
	20-44	933	87.3%	72.7%	62.7%	55.4%	48.5%	36.5%
	45-54	532	70.1%	48.2%	37.3%	30.6%	28.6%	18.6%
	55-64	485	46.9%	21.6%	13.7%	10.9%	8.2%	5.7%
	65-74	411	30.7%	11.0%	5.6%	3.8%	3.3%	c
	75+	285	12.9%	5.2%	c	c	c	c
Astrocytoma, NOS	0-14	422	91.2%	87.4%	84.4%	83.0%	81.9%	79.5%
	0-19	530	92.0%	87.8%	84.5%	83.1%	81.9%	79.2%
	20-44	1,133	92.0%	83.4%	76.8%	70.7%	64.4%	44.9%
	45-54	504	71.8%	57.9%	49.2%	42.2%	40.2%	29.8%
	55-64	412	52.7%	33.5%	24.1%	21.2%	20.3%	11.6%
	65-74	345	31.3%	20.3%	15.3%	13.1%	11.6%	5.4%
	75+	356	18.1%	8.1%	6.4%	5.6%	c	c
Glioblastoma	0-14	155	46.6%	26.0%	21.9%	20.9%	20.9%	13.3%
	0-19	239	54.5%	29.5%	20.8%	18.6%	18.6%	12.7%
	20-44	2,052	66.1%	34.3%	23.2%	18.5%	16.1%	9.7%
	45-54	3,561	51.8%	18.7%	9.8%	6.8%	5.6%	3.1%
	55-64	4,931	39.8%	12.4%	6.2%	3.7%	3.3%	0.8%
	65-74	4,831	22.3%	5.5%	2.7%	1.9%	1.4%	0.8%
	75+	4,183	9.7%	2.4%	1.2%	0.8%	0.7%	c
Oligodendroglioma	0-14	114	97.3%	96.4%	95.3%	95.3%	95.3%	90.6%
	0-19	191	97.4%	95.1%	93.2%	93.2%	92.5%	88.6%
	20-44	1,304	98.0%	95.7%	92.4%	88.4%	84.7%	67.2%
	45-54	526	94.3%	88.9%	84.8%	80.9%	76.8%	55.8%
	55-64	255	87.2%	78.0%	72.0%	68.6%	65.0%	46.9%
	65-74	109	78.4%	68.6%	59.2%	55.7%	51.5%	35.1%
	75+	68	57.9%	42.6%	38.3%	32.4%	30.4%	c
Anaplastic oligodendroglioma	0-14	c	c	c	c	c	c	c
	0-19	27	88.5%	c	c	c	c	c
	20-44	395	93.2%	81.8%	77.4%	71.8%	65.9%	46.8%
	45-54	238	83.3%	70.0%	63.2%	57.2%	52.9%	40.1%
	55-64	170	72.3%	55.4%	45.0%	35.6%	32.5%	16.7%
	65-74	100	50.3%	35.1%	26.9%	21.3%	c	c
	75+	40	c	c	c	c	c	c
Ependymoma/anaplastic ependymoma	0-14	433	93.4%	85.6%	78.5%	72.8%	69.9%	60.5%
	0-19	520	94.2%	86.9%	80.4%	75.6%	72.8%	63.3%
	20-44	564	95.9%	94.4%	92.9%	91.2%	90.9%	87.1%
	45-54	304	94.3%	90.4%	88.5%	85.9%	84.9%	81.8%
	55-64	209	92.5%	88.3%	86.6%	84.8%	84.4%	83.6%
	65-74	100	88.6%	76.2%	72.0%	72.0%	72.0%	58.6%
	75+	51	83.2%	74.1%	63.4%	63.4%	63.4%	32.4%

**Table 24: One-, Two-, Three-, Four-, Five-, and Ten-Year Relative Survival Rates<sup>a,b</sup> For Selected Malignant Brain and Central Nervous System Tumors by Age Groups, SEER 17 Registries, 1995-2007**

Histology	Age Group	# Cases	1-Yr	2-Yr	3-Yr	4-Yr	5-Yr	10-Yr
Mixed glioma	0-14	55	92.4%	80.7%	80.7%	75.6%	75.6%	71.7%
	0-19	93	91.1%	83.3%	83.3%	80.1%	80.1%	77.7%
	20-44	704	96.1%	88.1%	80.2%	73.5%	66.7%	52.8%
	45-54	244	87.8%	72.0%	61.6%	55.9%	55.1%	37.5%
	55-64	134	72.3%	45.8%	36.7%	32.2%	26.0%	17.3%
	65-74	83	65.4%	36.5%	30.3%	c	c	c
	75+	38	c	c	c	c	c	c
Glioma malignant, NOS	0-14	887	74.0%	59.0%	55.9%	54.6%	54.4%	52.9%
	0-19	979	75.3%	60.8%	57.5%	55.7%	55.5%	54.2%
	20-44	534	88.3%	78.1%	73.8%	69.0%	64.9%	45.6%
	45-54	284	67.9%	53.8%	48.1%	43.6%	40.9%	31.2%
	55-64	249	46.4%	29.9%	27.3%	24.4%	22.0%	21.3%
	65-74	265	30.5%	19.3%	16.9%	14.1%	14.1%	12.6%
	75+	479	14.6%	9.8%	8.1%	7.5%	6.2%	c
Malignant neuronal/glial, neuronal and mixed	0-14	92	86.3%	76.0%	73.1%	69.6%	69.6%	69.6%
	0-19	112	86.9%	75.5%	71.9%	67.4%	67.4%	67.4%
	20-44	134	93.3%	87.7%	84.0%	79.6%	77.2%	66.0%
	45-54	114	91.4%	88.7%	85.6%	79.6%	75.8%	58.9%
	55-64	87	89.9%	72.1%	70.9%	61.1%	61.1%	54.7%
	65-74	43	72.4%	62.6%	60.5%	60.5%	60.5%	c
	75+	36	77.3%	65.8%	55.5%	55.5%	55.5%	c
Embryonal/primitive/medulloblastoma	0-14	1,232	80.7%	69.8%	66.0%	63.8%	61.8%	56.9%
	0-19	1,358	81.6%	70.4%	66.2%	63.6%	61.7%	57.0%
	20-44	407	87.0%	79.7%	72.7%	68.0%	66.0%	55.1%
	45-54	53	80.9%	64.5%	59.1%	59.1%	55.7%	34.5%
	55-64	26	69.2%	c	c	c	c	c
	65-74	c	c	c	c	c	c	c
	75+	c	c	c	c	c	c	c
Lymphoma	0-14	37	86.3%	82.8%	82.8%	77.3%	77.3%	77.3%
	0-19	59	82.7%	78.6%	78.6%	75.6%	75.6%	65.1%
	20-44	887	37.2%	31.4%	28.9%	27.3%	25.8%	19.8%
	45-54	574	57.9%	48.9%	45.2%	41.9%	39.3%	29.0%
	55-64	615	61.2%	50.6%	45.0%	40.9%	37.3%	27.1%
	65-74	689	48.2%	37.7%	30.1%	24.2%	21.1%	9.3%
	75+	597	33.8%	23.1%	18.3%	15.8%	12.1%	9.7%
<b>Total: All Brain and CNS<sup>d</sup></b>	0-14	5,596	85.6%	77.9%	74.9%	73.0%	71.9%	67.8%
	0-19	6,839	86.6%	78.8%	75.5%	73.6%	72.5%	68.6%
	20-44	10,472	82.6%	70.8%	64.6%	60.2%	56.6%	45.0%
	45-54	7,486	65.2%	43.7%	36.6%	32.9%	31.2%	23.4%
	55-64	8,125	49.6%	27.4%	21.4%	18.5%	17.4%	12.6%
	65-74	7,555	31.2%	16.3%	12.6%	10.9%	9.8%	6.9%
	75+	7,215	16.5%	8.8%	6.9%	6.1%	5.4%	4.0%

<sup>a</sup>The cohort analysis of survival rates was utilized for calculating the survival estimates presented in this table. Long-term cohort-based survival estimates reflect the survival experience of individuals diagnosed over the time period, and they may not necessarily reflect the long-term survival outlook of newly diagnosed cases.

<sup>b</sup>Rates are an estimate of the percentage of patients alive at one, two, three, four, five, and ten year, respectively.

<sup>c</sup>Too few cases to report/estimate.

<sup>d</sup>Includes histologies not listed in this table.

Abbreviations: SEER, Survival, Epidemiology and End Results; NOS, not otherwise specified.