

CHAPTER 12: CANCER SURVIVORSHIP

Cancer survivors are at greater risk for recurrence and developing second cancers due to effects of treatment, lifestyle behaviors, genetics or risk factors that contributed to the first cancer. Cancer survivors can help enhance their quality of life, maintain their health and improve survival.

About 1 in 10 adult cancer survivors in Kansas were diagnosed before age 25. Survivors of childhood cancer have special health care needs and require follow-up care and medical surveillance for the rest of their lives.⁴⁷ This specialized care is necessary to monitor late effects that may develop months or years after treatment has ended.⁴⁸ The risk of late effects depends on the type of cancer, the type and dosage of treatment received, and the child's age.⁴⁹ Late effects of childhood cancer may include: recurrence, second cancers, premature death, disability, impaired development, and learning problems.

While prevention is key to the public health response to cancer among adults, little is known about how to develop evidence-based interventions to prevent cancer among children. Further, there are no nationally-recognized cancer screening guidelines to detect childhood cancers in their early stage.



⁴⁷ American Cancer Society. Cancer in Children. Available at:

<http://www.cancer.org/acs/groups/cid/documents/webcontent/002287-pdf.pdf> Accessed September 1, 2016.

⁴⁸ National Cancer Institute. Cancer in Children and Adolescents. Available at:

<http://www.cancer.gov/types/childhood-cancers/child-adolescent-cancers-fact-sheet#2>. Accessed September 1, 2016

⁴⁹ Centers for Disease Control and Prevention. Basic Information for Cancer Survivors. Available at:

http://www.cdc.gov/cancer/survivorship/basic_info/index.htm. Accessed September 1, 2016.

Health risk behaviors, health status, and health care access among cancer survivors

During 2014 and 2015, about 7 percent of Kansas adults have been diagnosed with cancer (excluding skin cancer) (data not shown).

In 2014, the adjusted percentage of Kansans who are current smokers was significantly higher among adults with cancer diagnosis as compared to those without cancer diagnosis ($p=0.02$). However, the adjusted percentage of Kansans who are current smokers did not differ significantly by cancer diagnostic status in 2015.

In 2014, the adjusted percentage of Kansans who reported ever drank alcohol in the past 30 days did not differ significantly by cancer diagnostic status. In 2015, the adjusted percentage of Kansans who reported ever drank alcohol in the past 30 days was significantly higher among adults without cancer diagnosis as compared to those with cancer diagnosis ($p<0.001$).

The adjusted percentage of Kansans who consume fruits and vegetables one or more times per day did not differ significantly by cancer diagnostic status in 2015.

The adjusted percentage of Kansans who reported never participate in any physical activities in the past 30 days in 2014 did not differ significantly by cancer diagnostic status. In 2015, the adjusted percentage of Kansans who reported never participate in any physical activities in the past 30 days was significantly higher among adults with cancer diagnosis as compared to those without cancer diagnosis ($p<0.001$).

During 2014 and 2015, the adjusted percentages of Kansans who self-reported fair/poor health, limited access in any activities due to physical/mental and emotional problems, physically and emotionally unhealthy for 14 days or more in the past month, and poor health interfered with usual activities for 14 days or more in the past month were both significantly higher among adults with cancer diagnosis as compared to those without cancer diagnosis.

In 2014, the adjusted percentage of Kansans who did not have insurance was significantly higher among adults without cancer diagnosis as compared to those with cancer diagnosis ($p<0.001$). However, the adjusted percentage of Kansans who are uninsured in 2015 did not differ significantly by cancer diagnostic status.

In Kansas, the adjusted percentage of adults who reported not having a health care provider in 2014 and 2015 were both significantly higher among adults without cancer diagnosis as compared to those with cancer diagnosis. Conversely, the adjusted percentages of Kansans who reported couldn't see doctor due to cost were both significantly higher among adults with cancer diagnosis as compared to those without cancer diagnosis.

Table 12-1. Adjusted prevalence of health risk behaviors, health status, and health care access indicators among adults 18 years and older, by history of cancer diagnosis, Kansas, 2014-2015

Adjusted Prevalence*						
Year	2014			2015		
Diagnostic status	Cancer	No cancer		Cancer	No cancer	
Health Risk Behaviors	% ± SE	% ± SE	P-value	% ± SE	% ± SE	P-value
Current smoker	20.6 ± 1.9	16.8 ± 0.8	0.02	16.6 ± 1.3	16.5 ± 0.7	0.89
Drank alcohol in past 30 days	35.7 ± 2.0	38.4 ± 1.2	0.08	34.0 ± 1.5	38.7 ± 1.0	< 0.001
Consume fruits ≥1 times per day^a	-			58.1 ± 1.6	58.3 ± 1.0	0.90
Consume vegetables ≥1 times per day^a	-			74.2 ± 1.5	75.9 ± 0.9	0.22
No physical activity in past 30 days	33.7 ± 2.0	30.5 ± 1.1	0.07	36.2 ± 1.6	31.0 ± 0.9	< 0.001
Overweight/obese (BMI≥25kg/m²)	68.9 ± 1.9	72.3 ± 1.1	0.04	72.9 ± 1.4	72.3 ± 0.9	0.67
Health Status						
Self-reported fair/poor health	37.5 ± 2.3	23.3 ± 1.0	< 0.001	40.1 ± 1.8	22.9 ± 0.8	< 0.001
Limited in any way in any activities because of physical, mental, or emotional problems	32.0 ± 2.0	23.7 ± 1.0	< 0.001	35.4 ± 1.6	24.0 ± 0.8	< 0.001
Physically unhealthy for ≥ 14 days in past 30 days	21.4 ± 1.9	11.8 ± 0.8	< 0.001	21.3 ± 1.5	12.0 ± 0.6	< 0.001
Emotionally unhealthy for ≥ 14 days in past 30 days	13.0 ± 1.6	9.7 ± 0.7	0.01	13.4 ± 1.2	9.0 ± 0.5	< 0.001
Poor health interfered with usual activities for ≥ 14 days in past 30 days	19.7 ± 2.5	13.8 ± 1.2	0.002	22.8 ± 2.1	15.6 ± 0.9	< 0.001
Health Care Access						
Uninsured	7.3 ± 1.4	12.1 ± 0.8	0.005	9.7 ± 1.3	10.2 ± 0.6	0.71
Do not have health care provider	11.7 ± 1.7	16.3 ± 0.8	0.02	12.0 ± 1.4	16.9 ± 0.7	0.002
Could not see doctor because of cost	20.1 ± 2.0	13.4 ± 0.8	< 0.001	15.3 ± 1.4	10.2 ± 0.5	< 0.001

* Predicted population margins; adjusted for age, sex, race/ethnicity, employment status, and education level. SE= standard error. P-values <0.05 indicate statistically significant between-group differences.

a. Data are not available in 2014 BRFSS.

Source: 2014-2015 Kansas Behavioral Risk Factor Surveillance System, Bureau of Health Promotion, KDHE.