

# SOUTH DAKOTA BRFSS SURVEILLANCE BRIEF: CANCER SURVIVORSHIP

## Background:

The American Cancer Society (ACS) estimates there are 39,330 cancer survivors residing in SD.<sup>1</sup> The National Cancer Institute identifies, “in cancer, a person is considered to be a survivor from the time of diagnosis until the end of life”.<sup>2</sup> However, survivorship is often considered as the period after conclusion of active treatment for survivorship care plan delivery. Cancer survivors are at greater risk for developing secondary cancers and often have unique needs related to long-term treatment effects, follow-up care, and surveillance for reoccurrence. An Institute of Medicine Report identified failures in the U.S. healthcare system in providing coordinated and comprehensive follow-up care for cancer survivors. The report also identified a lack of guidelines and system failures for assisting cancer survivors with the care transition from oncology care and overcoming psychosocial or medical problems that they may face.<sup>3</sup> Survivorship Care Plans were identified as an opportunity to help improve communication and the quality of care for cancer survivors. Currently, two accreditation programs from the American College of Surgeons – the Commission on Cancer and National Accreditation Program for Breast Cancers – include standards on cancer survivorship care plans.<sup>4</sup>

## Methods:

The South Dakota Behavioral Risk Factor Surveillance System (BRFSS) is a telephone survey of residents aged 18 and older and is conducted as a combined effort between the South Dakota Department of Health (DOH) and the Centers for Disease Control and Prevention. Further details on the SD BRFSS methodology can be found at <https://doh.sd.gov/Statistics/2016BRFSS/Methodology.pdf>.

The full thirteen-question CDC cancer survivorship optional module was included on the 2016 SD BRFSS. This report utilizes data from this optional module to evaluate cancer survivorship care plan receipt, clinical trial participation, and other relevant indicators for cancer survivorship.

## Results:

In 2016, 11.8% of South Dakota adults reported ever having cancer in their lifetime, including skin cancer. Among cancer survivors, 84.5% reported having one type of cancer, 13.9% reported having two types, and 1.6% reported having three or more. As outlined in Table 1, the cancer type most frequently reported was skin cancer, followed by breast, male reproductive, female reproductive and gastrointestinal. For respondents with two or more cancer types, their most recent type of cancer diagnosis was reported. The mean age at diagnosis was 53, and the age range at diagnosis was from 2 years to 89 years old. When asked to identify who provided the majority of their health care, 54.6% of cancer survivors reported family practitioner and 25.9% reported general practitioner. Most survivors (93.2%) reported having health insurance that covered all or part of their treatment. Clinical trial participation as part of cancer treatment was reported by 4.5% of cancer survivors. Only 4.9% of cancer survivors reported current physical pain due to cancer treatment. Due to a low number of events (LNE), pain control is not able to be reported.

**Table 1. Cancer Types Reported**

Cancer Type	% (95% CI)
Skin	48.7 (42.6-54.9)
Breast	11.8 (8.5-15.2)
Male Reproductive	11.1 (7.2-15.1)
Female Reproductive	10.1 (6.5-13.6)
Gastrointestinal	3.7 (1.7-5.6)
All Others <sup>‡</sup>	Low Number of Events (LNE)

<sup>‡</sup>all others include, but are not limited to, urinary, head/neck, leukemia, and thoracic

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A cancer survivorship care plan consists of both a written cancer treatment summary and written follow-up summary. As shown in Table 2, 53.2% of cancer survivors reported receipt of written or printed instructions from a doctor, nurse, or other health professional about where they should return or who they should see for routine cancer

**Table 2. Demographic comparison for survivorship care plans and insurance denial, 2016 SD BRFSS (N=803) \*P<0.05**

	Received a Written Cancer Treatment Summary % (95% CI)	Received a Written Summary of Routine Cancer Check-ups % (95% CI)	Denied Health or Life Insurance <sup>†</sup> Due to Cancer Diagnosis % (95% CI)
<b>Total</b>	38.9 (33.0-44.8)	53.2 (47.2-59.2)	8.9 (5.2-12.6)
<b>Age</b>			
18-64	41.2 (31.5-50.9)	59.6(49.9-69.2)	13.4 (6.1-20.6)*
65+	37.2 (29.8-44.6)	48.0 (40.6-55.3)	5.4 (2.3-8.5)
<b>Gender</b>			
Male	33.5 (24.5-42.5)	53.1 (43.8-62.4)	LNE
Female	42.9 (35.2-50.7)	53.3 (45.4-61.1)	9.0 (4.5-13.4)
<b>Household Income</b>			
<\$25,000	32.4 (18.0-46.8)	45.7 (31.2-60.3)	LNE
\$25,000-\$49,999	42.5 (30.7-54.4)	54.9 (43.7-66.0)	LNE
\$50,000+	40.2 (30.9-49.5)	57.9 (48.2-67.6)	9.8 (4.4-15.1)

<sup>†</sup>Insurance also includes Medicare, Medicaid, and other types of state health programs

check-ups after completing treatment for cancer. Only 38.9% of cancer survivors reported receipt of a written cancer treatment summary. Non-significant differences by age group were found; those 65 and older were less likely to receive a written cancer treatment summary and written summary of routine cancer check-ups than cancer survivors ages 18-65. No differences between males and females were noted for receipt of a written summary of routine cancer check-ups; however, a lower rate was reported for receipt of a written cancer treatment summary among male cancer survivors compared to female cancer survivors (33.5% vs. 42.9%). While not significant, receipt of both a written cancer treatment summary and written summary of routine cancer check-ups was higher among those with a household income above \$25,000.

Cancer survivors were also asked if they were ever denied health insurance or life insurance coverage because of their cancer, with 8.9% of cancer survivors reporting being denied coverage. Rates were significantly higher among cancer survivors ages 18-64 vs. 65 and older (p=0.02).

### Conclusions:

Based on the findings from this report, survivorship care plans were being provided at a rate exceeding the Commission on Cancer standards for 2016.<sup>4</sup> However, given the importance of ensuring coordinated care for cancer survivors, cancer treatment centers should continue to expand service provision to include all eligible survivors. The SD Survivorship Program continues to work with cancer treatment centers in South Dakota to support the provision of survivorship care plans as well as evaluate effectiveness. The findings in this report should be used to improve cancer survivorship services in SD.

### References:

1. American Cancer Society. (2016). *Cancer Treatment & Survivorship Facts & Figures 2016-2017*. Retrieved from <https://www.cancer.org/research/cancer-facts-statistics/survivor-facts-figures.html>
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3. Institute of Medicine and National Research Council. (2006). *From Cancer Patient to Cancer Survivor: Lost in Transition*. Washington, DC: The National Academies Press. <https://doi.org/10.17226/11468>
4. American College of Surgeons: COC Standards and NAPBC Standards retrieved from <https://www.facs.org/quality-programs/>