

# Indiana Cancer Control Plan, 2018-2020

## Data Compendium

Developed by the Indiana Cancer Consortium and funded by Centers for Disease Control and Prevention, the *Indiana Cancer Control Plan 2018-2020 (ICCP 2018-2020)* is a comprehensive roadmap for actions that will guide cancer control efforts and promote collaboration between organizations and the citizens of Indiana. The plan consists of four primary focus areas: primary prevention, early detection, treatment, and survivorship. Each section has an overarching goal with supporting objectives and strategies, which adhere to evidence-based interventions and scientific studies.

Progress toward the objectives outlined in the *ICCP 2018-2020* will be monitored via a set of primary and secondary measures. While not included in the *ICCP 2018-2020*, the secondary measures provide relevant information and will also be tracked. The secondary measures are indicated as such in the document below. The document also includes the baseline numbers and years for each measure, and will be updated regularly to include recent data points for each measure.

The primary and secondary measures used to monitor progress toward the objectives outlined in the *ICCP 2018-2020* come from the following sources:

### **Cancer Program Practice Profile Reports (CP<sup>3</sup>R)**

*National Cancer Database, Commission on Cancer, American College of Surgeons*

The Web-based CP<sup>3</sup>R offer local providers comparative information to assess adherence to and consideration of standard of care therapies for major cancers. This reporting tool provides a platform from which to promote continuous practice improvement to improve quality of patient care at the local level and also permits hospitals to compare their patient care relative to that of other providers. The aim is to empower clinicians, administrators, and other staff to work cooperatively and collaboratively to identify problems in practice and delivery, and to implement best practices that will diminish disparities in care across Commission on Cancer (CoC)-accredited cancer programs. CP<sup>3</sup>R currently report 23 quality measures covering nine primary sites.

### **Behavioral Risk Factor Surveillance System (BRFSS)**

*Centers for Disease Control and Prevention, US Department and Health & Human Services*

BRFSS is the nation's premier system of health-related telephone surveys that collect state data about US residents regarding their health-related risk behaviors, chronic health conditions, and use of preventive services. BRFSS collects data in all 50 states, the District of Columbia, and three US territories. BRFSS completes more than 400,000 adult interviews each year, making it the largest continuously conducted health survey system in

the world. Raw response data are weighted to known proportions of age, race/ethnicity, sex, and geographic region to more accurately represent the statewide population. In the state of Indiana, approximately 4,500-10,000 adults are surveyed annually.

### **Indiana Youth Tobacco Survey (IYTS)**

*Tobacco Prevention and Cessation Commission, Indiana State Department of Health*

The IYTS is the most comprehensive, statewide representative source of tobacco-related behaviors and the only source of such data for middle school students (grades 6-8) in Indiana. The IYTS uses a standard set of questions and procedures developed by the Centers for Disease Control and Prevention (CDC) for surveys on adolescent tobacco use. The IYTS has previously consisted of 75-100 questions covering prevalence, demographics, smoking initiation and cessation, secondhand smoke exposure, tobacco access and purchasing, attitudes and beliefs, and family and social influences. Results from the IYTS can therefore be compared to results from other states as well as the National Youth Tobacco Survey. The Tobacco Prevention and Cessation Commission conducts the YTS throughout the state for grades 6-12. The samples are divided between middle school (grades 6-8) and high school (grades 9-12). Indiana has conducted the IYTS in 2000, 2002, 2004, 2006, 2008, 2010, 2012, 2014, and 2016.

### **National Immunization Survey**

*National Center for Immunization and Respiratory Diseases (NCIRD), Centers for Disease Control and Prevention, US Department and Health & Human Services*

The National Immunization Surveys provide current, household, population-based, state and local area estimates of vaccination coverage among children and teens using a standard survey methodology. The surveys collect data through telephone interviews with parents or guardians in all 50 states, the District of Columbia, and some US territories. Landline and cell phone numbers are randomly selected and called. Individuals are asked to enroll one or more age-eligible children or teens from the household. The parents and guardians of eligible children are asked during the interview for the names of their children's vaccination providers and permission to contact them. With this permission, a questionnaire is mailed to each child's vaccination provider(s) to collect the information on the types of vaccinations, number of doses, dates of administration, and other administrative data about the health care facility. Estimates of vaccination coverage are determined for child and teen vaccinations recommended by the Advisory Committee on Immunization Practices (ACIP), and children and teens are classified as being up-to-date based on the ACIP recommended numbers of doses for each vaccine.

### **National Immunization Survey-Teen (NIS-Teen)**

*National Center for Immunization and Respiratory Diseases (NCIRD), Centers for Disease Control and Prevention, US Department and Health & Human Services*

Launched in 2006 as a supplement to the NIS, the NIS-Teen monitors vaccination coverage among teens (aged 13-17) at the national, state, selected local levels, and some in US

territories. The NIS-Teen includes coverage of the following routine adolescent vaccines tetanus, diphtheria, acellular pertussis (Tdap), meningococcal conjugate (MenACWY), human papillomavirus (HPV), influenza vaccine (Flu).

### **National Survey of Children's Health (NSCH)**

*Maternal and Child Health Bureau, Health Resources and Services Administration in partnership with National Center for Health Statistics, Centers for Disease Control and Prevention, US Department and Health & Human Services*

The National Survey of Children's Health (NSCH) was conducted three times between 2003 and 2012 and annually as of 2016/2017. It provides rich data on multiple, intersecting aspects of children's lives—including physical and mental health; access to quality health care; and the child's family, neighborhood, school, and social context. The NSCH was conducted using telephone methodology and including a sample size of 91,000-102,000 non-institutionalized children aged 0-17 nationally, including 1,800-2,200 respondents per state.

### **Youth Risk Behavior Surveillance System (YRBSS)**

*Centers for Disease Control and Prevention, US Department and Health & Human Services*

The YRBSS biennial survey of youth was developed in 1990 to monitor priority health risk behaviors that contribute markedly to the leading causes of death, disability, and social problems among youth and adults in the US. The YRBSS monitors the prevalence of obesity, asthma, and other priority health-related behaviors, in addition to sexual identity and sex of sexual contacts. From 1991 through 2015, the YRBSS has collected data from more than 3.8 million high school students nationally. Indiana-specific data are not available for some years of the YRBSS due to a sample size that is too small to weight accurately.

In addition to these publically available data, *ICCP 2018-2020* includes radon-related measures provided directly by Indiana State Department of Health Environmental Health Division. Finally, there are several objectives for which measures are still under development.

## GOAL AREA: Primary Prevention

### Objective 1: Increase percentage of Hoosiers at a healthful weight

**Adults who are at a healthy weight** is the percentage of adults aged 18 and over who have a body mass index (BMI) between 18.5 and 24.9.

**Baseline: 31.0% (2016)      Target: 35.3%**

*Source: Behavioral Risk Factor Surveillance System*

**Youth who are normal weight** is the percentage of youth aged 10 to 17 who have a BMI in the 5th to 84th percentile for their age and gender.

**Baseline: 60.3% (2016)      Target: 70.4%**

*Source: National Survey of Children's Health*

*[Secondary Measure]* **Adults who are overweight** is the percentage of adults aged 18 and over who have a BMI between 25.0 and 29.9.

**Baseline: 34.7% (2016)      Target: 32.1%**

*Source: Behavioral Risk Factor Surveillance System*

*[Secondary Measure]* **Adults who are obese** is the percentage of adults aged 18 and over who have a BMI between 30.0 and 99.8.

**Baseline: 32.5% (2016)      Target: 28.4%**

*Source: Behavioral Risk Factor Surveillance System*

*[Secondary Measure]* **Youth who are overweight or obese** is the percentage of youth aged 10 to 17 with a BMI in the 85th percentile or greater for their age and gender. Youth who are overweight is defined as BMI in 85th to 95th percentile for age and gender, while youth who are obese is BMI greater than the 95th percentile for age and gender.

**Baseline: 33.9% (2016)      Target: 25.0%**

*Source: National Survey of Children's Health*

### Objective 2: Reduce percentage of Hoosiers who use tobacco

**Adults who are current smokers** is the percentage of adults aged 18 and over who smoked cigarettes every day or some days.

**Baseline: 21.1% (2016)      Target: 18.0%**

*Source: Behavioral Risk Factor Surveillance System*

**Adults who currently use smokeless tobacco** is the percentage of adults aged 18 and over who used smokeless tobacco every day or some days. Smokeless tobacco refers to chewing tobacco, snuff, or snus.

**Baseline: 4.1% (2016)      Target: 1.7%**

*Source: Behavioral Risk Factor Surveillance System*

**Adults who currently use e-cigarettes** is the percentage of adults aged 18 and over who used e-cigarettes or other electronic “vaping” products every day or some days.

**Baseline: 4.7% (2016) Target: 3.0%**

*Source: Behavioral Risk Factor Surveillance System*

**High school youth who are current smokers** is the percentage of high school students who smoked cigarettes on one or more of the past 30 days.

**Baseline: 8.7% (2016) Target: 5.0%**

*Source: Indiana Youth Tobacco Survey*

**High school youth who use combustible tobacco products** is the percentage of high school students who used combustible tobacco products on one or more of the past 30 days. Combustible tobacco products include cigarettes, pipe, cigar/cigarillos/little cigars, hookah, and/or bidis. E-cigarettes are not included.

**Baseline: 14.4% (2016) Target: 10.0%**

*Source: Indiana Youth Tobacco Survey*

**High school youth who use non-combustible tobacco products** is the percentage of high school students who used non-combustible tobacco products on one or more of the past 30 days. Non-combustible tobacco products include smokeless tobacco, snus, and/or dissolvable tobacco. E-cigarettes are not included.

**Baseline: 6.4% (2016) Target: 3.5%**

*Source: Indiana Youth Tobacco Survey*

**High school youth who use e-cigarettes** is the percentage of high school students who used e-cigarettes or other electronic vapor products on one or more of the past 30 days.

**Baseline: 10.5% (2016) Target: 7.0%**

*Source: Indiana Youth Tobacco Survey*

*[Secondary Measure]* **Adults who currently use cigars, cigarillos, or little cigars** is the percentage of adults aged 18 and over who used these types of tobacco every day or on some days.

**Baseline: 5.6% (2016) Target: 3.0%**

*Source: Behavioral Risk Factor Surveillance System*

*[Secondary Measure]* **Middle school youth who are current smokers** is the percentage of middle school students who smoked cigarettes on one or more of the past 30 days.

**Baseline: 1.8% (2016) Target: 0.5%**

*Source: Indiana Youth Tobacco Survey*

*[Secondary Measure]* **Middle school youth who use combustible tobacco products** is the percentage of middle school students who used combustible tobacco products on one or more of the past 30 days. Combustible tobacco products include cigarettes, pipe, cigar/cigarillos/little cigars, hookah, and/or bidis. E-cigarettes are not included.

**Baseline: 3.0% (2016) Target: 2.0%**

*Source: Indiana Youth Tobacco Survey*

[Secondary Measure] **Middle school youth who use non-combustible tobacco products** is the percentage of middle school students who used non-combustible tobacco products on one or more of the past 30 days. Non-combustible tobacco products include smokeless tobacco, snus, and/or dissolvable tobacco. E-cigarettes are not included.

**Baseline: 1.5% (2016) Target: .5%**

*Source: Indiana Youth Tobacco Survey*

[Secondary Measure] **Middle school youth who use e-cigarettes** is the percentage of middle school students who used e-cigarettes or other electronic vapor products on one or more of the past 30 days.

**Baseline: 2.8% (2016) Target: 1.0%**

*Source: Indiana Youth Tobacco Survey*

### Objective 3: Reduce exposure to UV rays

**Adults who have had a red or painful sunburn that has lasted at least one day in the past 12 months** is the percentage of adults aged 18 and over who answered that they have had one or more when asked how many red or painful sunburn that has lasted at least one day in the previous 12 months.

**Baseline: TBD (2017) Target: TBD**

*Source: Behavioral Risk Factor Surveillance System*

**Adults who have not used an indoor tanning bed in the last 12 months** is the percentage of adults aged 18 and over who respond to the question about tanning bed use that they have not used an indoor tanning bed in the previous year.

**Baseline: TBD (2017) Target: TBD**

*Source: Behavioral Risk Factor Surveillance System*

**Youth who wear sunscreen always or most of the time** is defined as the percentage of high school students who responded ‘always’ or ‘most of the time’ to the question about how often they wear sunscreen with an SPF of 15 or higher when outside for more than an hour on a sunny day.

**Baseline: 8.4% (2015) Target: 11.2%**

*Source: Youth Risk Behavior Surveillance System*

### Objective 4: Increase completion rates for vaccines that have been shown to reduce cancer

**Female youth who have completed the HPV vaccination series** is defined as the percentage of females aged 13-17 who are up-to-date on their HPV series based on required number of doses for completion (two doses separated by five months [minus four days] for immunocompetent adolescents initiating the series before their 15<sup>th</sup> birthday and three doses for all others).

**Baseline: 43.5% (2016) Target: 80.0%**

*Source: National Immunization Survey-Teen*

**Male youth (13-17 years) who have completed the HPV vaccination series** is defined as the percentage of males aged 13-17 who are up-to-date on their HPV series based on required number of doses for completion (two doses separated by five months [minus four days] for immunocompetent adolescents initiating the series before their 15<sup>th</sup> birthday and three doses for all others).

**Baseline: 24.7% (2016) Target: 80.0%**

*Source: National Immunization Survey-Teen*

**Youth (19-35 months) who have completed the HepB vaccination series** is defined as the percentage of youth aged 19-35 months who have completed the three-dose Hepatitis B vaccination series.

**Baseline: 94.5% (2015) Target: 99.5%**

*Source: National Immunization Survey*

### Objective 5: Reduce radon exposure

**Homes tested for radon** is defined as the number of lab results analyzed for homes tested for radon using home testing kits.

**Baseline: 17,150 (2015) Target: 25,109**

*Source: Indiana State Department of Health Environmental Health Division*

**Homes that test above/equal to 4.0 pCi/l that get mitigation** is the percentage of homes that are tested for radon, test at or above the acceptable level of radon (4.0 pCi/L), and get mitigation through the state's Environmental Health Division.

**Baseline: 27.5% (2015) Target: 44.3%**

*Source: Indiana State Department of Health Environmental Health Division*

*[Secondary Measure]* **Homes that test above/equal to 4.0 pCi/l** is defined as the percentage of homes tested for radon that test at or above the acceptable level of radon (4.0 pCi/L).

**Baseline: 39.4% (2015) Target: 23.3%**

*Source: Indiana State Department of Health Environmental Health Division*

*[Secondary Measure]* **Homes that get mitigation that have less than 4.0 pCi/l at post-test** is defined as the percentage of homes tested for radon that initially test above acceptable levels (4.0 pCi/l), get mitigation through the state's Environmental Health Division, and then have levels below 4.0 pCi/L upon re-test after mitigation.

**Baseline: 35.3% (2015) Target: 56.9%**

*Source: Indiana State Department of Health Environmental Health Division*

## GOAL AREA: Early Detection

### Objective 1: Increase rates of evidence-based cancer screenings

**Females aged 50-74 years who have had a mammogram within the past two years** is the percentage of women aged 50-74, within the recommended age range for breast cancer screening (according to the US Preventive Services Task Force), who self-report that they have gotten a mammogram for breast cancer screening within the past two years, which is the recommended timeframe.

**Baseline: 72.5% (2016) Target: 81.1%**

*Source: Behavioral Risk Factor Surveillance System*

**Females aged 21-65 who have had a Pap test within the last three years** is the percentage of women aged 21-65, within the recommended age range for cervical cancer screening (according to the US Preventive Services Task Force), who self-report that they have gotten a Pap test for cervical cancer screening within the last three years, which is the recommended timeframe.

**Baseline: 74.9% (2016) Target: 93.0%**

*Source: Behavioral Risk Factor Surveillance System*

**Adults aged 50-75 who have had a colonoscopy, flexible sigmoidoscopy, or blood stool test within the appropriate time frame** is the percentage of all adults aged 50-75, within the recommended age range for colorectal cancer screening (according to the US Preventive Services Task Force), who self-report that they have gotten at least one of the following screening procedures: colonoscopy in the past ten years, flexible sigmoidoscopy in the past five years, or blood stool test in the past year. Percentage of age-appropriate adults who completed at least one screening within its recommended timeframe calculated by the Indiana State Department of Health (ISDH).

**Baseline: 64.6% (2016) Target: 80.0%**

*Source: Behavioral Risk Factor Surveillance System*

*[Secondary Measure]* **Females aged 40-74 years who have had a mammogram within the past two years** is the percentage of women aged 40-74, which is the full age range for which breast cancer screening is recommended for women across sources (including the American Cancer Society and National Comprehensive Cancer Network), who self-report that they have gotten a mammogram for breast cancer screening within the past two years, which is the recommended timeframe.

**Baseline: 68.4% (2016) Target: 80.3%**

*Source: Behavioral Risk Factor Surveillance System*

*[Secondary Measure]* **Adults aged 50-75 years who have ever had a sigmoidoscopy or colonoscopy** is the percentage of all adults aged 50-75, within the recommended age range for colorectal cancer screening (according to the US Preventive Services Task Force), who self-report that they have gotten either a sigmoidoscopy or colonoscopy in their lifetime.

**Baseline: 67.4% (2016) Target: 80.0%**

*Source: Behavioral Risk Factor Surveillance System*



*[Secondary Measure]* **Adults aged 50-75 who have had a blood stool test within the past two years** is the percentage of all adults aged 50-75, within the recommended age range for colorectal cancer screening (according to the US Preventive Services Task Force), who self-report that they have gotten a blood stool test within the previous two years.

**Baseline: 7.8% (2016)      Target: 10.4%**

*Source: Behavioral Risk Factor Surveillance System*

## GOAL AREA: Treatment

Objective 1: Decrease variation in cancer treatment by improving adherence to evidence-based standards of care

**Continuum of Care performance measures that exceed the average** is the percentage of the Commission on Cancer (CoC) performance measures for Indiana that exceed the average of all CoC approved programs. Calculation based on 14 measures included in CoC report.

**Baseline: 78.6% (2014)      Target: 100%**

*Source: Commission on Cancer, National Cancer Database, Cancer Program Practice Profile Reports*

Objective 2: Increase participation in clinical trials

**People who participated in a clinical trial as part of their cancer treatment** is the percentage of individuals responded 'Yes' when asked if they participated in a clinical trial as part of their cancer treatment out of the individuals who reported that they have had cancer.

**Baseline: 6.2% (2016)      Target: 10.0%**

*Source: Behavioral Risk Factor Surveillance System*

Objective 3: Increase the number of updated advance care planning documents for all cancer patients

*(Developmental)*

## GOAL AREA: Survivorship

### Objective 1: Increase the delivery of comprehensive, individualized survivorship care plans

**Cancer survivors who have ever received a written summary of all the cancer treatments and written instructions on where to return for check-ups after completing treatment from any doctor, nurse, or other health professional** is the percentage of individuals who reported that they have had cancer and responded ‘Yes’ to three questions related to survivorship care plans: ‘Yes’ when asked if a doctor, nurse, or other health professional ever gave them a written summary of all the cancer treatments they received; ‘Yes’ when asked if they ever received instructions from a doctor nurse, or other health professional about where they should return or whom they should see for routine cancer check-ups after completing their cancer treatment; and ‘Yes’ when asked if the instructions they said they received were written down or printed on paper for them. Composite analysis completed by the ISDH.

**Baseline: 64.1% (2016) Target: 75.0%**

*Source: Behavioral Risk Factor Surveillance System*

*[Secondary Measure]* **Cancer survivors who have ever received a written summary of all the cancer treatments from any doctor, nurse, or other health professional** is the percentage of individuals who reported that they have had cancer and responded ‘Yes’ when asked if a doctor, nurse, or other health professional ever gave them a written summary of all the cancer treatments they received.

**Baseline: 89.4% (2016) Target: 95.4%**

*Source: Behavioral Risk Factor Surveillance System*

*[Secondary Measure]* **Cancer survivors who have ever received written instructions on where to return or who to see for routine cancer check-ups after completing cancer treatment from a doctor, nurse, or other health professional** is the percentage of individuals who reported that they have had cancer and responded ‘Yes’ when asked if they ever received instructions from a doctor nurse, or other health professional about where they should return or whom they should see for routine cancer check-ups after completing their cancer treatment and ‘Yes’ when asked if the instructions they said they received were written down or printed on paper for them. Composite analysis completed by the ISDH.

**Baseline: 78.4% (2016) Target: 88.3%**

*Source: Behavioral Risk Factor Surveillance System*

### Objective 2: Decrease the number of reported unhealthy days among cancer survivors

**Survivors who had the same or fewer poor mental health days over the past 30 days as people without cancer** is the percentage of adults aged 18 and over who reporting having had any type of cancer, excluding skin cancer, who reported having the same or fewer number of poor mental health days in the previous 30 days as the average number of poor mental health days reported by adults without cancer. Individuals with skin cancer are excluded from the analysis of cancer survivors due to issues related to melanoma and non-melanoma types of skin cancer. Analysis completed by the Indiana State Department of Health.

**Baseline: 76.4% (2016) Target: 82.6%**

*Source: Behavioral Risk Factor Surveillance System*

**Survivors who had the same or fewer poor physical health days over the past 30 days as people without cancer** is the percentage of adults aged 18 and over who reporting having had any type of cancer, excluding skin cancer, who reported having the same or fewer number of poor physical health days in the previous 30 days as the average number of poor physical health days reported by adults without cancer. Individuals with skin cancer are excluded from the analysis of cancer survivors due to issues related to melanoma and non-melanoma types of skin cancer. Analysis completed by the ISDH.

**Baseline: 67.1% (2016) Target: 72.0%**

*Source: Behavioral Risk Factor Surveillance System*

### Objective 3: Improve healthy lifestyle behaviors of cancer survivors

**Survivors who are at a healthy weight** is the percentage of adults aged 18 and over who reported having had any type of cancer, excluding skin cancer, who have a Body Mass Index between 18.5 and 24.9. Individuals with skin cancer are excluded from the analysis of cancer survivors due to issues related to melanoma and non-melanoma types of skin cancer. Analysis completed by the ISDH.

**Baseline: 28.0 % (2016) Target: 37.6%**

*Source: Behavioral Risk Factor Surveillance System*

**Survivors who currently use cigarettes** is the percentage of adults aged 18 and over who reported having had any type of cancer, excluding skin cancer, whose current use of cigarettes is every day or some days. Individuals with skin cancer are excluded from the analysis of cancer survivors due to issues related to melanoma and non-melanoma types of skin cancer. Analysis completed by the ISDH.

**Baseline: 21.3% (2016) Target: 10.1%**

*Source: Behavioral Risk Factor Surveillance System*

*[Secondary Measure]* **Survivors who are overweight** is the percentage of adults aged 18 and over who reported having had any type of cancer, excluding skin cancer, who have a Body Mass Index between 25.0 and 29.9. Individuals with skin cancer are excluded from the analysis of cancer survivors due to issues related to melanoma and non-melanoma types of skin cancer. Analysis completed by the ISDH.

**Baseline: 35.4% (2016) Target: 27.0%**

*Source: Behavioral Risk Factor Surveillance System*

*[Secondary Measure]* **Survivors who are obese** is the percentage of adults aged 18 and over who are cancer survivors and have a Body Mass Index between 30.0 and 99.8. Individuals with skin cancer are excluded from the analysis of cancer survivors due to issues related to melanoma and non-melanoma types of skin cancer. Analysis completed by the ISDH.

**Baseline: 34.8% (2016) Target: 26.0%**

*Source: Behavioral Risk Factor Surveillance System*