Closing Gaps in Cancer Prevention and Early Detection
Impact of the COVID-19 Pandemic

<table>
<thead>
<tr>
<th>Total Cases</th>
<th>Cases in Last 7 Days</th>
<th>Total Deaths</th>
</tr>
</thead>
<tbody>
<tr>
<td>94,973,074</td>
<td>471,806</td>
<td>1,044,461</td>
</tr>
</tbody>
</table>

Source: CDC, [COVID Data Tracker](https://covid.cdc.gov/covid-data-tracker/#)
A New Normal

A closer look
Cancer death rates dropped 27% from 2001 to 2020.

cdc.gov/cancer

Source: CDC, An Update on Cancer Deaths in the United States
Despite Progress, Disparities Persist

<table>
<thead>
<tr>
<th><strong>racial and ethnic minority groups;</strong></th>
<th><strong>individuals of different ancestry;</strong></th>
<th><strong>individuals of low socioeconomic status;</strong></th>
<th><strong>individuals with disabilities;</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image1" alt="Racial and Ethnic Minority" /></td>
<td><img src="image2" alt="Individuals of Different Ancestry" /></td>
<td><img src="image3" alt="Individuals of Low Socioeconomic Status" /></td>
<td><img src="image4" alt="Individuals with Disabilities" /></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>individuals who lack or have limited health insurance coverage;</strong></th>
<th><strong>residents in certain geographic locations, including rural areas;</strong></th>
<th><strong>members of the lesbian, gay, bisexual, and transgender community;</strong></th>
<th><strong>immigrants;</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image5" alt="Limited Health Insurance" /></td>
<td><img src="image6" alt="Residents in Certain Geographic Locations" /></td>
<td><img src="image7" alt="Members of LGBQT" /></td>
<td><img src="image8" alt="Immigrants" /></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th><strong>refugees or asylum seekers;</strong></th>
<th><strong>adolescents and young adults; and the elderly.</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td><img src="image9" alt="Refugees or Asylum Seekers" /></td>
<td><img src="image10" alt="Adolescents and Young Adults and the Elderly" /></td>
</tr>
</tbody>
</table>

Source: American Association for Cancer Research, Cancer Disparities Progress Report 2020
Health Consequences of COVID-19

Health Behaviors of U.S. Adults Since the Pandemic

42% gained weight with an average gain of 29 lbs.

35% Sleeping less

23% Drinking more alcohol to cope

48% experiencing greater levels of stress

Challenges with Adolescent HPV Vaccination During Pandemic

Recollection to EBI implementation and use needed to promote HPV vaccination

• Structural barriers

• Patient/parental fears of coming into the clinic

• Logistical challenges

• Shift in priorities

“HPV Probably Not at the Top of Our List”


Human Papillomavirus (HPV) Vaccination During the Pandemic

- HPV vaccination increasing but still below other routinely recommended vaccines
- Disparities in HPV vaccination coverage by Metropolitan Statistical Area (MSA)

**Teens Up to Date with HPV Vaccination**

<table>
<thead>
<tr>
<th></th>
<th>2019</th>
<th>2020</th>
</tr>
</thead>
<tbody>
<tr>
<td>%</td>
<td></td>
<td></td>
</tr>
<tr>
<td>54.2%</td>
<td>58.6%</td>
<td></td>
</tr>
</tbody>
</table>

*Estimated vaccination uptake* with ≥1 HPV vaccine dose among teens ages 13–17 years who had not received a dose of HPV vaccine as of March 1st, United States, 2019 and 2020

Primary Care Provider Shortage Areas

Primary Care Shortage Areas by County, 2019

Primary Care Shortage Areas by County, 2022

Rural health Information Hub, Data Visualization
Public Health System Partners
Strategies for Improving Cancer Screening
# The Cancer Control Continuum

## Cancer Control Continuum

### Prevention
- Tobacco Control
- Diet
- Physical Activity
- Sun Protection
- Vaccination
- Alcohol Use

### Early Detection
- Pap test
- Mammography
- Stool tests
- Colonoscopy
- Sigmoidoscopy
- Low-dose CT

### Diagnosis
- Staging
- Informed Decision making

### Treatment
- Chemotherapy
- Radiation
- Surgery
- Adjuvant therapy
- Symptom Mgt.
- Psychosocial care

### Survivorship
- Coping
- Health promotion
- Late effects
- Long-term follow-up/surveillance

### End-of-Life
- Hospice
- Palliation
- Spirituality

## Cross-Cutting Issues
health equity, quality of care, communications, decision making
Screening for Common Cancers Still Recovering

January 2021-October 2021

2.7% Breast Cancer Screening = 68,000 missed

3.4% Colorectal Cancer Screening = 27,000 missed

10% Cervical Cancer Screening = 9,000 missed

Source: Epic Research; Troubling Cancer Screening Rates Still Seen Nearly Two Years Into the Pandemic
National Breast and Cervical Cancer Early Detection Program (NBCCEDP) Monthly screening tests Decline During Pandemic

January–June 2020 Compared to the 5-Year Average in 2015–2019

Blue line represents screening tests conducted in 2020; grey line represents average screening tests conducted over the 5-year period, 2015-2019.

Source: MDE data submission, October 2020
Cancer Screening is More than a Test

Screening → Prompt Follow-Up → Referral → Diagnosis → Treatment

Navigation

Quality Assurance
National Breast & Cervical Early Detection Program (NBCCEDP)

30 Years of outreach, education, screening and diagnostic services

• Serves low-income, uninsured or under-insured women

• Provides screening and diagnostic services

• Focuses on women geographically or culturally isolated or of racial/ethnic minorities

• Supports evidence-based strategies to increase screening

Source: CDC, National Breast and Cervical Early Detection Program
National Breast and Cervical Cancer Early Detection Program Since Inception

• >30 years of service
• 6.0 million women served
• 15.6 million breast and cervical cancer screening examinations provided
• Diagnosed 5,066 invasive cervical cancers and 232,428 premalignant cervical lesions, of which 39% were high-grade.

Source: October 2021 Minimum Data Elements submission
NBCCEDP Reach, 2016-2020

70 awardees
System-level interventions

1,144,319 Women Served

13,370 diagnosed breast cancers
610 diagnosed cervical cancers
9,816 Cervical high-grade precancerous lesions

Source: October 2021 Minimum Data Elements
Program Success Amid Pandemic – Indiana

Screening Reminders Help Indiana Clinic Save Lives from Cervical Cancer

Rate of New Cervical Cancers in Indiana, all ages, Races, ethnicities, 2015-2019

This project has changed the way I practice
April Fife, Nurse Practitioner

Cervical Cancer Screening Rates increased 34%
from 65% to 87%


Source: (Story) CDC, Screening Reminders Help Indiana Clinic Save a Life

Provider Reminder System
Staff reviewed medical records for all women with scheduled appointment who were due for cancer screening

Reducing Structural Barriers
Cancer screening integrated into routine care

Patient Reminders
Phone follow up to schedule appointments

Colorectal Cancer Screening in the United States

People aged 50-75 who fully met the USPSTF CRC screening recommendation increased 4.7% from 2014 to 2020.

<table>
<thead>
<tr>
<th>Year</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>2014</td>
<td>66.6%</td>
</tr>
<tr>
<td>2020</td>
<td>69.7%</td>
</tr>
</tbody>
</table>

Source: CDC, Use of Colorectal Cancer Screening Tests

Please note: In May 2021, the U.S. Preventive Services Task Force changed its colorectal cancer screening recommendation. The age at which adults at average risk of getting colorectal cancer were recommended to begin screening was lowered from 50 to 45. The data shown here do not include adults younger than age 50.
Adults Up-to-Date with Colorectal Cancer Screening

Source: CDC, Behavioral Risk Factor Surveillance System (BRFSS) Prevalence & Data Trends
Adults Never Screened for Colorectal Cancer

Colorectal Cancer Control Program (CRCCP) Model Tenets

Integrate public health and primary care

Focus on defined, high-need populations

Establish partnerships to support implementation

Implement sustainable health system changes

Use evidence-based strategies to maximize limited public health dollars

Encourage innovation in adaptation of EBIs

Use data for program improvement and performance management

Source: CDC, Colorectal Cancer Control Program (CRCCP)
Evidence-Based Interventions and Supporting Activities to Increase Cancer Screening

Evidence-based Interventions (EBIs)*

- Patient reminders
- Provider reminders
- Provider assessment and feedback
- Reducing structural barriers

Supporting Activities (SA)

- Small media
- Patient navigation
- Community health workers
- Provider education

CRCCP Grantee Reach, 2015-2020

- **264** Health systems
- **836** Clinics
- **6,397** Providers
- **1,302,806** Patients aged 50-75

Source: Clinic data submission, March 2021 (Includes all clinics recruited in DP15-1502, Program Years 1-5)
More evidence-based interventions translate into greater screening rate increases

# of Newly Implemented EBIs by the end of PY4

- 0: 7.9 percentage point increase
- 1: 11.9 percentage point increase
- 2: 10.4 percentage point increase
- 3: 16.0 percentage point increase
- 4: 26.8 percentage point increase

Source: CRCCP Clinic Data March 2020 data submission. PY1 Clinics only; Years 1-4.
Multiple analyses found several factors associated with greater CRC screening rates

Implemented 3-4 EBIs

Enhanced existing EBIs and implemented new EBIs

Clinics with lower baseline screening rates

CRC screening champions

Monthly Changes in New Cancer Diagnoses

Mailed FIT Implementation Guide

Addressing Workflow and Policy

Mailed FIT – Resources to Optimize Colorectal Cancer Screening

Mailedfit.org
Patient Navigation through Telehealth Nevada Success Story
Using Both Population-and Individual-Level Interventions

Project ECHO Telementoring + Patient Navigation

# Pilot Findings

<table>
<thead>
<tr>
<th>Project ECHO</th>
<th>Patient Navigation</th>
</tr>
</thead>
<tbody>
<tr>
<td>21 ECHO sessions were delivered.</td>
<td>16 patient navigators were trained to serve cancer survivors in rural areas.</td>
</tr>
<tr>
<td>79% of ECHO session participants said they intended to apply what they learned during the sessions.</td>
<td>164 survivors were helped by patient navigators.</td>
</tr>
<tr>
<td>240 participants attended ECHO sessions.</td>
<td></td>
</tr>
<tr>
<td>92% of participants said they learned something during the sessions.</td>
<td></td>
</tr>
</tbody>
</table>

Source: CDC, [Using Project ECHO and Patient Navigation to Improve the Health and Wellness of Cancer Survivors in Rural Communities](https://www.cdc.gov)
All Nevada counties are classified as rural

- Nevada has only 5 accredited Commission on Cancer facilities in the state.
- Nevada has an estimated 132,950 cancer survivors.
- The average distance between acute care hospitals in rural & frontier areas is 109 miles.
- Rural and frontier counties exhibit increased cancer incidence and mortality rates.

Source: Nevada Cancer Coalition
Project ECHO
Nevada Cancer Coalition

• **Purpose:** Increase capacity of rural primary care providers and community health workers to care for and support rural cancer survivors

• **Target audience:** Rural-based primary care providers and ancillary care workers; primarily in the northeastern Nevada area extending towards Utah.

• **ECHO Hub:** University of Nevada-Reno

• **Series:** 6 session series, occurring twice monthly from September – December 2020

Source: Nevada Cancer Coalition pilot data submission

<table>
<thead>
<tr>
<th>Month</th>
<th>Title</th>
</tr>
</thead>
<tbody>
<tr>
<td>September 2020</td>
<td>Program Orientation</td>
</tr>
<tr>
<td>October 2020</td>
<td>Addressing the Needs of Breast Cancer Survivors Post Mastectomy</td>
</tr>
<tr>
<td>October 2020</td>
<td>Solving the &quot;Unsolvable&quot; Problems Post Mastectomy: Treating Lymphedema and Radiation Damage</td>
</tr>
<tr>
<td>November 2020</td>
<td>Late and Long-Term Side Effects of Radiation Therapy</td>
</tr>
<tr>
<td>November 2020</td>
<td>Late and Long-Term Side Effects of Cancer and Cancer Medicine Related Treatments</td>
</tr>
<tr>
<td>December 2020</td>
<td>Rural-based Physical Therapy and the Management of Cancer Treatment Orthopedic Side Effects</td>
</tr>
</tbody>
</table>

Source: Nevada Cancer Coalition pilot data submission
Patient Navigation

Nevada Cancer Coalition

- **Purpose:** Improve quality of life for rural cancer survivors and their caregivers by increasing access to patient navigation services, support services, and resources

- **Target audience:** Adult cancer survivors and their caregivers residing in Nevada’s rural and frontier communities as well as health care providers serving rural survivors, rural primary care providers, and community health workers

- **Referral partner:** Cancer survivors, caregivers, and providers self-refer to the ThriveNV program

- **Recruitment:** Newsletters, promotional materials, and website referral forms

Source: Nevada Cancer Coalition pilot data submission
Other Resources
AMIGAS: Cervical Cancer Screening

Ayudando a las Mujeres con Información, Guía, y Amor para su Salud (Helping Women with Information, Guidance, and Love for their Health)

- Delivery by trained *promotoras* (community health workers)
- Designed in conjunction with community
- For use in low-resource locations and communities

Sources: CDC, Cervical Cancer, AMIGAS
Adapting AMIGAS for Black or African American Women

- Concentrates on reaching never/rarely screened women
- Developed in conjunction with national advisory group of experts
- Designed for delivery by community health workers

Rate of New Cancers By Race and Ethnicity, Both Sexes All Types of Cancer, United States, 2015-2019

Face Your Health

Source: CDC, Face Your Health
Improving Knowledge About Risk and Prevention

Creating Healthy Habits for Breast Cancer Recovery

Reducing Infection Risk During Chemo

Prostate Cancer Awareness for Screening and Treatment

Source: CDC, Cancer Simulations
Ending Cancer as We Know It

Cancer Moonshot Initiative 2.0

Goals:

• Reduce the death rate from cancer by 50% over the next 25 years

• Improve the experience of people and their families living with and surviving cancer.

• Call to action to jumpstart progress on cancer screenings that were missed as a result of the pandemic

Source: White House, Fact Sheet: President Biden Reignites Cancer Moonshot to End Cancer as We Know It
Thank you!

Go to the official federal source of cancer prevention information:
www.cdc.gov/cancer