

# The Impact of COVID-19 on Cancer Screenings

Michael Diaz, MD

Sept 17, 2021



# Basis for Discussion

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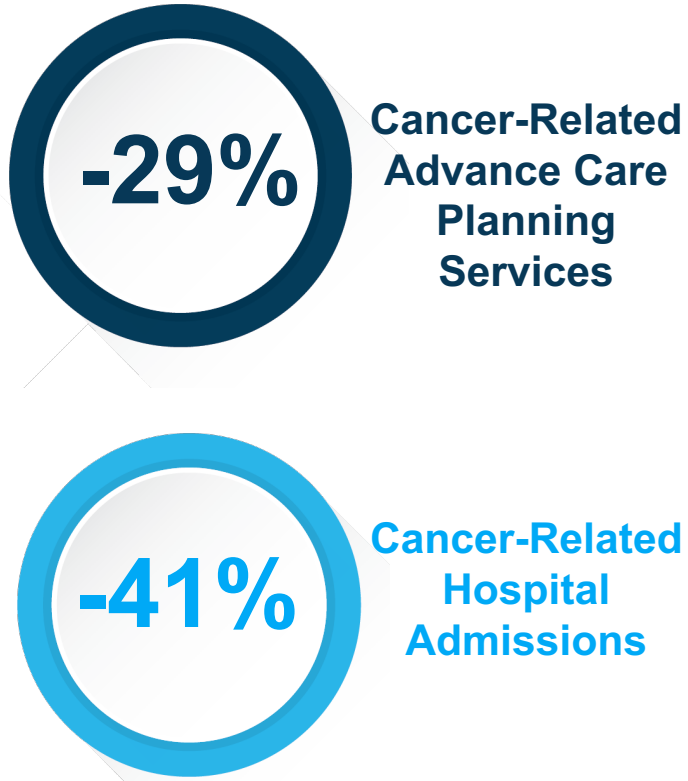
- JCO Clin Cancer Inform. 2020 Nov;4:1059-1071. doi: 10.1200/CCI.20.00134.
- **Impact of COVID-19 on Cancer Care: How the Pandemic Is Delaying Cancer Diagnosis and Treatment for American Seniors**
- [Debra Patt](#)<sup>1</sup>, [Lucio Gordan](#)<sup>2</sup>, [Michael Diaz](#)<sup>2</sup>, [Ted Okon](#)<sup>3</sup>, [Lance Grady](#)<sup>4</sup>, [Merrill Harmison](#)<sup>4</sup>, [Nathan Markward](#)<sup>4</sup>, [Milena Sullivan](#)<sup>4</sup>, [Jing Peng](#)<sup>4</sup>, [Anan Zhou](#)<sup>4</sup>

Focused experts on Cancer Screening

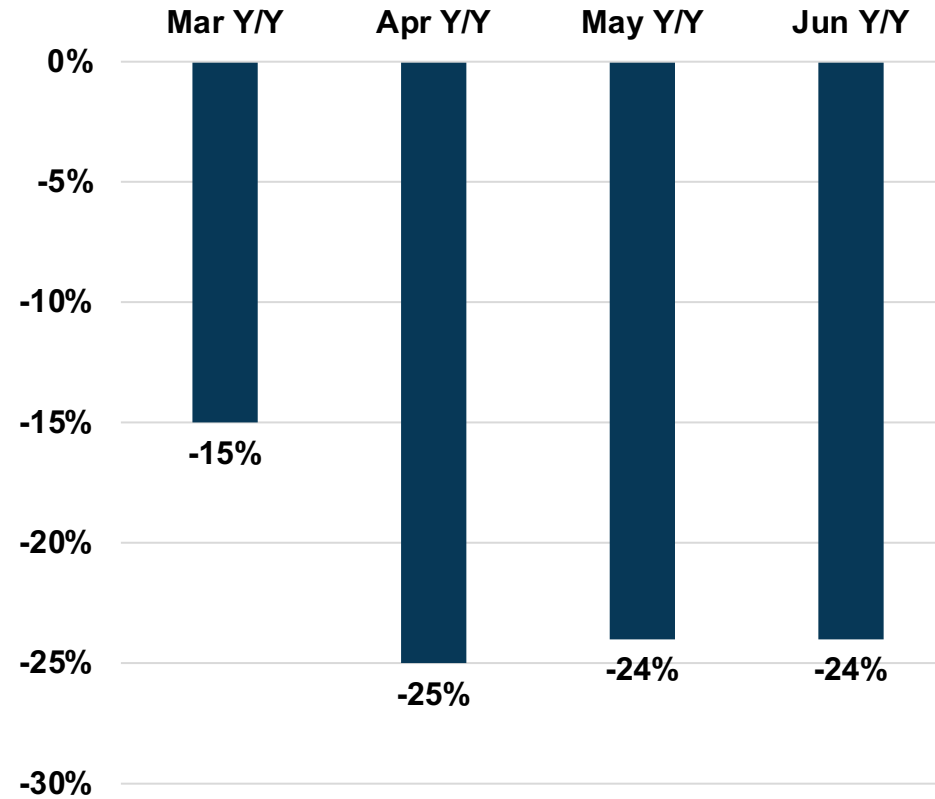
Focused Data/Result Updates since Initial Publication

# Onset of COVID-19 Caused Significant Disruption in Delivery of Cancer Care

Relative Change in Billing Frequencies  
(April '19 vs April '20)



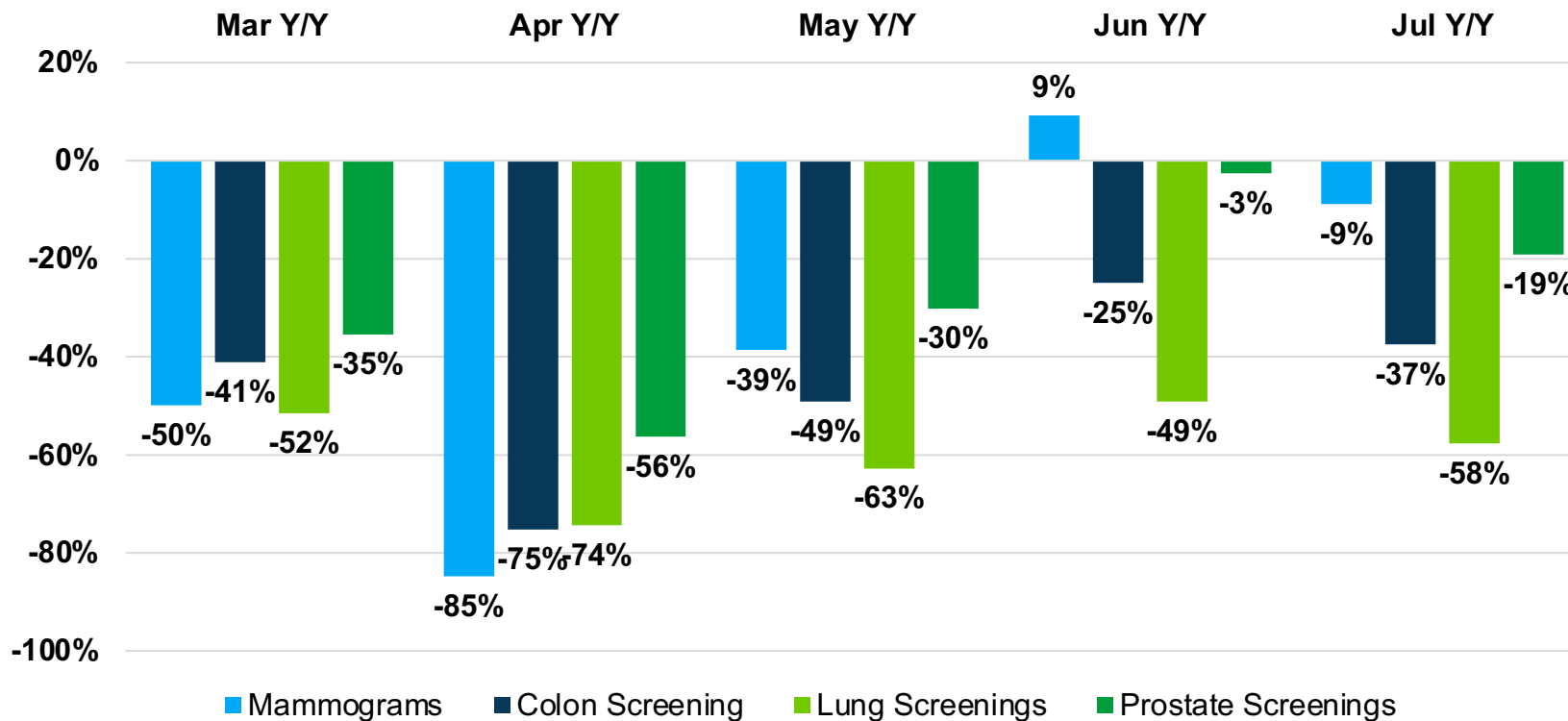
Relative Change in Billing Frequencies for the Top 23  
Physician-Administered Oncology Products  
(March-June 2019 vs. March-June 2020)



Source: Avalere Health analysis of Inovalon Provider Clearinghouse data  
Note: Claims on average represent 5-7% of Medicare FFS nationally

# Limitations on Delivery of Care Due to COVID-19 Have Resulted in Significant Reductions in Cancer Screenings

**Relative Change in Billing Frequencies for Select Cancer Screening Services**  
*(March-July 2019 vs. March-July 2020)*



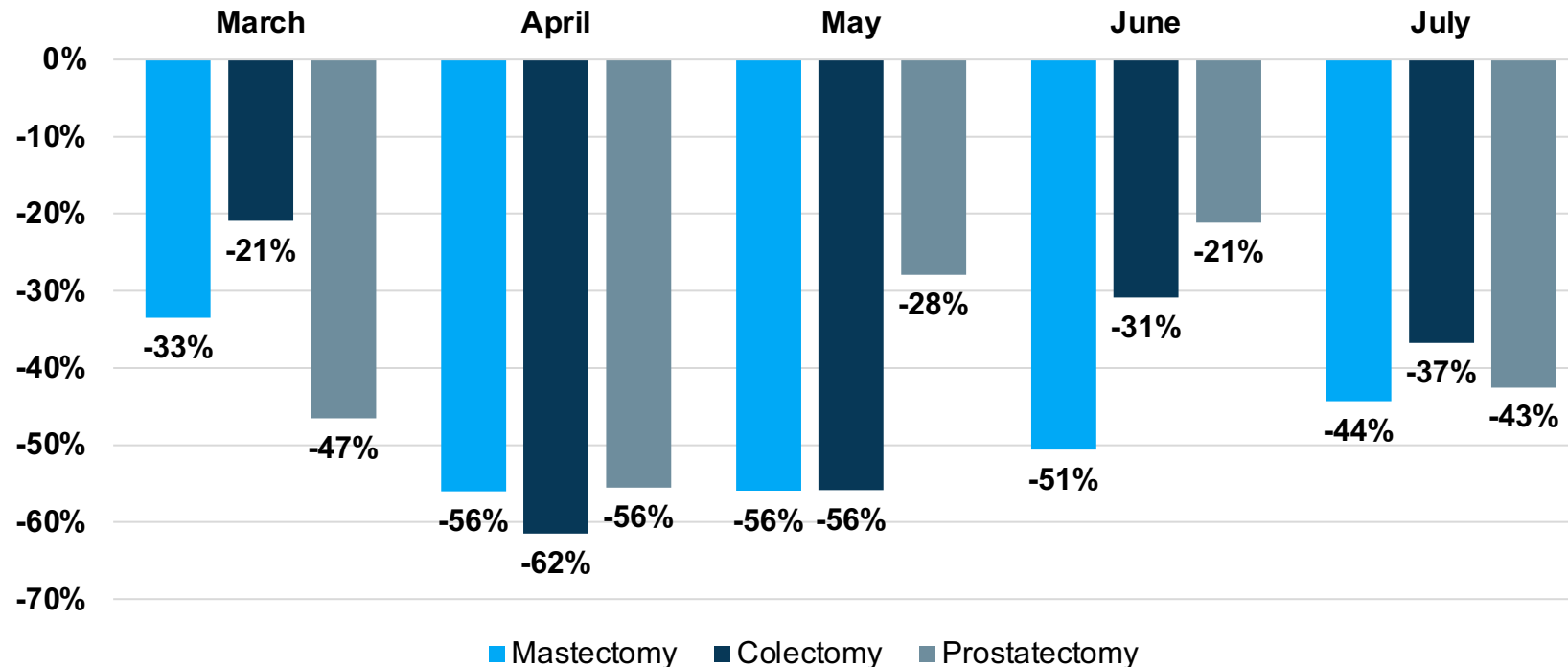
**Reduced cancer screenings due to COVID-19 could have long-term impacts on patient outcomes, as delays in diagnosis and care delivery could negatively influence disease progression and overall survival**

Source: Avalere Health and COA analysis of Inovalon Provider Clearinghouse data published [online](#) ahead of publication in the November issue of JCO Clinical Cancer Informatics  
 Note: Claims on average represent 5-7% of Medicare FFS nationally and include CMS-1450 claims from Institutional providers and CMS-1500 claims from Non-Institutional or Professional providers



# Changes in Cancer-Related Surgeries Reflect the Impact of COVID-19 on Cancer Treatment Pathways

**Relative Change in Billing Frequencies for Cancer-Related Surgeries**  
(March-July 2019 vs. March-July 2020)



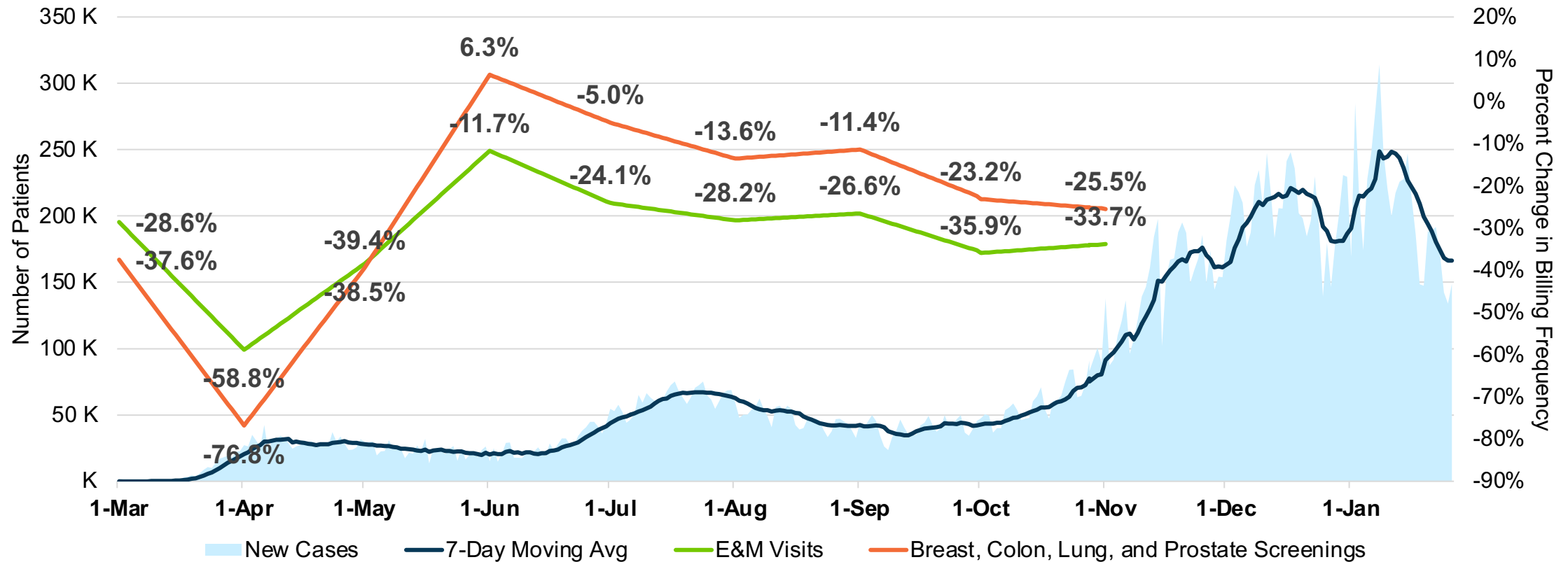
 **Decreases in cancer-related surgeries during the COVID-19 pandemic reflect adapted treatment guidelines allowing surgeries to be delayed, however, decreases in later months may also reflect the downstream impact of delayed or missed screenings**

Source: Avalere Health and COA analysis of Inovalon Provider Clearinghouse data published [online](#) ahead of publication in the November issue of JCO Clinical Cancer Informatics  
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# Decreases in Cancer Screenings and E&M Visits Mirror First and Second Waves of New COVID-19 Cases

## Daily Incidence and 7-Day Average of New COVID-19 Cases vs. Relative Change in Billing Frequencies for Cancer-Related E/M and Screening Services

(March-November 2020; March-November 2019 vs. March-November 2020)



Source: CDC COVID Data Tracker. Accessed 1/28/2020 [here](#).

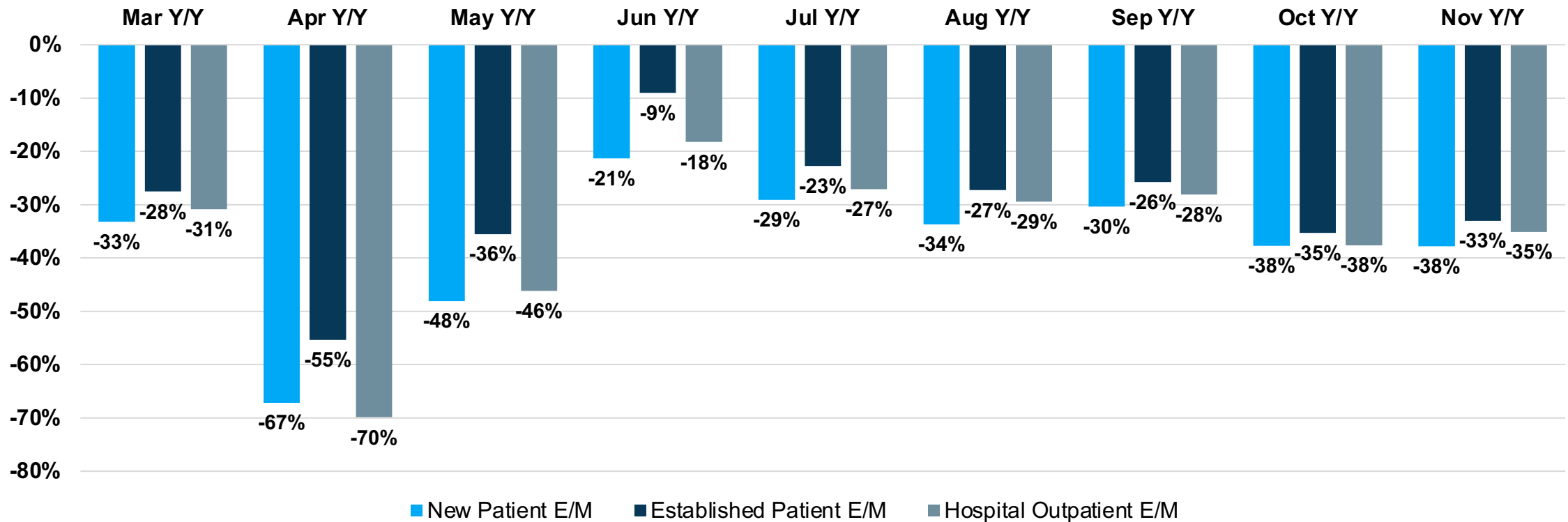
Avalere Health and COA analysis of Inovalon Provider Clearinghouse data published [online](#) ahead of publication in the November issue of JCO Clinical Cancer Informatics. Supported, in part, by Amgen, BMS, Daiichi-Sankyo, Eisai, Janssen, Genentech & Pfizer


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# Barriers to Care Caused by COVID-19 Complications Have Resulted in Significant Reductions in Patient Visits

## Relative Change in Billing Frequencies for Cancer-Related E/M Services

(March-November 2019 vs. March-November 2020)



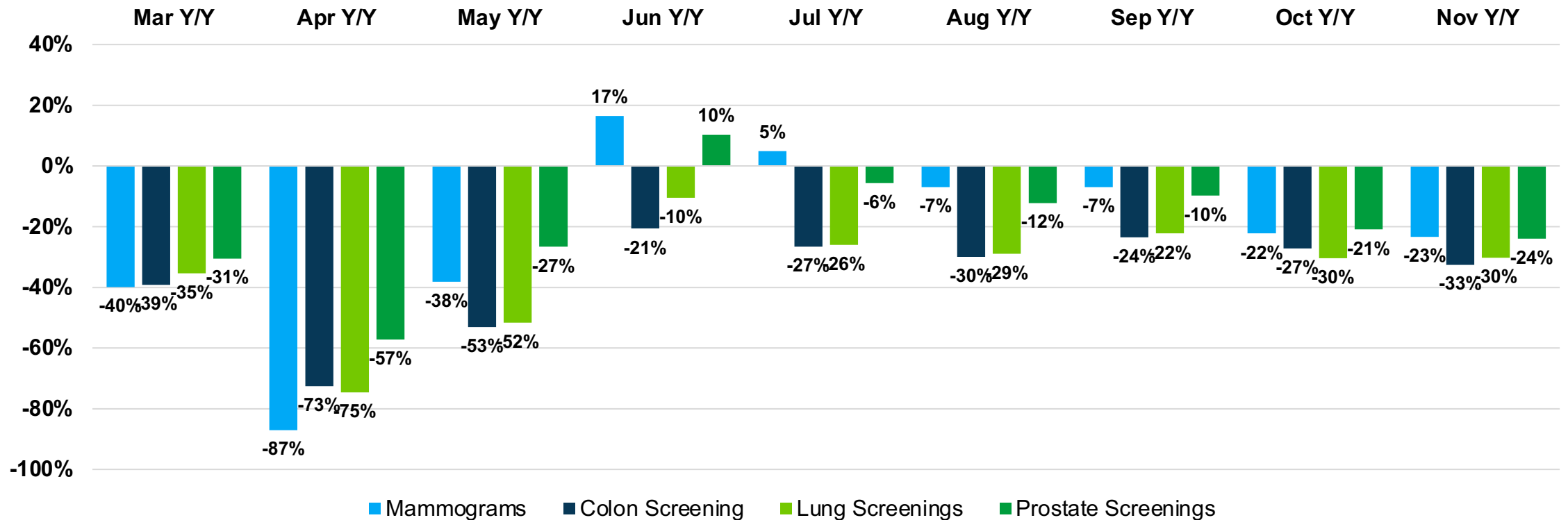
 The relative change in utilization was higher for new patient E/M than established patient E/M, which could reflect patient reluctance to visit providers due to COVID-19 concerns, as well as lowered rates of screening

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# Limitations on Delivery of Care Due to COVID-19 Have Resulted in Significant Reductions in Cancer Screenings

## Relative Change in Billing Frequencies for Select Cancer Screening Services

(March-November 2019 vs. March-November 2020)



**Reduced cancer screenings due to COVID-19 could have long-term impacts on patient outcomes, as delays in diagnosis and care delivery could negatively influence disease progression and overall survival**

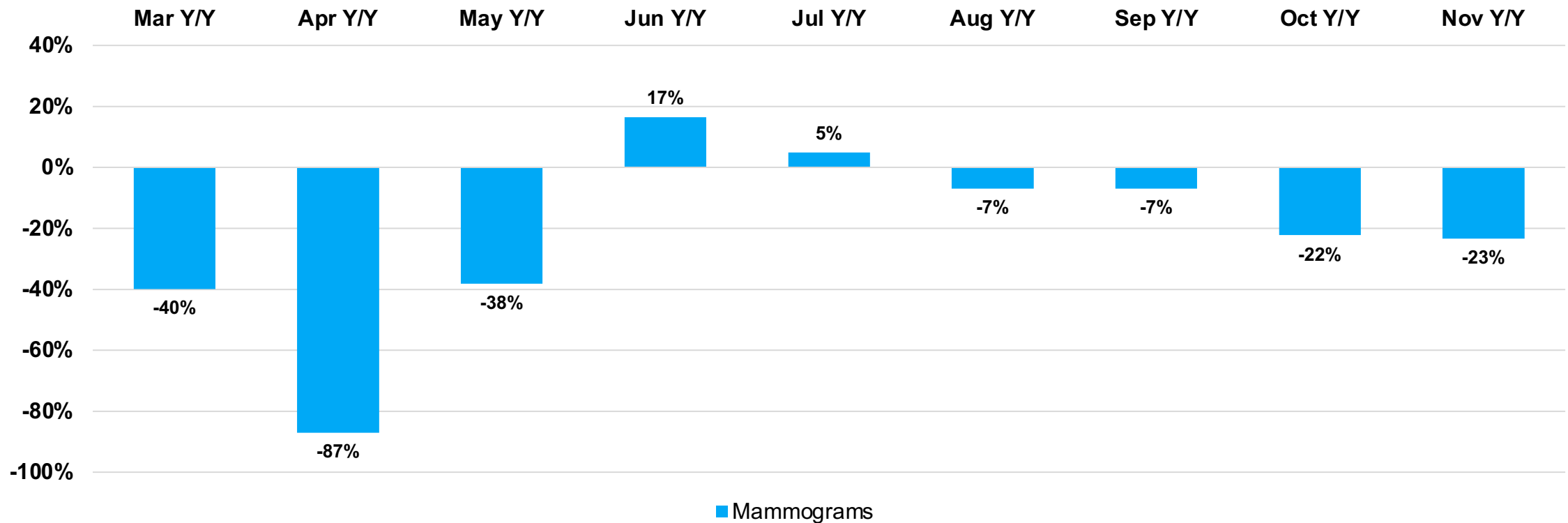
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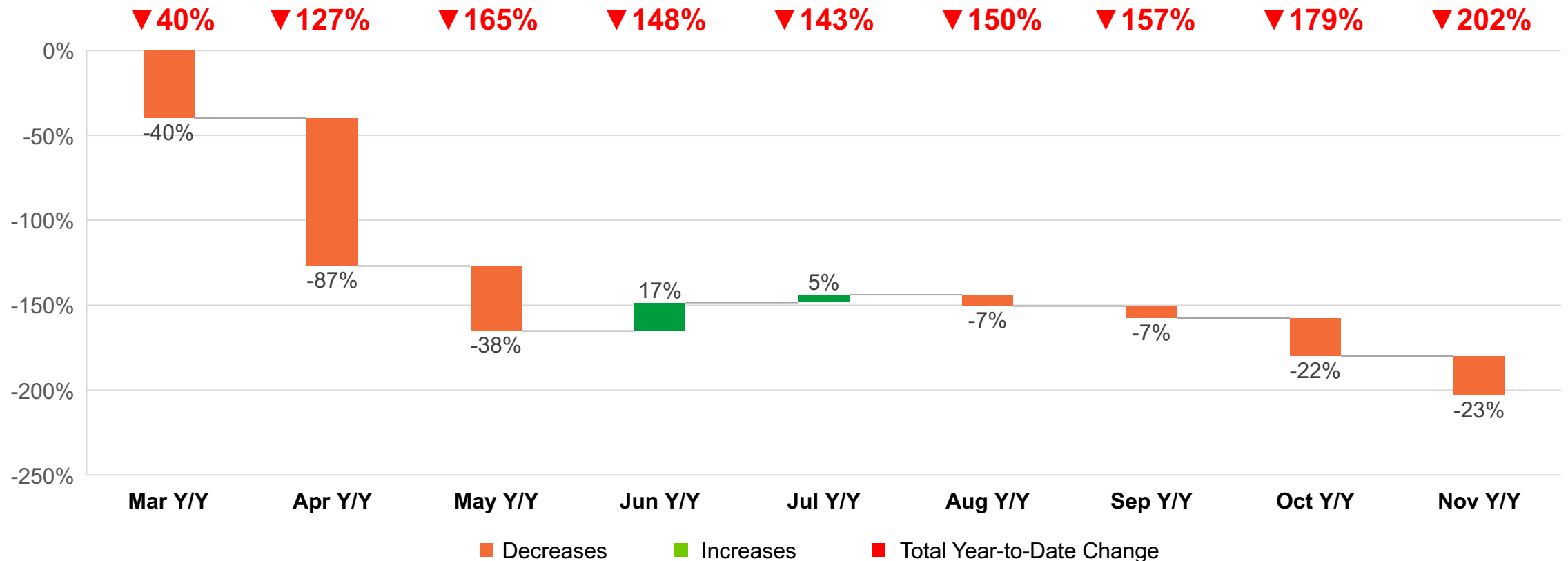
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# Utilization of Screenings Would Need to Significantly Exceed Prior Year Standards in Order to Make Up for Total Losses in 2020 Due to COVID-19

## Cumulative Gap in Billing Frequencies for Mammograms Relative to 2019

(March-November 2019 vs. March-November 2020)



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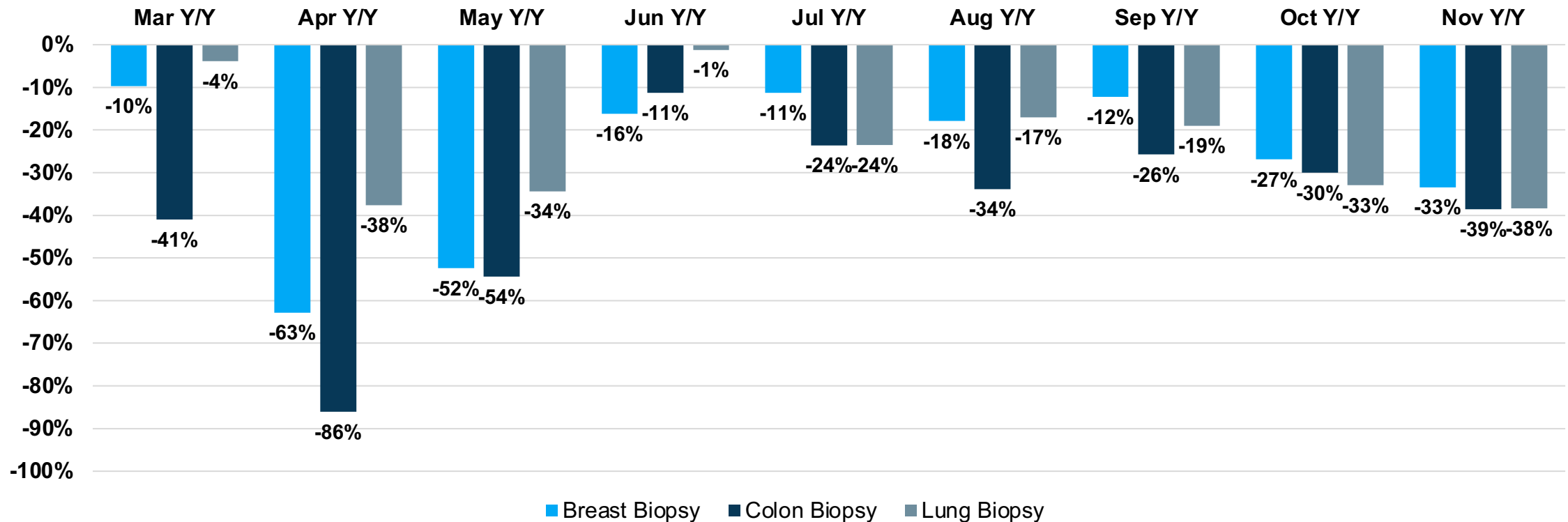
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# In Addition to Challenges to Care Delivery Caused by COVID-19, Reduced Screenings May Have a Long-Term Impact on Subsequent Treatment Delivery

## Relative Change in Billing Frequencies for Cancer-Related Biopsies

(March-November 2019 vs. March-November 2020)



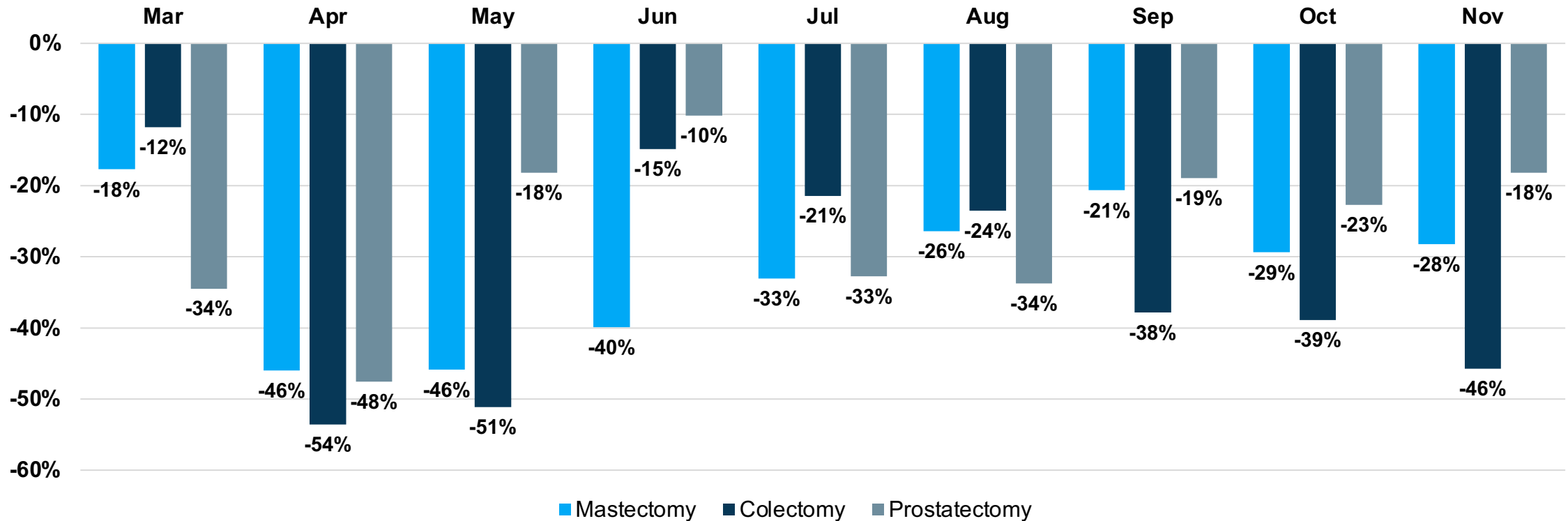
**Reductions in screenings may reduce the number of biopsies conducted in subsequent months, delaying patient diagnosis until the next scheduled cancer screening or until disease becomes symptomatic**

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# Changes in Cancer-Related Surgeries Reflect the Impact of COVID-19 on Cancer Treatment Decision-Making and Care Protocols

## Relative Change in Billing Frequencies for Cancer-Related Surgeries

(March-November 2019 vs. March-November 2020)

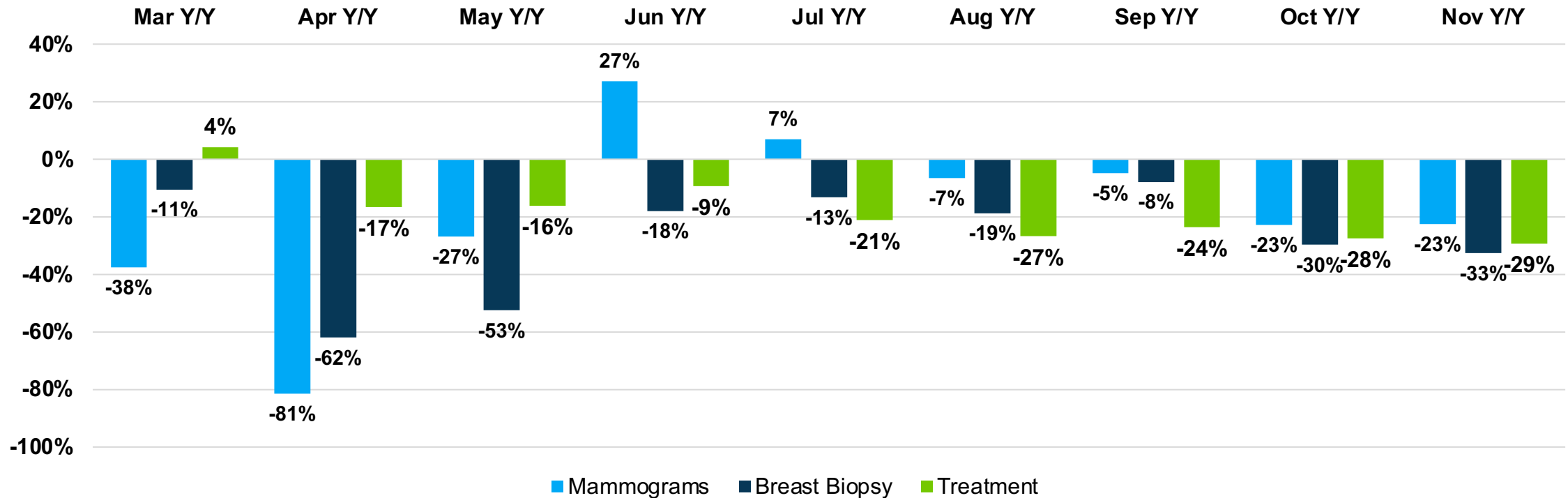


**Decreases in cancer-related surgeries during the COVID-19 pandemic reflect adapted treatment guidelines allowing surgeries to be delayed, however, decreases in later months may also reflect the downstream impact of delayed or missed screenings**

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# Breast Biopsies and Screenings Were Significantly Reduced in Spring, Which May Explain Decreases in Billing Frequencies for Treatment in Fall

**Relative Change in Billing Frequencies for Breast Cancer Screening, Diagnostic, and Treatment Services**  
*(March-November 2019 vs. March-November 2020)*

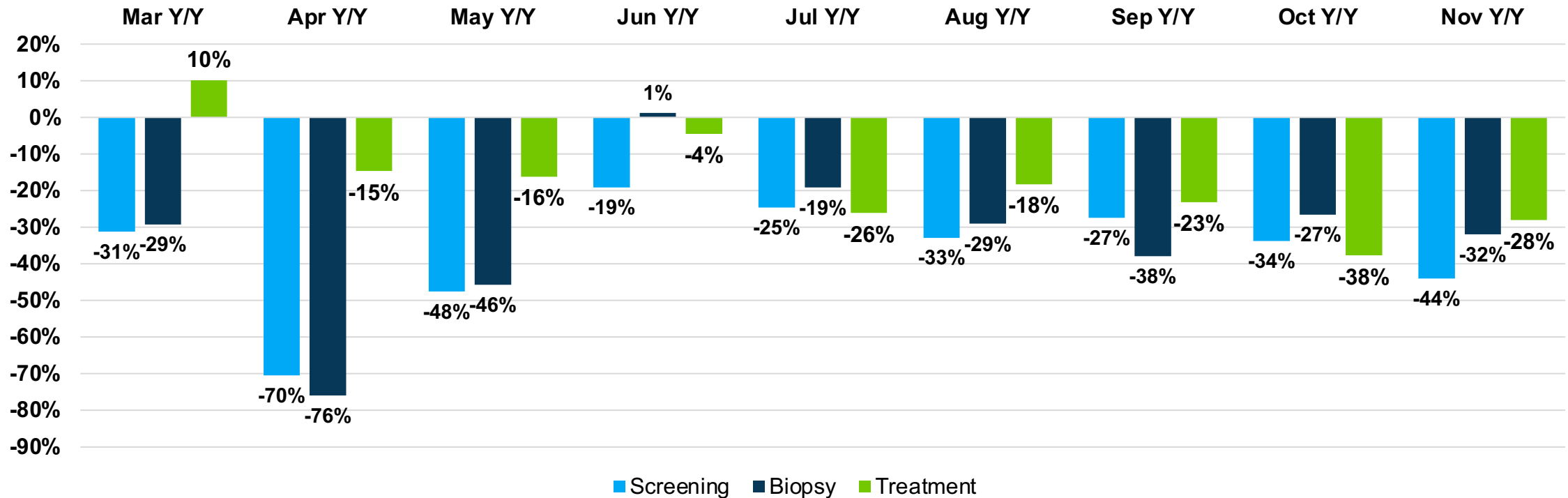


**The lower number of breast biopsies and surgeries could be attributed to barriers to care introduced by COVID-19, as well as the lower prevalence of breast cancer screenings that were administered during previous months, the latter of which may have a lasting, downstream impact on outcomes**

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# Colon Biopsies and Screenings Were Significantly Reduced in Spring, Which May Explain Decreases in Billing Frequencies for Treatment in Fall

**Relative Change in Billing Frequencies for Colon Cancer Screening, Diagnostic, and Treatment Services**  
*(March-November 2019 vs. March-November 2020)*

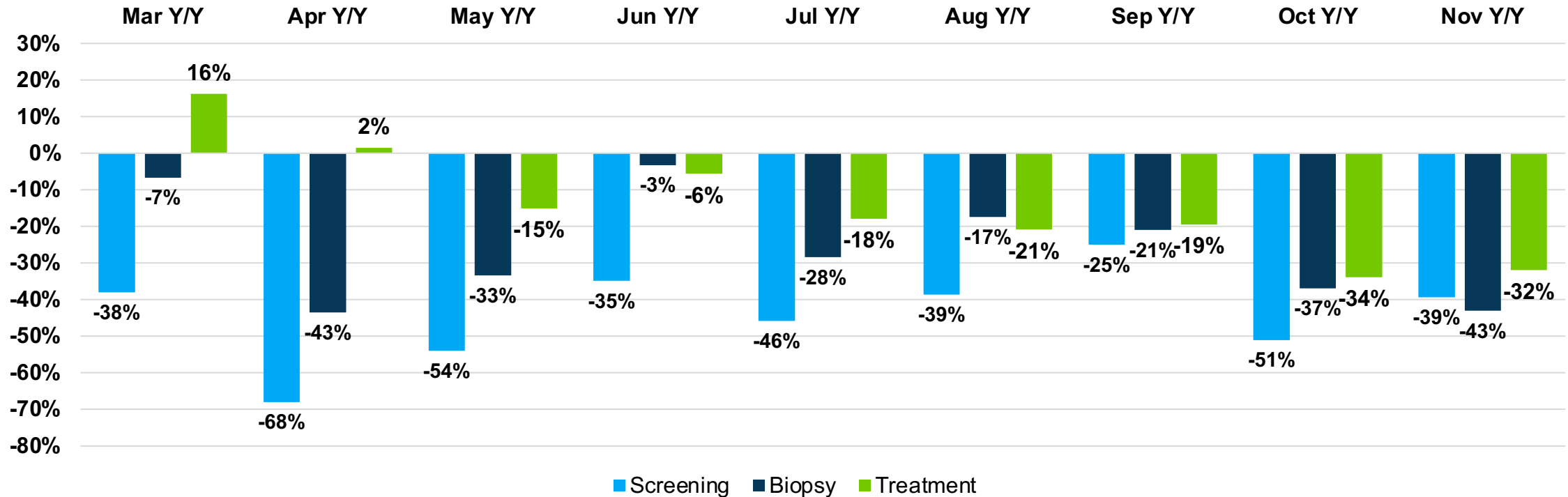


**The lower number of colon biopsies and surgeries could be attributed to barriers to care introduced by COVID-19, as well as the lower prevalence of colon cancer screenings that were administered during previous months, the latter of which may have a lasting, downstream impact on outcomes**

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# Lung Biopsies and Screenings Were Significantly Reduced In March Through November, Which May Explain Decreases in Billing Frequencies for Treatment

**Relative Change in Billing Frequencies for Lung Cancer Screening, Diagnostic, and Treatment Services**  
*(March-November 2019 vs. March-November 2020)*



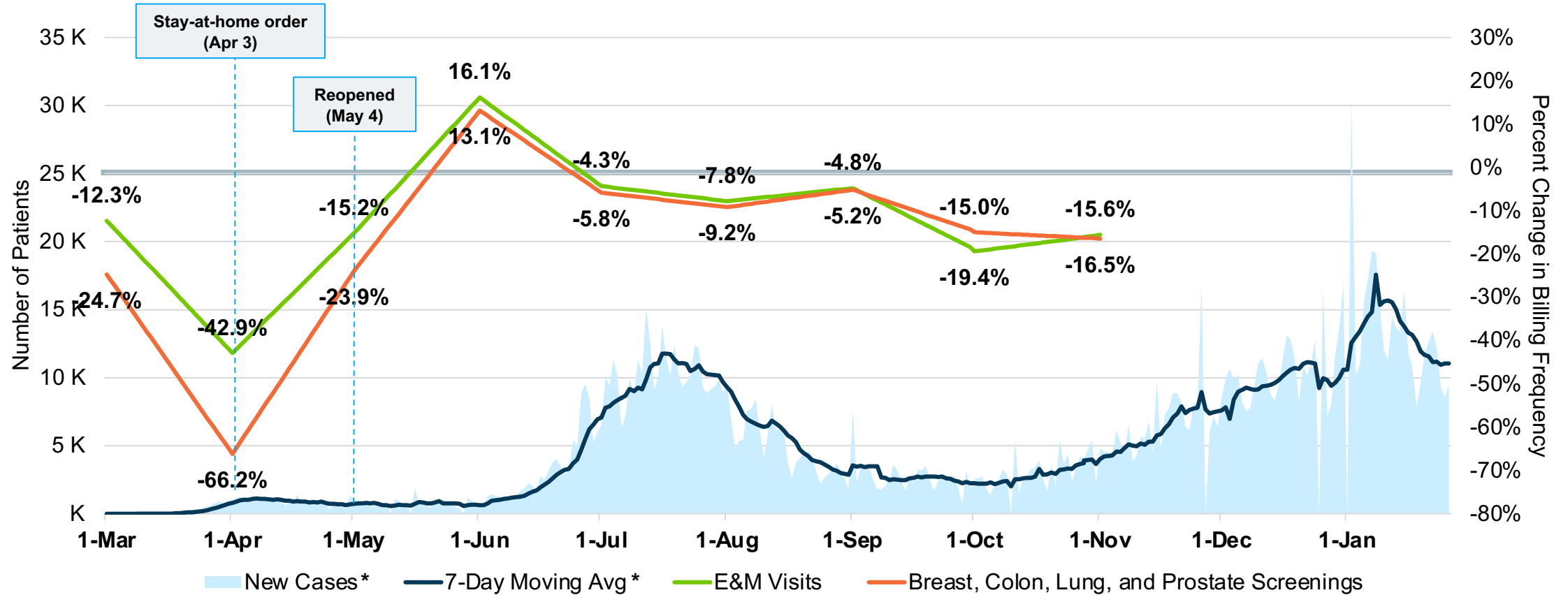
**The lower number of lung biopsies and surgeries could be attributed to barriers to care introduced by COVID-19, as well as the lower prevalence of lung cancer screenings that were administered during previous months, the latter of which may have a lasting, downstream impact on outcomes**

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# Florida Has Implemented Significantly Fewer Restrictions Related to COVID, Which May Explain Lower Declines in Billing Frequency

## Daily Incidence and 7-Day Average of New COVID-19 Cases vs. Relative Change in Billing Frequencies for Cancer-Related E/M and Screening Services

(March 2020-January 2021; March-November 2019 vs. March-November 2020)



\*Testing and Reporting patterns may vary by state, resulting in underestimation of case totals

Source: CDC COVID Data Tracker. Accessed 1/28/2020 [here](#).

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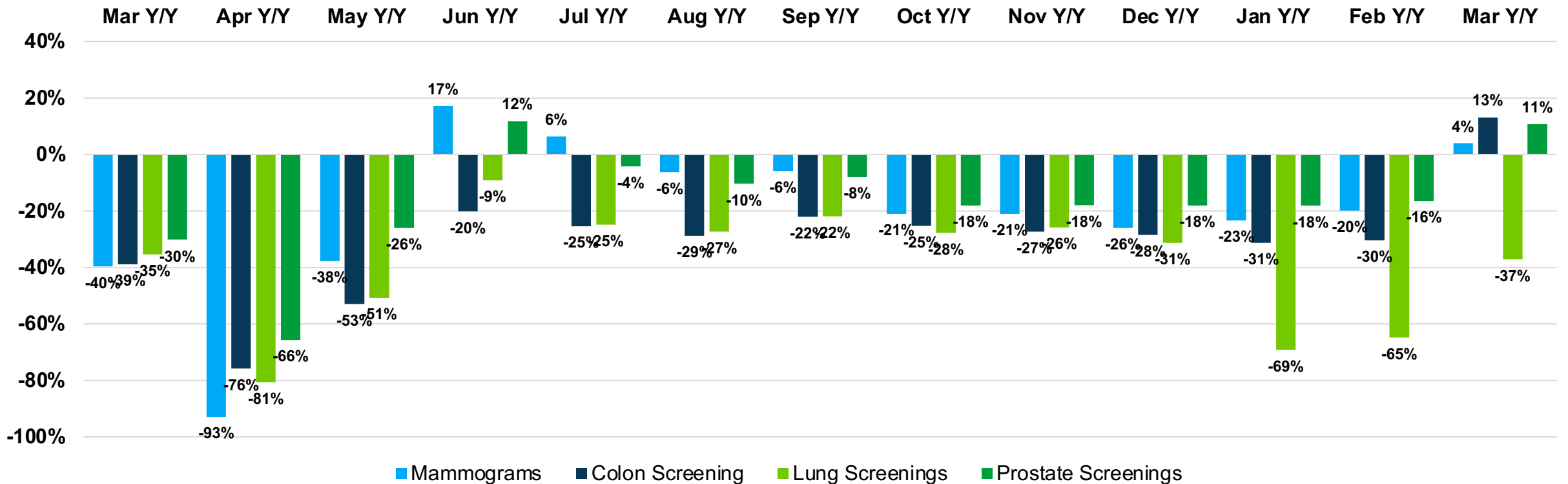
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# Limitations on Delivery of Care Due to COVID-19 Have Resulted in Significant Reductions in Cancer Screenings But Have Been Improving

## Relative Change in Billing Frequencies for Select Cancer Screening Services

(March-December 2019 vs. March-December 2020 and January-March 2020 vs. January-March 2021)



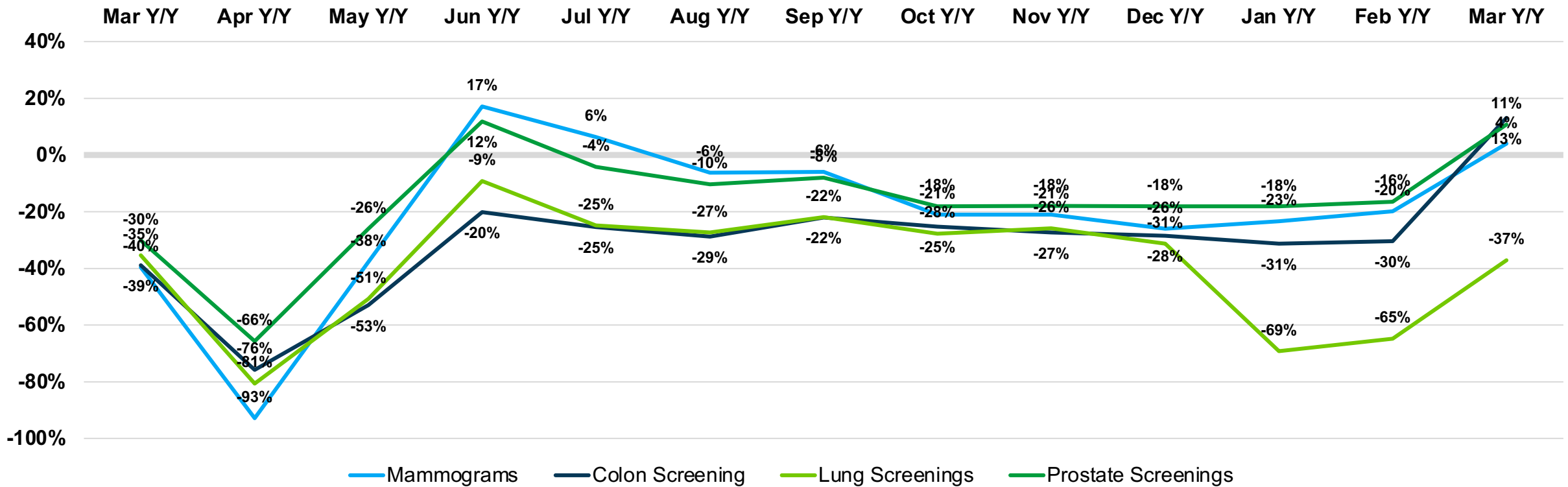
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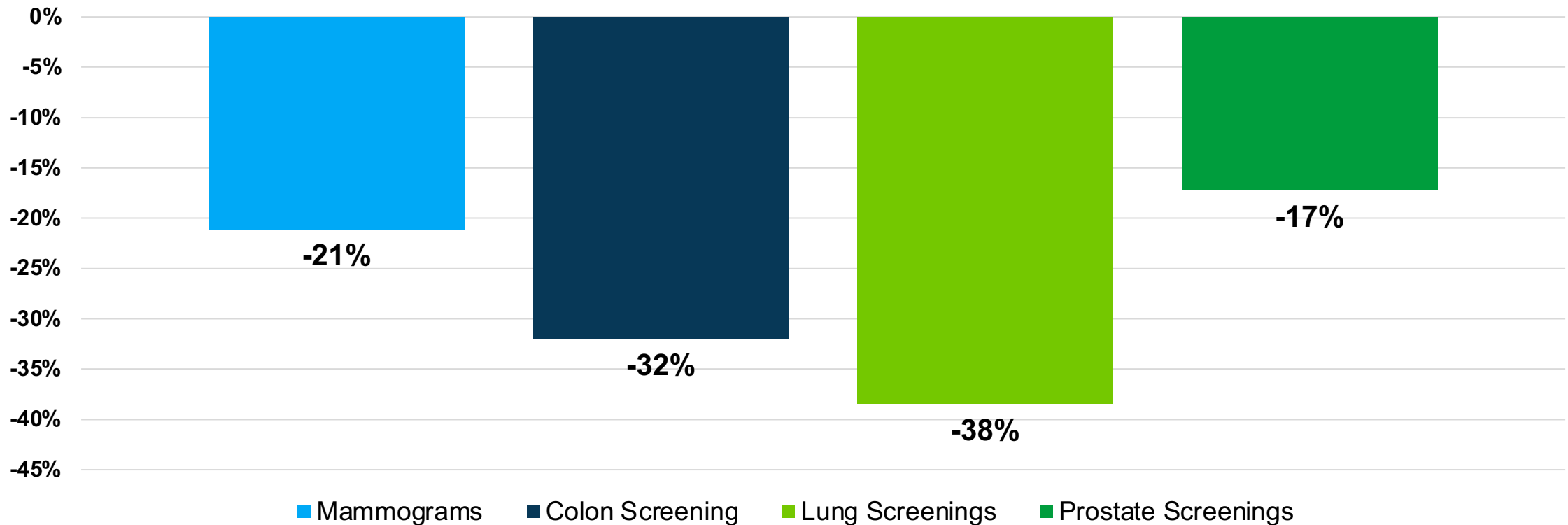
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# Cumulative Billing Frequencies for Screening Have Yet to Return to Pre-Pandemic Levels

## Relative Change in Billing Frequencies for Select Cancer Screening Services

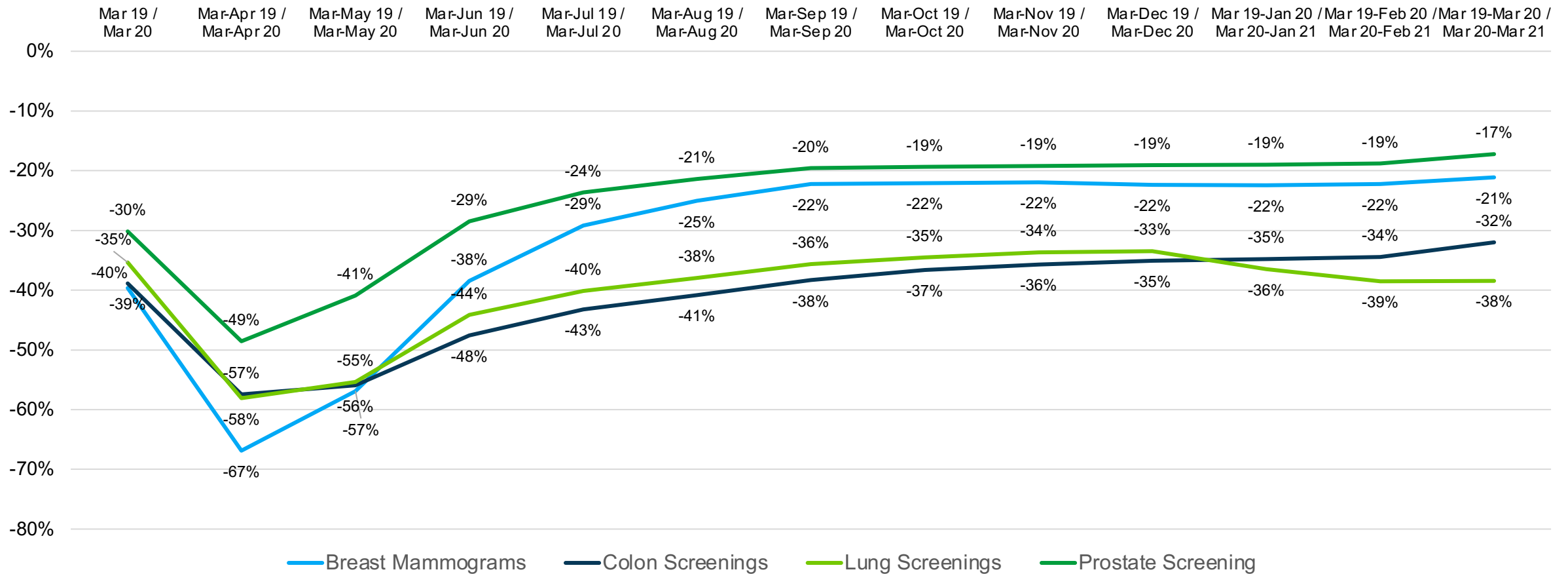
(March 2019-March 2020 vs. March 2020-March 2021)



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# Cumulative Billing Frequencies for Screening Show a Recovery From April 2020, But A Gap in Screening Remains

## Relative Change in Billing Frequencies for Select Cancer Screening Services (January-December 2019 vs. March 2020-March 2021)



Avalere Health and COA analysis of Inovalon Provider Clearinghouse data  
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# Thanks!

**A public awareness  
campaign from COA  
and CancerCare.**

It's time to encourage  
patients to get screened.

**TIME TO SCREEN**

**Detecting Cancer Early  
May Save Your Life**

**Visit [TimeToScreen.org](https://www.TimeToScreen.org)**