

HOST: In February, we had a discussion with Elizabeth Arias with the NCHS Division of Vital Statistics about life expectancy in the United States during the first half of 2020, right as the pandemic was taking hold. Americans lost a full year of life expectancy during that first part of 2020. Today we feature the sequel to that conversation, as this week NCHS is releasing [full-year life expectancy estimates for 2020](#).

HOST: Can you tell us if life expectancy dropped more in the second half of 2020 than in the first half?

ELIZABETH ARIAS: Yes it did - life expectancy declined an additional amount during the second half of 2020 and it did so more for some groups than for other groups. For example, for the Hispanic population it declined an additional 1.1 years. For the non-Hispanic white population it declined an additional .4 years and for the non-Hispanic black population it declined an additional .2 years.

HOST: So overall what was the total decline in life expectancy for 2020?

ELIZABETH ARIAS: It was 1 1/2 years.

HOST: So it's another half year of decline from the first half then?

ELIZABETH ARIAS: That's right.

HOST: Were you surprised it didn't drop more than 1.5 years given how bad the pandemic became near the end of 2020?

ELIZABETH ARIAS: No. I was not surprised because the number of excess deaths would have had to be even larger than they were for the decline to have been greater. And in addition half a year is a substantial amount - it sounds like a small change, but in terms of the way that mortality changes over time which is rather gradual, and it has been gradual and consistent ever since the 1940s, for example. We have seen an increase gradually increase in life expectancy year to year, and of course a gradual decrease in mortality year to year. So a half a year is substantial, so if we would have added another year of decline that would have meant that the number of deaths were even greater than what we saw.

HOST: OK so you mentioned some of the declines among race Hispanic groups- what about declines among men versus women?

ELIZABETH ARIAS: We have seen the gap in life expectancy between men and women decline over the decades. It started out rather large at the beginning of the 20th century, with women having higher mortality and lower life expectancy than men - that was mainly due to high rates of maternal mortality. And then we saw over time men having higher mortality and women having greater advantage in terms of life expectancy. Over time we've seen that this change and particularly during the latter part of the 20th century and early part of the 21st century. The main reason for the decline in the gap, in the difference between the two, has been that life expectancy has been increasing at a faster pace or rate for men. In other words, men had been catching up to women, and what happened in 2020 with the pandemic is that men

experienced higher mortality than women did, and so they basically lost some of what they had achieved during the previous decades.

HOST: Now are you planning to release mid-year 2021 estimates like you did with 2020?

ELIZABETH ARIAS: That's a good question and I believe we are. I don't know definitively.

HOST: With 200,000 plus deaths from COVID-19 so far in 2021, would we expect to see another drop in life expectancy?

ELIZABETH ARIAS: No actually, I think what we would see is a small increase in life expectancy in comparison to what we saw in 2020. In order for us to see another decline in life expectancy we would have to have a greater number of excess deaths than what we have seen so far. So I would say that we would probably see life expectancy go up but it won't return to what it was in 2019.

HOST: Now the drop in life expectancy for 2020 was 1.5 years, and yet way back 100 years ago plus, the Spanish flu pandemic resulted in an 11.8 year decline in 1918. Why the huge difference?

ELIZABETH ARIAS: Well, you have to think about number of deaths during the Spanish influenza. So there were over 600,000 deaths, and also you have to think about the size of the population then. It was a significantly smaller population than what we have today. So you know in 2020 we had 385,000 deaths and a population of over 330 million and back in 1918 we had over 600,000 deaths and - I don't remember the number of the population at the time - but it was a lot smaller than it is so that translates into much larger death rates and as a result a greater decline in life expectancy.

HOST: Are there any plans to down the road look at vaccination and deaths from COVID or vaccination and life expectancy? Anything planned along those lines?

ELIZABETH ARIAS: That would be really interesting and I don't know if we would have the data for that. I think if the National Health Interview Survey asks that question - if people, you know, were vaccinated - or the NHANES... And since we link those surveys to our mortality data, we may be able to look at mortality by vaccination status. But from our data, from vital statistics - in other words from the death certificate - we would not be able to see that. We would have to have some sort of data that's linked to our mortality data.

HOST: OK well thanks for talking to us again Elizabeth.

ELIZABETH ARIAS: You're welcome. Thank you.

MUSIC BRIDGE

HOST: Through the week ending on July 14, there have been 213,413 COVID-19 deaths recorded on death certificates in the United States during this year. Deaths occurring in nursing homes or other long-term care facilities have declined from 22% of all COVID deaths in 2020 to 13% of the total so far in 2021. 81% of deaths in 2020 were among people age 65 and up; that percentage has dropped slightly in 2021 to less than 77%. Deaths in the 45-64 year age group

have risen from 16.6% of all deaths in 2020 to over 20% in 2021. Total excess deaths in the U.S. since February 1, 2020 have topped 663,000, with approximately 80% or more of those deaths due to COVID-19.