PROCESS PAPER

Due to COVID-19 recently hitting the world, and all the precautions taken, such as social distancing, wearing masks, and quarantine, we began to wonder how doctors and scientists knew how to act once this pandemic began. We had briefly learned about the Spanish Flu in school, but as we researched more deeply into the topic, we came to the conclusion that much of the safety measures we took when COVID-19 erupted were adapted from the knowledge gained during the Spanish Flu. The Spanish Flu was a significant turning point in history as it led to the death of millions worldwide and deeply affected how we responded to future epidemic outbreaks.

We first started our research through our school's Virtual Reference Collection to locate primary and secondary sources that were able to help us with our topic. We also searched Google and found information from websites such as The National Institutes of Health (NIH), National Archives, Cleveland Clinic, and The American Red Cross. These websites helped us gather information about the Spanish Flu including pictures, newspaper articles, archives, and short videos.

This year for NHD we created a website, and since we had made one last year, we already had some basic knowledge on how to navigate it. This year we made sure to incorporate more multimedia, visuals, and primary and secondary sources to enhance its interactiveness. However, one problem we stumbled upon was that only one person could edit the website or else the progress wouldn't save. So, we came up with a method to work more efficiently, while one person edited, the other gathered information. We also used the NHD step-by-step videos to help us with our goal on improving our website. Lastly, we viewed winning websites for inspiration on our layout.

Although the Influenza of 1918 nearly killed 40-50 million people, there were also many medical improvements and advancements made due to the epidemic. The knowledge gained from the Spanish Flu was also used to help handle other breakouts, for instance, H1N1 and SARS. H1N1 and SARS were both contagious through coughing and sneezing, and

were both contained a little bit after they broke out due to the knowledge that was gained from those who researched the Spanish Flu.

The Spanish Flu is significant in history because it affected many globally. It also affected soldiers during the last year of World War I. Since many soldiers were moving and getting transported, it caused the flu to spread quickly. Due to the Spanish Flu, a flu vaccination was eventually created and health protocols have been put in place to help minimize the effects of pandemics today.

Annotated Bibliography

Primary Sources:

Cubé, Caroline, and Biomedical Library staff. "Collection of Personal Narratives, Manuscripts and Ephemera about the 1918-1919 Influenza Pandemic, 1917-1923." *Collection of Personal Narratives, Manuscripts and Ephemera about the 1918-1919 Influenza Pandemic, 1917-1923*, oac.cdlib.org/findaid/ark:/13030/kt2t1nf4s5/entire_text/. Accessed 8 Dec. 2023.

This was a great website that gave us a whole bunch of diary entries about the Spanish flu in 1918-1919. It increased our knowledge on how people actually felt and how they dealt with the pandemic.

The Deadly Virus. www.archives.gov/exhibits/influenza-epidemic/. Accessed 8 Dec. 2023.

This website was filled with great pictures that we can use on our website. Plus it really allowed us to infer on how people lived. It also gave us knowledge and background on the Spanish Flu.

Haynes, Suyin. "'You Must Wash Properly.' Newspaper Ads from the 1918 Flu Pandemic Show Some Things Never Change." *You Must Wash Properly.*, 27 Mar. 2020, time.com/5810695/spanish-flu-pandemic-coronavirus-ads/. Accessed 8 Dec. 2023.

This article had newspapers that helped increase our knowledge on the regulations that people had to follow during the Spanish flu. It also furthermore compared the Spanish flu with Covid -19.

Influenza Encylopedia. www.influenzaarchive.org/. Accessed 8 Dec. 2023.

This encyclopedia article had great pictures and it really allowed us to get a more in depth understanding on how the Spanish flu affected the 50 U.S. states.

Kratz, Jessie, editor. "Wear a Mask and save Your Life: The 1918 Flu Pandemic." *National Archives*, 15 Apr. 2020, prologue.blogs.archives.gov/tag/spanish-flu/. Accessed 1 Dec. 2023.

This article had great pictures and helped us get a deeper understanding on the background, what was happening before the Spanish flu and during. It explained how it affected everyone separately.

Medicine in World War 1. onlineexhibits.library.yale.edu/s/wwi-medicine/page/home. Accessed 8 Dec. 2023.

This website helped us in various ways. It had a lot of different information which allowed us to get a deeper understanding. It had great pictures as well.

Sherrard, Jean, Mr. "Pacific NW Magazine." *A Deadly Influenza Kept Seattle Indoors and in Masks in 1918*, 2 Apr. 2020, www.seattletimes.com/pacific-nw-magazine/a-deadly-influenza-kept-seattle-indoors-and-in-masks-in-1918/. Accessed 7 Dec. 2023.

This article helped explain the quote more in depth and provided a picture.

"THE SPANISH FLU." *Skeptic (Altadena, CA)*, vol. 25, no. 3, summer 2020, p. 70+. *Gale Academic OneFile Select*, link-gale-xaaa.orc.scoolaid.net/apps/doc/ A637053460/EAIM?u=nysl_li_esuff&sid=bookmark-EAIM&xid=7c5ee50f. Accessed 2 Dec. 2023.

This article provided pictures of how the hospitals looked and explained furthermore how deeply the spanish flu affected everyone.

Teasdale, Emma, and Lucy Yardley. "Understanding Responses to Government Health Recommendations: Public Perceptions of Government Advice for Managing the H1N1 (swine Flu) Influenza Pandemic." *Patient Education and Counseling*, vol. 85, no. 3, Dec. 2011, pp. 413-18, https://doi.org/10.1016/j.pec.2010.12.026. Accessed 8 Dec. 2023.

This article further explained the government health recommendations.

Willard Marriott Library, J., Mr. "Epidemic of Influenza Threatens Whole World."

Epidemic of Influenza Threatens Whole World, pp. 1-10. National Institutes of Health, collections.lib.utah.edu/details?id=1550732&facet_setname_s=uum_1918fpn. Accessed 7 Dec. 2023.

This newspaper article helps us understand how the Spanish flu spread and warning everyone to be careful.

Secondary Sources:

Basco, Sergi, et al. "The Redistributive Effects of Pandemics: Evidence on the Spanish Flu." World Development, vol. 141, May 2021, p. 105389, https://doi.org/10.1016/j.worlddev.2021.105389. Accessed 8 Dec. 2023.

This article helped us understand more in depth on how the Spanish Flu impacted the returns to labor and capital in Spain. Furthermore it helped with the comparison of the Spanish Flu to Covid-19.

Francis Fujimura, Sara, Ms. "Purple Death: The Great Flu of 1918." Pan American Health Organization, 3 Nov. 2003,

www.paho.org/en/who-we-are/history-paho/purple-death-great-flu-1918#:~:text=attacked%20ev eryone%20similarly.-,It%20started%20like%20any%20other%20influenza%20case%2C%20wit h%20a%20sore,red%20lungs%20drenched%20in%20fluid. Accessed 7 Dec. 2023.

This article helped greatly with helping us understand how badly the Spanish flu affected during WW1. It had great pictures too. It also further explained how people lived. And had a nursery rhyme kids would say, "I had a little bird And its name was Enza I opened the window And in-flew-Enza".

Gavrilova, Natalia S., and Leonid A. Gavrilov. "Patterns of Mortality during Pandemic: An Example of Spanish Flu Pandemic of 1918." Population and Economics, vol. 4, no. 2, 30 Apr. 2020, pp. 56-64, https://doi.org/10.3897/popecon.4.e53492. Accessed 8 Dec. 2023.

This article helped us understand how much people were actually affected from the Spanish flu and how many people died. It also compared it to Covid - 19 which helped increase our knowledge.

The Great Pandemic of History. www.uc.edu/content/dam/refresh/cont-ed-62/olli/s21/history-of-pandemics.pdf. Accessed 29 Feb. 2024.

This article helped us with our project because it provided us with a timeline of all the big pandemics that have hit the earth up to 2019. This helped us pick more pandemics to research and add to our project so we can compare and add more information.

Lemaitre, Magali, and Fabrice Carrat. "Comparative Age Distribution of Influenza Morbidity and Mortality during Seasonal Influenza Epidemics and the 2009 H1N1 Pandemic." BMC Infectious Diseases, vol. 10, no. 1, 9 June 2010, https://doi.org/10.1186/1471-2334-10-162. Accessed 8 Dec. 2023.

This article helped us get a better understanding on who the targeted population was for the Spanish flu and a better background explanation.

McCauley, Michael, et al. "The H1N1 Pandemic: Media Frames, Stigmatization and Coping." BMC Public Health, vol. 13, no. 1, Dec. 2013, https://doi.org/10.1186/1471-2458-13-1116. Accessed 8 Dec. 2023.

This article helped with status on how fear affected people. Which caused them to find someone to blame. This will help us with our project because we are getting more information about what happens to people psychologically.

Palmer, Craig T., et al. "Boats, Trains, and Immunity: The Spread of the Spanish

Flu on the Island of Newfoundland." Newfoundland and Labrador Studies, vol.

22, no. 2, fall 2007, p. 473+. Gale Academic OneFile Select,

link-gale-xaaa.orc.scoolaid.net/apps/doc/A178454098/

EAIM?u=nysl li esuff&sid=bookmark-EAIM&xid=2f83575d. Accessed 2 Dec. 2023.

This article helped us with a deeper understanding on how/where the flu originated and how people went about their day mostly with transportation.

Park, You Jeong, et al. "Fighting the War against COVID-19 via Cell-Based Regenerative Medicine: Lessons Learned from 1918 Spanish Flu and Other Previous Pandemics." Stem Cell Reviews and Reports, vol. 17, no. 1, 13 Aug. 2020, pp. 9-32, https://doi.org/10.1007/s12015-020-10026-5. Accessed 8 Dec. 2023.

This article gave us a bigger understanding on how Covid - 19 and the flu compared and were similar. Plus how we can learn from past mistakes.

Rewar, Suresh, et al. "Treatment and Prevention of Pandemic H1N1 Influenza." Annals of Global Health, vol. 81, no. 5, 29 Mar. 2016, p. 645, https://doi.org/10.1016/j.aogh.2015.08.014. Accessed 8 Dec. 2023.

This article helped explain how we could prevent future pandemics and how to treat them.

"Risk Factors for Hospitalisation and Poor Outcome with Pandemic A/H1N1 Influenza: United Kingdom First Wave (May–September 2009)." Risk Factors for Hospitalisation and Poor Outcome with Pandemic A/H1N1 Influenza: United Kingdom First Wave (May–September 2009), thorax.bmj.com/content/65/7/645. Accessed 8 Dec. 2023.

This article explained furthermore on the hospitalization outcomes because of the Spanish flu. It provided data explaining.

Talbot, H. Keipp, et al. "Coronavirus Disease 2019 (COVID-19) versus Influenza in Hospitalized Adult Patients in the United States: Differences in Demographic and Severity Indicators." Clinical Infectious Diseases, vol. 73, no. 12, 29 May 2021, pp. 2240-47, https://doi.org/10.1093/cid/ciab123. Accessed 8 Dec. 2023.

This article gave a greater understanding on comparing covid and the spanish influenza the hospitalized adult patients.