Unit 12: Sean Kheraj: How has online networked communication changed the study of history?

Q: **How has online networked communication changed the study of history?**

A: Somewhat. So I think that online networked communication has changed the practice of history, will continue to change the practice of history, perhaps in ways that we can't foresee. And is creating quite a lot of exciting opportunities for historians. So there's a bit of an irony that these cutting-edge, futuristic technologies are becoming great ways to help us understand the past. And so I think online digital technologies are providing new opportunities to gather materials about the past, to analyze those materials and to communicate those materials. Which are, in fact, the kind of core fundamental practices of the historian: the search, the analysis, the dissemination. All three of those areas have been, in some ways, revolutionized in the last 20 years. In terms of the search, the materials that we typically work with, documents, letters, reports, books, these have been digitized and are being digitized. Our access to them is exploding. I can now access newspapers from almost every city in North America from my computer at home. Whereas in the past, I would have to have access to microfilm of those newspapers and particular libraries that might hold those microfilms. There were practical limits on what I could get. Now those limits are becoming limitless. That, I think, is changing the practice of historians. And I think for our students, we have to teach them how to use these tools now. Because we have such a massive access to that data, it's starting to exceed the capacity for a person to analyze it. So, for example, that newspaper archive, if I was to print it, would consume acres and acres and acres of land. No human could read through that material and understand it and analyze it. But we now have tools that can machine read that and provide digital analysis of digital records. This is an area, I think, that's going to become more important for historians and, again, something important for our students to learn and skills that they can learn in their undergraduate and graduate educations and, hopefully, open up new possibilities of understanding the past. And I'll use an example of a machine reading tool that's really simple and available for most people with access to the internet, called a Google Ngram Viewer. It's a tool that analyzes a massive dataset of almost all literature published in the English language in the 19th and 20th century. So Google scanned as many books as they could, as many English language books as they could, from 1800 to 2000, and then they produced a tool that can read all of those books. And then you can type in a word and

it'll show you the frequency of occurrence of that word over time. So, for example, in the work that I've been doing on oil spills, I wanted to know when in the 20th century did Canadians become concerned about oil spills. And in the past, I might go to newspapers, popular periodicals, maybe the publications of environmental groups to start to see when in their history did they start talking about oil spills. What I can do now is I can take the Google Ngram Viewer and show over the course of the 19th and 20th century when did the occurrence of the term "oil spill" begin to peak and when did we see this happen? Toward the end of the 1960's, into the 1970's, a trough during the economic recession of the 1980's and a reemergence at the beginning of the 21st century. And now we can begin to interpret historical findings from mass data. This is a huge change in historical scholarship. We're only just starting to figure out the tools and how to use them. And then finally what I do a lot of is the dissemination of historical findings using online digital networking. So publishing on the Internet, using video and audio as a way of disseminating historical findings to reach both academic and non-academic audiences. And a few weeks ago, I was reading through the early archive of H-Net, which is the email listserv for historians in North America and globally now, which originated in the United States. And in some of the earliest messages for environmental historians in the 1990's, they wrote about H-Net quite optimistically, that this was an incredible technology and that the Internet, in many ways, was fundamentally a piece of scholarly technology. That its initial potential, though it emerged out of a military project, was seen as scholarly. This was going to revolutionize the way in which scholars communicate with one and other. Somewhere along the line, I think we lost that enthusiasm or that optimism about the Internet. And so I hope we can pick that up again. Because, in fact, the tools from the early '90s to the present have changed radically. And they've changed in ways that allow us to communicate, not just amongst each other, but to a broader community of Canadians and Americans and a global audience that has an interest in the past. And so rather than only communicating with each other through our journals and through our university published books, we can start to communicate relevant historical data to policymakers, to public history audiences, to ordinary people who have an interest in the past.