# REFLECTIVE ESSAY: STUDENT RESEARCH JOURNEY TO AN INSPIRING ENVIRONMENTAL ECONOMIST

By Trang Minh Phan

As an undergraduate student, my academic journey prior to engaging in research primarily revolved around mathematical equations and critical thinking. I always find numbers more captivating than writing and reading. As an economics student, I solved problems using models and delivered straightforward answers, mainly drawing from the materials provided in my classes. Research for academic growth had not been a significant part of my path until I became aware of contemporary issues in environmental economics. These issues compelled me to learn beyond the classroom, exploring environmental disciplines to gain a deeper understanding beyond mere economic perspectives.

I started to take an interest in researching when I was exposed to multiple issues in environmental economics while working for an Indigenous band. I believe that in order to practice being and thinking like an economist, hands-on problem-solving is needed. Conducting research on caribou conservation pushed me out of my boundaries to learn about wildlife areas. I witnessed the interconnectedness of different disciplines such as wildlife conservation, environmental economics, and econometrics. Besides expanding my viewpoints in the field, the research experience helped me appreciate the knowledge I gained from university. I have become humbler every day, knowing there is always more to learn, and that my classes only provide the foundation for learning and analysis, not the final destination of my academic journey. I now approach my classes in a more mature, logical, and organized manner. As a result, my economics classes have become more interesting. I start to take interest in Economics classes more seriously.

Scientific research has not only strengthened my appreciation for economics but has also helped me approach the subject from a more objective perspective. Reading economics research papers has shown me the importance of interdisciplinary learning and has reinforced the need for economists to expand their knowledge beyond their field to maintain a neutral, unbiased perspective. I have trained my thought process to utilize economic tools such as regression analysis and descriptive analytics to avoid potential assumptions in the subject matter. The research process has significantly transformed my personal approach to economic analysis.

In the Capstone course, I contributed to the community by conducting a policy review of caribou conservation, using data analysis to observe the increasing or decreasing trends in population after the implementation of conservation policies. The project aimed to provide an evaluation from an economic perspective, ensuring a fair empirical assessment. Based on the project outcomes, the BC Recovery Program will be informed with better strategies to efficiently achieve its long-term conservation goals.

My research in the Forecasting in Business and Econometrics courses further highlighted the practical application of econometric models in addressing ecological issues. I evaluated these models using ForecastX ,Minitab and Eview13 software to analyze population changes and gain a deeper understanding of how these models can assist in environmental investment decision-making. The research aimed to organize a large population database and detect potential trends that could be valuable for future conservation efforts. This experience reinforced my appreciation for the role of econometrics in environmental economics.

My research focuses intensively on a sensitive issue in British Columbia’s wildlife: the decline of caribou populations and the potential risk of extinction if conservation actions are not taken. While numerous studies have explored the ecological and biological aspects of this issue, there is a gap in academic research evaluating caribou conservation programs from an economic perspective. My final-year research seeks to fill this gap by assessing the cost-effectiveness and long-term sustainability of various conservation strategies.

This research is particularly significant given the broader implications of caribou conservation. The potential extinction of caribou affects biodiversity, Indigenous communities, local economies, and policy development. By integrating economic analysis with conservation research, I aim to provide a more comprehensive evaluation of current programs and offer recommendations for more effective conservation investments.

The research projects in my final year of my bachelor’s degree combine my four years of economic knowledge and apply it to solving contemporary issues. This has had a significant impact on my academic experience. I have applied econometric models, forestry economics, and data analysis to my research projects, which has boosted my confidence in applying my knowledge to future projects. The experience has also sharpened my computer skills and encouraged me to learn coding as the next step in enhancing my career. Lastly, the research experience has helped me build an academic research background as an Environmental Economist, which will later support my application for a Master's program.

My passion for environmental economics has grown through hands-on research, interdisciplinary exploration, and the application of econometric models to real-world challenges. This experience has given me the confidence to pursue further studies and contribute to the field in a meaningful way. Ultimately, my goal is to leverage my knowledge and skills to develop sustainable economic policies that address environmental challenges. Through this journey, I have found a new sense of purpose in my academic and professional aspirations: to become an environmental economist dedicated to shaping a more sustainable future.