

THE UNIVERSITY OF MICHIGAN
Gerald R. Ford School of Public Policy

SPP/Economics 541

Paper #2 Assignment
Due Wednesday, November 8, 2023

For this assignment, I'd like you and your team to do an analysis of an actual trade policy, similar to what you did in assignment #1 but using data that you will have to extract yourself from sources that I will make available. Teams of 2 or 3 students will be assigned, and will not be the same as for Paper #1.

The policy is the safeguard tariff on imported bicycles that the Canadian International Trade Tribunal (CITT) recommended in 2005. I will provide you a copy of the document that CITT issued in September 2005 explaining the details of the case, from which you will (I hope) learn more than you need to know for this assignment alone about how safeguards cases can be administered. That document includes some data on the Canadian bicycle industry, and I think there is enough there, with one exception, for you to do a sensible analysis of what the effects of the safeguard tariff on Canada will be. I leave it to you to decide what assumptions to make (guided, perhaps, by the commentary in the CITT report), and exactly which of their data to use and how. I have no objection to your looking elsewhere for additional data, but I don't expect that to be necessary.

The two pieces of information that the CITT report does not include are anything much about the price sensitivities of demand and supply for bicycles. For demand I have found the following excerpts, which you may or may not find informative:

Derksen, J.B.D. and A. Rombouts, "The Demand for Bicycles in the Netherlands," *Econometrica*, July 1937, p. 298:

"From formula (1) we can calculate that the elasticity of demand amounts to about 1.3."

Kerr, P.M., "Demographic and Energy Effects on the U.S. Demand For Bicycles," *Transportation Research Record No. 1141*, abstract only, undated though its "Accession Number" ends in "79", so it may be from 1979:

"Some key elasticities are own price, -2.70; income, 2.77; price of gasoline, 0.51. For example, a 1 percent increase in the price of bicycles results in a 2.7 percent decline in their sales."

Lemieux, Pierre, "Bike Protectionism," *Financial Post*, September 7, 2005. This is a rant against the CITT for recommending the tariff, and it includes results of a cost-benefit analysis of the tariff.

"A tariff on bicycle imports and the consequent price increase will reduce quantity demanded, presently estimated at 1.5 million bikes. Assuming that the elasticity of demand for bikes is 1.1, a 25% tariff FOB that translates into a 14% retail price increase will cut quantity demanded by roughly 200,000 bikes a year."

As you can see from these quotes, there is disagreement over what the price elasticity of demand for bicycles might be. What you should do, therefore, is examine how sensitive your results are to the

choice of elasticity. One way to do that is to select a single elasticity that you view as most plausible and/or is in the center of the range of estimates that others have used, and report your results for that. Then do a separate “sensitivity analysis” calculating and reporting the results for elasticities both higher and lower than this, trying to cover the range of what readers may view as plausible. Another way is to report multiple estimates from the start, using high and low estimates for the elasticity and reporting results for both. It is up to you how you handle this.

For the supply elasticity, I have been unable to find anything at all. Therefore you will have to handle this whatever way you think best. One approach is simply to assume an arbitrary number for the elasticity, such as one, but then recognize how uncertain that is by doing a sensitivity analysis that is even broader than what you did for the demand elasticity. If you have other ideas of how to handle this, you are welcome to try them.

I will not spell out in detail what you should include in your paper. The assignment for Paper #1 should give you a good idea of what is needed, although some of the things asked for there are clearly not appropriate here (e.g., effects on land).