

Quiz #1
ECNS 432
Spring 2020

Name _____

1.) Social choice rules (9 points)

Suppose we have a small inhabited island with three residents and a volcano that generates air pollution. Two people live upwind of the volcano and one person lives downwind. For \$21,000 we can clean up the volcano with a patented “smoke guzzler.” The two upwind people would pay \$1,000 each to get rid of the smoke whereas the downwind person would be willing to pay \$15,000. Consider two plans to finance the “smoke guzzler.” Plan A calls for a tax of \$7,000 per person. Plan B calls for the affected part (the downwind person) to pay \$21,000 and everyone else nothing. Compare each plan to the status quo and indicate society’s choice using (a) the Pareto criterion; (b) majority rule; (c) the compensation principle.

Summary of answers

	PLAN A	PLAN B
Does plan pass under the following choice mechanisms?		
Pareto Criterion	No	No
Majority Rule	No	Yes
Compensation Principle	No	No

2.) WTP in Cost-Benefit Analysis (4 points)

List two issues related to using WTP as the measure of benefits in CBA that we discussed in class.

- a. Limitations of WTP as a basis for social ordering.
 - Ranking policies in terms of net benefits does not guarantee a transitive social ordering of the policies
- b. Dependence of WTP on distribution of wealth
- c. Dependence of net benefits on assumptions about who is given standing

3.) Term paper (2 points)

Write down two potential paper topics (i.e. two hypotheses you are interested in testing) that you have been thinking about researching. Try to **be specific**, but you don't need to be wordy.