

Mini Project Presentation Comments

U-Pass Program: Students Average 9.0; Instructor 8.5

(CHIU HEI, Shun Suzuki, Ram Kumar TIMALSINA, Shuwen ZHOU (Sylvia))

Instructor Comments:

- This report works on an interesting and unique program in Vancouver and succeeds in providing the benefit-cost analysis of the program, adopting the standard approach in the evaluation of transportation projects. Its CBA results appear convincing. Presentation is also quite good, although a busy client would want critical elements better explained.
- Comments on analysis:
In the end of Section 3.3.2, as a part of “the potential amount of income that can be generated due to the improvement of mobility brought by U-Pass program,” “income generated from the improved access to job opportunities” is estimated. The estimate might be an overestimation because the U-Pass program alone is unlikely to generate 80 days more of work per year for students from poor families.
- Comments on exposition:
The executive summary is one of the best among this year’s reports, but it is not enough to convince the decision maker that your analysis is believable. You should explain in words why the net benefit of continuing the U-Pass program is positive, by identifying major sources of benefits and costs and the reasons for their magnitudes. It should also contain brief explanations of the data, methodologies, and major results and your evaluation of strengths and weaknesses of your approach. It also helps to provide a summary table of the benefits and costs.
The graphs and tables in Section 3.1.4 are not explained. Because this part is one of the major benefit components, you should provide good explanation. In the graph of the car market, the prices in the without and with cases appear reversed.
The formatting of tables can be improved. They take up too much space, making the paper unnecessarily difficult to read.
Referencing is incomplete. For example, no reference is provided for Litman (2012).
Page numbers are missing.

Students & TA Comments:

- The executive summary was very precise, being easy to understand the main arguments on cost and benefits analysis, especially by highlighting the World Bank methodological approach on major components to compute overall impacts of the U-Pass public policy. As argued by Prof. Kanemoto, the executive summary is different from an academic abstract, and should be longer, more detailed and with the relevant discussions for busy policymakers extract most of it. In this case, more analytical debate and policy recommendation details could have been added.
The introduction presented the background and contents of the public policy to be examined, and clearly presented the research question and the with/without criteria for the analysis – discontinuing/continuing of the U-Pass program.
The chapter on methodology briefly explained the World Bank methodology emphasizing the necessity of simplifications due to technical and resource limitations to conduct such study; but, in my opinion, it lacked some explanation on why this methodology was chosen among others available, and it lacked a critical view on possible problems with the World Bank presented methodology, even thou it mentioned all challenges and limitations of the study.
The chapter on cost and benefit components was well structured considering a step-by-step calculation and,

especially, it highlighted possible problems when considering numbers before the U-Pass implementation as a reliable value if discontinuation of the program occurs. Also, air pollution and climate change mitigation were carefully presented and supported by a good literature review, clearly pointing out the controversy of any possible calculation result. After an overall economic impact evaluation, a debate on findings was made with policy recommendations and study limitations analysis. The weak part of the work, in my opinion, was the sensitivity analysis as data from different sources were used to build the model calculation; therefore, a more systematic evaluation would enhance the credibility of the calculation/estimated values. Additionally, to improve the CBA, some suggestions could have been given on alternative evaluation methods to replace U-Pass program and some evaluation could have been done on emerging informal/black market of buying/selling the card for non-students, which can cause significant loss for the government revenue.

Finally, the report could have been improved with an analysis on CBA ratios to compare with/without case and more debate/recommendations to improve the existing U-Pass program.

- Comprehensive yet some assumptions on which the study is based are not realistic; more data availability would have helped.
- With some data likely to vary, conducting sensitivity analysis would have made the computations more persuasive.
- There is smooth flow of contents in the report.
- It try to Included Multiple factors: Consumer Benefit, Producer Surplus, Govt. Revenue, Equity, Environment pollution
- Conclusion/Result is favors the current status. It doesn't contradict with current practices.
- Analysis is comprehensive and policy implication is strong.
- The final report was well structured and the group was able to present both quantitative and qualitative analysis of the impacts of the program. However, I wonder if this kind of project can be applied to different cases, having that it has a very specific target (academic community).
- Clear presentation of the situation and issues at stake.
- Good table summing up major benefits and components
- Clear explanation of the methodology used
- Regarding patterns of use, it is not clear if commuting routes are easy and available for students from their housing to campus. Do students leave far from the campus or on campus? What are the typical commuting routes and their length?
- Overall extremely comprehensive and well designed, although sometimes almost too detailed, if that's possible. I lost a bit of sight the bigger picture.
- Successfully Explained the Costs and Benefits in clear language.
- Easy to understand how they calculated the Costs and Benefits. Especially the calculation for the social equality is really interesting.
- Policy recommendation is insightful.
- Sensitivity analysis is properly and adequately done.
- Good layout although there is a little inconsistency in the beginning of the report.
- Clear research's objectives and methodology
- It is good to state the assumption and research limitation in the beginning but repetitive when research limitation is showed in the last report.
- Analysis and how it is calculated is well explained.
- But calculation of CBA is less clear than the calculation of economic impact.
- Analysis on externalities is a very good attempt.
- The paper is constructed well and it was easy to understand Cost and Benefit calculation. The members were thorough, especially attempting to calculate non-quantifiable factors such as air pollution.

- The group was able to present well the cost and benefit of the project and the sources of information.
- The report clearly illustrated and explained the project impact on consumers and producers' surplus and cost to the government.
- Report was well structured and organized well.
- They have used some aspects of the CBA with interesting figures. But they have mentioned to continue the Upass programme without considering the BCR, IRR values. So it is better to do BCR, IRR and sensitivity analysis before implementing the project.
- Values are not in a same format in some pages. Better if they mentioned the values in millions then easy to read.
- Cost and benefit components are depicted clearly and presents a good analysis of the policy question involved.

Sao Paulo Subway: Students Average 8.8; Instructor 8.2

(Nicolle Aya KONAI, Agathe Madeleine Claire L'HOMME, Chikako YOKOYAMA)

Instructor Comments:

- This study tackles a challenging topic of a zero-fare policy, with the emphasis on distributional issues. Considering the difficulties involved, the group has done quite well.
- Comments on analysis:
One of the major components of the benefits of the zero-fare policy is the user benefits (consumer surplus) received by passengers. I could not see this component in the report.
It should be made clear what are the primary and secondary markets, and the (user) prices and the (average) social costs in those markets must first be presented. This make the analysis much easier to understand.
- Comments on exposition:
The last part of the executive summary referring to the equity question is not easy to understand. Your points should be made clearer.
The last paragraph before the header, Goal of the study, in Section 2: Is it true that the average waiting time was 67 minutes?
Some of the references are missing, e.g., Litman (2011).
The last paragraph of Section 3: "larger transit systems" should mean transit systems with high passenger density, rather than the simple size of the network.
The last paragraph of Section 4: You have to explain "our literature review" in more detail.
You have to explain why there is no capital cost (or depreciation) components in the cost figure (Figure 3).
Before Table 6: "but this hasn't been clearly supported by evidence" is claimed without explanation.
You should provide a summary table of all the benefits and cost components and the net benefit.

Students & TA Comments:

- The executive summary had the necessary and relevant information for a busy politician/policymaker to understand the presented report. It was very precise, comprehensively explained all major issues, presented figures and methodological approach, and presented a policy recommendation pointing out a very strong argument on the difference between the accounting and the economic perspectives.
The introduction provided an explanation about São Paulo's background and political arena to readers not familiar with its actual situation; and clearly presented the research question and the with/without criteria for the analysis – to implement/not implement the zero-tariff policy.
The chapter on zero-tariff policy overview provided its definition and briefly explained some major aspects for policymakers willing to implement such controversial public policy; but, in my opinion, it lacked a better literature review regarding this topic – for instance, no authors were mentioned nor a substantial analysis on existing studies cases was provided.

The chapter on methodology, starting from forecasting ridership change, explained the relationship between ridership and fare change, known as Simpson-Curtian rule, but, it lacked a critical view on the standard elasticity number of -0.3 and it lacked some explanation on why this methodology was chosen among others available – extra care is needed when adapting/adopting numbers from developed countries to developing countries.

The chapter on current cost structure was the result of a long-term effort from students to acquire relevant official data from the Estate Government of São Paulo and the Metro Company, which probably was responsible for a evaluation credibility due to official numbers.

The financial analysis – accounting perspective – and the economic analysis – including net present value calculation – were presented in a very structured way, step-by-step calculation, making it easy to understand all estimative considering the with and without case. Also, a summary chart was presented with overall results considering 25% and 50% increase assumptions, and, even considering this range variation, a good argument to implement zero-fare based on forecasts and social benefits was given.

The strongest part of the report, in my opinion, relies on distribution weights, as inequality and gap between rich and poor is an important issue, especially in a developing country like Brazil, and should be considered by any policymaker. The group clearly presented the limitations on actual study to take conclusions out of distribution weights calculation, and highlighted its importance on pro-poor policies.

A mistake was found as the work chapters jump from 7 Economic Analysis to 9 Sensitivity Analysis, then to 11 Acknowledgements – please, pay attention when designing a final document for your client. Finally, final conclusions were presented with detailed summary of results and study limitations. Additionally, to improve this CBA, some suggestions could have been given on how to implement such policy; if, on the one hand, the presented work justified the public policy implementation, on the other, the “how-to” implement is key for policymakers.

- As with the U-Pass Program CBA, the accuracy of travel pattern changes significantly determines the validity of the overall report.
- Interesting to separately consider accounting costs and qualitative cost analysis; the report written with clear objectives in mind.
- Use of weighted probability distribution for calculation of gain is competitive strength of this study.
- Financial and Economic analysis are separately performed that make report much clearer.
- Sensitivity Analysis is performed.
- The analysis and estimation is rather comprehensive. But the conclusion is a bit rough and there is a lack of policy implication.
- Layout is inconvenient for reader. There is no space between paragraphs.
- Clear research's objectives.
- Cost structure and benefits are well explained.
- The analysis is easy to follow since the writers put calculation results with and without case side by side.
- Group's attempt to monetize all benefit aspects should be appreciate.
- The interpretation of weight distributional is unclear.
- The paper is well written and well constructed. Although it was easy to follow at the beginning, it was a bit confusing where it entails about financial analysis and economic analysis separately.
- Also it was clear that other factors such as user type, trip type, mode and route information are major impact as price is not the only factor; however, it was not mentioned again later in the paper as part of the sensitivity analysis. Although it is challenging to calculate, introducing psychological cost factor made the paper more creative.
- Overall, the paper was an interesting read and the members did a great job identifying factors and calculating them.
- The group was able to use the different concepts discussed in class including allocation of weights on different affected groups. Impact of using varying weights was clearly explained in the sensitivity analysis.
- Interesting topic and report was well organized.

- However, more information is necessary to be able to access the the net social surplus.
- They have calculated only the NPV of the project, but they couldnot cover the many aspects of the CBA such as BCR, IRR. Therefore, difficult to reach to a final conclusion whether project is beneficial to implement.
- Figures are not in the same format in some pages. Better if they mentioned the values in millions then easy to read.
- Sensitivity analysis: they have considered only the ridership increase
- Presents some interesting aspects such as psychological costs involved.

URS Campus: Students Average 8.2; Instructor 8

(Meikha AZZANI, Enkhchimeg OYUNSUREN, Jose Dinis VELOSO CAMELO P., Leah Gregorio ALAMO)

Instructor Comments:

- This study provides a useful analysis of an education program in a rural area in a developing country. Although the link between the education market and the labor market is not modeled well, the results of the benefit-cost analysis appears OK.
- Comments on analysis:

The education program increases the productivity of a graduate, which has direct impacts on the wage income. This impact is part of the labor market and you should develop a consistent formulation that includes the labor market as well as the education market.

The consumer surplus in the education market can be derived from the expected wage increase of a graduate. Hence, “due to data limitation and for conservatism, the analysis did not account for the resulting increase in consumer surplus in the primary market” cannot be justified.

The supply side analysis in Section 4.1 ignores the fact that the observed wage and employment result from interactions between the supply and demand functions. For example, the negative correlation between labor supply and wage rate found for the business sector might not show the supply relationship.

Section 3.2.1.1. Fixed Costs: Many of the fixed cost components may actually be variable.
- Comments on exposition:

It helps to have a summary table for benefits and costs.

Sectin 2.3 on the limitation of CBA is very good.

You have to have clear description about the secondary market, including why it is secondary.

Table 9 is too large to be in the main text.

Students & TA Comments:

- The executive summary presented almost all necessary elements for a busy policymaker to understand the presented report; but, after the results on CBA calculation and possibility to debate public policy recommendations, the summary got confusing on secondary market results and explanation. The introduction provided was very brief, and it lacked detailed information to help readers to understand Jalajala’s actual situation and did not provide data – graphs, charts, maps – to reinforce the need for the proposed public policy; also, the presented research question and the with/without criteria for the analysis – to implement/not implement education/new campus – should have been better written and explained. A positive aspect of the work was: the extensive literature review on education and economy – how education’ time and quality affects economic growth –; and the cost and benefit analysis framework proposal for the educational project. Different approaches on how to measure the benefits of education were provided; also, it was provided an explanation on primary and secondary market approaches as well; and, as another positive aspect of the work, it was provided a critical analysis on CBA usage for educational projects – such as problems with overestimation of social returns, inability to include externalities, problems to estimate distributional weights, the market failure approach and the challenge to understand all aspects and effects related to education.

The chapter on benefits and costs was very clear, explained step-by-step with detailed information and results. Also, charts carefully supported all the data, with all calculations, helping the reader to follow easily the research progress.

The chapter on secondary market analysis seemed to be the work most difficult part to understand, as the hypothesis presented – labor supply increase, average wage decrease – needed several external sources of data to support the argument – that increase in supply will not change average wage as expected –, and the data/results were presented without a previous detailed methodological explanation.

The sensitivity analysis, in my opinion, was the weakest part of the report as no systematic evaluation was made with the argument that 20 years of observation would be needed – there are tools that can be used to overcome the lack of observation and to predict data, some learned during our course.

As for conclusions, the qualitative analysis / debate to promote the public policy could have been expanded to validate the CBA calculation – the literature review could have been widely used to support student's findings. Finally, no acknowledgements were given to professor or class colleagues.

- Putting the validity and accuracy of the computation aside, the team's effort to work on a very original content shall be appreciated.
- The report fails to explain clearly why the 8-year temporal scale was adopted.
- Would be more interesting to take possible brain drain on both national and international levels into consideration.
- Cost benefit analysis comprehensively performed.
- Theoretical Framework of Cost-Benefit Analysis (CBA) for Education Project is introduced.
- Strong theoretical framework and analysis and estimation. If there are more content about policy implication, it will be a very good report.
- The final report contains interesting information on the impacts of education at the local level in the case of the URS Campus. However, there is a sensitive part related to whether the increase in education levels will necessarily generate positive outcomes to the community or will increase the rate of migration.
- Clear presentation of the situation and issues at stake.
- Good table summing up major benefits and components
- Clear explanation of the methodology used
- Regarding patterns of use, it is not clear if commuting routes are easy and available for students from their housing to campus. Do students leave far from the campus or on campus? What are the typical commuting routes and their length?
- Overall extremely comprehensive and well designed, although sometimes almost too detailed, if that's possible. I lost a bit of sight of the bigger picture.
- Distinguishing the demand-side and supply-side for the analysis on secondary market is interesting.
- The overall writing of the final paper is pretty good.
- It seems that the conclusion part is not finished yet.
- It might have been better if they could draw some inference from the result they got.
- The group was able to obtain data from reliable sources. Despite of data limitations, the group tried to illustrate impact on both primary and secondary market.
- Good effort, they have tried to apply the CBA approach to the education sector.
- They have missed the acknowledgment part in the report.
- Although they have mentioned about sensitivity analysis there is no clear sensitivity analysis in the report.
- Life time of the project was 50 years, but they have not calculated the IRR of the project.
- Explored impacts on both primary and secondary markets, though there are ambiguities in some of the calculations projected.

Southern Expressway, Sri Lanka: Students Average 8.3; Instructor 8

(MAPALAGAMA CHATURA SEWWANDI WIJETUNGA, Aswathi JOHN KAITHAKKEL)

Instructor Comments:

- This is in a way a very ambitious study to introduce new directions to the routine benefit-cost analysis done in practice. It is not clear if the attempt is successful, but it deserves respect.
- Comments on analysis:
You have to justify the assumptions that you made, for example, on those made for traffic forecasts in Section 3.2.
Usually, the value of time goes up as the income level gets higher. Where is your assumption about this. I am not sure about the difference between the parts up to Section 3.5 and after Section 3.6. These should be doing the same thing and I am not sure if the two different estimates can be justified.
- Comments on exposition:
No executive summary.
You have to provide good explanations on how and why you determined the parameter values.
You have to have a good summary table for benefit-cost estimates.

Students & TA Comments:

- No executive summary was found unfortunately. Please, bear in mind that executive summaries play an important role for busy policymakers/politicians to understand the most important/core aspects of the CBA report.
The introduction presented the detailed background and actual situation of the highway(s) in Sri Lanka – in terms of efficiency, carrying capacity, social development and economic growth. It clearly presented the research objectives, but it lacked some questions to be answered with the CBA analysis and the with/without criteria for the analysis – implement/not implement the Southern Expressway – mentioned later.
No specific chapter on methodology or analytical framework was given previously to estimations, which may complicate policymaker's comprehension not familiar with CBA.
The chapter on primary market analysis was very well and clearly presented, and all necessary calculations were made – net present value, economical internal rate of return and social costs considering with and without project's implementation. A detailed step-by-step estimation of the change in social surplus with the southern expressway was given, clearly presenting a change in gross consumer surplus using a graph. The weakest part of the work was the secondary market as some external data was presented without proper citations and without proper estimations using the primary market influence for calculation.
The conclusions were clearly presented and an important summary – that could have been used for the executive summary – it was shown, making it possible to understand the major arguments on project's feasibility and implementation.
Additionally, to improve the CBA, limitations on study and methodology should have been presented; also, the report could have been improved if more variables were used to determine net present value/calculations/estimations.
- Overall interesting (despite some parts being quite monotonous) yet the project has many different objectives and the reader can easily lose focus of what the main message(s) of the study are.
- What is meant by “sustainable” reduction of accident rate?
- Must have taken much effort to write up the report of this quality with just two people. Impressive effort.
- Could have relied on more sources for improved validity.
- Too much table in the report make monotonous reading. Tables can be shifted to appendix part that can increase quality of the report.
- Objective of the study is not mentioned.
- Report directly jumped to calculation without establishing frameworks.

- The calculation of social cost only counts accident cost, a little bit simple. Better include more variables.
- The final results was well structured and calculation and results are clearly stated. I wish the analysis of impacts on secondary markets was more developed though.
- No executive summary
- Clear presentation of current situation and issues
- Any critics on ADB demand estimates or alternative values available?
- Which average was used for VOC ? and with which demand forecast? Several detailed estimates are mentioned in tables 4 and 5, but I didn't understand which numbers (for the estimated volume of traffic and which type of vehicle) were picked for table 6.
- About the reduction of accidents, there would be a decrease in accidents with the highway project, but were the potential risks of increase in accidents taken into account as well with higher speeds?
- Good use of all the concepts and techniques taught by Professor Kanemoto (BCR, NPV, discount rate, EIRR)
- In External Costs, maybe they could have mentioned as well Air Pollution?
- The impact of the Labor Market and labor mobility is very interesting, albeit harder to demonstrate. The impact on tourism is also a good issue to raise, and maybe they could have looked into touristic points of interest that would become easier to access with the project as a way to support this point.
- Calculations for each Costs and Benefits are properly done.
- The language is clear and easy to understand.
- Considering that they needed to finish the project just by two members, I think the work they had done must be appropriately evaluated.
- Lack in creativity? Mostly the same as the common construction project.
- No executive summary.
- Good layout but the font is too small
- Well explanation about the background of the project but apparently, the group missed to state research's objectives.
- Clear explanation on cost structure.
- Well explanation on primary market but analysis on secondary market is unclear due to some limitation.
- Estimation on NPV and CBA are clear but there is no explanation on how they project costs and benefits for 20 years.
- Overall construction is good, but it was difficult to follow as there are too many figure/ tables in the paper. The detailed figures could have been part of the annex.
- Cost and Benefit components were researched and calculated well.
- The only problem would be it did not offer something interesting.
- They were able to show components of gross consumer surplus and social costs. However, it did not clearly explain on why it has assumed that there was no changes or distortion in the minimum wage rate in the case of the secondary market.
- The group did not provide executive summary of the project as required in this exercise.
- Good effort, but they have missed the exexecutive summary part in the report.
- They have covered most of the aspects in the CBA including NPV, BCR , IRR and generalized cost, social surplus etc.
- If the values are mentioned in millions easy to read.
- Presented cost benefit analysis as well as surplus changes of primary market explaining steps for reaching each calculation. Secondary market benefits are not monetized.