

## PUBLIC COMMENT, CITY OF BEND CITYWIDE TRANSPORTATION ADVISORY COMMITTEE

To: City of Bend Citywide Transportation Advisory Committee  
Attn: Susanna Julber, Karen Swirsky, and Eric King  
From: Steve Porter and Michelle Porter, Residents of Bend  
Date: June 6, 2019

### Public Comment:

## *Bias in "The Bend Transportation - Community Survey"*

Dear Bend Citywide Transportation Advisory Committee:

"The Bend Transportation – Community Survey" (the "Survey"; <https://www.surveymonkey.com/r/BendTransportation>) contains leading, loaded, and biasing prompts, and it states or implies information that is demonstrably false. As a result of these fundamental failures, no weight should be accorded its findings.

The Survey's biasing of respondents begins at the very top of its first page, in the preamble, which states: "The City of Bend is considering making strategic investments to reduce traffic congestion and improve the safety of neighborhood streets." This statement primes Survey takers in two ways:

- 1) to perceive any investment possibilities mentioned in the Survey as "strategic" (which carries positive connotations for, and implies thorough pre-evaluation by the Survey authors of, these possibilities); and
- 2) to perceive any items listed for rating as having been previously shown "to reduce traffic congestion" and/or "improve...safety" (else why would they be included among the possible strategic investments?).

Question 2 exacerbates this biasing by asking respondents to "rate the effectiveness of the following methods that have been used to reduce traffic congestion and the time it takes to get around Bend" (emphasis original). This prompt strongly implies that any of the "methods" respondents are to rate have been used successfully, to some measurable degree, to "reduce traffic congestion and the time it takes to get around." This imbues the methods with merit, predisposing respondents to view them favorably even before reading the list.

It would be one thing if there were actual basis for the notion that all offered methods do, in fact, promote goals of reduced traffic congestion and travel time to some degree or other. But the fact is that at least some of the listed methods have been empirically shown not only to *not* reduce traffic congestion and travel time, but rather to *increase* them (and to, as a byproduct, substantially increase ongoing road maintenance costs without benefit).

Widening roads and “fixing” intersection bottlenecks are among these dubious “methods.” (For reference, see: Porter, CTAC Public Comment: “Evidence & Implications of Supply-Induced Demand in Transportation Systems,” July 9, 2018, including any of its cited references, and/or the other volumes of published study on this issue of “induced demand.” We note here that these issues are, or should be, well known to the CTAC at this point. It is curious regardless that a survey would ask people’s opinions of things that can be measured empirically; surveys tend to be used when such empirical measurement cannot be done. In this instance, empirics can and thus should be the principal source of guidance. One’s *opinion* as to how long he can hold his breath underwater, for instance, is rather less important than his *actual* ability to do so. Empirical questions should be answered empirically.)

A third source of significant bias is found in Question 2’s naming conventions of the “methods” themselves. Here, for example, respondents are asked to rate the effectiveness of the method entitled “Widen roads and add more lanes to improve traffic flow.” Before answering, respondents are assured of the apparent merits of this proffered method: They are directly told by the Survey that wider roads with more lanes do indeed “improve traffic flow”; it’s now their simple task to think about how much. In the minds of respondents this method must therefore be at least somewhat effective. It is, after all, one of the presented possible “strategic investments,” and it has already been “used to reduce traffic congestion” according to the Survey. Respondents are thereby systematically biased to *most* “over-rate” the effectiveness of methods that are actually *least* effective. This result derives from the difference between the Survey’s positive descriptions of ineffectual methods and their actual, negligible, merit; for those methods with the lowest empirical merit, the Survey’s descriptions differ most from reality and hence drive the greatest level of “over-rating.”

A fourth source of bias is found in the “not effective” to “very effective” ranking scale. Respondents are not given the opportunity to rate (and are thereby biased against thinking about) whether any proposed method makes traffic congestion worse. Respondents have no opportunity to disagree with the premise of the question and are forced, authoritarian-style, to affirm the positive aspects of a given method without any chance of rating it negatively. The very darkest possibility for any method, according to the Survey, is that it is simply ineffectual. Would that it were so.

A fifth source of biasing is that each method in Question 2 is to be rated solely on the basis of reducing traffic congestion and travel time. Each method is not rated on its broader effects either jointly with or separately from this single goal, and respondents are not tasked with considering each method’s implications for traffic collisions, fatalities, pedestrian and cyclist safety or access, pollution, noise, community health, costs, maintenance demands, or other priorities. This narrowing of respondents’ perspectives fixates consideration on automotive convenience without regard for other interests. Hence, respondents cannot voice a preference between two methods they view equally effective at reducing congestion but with dramatically different implications for other priorities. And respondents are implicitly told by this omission that reducing traffic congestion and travel time is the

singular priority of Bend's transportation system when that primacy has not been established. This is an example of "loading" survey prompts to elicit a non-neutral pattern of responses.


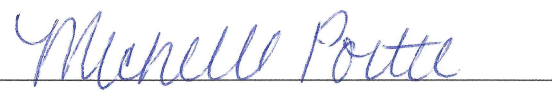
Further biasing – yet a sixth element – is found in the *absence* of certain methods for respondents to rate (including methods that have been empirically shown to reduce traffic congestion). For example, respondents are not asked to rate the effectiveness of making roads *narrower* and/or *removing* traffic lanes. Perhaps it is fair to say that Bend has not attempted these methods of congestion relief and so it would be misleading to ask respondents to rate something that hasn't been done in Bend. (Though these methods have been successfully used many other places.) Then again, perhaps it also would be fair to say that, if Bend has traffic congestion concerns, and if it has already tried widening roads and adding lanes, then simply repeating more of the same is pathologically unwise. If it is contended that the relationship between removed traffic lanes and reduced traffic congestion is too counterintuitive to expect respondents to recognize and fairly rate, then, likewise, the relationship between added traffic lanes and increased traffic congestion is too counterintuitive for respondents to fairly rate, and this method also should be excluded from the Survey. (This conflict between opinion and empirical fact underlines why empirical questions should be answered empirically, and not through lay opinion surveys.)

The foregoing criticisms focus on certain elements of the first part of the Survey for purposes of illustration. The essence of these criticisms is not limited to this part, however, and applies in full force elsewhere. For sake of brevity, and because this Survey does not warrant further exposition, we will not go through every instance of biasing. But it is pervasive.

The sum of these failures on the part of the Survey is sufficient grounds to dismiss any and all of its "findings."

One final component of biasing remains to be mentioned: Since it has been demonstrated that the Survey is biased and is designed to generate unreliable responses, its results should not be distributed to decision-makers, even if, at the time of distribution, it is noted that the Survey has faced criticisms of its methodology. Mere exposure to "data" with the imprimatur of the City or one of its consultants can bias decision-makers into according the figures undue weight. The only way to avoid polluting the decision-making process with biased data is to avoid distributing it altogether.

Thank you for your consideration.

  
Steve Porter  
Michelle Porter

## ABOUT THE AUTHORS

### Steve Porter

Steve is a recognized authority on economic analysis and valuation. He has provided expert testimony in high-stakes commercial litigation on topics including economics, valuation, statistics, econometrics, market definition, consumer choice, business strategy, and pricing, among others. He has consulted with Fortune 500 corporations on intellectual property licensing, asset transactions, and valuation issues, and he has conducted economic impact analyses, including work performed on behalf of the Los Angeles Superior Court. His articles have been published in the *Journal of Legal Economics*, *les Nouvelles*, the *Patent, Trademark & Copyright Journal*, the *Journal of the Patent and Trademark Office Society*, and *Intellectual Asset Management*, among others. He also is co-author of *IP Strategy, Valuation, and Damages* (LexisNexis), a treatise on intellectual property economics. Some of his work has been cited as authoritative in filings submitted to the Supreme Court and the Federal Trade Commission, and he has been quoted by and featured in the editorials section of the *Wall Street Journal*. He has been an invited speaker before the Chicago Bar Association, the Attorney General's Office of the State of Arizona, and various law firms and corporations, where he has lectured on topics ranging from economic analysis and valuation to econometrics and game theory. He is a recipient of the William J. McKinstry Award in economics, the *Wall Street Journal* Scholar Award, the Micronomics Economic Research Award, and the IE Fund Leadership Scholar Award. He served as a teaching assistant in economics at the Dolibois European Center in Luxembourg, an ad hoc referee for the *Journal of Forensic Economics*, and as Co-Chair and an Executive Committee Member of Young Professionals Advisory Council at the Farmer School of Business. He graduated *summa cum laude* and with University Honors from Miami University in Oxford, Ohio, completing dual majors in economics and marketing. He received his MBA, with honors conferred by the Dean and Board of Academic Affairs, from IE Business School in Madrid, Spain, graduating 5th in a class of more than 400. He holds the Series 65 securities license.

### Michelle Porter

Michelle is an expert in valuation, economic analysis, and quantitative methods. She has been engaged by Fortune 500 companies, SMEs, U.S. and international government entities, and leading law firms to provide expertise in high-stakes commercial litigations, negotiations, and asset transactions. Her consulting work has encompassed advisory roles in industries including pharmaceuticals, medical devices, banking, telecommunications, consumer goods, software, and transportation technologies, among many others. Michelle is co-author of the book entitled *IP Strategy, Valuation, and Damages* (LexisNexis). Her articles have appeared in *les Nouvelles*, *Intellectual Asset Management*, *Intellectual Property Magazine*, *Smart Business*, *Los Angeles Daily Journal*, *The Recorder*, and *China Intellectual Property*, and she has been quoted by *Forbes*. Michelle has spoken before such groups as the Intellectual Property Law Committee of the Chicago Bar Association, Google, and Motorola Mobility. Her work has been recognized with the Accenture International Consulting Competition Top Honors Award, the IE Women Leaders Scholarship Award, the *les Nouvelles* Best Article Award, and the Micronomics Economic Research Award. In addition, Michelle has served as an advisor to the Forte Foundation's MBALaunch for Women, President of the IE Business School Southern California Alumni Association, Co-Chair and Executive Committee Member of Young Professionals Advisory Council at the Farmer School of Business, and an instructor in microeconomics. Michelle graduated *cum laude* from Miami University in Oxford, Ohio, majoring in economics. She received her MBA from IE Business School in Madrid, Spain.