

From: [REDACTED]
To: [Clean Cars](#)
Subject: Clean Car Standard and Clean Car Discount
Date: Monday, 12 August 2019 1:33:57 AM

The discussion paper about the Clean Car Standard and Clean Car Discount is clearly focused on two ways to reduce the destructive effect of climate change. They seem to be worthwhile but, given the gravity of the problem, the paper needs to address the scope of the problem and the co-benefits and context of possible solutions.

The paper notes that, “The Ministry’s preliminary cost-benefit analysis of the proposed clean car standard indicates that it has a benefit-cost ratio of 3:1,” that the feebate scheme has a ratio of 2.4:1 and “The largest share of the benefits comes from reduced transport costs to households.” It also notes that, “Electric vehicles will help New Zealand reduce climate damaging emissions and harmful local air pollution.” Were those benefits considered in determining the benefit-cost ratios? They should be.

Also, please note that we in New Zealand will not be electrifying our fleet in isolation. All advanced countries will be pursuing the same goal and, indeed, some other countries already have moved well ahead of us in making the conversion. The combined impact of a global transition of vehicles to electric power and of power generation to wind and solar will place unprecedented demands on metal mining and refining. In themselves, these are energy intensive activities and will compete for resources with the replacement of two billion cars as well as the LGV and HGV fleet. For an authoritative analysis of this challenge, please read <https://www.nhm.ac.uk/press-office/press-releases/leading-scientists-set-out-resource-challenge-of-meeting-net-zero.html>

Another seeming oversight is the absence of any reference to alternative vehicles such as low-speed, all-weather electric trikes and quads, such as are now used by NZ Post. They could dramatically reduce embedded carbon cost because they weigh only around 100 kilos, about a tenth as much as the smallest cars. Also, they place much less demand on our electric grid as they require only one hundredth as much motor power, just one lonely kilowatt. And, they are fit for city use, at 30 - 40 kph, given the reduced speed limits now being phased in.

Postal delivery vehicles highlight the remarkable, growing use of cargo bikes to replace utes and vans for local business activities including goods pickup and delivery, and dispatch of maintenance and repair technicians and tradies. Some ebikes, trikes and quads can haul 300 kilos and still have a far smaller carbon footprint and urban infrastructure requirements than even the most efficient electric car.

Government has also adopted a policy of promoting “active transport,” that is, walking and cycling. Active transport is rightly recognised as have substantial and varied benefits - better health and less costly health care; greater social cohesion and human well-being; much lower infrastructure and vehicle costs; and reduced demand for expensive urban land. Compared even to electric cars, with their substantial embedded carbon cost, active transport has a minuscule carbon footprint. For more on these co-benefits, please see

<https://www.treehugger.com/bikes/study-finds-e-bike-riders-get-much-exercise-riders-regular-bikes.html>

E-bikes require only tiny, 300-watt motors and the proposed feebate would cover entire cost of a new e-bike. Government could get zero emissions without complicated feebate steps or computing fuel consumption. Government could actually save money by simply giving away virtually zero-footprint electric bicycles for use in our growing cities. Skeptics may say that a mere bicycle is not a serious response to a serious problem but, once you have tried an e-bike and reviewed the impact of cycling in Europe, you know that they fully fit for purpose.

We have had cities for millennia and cars for 100 years. Mixing them has been a deadly, failed experiment. It is time to look to our past for a better future, as in the leading European countries. The Netherlands, since 1973, with just 3% of their land transport budget, has built a national network of protected bikeways. Antwerp has transformed its traffic in just twenty years. Many other modern cities are rejecting the auto-centric traffic management model in favour of a people-centric human well-being goal.

There remains a place for larger, more powerful motor vehicles, on the open road. These may best be fully electric and would include goods vehicles, buses and even cars. In our cities, however, where pollution and congestion are growing problems, there is a real need for radically less dangerous and demanding transport. This discussion paper may not be the place to explore these related issues in any detail but, it would be good to note their relevance. At best, the proposed Clean Car Standard and Clean Car Discount do not provide the many benefits of active transport and are only modest responses to the existential threat of the climate emergency.