



## Episode 99: Does A Greener Car by Any Other Name Save as Much Fuel?

*with Adrian Camilleri, Associate Professor of Marketing at the University of Technology Sydney Business School.*

*Adrian Camilleri provides an overview of his research nudging greener car choices: He shares his earlier work testing different fuel economy metrics and activating different purchase goals. Adrian also gives us a sneak peek into his ongoing research exploring personalized nudges--the idea that different folks respond to different nudges, and that matching the right nudge to the right person might best help them achieve their goals.*

### Transcript:

---

KIRSTIN APPELT, HOST: Welcome to this edition of Calling DIBS. I'm your host, Kirstin Appelt, Research Director with UBC Decision Insights for Business and Society or DIBS for short. Today, we're calling DIBS on Adrian Camilleri.

Adrian is an Associate Professor of marketing at the University of Technology Sydney Business School, and Adrian's explored a few different areas of human behaviour from his bachelor's degree in psychology, Master's degree in organizational psychology, and PhD in cognitive psychology, all from the University of New South Wales.

He also did a post-doc in marketing and management at Duke University, and it was during that time that Adrian and I first crossed paths, as we were both affiliated with the Centre for Research on Environmental Decisions. And even though we were at different schools, I heard about Adrian's research and I thought it was really innovative, and that remains true to this day. So it's something I'm really curious to and get everyone to learn more about, because I think it's a really nice marriage of innovative, interesting and impactful, which is not always a combination that you get.

So excited to have Adrian with us today. Welcome, Adrian.

ADRIAN CAMILLERI, GUEST: Thank you for inviting me.

APPELT: So can you tell us a little bit about yourself?

CAMILLERI: I grew up in Sydney, and I live there now. I'm speaking to you from Sydney, and I live with a wife and two young daughters. I work at the University of Technology Sydney, in the business school there, in the marketing department. And I'm also the director of the UTS behavioural lab. And I teach and do research on consumer behaviour, with a focus on judgment and decision making and how managers and consumers make decisions.

And if you want a little bit of a personal anecdote, when I'm not doing research or teaching, I'm glued to the TV watching Survivor. I'm fascinated by how those castaways, with their limited information and no food and

shifting alliances make their decisions-- sometimes good, sometimes bad. And I love watching the exit interviews as they try to recreate their thinking process behind how they made those decisions.

APPELT: That would be interesting research mapping how their narratives match their actual decisions. Well, I always like to ask folks about how they came to behavioural science, because I find that everyone's journey takes its own twists and turns. So how did you get to be in the position of working in behavioural science?

CAMILLERI: At the end of high school, I tried to figure out what I wanted to be when I grew up, and I decided it was an organizational psychologist, which I think I kind of understood at the time as being someone who applies psychology to make businesses run more effectively. It was vague... that was probably something I read in a book somewhere, but the educational path was clear. In Australia, I needed an undergraduate psychology degree, and then I needed good enough grades to get into an honours year, and then I needed good enough grades to get into a master's program.

And then during that honours year, I get to do a research thesis. And I ended up studying how memory and learning are impacted by the context that you're in. And so this was my first experience with how research is done. And turns out I really enjoyed the process of trying to learn something new. So suddenly this new career path as a professor became an option. And thankfully at the university that I was at, I mentioned earlier, University of New South Wales in Sydney, they offer a combined Master's of Organizational Psychology degree with a PhD, which I decided to take to kind of hedge my bet.

So I was taking classes. I was doing, as part of that master's degree, you have to do 1000 hours of work placements. And then at the same time, I was doing research on how people make different decisions depending on how they learn, whether from description or experience. And so I think those thousand hours of work experience was really helpful in helping me make a decision as to which career path to choose. The thing that turns out I really valued was being able to choose my own research topics, and that's something that you don't get to do usually in a for profit organization.

So I decided that I'd aim for the career path, but one that was very applied, that would allow me to work with organizations. And so it's still kind of aligned with the goals of my 18 year old self. So then I pursued the postdoc at Fuqua Business School at Duke University and was working under a grant at the Centre for Research in Environmental Decisions, which you mentioned, because that was affiliated with Columbia University. And that's when we met sometime around 2011 I think it was.

APPELT: Speaking of 2011, and back in the early 2010s, which is now longer ago than probably either of us would like to believe, like I said, that was when your research first got on my radar. And at the time, I was kind of struggling with this idea that, as an academic, a lot of the problems we would work on are theoretically interesting, but sometimes they're quite removed from real world problems.

But I thought it was really neat that the work you were doing, even back then, when it was a little less common, was already managing this combination of being theoretically interesting and directly related to everyday decision making, which hearing what your 18 year old self was hoping to do, it makes sense that you got there before me.

But all that's like a long preamble to introducing, you had this 2014 paper on how different fuel economy labels can influence people's decisions when choosing a car to purchase, and I was hoping to hear more about this work, and maybe first starting with a bit of background on the study. Why you were looking at labels, and what kind of car purchases you were hoping to nudge?

CAMILERRI: Yeah, so I was interested in labels because I think they're a great choice architecture lever. So, it's just information at the moment of choice. And, little anecdote, at the beginning of this project, I actually pitched the idea to my supervisor, this is professor Rick Larrick, that we should study the labels that go on household water tanks, you know, things that heat up your water. And I just thought cars are a little bit maybe too messy because there's so many different motivations behind why people buy a car. But Rick correctly advised that nobody really wants to hear about how consumers buy water heaters. So I think he was right.

So we decided we were going to look at fuel economy labels, which are put on cars. And when you buy a new car in the US, in Australia, many other countries, you see this fuel economy labels stuck onto the window of the car. And it's really telling you the efficiency. How is the fuel of this vehicle going to perform relative to other vehicles? And obviously you can look up this information online as well. I think it's important because it's something that's mandated by the government. So, it is providing objective information at a moment when you're considering many other factors like the price, the model, the features.

And so, I guess when I was imagining the scenario in which consumers were looking at this label, it's kind of like a typical showroom trade off, you know, comparing vehicles in that showroom. Some are more expensive but they're more fuel efficient. And so, as a consumer, you're trying to make that trade off, whether that front cost is going to be worth it in the long run. And so, we thought that adjusting what information is on that label could be a very cost effective way to kind of tilt those decisions towards more fuel efficient vehicle purchases without restricting choice.

APPELT: Interesting. Yeah, now, I would have agreed, with Rick Larrick. At the time, I would have said no one's interested in water heaters purchases, but having now purchased a water heater, I'm very interested.

So now that, I think, that your target audience there is like the middle aged homeowner who is very keenly interested. So at the time, in the early 2010s, the fuel economy labels in the US and fuel economy in general was more often discussed in miles per gallon. What else did you look at? What other kinds of labels and what was kind of the set of things you explored?

CAMILLERI: So miles per gallon or MPG is something that Rick Larrick had previously done a lot of research with Jack Saul. And they had coined the term the MPG illusion, which is this realization that MPG has a curvilinear relationship with cost, and most people don't realize this. So, for example, if you're jumping from like a 10 to 15 mpg vehicle, it's saving more fuel than jumping from a 30 to 35 empty vehicle. So it's a five MPG jump in each case, but it's actually a bigger fuel savings at that lower end.

And so, one of the changes that came in around the early 2010s, right around the time that we met and this postdoc was happening, was the US had changed their fuel economy label, moving the emphasis away from MPG and including a new metric on the label, which was gallons per 100 miles. And this is a straight consumption metric. It's already used in Europe and Australia. So it was quite familiar to me, and this has a linear relationship with cost. So if the thing that you're trying to calculate is how much am I going to spend on fuel, then this is the metric to look at.

And in fact, the new label had a cost metric, not just one-- actually two. So there was annual fuel cost, based on some assumptions as to how many miles are being driven and what the fuel cost per gallon was. And then there was also a metric "you save" or "you spend this much in fuel cost over five years". So we were kind of inspired by this.

So we had an experiment where we invited consumers to make a series of choices between a car purchase scenario where there was a base model that was lower priced, but it was less efficient, and that was up

against a more expensive vehicle, but it was also more fuel efficient. So, depending on the driving distance expectations and the cost of fuel, one was going to be more cost effective than the other. And what we were changing in this experiment was both the way that we were expressing fuel efficiency and the scale that we were expressing it on. So, we had two different metrics for fuel efficiency.

The first was this gallons per 100 miles, which I expressed earlier, just a direct consumption figure. And then we also tested the fuel cost in dollars, again based on some reasonable assumptions that we had. And then we also tested three different scales. So we had the per 100 miles scale, which is the status quo size used on US window stickers. Then we also tested 15,000 miles, which we estimated was about one year's worth of driving. And then we also tested 100,000 miles, which we estimated as being essentially the vehicle lifetime or, not the vehicle's lifetime, but the extent to which a typical driver will own a vehicle before they sell it on.

And so, we felt that these metrics would be more relevant to the consumer than MPG, because it's how much you're actually pouring or paying at the time. And we were interested in testing those different scales because the per 100 miles is a short distance. It's something that you would do maybe in less than a week. We're really trying to get people to think a little bit longer term than that.

APPELT: It's really interesting. And also I'm thinking it must have been interesting research to do because at the time I think gas prices were lower. And so I'm curious both what you found then, but also, you know, how the situation has evolved. So what did you find back in the 2010s when you were doing this?

CAMILLERI: So in terms of what we found, it was what we predicted, which is that the metric and scale combination that led to a highest preference for more fuel efficient vehicles was when we expressed fuel efficiency in terms of the cost over 100,000 miles. In general, when we expressed fuel efficiency in terms of cost versus in terms of consumption, we put a bigger emphasis on fuel efficiency, and we saw that result in a high proportion of fuel efficient vehicle choices. And in terms of scale, we actually saw a U-shaped function. So we were expecting to see a linear function. The larger the scale, the more people would pay attention to that number. But it was actually U-shaped.

So 100,000 miles definitely had most... it was most attention grabbing. And I guess one of the reasons for it is that when you think about the cost of gas over 100,000 miles, it becomes the same cost as the vehicle itself. So in one of our scenarios, we had a vehicle that was upfront, costing \$18,000, and then the cost of gas over 100,000 miles was going to be \$20,000. So it's actually going to cost more than the upfront cost. So that made sense that people were paying a lot of attention to that \$20,000 in fuel.

What we were surprised by was the fact that the 15,000 miles actually had a bit of a dip, and we had two explanations for that. One was that 100 miles is familiar, and it's also very easy to multiply to your individual driving behaviour. And similar story for 100,000 miles, whereas 15,000 miles is difficult to work with and not familiar to most consumers. So that was our explanation for that.

So in the end, the main takeaway was that if you really want people to pay attention to fuel efficiency and really lean or nudge them towards more fuel efficient vehicles, then putting the cost of ownership, which would include that upfront cost, but also the expected cost of fuel over the lifetime of the vehicle, that is going to be the most effective nudge, and it's essentially a zero cost label tweak. So one of the things that we love about nudges and choice architecture.

APPELT: I think your explanation makes a lot of sense of the idea that it's... essentially you're thinking about like the cost of a car and then you're doubling it. So it's like the cost of buying two cars. And that really would,

you know, be very salient in people's mind. Whereas 15,000, I think for most of us, if you ask us how many miles we drive per year, we don't have that number handy. And so yeah, that makes a lot of sense.

Continuing on this theme of choosing more fuel efficient vehicles, you've done more work on this topic, and you have a 2018 paper that explores the different goals people might have in mind. And you already mentioned this kind of, like people might be thinking about cost and fuel efficiency, etc. Tell us more about this second project.

CAMILLERI: Right, so we started with this finding that fuel costs per 100,000 miles nudged bias towards more efficient cars. So we were wondering why this equivalent information, in this case for fuel efficiency, sometimes matters and sometimes doesn't seem to matter?

And this is beginning my kind of thinking into why different nudges affect different people to greater or lesser degrees, which I think we'll talk about later on. So this second project, and this was done in collaboration with Christoph Ungemach and Eric Johnson, and again, Richard Larrick and Elke Weber. We introduced this idea of a translated attribute, and this is a single attribute, in our case fuel efficiency, that can be translated, and I'm putting inverted commas in the air right now, into different expressions.

So it could be money saved or gallons burned or tons of CO<sub>2</sub> produced. And each translation subtly highlights a different goal that you might be pursuing. Maybe it's a financial goal or a resource use goal or sustainability goal. And so we proposed in this paper that's a particular decision that the choice architect makes in terms of what translation are we going to put on the label, it acts as a decision signpost. And this signpost has two features: firstly, it activates goals. So it might remind you that you have a certain goal in a certain context which maybe you're not thinking about at that time.

So in our case, we're thinking maybe if somebody is pro-environmental, they want to make sustainable consumption decisions, but at the time of choosing a vehicle, they're not thinking about that because they've got so many other variables in mind. And the other thing that a decision signpost does is that it points you in the direction. So if you care about this, then this is the option for you. And I remember at the time, we, the authorship team, really debated what to call this idea. I've called it translated attributes naturally, but at the time I remember there was intense debate over what it should be called. And I tried to dig up the old emails to find what the alternatives were, but I couldn't find it, unfortunately.

APPELT: It is funny how the nomenclature evolves in these projects. I don't think I've ever had a project where we went with the same terminology throughout the entire project, but I really like decision signposts because I like how you said it kind of both activates the goal, and points you in the option that will meet that goal or best meet that goal. And so you said folks often have different goals in mind.

Can you tell us a little bit more about the different goals and how you tried to activate them with the different signposts?

CAMILLERI: Yeah. So in this study, once again, we were using experiments where participants were choosing between pairs of cars and choice scenarios where we were changing the efficiency metrics that were being presented, as well as how many of them.

Again, I've got a memory here. The first time we presented this, it was around Halloween, and I remember we titled the talk "Trick or Treat". And I'll explain why in a minute, because what we did was we had... sometimes we presented fuel efficiency metrics in terms of cost, sometimes in terms of consumption, and sometimes in terms of a sustainability score. This 1 to 10 score that corresponded to essentially how much CO<sub>2</sub> was

emitted. But these metrics were perfectly correlated with one another, so they were direct translations of one. So if you gave me one, I could tell you what the others were going to be.

And we either presented participants with 1 or 2 of these translations. And in one sense, presenting two translations is redundant information, because if I tell you the consumption, like how many gallons of fuel is consumed per 100 miles, you can work out the fuel cost, and you could also potentially work out the CO2 emissions with a couple of assumptions.

But what we found is that by presenting two instead of one efficiency metric, we were nudging consumers towards choosing a more fuel efficient car. So this was kind of a trick part of the title, because we've given two pieces of information, but they're actually the same piece of information, fuel efficiency, just expressed in two different ways. But then we also had what we were calling the treat. And the treat was the idea that these additional translations, these other expressions of efficiency, are acting as decision signposts, and they're activating the sustainability goals.

And the way that we presented evidence for that was we measured people's environmental values and we mapped those out. And what we found was that when we did not present any expressions of fuel efficiency in terms of CO2, those who said that they were pro-environmental, they didn't act like it. It was like they weren't pro-environmental, even though they apparently were. However, those same people, when we did present a fuel efficiency metric in terms of CO2, suddenly they did act on that value.

And so, the conclusion that we drew was that people can't act on their goals if they're not reminded of those goals, and then pointed towards the appropriate option. So that's what we think having these translations can have this impact on different people. And it also helped to defend, I think, the design of the fuel efficiency sticker, because it had lots of metrics all over it, really busy. And one of the, I guess, criticisms was that it was too much information. But I think one of the conclusions I drew was that having different translations on the label can be beneficial, because those who care about a particular goal can zoom in on that metric and ignore the others.

APPELT: Yeah, that strikes me as a really classic nudge type study in the idea that, you know, people have these intentions and then they struggle to act on the intentions and the things that make it easy work because people aren't necessarily making these translations themselves, whether because they don't know how to or it doesn't come to them in the moment or, you know, any other number of reasons. So I like that it goes against, you know, classic economic thought of, you know, provide the information once and that's all you need to do.

And it also kind of goes against some evidence that, you know: simplify, only do things once, make things as clean as possible. But it points out that sometimes having these translations is really useful. And so I want to give you an opportunity to say anything else you want about this study, but I'm curious if this is a bit of a bridge to your idea of different things work for different people, and so personalizing nudges. But any last thoughts on this study?

CAMILLERI: No, I think you're right. This was kind of the seed that led to the next project, which is more about focusing on differences between consumers.

APPELT: Perfect. Well, then let's go there. So flashing forward, we're now in the 2020s. People are still buying vehicles of different types. And you're still doing research on these purchases. And now you're looking at the idea of encouraging the purchase of electric vehicles using personalized nudges.

And I think some folks are familiar with the term personalized nudges. Some aren't. So can you tell us what they are and how they're different and why they're interesting in a theoretical context?

CAMILLERI: Right, so in marketing, we're always hammering home to students. You need to segment your audience and target them with appropriate messages. In fact, I am teaching a class this afternoon. That is going to be one of the main takeaways. But by and large, we're not seeing this in the kind of nudging literature. We've just been giving the same nudge to everyone.

And in the two studies I've described to you so far, that's what we did as well. So personalized nudging aims to take those same behavioural toolkit, the defaults, the framing, the translations. But now the tool is basically fitted to the driver. So we, rather than give everyone the same nudge, we're tailoring the nudge to the one that we think is going to be most effective for that individual. From a theoretical perspective, we argue that there are two types of personalized nudges. The first is called choice personalization. And here the thing that's being personalized is the outcome that we're nudging people towards. So we are tailoring which option is being highlighted or recommended.

So in the previous study where we were nudging people towards vehicles, we would personalize based on your values and your driving behaviour. We think this is the vehicle for you and we would maybe default them to that. The other type of personalization is called delivery personalization. And here what's being personalized is the type of nudge that's being delivered. So for one person we might give them a default nudge. Somebody else we might give them a social norm message. Somebody else we might give them a reminder message.

So in order to be effective, personalized nudges need three things. So first, we need a toolkit of nudges that have ideally previously proven to be effective in that context. So we've got our toolkit. Second, we need to be able to measure some relevant variables that we can segment groups based on. And then third, we need to be able to figure out how we match up those nudges in our toolkit with the different segments that we've created. And if we can do those three things, then we have personalized nudging.

APPELT: And talking about all the different components you need in that triangulation, you can see why that wasn't nudge 1.0, it's more of nudge 3.0 where we've advanced the field more. I remember working in, I guess it was like the mid 2010s on a project where we tried to personalize and we just didn't have the richness of data to figure out what worked for which people.

So it's exciting that the field is now getting there. I think it's still early stages, but we're seeing hints of this. So can you tell us more about some of the personalized nudges you're testing?

CAMILLERI: Yeah, so this is work that's been done with a PhD student at UTS, Nathan Moore. And so we're again studying car choices, again, in this context of presenting a scenario, here are some, options. Which one would you buy if you were in the market for one?

And so in this context, we do have a range of tools or nudges that we know are effective. So we have nudges that highlight options, nudges that frame relevant information, we've got nudges that make it easy to choose an option such as its location on the web page. And we have nudges that influence intrinsic motivation, such as sharing social norm information.

And in this project, we're really trying to nudge people towards electric vehicles and social norms. It's a good one because we are seeing year over year increase in the proportion of people buying EVs. So we have that first element down. We do have a toolkit of nudges that we know are effective. In terms of the variables that

you can segment groups based on. Obviously, you can just go with demographics such as age or gender or location. This will be an improvement on what we are doing currently, but I think you can do much better than this. And we've tried to come at it from two different perspectives.

So one way that we try to segment is based on the psychological barriers that people have that are basically blocking them from purchasing an EV. So these can be range anxiety or charging anxiety, or maybe they're discounting the future savings from not having to buy fuel, or they have perceptions of safety concerns. Or maybe they imagine EVs are not masculine enough for them. So once the major barrier is identified, then we can handpick a nudge from our toolkit that directly targets that barrier.

So for example, if range anxiety is the problem, then maybe we can present personalized examples of the number of trips you'll be able to take before needing recharge. And that number is usually surprisingly large. Or if you're under appreciating the ongoing savings, then we can present maybe personalized total cost of ownership based on your driving behaviour. So one strength of this kind of psychological barriers segmentation approach is that it's context specific. So we're really targeting the barrier for you. So I think that's likely to increase the effectiveness of this kind of personalization.

On the downside, what we've learned in this context is not likely going to extend to other contexts. So if we learn something in this project about your car purchasing behaviour, it's probably not going to extend to your food purchasing behaviour. So with that in mind, another approach we've been thinking about is how to segment based on psychological profile of the individual, which is going to be consistent across contexts. So things like your personality, your decision making style, your personal values.

So the idea here is that we can link certain nudges in our toolkit to certain psychological profiles. For example, those who are more inclined to make quick decisions, maybe they're more affected by a default nudge, whereas those who are more inclined to make slower decisions, they might be more affected by an informational nudge. So we've run a series of pilot experiments so far trying to see if we can put these pieces two and three together to link to the toolkit that we already have.

APPELT: That's really interesting. Makes you think of the idea of, are the nudges that work for a given person something that is chronically true about them across situations, or is it acutely true based on certain types of decisions, or is it a combination? So I think that's a really generative area of research. I'm curious, how do you actually learn about the people to learn about their barriers or their profiles? Is that through directly asking them or observing choices, or how do you do that?

CAMILLERI: Right. So that is one of the barriers to overcome, because we obviously need to have this link between profile and nudge that's going to be most effective. So the way we are starting is to have people in the lab or online and just measure this all upfront. So I guess the ideal study might be in week one or time one. We measure psychological barriers and decision making style and personality. And then have come back at time two, and then have them participate in the hypothetical choice study and then look for interactions.

So look, if we can see if there are relationships between, oh, this certain profile is more impacted by this nudge. And that creates the knowledge that we need, that's step three of that 123 step process I went through earlier. And then you test that in a new sample. So bring in a new sample, measure them upfront, and then target them with a nudge versus a randomly allocated nudge. And then hopefully you see this improvement in nudge effectiveness based on the targeted nudge as opposed to a randomly allocated one. And so I guess the main finding at this time is that it's really hard to do.



We have definitely not cracked it yet, because there is a lot of unanswered questions in how you take that constellation of cognitive barriers or a full psychographic profile or both, and then link it to the large amount of data that we've collected, and then then choose one single nudge, ideally in real time. So I think we're going to need a couple of more years to really crack it, and maybe I'll come back to the podcast and then tell you what we found.

APPELT: So you are going to collect waves of data, and this is all going to be based on hypothetical tests, or do you have any like long term aspirations of doing field studies on this?

CAMILLERI: I always have long term aspirations for field studies, and also have aspirations for... how do we not have to do that upfront survey? Because it's not realistic to require all customers to please complete this survey, so that we can personalize nudges at you. So we're looking for ways in which we can shortcut that step by making assumptions as to what people's... maybe what their psychological barriers are or what their decision-making style is based on information that we already have.

And that depends on which organization you're working with. But let's say you're working with a bank, or maybe a grocery store. They have lots of data on you. And there is a growing body of research where they are inferring or estimating things like your cognitive attributes, like your personality, based on your pattern of responses or your previous purchases. And so it doesn't require that upfront step of getting customers to fill in that survey. Or maybe you can get a small segment of customers to fill in that survey, but then use existing data that's within the company already to make inferences about, okay, we don't have this survey data for all of our customers, but we can estimate it based on this small sample that we did collect that data for.

So, I mean, in this ever increasing world of AI, and additional data streams about us, I think the likelihood of real time personalization increases every year.

APPELT: That is really interesting. And I'm curious, we don't have to go there, but if you are willing to go there, do you have thoughts on the ethical side of this? Because it's already happening. We are already being pushed different ways based on our psychological profiles by organizations, but this would potentially be doing it to nudge people towards environmentally sustainable choices. But then sometimes that's something people push back against. So have you thought about that idea at all?

CAMILLERI: Yeah. So whenever I'm thinking about personalized nudging, ethics is definitely in the conversation, because one concern with nudging is that we're taking away autonomy from people and perhaps using information about them in a manipulative way. And this seems especially heightened for personalized nudging, where now information privacy is also really important. So at the end of the day, there is this power asymmetry between the choice architect and the person who's being nudged, and that power asymmetry increases when we are thinking about personalization.

So one way to sidestep that entire set of concerns is to expand on what's been called self-nudging. And this is the idea that the person whose behaviour we are trying to change is included in the discussion about how to change that choice architecture. I think that's a really important and under-researched area. That's also one that we are investigating and maybe again, can come back in a few years time to tell you more about how self nudging can be applied.

APPELT: Very cool. Yeah. It seems like there's lots of future directions for this research. Are there any... I know this is still ongoing research, but anything else you want to share about this? About, you know, where it is now or where you see it going?

CAMILLERI: I think we've tried to look at different contexts. So today we've been focused on cars, but we've also been looking at food choices. And in that context, the behaviour that we're trying to encourage is to move people towards more plant based meals, which tend to have lower carbon footprints. And so I think it's important to choose multiple contexts to try to study the same nudge or theory. Because in this case, car choices are really unique. It's a purchase we don't make very often, and it has a number of additional implications for things like your status.

And so when we look at food choices, something that we are doing every day and doesn't carry some of those same status implications. And so we're pursuing both contexts with the same theories and hoping that we can come to similar conclusions. And if we do, I have increased confidence that what we're doing is going to be generally true across some other contexts that we haven't tested.

APPELT: Like water heaters, bring it back around. Well, this research is really interesting, and I love that it's some of the things that have been in the back of my mind. But once again, like in the early 2010s, you've gotten there first and you're already well into the research that is still in the back of my mind, so it's really interesting to hear about some of the stuff around personalized nudges and self nudges. One thing we always like to do in the podcast, because many of our listeners are folks who are newer to the field of BI, is ask if you have a message for people who are new to the field or who are just learning about BI.

CAMILLERI: So for practitioners, I think one of the first steps should always be to try to figure out how to diagnose what is the dominant goal of consumers or citizens in that decision context? Is it cost, health, time, status, sustainability? And then think about how you can set up the choice architecture to provide signposts for those people, to help them achieve those different goals.

And then taking that a step further, where possible, try to figure out the dominant goal for each individual. And now we are really trying to handpick from our toolbox of nudges to uniquely help each individual. So it starts with diagnosing the dominant goal for the group, but it becomes even better if we can do that for each individual.

APPELT: So essentially get everyone working on the research project together.

CAMILLERI: That can't hurt.

APPELT: I always try to do good interview hygiene and offer any last thoughts, any questions I should have asked and didn't think.

CAMILLERI: It's always important to test, test, test. Because so many of the things that we read about in papers, when I've tried to apply them outside of the laboratory, sometimes they don't translate. Sometimes it's really difficult to take the manipulation that the experiment as used in that study and how would that look in front of real customers? And so, testing manipulations that a company or an organization or a government would actually use, as opposed to one that could be used in a laboratory, but no real organization would actually do that. I think that's critical. So it's great that we are testing these things in the laboratory, but then testing them out in the field, and partnering maybe with academics who are testing these in the laboratory, but then testing in the field, I think is super important.

APPELT: Yeah. And that also goes to your point about testing across contexts. Something that works for car purchases may not work for food purchases, so either we have to find the core idea that does translate, or be careful that we tweak for each setting and test for each setting. And as academics who are always looking for data, I think we're always looking for partners. That can be a bit of a call for new partnerships.

CAMILLERI: Sure.

APPELT: Well, thank you for joining. I know this is just a small snippet of your work and we just teased the ongoing research and didn't even get to all the results for the latest research. It's still ongoing, so we'll have to bring you back multiple times to hear about your work on food choices and how this work evolves. But thank you for doing such innovative, impactful work and for sharing it with us.

CAMILLERI: Thank you for having me.

APPELT: And thanks to our listeners for joining another episode of Calling DIBS.

---