My Mother the Car (or Why It's a Bad Idea to Give Your Car a Personality)

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Abstract—**What happens when we endow an autonomous vehicle with a personality? It sounds like a good idea—witty banter, friendly advice, and encouragement from your car. But science fiction writers predicted this technology and both the good and bad scenarios that could arise. A brief sample of some of these situations from American television and film is enlightening but suggests that granting a personality to an auto is ill-advised. This theme issue explores the state and potential benefits and ethical dilemmas of connected and autonomous vehicles. While fully autonomous vehicles are already experimentally deployed, they will become ubiquitous within a few years. Soon after we should see an experimental deployment of vehicles that have a level of artificial intelligence such that they could be considered "sentient" (self-aware) or even "anthropomorphic" (human-like). These vehicles could do much more than self-drive or give us driving advice, travel information, and various forms of infotainment. They could also remind us of important stops to be made, listen to our complaints about traffic and other drivers, and even provide us with soothing advice. And this advice could be given with the benefit of an artificial personality—one that could be formal, friendly, or even replicates that of a famous person, celebrity, or a loved one.**

■ **BUT ADDING A** personality to the car could make things worse, as predicted by writers of science fiction novels, short stories, television plays, and movie scripts. Let us review some examples from American film and television.

ANTHROPOMORPHIC VEHICLES IN AMERICAN FILM AND TELEVISION

In the early silent short, *Nothing Matters* (1926), the hero dreams of "anthropomorphic cars cowering and fleeing in fear of the new car in town"[1] an interesting twist on the idea of communicating (connected) cars. The vignette raises several interesting questions. For example, will anthropomorphic vehicles form cliques, show prejudice or discriminate? And will connected vehicles organize to give preferential treatment to certain types of vehicles, for example at merge points?

In a 1953 public service announcement (PSA) film, *The Talking Car*, a fatherly vehicle advises children about safe street crossing. In a later

version of the PSA (1969) a trio of vehicles (each, with a very distinct personality) sat in judgment of a young boy who disregards basic street crossing protocol. These PSAs raise questions about the extent to which smart vehicles will have authority over humans, how they may cooperate, and even if their "testimony" will be admitted in courts.

In the short-lived and forgettable TV series, *My Mother the Car* (1965–66), a man discovers that his car hosts the reincarnated spirit of his deceased mother. Talking through the radio of a 1928 Porter Touring car (this was an anachronism since the dashboard radio wasn't invented until 1930), the protagonist, Dave (played by the actor, Jerry Van Dyke, who turned down the role of Gilligan in the much more successful, *Gilligan's Island*, for this clunker of a show), is pestered, advised and loved by the car. But mother also exhibits human emotions such as anger, jealousy, and greed.

In addition to these emotions, cars could also be heroic. For example, the namesake car in the film *Chitty Chitty Bang Bang* (1968) (this is a British film, but it enthralled me as a child, so I am including it in this brief survey) is self-aware. This 1900s era modified roadster was autonomous and could anticipate the need to sprout pontoons and a propeller for water travel, or wings for the flight to rescue its human family from an evil baron.

An internationally successful film featuring another heroic car, *Herbie the Love Bug* (1968), spawned four sequels over 40 years. Herbie was self-driving, sentient Volkswagen Beetle with a mischievous, loyal, and loving personality. Time and again, even while causing trouble with his antics, the precocious Herbie managed to rescue his owners from various predicaments. Similarly, the vehicle in the animated "Speed Buggy" television program (1973) featured a goofy talking car who heroically participated in the human protagonists' mystery-solving adventures.

The popular TV series *Knight Rider* (1982–1986) starred K.I.T.T., a sentient Pontiac Firebird powered by a "Knight 2000 microprocessor." K.I.T.T. was self-aware and capable of learning. In addition to providing navigational aid and entertainment, the car helped his crusading driver Michael solve crimes and resolve many dangerous situations. The vehicle also exhibited a very human-like personality that was egotistical, stodgy and funny.

Cars such as K.I.T.T. could not only save the day when called, they could also act autonomously and proactively. For example, the "muggle" car owned by the Weasley family in *Harry Potter and Chamber of Secrets* (1998 novel, 2002 movie) anticipates Harry and Ron's need for rescue from the giant spider den, arriving in the nick of time. More recently, the *Cars* (2006 *et al.*) and *Transformers* (2007 *et al.*) movies and sequels have featured vehicles with human-like personalities, ambitions, and even expressing love. Of course, the main premise of the *Transformers* movies and television program featured the epic battle between the heroic autobots and villainous decepticon vehicles.

DANGERS OF SENTIENT AND PSEUDO SENTIENT VEHICLES

What happens when a "self-aware" vehicle errs, gets confused, or turns bad? Movies and Television have covered this aspect quite well. In an episode from *My Mother the Car*, "What Makes Auntie Freeze," Mother gets "drunk" on antifreeze leading to all kinds of erratic behavior. In the episode, "I Remember Mama, Why Can't You Remember Me?" Dave's mother gets amnesia following a fender bender. Even K.I.T.T. could be obstinate with Michael and Herbie could be prideful and stubborn.

The movie, *Total Recall* (1990), which was adapted from a 1966 book, predicted autonomous taxis and some of the problems they can present in the case of misunderstanding. In one case, the helpful "Johnny Cab" confuses the destination when the protagonist shouts expletives. But Johnny Cab exhibits even worse behavior when the fare is not paid—the heretofore obliging cab turns homicidal and tries to run over the hero.

Self-awareness can also lead to paranoia. The evil car from in Steven King's *Christine* (novel and movie 1983) involves a possessed 1958 Plymouth Fury that exacts murderous revenge on the enemies of its owner. Both K.I.T.T. and Mother exhibited some signs of paranoia at times—what if they had completed turned evil?

And what happens when an anthropomorphic vehicle impersonates a human in some sort of

Turing inspired nightmare? *My Mother the Car* foreshadowed this possibility too. In the episode, "TV or Not TV" Dave puts a TV in the garage for Mother, who creates a dilemma when she calls into a game show and wins a chance to appear on live television.

While the premises of these situations seem ridiculous, it is easy to imagine a computer virus or malware negatively altering the "personality" of an anthropomorphic to manifest analogously.

ROAD AHEAD

Artificially intelligent vehicles should provide great benefit, but new risks could emerge as the capabilities increase. Adding a personality to a vehicle will increase these risks. Some of the risks are simply annoying—do we need our cars hectoring us about our weight or driving habits and acting like an overbearing mother? Or do we need the car interrupting the radio to tell us we are going too fast (or reporting us to the police). But, more significantly, what happens if the car becomes capricious, supercilious, paranoid or goes berserk?

Science fiction writers have shown us the potential benefits and real dangers of anthropomorphic vehicles. Most of these dangers are related to the car violating our trust and untrustworthiness is a personality flaw. While much more research work is needed in this area (e.g., Future of Life Institute https://futureoflife.org/) I think we just should not give cars personalities. Most people trust their mothers, if we cannot trust our mother the car, which car can we trust?

■ REFERENCE

1. J. Roots, *100 Greatest Silent Film Comedians*. Lanham, MD, USA: Rowman & Littlefield, 2014.

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