

## Notes About the Model

**Generally** we attempt to follow the methodology from the paper:

Hamza K, Chu KC, Favetti M, Benoliel P, Karanam V, Laberteaux KP, Tal G (2020) Validity Assessment and Calibration Approach for Simulation Models of Energy Efficiency of Light-Duty Vehicles. *SAE World Congress*, Detroit, MI, USA, 2020-01-1441

DOI: <https://doi.org/10.4271/2020-01-1441>

**and More Recently...** the paper:

Hamza K, Benoliel P, Chu KC, Laberteaux KP, (2022) Extended Modeling, Calibration and Validity Assessment of Vehicle Models in Future Automotive Systems Technology Simulator via Real-World Driving Data. **Presented at** SAE WCX 2022 ([pre-publication draft](#))

**However...** this is a **virtual vehicle model** (does not exist in reality), the FASTSim model is tuned via modifying a model of RAV4 Prime and adjusting the powertrain type and component sizing to achieve a certain electric driving range when conducting a replica (in FASTSim simulations) of EPA test procedures