

OBFCM reading results

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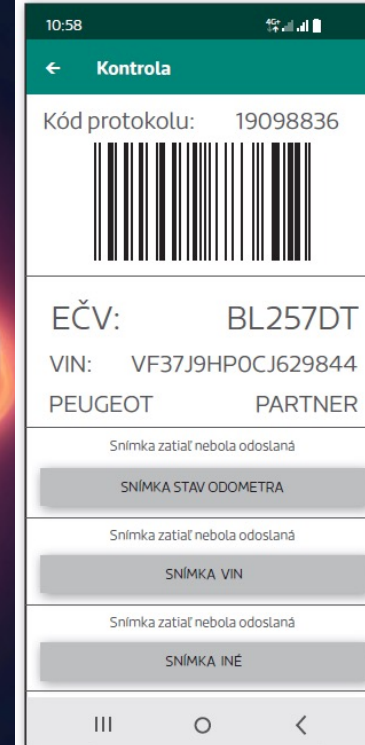
²GOCA VLAANDEREN vzw.

³TESTEK, a.s.



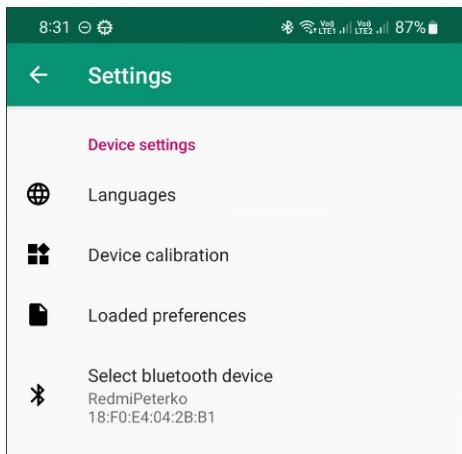
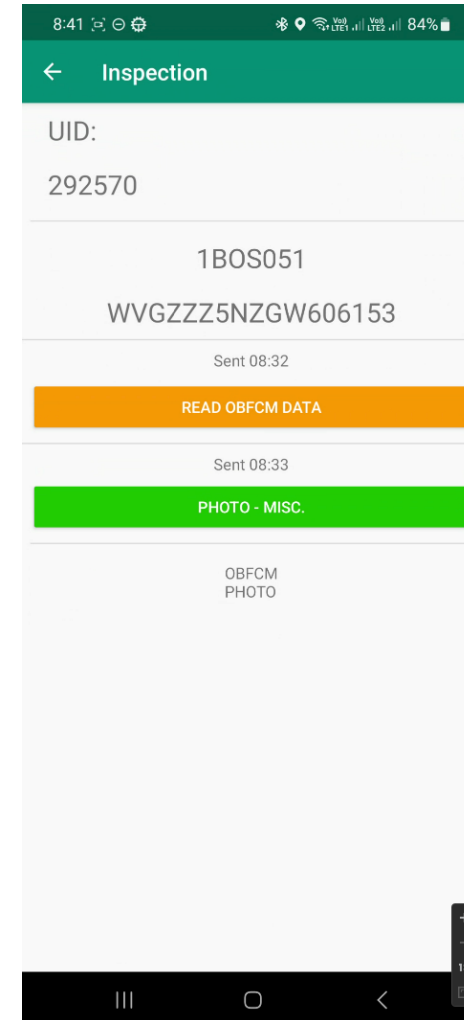
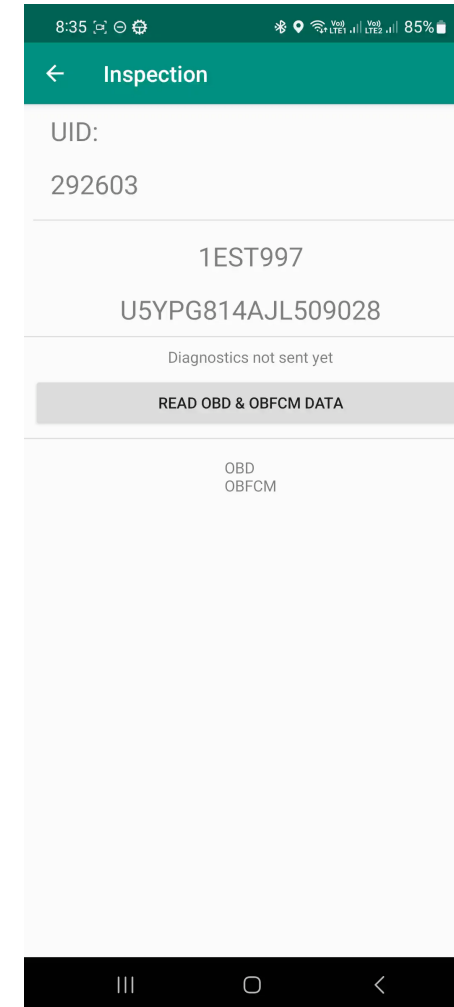
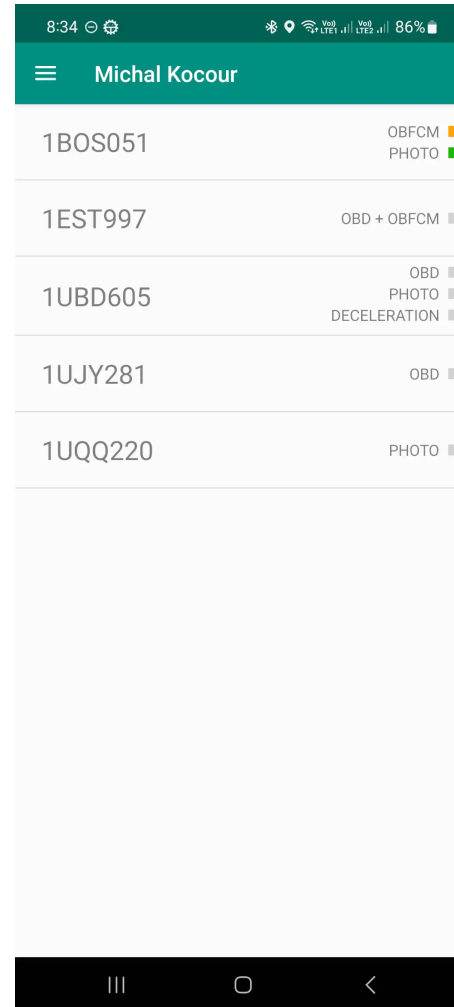
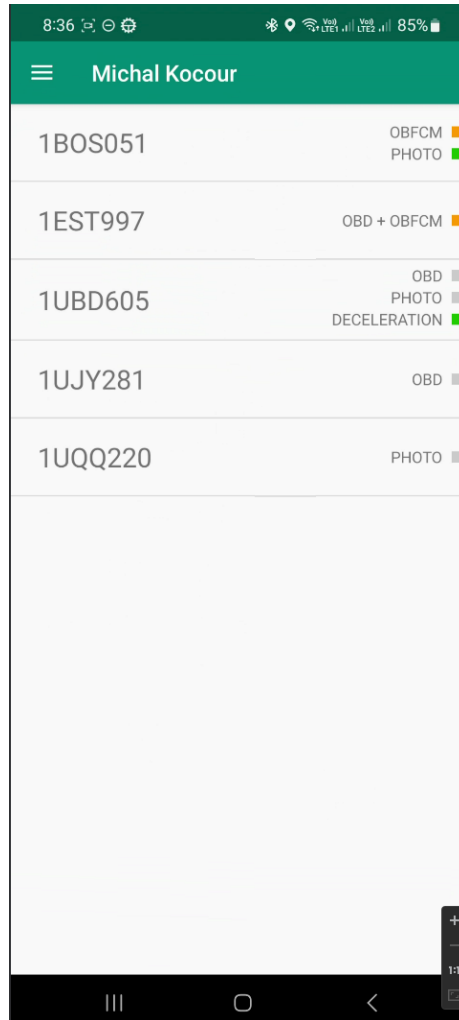
Mobile app - TESTEK

- Photo
- OBD
- OBFCM
- Deceleration
- Cloud



Mobile app GOCA Vlaanderen

- Phase 1
 - OBFCM
- Phase 2
 - OBFCM
 - OBD
 - Photo
 - Deceleration



OBFCM – statistics comparison

	SVK - TESTEK	BE - GOCA
Testing period	aug 2022 – apr 2023	may – oct 2023
Number of successful OBFCM readings	1100	2623
Number of Hybrids	24(2%)	235(9%)

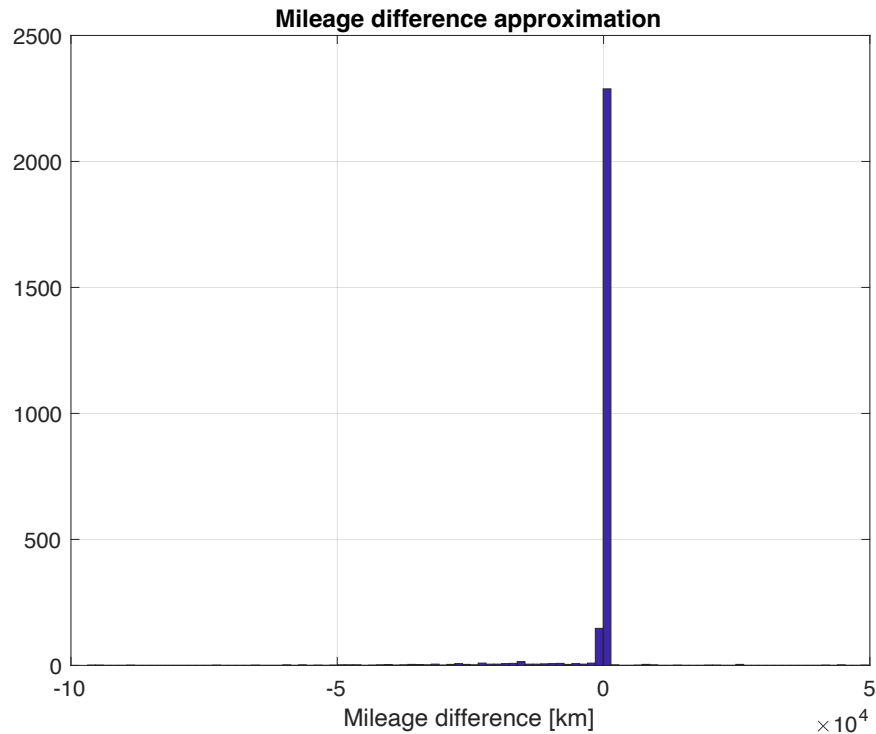
OBFCM - The data required by the European Commission to be collected and submitted starting on 20 May 2023 are the following :

- Total distance traveled (lifetime)
- Total fuel consumed (lifetime)

- Total distance traveled in charge-depleting operation with engine off (lifetime)
- Total distance traveled in charge-depleting operation with engine running (lifetime)
- Total distance traveled in driver-selectable charge-increasing operation (lifetime)
- Total fuel consumed in charge-depleting operation (lifetime)
- Total fuel consumed in driver-selectable charge-increasing operation (lifetime)
- Total grid energy into the battery (lifetime)

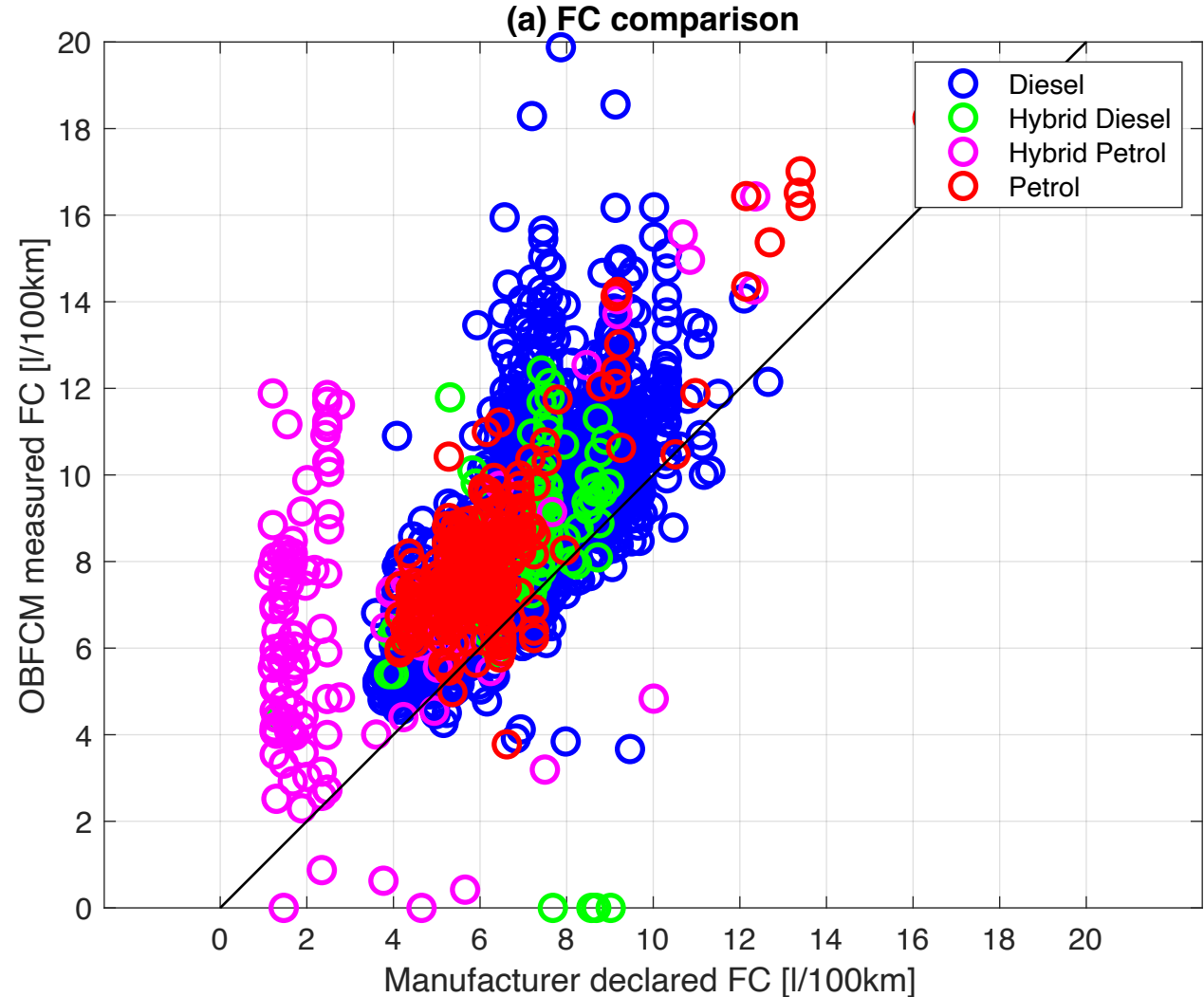
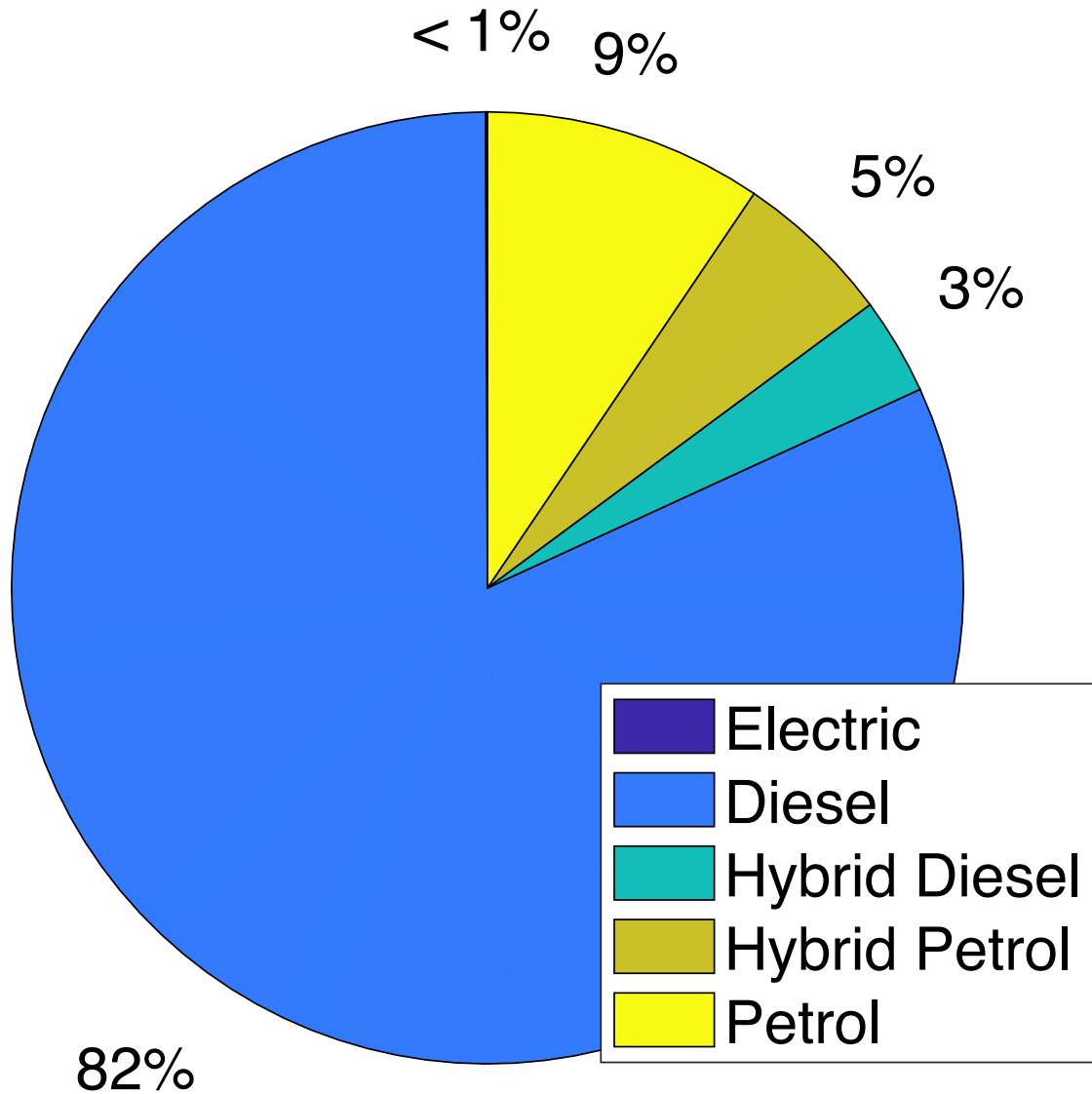
OBFCM reading GOCA – mileage comparison

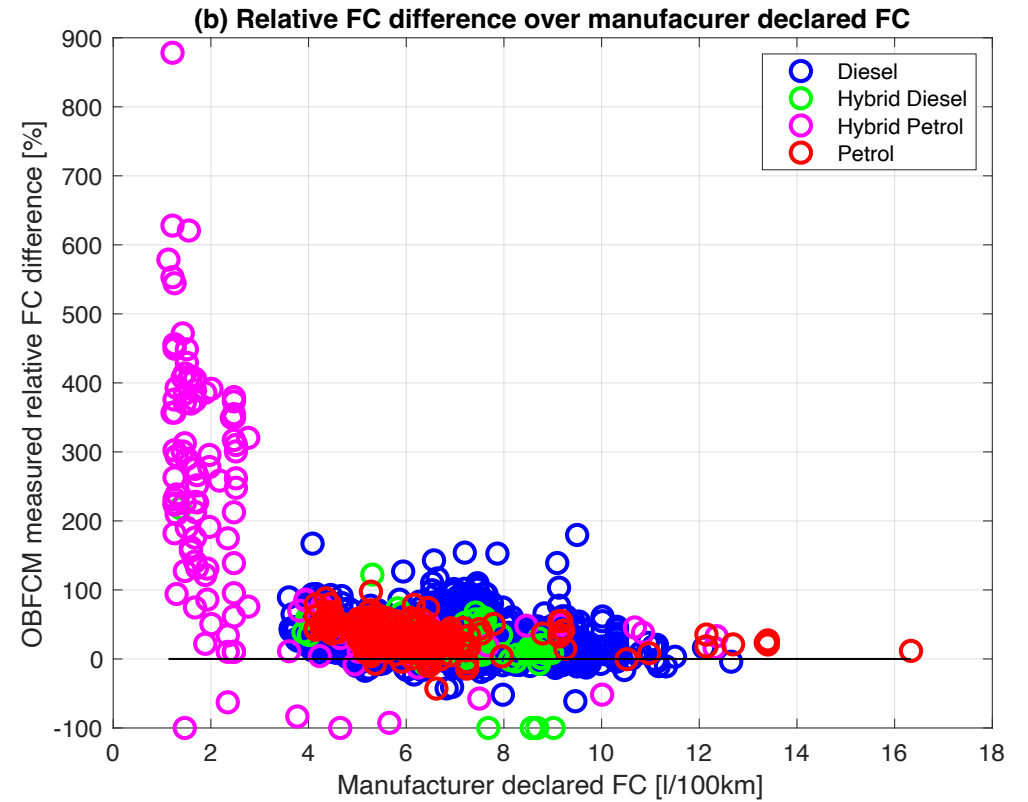
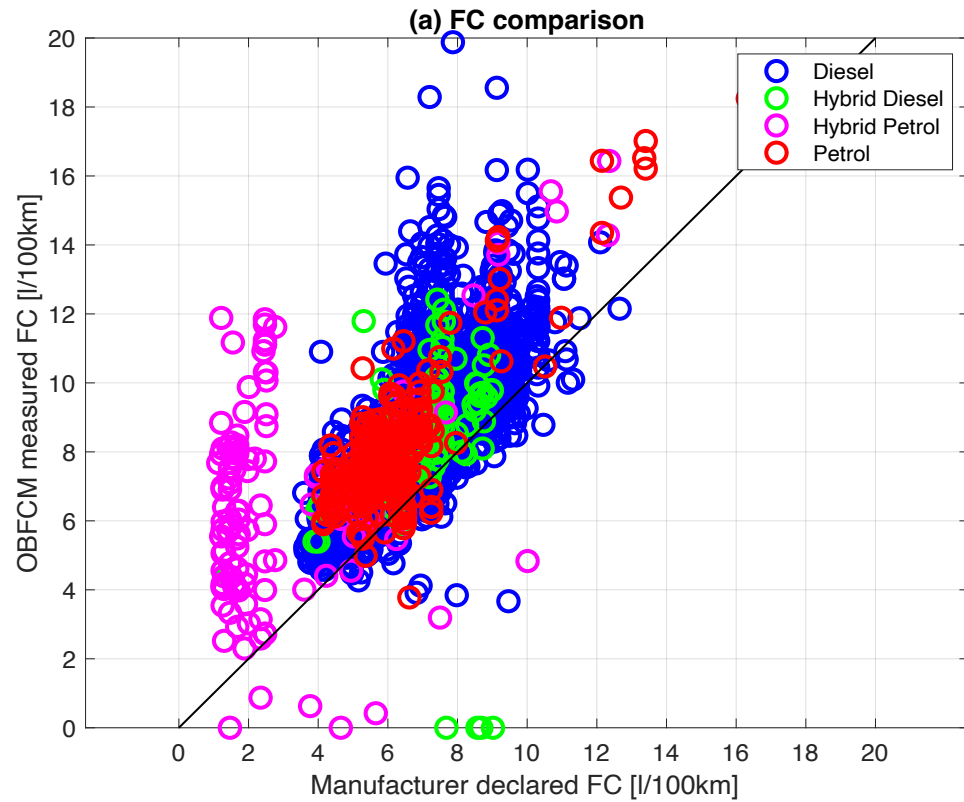
- Mean mileage: 33721.55 km



Relative Mileage difference	[%]	Mileage difference	[km]
min	-99.97	min	-96857.90
mean	-3.20	mean	-1274.22
max	231.11	max	49770.50

GOCA Vlaanderen Fuel Type | FC comparison

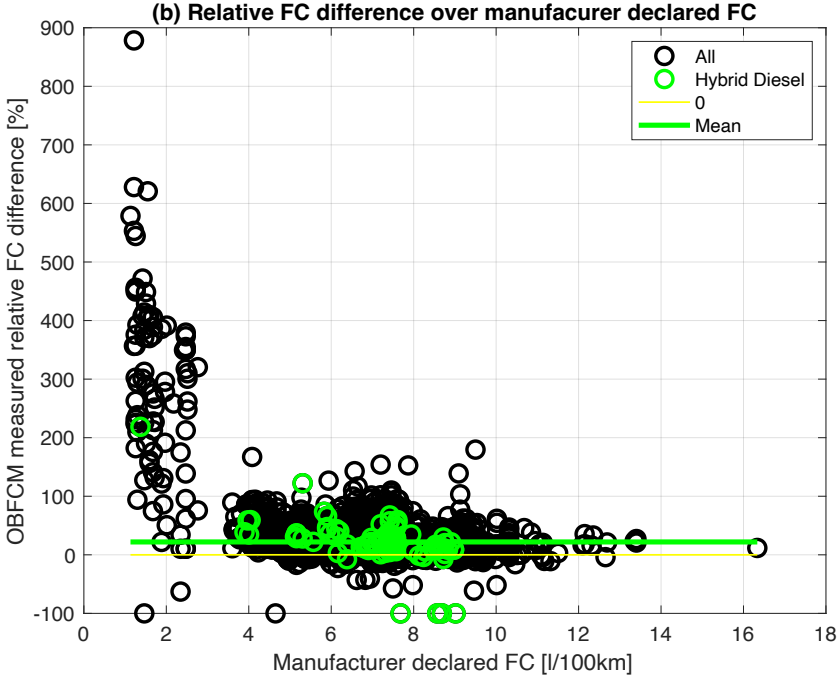




OBFCM reading GOCA Vlaanderen – Fuel Consumption

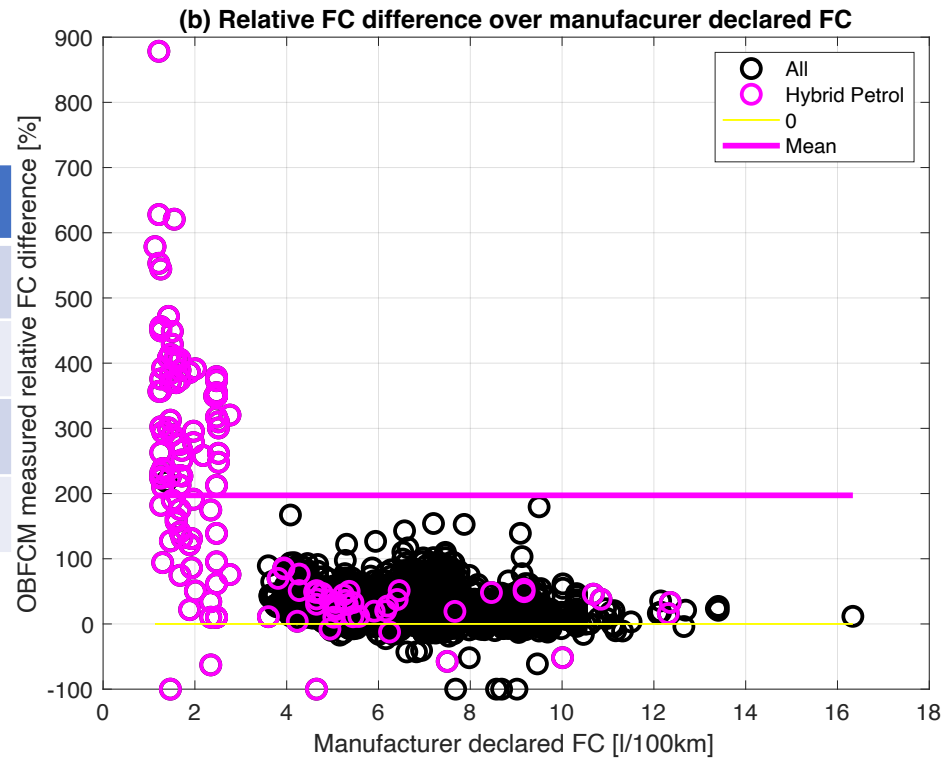
OBFCM reading GOCA – FC Diesel hybrids

Relative FC	[%]
min	-100.00
mean	21.98
max	218.56
std	37.10



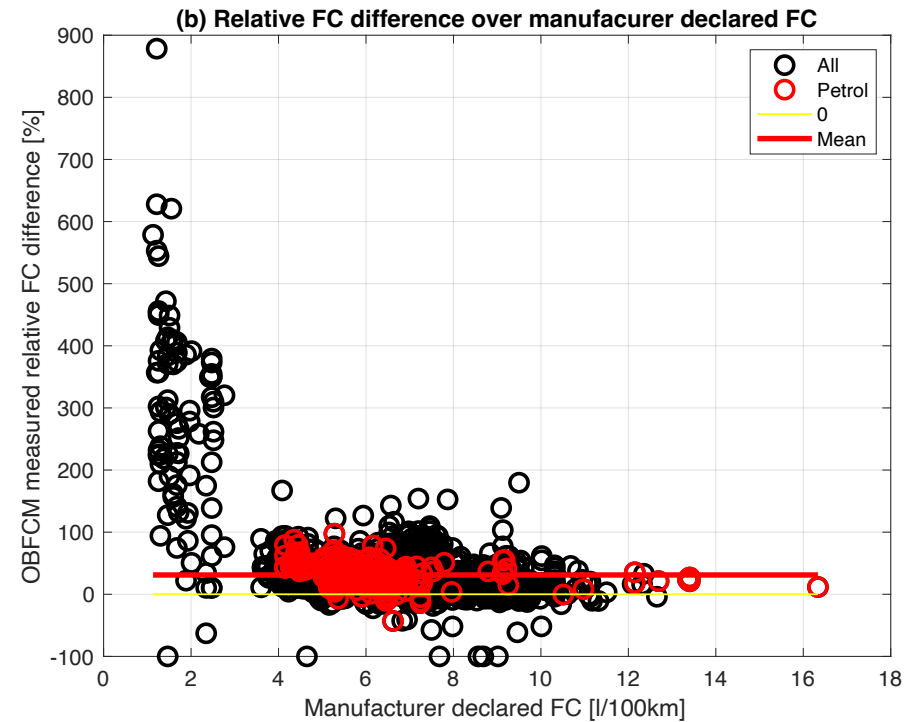
OBFCM reading GOCA – FC Petrol hybrids

Relative FC	[%]
min	-100.00
mean	197.27
max	878.34
std	179.33



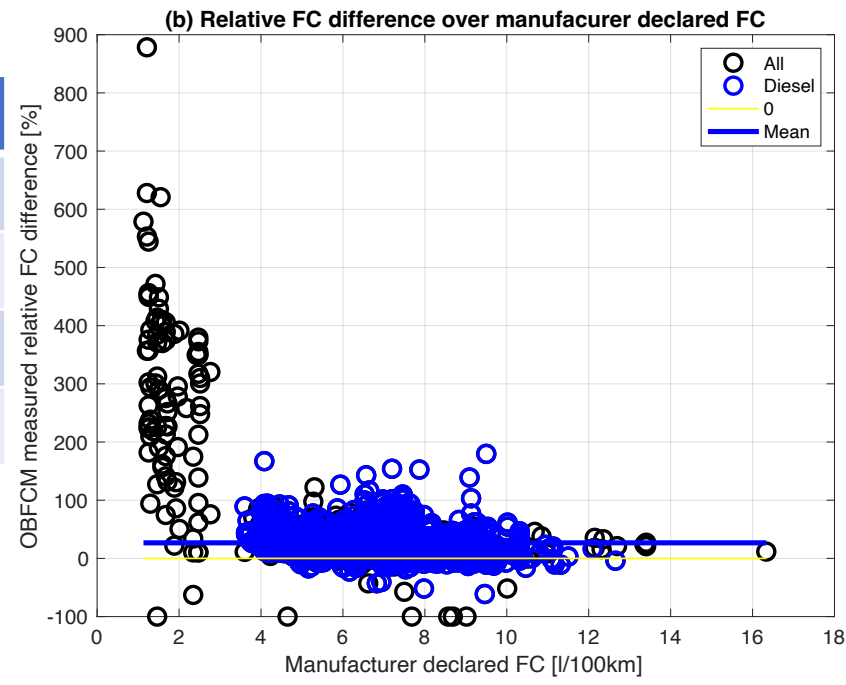
OBFCM reading GOCA – FC Petrol

Relative FC	[%]
min	-42.91
mean	31.07
max	97.51
std	20.07



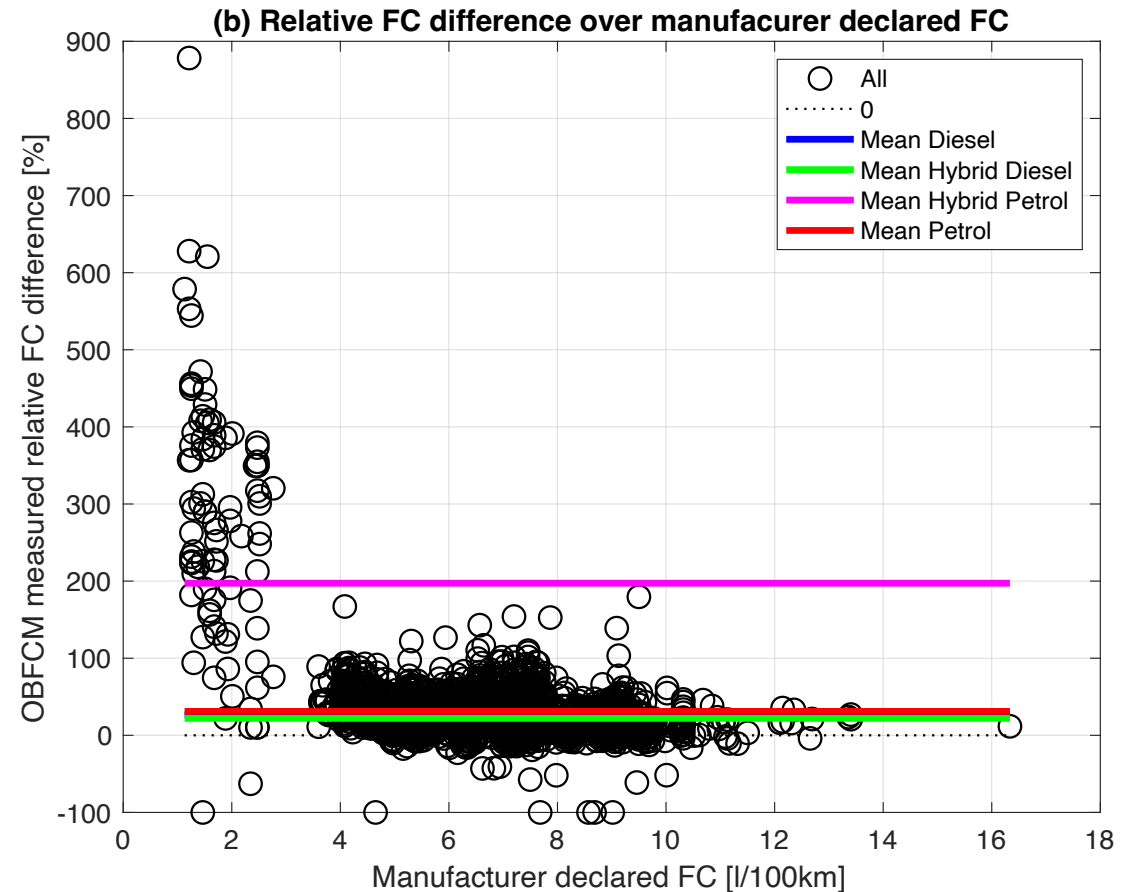
OBFCM reading GOCA – FC Diesel

Relative FC	[%]
min	-61.23
mean	26.75
max	179.62
std	22.26



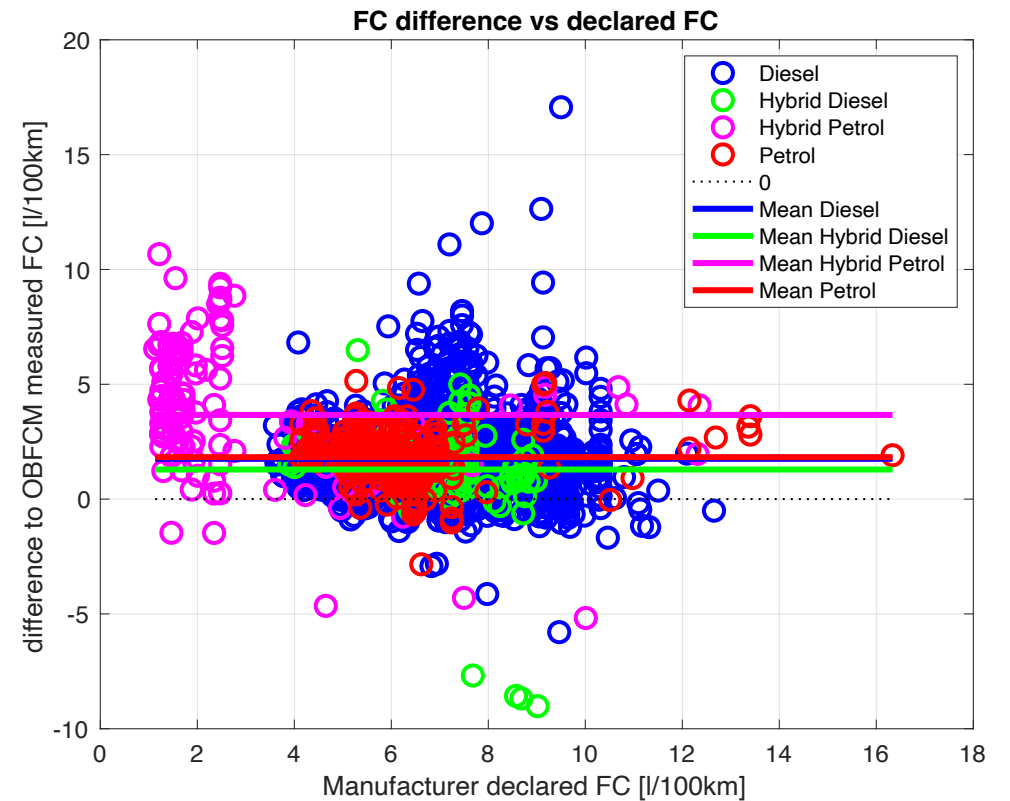
OBFCM reading GOCA – relative FC Summary

Relative FC	Diesel [%]	Hybrid Diesel [%]	Hybrid Petrol [%]	Petrol [%]
min	-61.23	-100.00	-100.00	-42.91
mean	26.75	21.98	197.27	31.07
max	179.62	218.56	878.34	97.51
std	22.26	37.10	179.33	20.07



OBFCM reading GOCA – FC Summary

FC diff	Diesel [l/100km]	Hybrid Diesel [l/100km]	Hybrid Petrol [l/100km]	Petrol [l/100km]
min	-5.79	-9.02	-5.18	-2.84
mean	1.76	1.29	3.66	1.83
max	17.06	6.46	10.67	5.15
std	1.52	2.33	2.85	1.14



Summary

- The application yields fuel consumption results consistent with research in this area.
- Inconsistency of OBFCM readings below 6%.
- Future development will focus on new challenges in the ADAS and e-Mobility areas.