



### Certification Summary Information Report

<b>Test Group</b>		VHYXV00.0W04			<b>Evaporative/Refueling Family</b>			--										
<b>Models Covered by this Certificate</b>																		
Carline Manufacturer		Division		Carline		Certification Region Code(s)		Drive System		Trans - Type	- # of Gears	Trans - Lockup						
Hyundai Motor Company		1 - HYUNDAI MOTOR COMPANY		104 - Ioniq 5 N		California + CAA Section 177 states		All Wheel Drive		Automatic	1	No						
Hyundai Motor Company		1 - HYUNDAI MOTOR COMPANY		104 - Ioniq 5 N		Federal		All Wheel Drive		Automatic	1	No						
<b>Engine Description</b>																		
Hybrid Type				--			<b>Hybrid Description</b>				--							
Engine Type				--			<b>Mfr Engine Description</b>				--							
Engine Block Arrangement				--			<b>Mfr Engine Block Arrangement Description</b>				--							
Camless Valvetrain Indicator				--			<b>Oil Viscosity/Classification</b>				--							
Number of Cylinders/Rotors				--			<b>Mechanically Variable Compression Ratio Indicator</b>				--							
<b>After Treatment Device(s) (ATD)</b>																		
<b>Mfr After Treatment Device (ATD) Comments</b>				--														
<b>Direct Ozone Reduction (DOR) Device</b>				--														
<b>Mfr Emission Control Device Comments</b>				--														
<b>Official Test Numbers</b>																		
Test Group		Fuel		FTP		US06		SC03		Cold CO		Highway		EPA City Litmus Value	EPA City Litmus Threshold	EPA Highway Litmus Value	EPA Highway Litmus Threshold	CREE Weighting Factor
Electricity		--		--		--		--		--		--		--	--	--	--	--
<b>Official Charge Depleting Test Numbers</b>																		
Test Group Fuel				UDDS				Highway										
Electricity				SHYX10082368				SHYX10082369										

## Certification Summary Information Report

Test Group	VHYXV00.0W04	Evaporative/Refueling Family	--
<b>Hybrid Electric Vehicle And Fuel Cell Information</b>			
Rechargeable Energy Storage System	Battery(s)	Rechargeable Energy Storage System, if Other	--
Battery Type	Lithium Ion	Number of Battery Packs	1
Total Voltage of Battery Packs	697	Battery Energy Capacity	120.6
Battery Specific Energy	170.6	Battery Charger Type	Both
Number of Capacitors	--	Capacitor Rating (In Farads)	--
Mfr Capacitor Comments	--		
Hydraulic System Description	--		
Regenerative Braking Type	Electrical Regen Brake		
Regenerative Braking Source	Both	Driver Controlled Regenerative Braking	Yes
Mfr Regenerative Braking Description	--		
Drive Motor(s)/Generator(s)	2		
Motor/Generator Type 1	PMSM	Rated Motor/Generator Power	166
Motor/Generator Type 2	PMSM	Rated Motor/Generator Power	282
Mfr Fuel Cell Description	--		
Fuel Cell On-Board H2 Storage Capacity (kg)	--	Usable H2 Fill Capacity (kg)	--
Mfr Hybrid Electric/ Electric Vehicle Comments	PMSM : Permanent Magnet Synchronous Motor		

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<b>Test Group</b>	VHYXV00.0W04	<b>Evaporative/Refueling Family</b>	--
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**Emission Data Vehicle Information**

Vehicle ID / Configuration	NENU4384E040A / 0	Manufacturer Vehicle Configuration Number	0
Original Test Group Name	SHYXV00.0W04	Original Evaporative/Refueling Family	--
Original Test Vehicle Model Year	2025		
<b>Vehicle Model</b>			
Represented Test Vehicle Make	Hyundai	Represented Test Vehicle Model	Ioniq 5 N

**Leak Family Details**

Leak Family Identifier	--	Leak Family Name	--
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**Drive Sources and Fuel System Details**

Drive Source and Fuel#	Drive Source	Fuel
1	Electric Motor	Electricity

Hybrid Indicator	No	<b>Multiple Fuel Combustion</b>	--
Multiple Fuel Storage	--	<b>Rechargeable Energy Storage System Indicator</b>	Yes
Fuel Cell Indicator	No	<b>Rechargeable Energy Storage System, if 'Other'</b>	--
Rechargeable Energy Storage System	Battery(s)		
Off-board charge Capable Indicator	Yes	<b>Odometer Correction Factor</b>	0.9989
Odometer Correction -- Initial	0	+ = System Miles is equal to (Test odometer reading * Correction factor) + Initial system miles	
Odometer Correction Sign			
Odometer Correction Units	Miles	<b>Rated Horsepower</b>	601
Engine Code	EM16EM27	<b>Air Aspiration Method, if 'Other'</b>	
Displacement (liters)	0.001	<b>Air Aspiration Device Configuration</b>	--
Air Aspiration Method	Naturally Aspirated	<b>Drive Mode While Testing</b>	All Wheel Drive
Number of Air Aspiration Devices	--	<b>Aged Emission Components</b>	4,000 (mi)
Charge Air Cooler Type	--	<b>Equivalent Test Weight (pounds)</b>	5250
Shift Indicator Light Usage	Not equipped	<b>N/V Ratio</b>	128.5
Curb Weight (lbs)	4861		
GVWR (lbs)	5864	<b># of Transmission Gears</b>	1
Axle Ratio	4.71	<b>Creeper Gear</b>	No
Transmission Type	Automatic		
Transmission Lockup	No		

**Dynamometer Coefficients:**

Coefficient Category	Target Coefficients			Set Coefficients			EPA Calculated Total Road Load Horse Power for City/Highway/Evap Coefficients
	A (lbf)	B (lbf/mph)	C (lbf/mph**2)	A (lbf)	B (lbf/mph)	C (lbf/mph**2)	
City/Highway/Evap	44.306	0.25372	0.02423	-2.39	-0.05565	0.023655	15.7

**Emission Control Device Comments**      This vehicle has two motors (front : 223hp / rear : 378hp) Power will be temporarily increased in boost mode. (front : 235hp, rear : 406hp)

### Certification Summary Information Report

Test Group	VHYXV00.0W04	Evaporative/Refueling Family	--
<b>Manufacturer Test Vehicle Comments</b>	25MY NE N 2motors(166kW+282kW) 21in. Power will be temporarily increased in boost mode. (front : 175kW, rear : 303kW)		

## Certification Summary Information Report

Test Group	VHYXV00.0W04	Evaporative/Refueling Family	--																
<b>Test #</b>	<b>SHYX10082368</b>	<b>Test Procedure</b>	<b>81 - Charge Depleting UDDS</b>																
<b>Exhaust Test # for this Evap Test</b>	--	<b>Test Fuel Type</b>	62 - Electricity																
<b>Test Date</b>	07/15/2023	<b>Fuel</b>	Electricity																
<b>Fuel Batch ID</b>	--	<b>Fuel Calibration Number</b>	--																
<b>Vehicle Class</b>	LDV/Passenger Car	<b>DF Type</b>	Mfr. Determined																
<b>Verify Test Lab ID</b>	772-1, Jangduck-Dong																		
<b>E10 Evaporative Test Measurement Method</b>	--																		
<b>Test Start Odometer Reading</b>	2208	<b>Odometer Units</b>	M																
<b>4WD Test Dyno</b>	Yes	<b>Diesel Adjustment Factor Usage</b>	--																
<b>State of Charge Delta</b>	Yes																		
<b>Drive Cycle Speed Tolerance Criteria</b>	Used Part 1066 (+/- 2.0 mph, +/- 1.0 sec)	<b>Road Speed Fan Usage</b>	No																
<b>PHEV/EV Charge Depleting Test Information</b>																			
<b>Recharge Event Voltage</b>	240	<b>Recharge Event Energy (kiloWatt-hours)</b>	94.3729																
<b>Charge Depleting Range (Calculated miles)</b>	352.353	<b>Charge Depleting Range (Actual miles)</b>	352.353																
<b>Charge Depleting Range Highway (Calculated miles)</b>	--	<b>Derived 5-Cycle Coefficient Model Year</b>	--																
<b>All Electric Range Unadjusted (miles)</b>	--	<b>Equivalent All Electric Range (miles)</b>	352.353																
<b>Number of Charge Depleting Bags/Phases Conducted</b>	1	<b>Transition Bag/Phase Number</b>	--																
<b>Charge Depleting Bag/Phase #1</b>																			
<table border="1"> <thead> <tr> <th>Test Result/Emission Name</th> <th>Unrounded Test Result</th> </tr> </thead> <tbody> <tr> <td>Carbon-Related Exhaust Emissions</td> <td>0</td> </tr> <tr> <td>Drive Trace Absolute Speed Change Rating</td> <td>0.38</td> </tr> <tr> <td>Drive Trace Energy Economy Rating</td> <td>0.57</td> </tr> <tr> <td>Drive Trace Inertia Work Ratio Rating</td> <td>0.59</td> </tr> <tr> <td>Manufacturer Fuel Economy</td> <td>26.7836</td> </tr> <tr> <td>System End State of Charge Watt-hours</td> <td>0</td> </tr> <tr> <td>System Start State of Charge Watt-hours</td> <td>0</td> </tr> </tbody> </table>		Test Result/Emission Name	Unrounded Test Result	Carbon-Related Exhaust Emissions	0	Drive Trace Absolute Speed Change Rating	0.38	Drive Trace Energy Economy Rating	0.57	Drive Trace Inertia Work Ratio Rating	0.59	Manufacturer Fuel Economy	26.7836	System End State of Charge Watt-hours	0	System Start State of Charge Watt-hours	0		
Test Result/Emission Name	Unrounded Test Result																		
Carbon-Related Exhaust Emissions	0																		
Drive Trace Absolute Speed Change Rating	0.38																		
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Manufacturer Fuel Economy	26.7836																		
System End State of Charge Watt-hours	0																		
System Start State of Charge Watt-hours	0																		
<b>Manufacturer Test Comments</b>	25MY NE N(166+282kW) 21in. (UDDS_Normal mode) These results came from a multi-cycle test. 1. DC energy consumption UDDS1 = 262.8 Wh/mi; UDDS2 = 250.0 Wh/mi; UDDS3 = 234.0 Wh/mi; UDDS4 = 237.1 Wh/mi 2. UDDS weighted : 240.9 Wh/mi 3. UDDS1 DC discharge energy : 1961 Wh 4. MCT UBE energy : 84,884 Wh 5. Drive trace information for all UDDS phases (EER/ASCR/IWRR) UDDS1 : 0.57/0.38/0.59 UDDS2 : 0.95/1.07/1.45 UDDS3 : 0.86/0.71/0.95 UDDS4 : 0.34/0.32/0.61																		

### Certification Summary Information Report

Test Group		VHYXV00.0W04				Evaporative/Refueling Family				--		
Certification Region	Useful Life	Standard Level	Emission Name	Rounded Result	RAF	NMOG/NM HC Ratio	Diesel Adjustment Factor	Add DF	Mult DF	Certification Level	Standard	Pass/Fail
Fed	150,000 miles	Federal Tier 3 Bin 0	CREE	0	--	--	--	0	--	0	--	--
CA	150,000 miles	California ZEV	CREE	0	--	--	--	0	--	0	--	--

### Certification Summary Information Report

<b>Test Group</b>	VHYXV00.0W04	<b>Evaporative/Refueling Family</b>	--
<b>Test #</b>	<b>SHYX10082369</b>	<b>Test Procedure</b>	<b>84 - Charge Depleting Highway</b>
<b>Exhaust Test # for this Evap Test</b>	--	<b>Test Fuel Type</b>	62 - Electricity
<b>Test Date</b>	07/15/2023	<b>Fuel</b>	Electricity
<b>Fuel Batch ID</b>	--	<b>Fuel Calibration Number</b>	--
<b>Vehicle Class</b>	LDV/Passenger Car	<b>DF Type</b>	Mfr. Determined
<b>Verify Test Lab ID</b>	772-1, Jangduck-Dong		
<b>E10 Evaporative Test Measurement Method</b>	--		
<b>Test Start Odometer Reading</b>	2208	<b>Odometer Units</b>	M
<b>4WD Test Dyno</b>	Yes	<b>Diesel Adjustment Factor Usage</b>	--
<b>State of Charge Delta</b>	Yes		
<b>Drive Cycle Speed Tolerance Criteria</b>	Used Part 1066 (+/- 2.0 mph, +/- 1.0 sec)	<b>Road Speed Fan Usage</b>	No

**PHEV/EV Charge Depleting Test Information**

<b>Recharge Event Voltage</b>	240	<b>Recharge Event Energy (kiloWatt-hours)</b>	94.3729
<b>Charge Depleting Range (Calculated miles)</b>	303.292	<b>Charge Depleting Range (Actual miles)</b>	303.292
<b>Charge Depleting Range Highway (Calculated miles)</b>	--	<b>Derived 5-Cycle Coefficient Model Year</b>	--
<b>All Electric Range Unadjusted (miles)</b>	--	<b>Equivalent All Electric Range (miles)</b>	303.292
<b>Number of Charge Depleting Bags/Phases Conducted</b>	1	<b>Transition Bag/Phase Number</b>	--

**Charge Depleting Bag/Phase #1**

Test Result/Emission Name	Unrounded Test Result
Carbon-Related Exhaust Emissions	0
Drive Trace Absolute Speed Change Rating	1.34
Drive Trace Energy Economy Rating	0.06
Drive Trace Inertia Work Ratio Rating	1.86
Manufacturer Fuel Economy	31.1162
System End State of Charge Watt-hours	0
System Start State of Charge Watt-hours	0

**Manufacturer Test Comments**

25MY NE N(166+282kW) 21in.(HWY\_Normal mode) These results came from a multi-cycle test. 1. DC energy consumption HWFE1 = 284.8 Wh/mi HWFE2 = 275.0Wh/mi 2. Drive trace information for all HWY phases (EER/ASCR/IWRR) HWY1 : 0.06/1.34/1.86 HWY2 : 0.32/0.85/0.95

Certification Region	Useful Life	Standard Level	Emission Name	Rounded Result	RAF	NMOG/NM HC Ratio	Diesel Adjustment Factor	Add DF	Mult DF	Certification Level	Standard	Pass/Fail
Fed	150,000 miles	Federal Tier 3 Bin 0	CREE	0	--	--	--	0	--	0	--	--
CA	150,000 miles	California ZEV	CREE	0	--	--	--	0	--	0	--	--

### Certification Summary Information Report

<b>Test Group</b>	VHYXV00.0W04	<b>Evaporative/Refueling Family</b>	--
<b>Fuel Properties</b>			

### Certification Summary Information Report

<b>Test Group</b>		VHYXV00.0W04			<b>Evaporative/Refueling Family</b>			--		
<b>Consolidated List of Standards</b>										
<b>Exhaust Standards</b>										
<b>Cert Region</b>		California + CAA Section 177 states			<b>Cert/In-Use Code</b>			Cert		
<b>Vehicle Class</b>		LDV/Passenger Car			<b>Standard Level</b>			California ZEV		
<b>Fuel</b>		Electricity			<b>Test Procedure</b>			Charge Depleting UDDS		
<b>Useful Life</b>	<b>Emission Name</b>	<b>Rounded Result</b>	<b>RAF</b>	<b>NMOG / NMHC</b>	<b>Upward Diesel Adjustment Factor</b>	<b>Downward Diesel Adjustment Factor</b>	<b>Mult DF</b>	<b>Add DF</b>	<b>Std</b>	
150,000 miles	CO	--	--	--	--	--	--	0	0	
150,000 miles	CREE	--	--	--	--	--	--	0	0	
<b>Exhaust Standards</b>										
<b>Cert Region</b>		Federal			<b>Cert/In-Use Code</b>			Cert		
<b>Vehicle Class</b>		LDV/Passenger Car			<b>Standard Level</b>			Federal Tier 3 Bin 0		
<b>Fuel</b>		Electricity			<b>Test Procedure</b>			CVS 75 and later (w/o can. load)		
<b>Useful Life</b>	<b>Emission Name</b>	<b>Rounded Result</b>	<b>RAF</b>	<b>NMOG / NMHC</b>	<b>Upward Diesel Adjustment Factor</b>	<b>Downward Diesel Adjustment Factor</b>	<b>Mult DF</b>	<b>Add DF</b>	<b>Std</b>	
150,000 miles	CO	--	--	--	--	--	--	--	0	
<b>Exhaust Standards</b>										
<b>Cert Region</b>		Federal			<b>Cert/In-Use Code</b>			Cert		
<b>Vehicle Class</b>		LDV/Passenger Car			<b>Standard Level</b>			Federal Tier 3 Bin 0		
<b>Fuel</b>		Electricity			<b>Test Procedure</b>			Federal fuel 3-day exhaust		
<b>Useful Life</b>	<b>Emission Name</b>	<b>Rounded Result</b>	<b>RAF</b>	<b>NMOG / NMHC</b>	<b>Upward Diesel Adjustment Factor</b>	<b>Downward Diesel Adjustment Factor</b>	<b>Mult DF</b>	<b>Add DF</b>	<b>Std</b>	
150,000 miles	CO	--	--	--	--	--	--	0	0	
<b>Exhaust Standards</b>										
<b>Cert Region</b>		Federal			<b>Cert/In-Use Code</b>			Cert		
<b>Vehicle Class</b>		LDV/Passenger Car			<b>Standard Level</b>			Federal Tier 3 Bin 0		
<b>Fuel</b>		Electricity			<b>Test Procedure</b>			Charge Depleting Highway		
<b>Useful Life</b>	<b>Emission Name</b>	<b>Rounded Result</b>	<b>RAF</b>	<b>NMOG / NMHC</b>	<b>Upward Diesel Adjustment Factor</b>	<b>Downward Diesel Adjustment Factor</b>	<b>Mult DF</b>	<b>Add DF</b>	<b>Std</b>	
150,000 miles	CO	--	--	--	--	--	--	0	0	
150,000 miles	CREE	--	--	--	--	--	--	0	0	

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<b>Test Group</b>		VHYXV00.0W04			<b>Evaporative/Refueling Family</b>			--		
<b>Cert Region</b>		California + CAA Section 177 states			<b>Cert/In-Use Code</b>			Cert		
<b>Vehicle Class</b>		LDV/Passenger Car			<b>Standard Level</b>			California ZEV		
<b>Fuel</b>		Electricity			<b>Test Procedure</b>			Charge Depleting Highway		
<b>Useful Life</b>	<b>Emission Name</b>	<b>Rounded Result</b>	<b>RAF</b>	<b>NMOG / NMHC</b>	<b>Upward Diesel Adjustment Factor</b>	<b>Downward Diesel Adjustment Factor</b>	<b>Mult DF</b>	<b>Add DF</b>	<b>Std</b>	
150,000 miles	CO	--	--	--	--	--	--	0	0	
150,000 miles	CREE	--	--	--	--	--	--	0	0	
<b>Cert Region</b>		Federal			<b>Cert/In-Use Code</b>			Cert		
<b>Vehicle Class</b>		LDV/Passenger Car			<b>Standard Level</b>			Federal Tier 3 Bin 0		
<b>Fuel</b>		Electricity			<b>Test Procedure</b>			Charge Depleting UDDS		
<b>Useful Life</b>	<b>Emission Name</b>	<b>Rounded Result</b>	<b>RAF</b>	<b>NMOG / NMHC</b>	<b>Upward Diesel Adjustment Factor</b>	<b>Downward Diesel Adjustment Factor</b>	<b>Mult DF</b>	<b>Add DF</b>	<b>Std</b>	
150,000 miles	CO	--	--	--	--	--	--	0	0	
150,000 miles	CREE	--	--	--	--	--	--	0	0	

## Certification Summary Information Report

Test Group	VHYXV00.0W04	Evaporative/Refueling Family	--
<b>Glossary</b>			
<b>Useful Life</b>			
4	4,000 miles	120	120,000 miles
50	50,000 miles	150	150,000 miles
100	100,000 miles		
<b>Emission Name</b>			
HC-TOTAL	Total Hydrocarbon	COMB-CREE	Combined Carbon-Related Exhaust Emissions
CO	Carbon Monoxide	COMB-OPT-CREE	Combined Optional Carbon-Related Exhaust Emissions
CO2	Carbon dioxide	HC-TOTAL-EQUIV	Total Hydrocarbon equivalent - Evap only
CREE	Carbon-Related Exhaust Emissions	METHANE-COMB	Combined CH4 for HD 2b/3 vehicles only
OPT-CREE	Optional Carbon-Related Exhaust Emissions	N2O-COMB	Combined Nitrous Oxide for HD 2b/3 vehicles only
NOX	Nitrogen Oxide	LEAK-DIA	Effective Leak Diameter (inches)
PM	Particulate Matter	LEAK-GAS CAP	Gas Cap Leakage (cc/min)
PM-COMP	SFTP Composite Particulate Matter	CO2-COMB	Combined Carbon Dioxide for HD 2b/3 Vehicles Only
HC-NM	Non-methane Hydrocarbon	KW-HRS	Integrated DC KW-HRS
OMHCE	Organic material Hydrocarbon Equivalent	CH4 BAG 1	Bag 1 Methane
OMNMHCE	Organic material non-methane HC equivalent	CH4 BAG 2	Bag 2 Methane
NMOG	Non-methane organic gases	CH4 BAG 3	Bag 3 Methane
HCHO	Formaldehyde	CH4 BAG 4	Bag 4 Methane
H3C2HO	Acetaldehyde	CO BAG 1	Bag 1 Carbon Monoxide
HC-NM+NOX	SFTP Non-methane Hydrocarbon + Nitrogen Oxides for US06 or SC03	CO BAG 2	Bag 2 Carbon Monoxide
HC-NM+NOX-COMP	SFTP Composite Non-methane Hydrocarbon + Nitrogen Oxides	CO BAG 3	Bag 3 Carbon Monoxide
CO-COMP	SFTP Composite Carbon Monoxide	CO BAG 4	Bag 4 Carbon Monoxide
ETHANOL	C2H5OH - Ethanol	NMOG BAG 1	Bag 1 Non-methane organic gases
FE BAG 1	Bag 1 Fuel Economy	NMOG BAG 2	Bag 2 Non-methane organic gases
FE BAG 2	Bag 2 Fuel Economy	NMOG BAG 3	Bag 3 Non-methane organic gases
FE BAG 3	Bag 3 Fuel Economy	NMOG BAG 4	Bag 4 Non-methane organic gases
FE BAG 4	Bag 4 Fuel Economy	ACT-DISTANCE BAG 1	Bag 1 Actual Distance
MFR FE	Manufacturer Fuel Economy	ACT-DISTANCE BAG 2	Bag 2 Actual Distance
HC	Hydrocarbon for Running Loss and ORVR	ACT-DISTANCE BAG 3	Bag 3 Actual Distance
METHANE	CH4 - Methane	ACT-DISTANCE BAG 4	Bag 4 Actual Distance
METHANOL	CH3OH - Methanol	HC-TOTAL BAG 1	Bag 1 Total Hydrocarbon
N2O	Nitrous Oxide	HC-TOTAL BAG 2	Bag 2 Total Hydrocarbon
SPITBACK	Spitback Hydrocarbon in grams	HC-TOTAL BAG 3	Bag 3 Total Hydrocarbon
AMP-HRS	Integrated Amp-hours	HC-TOTAL BAG 4	Bag 4 Total Hydrocarbon
START-SOC	System Start State of Charge Watt-hours	WATT-HRS BAG 1	Bag 1 Watt Hours
END-SOC	System End State of Charge Watt-hours	WATT-HRS BAG 2	Bag 2 Watt Hours

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Test Group		VHYXV00.0W04	Evaporative/Refueling Family		--
ACT-DISTANCE	Actual Distance Driven (miles)		WATT-HRS BAG 3	Bag 3 Watt Hours	
AS-VOLT	Average System Voltage		WATT-HRS BAG 4	Bag 4 Watt Hours	
CO2 BAG 1	Bag 1 Carbon Dioxide		WATT-HRS	Watt Hours	
CO2 BAG 2	Bag 2 Carbon Dioxide		HC-NM BAG 1	Bag 1 Non-methane Hydrocarbon	
CO2 BAG 3	Bag 3 Carbon Dioxide		HC-NM BAG 2	Bag 2 Non-methane Hydrocarbon	
CO2 BAG 4	Bag 4 Carbon Dioxide		HC-NM BAG 3	Bag 3 Non-methane Hydrocarbon	
NMOG+NOX	Non-methane organic gases plus Nitrogen Oxides		HC-NM BAG 4	Bag 4 Non-methane Hydrocarbon	
NMOG+NOX-COMP	SFTP Composite Non-methane Organic Gases + Nitrogen Oxides		N2O BAG 1	Bag 1 Nitrous Oxide	
DT-IWRR	Drive Trace Inertia Work Ratio Rating		N2O BAG 2	Bag 2 Nitrous Oxide	
DT-ASCR	Drive Trace Absolute Speed Change Rating		N2O BAG 3	Bag 3 Nitrous Oxide	
DT-EER	Drive Trace Energy Economy Rating		N2O BAG 4	Bag 4 Nitrous Oxide	
<b>Certification Region</b>					
CA	California + CAA Section 177 states		FA	Federal	
<b>Exhaust Emission Standard Level</b>					
B1	Federal Tier 2 Bin 1		HDV2B340	Federal Tier 3 HD Class 2b Transitional Bin 340	
B2	Federal Tier 2 Bin 2		HDV2B250	Federal Tier 3 HD Class 2b Bin 250	
B3	Federal Tier 2 Bin 3		HDV2B200	Federal Tier 3 HD Class 2b Bin 200	
B4	Federal Tier 2 Bin 4		HDV2B170	Federal Tier 3 HD Class 2b Bin 170	
B5	Federal Tier 2 Bin 5		HDV2B150	Federal Tier 3 HD Class 2b Bin 150	
B6	Federal Tier 2 Bin 6		HDV2B0	Federal Tier 3 HD Class 2b Bin 0	
B7	Federal Tier 2 Bin 7		HDV3B630	Federal Tier 3 HD Class 3 Transitional Bin 630	
B8	Federal Tier 2 Bin 8		HDV3B570	Federal Tier 3 HD Class 3 Transitional Bin 570	
B9	Federal Tier 2 Bin 9		HDV3B400	Federal Tier 3 HD Class 3 Bin 400	
B10	Federal Tier 2 Bin 10		HDV3B270	Federal Tier 3 HD Class 3 Bin 270	
B11	Federal Tier 2 Bin 11		HDV3B230	Federal Tier 3 HD Class 3 Bin 230	
HDV1	HDV1 (Federal HD chassis Class 2b GVW 8501-10000)		HDV3B200	Federal Tier 3 HD Class 3 Bin 200	
HDV2	HDV2 (Federal HD chassis Class 3 GVW 10001-14000)		HDV3B0	Federal Tier 3 HD Class 3 Bin 0	
L2	California LEV-II LEV		L4SULEV100	California LEV-IV SULEV100	
L2OP	California LEV-II LEV Optional		L4SULEV125	California LEV-IV SULEV125	
U2	California LEV-II ULEV		L4SULEV15	California LEV-IV SULEV15	
S2	California LEV-II SULEV		L4SULEV150	California LEV-IV SULEV150	
ZEV	California ZEV		L4SULEV170	California LEV-IV SULEV170	
OT	Other		L4SULEV175	California LEV-IV SULEV175	
T1	Federal Tier 1		L4SULEV20	California LEV-IV SULEV20	
PZEV	California PZEV		L4SULEV200	California LEV-IV SULEV200	
L2LEV160	California LEV-II LEV160		L4SULEV230	California LEV-IV SULEV230	
L2ULEV125	California LEV-II ULEV125		L4SULEV25	California LEV-IV SULEV25	
L2SULEV30	California LEV-II SULEV30		L4SULEV30	California LEV-IV SULEV30	
L2LEV395	California LEV-II LEV395		L4SULEV75	California LEV-IV SULEV75	

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Test Group	VHYXV00.0W04	Evaporative/Refueling Family	--
L2ULEV340	California LEV-II ULEV340	L4SULEV85	California LEV-IV SULEV85
L2LEV630	California LEV-II LEV630	L4ULEV125	California LEV-IV ULEV125
L2ULEV570	California LEV-II ULEV570	L4ULEV200	California LEV-IV ULEV200
L3LEV160	California LEV-III LEV160	L4ULEV250	California LEV-IV ULEV250
L3ULEV125	California LEV-III ULEV125	L4ULEV270	California LEV-IV ULEV270
L3ULEV70	California LEV-III ULEV70	L4ULEV40	California LEV-IV ULEV40
L3ULEV50	California LEV-III ULEV50	L4ULEV400	California LEV-IV ULEV400
L3SULEV30	California LEV-III SULEV30	L4ULEV50	California LEV-IV ULEV50
L3SULEV20	California LEV-III SULEV20	L4ULEV60	California LEV-IV ULEV60
L3LEV395	California LEV-III LEV395	L4ULEV70	California LEV-IV ULEV70
L3ULEV340	California LEV-III ULEV340	T4B170	Federal Tier 4 MDV Bin 170
L3ULEV250	California LEV-III ULEV250	T4B150	Federal Tier 4 MDV Bin 150
L3ULEV200	California LEV-III ULEV200	T4B125	Federal Tier 4 MDV Bin 125
L3SULEV170	California LEV-III SULEV170	T4B100	Federal Tier 4 MDV Bin 100
L3SULEV150	California LEV-III SULEV150	T4B85	Federal Tier 4 MDV Bin 85
L3LEV630	California LEV-III LEV630	T4B75	Federal Tier 4 MDV Bin 75
L3ULEV570	California LEV-III ULEV570	T4B70	Federal Tier 4 Bin 70
L3ULEV400	California LEV-III ULEV400	T4B65	Federal Tier 4 Bin 65
L3ULEV270	California LEV-III ULEV270	T4B60	Federal Tier 4 Bin 60
L3SULEV230	California LEV-III SULEV230	T4B55	Federal Tier 4 Bin 55
L3SULEV200	California LEV-III SULEV200	T4B50	Federal Tier 4 Bin 50
T3B160	Federal Tier 3 Bin 160	T4B45	Federal Tier 4 Bin 45
T3B125	Federal Tier 3 Bin 125	T4B40	Federal Tier 4 Bin 40
T3B110	Federal Tier 3 Transitional Bin 110	T4B35	Federal Tier 4 Bin 35
T3B85	Federal Tier 3 Transitional Bin 85	T4B30	Federal Tier 4 Bin 30
T3SULEV30	Federal Tier 3 Transitional LEV-II SULEV30 Carryover	T4B25	Federal Tier 4 Bin 25
T3B70	Federal Tier 3 Bin 70	T4B20	Federal Tier 4 Bin 20
T3B50	Federal Tier 3 Bin 50	T4B15	Federal Tier 4 Bin 15
T3B30	Federal Tier 3 Bin 30	T4B10	Federal Tier 4 Bin 10
T3B20	Federal Tier 3 Bin 20	T4B5	Federal Tier 4 Bin 5
T3B0	Federal Tier 3 Bin 0	T4B0	Federal Tier 4 Bin 0
HDV2B395	Federal Tier 3 HD Class 2b Transitional Bin 395		
<b>Transmission Type Code</b>			
AMS	Automated Manual- Selectable (e.g. Automated Manual with paddles)	M	Manual
A	Automatic	OT	Other
AM	Automated Manual	SA	Semi-Automatic
CVT	Continuously Variable	SCV	Selectable Continuously Variable (e.g. CVT with paddles)
<b>Drive System Code</b>			
4	4-Wheel Drive	P	Part-time 4-Wheel Drive

## Certification Summary Information Report

<b>Test Group</b>	VHYXV00.0W04	<b>Evaporative/Refueling Family</b>		--
F	2-Wheel Drive, Front	A	All Wheel Drive	
R	2-Wheel Drive, Rear			
<b>Additional Terms and Acronyms</b>				
AFC	Alternative Fuel Converter	ICI	Independent Commercial Importer	
CSI	Certificate Summary Information	ORVR	Onboard Refueling Vapor Recovery	
DF	Deterioration Factor	SIL	Shift Indicator Light	
Evap	Evaporation, Evaporative	Trans	Transmission	