

Emission Limits for Light Vehicles (≤ 3.5 tonnes GVM) under UN Regulation 83/.. at Euro 2, 3, 4, 5 & 6 levels

		Reference mass (RW) (kg)	Limit Values (g/km)									
			Mass of carbon monoxide (CO)		Mass of hydrocarbons [Total and Non-methane] (THC) (NMHC) ⁽⁶⁾		Mass of oxides of nitrogen (NOx)		Combined mass of total hydrocarbons and oxides of nitrogen (THC+NOx)		Mass of particulates ⁽¹⁾ (PM)	
Category	Class		Petrol	Diesel	Petrol	Diesel	Petrol	Diesel	Petrol	Diesel	Diesel ⁽⁵⁾	
Euro 2	M ⁽²⁾	All	2.2	1.0	-	-	-	-	0.5	0.7	0.08	
	N ₁ ⁽³⁾	I	RW \leq 1250	2.2	1.0	-	-	-	0.5	0.7	0.08	
		II	1250 < RW \leq 1700	4.0	1.25	-	-	-	0.6	1.0	0.12	
		III	1700 < RW	5.0	1.5	-	-	-	0.7	1.2	0.17	
Euro 3	M ⁽²⁾	All	2.3	0.64	0.20	-	0.15	0.50	-	0.56	0.05	
	N ₁ ⁽³⁾	I	RW \leq 1305	2.3	0.64	0.20	-	0.15	0.50	-	0.56	0.05
		II	1305 < RW \leq 1760	4.17	0.80	0.25	-	0.18	0.65	-	0.72	0.07
		III	1760 < RW	5.22	0.95	0.29	-	0.21	0.78	-	0.86	0.10
Euro 4	M ⁽²⁾	All	1.0	0.50	0.10	-	0.08	0.25	-	0.30	0.025	
	N ₁ ⁽³⁾	I	RW \leq 1305	1.0	0.50	0.10	-	0.08	0.25	-	0.30	0.025
		II	1305 < RW \leq 1760	1.81	0.63	0.13	-	0.10	0.33	-	0.39	0.04
		III	1760 < RW	2.27	0.74	0.16	-	0.11	0.39	-	0.46	0.06
Euro 5⁽⁴⁾	M	All	1.0	0.50	0.10 (0.068)	-	0.06	0.18	-	0.23	0.0045	
	N ₁	I	RW \leq 1305	1.0	0.50	0.10 (0.068)	-	0.06	0.18	-	0.23	0.0045
		II	1305 < RW \leq 1760	1.81	0.63	0.13 (0.09)	-	0.075	0.235	-	0.295	0.0045
		III	1760 < RW	2.27	0.74	0.16 (0.108)	-	0.082	0.28	-	0.35	0.0045
Euro 6⁽⁴⁾	M	All	1.0	0.50	0.10 (0.068)	-	0.06	0.08	-	0.17	0.0045	
	N ₁	I	RW \leq 1305	1.0	0.50	0.10 (0.068)	-	0.06	0.08	-	0.17	0.0045
		II	1305 < RW \leq 1760	1.81	0.63	0.13 (0.09)	-	0.075	0.105	-	0.195	0.0045
		III	1760 < RW	2.27	0.74	0.16 (0.108)	-	0.082	0.125	-	0.215	0.0045

- (1) For compression ignition (diesel) engines only
- (2) Except Category M vehicles of which the maximum mass exceeds 2,500 kg. For ADR79/00 (Euro 2) only, category M vehicles with more than 6 seats are also covered by the N category
- (3) And those Category M vehicles which are specified in note (2)
- (4) A particle number standard of 6.0×10^{11} particles/km will apply to diesel vehicles from Euro 5 onwards
- (5) PM mass limits also apply from Euro 5 onwards to petrol vehicles with direct injection engines
- (6) Separate NMHC limits only apply from Euro 5 onwards

Timetable for adoption of UN Regulation 83/.. standards in ADR79/..#:

Light Petrol, LPG and NG Vehicles

Euro 2 adopted in ADR79/00 from 1/1/03 to 1/1/04
Euro 3 adopted in ADR79/01 from 1/1/05 to 1/1/06
Euro 4 adopted in ADR79/02 from 1/7/08 to 1/7/10
Euro 5 adopted in ADR79/03 (Core Euro 5)¹ from 1/11/13
and ADR79/04 (Full Euro 5) from 1/11/16
Euro 6 to be adopted in ADR79/05 from 1/7/17 to 1/7/18

Light Diesel Vehicles

Euro 2 adopted in ADR79/00 from 1/1/02 to 1/1/03
Euro 3 (never formally adopted)
Euro 4 adopted in ADR79/01² from 1/1/06 to 1/1/07
Euro 5 adopted in ADR79/03 (Core Euro 5) from 1/11/13
and ADR79/04 (Full Euro 5) from 1/11/16
Euro 6 to be adopted in ADR79/05 from 1/7/17 to 1/7/18

ADR79/05 will be formally determined by the Minister when UN Regulation 83 has been amended to incorporate the Euro 6 standards.

in each case, the first date applies to vehicle models first produced on or after that date, with all new vehicles required to comply by the second date.

¹ The "core" Euro 5 requirements which apply in ADR79/03 require compliance with all the technical requirements of UN Regulation 83/06 except that ADR79/03:

- allows the provision of PM mass emissions data based on the previous UN R83/05 (Annex 4) Type I test procedure (with a PM mass emissions limit of 0.005g/km) in lieu of data collected under the revised test procedure (Annex 4a of UN R83/06) which specifies a limit of 0.0045g/km);
- accepts a relaxed OBD threshold limit (80mg/km) for PM mass for M and N category vehicles of reference mass >1760kg;
- does not require compliance with the PM number limit specified for diesel vehicles in UN R83/06;
- does not require compliance with the In Use Performance Ratio for OBD systems in UN R83/06;
- does not require the NOx monitoring for petrol vehicles specified in UN R83/06; and
- only requires flex fuel vehicles to meet the Type VI test when tested on petrol (details of requirements for flex fuel vehicles to meet the Type VI test under ADR79/04 and ADR79/05 at low temperature to be determined by 31 December 2011).

² Euro 4 was first adopted for light diesel vehicles in ADR79/01, but was effectively replaced by ADR79/02 from 1/7/08.