



Brussels, 19.3.2018
COM(2018) 137 final

2018/0065 (COD)

Proposal for a

REGULATION OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL

**amending Regulation (EU) No 168/2013 as regards the application of the Euro 5 step to
the type-approval of two- or three- wheel vehicles and quadricycles**

EXPLANATORY MEMORANDUM

1. CONTEXT OF THE PROPOSAL

• Reasons for and objectives of the proposal

The term 'L-category vehicles' covers a wide range of light vehicle types with two, three or four wheels, e.g. powered cycles, two- and three-wheel mopeds, two- and three-wheel motorcycles, motorcycles with side-cars and four-wheel vehicles (quadricycles) such as on-road quads, all-terrain vehicles and quadrimobiles.

Type-approval requirements applying to 'L-category vehicles' as of 1 January 2016 are set out in Regulation (EU) No 168/2013 and its four delegated and implementing acts¹.

The Commission has drafted on the basis of a comprehensive environmental effect study² a report to Parliament and Council; in accordance with Regulation (EU) No 168/2013 Article 23(4). The conclusions of the report pointed out recommendations for improvements to Regulation (EU) No 168/2013, as well as Commission Delegated Regulation (EU) No 44/2014, and Commission Delegated Regulation (EU) No 134/2014 supplementing Regulation (EU) No 168/2013. The recommendations are reflected in Article 1 (1) and (2) of this Regulation, proposing amendments to Articles 21 and 23 of Regulation (EU) No 168/2013.

Since the type-approval requirements in Regulation (EU) No 168/2013 have already been applicable on a mandatory basis since 1 January 2016, this act is proposed for adoption at the earliest possible delay and, contrary to most type-approval acts, does not provide for a separate application date.

Regulation (EU) No 168/2013 limited all empowerments of the Commission to adopt delegated acts to a period of five years which will expire on 21 March 2018. As there is a continuous need to constantly update elements of the type-approval acts to technical progress or to introduce other amendments in line with the empowerments, the draft proposal also amends Article 75 (2) of Regulation (EU) No 168/2013 to provide for an empowerment of another five years with the possibility for tacit extension.

¹ OJ L 60, 2.3.2013, p. 52. Regulation (EU) No 168/2013 of the European Parliament and of the Council of 15 January 2013 on the approval and market surveillance of two- or three-wheel vehicles and quadricycles.

Commission Delegated Regulation (EU) No 134/2014 of 16 December 2013 supplementing Regulation (EU) No 168/2013 of the European Parliament and of the Council with regard to environmental and propulsion unit performance requirements and amending Annex V thereof (OJ L 53, 21.2.2014, p. 1).

Commission Delegated Regulation (EU) No 44/2014 of 21 November 2013 supplementing Regulation (EU) No 168/2013 of the European Parliament and of the Council with regard to the vehicle construction and general requirements for the approval of two- or three-wheel vehicles and quadricycles (OJ L 25, 28.1.2014, p. 1).

Commission Delegated Regulation (EU) No 3/2014 of 24 October 2013 supplementing Regulation (EU) No 168/2013 of the European Parliament and of the Council with regard to vehicle functional safety requirements for the approval of two- or three-wheel vehicles and quadricycles (OJ L 7, 10.1.2014, p. 1–12).

² The report of the study: "Effect study of the environmental step Euro 5 for L-category vehicles", EU-Books (ET-04-17-619-EN-N).

2. LEGAL BASIS, SUBSIDIARITY AND PROPORTIONALITY

- **Legal basis**

The legal basis of this act is the same as the one of the act to be amended, Article 114 TFEU.

- **Proportionality**

Regulation (EU) No 168/2013 containing the EU type approval requirements is based on the concept of total harmonisation. Therefore the amendments to be introduced into the requirements of that Regulation on the basis of the findings of the comprehensive environmental effects study are considered most suitable for achieving the objective outlined in recital (9) of Regulation (EU) No 168/2013 to achieve a high level of environmental protection.

- **Choice of the instrument**

The use of a Regulation is considered to be appropriate because it amends the existing Regulation.

3. RESULTS OF EX-POST EVALUATIONS, STAKEHOLDER CONSULTATIONS AND IMPACT ASSESSMENTS

- **Ex-post evaluations/fitness checks of existing legislation**

The Commission sent on the basis of a comprehensive environmental effect study a report to Parliament and Council in accordance with the obligation in Article 23(4) and (5) of Regulation (EU) No 168/2013. In line with the conclusions of the Commission report and in order to ensure accurate application of the Regulations, the items identified should be added or clarified by way of amendments.

The overall outcome of the study clearly shows that the limits, dates and requirements set out in the Regulation are cost beneficial and technically feasible for all L-category vehicles.

- **Stakeholder consultations**

The Commission report makes several recommendations for amendments to Regulation (EU) No 168/2013. The recommendations are derived from stakeholder consultations during the whole duration of the study. Furthermore, progress updates on the study were provided at the Motor Cycle Working Group meetings with all the relevant stakeholders and Member States representatives, during the sessions in May, September and December 2016 and March and June 2017.

The Commission has tabled in March 2017 a first version of the document and received feedback from industry stakeholders, approval authorities, technical services and social partners, who are supportive of the enclosed draft document.

Proposal for a

REGULATION OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL

amending Regulation (EU) No 168/2013 as regards the application of the Euro 5 step to the type-approval of two- or three- wheel vehicles and quadricycles

THE EUROPEAN PARLIAMENT AND THE COUNCIL OF THE EUROPEAN UNION,

Having regard to the Treaty on the Functioning of the European Union, and in particular Article 114 thereof,

Having regard to the proposal from the European Commission,

After transmission of the draft legislative act to the national parliaments,

Having regard to the opinion of the European Economic and Social Committee,

Acting in accordance with the ordinary legislative procedure,

Whereas:

- (1) On the basis of the Commission report to the European Parliament and the Council on the comprehensive effect study of the environmental step Euro 5 for L-category vehicles³ in accordance with Article 23(4) of Regulation (EU) No 168/2013 of the European Parliament and of the Council⁴ regarding the Euro 5 emission step, and taking into account issues encountered by approval authorities and stakeholders in applying that Regulation, certain changes and clarifications should be made in Regulation (EU) No 168/2013 in order to ensure its smooth application.
- (2) Regarding the requirement to install an on-board diagnostic system (OBD) of stage II, which ensures the monitoring and reporting on the emission control system failures and degradation, the Commission concluded on the basis of the comprehensive environmental effect study that there are technical limitations with respect to catalyst monitoring for certain vehicles and that further development is required to ensure its correct implementation. Catalyst monitoring is not expected to be ready for the first round of the Euro 5 emission step, but should be envisaged for 2025. Article 21 of Regulation (EU) No 168/2013 should therefore provide for the lead time needed to ensure the correct implementation of the OBD system of stage II requirement.
- (3) It is necessary to clarify the exemption for mopeds (L1e and L2e categories) from the OBD system of stage II requirement and to extend that exemption to light quadricycles (L6e category) and to the enduro (L3e-AxE) and trial (L3e-AxT) motorcycle sub-categories.
- (4) Given that mopeds of vehicle categories L1e and L2e are already excluded from the OBD system of stage II requirement, the vehicles of category L6e which are designed

³ The report of the study: "Effect study of the environmental step Euro 5 for L-category vehicles", EU-Books (ET-04-17-619-EN-N).

⁴ Regulation (EU) No 168/2013 of the European Parliament and of the Council of 15 January 2013 on the approval and market surveillance of two- or three-wheel vehicles and quadricycles (OJ L 60, 2.3.2013, p. 52).

and built around moped specifications and produced in rather small volumes should also be exempted from that requirement.

- (5) Enduro and trial motorcycles have a short lifetime and are very similar in nature and use to heavy all-terrain quad (L7e-B) which are exempted from the OBD system stage II requirement. That exemption should therefore be extended to enduro and trial motorcycles.
- (6) The Commission concluded in its report to the European Parliament and the Council on the basis of the comprehensive environmental effect study that the mathematical durability procedure set out in Article 23(3) (c) of Regulation (EU) No 168/2013, whereby vehicles are tested after 100 km of use, does not reflect the real degradation of the emissions control system of a vehicle during its lifetime. That method should no longer be used and should as a result be phased out by 2025 to provide sufficient lead time to stakeholders to adapt. For the period until 2025, the required accumulated distance travelled by the vehicle before it is tested should be raised to ensure that the test results are reliable.
- (7) The technology that is necessary to meet the Euro 5 limits is already available however the Commission concluded in its report to the European Parliament and the Council on the basis of the comprehensive environmental effect study carried out according to Article 23(4) of Regulation (EU) No 168/2013 of the European Parliament and of the Council regarding the Euro 5 emission step, that the date of application of the Euro 5 emission limits for certain L-category vehicles (L6e-B, L2e-U, L3e-AxT and L3e-AxE) will need to be postponed from 2020 to 2022 to increase the cost beneficial ratio compared to the base line. In addition manufacturers of these vehicles, which are mainly SMEs, require more lead time to ensure that the transition towards zero emission powertrains, such as electrification can be achieved in a cost effective way.
- (8) Certain inconsistencies in the date of application of the sound level limits for Euro 5 in Annex IV to Regulation (EU) No 168/2013 should be clarified to ensure that the existing limits (Euro 4) stay applicable until the new limits for Euro 5 can be established.
- (9) Regulation (EU) No 168/2013 empowered the Commission to adopt delegated acts for a period of five years, which will expire on 21 March 2018. As there is a continuous need to update elements of the type-approval legislation to technical progress or to introduce other amendments in line with the empowerments, Article 75(2) of that Regulation should be amended to provide for the extension of the delegation for another five years with the possibility for tacit extension.
- (10) In the interest of legal certainty, the empowerment in Regulation (EU) No 168/2013 for the Commission to adopt delegated acts concerning the technical requirements related to on-board diagnostics should be made clearer and more precise.
- (11) As this Regulation modifies Regulation (EU) No 168/2013 without expanding its regulatory content and since the objectives of this Regulation cannot be sufficiently achieved by the Member States but can rather, by reason of its scale and effects, be better achieved at Union level, the Union may adopt measures, in accordance with the principle of subsidiarity as set out in Article 5 of the Treaty on European Union. In accordance with the principle of proportionality as set out in that Article, this Regulation does not go beyond what is necessary in order to achieve those objectives.
- (12) Regulation (EU) No 168/2013 should therefore be amended accordingly,

HAVE ADOPTED THIS REGULATION:

Article 1

Regulation (EU) No 168/2013 is amended as follows:

(1) Article 21 is replaced by the following:

"Article 21

General requirements of on-board diagnostic systems

1. L-category vehicles, with the exception of L1e, L2e and L6e vehicles, shall be equipped with an OBD system which complies with the functional requirements and test procedures laid down in the delegated acts adopted pursuant to paragraph 8 and as from the application dates set out in Annex IV.
2. From the dates set out in point 1.8.1 of Annex IV, vehicle (sub-) categories L3e, L4e, L5e-A and L7e-A shall be equipped with an OBD stage I system which monitors for any electric circuit and electronics failure of the emission control system and reports those failures which result in the emission thresholds laid down in Annex VI (B1) being exceeded.
3. From the dates set out in point 1.8.2 of Annex IV, vehicle (sub-) categories L3e, L4e, L5e and L7e shall be equipped with an OBD stage I system which monitors for any electric circuit and electronics failure of the emission control system and which is triggered when the emission thresholds laid down in Annex VI (B1) are being exceeded. OBD stage I systems for those vehicle (sub-) categories shall also report the triggering of any operating mode which significantly reduces engine torque.
4. From the dates set out in point 1.8.3 of Annex IV, vehicle (sub-) categories L3, L4e, L5e and L7e shall be equipped with an OBD stage I system which monitors for any electric circuit and electronics failure of the emission control system and which is triggered when the emission thresholds laid down in Annex VI (B2) are being exceeded. OBD stage I systems for those vehicle (sub-) categories shall also report the triggering of any operating mode which significantly reduces engine torque.
5. From the dates set out in point 1.8.4 of Annex IV, vehicle (sub-) categories L3e, L4e, L5e-A and L7e-A shall in addition be equipped with an OBD stage II system which monitors and reports emission control system failures and degradation, with the exception of catalyst monitoring, which result in the OBD emission thresholds laid down in Annex VI (B1) being exceeded.
6. From the dates set out in point 1.8.5 of Annex IV, vehicle (sub-) categories L3e, L4e, L5e-A and L7e-A shall in addition be equipped with an OBD stage II system which monitors and reports emission control system failures and degradation which result in the OBD emission thresholds laid down in Annex VI (B2) being exceeded.
7. Paragraphs 5 and 6 shall not apply to enduro motorcycles in category L3e-AxE and trial motorcycles in category L3e-AxT.
8. In order to harmonise the OBD system reporting of functional safety or emission control system faults and facilitate effective and efficient repair of a vehicle, the Commission shall be empowered to adopt delegated acts in accordance with Article 75 concerning the detailed technical requirements related to on-board diagnostics with respect to vehicle categories as set out in Annex II, C1 – Vehicle construction and general type-approval requirements, row 11, including functional OBD

requirements and test procedures for the subjects listed in paragraphs 1 to 7 of this Article, and concerning the detailed technical requirements related to test type VIII referred to in Annex V.”;

(2) In Article 23(3), point (c) is replaced by the following:

“(c) mathematical durability procedure:

Until 31 December 2024, for each emission constituent, the product of the multiplication of the deterioration factor set out in Annex VII (B) and the environmental performance test result of a vehicle which has accumulated more than 100 km after it was first started at the end of the production line shall be lower than the environmental performance test limit set out in Annex VI (A).

Notwithstanding the first subparagraph, for new types of vehicles as of 1 January 2020 and for existing types of vehicles as of 1 January 2021 until 31 December 2024, for each emission constituent the product of the multiplication of the deterioration factor set out in Annex VII (B) and the environmental performance test result of a vehicle which has accumulated more than 2500 km for a vehicle with a max speed of < 130 km/h and 3500 km for a vehicle with a max speed \geq 130 km/h after it was first started at the end of the production line shall be lower than the environmental performance limit set out in Annex VI (A).”;

(3) Article 75(2) is replaced by the following:

“2. The power to adopt delegated acts referred to in Article 18(3), Article 20(2), Article 21(8), Article 22(5) and (6), Article 23(6) and (12), Article 24(3), Article 25(8), Article 32(6), Article 33(6), Article 50(4), Article 54(3), Article 57(12), Article 65 and Article 74 shall be conferred on the Commission for a period of ten years from 22 March 2013. The delegation of power shall be tacitly extended for periods of five years, unless the European Parliament or the Council opposes such extension not later than three months before the end of each period. The Commission shall draw up a report in respect of the delegation of power not later than 22 June 2022 and nine months before the end of each following five-year period.”;

(4) Annex IV is amended in accordance with the Annex to this Regulation.

Article 2

This Regulation shall enter into force on the twentieth day following that of its publication in the *Official Journal of the European Union*.

This Regulation shall be binding in its entirety and directly applicable in all Member States.

Done at Brussels,

For the European Parliament
The President

For the Council
The President