



2025/656

18.6.2025

COMMISSION DELEGATED REGULATION (EU) 2025/656

of 2 April 2025

amending Regulation (EU) 2023/1804 of the European Parliament and of the Council as regards standards for wireless recharging, electric road system, vehicle-to-grid communication and hydrogen supply for road transport vehicles

THE EUROPEAN COMMISSION,

Having regard to the Treaty on the Functioning of the European Union,

Having regard to Regulation (EU) 2023/1804 of the European Parliament and of the Council of 13 September 2023 on the deployment of alternative fuels infrastructure, and repealing Directive 2014/94/EU ⁽¹⁾, and in particular Article 21(3) thereof,

Whereas:

- (1) The Commission may amend Annex II on technical specifications of Regulation (EU) 2023/1804 to introduce new technical specifications or update references to the standards set out in that Annex to enable full technical interoperability of the recharging and refuelling infrastructure in terms of physical connections, communication exchanges and access for persons with reduced mobility.
- (2) The Commission may request, pursuant to Article 21(2) of Regulation (EU) 2023/1804, that European standardisation organisations (ESOs) draft European standards setting technical specifications for areas referred to in Annex II to that Regulation for which no common technical specifications have been adopted by the Commission.
- (3) In 2022, pursuant to Article 10(1) of Regulation (EU) No 1025/2012 of the European Parliament and of the Council ⁽²⁾, the Commission requested that the European Committee for Standardization (CEN) and the European Committee for Electrotechnical Standardization (Cenelec) develop and adopt appropriate European standards as regards communication exchange, electricity and hydrogen supply for road, maritime transport and inland navigation (M-581) ⁽³⁾.
- (4) By letter of 17 July 2024, CEN and Cenelec informed the Commission that several requested standardisation works had been finalised. CEN and Cenelec recommended that the Commission include those standards in the relevant Union legal framework. Technical specifications referred to in Annex II to Regulation (EU) 2023/1804 should reflect those recommendations.
- (5) In order to allow seamless use of alternative fuels vehicles across the Union, technical provisions for ‘interoperability’ should strictly refer to the capacity of both publicly accessible and private recharging and refuelling points for alternative fuels to supply energy that is compatible with all relevant vehicle technologies.
- (6) The technical specifications on direct current (DC) normal-power recharging points for electric vehicles are currently included in point 1.2 of Annex II to Regulation (EU) 2023/1804, which relates to technical specifications for high-power recharging points while they should be included in point 1.1 of Annex II. The titles of points 1.1 and 1.2 should also be changed to clarify that they apply to light-duty electric vehicles only.

⁽¹⁾ OJ L 234, 22.9.2023, p. 1, ELI: <http://data.europa.eu/eli/reg/2023/1804/oj>.

⁽²⁾ Regulation (EU) No 1025/2012 of the European Parliament and of the Council of 25 October 2012 on European standardisation, amending Council Directives 89/686/EEC and 93/15/EEC and Directives 94/9/EC, 94/25/EC, 95/16/EC, 97/23/EC, 98/34/EC, 2004/22/EC, 2007/23/EC, 2009/23/EC and 2009/105/EC of the European Parliament and of the Council and repealing Council Decision 87/95/EEC and Decision No 1673/2006/EC of the European Parliament and of the Council (OJ L 316, 14.11.2012, p. 12, ELI: <http://data.europa.eu/eli/reg/2012/1025/oj>).

⁽³⁾ Commission Implementing Decision on a standardisation request to the European standardisation organisations as regards communication exchange, electricity and hydrogen supply for road, maritime transport and inland navigation in support of Directive 2014/94/EU and its planned revision under the ‘Fit for 55’ package (M-581) (C(2022) 1710).

- (7) CEN and Cenelec informed the Commission that the standards for normal- and high-power recharging points for electric vehicles included in points 1.1 and 1.2 of Annex II to Regulation (EU) 2023/1804 should be updated due to a title change. The purpose is to replace the reference to 'interchangeability requirements' that were not addressed in the standard by 'compatibility requirements'. The new versions for the relevant parts of the standard that should at least apply to those newly installed or renovated recharging points are EN IEC 62196-2:2022 and EN IEC 62196-3:2022. In order to avoid the potential replacement of currently functioning hardware, existing normal- and high-power recharging points should continue to comply with the relevant standard parts EN IEC 62196-2:2017 and EN IEC 62196-3:2014 until they are renovated.
- (8) Standard part EN IEC 61851-1:2019 describes four possible modes of recharging (Modes 1, 2, 3 and 4). These recharging modes provide important operational characteristics, functions and technical conditions related to the recharging point, such as electrical safety aspects and operational characteristics that electrical vehicles need to comply with to recharge safely and successfully. For easy market interpretation, the different recharging modes related to the standards for recharging points laid down in Annex II to Regulation (EU) 2023/1804 should be included in that Regulation together with the relevant standards.
- (9) CEN and Cenelec informed the Commission that it should be allowed, for interoperability purposes, that alternating current (AC) normal power private recharging points for electric vehicles are also equipped with socket outlets for Mode 2 recharging compliant with standard part IEC 60884-1:2022. Part 1 of that standard should apply to plugs and fixed or portable socket-outlets for AC recharging only, intended for household and similar purposes, either indoors or outdoors, where Mode 2 includes an in-cable control and protection device (IC-CPD) ensuring protection, control and safe power setting.
- (10) The definition of 'recharging point' in Article 2, point (48), of Regulation (EU) 2023/1804 covers devices with a power output less than or equal to 3,7 kW and whose primary purpose is the recharging of electric vehicles in Mode 2. Those devices should therefore also be included in point 1.1 of Annex II to Regulation (EU) 2023/1804. For interoperability purposes, AC normal power private recharging points whose primary purpose is the recharging of electric vehicles should be equipped at least with socket outlets or vehicle connectors of Type 2 for Mode 3 recharging as described in EN IEC 62196-2:2022. Alternatively, if their power output is less than or equal to 3,7 kW, and their primary purpose is the recharging of electric vehicles exclusively in Mode 2, they should be equipped at least with socket outlets for Mode 2 recharging compliant with IEC 60884-1:2022.
- (11) CEN and Cenelec informed the Commission that the standards for recharging points for L-category electric vehicles included in point 1.3(a) and (b) of Annex II to Regulation (EU) 2023/1804 should be updated. For the standard in point 1.3(a), the update is necessary due to a title change in order to replace the reference to 'interchangeability requirements'. For the standard in point 1.3(b), the update is necessary to incorporate several technical improvements, including the clarification of definitions not addressed in the standard by 'compatibility requirements'. The new versions for the relevant parts of the standards are EN IEC 62196-2:2022 and IEC 60884-1:2022. The title of point 1.3 should also be changed to clarify that in the context of Regulation (EU) 2023/1804 it applies to L-category electric vehicles only. As this Regulation changes the titles of points 1.1 and 1.2 of Annex II to Regulation (EU) 2023/1804, the relevant standard parts for AC and DC normal power and high-power recharging points that are applicable to L-category electric vehicles should also be referred to under point 1.3 of that Annex, as they remain applicable for those vehicles. In order to avoid the potential replacement of currently functioning hardware, the transition of those standard parts to the new versions EN IEC 62196-2:2022 and EN IEC 62196-3:2022 for newly installed and renovated recharging points under point 1.3.2 and 1.3.3 of Annex II to Regulation (EU) 2023/1804 should follow the same approach as for the recharging points under points 1.1 and 1.2 of that Annex. The amendments to the titles and scope of points 1.1, 1.2 and 1.3 of Annex II to Regulation (EU) 2023/1804 are necessary to achieve a clearer presentation of the standards applicable for each vehicle category.

- (12) Recharging of electric vehicles in Mode 2 should be possible using the standard socket-outlet in each Member State. Therefore, compliance of recharging points with socket-outlets of standard part IEC 60884-1:2022, as required pursuant to points 1.1 and 1.3(b) of Annex II to Regulation (EU) 2023/1804, should be ensured if the socket-outlets of the recharging points are compliant with the national system of the Member State, based on standard part IEC 60884-1:2022, where the recharging point is deployed. Products, including socket outlets for electric recharging, are to comply with Regulation (EU) 2023/988 of the European Parliament and of the Council ⁽⁴⁾.
- (13) CEN and Cenelec informed the Commission that the standards for normal- and high-power recharging points for electric buses included in point 1.4 of Annex II to Regulation (EU) 2023/1804 should be updated due to a title change. This is to replace the reference to 'interchangeability requirements' that were not addressed in the standard by 'compatibility requirements'. The new versions for the relevant parts of the standards that should at least apply to those newly installed or renovated recharging points are EN IEC 62196-2:2022 and EN IEC 62196-3:2022. In order to avoid the potential replacement of currently functioning hardware, existing normal- and high-power recharging points should continue to comply with the relevant standard parts EN IEC 62196-2:2017 and EN IEC 62196-3:2014 until they are renovated.
- (14) Considering the already ongoing deployment of recharging infrastructure dedicated to heavy-duty electric vehicles, it is necessary to set out relevant common technical specifications to ensure interoperability of such infrastructure. Pending adoption of the relevant final standards containing the technical specifications for the megawatt charging system (MCS), it is necessary to ensure the interoperability of recharging infrastructure capable of supplying electricity to both light-duty and heavy-duty electric vehicles. For this purpose, under point 1.6 of Annex II to Regulation (EU) 2023/1804, DC high-power recharging points for light-duty and heavy-duty electric vehicles should be equipped with vehicle connectors of the 'Combo 2' combined charging system for Mode 4 recharging, as described in standard part EN IEC 62196-3:2022. However, that standard should not apply to recharging infrastructure dedicated exclusively to heavy-duty vehicles and equipped solely with the MCS, as the relevant technical specifications will be introduced in Regulation (EU) 2023/1804 once the standardisation work for the MCS is completed.
- (15) CEN and Cenelec informed the Commission of the standards recommended to be applied to recharging points for inductive static wireless recharging for light-duty electric vehicles. Under point 1.7 of Annex II to Regulation (EU) 2023/1804, the standard parts EN IEC 61980-1:2021, IEN IEC 61980-2:2023 and EN IEC 61980-3:2022 should apply to those recharging points.
- (16) To corroborate the safe, secure and interoperable market implementation of Parts 1, 2 and 3 of standard EN IEC 61980, the wireless power transfer (WPT) system prototypes developed for inductive static wireless recharging of light-duty electric vehicles were tested by the Joint Research Centre of the Commission in accordance with methodologies set out in those parts of the standard. The testing results confirm that the WPT system prototypes fulfil the limits of Parts 1, 2 and 3 of standard EN IEC 61980 and that it is hence appropriate to introduce that standard in Regulation (EU) 2023/1804.
- (17) CEN and Cenelec informed the Commission of the standards recommended to be applied to recharging infrastructure for dynamic ground level power supply through conductive rails for light- and heavy-duty electric vehicles. The technical specification CLC/TS 50717:2022 should apply to such recharging infrastructure.
- (18) CEN and Cenelec informed the Commission of the standards recommended to be applied to publicly accessible recharging points for vehicle-to-grid communication interface for road vehicles, which should be set out under point 2.1 of Annex II to Regulation (EU) 2023/1804. The standard parts EN ISO 15118-1:2019, EN ISO 15118-2:2016, EN ISO 15118-3:2016, EN ISO 15118-4:2019 and EN ISO 15118-5:2019 should at least apply to those newly installed or renovated recharging points. In addition, CEN and Cenelec recommended that the publicly accessible recharging points for the vehicle-to-grid communication interface for road vehicles installed or renovated from 1 January 2027 should at least also comply with standard part EN ISO 15118-20:2022. Moreover, the private

⁽⁴⁾ Regulation (EU) 2023/988 of the European Parliament and of the Council of 10 May 2023 on general product safety, amending Regulation (EU) No 1025/2012 of the European Parliament and of the Council and Directive (EU) 2020/1828 of the European Parliament and the Council, and repealing Directive 2001/95/EC of the European Parliament and of the Council and Council Directive 87/357/EEC (OJ L 135, 23.5.2023, p. 1, ELI: <http://data.europa.eu/eli/reg/2023/988/oj>).

recharging points for vehicle-to-grid communication interface for road vehicles installed or renovated from 1 January 2027 should comply at least with standard part EN IEC 61851-1:2019 for Mode 2 recharging, and standard part EN ISO 15118-20:2022 for Mode 3 or Mode 4 recharging. It is appropriate to provide, for recharging points that need to comply with the newer and more complex standard part EN ISO 15118-20:2022, a reasonable transition period. Therefore, that standard part should apply to those recharging points from 1 January 2027.

- (19) CEN and Cenelec informed the Commission that current electric vehicles on the market are equipped only with standard part EN ISO 15118-2:2016. This was corroborated by experts from the Sustainable Transport Forum. Standard part EN ISO 15118-2:2016 lacks several relevant features and technical possibilities, such as advance smart recharging, bidirectional recharging or multi-contract handling for plug-and-charge. Those features are covered by standard part EN ISO 15118-20:2022. For this reason, to ensure that end users with electric vehicles currently equipped with EN ISO 15118-2:2016 are able to use recharging points during their vehicles' service life, it is appropriate that recharging points in the Union are also required to comply with EN ISO 15118-2:2016. For interoperability purposes, the co-existence of both standard parts EN ISO 15118-2:2016 and EN ISO 15118-20:2022 in publicly accessible recharging infrastructure should therefore be ensured under points 2.1.1 and 2.1.2 of Annex II to Regulation (EU) 2023/1804 until a full market transition to standard part EN ISO 15118-20:2022 is achieved.
- (20) Original equipment manufacturers are informed with this Regulation of the relevant standards applicable to publicly accessible and private recharging points. To ensure a rapid transition, they should consider such standards when bringing new electric vehicles to the market and, when technically possible, update existing electric vehicles currently on the market from EN ISO 15118-2:2016 to EN ISO 15118-20:2022. Likewise, when technically possible, recharging point operators should update existing recharging points on the market so that they support EN ISO 15118-20:2022 in addition to EN ISO 15118-2:2016 and other potential existing low-level communication solutions such as pulse width modulation (PWM) as described in EN IEC 61851-1:2019.
- (21) To avoid stranded investments in public and private recharging infrastructure, existing publicly accessible recharging points for Mode 3 and 4 recharging using low-level communication such as PWM, which are already capable of communicating with electric vehicles on the market equipped with EN ISO 15118-2:2016, should be exempted from implementing Parts 1 to 5 of standard EN ISO 15118 or subsequent extended versions like EN ISO 15118-20:2022. Upgrading existing publicly accessible recharging points using low-level communication to high-level communication as described in EN ISO 15118-2 and EN ISO 15118-20 could require significant software and hardware changes, possibly making the complete replacement of that functioning infrastructure necessary. For this reason, Parts 1 to 5 of standard EN ISO 15118 should apply only to newly installed or renovated publicly accessible recharging points. The most recent standard part EN ISO 15118-20:2022 should not apply to such newly installed or renovated recharging points until 1 January 2027 in order to provide a reasonable transition period for those recharging points.
- (22) In addition, for existing private recharging points for Mode 2 recharging, using low-level communication solutions such as PWM, that are already capable of covering basic recharging functions with normal household sockets and communicate with electric vehicles on the market equipped with EN ISO 15118-2:2016 should also be exempted from implementing Parts 1 to 5 of standard EN ISO 15118 or subsequent extended versions like ISO 15118-20:2022. This is because those standards would currently not bring any additional value to the end user. For this reason, standard part EN IEC 61851-1:2019 included in point 2.1.3(a) of Annex II to Regulation (EU) 2023/1804 should apply to newly installed or renovated private recharging points for Mode 2 recharging from 1 January 2027. In addition, with regard to private recharging points for Mode 3 and 4 recharging, where advanced recharging features such as smart and bidirectional recharging are enabled only with high-level communication, standard part EN ISO 15118-20:2022 included in point 2.1.3(b) of that Annex should not apply to such newly installed or renovated recharging points until 1 January 2027 in order to provide a reasonable transition period for those recharging points.

- (23) Operators and manufacturers of both publicly accessible and private recharging points specifically for Mode 3 and 4 recharging for electric vehicles should prepare and predispose their hardware and software to properly support standard part EN ISO 15118-20:2022 from 1 January 2027 in all newly installed or renovated recharging points. The overall implementation of standard parts EN ISO 15118-2 and EN ISO 15118-20 should be carried out in full, while their application should take into account the mandatory and optional functionalities already defined within those standard parts, as relevant to the various use cases and modes of recharging. This approach ensures the secure and interoperable implementation of the standard parts while appropriately addressing the different operational scenarios.
- (24) Plug-and-charge is a technological solution enabled by standard parts EN ISO 15118-2:2016 and EN ISO 15118-20:2022. It provides for automatic authentication and authorisation between the electric vehicle and the recharging station. This makes it possible to conduct a recharging session on the basis of a contract-based payment between the end user and the mobility service provider, including billing information. To conduct a recharging session, all electric vehicle drivers need to do is connect the connector of a recharging point to the electric vehicle, and the process will start automatically. The Union-wide implementation of plug-and-charge, along with the possibility for end users to access it in an interoperable manner throughout the Union, should provide additional opportunities for simplifying the process of electric vehicle recharging and improving the overall user experience.
- (25) Operators of publicly accessible recharging points can voluntarily decide whether they offer plug-and charge, or other relevant services such as smart and bidirectional charging, in line with the level of optionality laid down in standard parts EN ISO 15118-2:2016 and EN ISO 15118-20:2022. Plug-and-charge should be implemented in an interoperable manner throughout the Union to provide a simple and seamless user experience. For Union-wide interoperability and security purposes, all publicly accessible recharging points for AC and DC for light-duty and heavy-duty electric vehicles installed or renovated from 1 January 2027 that offer automatic authentication and authorisation services, such as plug-and-charge, should comply with both EN ISO 15118-2:2016 and EN ISO 15118-20:2022. Existing publicly accessible recharging points providing automatic authentication and authorisation services with a solution other than plug-and-charge based on EN ISO 15118-2:2016 and EN ISO 15118-20:2022 should be allowed to continue to do so until a full market transition has been achieved. Regulation (EU) 2023/1804 should ensure such interoperable and secure implementation of plug-and-charge.
- (26) The term 'installed' should be understood as the initial placement of all relevant recharging point equipment, including hardware, software and associated electrical infrastructure, such as electricity supply connections, transformers, and other electrical systems, to enable the recharging of electric vehicles. This is different from the recharging point being deployed, which would also require it to be fully operational and available to end users. The term 'renovated' should be understood as a major or complete replacement of relevant recharging point equipment. Regular maintenance updates, including the replacement of specific components, such as recharging cables should not be considered as renovation. CEN and Cenelec informed the Commission that the standard for refuelling points dispensing gaseous hydrogen used as fuel on board motor vehicles and the associated fuelling algorithm included in points 3.1 and 3.3 of Annex II to Regulation (EU) 2023/1804 should be updated due to a new version of the standard. Standard EN 17127:2024 should apply to those refuelling points and associated fuelling algorithms. CEN and Cenelec also informed the Commission of the standard recommended to be applied to connectors for refuelling points dispensing gaseous (compressed) hydrogen for heavy-duty vehicles. Under point 3.5 of Annex II to Regulation (EU) 2023/1804, standard EN 17127:2024 should apply to those refuelling points.
- (27) The title of point 3.1 of Annex II to Regulation (EU) 2023/1804 should also be changed to avoid market uncertainty and clarify that it applies to refuelling points dispensing gaseous (compressed) hydrogen for light-duty vehicles only. This title change will provide for better differentiation of the specific technical specifications for refuelling points dispensing gaseous (compressed) hydrogen for light-duty vehicles in point 3.1 of Annex II and avoid overlaps with the technical specifications for heavy-duty vehicles in point 3.5 of that Annex, while maintaining the same scope.

- (28) Directive (EU) 2022/2555 of the European Parliament and of the Council⁽⁵⁾ sets out requirements concerning national capabilities in the area of cybersecurity, requires Member States to adopt national cybersecurity strategies, and introduces rules and obligations on cybersecurity risk-management and information sharing. As Directive (EU) 2022/2555 includes operators of recharging points as part of a sector of high criticality, the application of that Directive and the requirements set out in Regulation (EU) 2023/1804 should be complementary.
- (29) Regulation (EU) 2023/1804 should therefore be amended accordingly.
- (30) Article 21(6) of Regulation (EU) 2023/1804 requires amendments of Annex II to that Regulation adopted by delegated acts to include reasonable transitional periods before the provisions contained therein become binding. Therefore, this Regulation should provide for a general deferred date of application,

HAS ADOPTED THIS REGULATION:

Article 1

Annex II to Regulation (EU) 2023/1804 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*.

It shall apply from 8 January 2026.

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

Done at Brussels, 2 April 2025.

For the Commission
The President
Ursula VON DER LEYEN

⁽⁵⁾ Directive (EU) 2022/2555 of the European Parliament and of the Council of 14 December 2022 on measures for a high common level of cybersecurity across the Union, amending Regulation (EU) No 910/2014 and Directive (EU) 2018/1972, and repealing Directive (EU) 2016/1148 (NIS 2 Directive) (OJ L 333, 27.12.2022, p. 80, ELI: <http://data.europa.eu/eli/dir/2022/2555/oj>).

ANNEX

Annex II to Regulation (EU) 2023/1804 is amended as follows:

(1) the following point 0 is inserted:

‘0. Definitions:

For the purpose of this Annex, the following definitions apply:

- (a) “installed” means the initial placement of all relevant recharging point equipment, including hardware, software and associated electrical infrastructure, such as electricity supply connections, transformers, and other electrical systems, to enable the recharging of electric vehicles;
- (b) “renovated” means a major or complete replacement of relevant recharging point equipment.’;

(2) points 1.1 to 1.4 are replaced by the following:

‘1.1. Normal-power recharging points for light-duty electric vehicles:

- alternating current (AC) normal-power recharging points for light-duty electric vehicles installed or renovated from 8 January 2026 shall be equipped, for interoperability purposes, at least with socket-outlets or vehicle connectors of Type 2 for Mode 3 recharging as described in standard EN IEC 62196-2:2022 or, if their power is less than or equal to 3,7 kW and their primary purpose is the recharging of electric vehicles in Mode 2, with socket-outlets compliant with standard IEC 60884-1:2022; alternating current (AC) normal-power recharging points installed before that date shall continue to comply with standard EN IEC 62196-2:2017 until they are renovated;
- direct current (DC) normal-power recharging points for light-duty electric vehicles installed or renovated from 8 January 2026 shall be equipped, for interoperability purposes, at least with vehicle connectors of the combined charging system “Combo 2” for Mode 4 recharging as described in standard EN IEC 62196-3:2022; direct current (DC) normal-power recharging points installed before that date shall continue to comply with standard EN IEC 62196-3:2014 until they are renovated.

1.2. High-power recharging points for light-duty electric vehicles:

- alternating current (AC) high-power recharging points for light-duty electric vehicles installed or renovated from 8 January 2026 shall be equipped, for interoperability purposes, at least with vehicle connectors of Type 2 for Mode 3 recharging as described in standard EN IEC 62196-2:2022; alternating current (AC) high-power recharging points installed before that date shall continue to comply with standard EN IEC 62196-2:2017 until they are renovated;
- direct current (DC) high-power recharging points for light-duty electric vehicles installed or renovated from 8 January 2026 shall be equipped, for interoperability purposes, at least with vehicle connectors of the combined charging system “Combo 2” for Mode 4 recharging as described in standard EN IEC 62196-3:2022; direct current (DC) high-power recharging points installed before that date shall continue to comply with standard EN IEC 62196-3:2014 until they are renovated.

1.3. Recharging points for L-category electric vehicles:

1.3.1. The publicly accessible alternating current (AC) recharging points reserved for L-category electric vehicles with a power output less than or equal to 3,7 kW shall be equipped, for interoperability purposes, with at least one of the following:

- (a) socket-outlets or vehicle connectors of Type 3A as described in standard EN IEC 62196-2:2022 (for Mode 3 recharging);
- (b) socket-outlets compliant with standard IEC 60884-1:2022 (for Mode 1 or Mode 2 recharging).

1.3.2. The publicly accessible alternating current (AC) recharging points reserved for L-category electric vehicles above 3,7 kW installed or renovated from 8 January 2026 shall be equipped, for interoperability purposes, at least with socket-outlets or vehicle connectors of Type 2 for Mode 3 recharging as described in standard EN IEC 62196-2:2022; publicly accessible alternating current (AC) recharging points reserved for L-category electric vehicles above 3,7 kW installed before that date shall continue to comply with standard EN IEC 62196-2:2017 until they are renovated.

1.3.3. The publicly accessible direct current (DC) normal-power recharging points and high-power recharging points reserved for L-category electric vehicles installed or renovated from 8 January 2026 shall be equipped, for interoperability purposes, at least with vehicle connectors of the combined charging system “Combo 2” for Mode 4 recharging as described in standard EN IEC 62196-3:2022; publicly accessible direct current (DC) normal-power recharging points and high-power recharging points installed before that date shall continue to comply with standard EN IEC 62196-3:2014 until they are renovated.

1.4. Normal power recharging points and high-power recharging points for electric buses:

- alternating current (AC) normal-power recharging points and high-power recharging points for electric buses that are installed or renovated from 8 January 2026 shall be equipped, for interoperability purposes, at least with connectors of Type 2 for Mode 3 recharging as described in standard EN IEC 62196-2:2022; alternating current (AC) normal-power recharging points and high-power recharging points installed before that date shall continue to comply with standard EN IEC 62196-2:2017 until they are renovated;
- direct current (DC) normal-power recharging points and high-power recharging points for electric buses that are installed or renovated from 8 January 2026 shall be equipped, for interoperability purposes, at least with vehicle connectors of the combined charging system “Combo 2” for Mode 4 recharging as described in standard EN IEC 62196-3:2022; direct current (DC) normal-power recharging points and high-power recharging points installed before that date shall continue to comply with standard EN IEC 62196-3:2014 until they are renovated.;

(3) points 1.6 and 1.7 are replaced by the following:

1.6. High-power recharging points for heavy-duty electric vehicles:

- Direct current (DC) high-power recharging points for recharging infrastructure capable of supplying electricity to both light- and heavy-duty electric vehicles shall be equipped, for interoperability purposes, at least with vehicle connectors of the combined charging system “Combo 2” for Mode 4 recharging as described in standard EN IEC 62196-3:2022.

1.7. Technical specifications for inductive static wireless recharging for light-duty electric vehicles:

Recharging points for light-duty electric vehicles dedicated to inductive static wireless recharging shall comply, for interoperability purposes, with:

- EN IEC 61980-1:2021 “Electric vehicle wireless power transfer (WPT) systems – Part 1: General requirements”;
- EN IEC 61980-2:2023 “Electric vehicle wireless power transfer (WPT) systems – Part 2: Specific requirements for magnetic field wireless power transfer (MF-WPT) system communication and activities”;
- EN IEC 61980-3:2022 “Electric vehicle wireless power transfer (WPT) systems – Part 3: Specific requirements for magnetic field wireless power transfer (MF-WPT) systems”;

(4) point 1.14 is replaced by the following:

‘1.14. Technical specifications for electric road system (ERS) for dynamic ground-level power supply through conductive rails for light- and heavy-duty electric vehicles:

Recharging infrastructure for alternating current (AC) and direct current (DC) dedicated to electric road system (ERS) for dynamic ground-level power supply through conductive rails for light- and heavy-duty electric vehicles equipped with ground level current collector devices, to enable conductive current collection by road vehicles from a feeding track integrated in the roadway shall comply, for interoperability purposes, with:

— CLC/TS 50717:2022 “Technical requirements for current collectors for ground-level feeding system on road vehicles in operation”;

(5) point 2.1 is replaced by the following:

‘2.1. Technical specifications regarding communication between the electric vehicle and the recharging point (vehicle-to-grid communication):

2.1.1. The publicly accessible recharging points for alternating current (AC) and direct current (DC) for light- and heavy-duty electric vehicles installed or renovated from 8 January 2026 shall comply, for interoperability purposes, at least with the following standards:

— EN ISO 15118-1:2019 “Road vehicles – Vehicle to grid communication interface Part 1: General information and use-case definition”;

— EN ISO 15118-2:2016 “Road vehicles – Vehicle to grid communication Interface Part 2: Network and application protocol requirements”;

— EN ISO 15118-3:2016 “Road vehicles – Vehicle to grid communication interface Part 3: Physical and data link layer requirements”;

— EN ISO 15118-4:2019 “Road vehicles – Vehicle to grid communication interface Part 4: Network and application protocol conformance test”;

— EN ISO 15118-5:2019 “Road vehicles – Vehicle to grid communication interface – Part 5: Physical layer and data link layer conformance test”.

2.1.2. Publicly accessible recharging points for alternating current (AC) and direct current (DC) for light- and heavy-duty electric vehicles installed or renovated from 1 January 2027 shall comply, for interoperability purposes, at least with standard EN ISO 15118-20:2022 “Road vehicles – Vehicle-to-grid communication interface – Part 20: 2nd generation network layer and application layer requirements”. Where such recharging points offer automatic authentication and authorisation services, such as plug-and-charge, they shall comply, for interoperability and security purposes, with both standard EN ISO 15118-2:2016 and standard EN ISO 15118-20:2022.

2.1.3. Private recharging points for alternating current (AC) and direct current (DC) electric light- and heavy-duty electric vehicles installed or renovated from 1 January 2027 shall comply, for interoperability purposes, at least with the following standards:

(a) EN IEC 61851-1:2019 “Electric vehicle conductive charging system – Part 1: General requirements” (for Mode 2 recharging);

(b) EN ISO 15118-20:2022 “Road vehicles – Vehicle to grid communication interface – Part 20: 2nd generation network layer and application layer requirements” (for Mode 3 or Mode 4 recharging).;

(6) point 3.1 is replaced by the following:

‘3.1. Technical specifications for connectors for refuelling points dispensing gaseous (compressed) hydrogen for light-duty vehicles shall comply, for interoperability purposes, at least with the interoperability requirements described in standard EN 17127:2024.’;

(7) point 3.3 is replaced by the following:

‘3.3. The hydrogen refuelling algorithm shall comply with the requirements of standard EN 17127:2024.’;

(8) point 3.5 is replaced by the following:

‘3.5. Technical specifications for connectors for refuelling points dispensing gaseous (compressed) hydrogen for heavy-duty vehicles shall comply, for interoperability purposes, at least with the requirements described in standard EN 17127:2024.’.
