TECHNICAL REGULATION

On Electromagnetic Compatibility

Approved by Resolution of Cabinet of Ministers of Ukraine No. 785
dd. 2009.07.29
General Provisions

1. These Technical Regulations on Electromagnetic Compatibility (hereafter referred to as the "Technical Regulations") have been developed to implement Directive 2004/108/EC of the European Parliament and of the Council of 15.12.2004 on the approximation of the laws of member States relating to electromagnetic compatibility. The Technical Regulations lay down requirements for electromagnetic compatibility of equipment, which is manufactured and used in the territory of Ukraine or is imported with intent to use in the territory of Ukraine.

The Technical Regulations have been developed for the purpose of providing:

a) appropriate life and health safety for citizens, and also for protection of animals and property from the danger connected with the influence of electromagnetic disturbance on usage of equipment;

b) protection of radio and telecommunication or other equipment, functioning of which may be influenced by electromagnetic disturbances, from degradation in equipment performance as a result of such disturbances;

c) protection of power distribution networks from electromagnetic disturbances, that may have an influence on them and cause damage of equipment;

d) functioning of the Ukrainian domestic market by means of presentation of adequate electromagnetic compatibility level conformity requirements to equipment;

e) assuring of national safety and social interests, preventing of abusive practice and misuse, connected with the usage of radio frequency band.

2. The requirements of these Technical Regulations are mandatory for:

a) manufacturers, their authorized representatives which are residents of Ukraine, and suppliers introducing equipment into the market,

b) central executive bodies in charge of technical regulation issues,

c) appointed certification bodies, as provided for by Resolution # 59 of the Cabinet of Ministers of Ukraine of 24 January 2007, "On Approval of the Appointment Procedure of Bodies of the Technical Regulations Requirements Conformity Assessment of Products, Processes and Services" (The Official Bulletin of Ukraine, 2007, # 6, p. 223), central executive body on standardization issues.

3. Terms in these Technical Regulations are used in the meanings laid down in the Laws of Ukraine "On Confirmation of Conformity" (of 17.01.2001, # 2406-III), "On Approval of Technical Regulation of Conformity Assessment Modules and Requirements on Marking with the National Conformity Mark, used in Technical Regulations on Conformity Confirmation" (of 07.10.2003, # 1585), "On Standards, Technical Regulations and Conformity Assessment Procedures" (of 01.12.2005, # 3164-IV), as well as in the following meanings:

a) "equipment" means any electrical apparatus;

b) "apparatus" means any finished device or combination of devices, available on the market as a separate functional device, intended for the end-user and liable to generate electromagnetic disturbances or the performance of which is liable to be
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affected by such disturbances;
c) "electromagnetic compatibility" (hereinafter referred to as "EMC") means the ability of equipment to function with the established parameters in the established electromagnetic environment without generating intolerable electromagnetic disturbances to other equipment;
d) "electromagnetic disturbances" means any electromagnetic phenomenon which may degrade the performance of equipment. Electromagnetic disturbances may be electromagnetic noise, an unwanted signal or a change in the propagation medium itself;
e) "immunity" means the ability of equipment to perform properly without degradation of the performance quality in the presence of electromagnetic disturbances;
f) "for the purpose of safety" means for the purpose of securing human life and saving property;
g) "electromagnetic situation" means combination of all electromagnetic phenomena in total, which are present in a certain place;
h) "installation or assembly" means constructively finished assembly units, intended to be assembled into apparatus by the end-user and liable to cause electromagnetic disturbances or the performance of which is liable to be affected by electromagnetic disturbances;
i) "mobile equipment" means a set of apparatus and, in certain cases, other devices, intended for transfer and use at different sites.

4. These Technical Regulations apply to equipment, apparatus, installations or assemblies, mobile equipment.
These Technical Regulations do not apply to:
a) aeronautical equipment, assembly parts and devices in a civil aviation sector;
b) radio equipment, used by radio amateurs, in accordance with the Regulation on Radio Communication of the International Telecommunications Union (ITU), unless the equipment is available on the market;
c) Sets of components, intended for radio amateur construction, and equipment purchased on the market, improved and used by radio amateurs, shall not be considered as commercial equipment.

5. Equipment may be placed on the market and/or taken into service only if it is properly installed, maintained and used for the purposes for which it is intended, and conforms to the requirements of these Technical Regulations.
Placement on the market of equipment without a document, which testifies conformity with the requirements of these Regulations and the National Conformity Mark in accordance with the Resolution # 1599 of the Cabinet of Ministers of 29 November 2001 "On Approval of Description and National Conformity Mark Application Rules», shall be prohibited.

6. Under the reasons connected with the EMC, executive bodies should not interfere with placement on the market and/or taking into service in the territory of Ukraine of equipment, which conforms to the requirements of these Technical Regulations.
7. Requirements of these Technical Regulations should not interfere with introducing in the territory of Ukraine of the following special measures on putting equipment into service:
   a) measures on elimination of EMC problems, present or anticipated in particular sites;
   b) measures on protection of telecommunications networks of public use and receiving or transmission stations, used for security purposes.

8. Executive bodies should not interfere in any way with exhibiting and/or demonstration at trade fairs, exhibitions and other similar events of equipment, which does not conform to these Technical Regulations. Such equipment shall be marked with visible marking, testifying that it may not be placed on the market and/or put into service, until it is brought to conformity with the requirements of these Technical Regulations. Demonstration of such equipment may be possible provided that adequate electromagnetic disturbances protection measures are taken.

9. In order to specify essential requirements of the Technical Regulations, a List of National Standards, voluntary application of which completely or partially may be considered as a proof of equipment conformity to the requirements of the Regulations (hereinafter referred to as the List of National Standards), is developed.

10. The List of National Standards shall be approved by a central executive body on standardization issues as advised by the central executive bodies on technical regulation issues.

Essential Requirements

11. Protection requirements: development and manufacturing of equipment with due account for current requirements should guarantee the following:
   a) electromagnetic disturbances caused by equipment should not exceed the level permissible for normal performance of radio, telecommunications or other equipment;
   b) the level of equipment immunity to electromagnetic disturbances, which occur in the course of rated operation, should enable equipment to function without inadmissible deterioration of a functioning quality.

12. If the Essential Requirements to equipment stated in para. 11 are entirely or partially determined by other Technical Regulations, these Technical Regulations do not and should not apply to equipment concerning such requirements from the moment of implementation of such Technical Regulations.

Apparatus Conformity Assessment Procedures

13. Apparatus conformity with the essential requirements should be approved by means of
14. A manufacturer or its authorized representative who is a resident of Ukraine may perform assessment of conformity with the requirements of these Regulations with application of modules A and Aa (internal control over manufacturing) in accordance with the procedure specified in Annex I.

15. Conformity assessment with involving of the appointed conformity assessment body should be carried out in accordance with Annex II.

16. A manufacturer or its authorized representative who is a resident of Ukraine may apply more complicated modules outlined in Technical Regulation #1585.

**Technical Documentation**

17. Technical documentation should confirm equipment conformity with the essential requirements of these Technical Regulations, according to which assessment is carried out. Documentation should be drawn up in the Ukrainian language or in language agreed with appointed conformity assessment body. Documentation should cover all stages of development, manufacturing and application of equipment and enable assessment of its conformity with the requirements of these Technical Regulations. The scope and content of the technical documentation should conform to the Technical Regulation #1585, State Standard of Ukraine (ДСТУ) ISO/IEC 17050-2:2006, and contain in particular:

a) general description of equipment;
b) technical requirements (if any);
c) basic design drawings, drawings of elements, blocks, circuits etc.;
d) descriptions and explanations necessary for understanding of specified drawings, schemes, other documents and apparatus functioning;
e) the list of standards from the officially published list of harmonized standards to these Technical Regulations, which were entirely or partially applied;
f) proof of conformity with the harmonized standards by means of records of the tests carried out by testing laboratory accredited in the national accrediting system, provided that during conformity assessment harmonized standards are applied;
g) summary and substantiation of taken measures on implementation of the Technical Regulations essential requirements, provided that during conformity assessment harmonized standards were not applied or were applied partially. In particular, it is necessary to present description of EMC assessment set out in para. 1 of Annex I as well as results of engineering design, analysis and testing records made by a testing laboratory accredited in the national accrediting system, and other documents;
h) conclusion of appointed conformity assessment body, in case of application of appropriate procedure set out in Annexes I and II.

Declaration of Conformity

18. The declaration of conformity should be drawn up in the Ukrainian language. The declaration of conformity should at least contain:
   a) reference to these Technical Regulations;
   b) data on identification of specified apparatus, as provided for in para. 24;
   c) name and address of the manufacturer and, in case of necessity, name and address of its authorized representative;
   d) dated reference to harmonized standards or equivalent requirements, conformity to which should be declared to confirm apparatus conformity to the provisions of these Technical Regulations;
   e) date of issue of the declaration;
   f) signature and identification of person responsible for drawing up.

General requirements to declaration are established by the State Standard of Ukraine (ДСТУ) ISO/IEC 17050-1:2006. Form of the declaration is set out in Annex III.

Marking

19. Apparatus conformity of which to these Technical Regulations are ascertained by means of the procedures specified in paras 13 through 16 should be marked with the national conformity mark which confirms a fact of conformity. Marking with the national conformity mark should be carried out by manufacturer or its authorized representative, who is a resident of Ukraine. If manufacturer is not a resident of Ukraine and he has no authorized representative, who is a resident of Ukraine, then marking with the national conformity mark should be carried out by a supplier who is a resident of Ukraine and is responsible for placing such products on the market.

20. Marking with the national conformity mark should be carried out in accordance with the Resolution # 1599 of the Cabinet of Ministers of Ukraine of 29 November 2001 "On Approval of Description and National Conformity Mark Application Rules".

21. Central executive bodies on technical regulation issues are obliged to take all necessary measures on non-admission of affixing such marks on the apparatus, its packing or service instruction, which may mislead a third party with regard to the significance or graphic images of the national conformity mark.

22. Any other marking may be affixed on the apparatus, its packing or service instruction,
provided that it does not reduce visibility and legibility of marking with the national conformity mark.

23. In case when it is established that the national conformity mark is being used with violation of law requirements, a manufacturer or its authorized representative, who is a resident of Ukraine, or a person responsible for placing products on the market, should take measures to stop violation on terms and conditions determined by executive bodies in accordance with the legislation, bring the products to the state of conformity with the requirements established by these Technical Regulations, and confirm such conformity according to the established procedure. In case of long-lasting violation of the law, executive bodies should take appropriate measures in accordance with the laws of Ukraine on limitation or prohibition of placing products on the market or their withdrawal from the market.

24. Marking should be affixed on each apparatus unit, which enables determination of its type, lot and serial number, as well as other apparatus identification data.

25. Name and address of manufacturer should be specified on each apparatus unit, regardless of whether he is a resident of Ukraine or not. If manufacturer is not a resident of Ukraine, address of its authorized representative who is a resident of Ukraine should be also specified. In case its authorized representative is not a resident of Ukraine, name and address of supplier who is a resident of Ukraine should be specified. This data is permitted to be indicated in the accompanying documentation.

26. In the accompanying documentation manufacturer is obliged to state data on all special preventive measures which should be adhered to during assembling, installation, maintenance and operation of the apparatus to guarantee conformity of the apparatus to the protection requirements determined in para. 11, in case of putting the apparatus into service.

27. If the apparatus conformity to protection requirements in housing areas is not guaranteed, the data on restricted use should be indicated on the apparatus itself, and also in case of necessity on its packing and accompanying documentation.

28. The data necessary for providing of apparatus intended use should be set out in the service instruction.

Measures to Be Taken in Case of Determination of the Apparatus Unconformity

29. If the authorized executive body determines that the apparatus marked with the national conformity mark does not meet the requirements of these Technical Regulations, it is obliged to take all necessary measures to withdraw the apparatus from the market, prohibit its placing on the market or putting into service, or restrict free movement of such apparatus according to the legislation.

30. In any decision on withdrawing of apparatus from the market, prohibition or restriction
of its placing on the market, putting into service or restriction of its free movement, adopted on the grounds of these Technical Regulations, the authorized executive body should clearly state the reasons on the ground of which such decision was made. An interested party should be immediately informed about such decision, and also about the measures on the problem elimination, taken in accordance with the current Ukrainian legislation, as well as about the terms of their implementation.

31. In case of making decision set out in para. 30 of the Technical Regulations, manufacturer, its authorized representative or any other interested party should be given an opportunity to state their opinion before making of decision, with the exception of cases when discussion is impossible because of the urgency of justified measures, especially in cases of necessity of public interests protection.
Annex I

to the Technical Regulations

Conformity Assessment Procedure, Mentioned in paras 13 through 16 of the Technical Regulations (Internal Control of Manufacturing)

1. A manufacturer is obliged to assess EMC of the apparatus to check conformity to the protection requirements set out in para 11 of these Regulations. Correct application of all national standards concerning apparatus, from the officially published list of the national standards to these Regulations is equivalent to performing of the EMC assessment.

2. During EMC assessment all normal conditions foreseen for apparatus operation should be taken into account. For apparatus which may be used in several configurations, EMC is being assessed to confirm the apparatus conformity to the immunity requirements set out in para 11 of these Regulations, in any possible operation configurations envisaged by the manufacturer.

3. According to the provisions set out in para 17 of these Regulations, manufacturer is obliged to confirm the apparatus conformity to the essential requirements of these Technical Regulations during drawing up of the technical documentation.

4. The apparatus conformity to all necessary requirements should be confirmed by the Declaration of Conformity, drawn up by the manufacturer. The Declaration of Conformity should be registered in one of the appointed conformity assessment bodies at the products manufacturer’s choice. Condition for registering of the Declaration of Conformity should be conformity of the provided technical documentation certified by the manufacturer to the requirements of para 17 of these Regulations. The Register of Declarations is carried out by the Central executive body in the sphere of technical regulation.

5. The manufacturer or its authorized representative who is a resident of Ukraine is obliged to keep a copy of the Declaration of Conformity together with the technical documentation at least 10 years from the moment of the last issue of apparatus and submit them on demand of the central executive bodies defined by the legislation.

6. Manufacturer or its authorized representative who is a resident of Ukraine is obliged to take all necessary measures to guarantee placing of products on the market according to the technical documentation set out in para 3 of this chapter and applicable provisions of these Technical Regulations.

7. Technical documentation and the Declaration of Conformity should be drawn up according to paras 17, 18 of these Regulations.

8. Conformity assessment of apparatus which is not intended for direct connection to the electricity network should be carried out with application of module A (internal control
of manufacturing) in accordance with Technical Regulation #1585.

9. Conformity assessment of apparatus which is intended for a direct connection to the electricity network should be carried out with application of module Aa (modified module A) in accordance with Technical Regulation #1585.

Module Aa consists of module A including additional requirements with consideration of the following provisions:

a) the appointed conformity assessment body selected by the manufacturer carries out the apparatus tests at random time intervals. The manufacturer provides a final product sample for a testing purpose. The appointed conformity assessment body examines and tests it in accordance with the corresponding requirements from the list of the harmonized standards or carries out equivalent tests for the Technical Regulations requirements conformity assessment of the sample;

b) after testing the appointed conformity assessment body should provide a conclusion;

c) the manufacturer encloses the conclusion to the technical documentation;

d) In case manufacturer does not provide the apparatus sample to the selected appointed conformity assessment body in agreed time, the body makes to the register an entry on suspension of the Declaration action and informs the authorized executive bodies about this.
Annex II

Conformity Assessment Procedure, Carried Out with the Involvement of the Appointed Conformity Assessment Body Mentioned in paras 13 through 16 of the Technical Regulations

1. In case the manufacturer or authorized representative who is a resident of Ukraine is not sure that selection of the harmonized standards is correct, or has not applied them or applied them partially, he may apply the conformity assessment procedure with application of module B in combination with other modules according to the Technical Regulation #1585.

2. Conformity assessment of the telecommunications equipment covered by the purview of the Law of Ukraine “On the Telecommunications” of 18 November 2003, # 1280-IV, should be carried out with application of module B in combination with other modules in accordance with Technical Regulation #1585.

3. In case the apparatus placing on the market is being performed by a person who is a resident of Ukraine, but who is not the manufacturer or its authorized representative a resident of Ukraine, assessment of conformity to the requirements of these Technical Regulations should be carried out with application of module B for each lot of the products.

4. Manufacturer or its authorized representative or a supplier who is a resident of Ukraine, in case the manufacturer or its authorized representative are not the residents of Ukraine, is obliged to take all necessary measures to guarantee placing of products on the market according to the technical documentation, indicated in para 3 of this chapter and applicable provisions of these Technical Regulations.

5. Manufacturer or its authorized representative or a supplier who is a resident of Ukraine, in case a manufacturer or its authorized representative are not the residents of Ukraine, should submit an application and present a copy of the technical documentation and the manufacturer’s declaration to the appointed conformity assessment body.

6. During the conformity assessment in accordance with the procedure with the involvement of the appointed conformity assessment body the provisions of paras 1 through 7 of Annex I should be applied.

7. In case the manufacturer or its authorized representative are not the residents of Ukraine, a supplier who is a resident of Ukraine is charged with the obligations concerning keeping and providing of the Declaration of Conformity and the technical documentation at the disposal of the authorized executive bodies.

8. Manufacturer or its authorized representative who is a resident of Ukraine in view of the provisions of paras 1 through 7 of Annex I may use more complicated modules set out in the Technical Regulation on the Conformity Assessment Modules (1585-2003-n).
Annex III

The National Conformity Mark consists of the symbol combined with identification number of appointed Conformity Assessment Body under it.

The National Conformity Mark designation.