Newsletter 2023 Q3

Service Division Digital & Products Solutions
Business Line EMC/RF

DEKRA Testing and Certification S.A.U. | Spain | Reverb Chamber

Europe (EU-27 and UK)

Standards withdrew from Radio Equipment Directive Harmonised Standard List on September 9, 2023

European Commission updated the Harmonized standards list on March 29, 2022 adding new versions for several harmonised standards. Transition period for former versions expired on September 29, 2023, the following standards have been removed from Harmonised Standards List and they no longer provide presumption of conformity:

Withdrawn Standard	Superseded by	Test Standard Title
EN 301 908-1 V13.1.1	EN 301 908-1 V15.1.1	IMT cellular networks Part 1: Introduction and common requirements
EN 301 908-14 V13.1.1	EN 301 908-14 V15.1.1	IMT cellular networks Part 14: Evolved Universal Terrestrial Radio Access (E-UTRA) Base Stations (BS)
EN 301 908-15 V11.1.2	EN 301 908-15 V15.1.1	IMT cellular networks Part 15: Evolved Universal Terrestrial Radio Access (E-UTRA FDD) Repeaters
EN 301 908-18 V13.1.1	EN 301 908-18 V15.1.1	IMT cellular networks Part 18: E-UTRA, UTRA and GSM/EDGE Multi-Standard Radio (MSR) Base Station (BS)
EN 301 444 V2.1.2	EN 301 444 V2.2.1	Satellite Earth Stations and Systems (SES) Land Mobile Earth Stations (LMES) providing voice and/or data communications, operating in the 1,5 GHz and 1,6 GHz frequency bands
EN 302 217-2 V3.2.2	EN 302 217-2 V3.3.1	Fixed Radio Systems Characteristics and requirements for point-to-point equipment and antennas Part 2: Digital systems operating in frequency bands from 1 GHz to 86 GHz
EN 302 480 V2.1.2	EN 302 480 V2.2.1	Mobile Communication On Board Aircraft (MCOBA) systems
EN 302 567 V1.2.1	EN 302 567 V2.2.1	Multiple-Gigabit/s radio equipment operating in the 60 GHz band
EN 302 296-2 V1.2.1	EN 302 296 V2.2.1	Digital Terrestrial TV Transmitters

ETSI RED Workprogramme New Standard Versions Updates

ETSI is continuously evolving the EMC/RF Test Standards, table below summarizes the latest updates for most common Test Standards during Q3/2023:

Test Standard	Title	Comments
EN 303 687 V1.1.1	6 GHz WAS/RLAN	Already published by ETSI and delivered to European Commission for final assessment. Waiting for its publication as Harmonised Standard in OJEU.
Draft EN 301 893 V2.1.52	5 GHz WAS/RLAN	Final Draft. First European Commission assessment completed. When comments are addressed (if any), the Approval Process (Public Enquiry) must start.
Draft EN 301 908-3 V15.1.1_0.0.6	IMT cellular networks Part 3: CDMA Direct Spread (UTRA FDD) Base Stations (BS)	Final Draft. Approved by Working Group. Requested another European Commission assessment before starting the Approval Process.
Draft EN 301 908-13 V13.3.1_0.0.6	IMT cellular networks Part 13: Evolved Universal Terrestrial Radio Access (E-UTRA) User Equipment (UE)	Stable Draft. To be sent in short to European Commission for first assessment.
Draft EN 301 908-14 V17.1.1_0.0.4	IMT cellular networks Part 14: Evolved Universal Terrestrial Radio Access (E-UTRA) Base Stations (BS)	Stable Draft. To be sent in short to European Commission for first assessment.
EN 301 908-23 V15.1.1	IMT cellular networks Part 23: Active Antenna System (AAS) Base Station (BS)	Already published by ETSI and delivered to European Commission for final assessment. Waiting for its publication as Harmonised Standard in OJEU.
EN 301 908-24 V15.1.1	IMT cellular networks Part 24: New Radio (NR) Base Stations (BS) Release 15	Already published by ETSI and delivered to European Commission for final assessment. Waiting for its publication as Harmonised Standard in OJEU.

Test Standard	Title	Comments
Draft EN 302 208 V3.4.0	Radio Frequency Identification Equipment operating in the band 865 MHz to 868 MHz with power levels up to 2 W and in the band 915 MHz to 921 MHz with power levels up to 4 W	Under ETSI Approval Process. Once it is completed, the final assessment form European Commission is required. New version includes the following updates with regard to v3.1.1: - Specify Measurement uncertainty in an informative Annex. - Mitigation method has been removed. - Clear definition of Operating Frequency ranges for each channel in 865-868 MHz and 915-912 MHz bands. - Transmitter spurious emissions limits have been relaxed in 47-74 MHz and 694-862 MHz frequency ranges. - Spectrum mask limits for tags operating in 865-868 MHz has been reduced in 694-863 MHz frequency ranges. - Specify Tag Test Suites to measure Tags attached to metal planes. - Typo corrections and editorial changes.
EN 301 406-2 V3.1.1	Digital Enhanced Cordless Telecommunications (DECT) Part 2: DECT-2020 NR	Already published by ETSI and delivered to European Commission for final assessment. Waiting for its publication as Harmonised Standard in OJEU.
Draft EN 303 753 V1.1.0	Wideband Data Transmission Systems (WDTS) for Mobile and Fixed Radio Equipment operating in the 57 GHz - 71 GHz band	Final Draft. First European Commission (EC) assessment completed. EN Approval Process (Public Enquiry) completed. When comments are addressed (if any), the ETSI Approval and the final assessment form European Commission and are required.
Draft EN 300 440-2 V3.1.1_0.0.10	Short Range Devices (SRD) Radiodetermination equipment for location tracking applications operating in the frequency range 1 GHz to 40 GHz	Early Draft. Test Standard development work is progressing.
Draft EN 302 729-1 V3.1.1_0.0.8	Short Range Devices (SRD) using Ultra Wide Band technology (UWB) Part 1: Level Probing Radar (LPR) equipment operating in the frequency ranges 6 GHz to 8,5 GHz, 24,05 GHz to 26,5 GHz, 57 GHz to 64 GHz, 75 GHz to 85 GHz for strictly vertical downward installation	Early Draft. Test Standard development is still on-going.

Test Standard	Title	Comments
Draft EN 303 661 V1.1.1_0.2.6	Short Range Devices (SRD) Ground Based Synthetic Aperture Radar (GBSAR) in the frequency range 17,1 GHz to 17,3 GHz and High Definition Ground Based Synthetic Aperture Radar (HD-GBSAR) in the frequency range 76 GHz to 77 GHz	Draft Review after EN Approval Process (Public Enquiry). When comments are addressed, the ETSI Approval and the final assessment form European Commission and are required.
Draft EN 302 480 V0.0.7	Mobile Communication On Board Aircraft (MCOBA) systems	Stable Draft. First European Commission (EC) assessment received and rejected the Draft due to Lack of Compliance. EC required to redraft it and go through new assessment again.
Draft EN 301 843-1 V2.3.1_0.0.2	ElectroMagnetic Compatibility (EMC) standard for marine radio equipment and services Part 1: Common technical requirements	Early Draft. Test Standard development work is just starting.
Draft EN 301 843-7 V1.1.1_0.0.1	ElectroMagnetic Compatibility (EMC) standard for marine radio equipment and services Part 7: Specific conditions for Maritime Broadband Radiolink equipment	Early Draft. Test Standard development work is just starting.

AdCo RED report on market surveillance statistics for 2021

AdCo RED published on August 16, 2023 the market surveillance statistics for Year 2022 campaign.

22 market surveillance authorities have inspected 11.491 radio products in 2022. About 7.138 products (62,12%) were found non-compliant with any of the provisions of the RED. Major part of the non-compliant issues are related with Administrative and Technical Documentation issues (e.g. labelling, Declaration of Conformity, Test Reports,...).

Group	Devices Checked	Non-Compliance Rate	Comments
Administrative	11.449	60,97%	Main issues are related with: - Article 10.7: Manufacturer identification (30,47%). - Articles 19 and 20: CE Marking in label (28,33%). - Article 10.6: Type, batch or serial number or other element allowing their identification (28,97%) - Article 10.9: Declaration of Conformity (37,65%).
Technical Documentation	3.052	36,83%	Main issues are related with: - Risk Assessment (40,29%) - Annex V(a): General description of the radio equipment (39,54%). - Annex V(i): Packaging information indicating restriction of use in different EU countries (48,96%).

Group	Devices Checked	Non-Compliance Rate	Comments
Essential Requirements	1.099	22,29%	Non-compliance rate detected for each essential requirement is: - Article 3.1.a (EMC): 10,76% - Article 3.1.b (Health & Safety): 22,09% - Article 3.2 (RF): 14.15% - Article 3.3 (Additional Requirements): 56,52%

It is important to highlight that statistics showed AdCo RED report do not reflect the overall compliance rate of RED products on the European Market because most of the market surveillance authorities are focusing their activities in sectors known as “sectors with high non-compliance rate”.

Additional Information:

- AdCo RED report on market surveillance 2022: https://ec.europa.eu/docsroom/documents/55514

North America (USA and Canada)

FCC KDBs Updates

Main KDBs published/updated during Q3/2023:

KDB	Status	Question	Comments
511808	New	What are the procedures for getting an Equipment authorization for Part 90 subpart M and Part 95 Subpart L devices using C-V2X systems for named entities under a waiver?	It provides administrative and technical guidance for the specific companies included in "C-V2X Joint Waiver Parties" (Audi, Ford, Jaguar Land Rover, Utah DoT, Virginia DoT, AAEON, Advantech, Applied Information, Cohda Wireless, Commsignia, Danlaw, HARMAN, Kapsch TrafficCom and Panasonic) to obtain a grant of certification under Part 2 subpart J. KDB explaining the test procedure (with limits) and the certification procedure.
951290	New	What are the procedures for submitting Equipment Compliance Review (ECR) when it is required by a specific KBD publication?	Some FCC guidance specifically requires that a KDB Inquiry is submitted by an applicant to equipment authorization. In order to identify those KBDs, FCC have assigned the ECR Category. The ECR KDB inquiry needs to receive positive feedback from the FCC before the applicant can proceed with the equipment authorization process. This KDB explains how ECR procedure works and provide guidance about how to fill the ECR inquiry.
447498	Update	What are the RF exposure requirements and procedures for mobile and portable devices?	New Interim Guidance for RF Exposure Compliance of Devices Equipped with Motion Sensor for Conducted Power Control.
204515	Update	What is a Grantee Code, what are the guidelines for acquiring a Grantee Code, modifying Grantee Code information, transferring control of a Grantee Code and recovering a lost Grantee Code registration number?	Updated for rule changes in Part 2.929 with regard to companies included in Covered List (Protecting Against National Security Threats to the Communications Supply Chain through the Equipment Authorization Program).
641163	Update	What guidance does the FCC provide to Telecommunication Certification Bodies (TCBs) regarding their roles and responsibilities in order to be recognized by the FCC?	Update to include Wi-Fi 6 GHz Devices inside the TCB Scope A1.
974614	Update	What guidance is available for FCC recognition of accredited testing laboratories that perform testing of RF Devices subject to the Declaration of Conformity (DoC) and Certification approval procedures?	Add reference to KDB with FCC guidance for testing Wi-Fi 6 GHz Devices.

KDB	Status	Question	Comments
987594	Update	What are the requirements for obtaining a Certification for U-NII 6 GHz devices operating in the 5.925-7.125 GHz band under Part 15, Subpart E?	Standard Power Access Points and Associated Client Devices (Phase 2) restriction removed. Indoor access points in the 5.925-6.425 are permitted in large aircraft while flying above 10.000 feet.
285076	Update	What are the equipment authorization requirements for hearing aid compatibility of mobile handsets?	Update for limited waiver for HAC with respect to the volume control technical standard that handset manufacturers use in part to certify handsets.
953436	Draft	What web services are available for accessing data in the FCC Laboratory Equipment Authorization System?	Added information on method call getAFCAuthorizations for Wi-Fi 6 GHz Devices search.

FCC kicks-off the testing of 6 GHz Automated Frequency Coordination (AFC) systems

On November 2022, FCC conditionally approved thirteen entities to operate AFC systems conditioned on each system undergoing a rigorous testing process, both in a controlled environment and through a demonstration project before we will approve them for commercial operations. Now, the FCC provides details regarding the required lab testing and the public trial. The AFC system applicants may commence testing their AFC system.

Lab Testing requires to execute the AFC Systems Test Plan developed by Wi-Fi Alliance®. It includes the following tests:

- Successful registration of a standard-power device with the AFC system
- Unsuccessful registration of a standard-power device with an AFC system
- Fixed service protection
- International border protection
- Protection of radio astronomy locations

In addition to lab testing, AFC systems must complete a public trial period. During this public trial period each AFC system applicant will be required to make their AFC system available on the Internet to provide any interested member of the public an opportunity to test the AFC system functionality. The system must provide a means for users to submit challenges to the AFC system applicant if the user believes that the available frequency ranges and power levels are not in compliance with the FCC rules. Once the public trial period has been completed, the AFC applicant must prepare a report describing the public trial and it must include the following information:

- Statistics regarding the number of public tests conducted
- Summary of each challenge received, and an explanation as to why the challenge did or did not raise a valid concern with the functionality of the AFC system
- Any additional data as the AFC applicant deems appropriate

Additional Information:

- ET Docket 21-352: https://www.fcc.gov/ecfs/search/search-filings/results?q=(proceedings.name:(%2221-352%22))
- Public Notice DA 23-759: https://www.fcc.gov/ecfs/search/search-filings/filing/108240187909563

FCC ET Docket No. 19-138 (C-V2X) update

On April 24, 2023 the FCC granted the waiver requested by "C-V2X Joint Waiver Parties" (i.e. the first waiver request filled by Audi, Ford, Jaguar Land Rover, Utah DoT, Virginia DoT, AAEON, Advantech, Applied Information, Cohda Wireless, Commsignia, Danlaw, HARMAN, Kapsch TrafficCom and Panasonic). In order to help those companies with the testing and approval process, the FCC has published on September 15, 2023 the KDB 511808 detailing the Technical Requirements and the Equipment Authorization Procedures.

On the other hand, the following entities have filled recently a waiver request to use C-V2X technology in 5.905-5.925 GHz Band and proposed similar technical requirements as proposed in "C-V2X Joint Waiver Parties":

- Yunex Traffic
- City of El Cajon
- Rolling Wireless
- DENSO International America
- North Carolina Department of Transportation
- Navistar

Currently, there are around 30 waiver requests to use C-V2X technology in 5.905-5.925 GHz Band pendant to be resolved by FCC.

Additional Information:

- ET Docket No. 19-138: https://www.fcc.gov/ecfs/search/search-filings/results?q=(proceedings.name:(%2219-138%22))
- ET Docket No. 19-138 Waiver Requests Fillings: https://www.fcc.gov/ecfs/search/search-filings/results?q=(submissiontype.description:(%22WAIVER%22)+AND+proceedings.name:(%2219-138%22))

ISED Updates

ISED Radio Standards updated in Q3/2023:

Test Standard	Status	Title	Comments
RSS-245 Issue 3	Update	Digital Transmission Systems (DTSs), Frequency Hopping Systems (FHSs) and Licence-Exempt Local Area Network (LE-LAN) Devices	Add U-NII-4 (5.850-5.895 MHz) sub-band. There is a transition.
RSS-198 Issue 1	New	Flexible Use Broadband Equipment Operating in the Band 3900-3980 MHz	Applicable standard for 5G band n77 for local shared and private 5G networks. All testing laboratories currently recognized for RSS-192 will be recognized for RSS-198 automatically. All certification bodies will be recognized for RSS-198 automatically as part of their Radio Scope 5 recognition. Testing laboratories and certification bodies who submit renewals to ISED after February 9, 2024 must ensure that RSS-198 is included on their scope of accreditation.

RSS-182 Issue 6	Amendment	Maritime Radio Equipment Operating in the 156-162.5 MHz Band	No longer require an acceptance letter from Transport Canada for Portable VHF Radiotelephones (voice only).

ISED main General Notices published in Q3/2023:

Notice	Description	Comments
Notice 2023-DRS0011	Adoption of ANSI C63.10-2020 and C63.25.1-2018	ANSI C63.10-2020+Cor.1-2023 replaces ANSI C63.10-2013, but a transition period of two years is provided. Main updates introduced by ANSI C63.10-2020+Cor.1-2023 include: - Added dimension tolerances on various distance/size requirements. - Added LISN phase requirements. - Removed references to the rod antenna, since it was not accepted by regulatory agencies. - Referring to ANSI C63.25.1 for site validation within 1-18 GHz. - Added frequency modulated continuous wave (FMCW) emission measurement guidance. - Added test methods for whitespace devices. - Added test methods for wireless power transfer devices classified as radio apparatus. No transition period is provided for ANSI C63.25.1-2018 because this standard includes the existing site voltage standing wave ratio (S_{VSWR}) method while adding the alternative time-domain (TD) method of site validation. Test labs may continue using the S_{VSWR} method, as before, or start using the new TD-S_{VSWR} method.

ISED approves the first Automated Frequency Coordination (AFC) system

On August 21, 2023 the ISED approved the first AFC system for use in Canada, it belongs to Qualcomm. Standard power Wi-Fi 6 GHz devices interoperating with designated databases can now be certified, provided they meet all applicable requirements set forth in RSS-248.

AFCs from other vendors (Comsearch, Federated Wireless and Wi-Fi Alliance) are currently under review for approval. ISED has listed in its website the status of all AFC systems that have requested the approval.

Additional Information:

- List of designated Dynamic Spectrum Access System Administrators (DSASAs): https://ised-isde.canada.ca/site/certification-engineering-bureau/en/node/116

Transition period for RF-Exposure assessment from 3 kHz to 10 MHz expires on October 2023

On October, 2022 the ISED published a Supplementary Procedure for Assessing Compliance of Equipment Operating from 3 kHz to 10 MHz with RSS-102 (SPR-002). This major update sets out RF-Exposure measurement based and computational assessment methods for devices operating in the frequency range from 3 kHz to 10 MHz to prevent nerve stimulation and thermal effects outlined in RSS-102.

Measurement based method is usually preferred. The probe requirements laid down in SPR-002 Issue 2 are considerable different than the previous one. Table below summarizes the new probe requirements:

Feature	Requirement
Sensitivity	Sensitivity over the frequency range of assessment must be: - ≤ 1 V/m for E-field measurements. - ≤ 1 A/m for H-field measurements against the NS-based reference level. - ≤ $0.1/f_{MHz}$ A/m for H-field measurements against the SAR-based reference level, where f_{MHz} is the measurement frequency in MHz.
Level Response	The field probe shall provide for an amplitude flatness of 1 dB or less over the entire frequency range of the assessment.
Linear Range and Linearity Error	The field probe shall provide for a linear range extending from at least -10 dB to +5 dB relative to the reference level associated with the assessment, and with a linearity error within ±0.5 dB.
Antenna Size	The probe antenna shall be sufficiently small to ensure that the spatial peak of a given field component can be accurately measured ($d_{Meas} \geq 1.7 \times D_p$, where D_p is the maximum linear dimension of the probe antenna)
Antenna Isotropy	For time-domain assessment it should be used a three-axis isotropic probe with a deviation from isotropy of 1 dB or less. When performing measurements within the reactive near-field region, the individual elements of a three-axis probe antenna should share the same measurement centres.
Antenna Positioning	The positioning apparatus for the field probe shall enable movement and orientation of the probe antenna(s) such that the maximum field levels produced by the EUT can be accurately and repeatably measured at the corresponding separation distance.

ISED allowed a 12 months transition period, which expires on October 2023, and all devices after this date must be assessed following the new procedure.

In practice, the new procedure implies to use a new field probe different than used until now. SPEAG Magnetic Amplitude and Gradient Probe System (MAGPy) meets all requirements included SPR-002.

Additional Information:

- SPR-002 Issue 2: https://ised-isde.canada.ca/site/spectrum-management-telecommunications/en/devices-and-equipment/radio-equipment-standards/radio-standards-specifications-rss/spr-002-supplementary-procedure-assessing-compliance-equipment-operating-3-khz-10-mhz-rss-102
- SPEAG MAGPy: https://speag.swiss/products/magpy/overview-2/

Standards Development Organizations (SDO)

International Electrotechnical Commission (IEC)

Main IEC Publications related with EMC/RF released in Q3/2023:

Publication	Scope
IEC 61000-4-24:2015+ AMD1:2023 CSV	Electromagnetic compatibility (EMC) - Part 4-24: Testing and measurement techniques - Test methods for protective devices for HEMP conducted disturbance
IEC 60601-2-21/AMD1:2023 PRV	Amendment 1 - Medical electrical equipment - Part 2-21: Particular requirements for the basic safety and essential performance of infant radiant warmers
IEC 60601-2-57:2023	Medical electrical equipment - Part 2-57: Particular requirements for the basic safety and essential performance of non-laser light source equipment intended for therapeutic, diagnostic, monitoring, cosmetic and aesthetic use
IEC 60601-2-76:2018+ AMD1:2023 CSV	Medical electrical equipment - Part 2-76: Particular requirements for the basic safety and essential performance of low energy ionized gas haemostasis equipment
IEC 80601-2-78/AMD1:2023 PRV	Amendment 1 - Medical electrical equipment - Part 2-78: Particular requirements for basic safety and essential performance of medical robots for rehabilitation, assessment, compensation or alleviation
IEC 60204-32:2023 CMV	Safety of machinery - Electrical equipment of machines - Part 32: Requirements for hoisting machines
IEC 61540:2023	Portable residual current devices (PRCDs) without integral overcurrent protection for household and similar use
IEC 61557-9:2023 PRV	Electrical safety in low voltage distribution systems up to 1 000 V AC and 1 500 V DC - Equipment for testing, measuring or monitoring of protective measures - Part 9: Equipment for insulation fault location in IT systems
IEC 61557-13:2023	Electrical safety in low voltage distribution systems up to 1 000 V AC and 1 500 V DC - Equipment for testing, measuring or monitoring of protective measures - Part 13: Hand-held and hand-manipulated current clamps and sensors for measurement of leakage currents in electrical distribution systems
IEC 61936-2:2023	Power installations exceeding 1 kV AC and 1,5 kV DC - Part 2: DC

Publication	Scope
IEC 62148-17:2023	Fibre optic active components and devices - Package and interface standards - Part 17: Transmitter and receiver components with dual coaxial RF connectors
IEC 62561-3:2023 RLV	Lightning protection system components (LPSC) - Part 3: Requirements for isolating spark gaps (ISGs)
IEC 62561-5:2023 PRV	Lightning protection system components (LPSC) - Part 5: Requirements for earth electrode inspection housings and earth electrode seals

Additional Information:

- Full List: https://webstore.iec.ch/advsearchform?From=2023-07-01&To=2023-09-30

CEN-CENELEC

Main CEN-CENELEC Publications related with EMC/RF released in Q3/2023:

Publication	Scope
EN 55016-2-3:2017/A2:2023	Specification for radio disturbance and immunity measuring apparatus and methods - Part 2-3: Methods of measurement of disturbances and immunity - Radiated disturbance measurements
EN IEC 61000-4-6:2023	Electromagnetic compatibility (EMC) - Part 4-6: Testing and measurement techniques - Immunity to conducted disturbances, induced by radio-frequency fields
EN IEC 61000-4-6:2023	Electromagnetic compatibility (EMC) - Part 4-6: Testing and measurement techniques - Immunity to conducted disturbances, induced by radio-frequency fields
EN 55016-2-3:2017/A2:2023	Specification for radio disturbance and immunity measuring apparatus and methods - Part 2-3: Methods of measurement of disturbances and immunity - Radiated disturbance measurements
EN 50360:2017/A1:2023	Product standard to demonstrate the compliance of wireless communication devices, with the basic restrictions and exposure limit values related to human exposure to electromagnetic fields in the frequency range from 300 MHz to 6 GHz: devices used next to the ear
EN 50566:2017/A1:2023	Product standard to demonstrate the compliance of wireless communication devices with the basic restrictions and exposure limit values related to human exposure to electromagnetic fields in the frequency range from 30 MHz to 6 GHz: hand-held and body mounted devices in close proximity to the human body
EN IEC 60947-6-2:2023/ AC:2023-07	Low-voltage switchgear and controlgear - Part 6-2: Multiple function equipment - Control and protective switching devices (or equipment) (CPS)
EN IEC 61439-5:2023	Low-voltage switchgear and controlgear assemblies - Part 5: Assemblies for power distribution in public networks
EN IEC 61439-7:2023	Low-voltage switchgear and controlgear assemblies - Part 7: Assemblies for specific applications such as marinas, camping sites, market squares, electric vehicle charging stations
EN IEC 61557-7:2022/ A1:2023	Electrical safety in low voltage distribution systems up to 1 000 V AC and 1 500 V DC - Equipment for testing, measuring or monitoring of protective measures - Part 7: Phase sequence
EN IEC 61800-3:2023	Adjustable speed electrical power drive systems - Part 3: EMC requirements and specific test methods for PDS and machine tools
EN 50470-4:2023	Electricity metering equipment - Part 4: Particular requirements - Static meters for DC active energy (class indexes A, B and C)

Additional Information:

- CEN-CENELEC Standards Search: https://standards.cencenelec.eu/dyn/www/f?p=CEN:105::RESET::::

SAE International

Main SAE International Publications related with EMC released in Q3/2023:

Publication	Status	Scope
SAE ARP1267A	Stabilized	Electromagnetic Interference Measurement Impulse Generators: Standard Calibration Requirements and Techniques

Additional Information:

- Full List: https://www.sae.org/standards/?topics=50144

International Organization for Standardization (ISO)

Main ISO Publications related with EMC/RF released in Q3/2023:

Publication	Scope
ISO 7240-7:2023	Fire detection and alarm systems - Part 7: Point-type smoke detectors using scattered light, transmitted light or ionization
ISO 19642-1:2023	Road vehicles - Automotive cables - Part 1: Vocabulary and design guidelines
ISO 19642-2:2023	Road vehicles - Automotive cables - Part 2: Test methods
ISO 16750-2:2023	Road vehicles - Environmental conditions and testing for electrical and electronic equipment - Part 2: Electrical loads

Additional Information:

- ISO Standards Search: https://www.iso.org/advanced-search/x/

CTIA – The Wireless Association

Main CTIA Publications related with Over-the-Air (OTA) Performance released in Q3/2023:

Publication	Scope
CTIA 01.01	Test Scope, Requirements, and Applicability v4.0.3 (Jul 2023)
CTIA 01.02	Operator Priority List v4.0.1 (Jul 2023
CTIA 01.50	Wireless Technology, 3GPP Radio Access Technologies v4.0.1 (Jul 2023)
CTIA 01.51	Wireless Technology, Location Based Technologies v4.0.2 (Jul 2023)
CTIA 01.72	Near-Field Phantoms v4.0.1 (Jul 2023)
CTIA 01.73	Supporting Procedures v4.0.3 (Jul 2023)
Wi-Fi CWG	CTIA-Certification Wi-Fi-Alliance Test Plan for RF Perf Eval of Wi-Fi Mobile Converged Devices v4.0.0 (Jul 2023)
CTIA 01.01	Test Scope, Requirements, and Applicability v6.0.1 (Sep 2023)
CTIA 01.03	Normative Reporting Tables v6.0.1 (Sep 2023)
CTIA 01.04	Informative Reporting Tables v6.0.1 (Sept 2023)
CTIA 01.21	Test Methodology, SISO, Reverberation Chamber v6.0.1 (Sep 2023)
CTIA 01.50	Wireless Technology, 3GPP Radio Access Technologies v6.0.1 (Sep 2023)

CTIA 01.51	Wireless Technology, Location Based Technologies v6.0.1 (Sep 2023)
CTIA 01.70	Measurement Uncertainty v6.0.1 (Sep 2023)
CTIA 01.72	Near-Field Phantoms v6.0.1 (Sep 2023)
CTIA 01.73	Supporting Procedures v6.0.1 (Sep 2023)

Additional Information:

- CTIA Test Plans: https://ctiacertification.org/test-plans/

Did you know that…?

FDA Accreditation Scheme for Conformity Assessment (ASCA) becomes a Permanent Program

The voluntary Accreditation Scheme for Conformity Assessment (ASCA) Program is intended to enhance confidence in medical device testing, which should streamline conformity assessment elements of device review.

The FDA grants ASCA Accreditation to qualified testing laboratories, relying on international conformity assessment standards and a set of FDA-identified ASCA program specifications.

ASCA-accredited testing laboratories perform testing in accordance with ISO/IEC 17025 and the ASCA program specifications associated with each eligible standard and test method. A testing laboratory should work with the device manufacturer to develop the test plan.

After testing is complete, the testing laboratory provides the information listed in the relevant ASCA program specifications (including an ASCA Summary Test Report) to the device manufacturer. When the device manufacturer includes a declaration of conformity with an ASCA Summary Test Report as part of their premarket submission, the FDA will have confidence in the testing laboratories' test methods and results and does not intend to request additional information regarding testing methodologies.

ASCA started as an FDA pilot program, due to great results obtained, on September 19, 2023 the FCA decided to convert it in a permanent program.

DEKRA has currently two labs recognized by ASCA Program. One in Virginia (USA) and other in Guangzhou (China).

Additional Information:

- FCA Announcement for ASCA Program: https://www.fda.gov/medical-devices/standards-and-conformity-assessment-program/ accreditation-scheme-conformity-assessment-asca