CISPR Standards in Regulations

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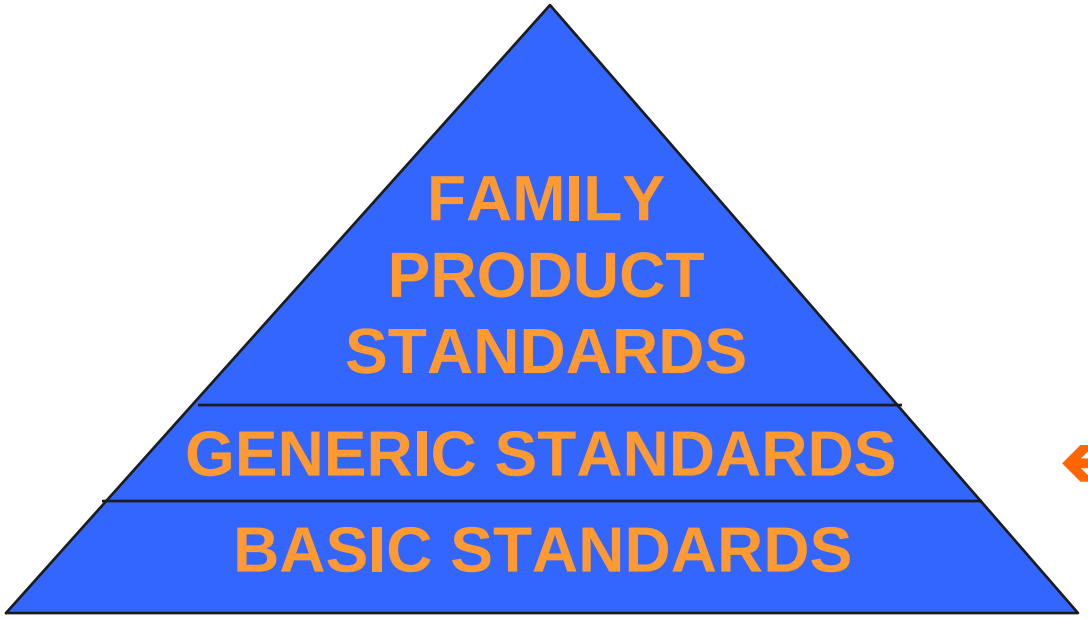
CISPR Emission Standards

CISPR is:

- **IEC Special Committee**
- **Protecting Radio services**
  - **since 1935**

CISPR Emission Standards



← Product Committees

← Limits

← Measurements

CISPR Emission Standards

Product Emission Standards

- **Industrial Products**
- **Vehicles**
- **Domestic & Lighting Products**
- **ITE & Multi-Media Products**

CISPR Emission Standards

The Challenges:

- **Protecting Digital Radio & TV**
- **Protecting new radio services**
- **More interfering sources**
- **Changing Interference**

Which Standards?

- Basic and generic standards are used by product committees generally by reference
- Product committees add product specific information
  - Special test set ups
  - Limits
  - Presumption of compliance statements

Which Standards?

- Product committee standards can cover a broad range of products such as information technology AND product specific standards that apply to specific products such as personal computers
- These standards try to avoid regulatory statements such as “in case of dispute” and follow the Directives in stating a “refereed” test method where there are several methods indicated to show compliance

Issues arising

- Product standards tend to be referenced in national regulations and hence become defacto regulatory in nature.
- This leads to:
  - Pressure to have standard that meets a national requirement over universal application
  - Reluctance to make changes or improvements as they would have to be made in local laws as well
  - Regional “voting” to accommodate regional laws

Issues arising

- CISPR radiated emission standards are universally referenced in regulations
  - Implementation may be immediate or may be transitioned over years
  - Countries do not necessarily implement the standards and retain their own using some of the material but not all
  - Countries implement changes immediately that leave manufacturers reeling

Recent issues

- Removal of regulatory statements in CISPR product standards
- Allowance of multiple test methods to show compliance where the test results can widely vary
- Limits may be a compromise and not based on an adequate interference model
- Testing of certain products are not covered by CISPR standards such as transmitters; how to coordinate with those that do such standards such as ITU and ETSI

Don Heirman Biography

- Donald Heirman is president of Don HEIRMAN Consultants, training, standards, and educational electromagnetic compatibility (EMC) consultation corporation. Previously he was with Bell Laboratories for over 30 years in many EMC roles including Manager of Lucent Technologies (Bell Labs) Global Product Compliance Laboratory, which he founded, and where he was in charge of the Corporation's major EMC and regulatory test facility and its participation in ANSI accredited standards committee and international EMC standardization. He chairs, or is a principal contributor to, US and international EMC standards organizations including ANSI ASC C63™ (chairman) and the International Electrotechnical Commission's (IEC) Special International Committee on Radio Interference (CISPR) where he is its subcommittee chairman responsible for CISPR Publication 16. He is a member of the IEC's Advisory Committee on EMC (ACEC) and the Technical Management Committee of the US National Committee of the IEC. He is a Fellow of the IEEE and a member of the IEEE EMC Society Board of Directors including Vice President for Standards, chair of its technical committee on EMC measurements, past president and past chair of its standards development committee. He is past president of the National Cooperation for Laboratory Accreditation (NACLA). He is also immediate past president of the IEEE Standards Association (SA), member of the SA Board of Governors and past member of the IEEE's Board of Directors and Executive Committee. He is also the Associate Director for Wireless EMC at the University of Oklahoma Center for the Study of Wireless EMC. He has presented numerous workshops, tutorials, and technical papers internationally and is listed in several Who's Who publications. He is a retired Commander in the US Navy Reserves.