

RECOMMENDATION ITU-R BT.1721

Objective measurement of perceptual image quality of large screen digital imagery applications for theatrical presentation

(Question ITU-R 15/6)

(2005)

Scope

This Recommendation specifies that the measurement techniques for the objective measurement of perceptual image quality of large screen digital imagery (LSDI) applications for theatrical presentation should conform to those parameters defined in Recommendation ITU-R BT.1683, applicable to standard-definition digital broadcasting systems.

The ITU Radiocommunication Assembly,

considering

- a) that Recommendations ITU-R BT.1680 and ITU-R BT.1689 specify the use of the baseband systems specified in Recommendations ITU-R BT.709, ITU-R BT.1543 and ITU-R BT.601 as members of a hierarchy of large screen digital imagery (LSDI) systems for distribution of programmes for LSDI applications intended for presentation in a theatrical environment;
- b) that Recommendation ITU-R BT.1662, specifying the general reference chain and the management of post-processing headroom for programme essence in LSDI applications, essentially indicates that LSDI delivery should ideally be transparent to the programme essence quality at the input of the delivery chain;
- c) that Recommendation ITU-R BT.1683 specifies objective measurement techniques of perceptual video quality applicable to standard-definition digital broadcast television in the presence of a full reference;
- d) that the objective measurement techniques of perceptual video quality specified in Recommendation ITU-R BT.1683 for standard-definition digital broadcast systems are also broadly applicable to higher-sampling systems, such as those in Recommendations ITU-R BT.709, ITU-R BT.1543 and ITU-R BT.601, if the finest image detail element roughly subtends the same viewing angle, irrespective of the vertical sampling structure of the system,

recommends

- 1 that the objective perceptual video quality measurement techniques specified in Recommendation ITU-R BT.1683 for standard-definition digital broadcast systems should also be applied to the theatrical presentation of LSDI applications.
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