

ISO/IEC JTC 1/SC29/WG1 N100203 95th JPEG Meeting, Online, 25-29 April 2022

ISO/IEC JTC 1/SC 29/WG 1 (ITU-T SG16)

Coding of Still Pictures

JBIG

JPEG

Joint Bi-level Image Experts Group Joint Photographic Experts Group

TITLE: Subjective evaluation procedure of JPEG AI proposals

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Contact:

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1 Purpose of this Document

This document reports the decisions made at the 95th JPEG meeting with respect to the subjective evaluation of the JPEG AI Call for Proposals (CfP) proponents' submissions.

2 Subjective Assessment Methodology

During the JPEG AI breakout meetings of the 95th JPEG meeting, the following decisions were made:

- As defined in the JPEG AI Common Training and Testing Conditions, a DSCQS double stimulus methodology will be used with 8 images, using a crowdsourcing platform with QualityCrowd2 software which will be connected to the Amazon Mechanical Turk service.
- JPEG 2000 visually optimized and HEVC/VCC Intra will be used as anchors in the subjective evaluation.
- Crops from the following 8 images will be used: #01, #07, #09, #11, #12, #15, #19 and #20. The crops are described in the following table:

Test image	Crop_top_left (X,Y)	Crop_width	Crop_height
00001_TE_1192x832_8bit_sRGB.png	(0,0)	945	880
00007_TE_1248x832_8bit_sRGB.png	(152,0)	945	832
00009_TE_1536x1024_8bit_sRGB.png	(154,71)	945	880
00011_TE_1784x1296_8bit_sRGB.png	(180,31)	945	880
00012_TE_3680x2456_8bit_sRGB.png	(1679,350)	945	880
00015_TE_976x1472_8bit_sRGB.png	(15,592)	945	880
00019_TE_2120x1608_8bit_sRGB.png	(1052,30)	945	880
00020_TE_1072x928_8bit_sRGB.png	(60,30)	945	880

- Four bitrate points covering a wide range of qualities will be used in the subjective evaluation.
 - o 0.06, 0.12, 0.25 and 0.5 bpp for image #11 and #15
 - o 0.06, 0.12, 0.25 and 0.75 bpp for image #19
 - o 0.12, 0.25, 0.5 and 0.75 bpp for the remaining images
- Number of valid subjects in the subjective assessment test will be above 80.