

W1.1 Image Quality of Printers

NCITS W1.1 2002 – 050

Gloss and Gloss Uniformity

Yee S. Ng, November 1, 2002

Gloss/gloss uniformity ad hoc Teleconference Meeting Notes

(10/29/2002 teleconference)

Present: Chung H. Kuo (NexPress), Dale Mashtare (Xerox), Jeff Wang (NexPress), Pashant Mehta (ImageExpert), Yee Ng (Chair, NexPress), Eric Zeise (NexPress), John Kessler (Paxar)

Absent members:

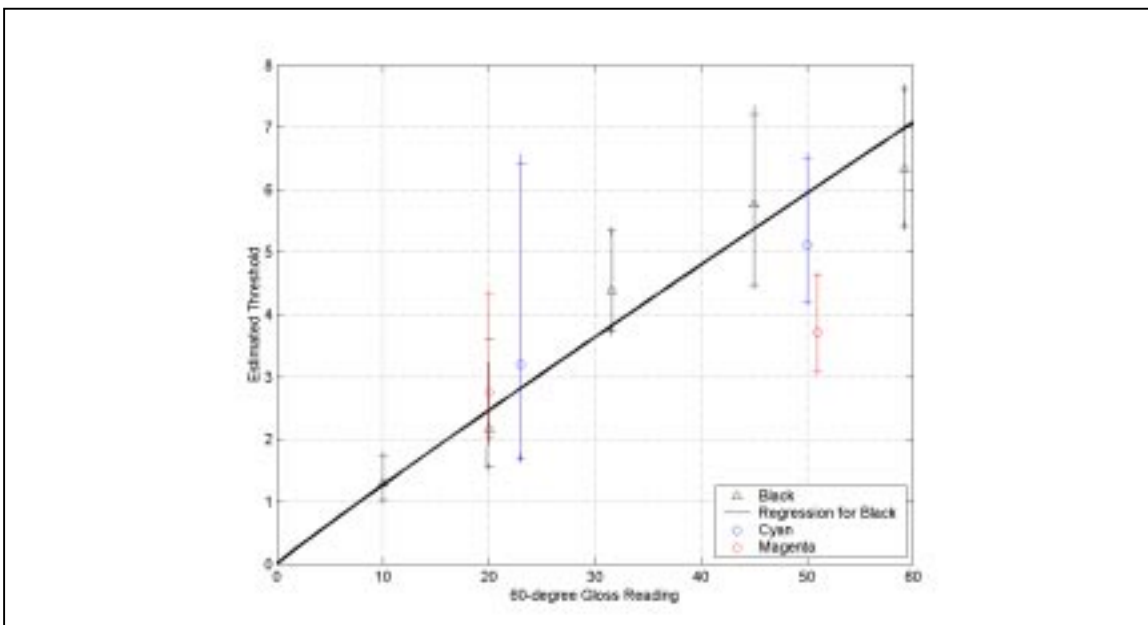
Ted Bouk (Kodak), Eric Maggard (HP)

Next Teleconference: Tuesday November 12, 2002 @ 1:30 PM EST

Agenda

1. Review/modify agenda
2. Potential paper for PICS2003
3. Discuss micro-gloss measurement result.
4. Schedule next teleconference

The Gloss/gloss uniformity ad hoc met on 10/29/2002. The ad hoc team approved the agenda. YN reports on activities at NIP18 conference. CK, YN and JW has published a paper relating to gloss jnd at the NIP18 (“Differential Gloss Visual Threshold Under Normal Viewing Conditions”, NIP18:2002 International Conference on Digital Printing Technologies Proceedings, pp. 467-470). The paper states that the experimentally measured black gloss (just-noticeable difference) to be $JND(g60) = 0.14x(G60)^{0.96}$ (see charts below). Also please note the issues relating to color gloss jnd.



The ad hoc further discussed the possibility of writing a joint paper to outline the current status and summarized the past result of the gloss uniformity Standard work in the PICS2003 conference. This concept is approved by all present and YN has the task to submit an abstract to the conference. After the rough draft for the full manuscript is written (YN/CK), it will be circulated for the other participating authors (EZ, JW, DM, PM, JK and EM) for additional comments and review.

The ad hoc then reviewed the micro-gloss scan data performed by PM on gloss artifact samples supplied by DM. Due to the busy schedule, only 2 sets (PS122 and PS648) of the submitted gloss artifact samples have been scanned by DM. PM reported that PS648 C2 have high frequency high contrast microgloss structure. Whereas sample PS 122 have a high frequency microgloss structure but the contrast was low compared with the other samples. The optics of the instrument was set that 1 pixel = 0.045 mm and the images captured are 400x400 pixels on a sample size of 18 mm x 18 mm. There are questions relating to the size of the image capture area may be too small to capture some of the lower frequency gloss mottle in the other samples. PM will do a preliminary scans for the samples and send data for the next meeting's discussion. In this case, illumination is only performed at one orientation.

DM also informed the ad hoc that Professor J. Arney (RIT) has expressed an interest to join with the micro-gloss study with one of his student (a potential for student project). YN will send invitation to Professor Arney for the next meeting.

Next call-in teleconference: Tuesday, November 12, 2002 @ 1:30 AM EST

Proposed agenda for November 12, 2002

1. Review/modify agenda
2. Discuss PICS paper status.
3. Discuss Microgloss measurement results
4. Schedule next teleconference

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