

**ISO/TC 130/WG 2 (Prepress Data Exchange)
40th Meeting
April 21 – 22, 2010
St. Gallen, Switzerland / Webinar**

09:00 – 18:00

1. Call to Order - Welcome - Introductions - Roll Call of Experts – Announcements

The meeting was called to order at 09:00 by David McDowell, Convenor. Due to travel being disrupted for many of the participants the meeting was held both in person in St. Gallen and via a GoToMeeting Webinar.

The following technical experts were in attendance (either in person or on the web as noted) and introduced themselves:

Dave McDowell*, Convenor	NPES	USA
Debbie Orf*, Secretary	NPES	USA
Ito Akihiro*	Fuji Xerox	Japan
Victor Asseiceiro	GMG Americas	USA
Frank Biederich	Adobe Systems, inc.	USA
Laurel Brunner	Digital Dots	UK
Ray Cheydleur*	X-Rite	USA
Robert Chung*	RIT	USA
Olaf Drümmer	Callas Software	Germany
Joe Fazzi*	IDEAlliance	USA
Phil Green*	London College of Communication	UK
Xiahoue He*	BIGC	China
Ahn Hye-Jeong		Korea
Dov Isaacs*	Adobe Systems, Inc.	USA
Stephan Jaeggi	Prepress Consulting	Switzerland
Paul Jones*	Objectif Lune	Netherlands
Dveer Kassorla*	Indycess	Israel
Nareesh Khanna		India
Andy Kraushaar	Fogra	Germany
Paul Lindström	Malmoe University	Sweden
Heath Luetkens*	CGS Publishing Technologies	USA
Filiep Maes*	Enfocus	Belgium
Makoto Matsuki*	NTT Quaris Corporation	Japan
Karl Meinecke	BG ETEM	Germany

Mary Lou Pelaprat*	ISO/CS	Switzerland
Craig Revie	Fujifilm Corporation	UK
Leonard Rosenthol*	Adobe Systems, Inc.	USA
Steve Smiley	Vertis Communications	USA
Kyung Chol Seong*		Korea
Mark Stegman*		
Walter Steiger	Ugra	Switzerland
Bryan Sunderland	QCI	UK
Hitoshi Urabe*	Fujifilm Corporation	Japan
Rotti Venkataramana		India
Larry Warter*	Fujifilm Graphic Systems USA	USA

**Participated via Webinar*

2. Review and approve agenda (N 1371 and 1377)

Because of the travel issues the original agenda (N1371) was revised to create a working agenda (N1377) that included only those issues considered critical to discuss. The committee reviewed the working agenda, which had been distributed prior to the meeting, and the following were added:

-- ECI Registry was added after RGB Workflow discussion

3. Review status of action items

The action items from the September 2009 meeting (N 1364) were reviewed and the following status noted:

#	Action Item	Status
09-10	Brunner will coordinate with Donahue, Drümmer and Isaacs to develop an article to be placed in the ISO Bulletin and other publications regarding the PDF/VT work.	In progress. Isaacs, Donahue and Drümmer will review the document developed by Brunner and finalize it for the ISO Bulletin.
09-11	McDowell will follow up with Mortara and Pelaprat re developing a Technical Report regarding the application and relationship of various parts of ISO 12640.	Completed. Concluded any NB can use as needed. Can be put on the ICC website. McDowell will circulate to WG2.
09-12	Matsuki will review with Antenna House by November 30 to determine if ISO 15930-8 would satisfy their requirements, or if they still require ISO 15930-5.	Completed. It was determined that ISO 15930-8 would satisfy the requirements of Antenna House, Inc. with 3 conclusions stipulated in (N1365). If these are considered reasonable Japan will agree to withdraw ISO 15930-5. Withdrawal was approved. Japan continues to use this software, but they

		don't need the standard so they agree to withdraw.
09-13	Cheydleur will prepare an initial draft of part 1 of ISO 17972.	Completed (N 1375)
09-14	Cheydleur will prepare custom resource containers for parts 2 and 3 of ISO 17972.	Completed (N1376)
09-15	Revie/Smiley will prepare custom resource containers for part x of ISO 17972, for spot color data.	Open.
09-16	McDowell will review multi-part standard concept and vision for ISO 17972 with ISO/CS to ensure that our proposal is acceptable.	Completed.
09-17	Revie will provide input to TC130 WG2/TF2 concerning our conclusions regarding proofing approval metadata.	Completed – this was discussed at the last meeting.
09-18	McDowell will circulate minutes of WGs 18, 22, 23, and 24 from the upcoming TC42 meeting to TC 130 WG2 for information.	Completed.
09-19	McDowell will write a letter to TC42 JWG 22 reminding them of the need to circulate documents to TC130.	Completed.
09-20	McDowell, Revie, Leutkens, Warter, Matsuki and Urabe will collaborate to write a description of the intent and to make clear the terms and concepts involved in integrating digital data from cameras into the printing production workflow. This is dependent upon the completion of the Japanese National Body study.	Not started – waiting for Japanese National Body input.

4. Status of documents and pending projects

The Report on Status of TC 130 WG 2 Projects and Standards (as of April 2010) contained in WG2 N 1373 was briefly reviewed.

5. ISO 17972 - Colour data encoding

Working Drafts of *ISO 17972-1, Graphic technology — Colour data exchange format (CxFx) — Part 1: Relationship to CxF3* (N 1375) and *ISO 17972-2, Graphic technology — Colour data exchange format (CxFx) — Part 2: Scanner target data*, (N 1376) were circulated for discussion just prior to the St. Gallen meeting.

Cheydleur explained that Part 1 describes the need for a more robust data exchange; given our current formats have some problems. Part 1 also explains how to use the basic CxF3 schema to facilitate that exchange with the additional resources provided. The overall concepts of CxF3 and how they relate to our existing ASCII and XML exchange format in ISO 28178 are covered

while laying the groundwork for the use of a custom resource for each of the defined data exchanges.

There was a discussion of the availability of the grammar and schema for CxF3 and if they are going to be published by ISO along with this document. It was noted that ISO 17972 will relate to CxF3 much like ISO 15930 (PDF/X) related to the Adobe PDF Specification and will point to the CxF3 documentation for the core schema.

There was a concern raised about the licensing provided by X-Rite in CxF3. The issue is that when validating a piece of XML that contains both core resources and custom resources, the core CxF schema is required in addition to the new definitions to allow a description of both. The procedure for doing that is to take the core schema document, and the custom resource specification and schema to reference information about both core and custom resources and then run that schema against the XML validation. For ISO to publish schema to validate custom resources, it needs rights granted from X-Rite to a version for the schema that can be directly accessed by the user. Cheydleur indicated that when ISO 17972-1 and ISO 17972-2 are published that will be covered by changing the license to work under the ISO license agreement. It was agreed there should be an understanding that the issue of the core definitions of CxF3 are not changed arbitrarily. Cheydleur stated that X-rite does not plan to change the core definition.

Action Item TAG 10-01: Cheydleur and Rosenthol to discuss the relationship of the core schema document to the needs of the ISO schema documents of ISO 17972 and report back to WG2.

The committee reviewed 17972-2 which will be the first part of the standard dealing with custom resources and describes the documentation of scanner target data. As there will be multiple parts of CxFx, it was agreed to point to them as Parts rather than use numbers (e.g. CxFx-1, CxFx-2 etc.) to avoid confusion. It is expected that there will be products supporting more than one of the profiles, therefore the custom resource used would point to what a particular exchange is being used for. In order to determine which part was being used it would be necessary to go inside the custom resource and scan the file looking for a particular element of a particular type, or look at the header.

At this point the document contains a somewhat arbitrary set of required fields. Cheydleur asked for feedback on the minimum required fields required for a standard target and whether these are the only required fields needed for scanner target exchange. The committee reviewed the required fields in the document and agreed that Cheydleur should go forward with a CD document.

Action Item 10-02: Cheydleur will prepare ISO 17972-1 and ISO 17972-2 to be distributed as a CD ballot by the end of June 30, 2010.

It was asked if there are any tools that can be made available from X-Rite for the purpose of evaluating conformance to this standard and to help determine if the data is sufficient. Cheydleur indicated that there are some beta tools that are available now. Additionally, once the standard is

in CD with full accompanying electronic files a testing tool can be made available, with the understanding that this will not be a final tool. Cheydleur will work to create an area on the X-Rite website where this evaluation can take place.

Action Item 10-03: Cheydleur will investigate the possibility of creating an area on the X-Rite website where testing tools can be made available for evaluation of conformance to ISO 17972-1 and ISO 17972-2.

6. Review of possible new work (Adobe metadata standard)

Representatives from Adobe have asked if TC130 WG2 would consider helping to move the Adobe XMP Specification under the ISO banner. The document is currently published as a 3 part document as follows:

Part 1 – Data and Serialization Model

Part 2 – Standard Schemas

Part 3 – Storage in Files

The proposal put forth is that Part 1 and a portion of Part 2 which represents the core requirements would become a standard under TC130. It is expected that the portion of Part 2 that deals with specialized schemas would be the subject of International Standards under the control of other ISO TCs more directly involved in that subject area. (For example XMP schemas for EXIF would be best done in collaboration with ISO TC42 – see Agenda Item 7).

Frank Biederich from Adobe provided a presentation (N1380) detailing XMP basics and explained that Adobe would like to see the XMP specification brought under ISO. He feels that TC130 is the logical place for this work as the graphic arts is one of the largest users of XMP. XMP is currently used in many published standards and specifications such as PDF/A, PDF/X, IPTC, EXIF, etc. He noted that the documents need to be converted to make the language normative to conform to ISO specifications.

Adobe has started work on the proposed new draft but is not comfortable sharing that document in its current form because the technical content has not been reviewed to ensure the language is normative and consistent with the existing XMP specification. It was noted that it is important to both Adobe and users in the graphic arts community that, at least during the initial movement into ISO, this document does not change technically because it would affect existing applications. Adobe indicated that there are no copyright issues.

The preferred approach is to fast track a single document that represents the merge of the existing Part 1 and most of Part 2 modifying it so that it is technically identical to the current spec, albeit an edited version. Another choice is to have TC130 do a NWIP and agree that the document is mature enough to go directly to DIS ballot, where only editorial comments are allowed.

There was discussion on the concern about whether WG2 has the expertise to maintain and develop this work for the future. Adobe indicated they are willing to commit resources to WG2

to help support this activity. It was agreed that the graphic arts industry is the largest user of XMP. The committee felt that a new Task Force (TF4) should be created to accomplish this work. A separate TF would allow for separate meetings and more flexibility.

Mary Lou Pelaprat, the TC130 ISO Technical Program Officer, joined the meeting for part of this discussion. She indicated that a document normally cannot be fast tracked unless it is a document that is already published and is sponsored by a national body for fast track action. She indicated that ISO needs a written proposal from TC130 with the steps laid out along with sample documents and an indication of the national body that will sponsor the project so that ISO/CS can determine the best way to proceed.

Action Item 10-04: McDowell, Rosenthol, Biederich will provide written proposal for combining the current XMP documents into an ISO standard along with sample documents (with caveats relating to technical content) to Pelaprat by next week for ISO/CS to study and provide answer on how to proceed.

7. Report of TC42 related technical work of interest to TC130/WG2

Urabe reported on the work of the TC42 meeting in Cupertino, CA. (See N1374). There is a proposal from TC42 that if TC130 is going ahead with standardizing XMP they would like to create a JWG with TC130 to work on the part of XMP that is specifically for photographic or camera data. McDowell pointed out that creating a JWG should wait until the initial work in TC130 is completed and it is determined how the basic XMP work will be done. It was agreed to take official action on initiating a joint working group with TC42 at the plenary meeting being held in Brazil in October 2010.

8. National Body Activities - (JSA report on RGB Workflow)

Urabe presented a document (N1378) detailing the key concepts for RGB workflow and pointing out the importance of making “perfect” RGB images for printing workflow. He noted that PDF/X-4 requires “perfect” RGB images for conversion to CMYK. At this time, however, there is no standard to handle this issue.

He pointed out that it is difficult for stakeholders, i.e. photographers, clients and prepress operators, to set up a standard condition in order to control the appearance as the same image does not always have the same appearance among different stakeholders. He noted that the ICC profile converts the appearance of an RGB image on a monitor to the appearance of a printed-image.

Another problem discussed is that the tolerance of the monitor is larger than the tolerance of the print. This makes it difficult to check and retouch an RGB image on the monitor as highlight point/shadow point (HP/SP) can only be checked by a high-skilled operator using CMYK dot %.

Therefore it is proposed to use a reference print instead of the monitor in order to share and communicate the appearance of an RGB image that can be shared among all stakeholders.

Three possible candidates for standardization were proposed: an RGB workflow guideline to make a perfect RGB image; the addition of a Destination_ICC_profile tag to Exif.; and the specification of a printing-simulated print using consumer-available printers.

Urabe stated that at the next meeting a more detailed proposal will be presented.

Action Item 10-05: Urabe will prepare draft RGB workflow guideline and a draft NWIP and give to Orf by August for circulation before next meeting in Sao Paulo

9. ECI Registry

Drümmer reported that ECI has decided to implement a registry for both ICC profiles and characterization data sets. This registry will be machine readable, and it will include data relating profiles and characterization data sets. Along with the connection between data set and profiles, the name and the description of the profile can also be seen.

He noted that software engineering companies find the ICC registry insufficient as it is not friendly to machine readable applications. There is also the problem of not being able to access data without a click through and unless a license agreement is signed.

Callas software is adding a PDF feature that allows software to read information directly from the registry. More important is the ability to put together a correct output intent for PDF/X. It was noted that not many users know what to put inside the output intent. The ECI registry will make it possible to pull information such as the name, date, URL, etc. and create an output intent on the fly.

Green indicated that the ICC would be interested in collaborating with ECI on this project. He noted that the ICC consulted widely on the current ICC profile registry currently in use. He added that anything which helps to promote the concept and the availability of profiles is good for the industry.

McDowell stated that he would like to take a document describing the ECI registry to the June ICC meeting and to hopefully encourage collaboration between ECI and ICC. Drümmer will provide the document to be made into a WG2 document so that it can be tracked and can be circulated.

Action Item 10-06: Drümmer to provide a summary of registry requirements of the proposed ECI registry and possible cooperative arrangements with the ICC.

10. Future meeting plans

The next TC130 working group and plenary meetings are scheduled for 11-15 October 2010 in Sao Paulo Brazil. WG2 will require 1.5 days, WG2/TF2 will require 1.5 days WG2/TF4 will require .5 days.

11. Adjourn

There being no further business the meeting was adjourned. The committee thanked Olaf Drümmer for all the work he did to provide the GoToMeeting connections and Erwin Widmer and Ugra for hosting and providing the meeting facilities.