

The Paperdam Group:
views on ISO Standards. Milano Nov 23, 2009



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The Paperdam Group: working on Standardization

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The Paperdam Group: Competition laws, we do not talk about

- Sales and purchase prices, including price changes or pricing policy.
- Discounts, rebates, allowances or other factors affecting sales or purchase prices.
- The commercial terms or conditions of sale or purchase.
- Production output, capacity, capacity utilization rates or changes in output, capacity or capacity utilization rates.
- Individualized sales/order figures or customer lists.
- Production, marketing, R&D or other costs.
- Investments, production, product development or marketing policies or plans.
- R&D plans or results.
- Stock levels.
- Allocation of customers.
- Sales territories.
- Market sharing.
- Sharing of sources of supply.

The Paperdam Group: Targets

- Target of the Working Group are Colour Management and Standardization issues.
- We believe it is our common interest to develop quality printing thru correct prepress, colour management and paper use, this will encourage favourable environment for our companies.
- We believe it is our common interest to communicate : “*Papermakers have a Color Management Agenda*”.
- We must help ISO standardization.
 - ISO and main participants are representative players.
 - It is our interest to promote quality printing and standardization is one way to reach this.
- We develop paper and not paper categories. This is against fair competition and the market.
 - Paper categories are meant to simplify the standard, not to develop correct printing.
- We must develop still specific tools for those who need it.
 - Companies publishing globally are good examples.

The Paperdam Group: coordination in National ISO Bodies

- Finland.
- Sweden.
- Germany.
- Netherlands.
- France.
- Spain.

The Paperdam Group: **Positions on Standardization**

- There is no ISO 12647.xx compliant paper.
 - See Paperdam statement Sept 2009.
 - We recommend to publish for each papergrade: ICC profiles and characterization data (ECI, PSR, FOGRA...)
- ISO 13655 issues. (*ISO 13655 Graphic technology — Spectral measurement and colorimetric computation for graphic arts images*).
 - UV calibration is NOT adressed.
 - Therefore: we must support ISO 5631-3 Colour L*, a*, b* D 50 with UV as per C illuminant calibration.

The Paperdam Group

Expertise in Paper Performance

2009 11 17

What is The Paperdam Group?

In April 2008 a conference with leading European paper manufacturers was hosted by IGT Testing Systems, as active participant in ISO standardization, to prepare for the ISO TC130 Meeting in Paris. A steering group of paper manufacturers was then formed, to give a proposal about paper categorization to the ISO Working Groups. This group is called "**Paperdam**" (*Paper* manufacturers meeting in Amster**dam**.)

The Paperdam Group claims to be the experts when it comes to knowledge about paper performance and is open to any paper manufacturer who is active in the printing market.

Paper Categorization

The first steps in paper categorization were taken in 1996 when the original version of ISO 12647 (part 2 but not only) was published by ISO TC130 with the five paper types. Paper types were chosen mainly from sheet-fed offset and reflected the quality of papers in the early 90's. Even after the 2004 revision and the 2007 amendment very little has changed in paper categorization.

Optical data used in these standards cannot be compared to white paper specifications, they are a source for misunderstanding.

Optical target values of these five paper types do not reflect the current papers in the market. There are a large number of new types of papers, especially in heat set web offset, with a wide range of paper shades and achievable colour gamuts.

The term "ISO compliant paper" is misleading.

During recent years, ISO 12647 certification has increased in popularity and is nowadays a requirement by many print buyers. Paper manufacturers have been requested to supply "ISO compliant paper", referring strictly to paper shade as per ISO Paper Types. This is a misleading interpretation.

ISO 12647 compliance (meaning reaching the right Colour Gamut) can be achieved with any white paper using the correct ICC profile and characterization data.

The Paperdam Group points out that, as stated in ISO 12647-2 and -4 point 4.3, the most important issue is that the proof substrate matches with the production paper. The proof substrate should be specified, including parameters that are common in paper industry.

Recommendations of ICC profiles and Characterization data:

In order to get easy prepress settings and high quality colour management, the **Paperdam Group** supports the publication of recommended ICC profiles and characterisation data for each of their paper grades.

Recommendations can be found on their product data sheets / homepages.

Links for downloads of the ICC profiles and characterisation data sheets:
www.eci.org and www.fogra.org



The Paperdam Group:

Our position on ISO 13655-2009 in paper specifications

1. 13655-2009, if correctly used, is an improvement. It is designed for *printing industry* only.
2. We are still concerned by below issues :
 - As mentioned in point 4.2.2.2. Note 2, 13655-2009 as per to-day and 5631-2 MAY not be equivalent.
 - Reproducibility of results obtained with 13655-2009 is not yet proven, since several topics (UV definitions and calibration being most critical) are not covered.
 - Several possibilities for testing and for equipments are left to the user and must be mentioned together with the results indeed.
3. We believe that any reference to 13655-2009 in paper specifications for white or close to white papers should be avoided. Testing conditions of ISO 5631-3 (Colour L*,a*,b* D50 conditions) are preferred because they are reliable and reproducible. Most important: they are operational and immediately reachable.
4. Developments of 12647 should not refer to 13655-2009 in case *white paper values* are mentioned.
5. We acknowledge the sense of using 13655 in *evaluating the white point of characterization data*.

The Paperdam Group: Dot Gain-TVI

- ISO TS 10128-2008. « Methods of adjustment of the colour reproduction of a printing system to match a set of characterisation data. »
 - When measuring quality of a print thru reflectance, you are indeed integrating all variations: variations coming from base, thus paper, variations coming from inks, blankets, press settings, etc...
 - To define Dot Gain or TVI of a paper is a misunderstanding.

The Paperdam Group:
Proposal to JWG 39 TC 6 – TC 130 for
« Communication of Print Relevant paper properties »

- « Papierkenwerte » (under publication) in Germany proposes a list of relevant properties for printing paper.
- This action is supported by ***The Paperdam Group***.
- This list does not exclude any further work and needed work on print properties evaluations.
- We proposed a NWI to have this this list published in a « to be decided » document under ISO umbrella.
 - TR Technical Report as a minimum and TS Technical Specifications being best.

The Paperdam Group: Optics. What next ?

- To define (White) Paper shades targets :
 - Use ISO 5631-1 or 2 Colour L^* , a^* , b^* illuminant C or D 65.
- ISO 13655-2009 must not be used to specify (white) papers.
 - Use ISO 5631-3 Colour L^* , a^* , b^* D 50 illuminant.
- To evaluate Fluorescence in papers :
 - Use ISO 2470-2 (Note 8.4) on D 65 Brightness.
 - Use ISO 11476 (Note 10.3), ISO 11475 (Clause 10.3). Whiteness.
- Organize UV calibration of D 50 illuminants is a MUST.

The Paperdam Group: Standardization, what is next ?

- ISO TC 6. Develop ISO 5630-7, aging under light to evaluate light fastness.
- ISO 12040 (woolscale) is an unsuitable and misleading standard in very most cases of lightfastness evaluation (destruction of OBAs and yellowing of mechanical fibres)
- ISO TC 130 / 2009 is running a preliminary work item for the development of a Standard on :
 - Communication of optical and surface properties of printing substrates (e.g. fluorescence, gloss and colour).
- JWG 39 TC 6 – TC 130.
 - Print relevant paper properties to be listed.
- JWG (joint working group) liaison TC 6 – TC 130.

The Paperdam Group: Reference documents

- See N documents of ISO TC 130 / 2008 and 2009.
 - JWG 8 ISO 13655.
 - WG 3 ISO 12647 series.
- See N documents of ISO TC 6 / 2009.
 - TC 6 WG3 Optical properties.
 - JW 39 TC 6-TC 130.
 - SC 2 WG 12 Aging properties.
- See presentation iarigai Stockholm 2009. Printing by the numbers on commercial paper grades. *Petter Kolseth, Luc Lanat, Örjan Sävborg.*
>www.slideshare.net/petterkol/iarigai-2009-printing-by-the-numbers

The Paperdam Group:

The last slide: Our 3 core points

- The daily challenge in a paper mill is to fulfill paper specifications communicated in Technical Data Sheets, in this order :
 - Brightness and shade.
 - Smoothness (PPS,...)
 - Gloss.
 - Anything to satisfy printing results at printer.
- Process Management at printer and at papermaker is THE topic.
 - For a given grade, we must work on process consistency
 - We must not work on on upgrade of paper definition to reach better printed results.

The Paperdam Group: statement

>It is the common interest of all players, to support « cooperative network standardization » in order to increase the competitiveness of the market of printed communication.

The Paperdam Group
thanks you for your
support