

Comments on Product Specification for Imaging Equipment

1. Eligibility Criteria Final Draft , Version 3.0
2. Test Method for Determining Imaging Equipment Energy Use Final Draft, Rev. Nov-2018

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1. Eligibility Criteria Final Draft , Version 3.0

- 1) 1 DEFINITIONS
 - A) Product Types
 - 8) Professional Imaging Product

Professional Imaging Product is required to meet five of seven additional features (g) - m)). But item i) feature is only applicable to color products and not applicable to monochrome products. Therefore, monochrome Professional Imaging Products must meet five of six features and this requirement is very strict.

We propose to change the required number of additional features (g-m)) from 5 to 4 for monochrome products.

Line 43

i) Perfect binding or ring binding (or similar, such as tape or wire binding);

We would like to confirm if the saddle stitch binding is included in the above requirement or not.

The sample of saddle stitch binding is as shown below.

For the cover / back cover, it is also possible to make it a thick paper / glossy paper that is different from the inside.



Fig 1: Cover page



Fig 2: Saddle stitch staple



Fig 3: Folding



Fig 4: Auto trimming edges

2) 3.3.1 Automatic Duplexing Capability

Table 5

The requirement of the ENERGY STAR is not harmonized with that of Blue Angel as follows.

ENERGY STAR: Color \geq 19 ipm, Mono \geq 24 ipm

Blue Angel: Color $>$ 19 ipm, Mono $>$ 24 ipm

Since the contents that was explained at the Webinar on 2018/07/30 as shown below is not included, this description should be corrected as follows.

ENERGY STAR: Color $>$ 19 ipm, Mono $>$ 24 ipm



Proposal – TEC Requirement: Duplexing

- Keep current speed bins
- Require duplexing by default (harmonized with Blue Angel)
- Eliminate duplexing through optional accessory at intermediate speed bins (19<s<35 ipm color; 24<s<37 ipm monochrome (not used by many products))

Automatic Duplexing Capability: For all MFDs and printers subject to the TEC test method, automatic duplexing capability shall be integral to the base product and enabled by default for products with speed ~~equal to~~ or greater than those specified in Table 5. Printers whose intended function is to print on special single-sided media for the purpose of single sided printing (e.g., release coated paper for labels, direct thermal media, etc.) are exempt from this requirement.

Table 5: Automatic Duplexing Requirements for all TEC MFDs and Printers

Product Type	Product Speed (ipm)
Color	$>$ 19
Monochrome	$>$ 24

Line 382

The condition of “enabled by default” seems unclear. In the Blue Angel, ErP (Lot 4) and EPEAT those have similar requirements, automatic duplexing capability is limited to print mode. From the point of harmonization, we propose to limit the default setting as “duplex printing”.

The description of Blue Angel, ErP (Lot 4) and EPEAT is as follows:

Blue Angel DE-UZ 205:

For devices that are by default equipped with a component for duplex printing and copying and which are placed on the market for the first time after 1.1.2018: **duplex printing must be set as default.**

ErP Lot 4:

Duplex-printing for TEC products in the relevant speed category specified in the table below is to **be set as default when printing from the computer,**
Meaning that the relevant software (driver or firmware) shall be configured so that the first print-job will be in duplex unless the print settings have been modified at the stage when the product is first installed to function as intended.

EPEAT:

A product shall, when installed according to the manufacturer’s instructions, **using the default Print Drivers,** and using the default standard size media type and size settings, **default to automatic duplexing for its printing mode.** The manufacturer shall make publicly available and provide in the product documentation demonstrating compliance with the criterion.

3) 3.3.2 Typical Electricity Consumption:

Line 468

In the Note on Line 473, there is a description that the rounding of TEC_{MAX} is required to 0.01kWh for reporting. But the rounded value in Line 468 is still 0.1kWh/wk and has not been corrected. This should be corrected and similar description on Line 426 and Line 445 should also be corrected in the same way (0.1kWh → 0.01kWh).

Line 469 Equation 6 annotation part

The description of “table 11” is a typo and should be corrected to “Table 6” as follows.

TEC_{REQ} is the TEC requirement specified in Table 11, in kWh;
→TEC_{REQ} is the TEC requirement specified in Table 6, in kWh;

Line 483 Table 6

The description “to the nearest 0.01kWh” in Table6 is obscure and should be corrected to “rounded to the nearest 0.01kWh”.

4) 3.4.2 Automatic Duplexing Capability

Since the definition of Professional Imaging Product specifies the product speed as ≥ 86 ipm for monochrome product, ≥ 50 ipm for color product, the requirements in the Table 9 and Table 10 is not appropriate.

Therefore, Table 9 and Table10 should be deleted and the contents of this items should be corrected as follows.

- i. For all Professional Imaging Products, automatic duplexing capability shall be present at the time of purchase. Professional Imaging Products whose intended function is to print on special single-sided media for the purpose of single sided printing (e.g. release coated paper for labels, direct thermal media, etc.,) are exempt from 3.4.2.

5) 3.4.3 Typical Electricity Consumption:

Line 692 Table 11

The description “to the nearest 0.1kWh” in Table 11 is obscure and shall be corrected to “rounded to the nearest 0.1kWh”.

6) 4.1 Test Method

We request the diversion of the registered data in V2.0 without retest for the products that is not influenced by the test method change of V3.0 without retest. Retest for all products is a big burden for manufacturers. And we request you will announce the allowance of data diversion officially. (On the web page, etc.)

And Default delay time to sleep must be measured from the V3.0 test method. But in the V2.0, the nominal values have been submitted as application data from manufacturers. Therefore, we request the acceptance for using the nominal value as application data for V2.0 registered products. Otherwise, manufacturers must retest and retesting will

become a big burden.

All imaging equipment products have to be tested according to the Final Draft of test Method issued on Nov-2018. However, the criteria of V2.0 is applied for professional products and we think the application of V3.0 test method may cause some discrepancies.

Therefore, we propose to use the V2.0 test method for Professional products.

Refer to following table.

Table 15: Test Methods for ENERGY STAR Certification

Product Type	Test Method
Non Professional Products	ENERGY STAR Imaging Equipment Test Method, Rev.Nov-2018
Professional Products	ENERGY STAR Imaging Equipment Test Method, Rev.Sep-2014

7) Others

Laboratory Accreditation (ISO/IEC17025 or MTL)

EPA to make a clear announcement that the laboratories who are accredited under V2.0 is considered to be competent to perform the ENERGY STAR test to V3.0 without an extension surveillance, based on the note in “Conditions and Criteria for Recognition of Laboratories for the ENERGY STAR® Program” that “to decrease the burden to laboratories and accreditation bodies, EPA will not require laboratories to update their Scopes of Accreditation when an ENERGY STAR specification is revised.”.

Conditions and Criteria for Recognition of Laboratories for the ENERGY STAR® Program

https://www.energystar.gov/ia/partners/downloads/mou/Criteria_Laboratories.pdf?8b36-31d6

The clear announcement by EPA would help to avoid a confusion in the necessity of an extension surveillance which would be different by each AB or CB and in the distributions of the products certified under V3.0.

Schedule

Please give us following information.

- The official issue date of the V3.0
- The application start date of products under V3.0

- The application end date of products under V2.0

Future revision process

- Is the revision plan of V3.1 vanished away or not?

- Does the V4.0 mean the publication of the criteria and test method for Professional Imaging Products, or it includes the revision of criteria for Non-Professional Imaging Product.

End

2. Test Method for Determining Imaging Equipment Energy Use Final Draft, Rev. Nov-2018

1) 7.2 Measurement Procedure

Line 295 Table 8 Step 5, Sleep

Line 300 Table 9 Step 5, Sleep

Though “time over 1 hour” is described in the Action section, but the description in the Record section is $t_{\text{SLEEP}} (\leq 1 \text{ hr})$. This is a typo and should be corrected as follows.

$$t_{\text{SLEEP}} (\leq 1 \text{ hr}) \rightarrow t_{\text{SLEEP}} (\geq 1 \text{ hr})$$

Line 295 Table 8 Step 3, Active0 time

Line 300 Table 9 Step 5, Active0 time

There is a case that the Active0 time becomes longer than the Active1 time (in this case, the Recovery time becomes a negative value).

The reason is considered that the time for the initial installation (loading to cash memory) of the application software is added in the time measurement of the Active0 time.

To avoid the uncertainty, a method should be specified such as adding dummy printing.

Add the following note below Table 8 and Table 9:

“Step 2: In order to obtain a stable Ready State, printing one output image may be performed if necessary.”

End