IPP Everywhere Self-Certification Manual 1.0

Status: Interim

Abstract: This document defines IPP Everywhere self-certification test procedures and the process required for registering the test results in order to use the "IPP Everywhere Certified" logo. It also includes a license agreement for the use of the IPP Everywhere logo.

This document is a PWG Technical Brief. For a definition of a "PWG Technical Brief", see: ftp://ftp.pwg.org/pub/pwg/general/pwg-process30.pdf

This document is available electronically at:

ftp://ftp.pwg.org/pub/pwg/ipp/whitepaper/tb-ippeveselfcert10-20130402.docx

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Title: *IPP Everywhere Self-Certification Manual*

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**About the IEEE-ISTO PWG**

The Printer Working Group (or PWG) is a Program of the IEEE Industry Standards and Technology Organization (ISTO) with member organizations including printer manufacturers, print server developers, operating system providers, network operating systems providers, network connectivity vendors, and print management application developers. The group is chartered to make printers and the applications and operating systems supporting them work together better. All references to the PWG in this document implicitly mean “The Printer Working Group, a Program of the IEEE ISTO.” In order to meet this objective, the PWG will document the results of their work as open standards that define print related protocols, interfaces, procedures and conventions. Printer manufacturers and vendors of printer related software will benefit from the interoperability provided by voluntary conformance to these standards.

In general, a PWG standard is a specification that is stable, well understood, and is technically competent, has multiple, independent and interoperable implementations with substantial operational experience, and enjoys significant public support.

For additional information regarding the Printer Working Group visit:

http://www.pwg.org

Contact information:

The Printer Working Group

c/o The IEEE Industry Standards and Technology Organization

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**About the Internet Printing Protocol Work Group**

The Internet Printing Protocol (IPP) working group has developed a modern, full-featured network printing protocol, which is now the industry standard. IPP allows a print client to query a printer for its supported capabilities, features, and parameters to allow the selection of an appropriate printer for each print job. IPP also provides job information prior to, during, and at the end of job processing.

For additional information regarding IPP visit:

http://www.pwg.org/ipp/

Implementers of this specification are encouraged to join the IPP mailing list in order to participate in any discussions of the specification. Suggested additions, changes, or clarification to this specification, should be sent to the IPP mailing list for consideration.

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1. Introduction

The Internet Printing Protocol supports all kinds of printing from low-end consumer through multi-room production printers. The IPP Everywhere project developed a new baseline specification [PWG5100.14] that enables printing from arbitrary clients using vendor-neutral driver software. In order to allow vendors to market their conformance to the new specification and consumers to easily determine which printers are compatible with their clients, the Printer Working Group has developed this technical brief which defines a series of self-certification tests that must be performed successfully in order to use the IPP Everywhere Certified logo. IPP Everywhere self-certification is open to all vendors and individuals regardless of membership status in the Printer Working Group.

* 1. Reporting Problems

Description of where to go to report problems in this document and/or in the test tools. Also contact information for reporting misuse. "ipp-everywhere@lists.pwg.org" for discussion/questions?

1. Terminology
   1. Conformance Terminology

Capitalized terms, such as MUST, MUST NOT, RECOMMENDED, REQUIRED, SHOULD, SHOULD NOT, MAY, and OPTIONAL, have special meaning relating to conformance as defined in Key words for use in RFCs to Indicate Requirement Levels [RFC2119]. The term CONDITIONALLY REQUIRED is additionally defined for a conformance requirement that applies to a particular capability or feature.

* 1. Other Terminology

*Capitalized Term In Italics*: defininition of the term with any references as appropriate.

* 1. Acronyms and Organizations

*IANA*: Internet Assigned Numbers Authority, http://www.iana.org/

*IETF*: Internet Engineering Task Force, http://www.ietf.org/

*ISO*: International Organization for Standardization, http://www.iso.org/

*PWG*: Printer Working Group, http://www.pwg.org/

1. Requirements
   1. Rationale for Title of Document

Provide a rationale for the document.

* 1. Use Cases

Provide use cases for the document in subsections using the casual use case format.

* 1. Out of Scope

The following are considered out of scope for this specification:

1. Definition of foo
2. Protocols for bar
3. Requirements for bla
   1. Test Requirements

The test requirements for this specification are:

1. Confirm minimum conformance and interoperability of Printer for Bonjour discovery
2. Confirm minimum conformance and interoperability of Printer for WS-Discovery discovery
3. Confirm minimum conformance and interoperability of Printer for HTTP
4. Confirm minimum conformance and interoperability of Printer for IPP
5. Confirm minimum conformance and interoperability of Printer for PWG Raster Format and JPEG document data
6. If supported, confirm minimum conformance and interoperability of Printer for OpenXPS and PDF document data

The test recommendations for this specification are:

1. Provide comprehensive document data for print testing

1. Bonjour Test Procedure
   1. Test Description and Checklist

Description of all of the tests that are run

* 1. Setup and System Requirements

Where to download test tool

System requirements for running test tool

* 1. Running Test Tool

Instructions for running test tool.

* 1. Interpreting Results

Description of the output of the test tool.

1. WS-Discovery Test Procedure
   1. Test Description and Checklist

Description of all of the tests that will be run.

* 1. Setup and System Requirements

Where to download test tool

wsddebug\_client.exe for WS-Discovery development (search for "ws-discovery testing")

System requirements for running test tool

* 1. Running Test Tool

Instructions for running test tool

* 1. Interpreting Results

Description of the output of the test tool

1. IPP Test Procedure
   1. Test Description and Checklist

Description of all of the tests that will be run

* 1. Setup and System Requirements

Where to download test tool

System requirements for running test tool

* 1. Running Test Tool

Instructions for running test tool

* 1. Interpreting Results

Description of the output of the test tool

1. Document Data Test Procedure
   1. Test Description and Checklist

Description of all of the tests that will be run

Required formats: PWG Raster Format and JPEG

Optional formats: OpenXPS and PDF

Job template attributes: copies, finishings, media/media-col, ipp-attribute-fidelity, output-bin, page-ranges, print-color-mode, print-quality, printer-resolution, sides

* 1. Setup and System Requirements

Where to download test tool

System requirements for running test tool

* 1. Running Test Tool

Instructions for running test tool

* 1. Interpreting Results

Description of the output of the test tool

1. Submission of Test Report and License Agreement

Instructions for submitting the test report (results of all tests) to the ISTO/PWG through www.pwg.org web page. License agreement needs to be mailed, faxed, or scanned and emailed with signatures to PWG officers, perhaps a role account @pwg.org?

Web-based submission will examine test results to check for errors or issues, stored in database for display on pwg.org (make, model, date of self-certification, firmware version, type of certification)

1. References
   1. Normative References

[RFC2119] S. Bradner, "Key words for use in RFCs to Indicate Requirement Levels", RFC 2119/BCP 14, March 1997, http://www.ietf.org/rfc/rfc2119.txt

[PWG5100.14] M. Sweet, I. McDonald, "IPP Everywhere", PWG 5100.14-2013, January 2013, ftp://ftp.pwg.org/pub/pwg/candidates/cs-ippeve10-20130128-5100.14.pdf

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The authors would also like to thank the following individuals for their contributions to this standard:

Daniel Manchala - Xerox

Ira McDonald - High North

Glen Petrie - Epson

William Wagner - TIC

1. Release History

This section will contain a list of high-level changes for quarterly? releases of the technical brief.

1. IPP Everywhere Logo License Agreement

*Once an entity passes the required conformance tests in the IPP Everywhere Self-Certification Manual (the "Manual"), that entity and its tested product/component will be considered “certified” in accordance with the PWG Candidate Standard 5100.14: IPP Everywhere. Entities with certified product(s) shall receive from the IEEE Standards and Technology Organization - Printer Working Group ("ISTO-PWG") the original electronic source files of the IPP Everywhere self-certification mark (the "Logo"). Certified entities should strictly use only those files provided; variants of the Logo may not be used in any way and will be considered a violation to this agreement.*

* 1. Logo Placement and Minimum Space

The Logo should be allowed enough space between itself and surrounding elements to maintain its prominence and impact on the page. White space around the Logo draws the eye first to the Logo, and then to the attached message, thereby fortifying the Logo. With the exception of template items such as letterhead, envelopes, press releases, and business cards, there are no strict measurements for the space around the Logo. Space will vary depending on size of the area in which the Logo is placed, as well as on the amount of additional information adjoining the Logo.

While the amount of space surrounding the Logo varies, additional type or temporary taglines MUST NOT be directly attached or integrated into the Logo.

* 1. Logo Usage

The Logo may be posted on a test vendor’s website, marketing collateral, and documentation pertaining to the product/component certified, and must reference that the product/component is certified against the test suite reported in the official Self-Certification Test Report (SCTR) publicly posted on the ISTO-PWG’s website. The ISTO-PWG deems a product/component self-certified which has passed the test defined in the Manual. The Logo is for use exclusively and solely by the signed party in this Agreement who is considered by the ISTO-PWG to be a certified product vendor.

The Logo is provided in two forms: a black version for use on light backgrounds and a white version for use on dark backgrounds. The version of Logo used MUST provide sufficient contrast with the background to be legible under normal office lighting conditions.

The ISTO-PWG is the sole and exclusive owner of all rights, title and interest in and to the Logo together with the goodwill related thereto, and retains all right to control the appearance and manner of use of the Logo. In the event the Party listed here fails to comply with the above standards, that party agrees to immediately, upon notice from the ISTO-PWG, remedy its usage or discontinue use of the Logo until such time as it can comply. Party agrees not take any action that could be detrimental or bring disrepute to the Logo and/ or to the ISTO-PWG and its rights referenced herein.

By (Signature): \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Date: \_\_\_\_\_\_\_\_\_

Name (Printed): \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_ Company: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

1. Change History
   1. April 2, 2013
2. Added comments from workgroup review on March 11, 2013
3. Added new test section for document data/print testing
4. Added new license agreement section
   1. March 11, 2013

Initial revision.