Application of New Specifications and Approval of Trade Measurement Devices that Incorporate Technologies not Covered by the Existing Specifications

1.0 Purpose

The purpose of this bulletin is to establish the policy for the enforcement of new specifications developed under the authority of the *Weights and Measures Act* or the *Electricity and Gas Inspection Act*, as well as the policy for approval and inspection of trade measurement devices that incorporate technologies not covered by the existing specifications enforced by Measurement Canada.

2.0 Scope

This bulletin applies to specifications and requirements developed to address devices and components under the *Weights and Measures Act*, and meters under the *Electricity and Gas Inspection Act*. For reasons of simplicity, they are referred to in this document as trade measurement devices.

3.0 Effective Date of Specifications

3.1 Specifications developed under the authority of the *Weights and Measures Act* are effective after they have been published in the *Canada Gazette*. Unless otherwise specified, the effective date for enforcement of a new specification will coincide with the publication date in the *Canada Gazette*.

3.2 Unless otherwise specified, specifications developed under the authority of the *Electricity and Gas Inspection Act* are effective after they have been authorized by the President of Measurement Canada.

3.3 Once specifications become effective, accredited organizations shall, where applicable, revise their quality assurance documentation to meet the requirements of the new specifications.

3.4 Notwithstanding sections 3.1 and 3.2, trade measurement devices incorporating technologies not covered by the existing specifications may be conditionally approved and inspected against terms and conditions or provisional specifications, as may be applicable, defined in section 6.0 of this document and listed in the appendix.
4.0 Application of New Specifications for the purpose of Approval and Inspection

4.1 Trade Measurement Devices Approved on or after the Effective Date of New Specifications

Unless otherwise specified, trade measuring devices approved on or after the effective date of the new specifications will be evaluated against those specifications in their entirety. Trade measuring devices submitted for approval before the effective date of the specifications, but evaluated and/or approved after that date will also be evaluated against the new specifications in their entirety.

4.2 Trade Measurement Devices Approved before the Effective Date of New Specifications but Initially Inspected or Verified after that Date

Unless otherwise specified, trade measurement devices approved before the effective date of the specifications but initially inspected or verified after that date, are not required to meet the technical (e.g. design, composition and construction) requirements or the administrative (e.g. marking) requirements of the new specifications. In those cases, the devices will continue to be evaluated against the technical and administrative requirements that were in force when the devices were approved. However, the metrological (e.g. limits of error/tolerance) and the installation and use requirements prescribed by the new specifications are applicable.

4.3 Trade Measurement Devices Approved and Initially Inspected or Verified Prior to the Effective Date of New Specifications

Unless otherwise specified, trade measurement devices that have been approved and initially inspected or verified prior to the effective date of the specifications, are not required to meet the technical (e.g. design, composition and construction) requirements or the administrative (e.g. marking) requirements of the new specifications. However, the metrological (e.g. limits of error/tolerance) and the installation and use requirements prescribed by the new specifications are applicable. In cases where such devices are moved and reinstalled after the new specifications’ effective date, the new installation requirements are applicable.

4.4 Trade Measurement Devices that are Modified and Resubmitted to the Approval and Calibration Services Laboratory for Evaluation after the Effective Date of New Specifications

Trade measurement devices that are modified in a manner that requires them to be resubmitted to the Approvals and Calibration Services Laboratory (ACSL) for a complete or partial evaluation (see Bulletin GEN-26) will be evaluated against all of the metrological, technical and administrative requirements prescribed by the specifications before a new or revised Notice of Approval can be issued.

5.0 Special Considerations

There may be circumstances where the requirements of a new specification will have to be applied differently than the manner described in section 4 of this document. In these instances, the specification will include a section which prescribes the manner in which the requirements are to be applied.
6.0 Approval and Inspection of Trade Measurement Devices that incorporate Technologies not covered by the existing Specifications

6.1 Application of Terms and Conditions for the purposes of Approval and Inspection, pursuant to the Weights and Measures Act

6.1.1 In order to approve trade measurement devices that incorporate technologies not covered by the existing specifications, without incurring the lengthy delays which can be associated with the regulatory process, trade measurement devices subject to the Weights and Measures Act may be evaluated against terms and conditions that have been authorized by the President of Measurement Canada. The attached Appendix contains the list of the related terms and conditions, along with their effective dates.

6.1.2 When a new type of trade measurement device is submitted for approval, the Program Development Directorate may, in consultation with the Engineering and Laboratory Services Directorate, the approval applicant and other affected parties, develop terms and conditions applicable to the subject device in order to allow for its approval and inspection. New trade measurement devices shall be examined and tested for compliance against these requirements.

6.1.3 Devices that comply with the authorized terms and conditions shall be temporary approved pursuant to subsection 3(2) of the Weights and Measures Act. The notices of temporary approval are known as Notices of Conditional Approval.

6.1.4 Notices of Conditional Approval will remain in effect until the applicable specification has been formally adopted through the regulatory process.

6.1.5 Notices of Conditional Approval will indicate, directly or by reference, the terms and conditions to which the new device type must conform.

6.1.6 There may be instances where trade measurement devices, which have received initial inspection or verification under a temporary or conditional approval, will require modification to meet the applicable regulations and specifications once formally adopted. This information will be incorporated into the device’s Notice of Conditional Approval.

6.1.7 The Program Development Directorate will inform all interested parties of the application of new requirements or of exemptions for a category or type of device.

6.1.8 Device inspections covered by notices of conditional approval granted in accordance with the terms and conditions specified pursuant to subsection 3(2) of the Weights and Measures Act will be conducted on the basis of the requirements set out in said terms and conditions. The data resulting from these inspections will be used for the purpose of the evaluation of devices pending final approval.

6.2 Application of Provisional Specifications for the Purposes of Approval and Inspection pursuant to the Electricity and Gas Inspection Act

6.2.1 In order to approve trade measurement devices that incorporate technologies not covered by the existing specifications, without incurring the lengthy delays which can be associated with public consultation at the national level, trade measurement devices subject to the Electricity and Gas Inspection Act, may be evaluated against provisional specifications that have been authorized by the President of Measurement Canada. The attached Appendix contains the list of the provisional specifications under which devices can only be granted a Notice of Conditional Approval. The Appendix also lists their effective dates.
6.2.2 When a new type of trade measurement device is submitted for approval, the Program Development Directorate may, in consultation with the Engineering and Laboratory Services Directorate, the approval applicant and other affected parties, develop provisional specifications applicable to the subject device in order to allow for its approval and inspection. New trade measurement devices shall be examined and tested for compliance against these requirements.

6.2.3 Devices that comply with the provisional requirements shall be issued a Notice of Conditional Approval pursuant to subsection 9(4) of the **Electricity and Gas Inspection Act**.

6.2.4 Notices of Conditional Approval will remain in effect until the applicable specification has undergone public consultation with industry participation and been final authorized by Measurement Canada.

6.2.5 Notices of Conditional Approval will indicate, directly or by reference, the provisional specifications to which the new device type must conform.

6.2.6 There may be instances where trade measurement devices, which have received initial inspection or verification under a temporary or conditional approval, will require modification to meet the applicable regulations and final specification once these have undergone public/industry consultation and been authorized by Measurement Canada. This information will be included as part of the trade measurement device’s Notice of Conditional Approval.

6.2.7 Program Development Directorate will inform all interested parties of the application of new requirements or of exemptions for a category or type of device.

7.0 **Revisions**

Effective date of the initial version of this bulletin is 1993-09-01.

7.1 The purpose of revision 1 (2001-07-20) was to:

(a) Expand the scope of the bulletin so that it applies to specifications developed under the **Weights and Measures Act** as well as the **Electricity and Gas Inspection Act**.

(b) Include the policy for the enforcement of new specifications with the policy concerning the enforcement of draft specifications.

(c) Make minor revisions to the text.

7.2 The purpose of revision 2 (2003-07-09) was to:

(a) Include an appendix listing the authorized draft specifications along with their issue dates.

(b) Make minor revisions to the text.

7.3 The purpose of revision 3 (2004-07-16) was to:

(a) Was to add the authorized draft specification in the Appendix titled “Policy on Prepayment Meters, MC Bulletin GEN-30 - Subsection 5.3 - Draft Specifications for Approval of Type”, applicable to the electricity and natural gas sectors.
7.4 The purpose of revision 4 (2004-07-16) was to:

(a) Remove the authorized draft specification in the Appendix titled “Time-of-Use Function, Memorandum from Larry Fraser” dated 1995-03-06. This action is the result of the implementation of the policies on multirate register metering as communicated during Measurement Canada’s consultation on New Directions in the Regulation of Electricity and Gas held in 2003.

(b) Add the authorized draft specification in the Appendix titled "Coriolis Liquid Metering Specifications".

(c) Add the authorized draft specification in the Appendix titled "Draft Provisional Specifications for the Approval of Correction Devices and Linearization Functions Incorporated in Meters and Flow Computers", which was accidentally removed during development of Revision 3.

(d) Make minor revisions to the text of the Appendix.

7.5 The purpose of revision 5 (2005-10-01) was to:

(a) Add the authorized draft specification in the Appendix titled “Draft Provisional Specification for the Approval of Electronic Current Transformers”.

(b) Place a moratorium on the application of draft authorized specifications for event loggers for gas meters (titled: Proposed Approval Amendments for Electronic Metering Devices, Event logger section only) until further notice.

7.6 The purpose of revision 6 (2005-11-02) was to:

(a) Add the draft Specifications related to Pressure Transducers.

(b) Add the draft Specifications related to Electronic Automatic Pressure Compensators (APC) Incorporated into Electronic Registers.

(c) Reverse the order in which revisions are listed.

7.7 The purpose of revision 7 (2006-06-01) was to:

(a) Make reference to Terms and Conditions or Provisional Specifications instead of Draft Specifications.

(b) Change the authorization reference to "President of Measurement Canada" from "Vice-President of Program Development Directorate", in section 6.0.

(c) Update the appendix.

(d) Renumber sections, make minor revisions to the title, the text and the reference documents.

7.8 The purpose of revision 8 (2006-07-01) was to:

(a) State the policy relating to the inspections of devices conditionally approved according to terms and conditions established pursuant to subsection 3(2) of the Weights and Measures Act.
7.9 The purpose of revision 9 (2007-07-05) was to:

(a) Add the Provisional Specifications for the Approval of Electronic Current Transformers, PS-E-13 (rev.1).

(b) Add the Provisional Specifications for the Verification, Reverification, Installation and Use of NXCT® Electronic Current Transformer, PS-E-14.

(c) Add the Provisional Specifications for Approval of Electronic Voltage Transformers, PS-E-15.

(d) Add the Provisional Specifications for the Verification, Reverification, Installation and Use of NXVT® Electronic Voltage Transformer, PS-E-16.

7.10 The purpose of revision 10 (2008-09-01) was to:

(a) Simplify requirements regarding the application of new specifications and approval of trade measurement devices that incorporate technologies not covered by the existing specifications.

(b) Remove from the appendix, the *Terms and Conditions for the Approval of On-board Weighing Systems*, revoked on August 6, 2008, following the registration of the *Order Amending the Specifications Relating to Non-automatic Weighing Devices (1998)* (SI/2008-81) which incorporates requirements related to On-board Weighing Systems.

7.11 The purpose of this revision is to:

Add PS-G-16 - Provisional Specifications for the Approval, Verification, Reverification, Installation and Use of Conditioning Orifice Plates.

8.0 Additional Information

For additional information regarding this bulletin, please contact the appropriate regional specialist. For more information regarding Measurement Canada and its programs, visit our Web site located at http://mc.ic.gc.ca/.

Alan E. Johnston
President
Appendix

**Authorized Terms and Conditions & Provisional Specifications**

<table>
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<th>Terms and Conditions / Provisional Specifications</th>
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