Content

Title：	Directions Governing Type Approval of Water Meters Ch
Date：	2023.09.13
Legislative：	1.10 clauses enacted and promulgated by the Bureau of Standards, Metrology and Inspection, Ministry of Economics Affairs on January 5, 2004 and effected om promulgated date. 2.Claus 2 amended and promulgated by the Bureau of Standards, Metrology and Inspection, Ministry of Economics Affairs on May 12, 2009. 3.Revised and promulgated by Ministerial Order Bo. 10140005240 on October 9, 2012 4.Revised and promulgated by Ministerial Order Bo. 11240005600 on September 13, 2023
Content：	1. These Directions are established for the conduction of type approval/series type approval of water meters and other relevant activities. 2. To apply for type approval, series type approval or approbation, the applicant shall submit the following technical documents and testing samples: (1)Sample structure scale drawings, 3-D decomposed system drawings (known as explosion drawing) and a list of major parts (not required for applications for series type approval or approbation if testing is not required); (2)One copy each of circuit board appearance photo, circuit diagram, and detailed electronic function operation handbook in Chinese for applications for type approval of electronic water meters (not required for applications for series type approval or approbation); (3)A diagram of seal location and a list of seal types (not required for applications for series type approval or approbation); (4)One copy of shell material test report (not required for applications for series type approval or approbation, if the materials have not been changed); (5)3 testing samples (not required for applications for series type approval or approbation if testing is not required); (6)The original type approval certificate (not required for type approval applications); (7)Description of any differences resulted from changes intended to be made (not required for type approval applications); (8)The declaration doument; and (9)If the water meter applying for type approval uses the same circuit components and submits the documents of passed electronic performance tests, the relevant test will be exempted. 3. To apply for type approval, series type approval or approbation, the applicant shall submit the following appearance photographs that fulfill following requirements: (1)A total of six photographs, illustrating the front, back, left, right, upper and lower of the instrument; the appearance photos of calculator; and (2)The appearanee photos shall be image of the instrument shall occupy at least 4/5 of the photograph area and the wording and marking on the sample shall be shown clearly. The appearance photos shall be attached to A4 paper and made it available in four binding copies; the photographs shall not be smaller than 12.7 ×8.8 cm^2 or a electronic file shall be provided. 4. An applicant for type approval may attend the conduction of relevant performance tests at the performance test laboratories after the appearance, structure, material test reports, and relevant technical documents has been reviewed. 5.Under any of the following circumstances, there is no need for applying for series type approval or approbation for type-approved water meters: (1)Change of colors; (2)Change of painting and coating;

(3)Change of printing methods;
(4)Change of screening devices.
(5)Change of the size or type of the window of the indicator's drums;
(6)Change of the type of the flowing indicator; or
(7)Change with permission granted by the dedicated weights and measures authority.

6. Under any of the following circumstances, application for series type approval or approbation for type-approved water meters shall be filed without the need for testing:
(1)Change of exterior marking, connector method, adjuster, scale or sealing methods;
(2)Change of dial measurement markings, maximum capacity or minimum scale intervals;
(3)Change of dial measurement moving indicators or pointer types;
(4)De-grade the rating of the connecting flange, or
(5)Changes to electronic components other than microcontroller units (MCU)

7. Under any of the following circumstances, application for series type approval or approbation for type-approved water meters may be filed complimace with possed the relevant performance tests:
(1)The conduction of tests on shell materials and static pressure test for change of shell materials;
(2)The conduction of error of measuring instrument tests for all flow points for change of accuracy class;
(3)The conduction of pressure loss and error of measuring instrument tests for all flow points for change of pressure loss grade;.
(4)The conduction of tests on pressure-resist tests for up-grade the rating of the connecting flange;
(5)The conduction of tests on dry heat, cold, damp heat cyclic, electrostatic discharge, radiated electromagnetic fields, conducted electromagnetic fields and static magnetic fields for change of circuit boards or circuit diagrams and electronic functions;
(6)The conduction of tests on power supply variation, voltage variation, burst and surge for change of the power supply;
(7)The conduction of tests on reverse flow test and pressure loss test, if the prevent reverse flow device is added or changed; or
(8)The conduction of tests on error of each flow point for change the ratio of Q_3/Q_1.
Under the circumstances of the changes of circuit boards or circuit diagrams set forth in subparagraph 5 of the preceding paragraph, the dedicated weights and measures authority may examine the relevant technical documants to reduce or eliminate relevant test items.

8. Under any of the following circumstances, application for type re-approval shall be re-filed for type-approved water meters:
(1)Change of flow range;
(2)Change of measuring methods;
(3)Change of major interior parts; or
(4)Change of the shell other than the one being type approved.

9. For type-approved water meters, in the event of any changes made other than those listed in preceding 3 articles, the dedicated weights and measures authority may examine the relevant technical documents to determine the items needed to be tested.

10. To apply for extension of the validity period of a type approval certificate, the original applicant for type approval or the successor shall submit the following documents:
(1)Technical documents and testing samples of the instruments in question and the declaration document as listed in Article 2;
(2)Appearance photographs of the instruments in question as listed in Article 3.

Data Source：Ministry of Economic Affairs R.O.C.(Taiwan) Laws and Regulations Retrieving System