

**Regulation of the Central Bureau of Weights and Measures
Regarding Rules, Procedures and Conditions in relation to Inspection and Verification of
Length Measurer by Licensee Acting as Inspector and Providing Verification of
Length Measurer Being Manufactured by Licensee
B.E. 2562 (2019)**

Whereas the Central Bureau of Weights and Measures already issued the Regulation of the Central Bureau of Weights and Measures Regarding Rules, Procedures and Conditions in relation to Inspection and Verification of Length Measurer by Licensee Acting as Inspector and Providing Verification of Length Measurer B.E. 2550 (2007) dated 14 September B.E. 2550 (2007).

Whereas the Minister of Commerce, at the recommendation of the Committee for Weights and Measures, issued the Notification of the Ministry of Commerce Regarding Prescription of Type and Characteristic of Length Measurer, Detail of Materials Used for Manufacture and Maximum Permissible Error dated 26 September B.E. 2561 (2018), prescribing the type and characteristic of the length measurer to be consistent with the current situation. Therefore, in order that the licensee acting as the inspector and providing the verification of the length measurer can inspect and verify the length measurer accurately in the same way and to be consistent with the aforesaid Notification, by virtue of Section 6 (5) and Section 42 of the Measurement Act, B.E. 2542 (1999), the Director-General of the Department of Internal Trade therefore issues this Regulation, as follows.

Article 1. This Regulation is called the “Regulation of the Central Bureau of Weights and Measures Regarding Rules, Procedures and Conditions in relation to Inspection and Verification of Length Measurer by Licensee Acting as Inspector and Providing Verification of Length Measurer Being Manufactured by Licensee B.E. 2562 (2019)”

Article 2. This Regulation shall come into force as from the day following the date of its publication in the Government Gazette.¹

¹ Published in the Government Gazette, Volume 136, Special Part 260 d, Page 2, dated 21 October B.E. 2562 (2019).

Article 3. The Regulation of the Central Bureau of Weights and Measures Regarding Rules, Procedures and Conditions in relation to Inspection and Verification of Length Measurer by Licensee Acting as Inspector and Providing Verification of Length Measurer B.E. 2550 (2007) dated 14 September B.E. 2550 (2007) shall be repealed.

Article 4. In this Regulation,

“Length Measurer” means an automatic rolling metal tape length measurer, a straight line length measurer, a tape length measurer made of fiberglass, and a metal tape length measurer.

Article 5. The Director-General of the Department of Internal Trade shall have charge and control of the execution of this Regulation.

Chapter 1

Inspection of Characteristics of Length Measurer, Scale Mark and Scale Interval

Article 6. In inspecting the characteristic of the length measurer, the licensee shall carry out the inspection of an identification mark, a name or a trademark of a manufacturer, a model which is specified the form of an instrument, a series number of an instrument, capacity, the scale mark, the scale interval, the permissible scale mark. The inspection of every measurer is required. If the inspection of the characteristic has not been carried out completely, the licensee is prohibited from proceeding with the inspection in the next step.

In the case where the length measurer displays both metric scale and scale of other systems, there shall be a text “it is used to measure trading with the metric scale only”.

Article 7. The inspection of the characteristics of the length measurer as regards the scale mark, the scale interval and the resistance to tension shall be carried out by using the method of a sampling as follows.

(1) As for the tape length measurer made of fiberglass, it is required to take a sampling of 5 measurers per 10,000 measurers of every capacity collectively for inspection. In the case where the number of the aforesaid length measurer for inspection is less than 10,000 ones, it shall be deemed that there are 10,000 ones.

(2) As for the automatic rolling metal tape length measurer, the straight line length measurer or the metal tape length measurer, it is required to take a sampling of 5 measurers per 10,000 measurers of each capacity of each type for inspection. In the case where the number of the aforesaid length measurer in each capacity for inspection is less than 10,000 ones, it shall be deemed that there are 10,000 ones.

Article 8. In inspecting the width of the scale mark, the inspection of the length measurers deriving from the sampling under Article 7 (1) or Article 7 (2), as the case may be, shall be carried out by measuring the width of the scale mark at a particular position. The width of the scale mark shall not be wider than the half of the smallest scale interval and greater than 0.75 millimeter. If the scale interval is wider than 2 centimeters, the width of scale mark shall not be greater than 2 millimeters. This shall be deemed to pass the inspection.

In inspecting the width of the scale mark under paragraph one, if anyone of the length measurers does not pass the inspection, the inspection of the width of the scale mark of every one of the length measurers is then required to be carried out.

Article 9. In inspecting the width of the scale interval, the inspection of the length measurers deriving from the sampling under Article 7 (1) or Article 7 (2), as the case may be, shall be carried out by measuring the width of the scale interval at a particular position by taking anyone of the following actions:

- (1) to measure the width between the right edges of adjacent scale marks,
- (2) to measure the width between the middle of adjacent scale marks,
- (3) to measure the width between the left edges of adjacent scale marks.

In inspecting the width of the scale interval under paragraph one, the width of the scale interval which has been measured must not exceed the following specified maximum permissible errors, it shall be deemed to pass the inspection.

(1) The maximum permissible errors of the scale intervals for the automatic rolling metal tape length measurer, the straight line length measurer and the metal tape length measurer shall have both positive and negative sides according to the following table.

Scale Intervals	Maximum Permissible Errors
not Exceeding 1 Millimeter	0.2 Millimeter
Greater than 1 Millimeter not Exceeding 1 Centimeter	0.4 Millimeter
Greater than 1 Centimeter	0.5 Millimeter

(2) The maximum permissible errors of the scale intervals for the tape length measurer made of fiberglass shall have both positive and negative sides according to the following table.

Scale Intervals	Maximum Permissible Errors
not Exceeding 1 Millimeter	0.3 Millimeter
Greater than 1 Millimeter not Exceeding 1 Centimeter	0.6 Millimeter
Greater than 1 Centimeter	1.0 Millimeter

If anyone of the length measurers does not pass the inspection, the inspection of the width of the scale interval of every one of the length measurers is then required to be carried out.

Article 10. In inspecting the width of the two adjacent scale intervals, the inspection of the length measurers deriving from the sampling under Article 7 (1) or Article 7 (2), as the case may be, shall be carried out by measuring the width of the two adjacent scale intervals at a particular position by taking anyone of the following actions:

(1) to measure the width between the right edges of adjacent scale marks in the number of two adjacent scale intervals,

(2) to measure the width between the middle of the scale mark of adjacent scale marks in the number of two adjacent scale intervals,

(3) to measure the width between the left edges of adjacent scale marks in the number of two adjacent scale intervals.

In inspecting the width of the two adjacent scale intervals under paragraph one, the width of the two adjacent scale intervals which has been measured must be different not exceeding the following specified maximum permissible errors, it shall be deemed to pass the inspection.

(1) The maximum permissible errors of the two adjacent scale intervals for the automatic rolling metal tape length measurer, the straight line length measurer and the metal tape length measurer shall have both positive and negative sides under paragraph two (1) of Article 9.

(2) The maximum permissible errors of the two adjacent scale intervals for the tape length measurer made of fiberglass shall have both positive and negative sides under paragraph two (2) of Article 9.

If anyone of the length measurers does not pass the inspection, the inspection of the width of the two adjacent scale intervals of every one of the length measurers under Article 7 is then required to be carried out.

Article 11. In inspecting the width of the scale interval under Article 9 and Article 10, the inspection of every distance of length of the length measurers shall be carried out as follows:

- (1) the distance from 0 to 50 centimeters,
- (2) the distance from 50 centimeters to 100 centimeters,
- (3) the distance from 50 centimeters before arriving at the half of capacity,
- (4) the distance from 50 centimeters before arriving at the capacity.

Chapter 2

Inspection of Accuracy of Length Measurer

Article 12. The inspection of the distance between the two non-adjacent scale marks and the distance from the zero scale mark to the highest scale mark shall be carried out by using the method of a sampling under Article 7, *mutatis mutandis*.

The inspection of the length measurers deriving from the sampling under paragraph one shall be carried out by measuring the distance of the length measurer from the zero scale mark up to the position of 30 % of the capacity, from the zero scale mark up to the position of 70 % of the capacity, and from the zero scale mark up to the position of the capacity. In the case where the distance which has been measured is a fraction of a whole number, it is required to be rounded up to the nearest whole number of the unit of meter.

The accuracy of the length measurer which has been inspected as compared to the standard model must have deviation not exceeding the following specified maximum permissible errors, it shall be deemed to pass the inspection.

(1) The maximum permissible errors of the inspection of the distance between the two non-adjacent scale marks and the distance from the zero scale mark to the highest scale mark for the automatic rolling metal tape length measurer, the straight line length measurer and the metal tape length measurer shall have both positive and negative sides not exceeding the value resulting from the calculation under the formula $0.3 + 0.2 L$ millimeter, whereby L is the value of the length between the scale marks by being the value of a whole number of the unit of meter; in case of a fraction of a whole number, to be rounded up to the nearest whole number.

(2) The maximum permissible errors of the inspection of the distance between the two non-adjacent scale marks and the distance from the zero scale mark to the highest scale mark for the tape length measurer made of fiberglass shall have both positive and

negative sides not exceeding the value resulting from the calculation under the formula $0.6 + 0.4 L$ millimeter, whereby L is the value of the length between the scale marks by being the value of a whole number of the unit of meter; in case of a fraction of a whole number, to be rounded up to the nearest whole number.

If anyone of the length measurers does not pass the inspection, the inspection of the distance between the two non-adjacent scale marks and the distance from the zero scale mark to the highest scale mark of every one of the length measurers is then required to be carried out.

Article 13. In inspecting the distance from the zero scale mark to the highest scale mark, the inspection of every one of the length measurers shall be carried out by measuring the distance from the zero scale mark to the highest scale mark.

The accuracy of the length measurer which has been inspected as compared to the standard must have deviation not exceeding the maximum permissible errors under paragraph three (1) of Article 12 or paragraph three (2) of Article 12. This shall be deemed to pass the inspection.

Chapter 3

Providing of Verification

Article 14. The length measurer which passes the inspection of the characteristic, scale marks and scale interval of the length measurer under Chapter 1 and the inspection of the accuracy of the length measurer under Chapter 2 shall be stamped a verification mark on the measurer in the edge position beginning zero of the length measurer. In addition, there shall be the issuance of a document indicating the providing of the verification of a measurement gauge according to Form ChorVor.3002 as attached to the Notification of the Central Bureau of Weights and Measures Regarding Prescription of Form of Document Indicating Providing of Verification B.E. 2559 (2016) dated 8 September B.E. 2559 (2016). In case of using a document indicating the providing of the verification of the measurement gauge according to Form ChorVor.3004 as attached to the Notification of the Central Bureau of Weights and Measures Regarding Prescription of Form of Document Indicating Providing of Verification B.E. 2559 (2016) dated 8 September B.E. 2559 (2016), it is required to arrange a series number from minimum to maximum in the same manner as a series number of the measurement gauge.

Article 15. Anyone of the length measurers which does not pass the inspection shall be destroyed and no longer used. And such destruction shall be reported to the Central Bureau or the branch bureau.

Article 16. The licensee acting as the inspector and providing the verification shall present the report on the outcome of inspection and verification of the length measurer in accordance with Form ChorVor.TorRor.4206 as attached to this Regulation. In addition, it is required to present the report on the outcome of the performance of the licensee acting as the inspector and providing the verification of the measurement gauge to the Central Bureau or the branch bureau.

Given on the 4th Day of September B.E. 2562 (2019)

Whichai Phochanakij

Director-General of the Department of Internal Trade