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Industrial valves - Mounting kits for part-turn valve actuator attachment (ISO 5640:2024)

EESTI STANDARDI EESSÕNA

NATIONAL FOREWORD

<p>See Eesti standard EVS-EN ISO 5640:2024 sisaldab Euroopa standardi EN ISO 5640:2024 ingliskeelset teksti.</p> <p>Standard on jõustunud sellekohase teate avaldamisega EVS Teatajas.</p> <p>Euroopa standardimisorganisatsioonid on teinud Euroopa standardi rahvuslikele liikmetele kättesaadavaks 20.11.2024.</p> <p>Standard on kättesaadav Eesti Standardimis- ja Akrediteerimiskeskusest.</p>	<p>This Estonian standard EVS-EN ISO 5640:2024 consists of the English text of the European standard EN ISO 5640:2024.</p> <p>This standard has been endorsed with a notification published in the official bulletin of the Estonian Centre for Standardisation and Accreditation.</p> <p>Date of Availability of the European standard is 20.11.2024.</p> <p>The standard is available from the Estonian Centre for Standardisation and Accreditation.</p>
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ICS 23.060.01

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EUROPEAN STANDARD

EN ISO 5640

NORME EUROPÉENNE

EUROPÄISCHE NORM

November 2024

ICS 23.060.01

Supersedes EN 15081:2007

English Version

Industrial valves - Mounting kits for part-turn valve actuator attachment (ISO 5640:2024)

Robinetterie industrielle - Kits de montage de raccordement des actionneurs à fraction de tour (ISO 5640:2024)

Industriearmaturen - Montagesätze für Anschlüsse von Schwenkantrieben an Armaturen (ISO 5640:2024)

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EUROPEAN COMMITTEE FOR STANDARDIZATION
COMITÉ EUROPÉEN DE NORMALISATION
EUROPÄISCHES KOMITEE FÜR NORMUNG

CEN-CENELEC Management Centre: Rue de la Science 23, B-1040 Brussels

European foreword

The text of ISO 5640:2024 has been prepared by Technical Committee ISO/TC 153 "Valves" of the International Organization for Standardization (ISO) and has been taken over as EN ISO 5640:2024 by Technical Committee CEN/TC 69 "Industrial valves" the secretariat of which is held by AFNOR.

This European Standard shall be given the status of a national standard, either by publication of an identical text or by endorsement, at the latest by May 2025, and conflicting national standards shall be withdrawn at the latest by May 2025.

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Endorsement notice

The text of ISO 5640:2024 has been approved by CEN as EN ISO 5640:2024 without any modification.

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Foreword

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The procedures used to develop this document and those intended for its further maintenance are described in the ISO/IEC Directives, Part 1. In particular, the different approval criteria needed for the different types of ISO documents should be noted. This document was drafted in accordance with the editorial rules of the ISO/IEC Directives, Part 2 (see www.iso.org/directives).

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This document was prepared by Technical Committee ISO/TC 153, *Valves*.

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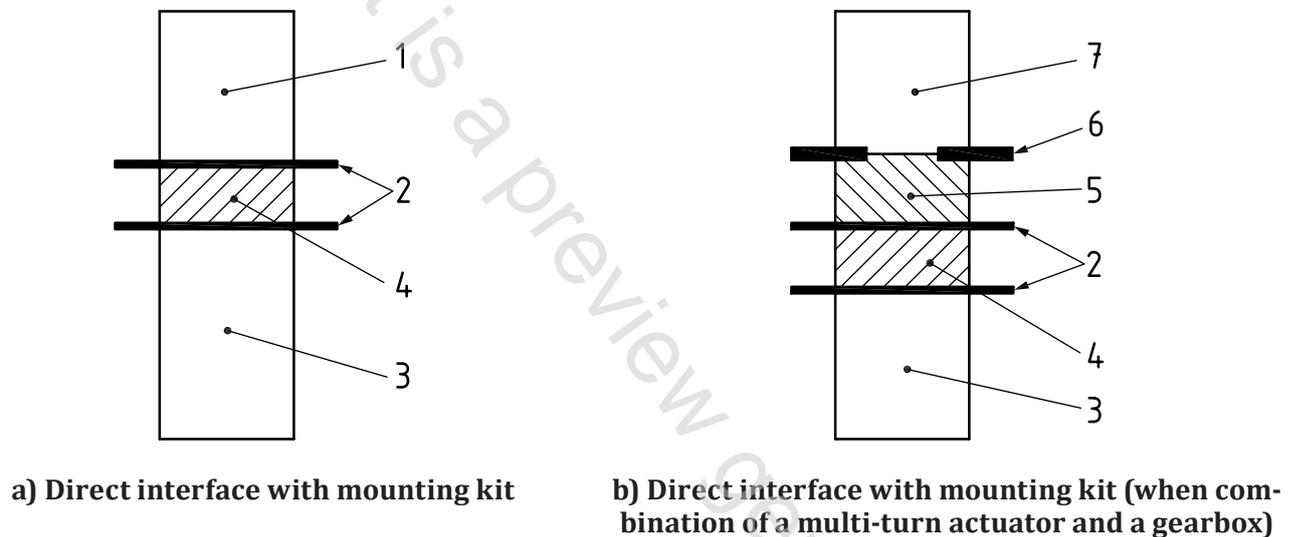
Industrial valves — Mounting kits for part-turn valve actuator attachment

1 Scope

This document provides requirements for metallic mounting kits for part-turn valves and actuator attachments.

It includes all components transmitting torques from actuators to valves with a maximum flange torque up to 16 000 Nm (up to F30 flange type).

It applies to mounting kits for part-turn valves and actuators with integral attachment flanges and drive components as described in ISO 5211 (see [Figure 1](#)), when direct mounting of the actuator on valve is not practical. [Figure 1](#) illustrates the two different types of mounting kits in the scope of this document.



Key

- | | | | |
|---|--------------------------|---|--------------------------|
| 1 | part-turn actuator | 5 | gearbox |
| 2 | interface (see ISO 5211) | 6 | interface (see ISO 5210) |
| 3 | valve | 7 | multi-turn actuator |
| 4 | mounting kit | | |

Figure 1 — Mounting kit between part-turn actuator and valve

Stacking of mounting kits/intermediate supports is not within the scope of this document.

This document specifies methods for design and environmental corrosion protection.

When a reference is made to this document, all the requirements apply, unless otherwise agreed between the purchaser and the manufacturer/supplier, prior to order.

In this document, the term "valve" covers valve or shaft extension top-flange, and the term "actuator" covers part-turn actuator or combination of multi-turn actuator and gearbox.

Control valves are excluded from this document.

2 Normative references

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

ISO 5211, *Industrial valves — Part-turn actuator attachments*

3 Terms and definitions

For the purposes of this document, the following terms and definitions apply.

ISO and IEC maintain terminology databases for use in standardization at the following addresses:

- ISO Online browsing platform: available at <https://www.iso.org/obp>
- IEC Electropedia: available at <https://www.electropedia.org/>

3.1

mounting kit

group of components comprising an *intermediate support* (3.2), bolting and optional *coupling* (3.3)

3.2

intermediate support

mechanical component (bracket, spool, adapter flange) that allows the attachment between a part-turn valve and actuator or gearbox

Note 1 to entry: For electric actuators refer to ISO 22153.

Note 2 to entry: For gearboxes refer to ISO 22109.

3.3

coupling

driven component that allows torque transmission from an actuator or gearbox driving component to the *valve shaft* (3.7)

3.4

coupling clearance

clearance to ensure that there is axial movement between the actuator or gearbox and the *valve shaft* (3.7) to avoid thrust being applied between the driving and driven components

Note 1 to entry: See [Annex A](#).

3.5

part-turn actuator

actuator which transmits torque to the valve for a rotation of one revolution or less and does not have to withstand axial thrust

Note 1 to entry: A part-turn actuator may be a combination of a multi-turn actuator and part-turn gearbox.

3.6

valve top mounting face

feature of the valve body or an additional component which is part of the valve and which allows the attachment of actuating devices or *intermediate support* (3.2)

Note 1 to entry: For details on the valve top mounting face refer to ISO 5211.

3.7

valve shaft

valve stem

part of the valve transmitting the driving torque to the obturator