DIN EN ISO 16610-45:2025-09 (E)

Geometrical product specifications (GPS) - Filtration - Part 45: Morphological profile filters: Segmentation (ISO 16610-45:2025)

Contents

Page

Foreword ... **iv**

Introduction ... **v**

1 Scope ... **1**

2 Normative references ... **1**

3 Terms and definitions ... **1**
3.1 Terms related to geometrical features ... 1
3.2 Terms related to segmentation ... 3
3.3 Terms related to pruning ... 6
3.4 Terms related to the motif method ... 9

4 Segmentation details ... **10**
4.1 General ... 10
4.2 Basic segmentation ... 10
4.3 Watershed segmentation using Wolf pruning ... 11
4.3.1 General ... 11
4.3.2 Calculation method for watershed segmentation using Wolf pruning ... 11
4.4 Crossing-the-line segmentation ... 12
4.4.1 General ... 12
4.4.2 Calculation method for crossing-the-line segmentation ... 12

5 General information ... **14**

Annex A (informative) **Crossing-the-line segmentation to determine profile elements** ... **15**

Annex B (informative) **Other segmentation information — Hyperreal numbers** ... **21**

Annex C (informative) **Relationship to the filtration matrix model** ... **23**

Annex D (informative) **Concept diagrams** ... **24**

Annex E (informative) **Relationship to the GPS matrix model** ... **28**

Bibliography ... **29**