

General Tolerances

Sample document with complete example values. It shows the report the purchased export produces for YOUR input - it is not itself a report for any part.

Project: Sample project

Part/Position: no real part

Prepared by: Sample, not released

Linear size 47 mm - class m

Inputs

Size type	Linear size
Nominal size	47 mm
Tolerance class	m
Nominal size range	above 30 to 120 mm
Limit deviation	±0.3 mm

Class comparison (chosen class marked with <)

Class	Limit deviation	Maximum size	Minimum size
f	±0.15 mm	47.15 mm	46.85 mm
m <	±0.3 mm	47.3 mm	46.7 mm
c	±0.8 mm	47.8 mm	46.2 mm
v	±1.5 mm	48.5 mm	45.5 mm

Actual size assessment

Criterion	Value	Limit	Status
Actual size 47.25 mm	47.25 mm	46.7 ... 47.3 mm	● OK
Tolerance utilization	83 %	100 %	● OK

Standard note

Limit deviations per ISO 2768-1:1989 (classes f/m/c/v). The stated values are symmetric limit deviations $\pm A$; the maximum and minimum size follow as the nominal size plus or minus A, and the tolerance as $2 \cdot A$.

Part 2 (form and position, classes H/K/L) has been superseded by ISO 22081:2021, which no longer specifies nominal-size-dependent table values. For legacy drawings with an undated reference to 'ISO 2768', it is advisable to add the issue date (':1989') if the old table values are meant to keep applying.

About this sample

All values on these pages come from a freely chosen example calculation and belong to no real part. The purchased export contains the same sections with your input, your header data (project, part, prepared by) and as searchable text. Pricing and scope: maschinenbaurechner.de/en/pricing

Note: The results are design and orientation aids. They do not replace independent verification, calculation and approval by a qualified person. The terms of use at maschinenbaurechner.de apply.