

Feeler Gauges

DT Workshop Equipment Reference — D&T / STEM resource for school workshops | Measuring & Inspection



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A feeler gauge is a set of thin precision blades of known thickness used to measure gaps and clearances between parts, such as spark plug gaps, valve clearances and machine setup tolerances. Each blade is marked with its thickness in inches or millimetres.

Key Features

- Blade sets from 0.03 to 1.0 mm metric
- Imperial sets in thousandths of an inch
- Folding or strip mounting with a holding handle
- Case with sizes printed on each blade
- Multiple blades can be stacked for odd gaps

Typical Uses in the Workshop

- Set spark plug and contact breaker gaps
- Check valve clearances and machine tolerances
- Set up fences, blades and tool clearances
- Verify bearing and gear end float

Safe Operation

1. Select a blade close to the expected gap size
2. Slide it into the gap with light pressure
3. Try the next blade to find the exact fit
4. Stack blades for non-standard sizes
5. Record the measurement on the job sheet

SAFETY NOTES

- Keep blades straight - bent blades read wrong
- Do not force blades into tight gaps
- Watch sharp edges when removing blades
- Keep the gauge out of magnetic tool trays if precious
- Store blades clean and lightly oiled

Maintenance & Consumables

- Wipe blades and oil them lightly after use
- Check blades for bends and burrs
- Keep the case clean and blades in order
- Replace worn sets rather than guess
- Verify thickness against a micrometer annually

Specification & Buying Notes

A metric set 0.05-1.0 mm plus a longer blade set for engine work covers schools. Quality steel that keeps its thickness matters - cheap sets distort. Buy in a rigid case.