



# Microfinish for Crankshafts

## CrankStar



### Microfinish Task

Reduction of roughness, improvement of roundness and waviness on main and pin bearings as well as reduction of roughness at thrust faces and seal seats



### Microfinish Advantages

Significantly increased percentage contact area of the workpiece's functional surfaces, reduction of friction, increased service life, reduced wear and energy requirements, lower noise by reduction of waviness



### Special Machine Features

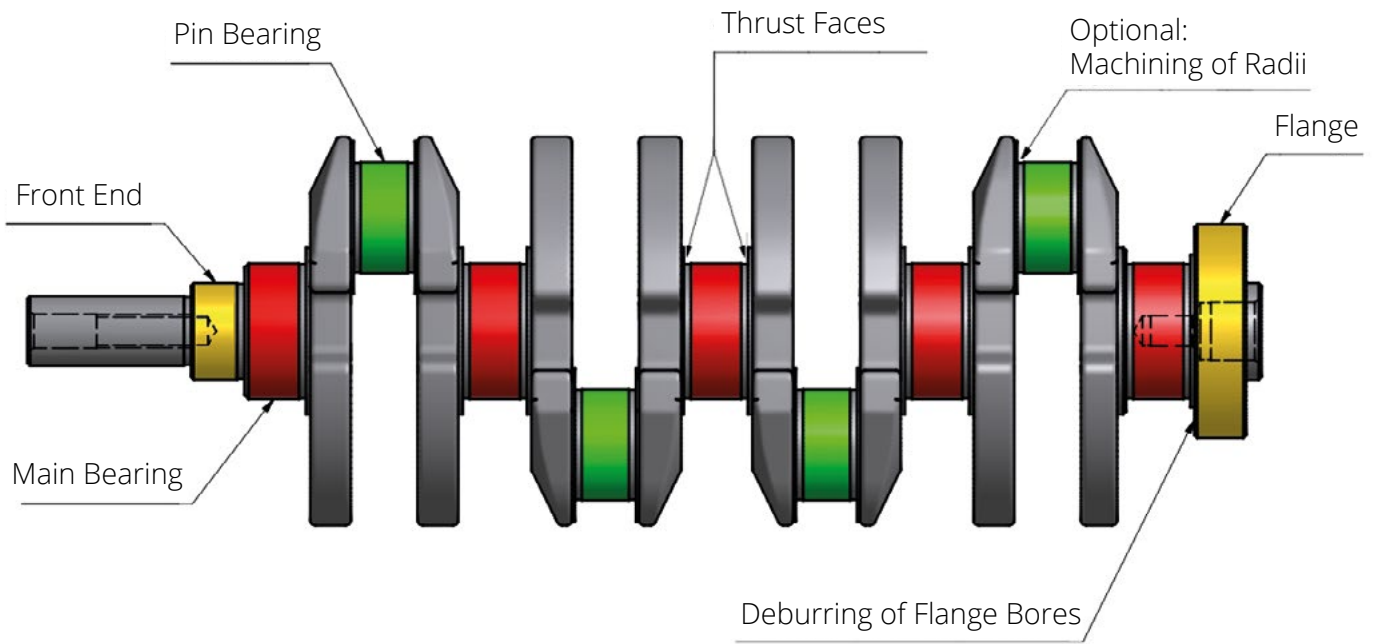
Horizontal machine, small size ratio, easy access, easy set-up, loading within cycle time possible



Shortest cycle times with optimised finishing units and loading system

Modular machine system with 1-X stations



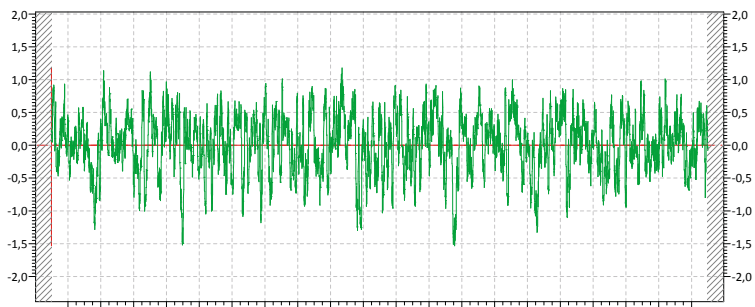


## Thielenhaus CrankStar TX

- Optimised for large-scale production
- 3- and 4-cylinder crankshafts
- Length up to 500 mm
- Modular concept (1-X stations)

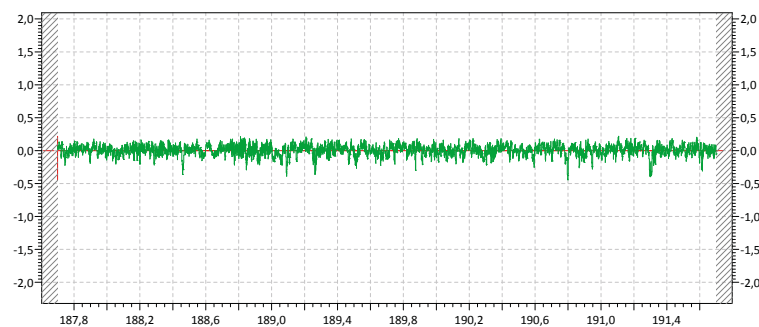
## Thielenhaus CrankStar SX

- Optimised for highly flexible lines
- 1-X cylinder crankshaft
- Length up to 800 mm
- Stroke up to 100 mm



Ra	0,3497	µm	
Rp	1,0681	µm	Rv 1,3583 µm
			Rz 2,4264 µm
Rz1max	2,6566	µm	

Roughness of crankshaft before Microfinish



Ra	0,0621	µm	
Rp	0,1949	µm	Rv 0,3789 µm
			Rz 0,5738 µm
Rz1max	0,6308	µm	

Roughness of crankshaft after Microfinish

## THIELENHAUS TECHNOLOGIES

