

## GEAR HOBBIING MACHINE HS 30 SPS



## APPLICATION AND PART EXAMPLES

The hobbing machine HS 30 has been designed to hob watch and instrument pinions and gears at very high speeds . The machine is ideally suited for the mass production of small pinions and gears in large batches.



### SPUR GEAR HOBGING

of pinions and gears



# MACHINE AND TECHNOLOGY



## DESIGN

The design of the machines is extremely stable and vibration free. The HS 30 machine produces gears of the highest quality.



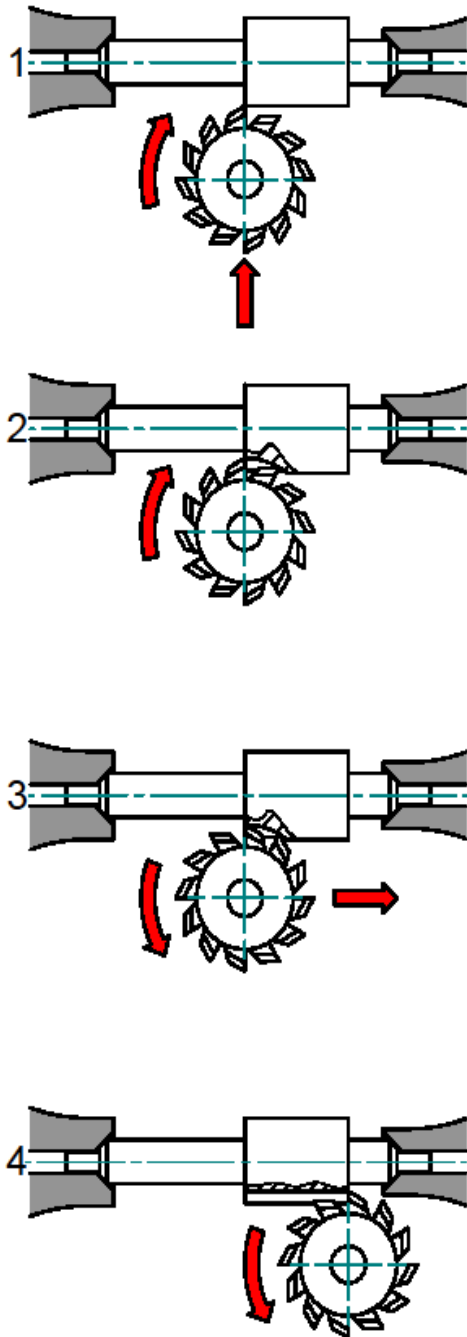
## MACHINE CONTROL

The machine is equipped with a SIEMENS PLC control, which is remarkable for its reliability. The control is simple to operate and needs a very short tuition time.



## MAIN & COUNTER SPINDLES

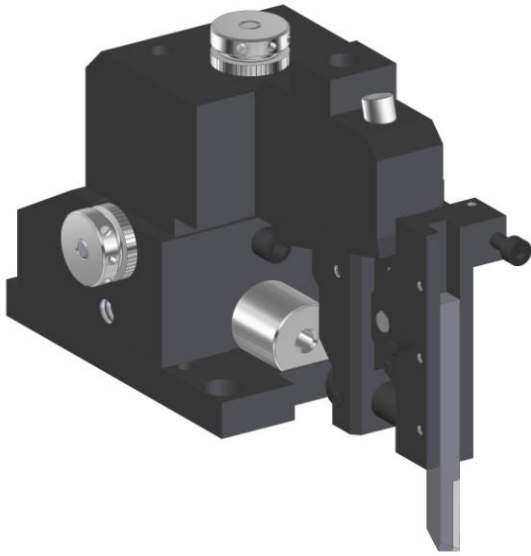
The main and counter spindles can be aligned to each other within 0.001 mm. The counter spindle is driven synchronously to the main spindle.



### BURR FREE HOBBING

With this development from Strausak, two hobs are mounted on the one hob arbor, allowing the first hob to plunge in the front face of the gear and the second hob rotating in the opposite direction, to cut the profile without generating a burr.

## OPTIONS AND LOADING DEVICES



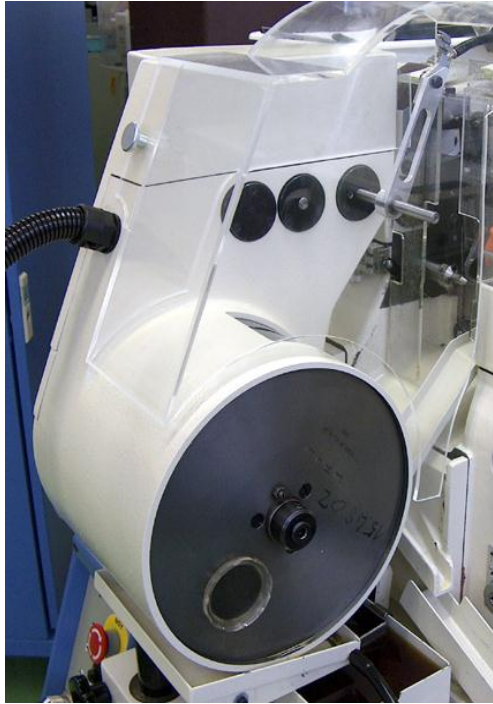
### DEBURRING TOOL

The deburring tool can be ordered as an accessory. This tool is mounted on the main spindle side of the gear face removing the burr during the hobbing process.



### STRAUSAK LOADER TYPE 28

With this loader the majority of workpieces can be efficiently and automatically loaded. When the workpiece is changed one merely exchanges the magazine and the gripper on the loading arm.



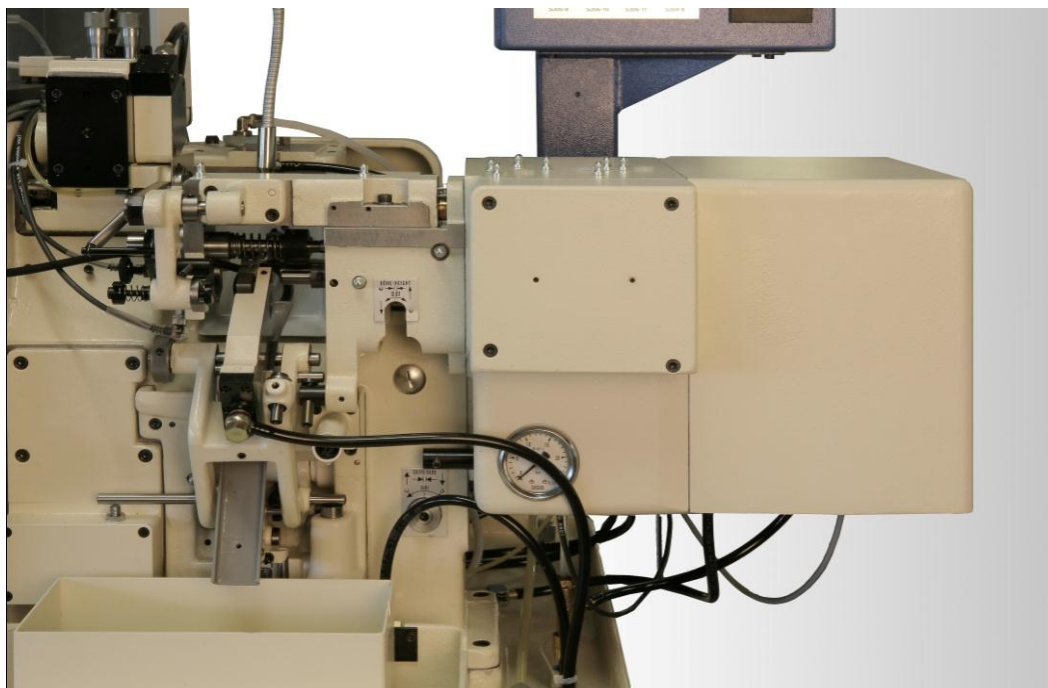
### STRAUSAK LOADER TYPE 15

This loader is used for shaft type pinions.



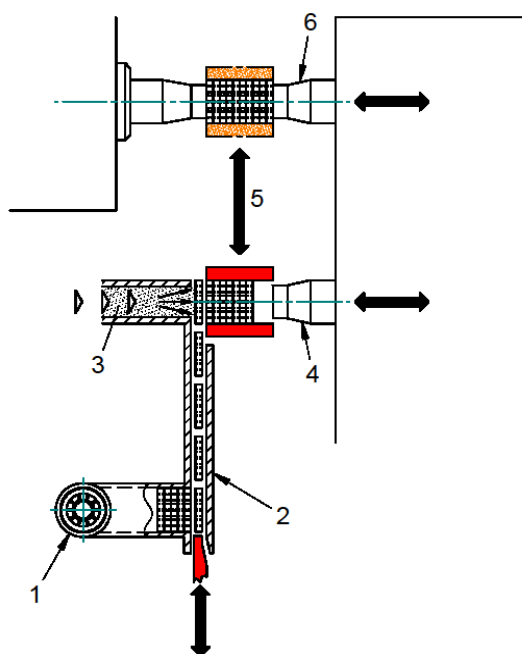
### CONTINUOUS DRUM FEEDER

The drum feeder allows the production of larger workpieces and larger volumes of parts. The loader is placed outside of the machine and therefore can be refilled during the production process.



### RPA Version

For the manufacture of gear wheels in large batches, we offer the machine as a RPA-version. RPA is an abbreviation in the German language for Wheel Packeting Unit. The patented packeting unit is an integrated component of this machine which allows the centring and clamping of the gear wheels either in the spokes, round or profiled centre bores.



### Principle

The loose blanks supplied from a drum feeder are fed into a plastic tube (1) and from there, fed into the loading rail (2) the parts are singled out to be fed to the loading position. An air jet(3) blows the parts in front of the rotating loading arbor (4) until the wheel packet length is reached. This function takes place during the hobbing of the previously loaded packet. When the machine completes the hobbing process, the parts are unloaded and the new packet will be loaded between the spindles with the transport arm (5) The spindle (6) moves into the packet and clamps it tight for the next machining process.



## TECHNICAL DATA

### WORKPIECE

<b>Wokpiece Diameter</b>	<b>mm</b>	<b>0.4 - 35</b>
<b>Wokpiece Length</b>	<b>mm</b>	<b>0.3 - 45</b>
<b>Number of Teeth</b>		<b>2 - 390</b>
<b>Module in Steel</b>	<b>mm</b>	<b>0.04 – 0.80</b>
<b>Module in Non-Ferrous Metal</b>	<b>mm</b>	<b>0.04 – 1.00</b>

### WORKING RANGE

<b>Maximum Hob Length</b>	<b>mm</b>	<b>20</b>
<b>Hob Cutter Diameter</b>	<b>mm</b>	<b>6 - 24</b>
<b>Hob Spindle Speed</b>	<b>rpm</b>	<b>400 - 12'000</b>

### MACHINE DIMENSIONS

<b>Length x Width x Height</b>	<b>mm</b>	<b>800 x 800 x 1'100</b>
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### WEIGHT

<b>Machine</b>	<b>kg</b>	<b>600</b>
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