

## 1. Application

**SPONTAN** designs and manufactures, in-house, saw gearboxes which are suitable for cutting pipes, profiles, rolled rings and solid material in virtually all imaginable installation locations and types of machine. The saw gearboxes can be operated both in a swivelling axle bearing and via linear feeds.

## 2. System description

Depending on the application, the saw gearboxes are designed as a spur gear multilevel with an upstream toothed belt transmission.

All Spontan's saw gearboxes have an extremely **low backlash**.

This is achieved by the use of precision-ground gear wheels and inhouse production of gearbox cases.

Spontan's saw gearboxes which have been developed in-house have a **backlash of <0.04**.

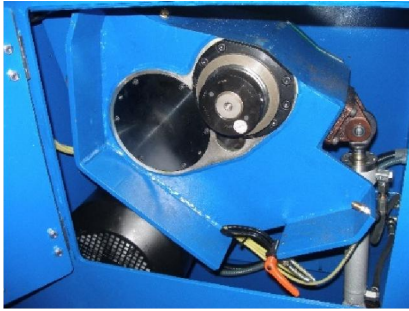
Depending on the design, three-phase AC motors or servo motors are used as drive sources.

## 3. Workpieces

Geometries	: almost independent
Pipes and profiles	: max. 160 x160 mm
Wall thicknesses	: 0.75 – 12.00 mm
Materials	: steel, stainless steel, non-ferrous metal, etc.

## 4. Tools

Saw blades	: HSS coated / HM tipped
Saw blade Ø	: 275 – 500 mm
Saw blade width	: 1.6 – 4 mm
Mount Ø	: according to customer requirements



## 5. Model and drive power

### Type 315

Saw blade Ø	: 200 – 340 mm
Drive power	: up to max. 10,5 kW
Gear ratio	: 1.2 - 26.8

### Type 400/450

Saw blade Ø	: 275 – 450 mm
Drive power	: up to max. 11 kW
Gear ratio	: 7.8 - 27.65

### Type 450/500

Saw blade Ø	: 275 – 500 mm
Drive power	: up to max. 18 kW
Gear ratio	: 9.3 - 17.35

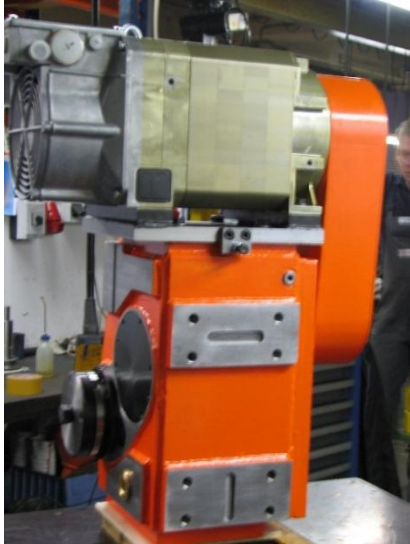
### Type 500 linear

Saw blade Ø	: 315 – 500 mm
Drive power	: up to max. 8,6 kW
	: up to max. 11,0 kW
	: up to max. 20,0 kW – servo
Gear ratio	: 9.3 - 17.35



## 6. Equipment features and components

- Saw gearboxes in cast or welded steel design
- Low-backlash saw gearboxes in swivelling design
- Servo motors for feeding and speed
- Saw blade mounts according to customer requirements
- Saw blade attachment with central clamping screw
- Special designs for customer-specific modifications



## 7. Accessories available as an option

- Hydraulic clamping nut for saw blade attachment
- Microlube Advantage MMKS systems (manufacturer Spontan)
- Aircooler for extra saw blade cooling
- Saw blade guidance
- Complete swivelling axle bearings
- Pulse generator modules for stroke control and lots more

