

## The new high-pressure unit by Piller Entgrattechnik

Many precision mechanical parts have high requirements for being free from burrs and chips. In addition to the precise machining, deburring - manually or on a separate machine with separate medium - is often required as an additional process step. There now is a new, built-in solution. The high pressure add-on module HPU 650 allows for the deburring process to be integrated into a tooling machine.

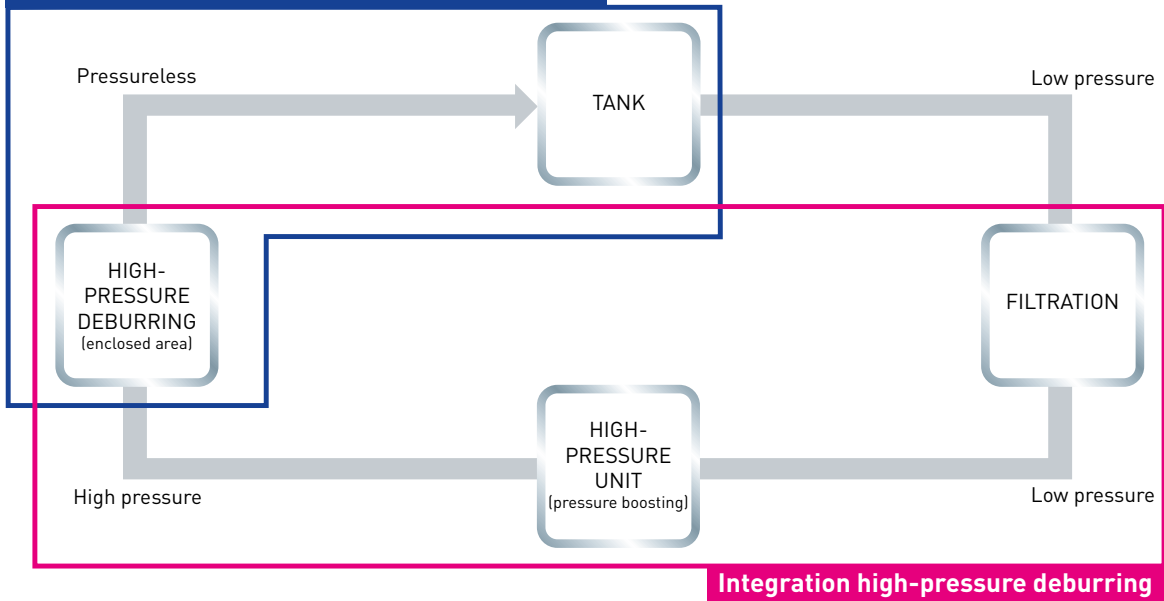
Manufacturers of precision turned parts or hydraulic components, in particular, are familiar with the challenging requirements for parts being free from burrs and chips. Smallest burrs and residual chips pose a functional problem and require manual or automated deburring for many high-quality components. However, these additional process steps, cost the parts manufacturer time, space and capital. PILLER has been familiar with these sophisticated require-

ments for quite some time. Enhancements in the process resulted in a new, compact high pressure supply which can be integrated into lathes, multi-spindle machines and other tooling machines with considerably less expenditure than ever before. Upgrading a cutting machine with the new high pressure module merely requires one free spindle and four square metres of floorspace.

The very specific advantage of the process is that the cooling lubricant of the cutting machine (usually cutting oil) is used as a deburring medium. The components can then be deburred straight in the cutting machine and rinsed to remove any chips. That saves a lot of money!



## Multi-spindle machine / Rotary transfer machine



## Technical Data

### Fluid data

Max. operating pressure	bar (MPa)	650 (65)
Max. oil temperature	°C	40
Max. volume flow rate	l/min	26
Medium		Cutting oil

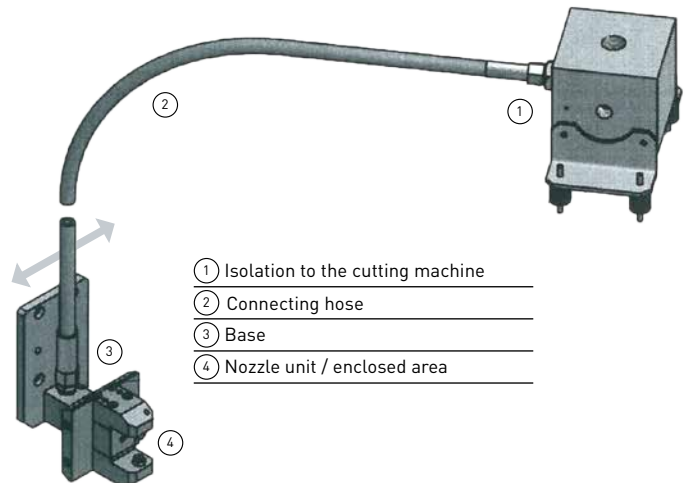
### Dimensions, weight and connecting power

Weight	kg	ca. 1050
Length	mm	1562
Width	mm	1300
Height	mm	1500
Connecting power	kVA	55
Power consumption	A	80
Operating voltage / frequency		400 V / 50 Hz

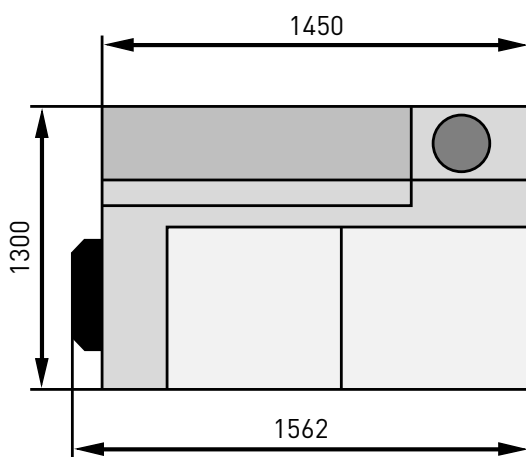
### Control

Siemens SIMATIC S7-1200

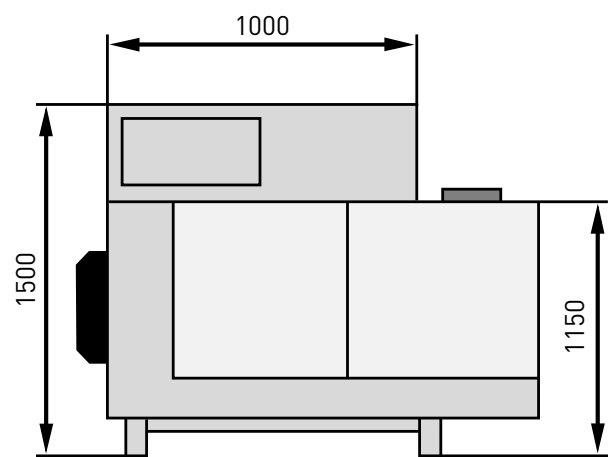
## Project planning of the application



- ① Isolation to the cutting machine
- ② Connecting hose
- ③ Base
- ④ Nozzle unit / enclosed area



top view



front view

