



# ZETOR PROXIMA PLUS 100

## SPACIOUS CAB AND SIMPLE DESIGN

If someone is looking for a simple tractor, then Zetor offers the perfect solution. So how did it perform up against strong rivals?

**Engine:** The Czech manufacturer continues to equip its tractors with drive units of its own design. The tested Proxima had an engine with an exhaust gas cooling recirculation system in order to meet combustion gas limit level IIIB. According to the manufacturer's specifications, the engine should reach rated power of 71 kW/96 hp and work with a speed of 2,200 rpm (acc. to 2,000/25 CE).

Our measurements have shown that the engine working at such speed can deliver 58.8 kW/80.0 hp at PTO. While this leaves a difference of 16 hp, we should not forget that the manufacturer gives the power according to the set standard, a figure which does not take into account the power necessary for driving the cooler fan; actual losses in the tractor mechanism are at a level of 8-9 hp.

The engine does not fire up much enthusiasm with its torque values. Results for maximum recorded torque (348 Nm), as well as starting torque (283), were the weakest in this category. One benefit that emerges is that the tractor seems to be one of the most economical machines.

Having the lowest specific fuel consumption (244 g/kWh) puts

Zetor in second place in this category, but the mean value from the test of partial loads (285 g/kWh) means third place overall among the tested tractors.

### PLUSES

- SIMPLE DESIGN
- COMFORTABLE CO-DRIVER'S SEAT
- LOCKING OF HYDRAULIC LEVERS
- BONNET OPENS WIDELY

### MINUSES

- ENGINE STOPPING SYSTEM
- SMALL DISPLAY ON DASHBOARD
- DIFFICULT TO ACCESS AIR FILTER





Zetor – a simple design free of unnecessary electronics. The cab interior is large and spacious, but the materials used in the finish are not top quality.

**Gearbox:** The tractor designated for testing had a gearbox fitted with 16 forward and reverse gears. The lever position is comfortable. On the handle there are buttons to control one gear shifted under load. We have to admit that when driving the gearbox responded very quickly to shifting up and down. Information on the shifted reduced gear is shown on the dashboard, but only for higher gear ratios.

We had problems shifting groups of gears because the lever operating the reducer is too short and the driver has to bend down to control it.

The Zetor tractor is provided with a mechanical reverser. Its lever is located on the left beside the steering wheel. The clutch must be pressed to change travel direction. Unfortunately, quick changes in the direction of travel did not go smoothly; in fact, the lever jammed during operation. It is possible, however, that the problem will disappear once the tractor has been run in. We liked that during reverse travel it was also possible to shift the reduced gear.

The driving speed is shown on the dashboard display. However, the numbers are small, so reading them on a sunny day may be a problem.

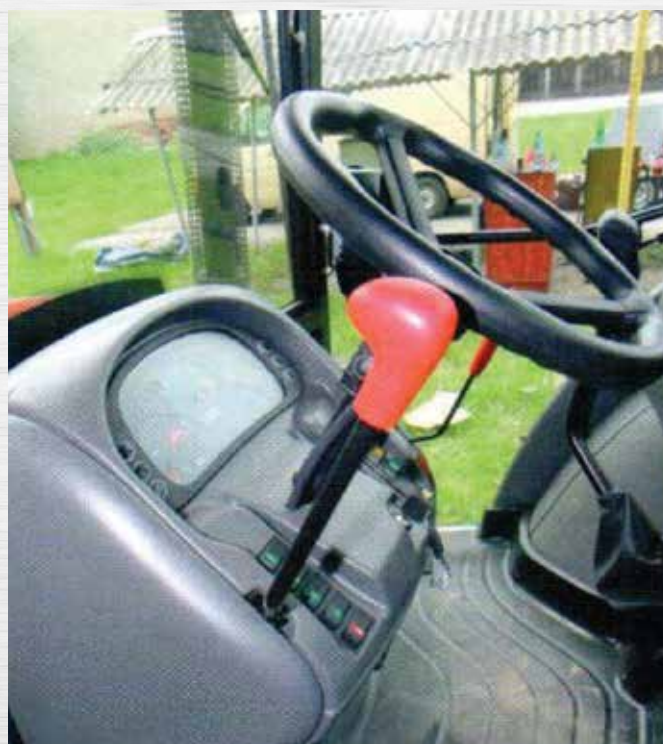
**Cab:** When you enter the Zetor tractor cab, you notice immediately that the tractor is more humbly equipped and is therefore intended for the less wealthy farmer. Medium-quality plastic predominates inside the cab.

Two steps lead up inside. A mud cover would have been useful. The door opens wide and taking one's place behind the steering wheel is not a problem. On the minus side however, the steering

column cannot be adjusted in any plane. On the right, there is a lockable compartment which can hold a 1.5-litre bottle. On the left, there is a tool box attached. The manufacturer might have provided a few additional boxes on the right or left console, which could be used for storing the operator's manual.

The Zetor tractor we tested did not have a glass roof hatch, but an openable one. According to the manufacturer, currently offered Proxima models have a modernized cab equipped with a glass roof - facilitating work with a front loader. Air is supplied inside by a 3-stage fan. Air is directed by 4 nozzles located in the ceiling. It is a pity that the fan is not provided with a bottom outlet.

The tractor driver's view ahead and to the sides is good, as is the view of the rear hitch. Only if the hitches of the rear three-point hitch are in the uppermost position does the driver have to lean out to see them. The Zetor tractor offers a very good co-driver seat. It is comfortable to sit in and folds away easily, so it does not get in the way when accessing the cab.



The Zetor tractor was equipped with a mechanical reverser. The clutch had to be used to operate it.

**Hydraulic system:** The tested Zetor tractor was equipped with a hydraulic pump delivering 50 L/min. We had available 2 pairs of valves and 1 outer circuit tapping for a separate outflow.

The levers are suitably located on the right console. We liked their locking feature. The control valves and levers are marked well with numbers, though the lack of an oil cup was a pity.

The lifting device in the tested model is mechanical and operated by two levers. The first selects the operating system of the lifting device, the other controls the height of the three-point hitch arms. When being operated, they work without any problem. A little lower there are two wheels for controlling the sensitivity of the lifting device and the speed of lowering the arms with an implement attached. Control of the lifting device during the coupling of implements is facilitated by the lever for outside control of the three-point hitch, located on the right mudguard.



The mechanical hitch is controlled by two levers. The elements controlling the outer hydraulic circuit are provided with easy position locking.



**Power take-off:** The tested Zetor tractor offers 2 speeds for the power take-off – 540 and 1,000 rpm. The economic speed 540E is available on request. Speed is adjusted by a lever located in the cab, although this is not marked.

The speed of the power take-off end piece is displayed on the dashboard (after switching the display to the PTO speed function). The fact that the speed indicator shows the speed even when the PTO is switched off is far from ideal! This may be confusing for the tractor driver, particularly because the manufacturer has not used any indicator lamp on the dashboard that would provide information on the operation of this subgroup.

Instead, the Zetor tractor offers dependent and independent PTO speed, which is something we have not seen much of before. The power take-off end piece is switched on electro-pneumatically using the button located on the right centre column of the cab.

**Drive, lock:** Similar to the power take-off, the front drive and differential lock are switched on electro-pneumatically using the respective buttons on the dashboard. Once the subgroup has been activated, the key is illuminated. It would be useful if an additional indicator lamp lit up on the dashboard. The Zetor tractor does not offer an automatic system for the front axle or lock.

**Working comfort:** Zetor is a simple and universal tractor. We were impressed by how the engine reacts to use of the accelerator during driving. On the other hand, the stopping system requires improvement. After stopping the engine, we had a problem resetting the mechanism that controls switching off the ignition to the starting position. Everyday use may present some problems. Access to the screwing oil level gauge is made difficult due to hydraulic pipes. To be able to get to the air filter, it is best to turn the wheels to the left.



On the right mudguard you will find the lever to externally control the lifting device. This facilitates the aggregation of implements.