simalube – the automatic single-point lubricator

Technical information on wind turbines





The lubrication expert

Less downtime and higher efficiency

Every wind turbine has a multitude of lubrication points which have to be supplied at regular intervals. Since wind turbines are often located in remote locations, maintenance and the related lubrication is associated with a great deal of time and expense. Unplanned turbine failures can occur owing to insufficient lubrication. With the simalube lubrication system, wind farm operators can minimize the risk of downtime and also increase the efficiency of their wind turbines.

Reduce maintenance costs and increase equipment life

Extreme temperature fluctuations, humidity and moisture are heavy burdens on every wind turbine. In order to prevent the resulting damage, optimum lubrication is indispensable. Thanks to constant lubrication with the simalube lubricator, wear of the components is enormously reduced and the service life extended. Optimized equipment availability and reduced maintenance costs ultimately lead to more cost-effective wind energy production.

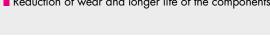
reliably, continuously and is precisely accurate»

> «Cost savings thanks to automatic lubrication»



The benefits of automatic lubrication with simalube:

- Increased operational safety
- Reduced downtime
- Constant supply of hard to reach lubrication points
- Less time spent on maintenance
- Reduction of wear and longer life of the components





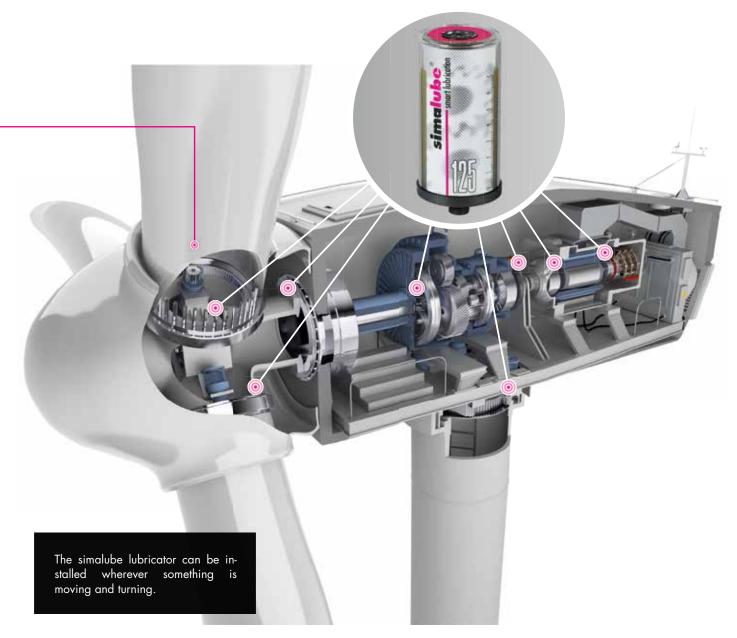
Even in tight spaces, the smallest lubricator lubricates reliably and precisely.



In this wind turbine, the simalube lubricator is set with a dispensing time of six months.



Automatic lubrication using the simalube 125 ml on a rotor blade bearing.





With the practical simulube accessories, it is possible to easily equip each lubrication point with a simulube dispenser.



Two simalube $250\,\mathrm{ml}$ lubricators lubricate the main bearing of a wind turbine.



With the simalube 250 ml lubricator, the generator is continuously supplied with lubricant for up to 12 months.

















Applications and advantages

simalube areas of application for wind turbines:

- Rotor blade adjustment
- Rotor blade bearings
- Generator
- Yaw drive
- Gearboxes
- Pitch adjustment (variable speed gear unit)
- Main bearings

Advantages of the simalube lubrication system:

- Proven lubrication system in the wind turbine industry
- Reduction of service requirements and maintenance costs (manual lubrication is no longer necessary, thus there is less required labour and the time savings are great)
- It is not necessary to shut down the machines during maintenance
- Longer service life of machines thanks to continuous and precise lubrication
- Flexibility: The running time is adjustable from 1–12 months
- Only one type of lubricator is needed per application. This allows a reduction of storage costs
- Once the simalube is installed, the lubrication point is reliably lubricated and never forgotten
- Thanks to the transparent housing, the progress of the lubrication process can be monitored at all times (fill level control)
- Available in 5 sizes: 15, 30, 60, 125 and 250 ml, plus multipoint
- Simple, environmentally-friendly disposal (100% recyclable)
- The hermetically sealed system prevents contamination by dust and debris (IP68)



We will gladly inform you about the application of simulube products in the wind turbine industry.

Our highly-qualified specialists have an in-depth technical knowledge and will show you how automatic lubrication can reduce costs and extend the service life of wind turbines.

simatec ag

Stadthof 2

CH-3380 Wangen a. Aare Tel.: +41 (0)32 636 50 00

Fax: +41 (0)32 636 50 19 welcome@simatec.com www.simatec.com

