

The production of bio-diesel



an ideal completion for distilleries



The typical distillery as a campaign company is often less than 6 months per year used to full capacity. The rest of the time, valuable infrastructure and personnel capacity are not used. That's why it is recommendable to take these capacities for a bio-diesel production plant and to achieve a full used capacity all year. The combination of distillery technology, bio-diesel plant and a biogas plant is ideal. In the biogas plant residual substances of the alcohol production as well as all other by-products can be converted into energy in the bio-diesel plant. Thus the production costs can be reduced so that the bio-diesel can be sold competitively on the market.

Technical data

| | |
|--|---|
| Suitable oil sorts: | Rape Sun flowers Used oil (vegetable oil) |
| With a bio-diesel production with: | 1.000 t/a |
| as by-products arise: | |
| Rape cake | 2.200 t/a |
| Glycerine | 200 t/a |
| Proper consumption for the production: | ca. 210.000 kWh _{el} /a ca. 60.000 kWh _{th} /a |

The production of bio-diesel from vegetable oils is state of technology and the modern diesel engines are able to process this fuel. Required is of course a good quality according to the DIN 51 606. Altogether a great contribution to relieve our environment is the use of bio-diesel as fuel for vehicles. The CO₂-emission at the motor combustion is balance neutral, because the motor exhausts with bio-diesel contain considerable less soot and carcinogenic substances than fossil diesel fuels.

At the same time, agricultural companies secure a lasting income.



| | |
|---|--------------------------------------|
| Biogas yield from By-products of the bio-diesel production: | > 1.200.000 m ³ /a |
| corresponds to: | ca. 8.750.000 kWh _{prim} /a |
| generatable electric power from biogas: | ca. 2.710.000 kWh _{el} /a |
| generatable heat energy from biogas: | ca. 4.810.000 kWh _{th} /a |

The digested substrate is a great economic fertilizer and be retransferred into the material cycle.



INNOVAS Innovative Energie- und Umwelttechnik
Anselm Gleixner und Stefan Reitberger GbR
Margot-Kalinke-Str. 9, D-80939 München
Phone: 089 - 16 78 39 73, Fax: 089 - 16 78 39 75
E-Mail: info@innovas.com
URL: http://www.innovas.com



DGE GmbH
Dr.-Ing. Günther Engineering GmbH
Hufelandstr. 33, D-06886 Wittenberg
Phone: +49-3491-661841, Fax: +49-3491-661842
E-Mail: dge-info@t-online.de
www.dge-wittenberg.de