Filtration Group Process Systems – amafilter® – LFC Lochem®

RMRC15042019

EDIBLE / VEGETABLE OIL FILTRATION SOLUTIONS

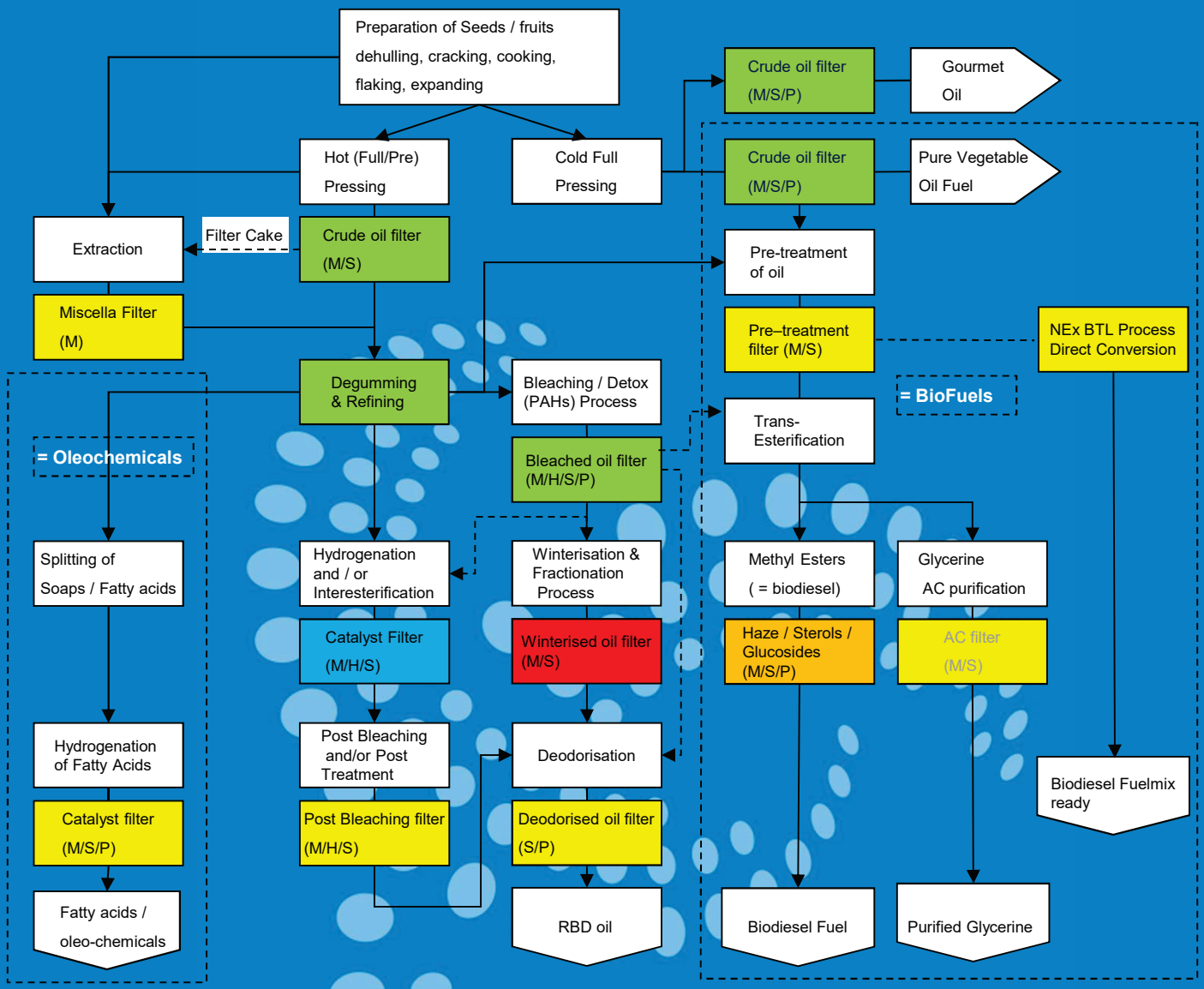
Efficient and reliable filtration solutions for the edible / vegetable oil industry

Filtration Group® Process Systems

amafilter® Filtration Group

LFC Lochem® Filtration Group

Typical Edible / Vegetable oil Filtration Process



= Vertical pressure leaf filter
= Vertical or Horizontal Pressure Leaf Filter
= Horizontal Pressure Leaf Filter
= Cricketfilter or Pulste Tube Backwashing filter (PTS)

M = Main Filtration
S = Safety filtration
P = Polishing Filtration
H = Heel Filtration

Edible / vegetable oil

Filtration is a key process step in the edible/vegetable oil industry. The presence of gums, slimes and gels requires experience in filtration. Knowledge in combination with creativity is the key to success in solving filtration problems. Filtration Group has more than 50 years experience in filtration of edible oils. More than 5000 filters have been sold to the edible oil industry so far.

Amafilter – LFC Lochem (Filtration Group Process Systems) filtration systems filter the finest particles and contaminations from the products and contribute effectively to minimize production costs and to improve product quality.

Refineries and processing plants are automated to a large extent and this requires reliable and easy-to-automate equipment. Operation should be simplified, operational faults avoided and above all, a well defined process should be achieved.

The pre-treatment of the filter, filtration and cleaning of the filter takes place in a semi or fully automatic mode and no intensive labour is required to open and/or close a filter in order to discharge the filter cake and get the filter back into operational condition.

The selection of the right filter type for each individual process step depends on a number of factors, such as:

- Space requirement and available space
- Type of cake discharge
- Filter unit size in combination with the plant capacity
- Batch or continuous operation
- Investment costs
- Experience

Reducing and removing impurities lead to lowering the amount of reactants and increasing the efficiency of the end product. This is why filtration is the key separation step to minimize production costs in edible / vegetable oil production and to meet the strictest regulations and requirements.

Our extensive product range can be utilized for all processes in edible / vegetable oil production. **Amafilter - LFC Lochem** offers tailor made solutions for a wide variety of different process requirements of individual manufacturers, offering efficiency together with reliability which allow the manufacturer to minimize production costs and to get a consistent product quality.

Main applications

- filtration of Avocado oil
- filtration of Mustard oil
- filtration of Palm oil
- filtration of Peanut oil / groundnut oil
- filtration of Rice bran oil
- filtration of Safflower oil
- filtration of Semi-refined sesame oil
- filtration of Semi-refined sunflower oil

Main process applications

- Miscella filtration
- Crude oil filtration
- Bleached / detoxified oil filtration
- Deodorized oil filtration
- Winterized oil filtration

Applications

Reducing and removing impurities lead to lowering the amount of reactants and increasing the efficiency of the produced oil. This is why filtration is the key separation step to minimize production costs in edible/vegetable oil production and to meet the strictest regulations and requirements.

Crude oil

Filtration of crude oil to remove solids / foots in order to obtain clean oil for further processing.

Bleached oil

Removal of adsorbent (clay / silica) in batch or continuous bleaching process.

Winterised oil

Removal of wax stearine from winterised products.

Hydrogenated oil

Removal of catalyst from hydrogenated products.

Polishing filtration

Safety / polishing filtration at the following locations in the process:

- Tanker loading & unloading
- Crude oil
- Bleached oil
- Hydrogenated oil
- Winterised oil
- Deodorised oil
- Packaging