Process Safety Management

The Biodiesel and Extraction process areas are covered by PSM regulations. All contractors working on Louis Dreyfus property must be trained and complete annual refresher in PSM requirements. Their training sticker must be displayed on their hard hats. Contractors who fail to follow the PSM requirements will be asked to leave the plant and lose their eligibility to work at the facility.

Hexane and methanol, flammable liquids, are used in these areas and require special precautions. These chemicals may be present in liquid and gaseous forms.

1. Hot Work can only be performed after the area has been drained of flammable liquid, purged, and a Hot Work Permit issued. The use of Hot Work Permits in these areas must have the approval of the Plant Manager or his designee.

2. Powered vehicles are not allowed inside the fenced controlled area unless the area is emptied and purged or a Hot Work Permit is issued. A hot work permit is also needed for extending boom into building or area.

3. Electric tools may not be used unless the area is emptied and purged, and their use is authorized.

4. Air powered drills and saws may be used in the area if no flammable liquids or vapors are present. A Hot Work Permit is required for this work. Saw blades and drill bits must be kept cool with water or cutting oil.

5. The use of air impact wrenches are allowed by Hot Work Permit only and these must be signed off on by the Plant Manager, Operations Manager, or the SHE Manager.

6. Steel tools such as screwdrivers, wrenches, and sockets (low impact) are allowed if no flammable liquids or vapors are present. If flammable vapors could be present, spark resistant tools shall be used.

7. Steel striking tools such as hammers and putty knives are not permitted. These types of tools shall be made of brass, beryllium, or some other spark resistant material.

8. If excavation work is being performed, the atmosphere must be checked by a Shift Leader prior to starting work. Excavations below grade are to be ventilated to prevent the accumulation of flammable vapors.

9. All test equipment must be intrinsically safe and rated for use in the area.

10. Personnel are not to enter these areas unless they have had specific training and are authorized to do so. Personnel entering Biodiesel or Extraction must sign in at the respective control room and inform the operators of their presence and the task they are performing.

11. Matches, lighters, cigarettes, cigars, pipes, or other smoking materials should not be carried and are strictly forbidden.

12. Louis Dreyfus Shift Leaders and managers have the final authority regarding safe work practices. All work must stop immediately when directed by a Shift Leader or LDAI Manager.

GENERAL:

1. Each visitor and contractor must personally sign-in at the main office reception area when entering the plant. Signing-in for someone else is prohibited.

2. Vehicles and mobile equipment shall obey all traffic signs and maintain a maximum speed of 10 mph. Areas in front of fire hydrants and drives must be kept clear.

3. Smoking and the use of all tobacco products (including chew, smokeless cigarettes and pipes) are prohibited anywhere on LDAI property, including parking lot.

4. Hard hats, safety glasses (w-clear lens), and safety shoes are required to be worn outside of office and break room areas. Hearing protection must be worn in designated areas.

5. Clothing shall be cotton. The only exception is that the lining of coats and overalls may be made from synthetic material. Loose or ragged clothing is not allowed. Long hair should be tied back or put up.

6. Cell phones and pagers may not be carried into Process areas, keep them in your vehicle.

7. The use of cameras is prohibited without the permission of the Plant Manager.

8. Maintain good housekeeping at all times. Promptly and properly dispose of all waste materials.

9. Follow proper procedure when using elevators; they are man lifts, not to be used for freight.

10. Flashlights used anywhere in the plant must be explosion proof and meet Class I, Division I and Class II, Division I requirements.
11. Report all injuries immediately to a Shift Leader or Louis Dreyfus manager.
12. In the event of a spill or other release emergency, notify a Shift Leader or LD Manager immediately and follow their directions.
13. In the event of an evacuation, fire, severe weather or other emergency, follow the Emergency Action Plan. You are required to report to the Maintenance building for roll call. DO NOT LEAVE THE SITE UNTIL DIRECTED TO DO SO.

**Important Warnings**

Corrosive materials (Acids and Caustics) and flammable solvents (Hexane, Methanol, and Sodium Methylate) are used at this facility. These chemicals are located in the extraction, extraction tank farm, biodiesel tank farm, biodiesel building, boiler house, WWTP and the degumming building.

These chemicals are dangerous if you are exposed to them. They can cause permanent injury and possible death. If working in these areas be aware of the location of these chemicals and their danger.

**Transporter or Delivery Rules**

1. Personnel Protective Equipment (PPE) for unloading chemicals shall include hardhat, steel toed shoes, safety glasses, face shield and chemical resistant gloves.
2. Chemical resistant suits, boots and respirators shall be available at truck unloading.
3. An LDAI person shall be present to check paperwork and inspect connection before initiating any loading operations; if a flammable product, an LDAI person shall be present for complete loading process.
4. Obey all posted signs in facility and loading area.
5. Cell phones cannot be used in loading area; may be used inside vehicle.
6. If fall protection is available, it must be used when working on top of vehicle.

**Contractor Specific Rules**

1. All tools, equipment and PPE borrowed from Louis Dreyfus must be signed out by the user. Items are to be returned at the end of each shift unless other arrangements have been approved, in writing. LD will hold contractor liable for all lost or damaged items.
2. Prior to work, a pre-work evaluation should be completed which identifies any special permits and waste handling requirements.
3. A Hot Work Permit must be obtained from a Shift Leader prior to beginning hot work. All requirements of the Permit must be followed. Permits are available 24/day. A portable fire extinguisher must be available within 25’ of any Hot Work area. If an extinguisher is used, immediately report its use to a Shift Leader.
4. Confined Space Permits must be obtained from a Shift Leader prior to entering all confined spaces, including bins, silos, tanks and vessels.
5. Air Blowdown Permits must be obtained prior to using compressed air for housekeeping. The use of compressed air to blow down ledges and overheads is strictly controlled.
6. Sources of energy must be Locked Out and Tagged Out before beginning work. Proper LOTO procedures must be followed.
7. Excavation Permits are required. You must obtain these from a Shift Leader or LD manager before digging.
8. Safety Harnesses and lifelines are required to be worn in the following situations:
   - On ladders when working more than 4’ above the surface
   - For elevated surfaces that are 4’ high or more with no guardrail
   - On scaffolding or portable life equipment. All scaffolding must be certified by the appropriate LD manager.
9. Industrial vehicles may only be used with permission and the operator must be certified per OSHA requirements.
10. Isolate areas below where overhead work is being done with rope or caution tape.
11. Holes in floors must be repaired, covered or roped off immediately. Safety tape is not acceptable.