

Solvent tanks are a common sight in most shops. These tanks are used for the cleaning of internal and external parts in hoists. Some shops have solvent regularly delivered by a company that specializes in this type of service. Using a service company for your solvent needs is generally the safest and most economical way to meet your needs.

These companies will provide you with the necessary MSDS documentation, and give you instruction in the proper use of their products. Many times they can also sell you the necessary accessories for your protection.

With solvents that are commonly used within the industry, any worker that must use this type of product is required to wear certain personal protective equipment (PPE). Working around solvent can be hazardous and the following types of PPE are usually required:

- Chemical resistant full length apron to prevent chemicals coming into contact with your clothing
- Chemical resistant long gauntlet gloves to prevent exposure of your skin to possible toxic chemicals
- Safety glasses with side shields to protect your eyes against splashing
- Full face chemical resistant shield to protect your face against accidental splashing

This list may not include all the necessary PPE for use with the solvent that your shop is using. In order for you to be fully protected against chemical burns and poisoning that can be the result of contact with solvent, consult your MSDS sheets.

## MSDS- Sheets

MSDS- *Material Safety and Data Sheets* explain the potential hazards of contact with a certain chemical. They provide a complete listing of the necessary PPE required when the specific chemical is used. These data sheets can be obtained from your solvent service company. Federal OSHA standards require that all products being used within a business be listed in an MSDS log.

This log must be accessible to all employees that use any chemical within the course of their duties. It must also be accessible to trained emergency personnel in the event of an incident. The MSDS log must also be maintained on a regular basis.

## Solvents and Repairs

Solvents are used quite frequently in the process of repairing hoists. How you use them can possibly make more or less work for you in the long run.

Despite the obvious hazards of chemical poisoning and chemical burns, there exist some other little known hazards with the use of solvents.

Solvents and their use can be the reason that oil seals on gearboxes fail and begin to leak. Using solvent around rubber oil seals can be the reason for premature failure of these seals.

When you must use solvent on parts such as the quadrant drive in an Astro hoist, take care to avoid prolonged contact with the oil seals. When the oil seals fail, the oil in the gearbox will leak out and can result in even costlier repairs if left uncorrected.

The failure of oil seals is not unknown to most seasoned mechanics, but solvent use and loss of traction is not as well known. Solvents can be responsible for the loss of traction in some machines.

The answer to why this loss of traction may occur can be the result of several things.

Most solvents unless they are alcohol or ether based, leave behind oily residues after they dry. This may be intentional depending on the solvent manufacturer. This residue may act as a chemical barrier against further rust and corrosion after the part has been cleaned.

The residue may also be the result of solvent that has not been cleaned recently. When you have a solvent service, there is generally a set schedule when that company comes back to your shop to provide new solvent. The service company will generally take your barrel of solvent and replace it with a recycled barrel of solvent.

If you have had good success with your solvent and suddenly you notice a problem, ask yourself the following questions.

- Has your shop increased the volume of repairs recently?
- Has your shop recently changed solvent suppliers?
- Has your shop recently changed the grease or oil that you use?
- Is there a new product line in your shop?

These questions may lead you to understand why your solvent and its use could be contributing to traction problems in your shop.

The reason is simple, increased repair volume means more greasy and dirty machines are coming into your shop. When you clean hoists and parts in the solvent tank, all the grease and dirt magically goes away, right? NO! The grease and dirt that you clean off of these parts goes down into the bottom of the solvent tank. While at the bottom of the tank, some of this is broken down chemically and some of it is not.

When your company signed up the solvent service company, someone had to answer some questions to make sure that you were provided with a tank that could handle your type of business. In some shops, that questioning process took place ten years ago. In that ten years your company has grown and the needs of your company have changed. You may have originally only needed a twenty-gallon solvent tank and new solvent every four months. Now you may need a fifty-gallon tank that is changed every two months or you may need more twenty-gallon tanks changed out more frequently.

If you are having problems with your solvent, maybe it is time to call in your local representative to make a new evaluation of your shop needs. You should also ask your representative about other solvents that might leave less residue, make sure you explain how your individual equipment works so that he can provide you with an appropriate solvent.

## Did You Know?

- Aerosol solvents like brake cleaner can help make field repairs less dirty.
- Outfitting a service truck to provide mobile hoist service can save you time and make money.
- ***Service, service calls and general service related issues are the primary reason why your customer does business with you or without you.***

For questions or comments, contact Customer Service at 1-800-560-CLIMB (2546) or [customerservice@safeworks.com](mailto:customerservice@safeworks.com).