

Industrial Cleaning Machine

Used Industrial Cleaning Machine San Jose - Commercial floor scrubbers provide an efficient, cost-effective and fast way to clean floor surfaces and are used for regular maintenance. Did you know that according to surveys, roughly ninety percent of the maintenance for flooring expenses is related to labor? Commercial floor scrubbers provide a way to clean large areas quicker and with fewer workers. There are a variety of automated commercial floor scrubbing models available on the market. More recently, advancements in technology have brought about robotic versions of commercial floor scrubbers. These machines offer an automated system for evenly dispersing the cleaning compound at regular intervals. In addition, automatic floor scrubbers include a vacuum system and are usually fitted with a squeegee attachment located at the back of the machine, behind the vacuum's suction nozzle. These machines feature separate recovery or collection tanks. The cleaning mixture is held in the dispersing tank while the collection tank is home to the material gathered by the vacuum and the liquids accumulated there. This ensures that the clean water and dirty water are kept separate which makes floor scrubbers a more hygienic alternative to traditional cleaning methods such as a mop and bucket. The automatic scrubber initially dispenses the cleaning compound via the dispensing tank. Next, the scrubbing system pushes this solution into the floor to loosen marks, stains and dirt which become suctioned back into the collection tank as the machine makes a pass.

Automatic Floor Scrubber Head Types

Automatic floor scrubbers are available in three common types of floor scrubber heads: 1. Rotary, sometimes referred to as disk; 2. Cylindrical; and 3. Square oscillating.

Rotary or Disk Floor Scrubber Head

The rotary or disk style floor scrubber head is the most common type of scrubber head. These models operate in a circular movement and some of their brushes or pads spin a cleaning compound into the floor prior to suction.

Cylindrical Floor Scrubber Head

The cylindrical floor scrubber head uses counter rotating tube style brushes that rotate at a 90 degree angle to the floor. These allow for better cleaning of uneven or irregular surfaces. Machines utilizing a cylindrical scrubber head commonly have a collection tray located behind the scrubber head that allow for collection of larger objects such as nails and stones, eliminating the need to pick up smaller objects before cleaning. Different brush styles make it easy to clean a wide variety of floor surfaces. Soft brushes can be utilized to clean synthetic floors, textured tile and rubber and harder bristles can be used for cleaning grouted tile, concrete and other harder surfaces.

Square Oscillating Floor Scrubber Head

Square oscillating floor scrubbers have a flat pad which vibrates at high speed to scrub the floor. Corners and walls can be cleaned more efficiently thanks to the square head design. These machines can remove the floor finish when the square scrubbing heads are used in conjunction with special stripping pads. This combination additionally is helpful for cleaning vinyl tile flooring. Due to the high-speed oscillation, the square pads deliver more agitation and floor cleaning power. Cleaning grouted tile is much easier when these oscillating pads are utilized.

Floor Scrubber Categories

Four main categories comprise the floor scrubber family including Stand-on, Walk-behind, Robotic and Rider models.

Walk-Behind Floor Scrubbers

There is a forward assist feature on walk-behind floor scrubbing models that helps to propel the unit forward when the operator enables this mechanism. The forward assist mechanism can help eliminate operator fatigue by enabling the operator to work longer in comparison to manual and traditional methods.

Stand-On Floor Scrubbers

Stand-on floor scrubbers offer an increased efficiency for greater areas than a walk-behind machine, while being more affordable than a rider floor scrubber. These machines are also typically smaller than a rider machine so can fit into areas a rider floor scrubber could not and have increased maneuverability. Since the operator is standing, these units provide better line-of-sight compared to walk-behind and rider models.

Rider Floor Scrubbers

Rider floor scrubbers allow for the operator to be seated on the machine while operating. The rider models allow the operator to sit during the entire cleaning process, thus helping to reduce fatigue as they clean the floors. These models are more efficient compared to the walk-behind units, offering 65% more efficiency, enabling larger areas of the floor

to be cleaned with ease. Robotic Floor Scrubbers Advancements in technologies in the autonomous robotics field have produced a new niche of floor-scrubbing robots. These units were born by joining self-control robotic features with automatic floor scrubbing options. Commercial floor scrubbers are commonly found in manufacturing facilities, healthcare, retail and education centers. Certain robotic commercial units are capable of cleaning an area up to ten thousand square feet in one hour. With continuous development in robotic technology, the advancement of robotic floor scrubbers will intensify over the years. Increased development projections include advanced sensors and computing mechanisms. The latest advancements in mobile robotic sensors enable these floor scrubbing units to detect a wider range around walls and objects. This will allow the machine to determine its exact location in larger environments, such as shopping malls, convention centers and airports. A random cleaning pattern was first established with the initial floor scrubbing models. However, commercial robotic floor scrubbers are now able to create an accurate plan for cleaning. These machines travel in a consistent and predictable manner every time they are in operation. Because of these advancing capabilities which allow these robotic floor scrubbers to know precisely where they have already cleaned and what areas they must still clean, they miss very few, if any, areas of the floor. Robotic floor scrubbers are also designed to navigate around people and obstacles that they encounter during autonomous operation.

Additional Floor Scrubber Options and Considerations

Hard to Reach Areas Many floor scrubbers are unable to reach edges, corners or under or around fixtures such as water fountains. This normally translates to certain locations requiring to be cleaned in traditional methods. There are oscillating brush decks available for certain floor scrubbing models to help them deal with hard-to-reach areas.

Pre-Sweeping and Vacuum System Maintenance Newer floor scrubbers usually include an option that allows for a pre-sweep prior to the wet scrub. These upgrades increase efficiency and cleanliness by allowing the operator to do everything with the machine. Loose items and dust are collected by the pre-sweep brush head and placed into the collection chamber located in front of the vacuums system. This helps to avoid a blockage in the vacuum hose or motor. Previously, the cleaning crew was required to dry mop or sweep the location before employing the floor scrubber to collect any dust and debris that might harm the machine. If blockages in the vacuum system do occur, the vacuum hose might need to be removed to clear the blockage. In some cases, the vacuum motor might need to be blown out using compressed air.

Environmental Options Environmentally friendly options are also available on some floor scrubbers. There are more environmental features incorporated into certain designs including safer soaps and water-saving systems to reduce the greywater and the chemicals. Some floor scrubbers are even able to clean without water and chemicals at all.

Solution Dispensing System Maintenance and Considerations Stripping solutions are not compatible with most floor scrubbers as they can cause damage to the solution dispensing system. However, they can still be vacuumed up by the machine without damage. It is wise to flush the solution system periodically with a mix of vinegar and water to remove any calcium and soap deposits that may accumulate over time.