

## **Industrial Cleaning Machine**

Used Industrial Cleaning Machine Fremont - Save hours of time by relying on commercial floor scrubbers to provide an efficient method for cleaning and maintaining floors in an efficient manner. Surveys reveal that labor expenses account for approximately 90% of the overall expense to maintain large floors surfaces. 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. Technology has advanced and commercial floor scrubbers have robotic upgrades to simplify their design. Commercial floor scrubbers have an automated system for dispensing their cleaning compounds more efficiently. 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 units also have separate dispensing and collection or recovery tanks. There are two tanks on the machine; the cleaning mixture is situated in the dispersing tank and the collection tank is where the materials collected by the vacuum accumulate. Having separation between dirty water and clean water creates a more sanitary cleaning option. The automatic scrubber operates by first dispensing the cleaning compound from the dispensing tank, then using the scrubbing system, to push the cleaning compound into the floor surface and loosen dirt, stains and marks which are then quickly suctioned into the machine's collection tank as the unit makes its pass over an area. 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 disk or rotary model of floor scrubber head is the most popular kind. 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 Rotating at a 90-degree angle to the floor, the cylindrical floor scrubber model features counter-rotating tube designed brushes to facilitate cleaning. This style of brushes facilitates better cleaning for irregular or uneven 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. A softer brush can be used to clean rubber, textured tile and synthetic floors while a stiffer brush can be used for rough surfaces such as concrete and grouted tile. Square Oscillating Floor Scrubber Head There is a flat pad on square oscillating floor scrubbing models that vibrate at high speed to clean the floor. Corners and walls can be cleaned more efficiently thanks to the square head design. When used with a special stripping pad, square scrubber heads are able to strip floor finish from a floor. This combination additionally is helpful for cleaning vinyl tile flooring. The square pads oscillate at high speeds, producing higher agitation, resulting in extra cleaning power. These square pads are useful for cleaning grouted tile. Floor Scrubber Categories There are four categories of floor scrubbers: Robotic, Rider, Stand-on and Walk-behind. 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. Stand-on floor scrubbers offer increased maneuvering capacity and are smaller than rider models, making them capable of accessing more locations. Since the operator is standing, these units provide better line-of-sight compared to walkbehind and rider models. Rider Floor Scrubbers The rider units allow the operator to be seated while the machine is in operation. They work in much the same way as the stand-on floor scrubbers but require even less effort because of the ability to sit comfortably, reducing fatigue. This design facilitates up to sixty-five percent more efficiency in comparison to the walk-behind models and allows large areas of the floor to be

covered more efficiently. Robotic Floor Scrubbers Advancements in technologies in the autonomous robotics field have produced a new niche of floor-scrubbing robots. Robotic floor scrubbing models were created by combining robotic self-control options with automatic floor scrubbing technology. Commercial models are suitable for education, retail, healthcare and manufacturing facilities. Certain robotic commercial units are capable of cleaning an area up to ten thousand square feet in one hour. As exciting new developments in robotic continue to develop, it is expected that the capability of robotic floor scrubbers will increase over time. Improved computing technology and better sensors are some of the noted areas expected to become even more efficient. 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. Nowadays, commercial robotic floor scrubbers can execute an accurate map for cleaning. Newer floor scrubbing models operate in a predictable pattern to cover the floor as efficiently as possible. Floor scrubber units clean more effectively than ever before thanks to their advanced technology. 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 It is difficult for floor scrubbing machines to reach certain corners, edges or around water fountains or similar fixtures. This would normally necessitate mopping in these areas too small to fit an automatic floor scrubber. However, some manufacturers now produce floor scrubbers with oscillating brush decks which allow the scrubber to reach these difficult areas. Pre-Sweeping and Vacuum System Maintenance Advanced models feature a pre-sweep option and vacuum system to be used before the wet scrub. This feature allows for removal of debris before scrubbing without the need for a traditional broom or dry mop. The pre-sweep brush head and collection chamber is placed in front of the vacuum system to collect dust and loose debris before it is able to reach the the vacuum system. Blockages to the vacuum hose or motor are avoided with this pre-sweep brush head and collection design. 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. Similar to residential vacuum systems, if a blockage happens, the vacuum hose may need to be removed to clear the area. In some cases, the vacuum motor might need to be blown out using compressed air. Environmental Options Certain floor scrubbing models have environmentally friendly options. Safe soaps and water-saving systems work to save on both the number of chemicals used as well as the amount of greywater produced. Certain floor scrubbers are available to clean without any water or chemicals. 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. These solutions can be vacuumed up safely without causing damage to the machine. It is recommended maintenance to use a vinegar and water mixture to periodically flush out the solution system to remove any soap or calcium deposits.