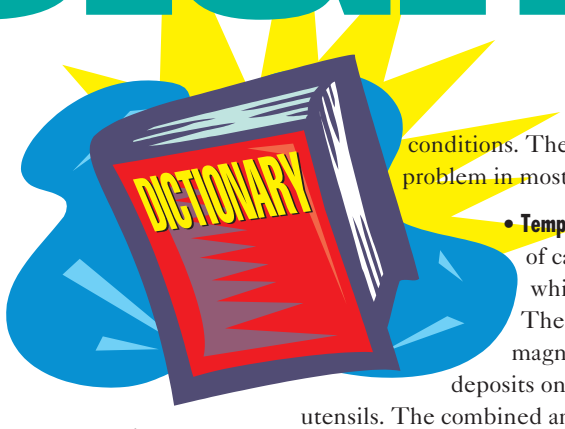
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INSIGHTS

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CLEANING COMPOUND TERMINOLOGY



We use these terms everyday. Your local ChemStation Sales Representative uses them in conversation with you, but, what exactly are they saying? Follow the definitions below as good "rule of thumb" descriptors.

Chelating Agent (frequently called sequestering agent or sequestrant): An additive used in cleaning compounds that prevents hardness elements and salts of calcium and magnesium from depositing on equipment surfaces. (See: **Sequestrant**)

Emulsification: A complex action consisting of a physical breakdown of fats and oils into smaller particles that are dispersed throughout the cleaning compound. The soil is still present, but is reduced in physical size.

Rinsibility: The ability of a cleaning compound to be easily removed from a surface with minimal amount of residue.

Saponification: The action of an alkaline material on an insoluble soil, such as animal fat, to produce a soluble, crude soap.

Sequestrant (sometimes called chelating agent): An inorganic ingredient that is blended with cleaning compounds to prevent the precipitation of unstable salts that contribute to water hardness. These unstable salts will break down in the presence of alkaline cleaning compounds or at high temperature. Many alkaline cleaning compounds are more effective at an elevated temperature. However, a high-temperature cleaning solution contributes to the precipitation of calcium and magnesium carbonates (commonly called scale). A sequestrant is a chemical agent that "ties up" calcium and magnesium ions in a solution to prevent the formation of insoluble "curds" with the cleaning detergent, which results in precipitation deposits. (See: **Chelating Agent**)

Surfactant: A complex molecule that, when blended with a cleaning compound, reduces the surface tension of water to permit closer contact between the soil deposit and the cleaning compound.

Water Hardness: The amount of salts (such as calcium chloride, magnesium chloride, sulfates and bicarbonates) present in water.

- **Permanent Hardness** refers to calcium and magnesium chlorides and sulfates in water. These salts are rather stable and are soluble under most conditions. The stable salts pose a minimal cleaning problem in most conditions.
- **Temporary Hardness** is caused by the presence of calcium and magnesium bicarbonates, which are relatively soluble, but unstable. The unstable condition of calcium and magnesium bicarbonates contributes to white deposits on equipment, heat exchangers and water utensils. The combined amount of permanent and temporary hardness is referred to as total hardness.

Water Softening: A condition caused by the removal or inactivation of the calcium and magnesium ions in water. This is accomplished by chelation, precipitating calcium and magnesium as insoluble salts through a precipitating agent, and by ion exchange involving replacement of calcium and magnesium (as is accomplished by commercial water softeners).

Wetting: Caused by the resultant action of a surfactant that is capable of wetting or penetrating the soil deposit to begin the loosening process from the surface. ■

A LOOK AT AUGUST

August is "Admit You're Happy Month" sponsored by the Secret Society of Happy People and encourages people to express happiness and discourage parade-raining. The first week in August is "Simplify Your Life Week" (a week to encourage people to simplify their lives and reduce clutter, thereby reducing stress and acquiring a happier and more peaceful lifestyle). Believe it or not, the first US Census was taken on August 1, 1790 and the population was 3,939,214. On August 4, 1693, Dom Perignon invented champagne. (We'll drink to that!) August 5, 1914 begins a new era as the first traffic light is installed at the corner of Euclid Ave. and E. 105th St., in Cleveland, OH. It was August 12, 1955 when President Eisenhower raised the minimum wage from $0.75 to $1 an hour. On August 21, 1959, the same president signed a proclamation admitting Hawaii to the Union as the 50th state. Rounding out the month, on August 28, 1907, United Parcel Service begins service in Seattle.



PROTECTION FROM VIRUSES



If your business has not been hit with a virus attack yet, count yourself lucky. The spread of e-mail viruses continue to be an upward trend. The Better Business Bureau suggests your business take the following security measures to help guard your computer systems from viruses:

Regularly check for suspicious activity. Almost all firewalls, encryption programs and password schemes include an auditing function that records activities on the network.

Educate employees. Develop and enforce a company-wide computer and physical security policy, one that instructs employees: not to open e-mail from unknown sources, what to do when they receive suspicious e-mails (when in doubt, delete), to disconnect from the Internet when not on-line, to consider the risks of file-sharing, how to perform data back-up procedures and actions to take if their computer becomes infected. ■

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Cleaning Humor that Makes Sense



- Having layers of dirty film on windows can protect your skin from the harmful and damaging rays of the sun. Think of it as giving you and your family an SPF factor of 17, and feel good that you are doing your part in preventing sun damage to the skin.
- Those cobwebs that hang so beautifully from the lampshade are actually cutting down the glare from the light bulb.
- If the amount of pet hair found clogging up against the doorways has started to be noticed, explain away others' worries by telling them that the hair is there to block out the draft and that it therefore will improve the health of the entire family.
- If you haven't dusted for a while, then grab a fancy urn, place it near the dust and claim that this is where your grandmother wanted her ashes scattered. This is guaranteed to stop the idle criticism of your dusty home.
- Mix a half-cup of lemon-scented housecleaner with enough water to fill a spray bottle. Mist the air lightly, just before family members arrive. Leave a few rags dampened with the mixture here and there so that others will see them. Put on your best, exhausted look and sit down and say, "I've been cleaning all day and this place is still a mess." ■



Send your comments to:

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Soapbox

Flexible people never get bent out of shape.

Time, n. Nature's way of preventing everything from happening at once.

Minds are like parachutes – they only function when open. – *Thomas Dewar*

Don't knock the weather. If it didn't change once in a while, nine out of ten people couldn't start a conversation.

Too much of a good thing is wonderful.

Laws are like sausages. It's better not to see them being made.

If at first you don't succeed, find out if the loser gets anything.

The human race is faced with a cruel choice: work or daytime television.

Superstition, n. A premature explanation that overstays its time.

Nothing beats reading a good book when there is work to do.

History is the version of past events that people have decided to agree upon – *Napoleon Bonaparte*

If you want the rainbow, you gotta put up with the rain.

You're smart when you only believe half of what you hear. Wise is when you know which half to believe.

Ambition is a poor excuse for not having enough sense to be lazy.

If one is a tooth and a whole set are teeth, why shouldn't the plural of booth be called beeth?

Snails can sleep for three years without eating.

Did you know? Months that begin on a Sunday will always have a "Friday the 13th."

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