IS YOUR STERI-CENTER UP TO SCICAN’S SPECS?
In part two of a four-part series, we define “predictable” as the second part of SciCan’s SPECs.

Safety
Redicable
Efficient
Compliant

We discussed Safety in our first article and we will discuss “efficient” and “compliant” in future articles.

Paul O’Neill stood on the stage prepared to give his first speech as CEO of Alcoa, the aluminum manufacturing giant. The company’s profits were a mess. Naturally, investors were nervous and keen to hear what the new CEO had to say about profit margins, revenues and how to salvage the company. As O’Neill takes the stage the room falls silent.

“I want to talk to you about worker safety,” O’Neill begins. “Every year, numerous Alcoa workers are injured so badly that they miss a day of work. Our safety record is better than the general American workforce, especially considering that our employees work with metals that are 1500 degrees and machines that can rip a man’s arm off. But it’s not good enough. I intend to make Alcoa the safest company in America. I intend to go for zero injuries.”

An audience member raised his hand and asked about inventories.

“I’m not certain you heard me. If you want to understand how Alcoa is doing, you need to look at our workplace safety figures.”

An uncomfortable panic began to sink in and as soon as the presentation ended investors began calling their clients and ordering them to sell their stocks ASAP. “The board put a crazy hippie in charge, and he’s going to kill the company!”, one investor proclaimed. He followed this up with “It was literally the worst piece of advice I gave in my entire career.”

Charles Duhigg relays this story in his best-seller “The Power of Habit”. Not only did lost injury workdays decline by over 90%, the company quintupled its profits and its market capitalization rose by
$27 billion. Focusing on safety had a ripple effect throughout the organization. By instilling automation, redundancy, and reliability in the processes at ALCOA, O’Neill was able to implement predictable outcomes.

The second installment of the SciCan SPEC series focuses on ensuring Predictable results in the dental setting. Instrument reprocessing should produce clean, dry, and sterile instruments every time, on time.

Unreliable work practices, instrument cleaning equipment, and sterilization methods result in inconsistent results, adds unnecessary stress, and makes it difficult for offices to stay on schedule. Automation, redundancy, and reliability are three keys to ensuring predictable results in dental sterilization as much as it did for Alcoa.

With numerous external agencies with a vested interest in the safety of our practices, we can’t afford to not have predictable outcomes when it comes to disinfection and sterilization:

Occupational Safety and Health Administration (OSHA)
  • Bloodborne Pathogens Standard
  • Hazard Communications Standard
State Dental Boards
Centers for Disease Control and Prevention (CDC)
  • 2003 CDC Dental Guidelines and 2016 CDC Dental Update
Environmental Protection Agency (EPA)
  • Hospital-level disinfectants, hazardous waste disposal, infectious waste
Food and Drug Administration (FDA)
  • Regulates manufacturers of medical devices, sterilizers, high-level disinfectants

The right type and quantity of equipment and instruments protects employees, saves time and produces consistent results. Automated systems are preferred because they decrease the opportunities for employee injury. The less a team member is exposed to a contaminated sharp, the less likely the chance of an occupational exposure. And training employees on proper instrument
reprocessing ensures consistent outcomes. In this case, redundancy in an established protocol for transport, cleaning, sterilization and storage will contribute to sterile instruments. The thoughts that go into the purchase of products should include whether they will produce the desired effect. The less thought that must go into a process, the less likelihood for an error or injury.

Predictability in the sterilization area can be enhanced by the various products in use. Transport containers should be solid on the sides and bottom, with a lid that fastens securely and with appropriate labeling. Handpiece units should provide consistent purge time, cleaner and lubricant use. Automation can save time as many modern units can process multiple handpieces at a time.

Ultrasonic cleaners and instrument washers have established time settings and cleaning performance. Some units even have data logging and remote troubleshooting to notify the user if there is an error, sometimes before the user is even aware. Again, this is an area where mechanical means of cleaning is obviously safer than cleaning by hand.

Sterilizers should provide sterile, dry instruments every time instruments are removed, and the packaging should remain intact throughout handling and storage until instruments are ready to be used on the patient. A wet packet is an indication something went wrong with this step. Wet packets should not be placed on a counter to dry and should be considered contaminated. Chemical indicators on and in packaging should change color after each cycle as an initial indication the instruments have been processed. Some units have a feature that notifies the office if any of the critical parameters were not met successfully. This is especially helpful in a busy practice where observation of the mechanical settings is not routinely observed, or, when there is no printer to convey errors.

Disinfectants should be EPA registered, with a tuberculocidal claim and compatible with almost all dental surfaces and equipment. Follow the manufacturer’s recommendation on whether it is a single-
step or multi-step product, don appropriate PPE when handling, and adhere to the contact time indicated on the label.

Protecting the patient and the team involves a system that has predictable results. Getting buy-in when building a culture of safety must begin with the “Why” of what we do. A team isn’t likely to be motivated just because they are told they must do something per OSHA or the CDC. They also won’t do it even when licenses and fines hang in the balance. If the purpose and the reason behind what they do is succinct and clear, they are more likely to adopt a process as habit. The gentle nudge comes in making the process easier.

As O’Neill concluded in his first culture-changing speech, embracing safety occurs if everyone in the organization agrees what they do is important, not just because it’s what they’re supposed to do. “It will be because the individuals at this company have agreed to become part of something important: They’ve devoted themselves to creating a habit of excellence. Safety will be an indicator that we’re making progress in changing our habits across the entire institution. That’s how we should be judged.”

**CDC Infection Control Guidelines**

For more information on SciCan’s steri-center SPECs go to: https://www.scican.com/us/scicanspec/

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