Reduce Waste. Elevate the Environment.

Sustainability Strategies & Initiatives for the Operating Room

ORs are resource-intensive, contributing up to 30% of hospital waste. Because of this, they're rich with opportunities for improvement. Optimizing efficiency and decreasing waste generation can help hospitals improve the environment, save money, and enhance patient health.

A study from the October 2021 issue of The Joint Commission Journal on Quality and Patient Safety (JQPS) revealed evidencebased green practices that are a great starting point to a more environmentally friendly OR.

Form a Green Team

Create a dedicated OR committee or a hospital Green Team including participants from nursing, anesthesiology, material management, surgery, nutrition, environmental services, marketing, and other departments.

Segregate OR Waste

Provide more education, increase vigilance, and execute waste audits to improve the dedicated segregation of OR hazardous waste, solid waste, and regulated medical waste.

Reduce Waste

Divert waste away from landfills. Shift the supply chain toward reusable devices, recycle OR materials and supplies, repurpose instruments, and donate items no longer in use.



Evaluate Anesthetic Gases

Transition away from inhaled anesthetics and use low flow after anesthesia induction and during maintenance, turn off fresh gas flow (FGF) during intubation while leaving the vaporizer at its set, and use regional or total intravenous anesthesia when clinically appropriate.

Minimize Unnecessary Devices & Packaging

Reduce unnecessary packaging and decrease the number of instruments opened per surgery.



Educate OR Staff

Educate OR staff on recycling waste reduction, regulated medical waste (RMW) disposal, anesthetic agent choice and flow rate reduction, and other sustainable tactics and strategies.

Consumption

Power down idle ORs, install LED lights, switch to less carbon-intensive energy sources, and decrease air changes per hour during unoccupied OR times.

Reduce Water Consumption

Curtail energy and water usage by converting to alcohol-based antiseptic scrubs, employ motion sensors at sinks to reduce the water volume, and utilize more efficient steam sterilizers.

Change Surgical Venues

Shift surgeons' practices out of the OR and into outpatient surgery or clinical environments.





DONATE

Donate Medical Supplies

Donate expired clinical materials to enhance simulation education for health care providers and give unused medical equipment and supplies to medical missions to aid the developing world.



Journal on Quality and Patient Safety®

Health care professionals can make a difference, reducing environmental and financial costs for hospitals and, ultimately, improving the health of our planet and our patients by working together toward greener ORs.

To learn more about this study, visit:

jointcommissionjournal.com/article/S1553-7250(21)00162-8/fulltext