

Technology for License Summary

The Ultrasonic Holster is a secure, heat-resistant tray that stores and protects ultrasonic scalpels during surgical procedures

Ultrasonic Scalpel Holder

Background

Ultrasonic scalpels are typically used in procedures in the neck and head area. These devices come in various shapes and sizes and utilize ultrasonic vibration at the tip of the scalpel for cutting, coagulation, and dissection. The vibration causes high heat buildup after prolonged use. During surgery, patients are under anesthesia and receiving oxygen and other potentially flammable gasses. The surrounding surgical area also includes linens, fabrics and other materials that, in combination with the scalpels, could create a combustible event. Operating room fires are a constant risk, and safety measures must be in place to ensure patient and provider safety. Current ultrasonic scalpel manufacturers do not provide holders for their products. Independent suppliers provide generic options, but they are ineffective in managing the various scalpels and thus compromise accessibility and safety.

Technology

The Ultrasonic Scalpel Holder is a multi-purpose tray designed to accept and store ultrasonic scalpels during surgical procedures. The holder is designed to accept the majority of scalpels on the market. Ultrasonic scalpels are connected to a power source, typically located towards the feet of the patient. As scalpel cords extend up the legs of the patient, the holder is intended to be positioned on the patient's torso. The holder is held in place via adhesive strips on the underside and affixed to the surgical linens. Forceps can also be used to hold it in place. The holder is made of high-temperature, thermoset plastic and includes features to manage and separate multiple scalpels and cords while maintaining easy accessibility. Surrounding walls, varied surfaces and partitions within the holder help protect patient and provider while preventing inadvertent tip contact. To promote faster cooling of the scalpel tips, ventilation holes provide continuous airflow once scalpels are stored. The holder can also be used as an auxiliary tray for other surgical instruments during procedures.

Inventor

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Market

80% of surgeries involve devices that apply energy to tissues. In the US, 17.5 million electrosurgical procedures are performed annually. While OR fires are underreported, 550-600 occur in the US annually, 20-30 reported as severe.

Stage of Development Drawings only

For More Information Contact

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Advantages

- Holds and manages most ultrasonic scalpels on the market
- · Able to accept multiple/different scalpels at same time
- Improves OR safety measures and practices to reduce fire incidents
- Is made of heat-resistant materials and works to protect patients and staff

