



## 2016 Veterinary Medical Care Guidelines for Spay-Neuter Programs

### KEY POINTS



#### Introduction

In 2006, the Association of Shelter Veterinarians (ASV) convened a Veterinary Task Force to Advance Spay-Neuter with the goal of developing professional guidelines for high quality, high volume spay-neuter programs. The efforts of the task force culminated in the publication of “*The Association of Shelter Veterinarians’ veterinary medical care guidelines for spay-neuter programs*” in the *Journal of the American Veterinary Medical Association (JAVMA)* in 2008. In 2014, ASV reconvened its task force for the purpose of updating these guidelines, resulting in publication of the second edition of this essential document in JAVMA in 2016.

The ASV believes that spay-neuter programs represent a crucial component of community efforts to reduce the sheltering and euthanasia of unwanted and unowned cats and dogs. Furthermore, ASV believes that, as with all aspects of veterinary care, defined guidelines assist the profession in ensuring high quality veterinary care. The 2016 guidelines provide evidence-based recommendations in six key areas:

- Patient care and clinical procedures
- Preoperative care
- Anesthetic procedures
- Surgical care
- Postoperative care
- Operations management

#### Guidelines for patient care and clinical procedures

Quality patient care during sterilization procedures begins long before the patient is placed on the surgical table. Appropriate patient housing, safe and humane animal handling, infectious disease control, accurate record keeping, and thoughtful contingency plans for emergency situations are all critical to the successful delivery of high quality patient care.

## **Guidelines for preoperative care**

Ensuring that patients presented to spay-neuter programs are appropriate anesthetic and surgical candidates is essential. A veterinarian must be the individual that determines a patient's eligibility for surgery. This decision should be based on evaluation of patient history and physical examination. Communication is essential to ensure that the client understands the procedures to be performed and any associated risks.

## **Guidelines for anesthetic procedures**

Safe and efficient anesthetic protocols should provide balanced anesthesia consisting of analgesia, loss of consciousness, muscle relaxation, and immobility without patient compromise. Analgesics are absolutely required for spay-neuter surgery. Appropriate perioperative care and attentive patient monitoring are essential to avoid complications. Attention should be paid to patient thermoregulation, accurate drug dosing, as well as proper equipment use and maintenance.

## **Guidelines for surgical care**

Safe, effective high-volume spay neuter can be accomplished with the highest of quality by maximizing efficiency throughout every step of the process. The use of techniques that enhance efficiency while minimizing surgical trauma serve to reduce anesthetic and surgical times, resulting in fewer complications and improved patient recovery. Attention should be paid to the operating environment, patient preparation and positioning, aseptic technique, gentle tissue handling, meticulous hemostasis, and use of appropriate medical grade materials. There are numerous acceptable surgical techniques for spay and neuter, and the selection of the specific techniques to be used should be based on surgeon's preference and the unique needs of each individual patient.

## **Guidelines for postoperative care**

Providing patients with a smooth transition from an anesthetized state to wakeful comfort for return to their home environments requires vigilance and diligent attention to detail. Patients should be assessed immediately after surgery to ensure that their individual needs are recognized and addressed. Recovery should be accomplished in a location that allows direct patient observation and monitoring. Personnel should be trained to detect postoperative complications and should be skilled in appropriate intervention when complications occur. Appropriate use of analgesic agents is required, but is not a substitute for effective atraumatic surgical technique. Communication with clients regarding postoperative care and observation for postoperative complications is essential.

## **Guidelines for operations management**

Operations management is a proactive approach involving continuous, strategic planning, control, and improvement in order to effectively and efficiently produce and deliver services. Patient care is delivered in a series of coordinated "handoffs" in which defined tasks are performed in accordance with accepted medical guidelines. Standard operating procedures and the use of checklists are recommended to ensure the highest quality of patient care. Data is routinely collected to allow periodic analysis and systematic improvement. Staff should be appropriately trained and personnel health and safety should be a priority with attention paid to perioperative ergonomics to maximize staff health, productivity, and long-term sustainability.

## **Conclusions**

Spay neuter programs have become an integral component of veterinary medicine and provide an essential service to communities, especially to at-risk and underserved animals. Spay-neuter clinics are often the first exposure clients and patients have to veterinary medicine and become the gateway to veterinary services through full-service veterinary practices. At present, these programs are the most effective approach for reducing impoundment and euthanasia in animal shelters. Following the ASV's veterinary medical care guidelines for spay-neuter programs will help maximize efficiency, while providing safe, high quality patient care.

The mission of the ASV is to advance and support the practice of shelter medicine in order to improve community animal health and well-being. As such, we are unable to respond to individual questions regarding animal care, shelter operations, allegations of animal cruelty or engage in political advocacy.