

Veterinary Technicians and Technologists Overview

Overview - Preparation -
Day in the Life - Employment and Earnings -
Career Path Forecast - Professional Organizations

Overview

Owners of pets and other animals today expect state-of-the-art veterinary care. To provide this service, veterinarians use the skills of veterinary technologists and technicians, who perform many of the same duties for a veterinarian that a nurse would for a physician, including routine laboratory and clinical procedures. Although specific job duties vary by employer, there often is little difference between the tasks carried out by technicians and by technologists, despite some differences in formal education and training. As a result, most workers in this occupation are called technicians.



Veterinary technologists and technicians typically conduct clinical work in a private practice under the supervision of a veterinarian -- often performing various medical tests along with treating and diagnosing medical conditions and diseases in animals. For example, they may perform laboratory tests such as urinalysis and blood counts, assist with dental prophylaxis, prepare tissue samples, take blood samples, or assist veterinarians in a variety of tests and analyses in which they often utilize various items of medical equipment, such as test tubes and diagnostic equipment.

While most of these duties are performed in a laboratory setting, many are not. For example, some veterinary technicians obtain and record patients' case histories, expose and develop x rays, and provide specialized nursing care. In addition, experienced veterinary technicians may discuss a pet's condition with its owners and train new clinic personnel. Veterinary technologists and technicians assisting small-animal practitioners usually care for companion animals, such as cats and dogs, but can perform a variety of duties with mice, rats, sheep, pigs, cattle, monkeys, birds, fish, and frogs. Very few veterinary technologists work in mixed animal practices where they care for both small companion animals and larger, nondomestic animals.



Besides working in private clinics and animal hospitals, veterinary technologists and technicians may work in research facilities, where they may administer medications orally or topically, prepare samples for laboratory examinations, and record information on an animal's genealogy, diet, weight, medications, food intake, and clinical signs of pain and distress. Some may be required to sterilize laboratory and surgical equipment and provide routine postoperative care. At research facilities, veterinary technologists typically work under the guidance of veterinarians, physicians, and other laboratory technicians. Some veterinary technologists vaccinate newly admitted animals and occasionally are required to euthanize seriously ill, severely injured, or unwanted animals.

While the goal of most veterinary technologists and technicians is to promote animal health, some contribute to human health as well. Veterinary technologists occasionally assist veterinarians as they work with other scientists in medical-related fields such as gene therapy and cloning. Some find opportunities in biomedical research, wildlife medicine, the military, livestock management, or pharmaceutical sales.

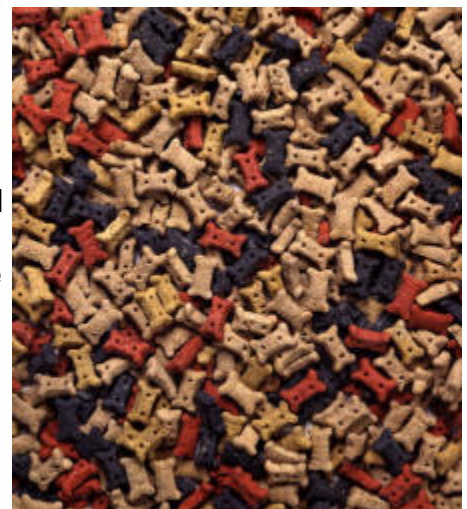


Preparation

There are primarily two levels of education and training for entry to this occupation: a 2-year program for veterinary technicians and a 4-year program for veterinary technologists. Most entry-level veterinary technicians have a 2-year degree, usually an associate's degree, from an accredited community college program in veterinary technology in which courses are taught in clinical and laboratory settings using live animals. About 15 colleges offer veterinary technology programs that are longer and that culminate in a 4-year bachelor's degree in veterinary technology. These 4-year colleges, in addition to some vocational schools, also offer 2-year programs in laboratory animal science. Approximately 5 schools offer distance learning.



In 2004, 116 veterinary technology programs in 43 States were accredited by the American Veterinary Medical Association (AVMA). Graduation from an AVMA-accredited veterinary technology program allows students to take the credentialing exam in any State in the country. Each State regulates veterinary technicians and technologists differently; however, all States require them to pass a credentialing exam following coursework. Passing the State exam assures the public that the technician or technologist has sufficient knowledge to work in a veterinary clinic or hospital. Candidates are tested for competency through an examination that includes oral, written, and practical portions and that is regulated by the State Board of Veterinary Examiners or the appropriate State agency. Depending on the State, candidates may become registered,



"Veterinary Technicians and Technologists Overview"

Prepared as part of the Sloan Career Cornerstone Center (www.careercornerstone.org)

licensed, or certified. Most States, however, use the National Veterinary Technician (NVT) exam. Prospects usually can have their passing scores transferred from one State to another, so long as both States utilize the same exam.

Employers recommend American Association for Laboratory Animal Science (AALAS) certification for those seeking employment in a research facility. AALAS offers certification for three levels of technician competence, with a focus on three principal areas—animal husbandry, facility management, and animal health and welfare. Those who wish to become certified must satisfy a combination of education and experience requirements prior to taking an exam. Work experience must be directly related to the maintenance, health, and well-being of laboratory animals and must be gained in a laboratory animal facility as defined by AALAS. Candidates who meet the necessary criteria can begin pursuing the desired certification on the basis of their qualifications. The lowest level of certification is Assistant Laboratory Animal Technician (ALAT), the second level is Laboratory Animal Technician (LAT), and the highest level of certification is Laboratory Animal Technologist (LATG). The examination consists of multiple-choice questions and is longer and more difficult for higher levels of certification, ranging from 2 hours for the ALAT to 3 hours for the LATG.

Persons interested in careers as veterinary technologists and technicians should take as many high school science, biology, and math courses as possible. Science courses taken beyond high school, in an associate's or bachelor's degree program, should emphasize practical skills in a clinical or laboratory setting. Because veterinary technologists and technicians often deal with pet owners, communication skills are very important. In addition, technologists and technicians should be able to work well with others, because teamwork with veterinarians is common. Organizational ability and the ability to pay attention to detail also are important.



Technologists and technicians usually begin work as trainees in routine positions under the direct supervision of a veterinarian. Entry-level workers whose training or educational background encompasses extensive hands-on experience with a variety of laboratory equipment, including diagnostic and medical equipment, usually require a shorter period of on-the-job training. As they gain experience, technologists and technicians take on more responsibility and carry out more assignments under only general veterinary supervision. Some eventually may become supervisors.

► Accredited Programs

Accreditation represents the highest standard of achievement for veterinary medical education in the United States. Institutions that earn accreditation for an individual program confirm their commitment to quality and continuous improvement through a rigorous and comprehensive peer review. Accreditation standards are set by the Committee on Veterinary Technician Education and Activities (CVTEA) of the American Veterinary Medical Association. Most accredited programs are at the associate's degree level; sixteen that offer bachelor's degrees; and nine offer distance learning. The following states do not have AVMA-accredited veterinary technology programs: Alaska, Arkansas, District of Columbia, Hawaii, Montana, and Rhode Island. Be sure to check the status of a program's accreditation with CVTEA which differentiates between full, provisional, and probational accreditation.

"Veterinary Technicians and Technologists Overview"

Prepared as part of the Sloan Career Cornerstone Center (www.careercornerstone.org)

<p>Alabama</p> <ul style="list-style-type: none"> • <u>Jefferson State Community College</u> <p>Arizona</p> <ul style="list-style-type: none"> • <u>Kaplan College</u> • <u>Mesa Community College</u> • <u>Penn Foster College</u> • <u>Pima Community College</u> <p>California</p> <ul style="list-style-type: none"> • <u>California State Polytechnic University-Pomona (Bachelor's)</u> • <u>Cosumnes River College</u> • <u>Foothill College</u> • <u>Hartnell College</u> • <u>Los Angeles Pierce College</u> • <u>Mt. San Antonio College</u> • <u>Western Career College-Citrus Heights Campus</u> • <u>Western Career College-Pleasant Hill</u> • <u>Western Career College-Sacramento</u> • <u>Western Career College-San Jose</u> • <u>Western Career College-San Leandro</u> • <u>Western Career College-Stockton Campus</u> • <u>Yuba College</u> <p>Colorado</p> <ul style="list-style-type: none"> • <u>Bel-Rea Institute of Animal Technology</u> • <u>Colorado Mountain College</u> • <u>Community College of Denver</u> • <u>Front Range Community College</u> <p>Connecticut</p> <ul style="list-style-type: none"> • <u>NW Connecticut Community College</u> • <u>Quinnipiac University (Bachelor's)</u> <p>Delaware</p> <ul style="list-style-type: none"> • <u>Delaware Technical and Community College</u> <p>Florida</p> <ul style="list-style-type: none"> • <u>Brevard Community College</u> • <u>Miami-Dade College</u> • <u>St. Petersburg College (Associate's and Bachelor's)</u> <p>Georgia</p> <ul style="list-style-type: none"> • <u>Athens Technical College</u> • <u>Fort Valley State University (Associate's and Bachelor's)</u> • <u>Gwinnett Technical College</u> • <u>Ogeechee Technical College</u> <p>Idaho</p> <ul style="list-style-type: none"> • <u>College of Southern Idaho</u> <p>Illinois</p> <ul style="list-style-type: none"> • <u>Parkland College</u> • <u>Joliet Junior College</u> • <u>Vet Tech Institute at Fox College</u> <p>Indiana</p> <ul style="list-style-type: none"> • <u>Purdue University (Associate's and Bachelor's)</u> • <u>The Vet Tech Institute at International</u> 	<p>Nebraska</p> <ul style="list-style-type: none"> • <u>Nebraska College of Technical Agriculture</u> • <u>Northeast Community College</u> • <u>Vatterott College</u> <p>Nevada</p> <ul style="list-style-type: none"> • <u>The College of Southern Nevada</u> • <u>Pima Medical Institute</u> • <u>Truckee Meadows Community College</u> <p>New Hampshire</p> <ul style="list-style-type: none"> • <u>Great Bay Community College</u> <p>New Jersey</p> <ul style="list-style-type: none"> • <u>Camden County College</u> • <u>Northern New Jersey Consortium for Veterinary Technician Education</u> <p>New Mexico</p> <ul style="list-style-type: none"> • <u>Central New Mexico Community College</u> • <u>San Juan College</u> <p>New York</p> <ul style="list-style-type: none"> • <u>Alfred State College</u> • <u>La Guardia Community College</u> • <u>Medaille College</u> • <u>Mercy College (Bachelor's)</u> • <u>State University of New York-Canton</u> • <u>State University of New York-Delhi (Associate's and Bachelor's)</u> • <u>State University of New York-Ulster</u> • <u>Suffolk Community College</u> <p>North Carolina</p> <ul style="list-style-type: none"> • <u>Asheville-Buncombe Technical Community College</u> • <u>Central Carolina Community College</u> • <u>Gaston College</u> <p>North Dakota</p> <ul style="list-style-type: none"> • <u>North Dakota State University (Bachelor's)</u> <p>Ohio</p> <ul style="list-style-type: none"> • <u>Columbus State Community College</u> • <u>Cuyahoga Community College</u> • <u>UC Raymond Walters College</u> • <u>Stautzenberger College</u> • <u>Stautzenberger College - Strongsville</u> • <u>Vet Tech Institute at Bradford School</u> <p>Oklahoma</p> <ul style="list-style-type: none"> • <u>Murray State College</u> • <u>Oklahoma State University - Oklahoma City</u> • <u>Tulsa Community College</u> <p>Oregon</p> <ul style="list-style-type: none"> • <u>Portland Community College</u> <p>Pennsylvania</p> <ul style="list-style-type: none"> • <u>Harcum College</u> • <u>Johnson College</u> • <u>Lehigh Carbon & Northampton Community Colleges</u> • <u>Manor College</u> • <u>The Vet Tech Institute</u>
--	--

"Veterinary Technicians and Technologists Overview"

Prepared as part of the Sloan Career Cornerstone Center (www.careercornerstone.org)

<p>Iowa</p> <ul style="list-style-type: none"> • <u>Business College at Fort Wayne</u> • <u>Des Moines Area Community College</u> • <u>Iowa Western Community College</u> • <u>Kirkwood Community College</u> <p>Kansas</p> <ul style="list-style-type: none"> • <u>Colby Community College</u> <p>Kentucky</p> <ul style="list-style-type: none"> • <u>Morehead State University</u> • <u>Murray State University</u> (Bachelor's) <p>Louisiana</p> <ul style="list-style-type: none"> • <u>Delgado Community College</u> • <u>Northwestern State University of Louisiana</u> <p>Maine</p> <ul style="list-style-type: none"> • <u>University College of Bangor</u> <p>Maryland</p> <ul style="list-style-type: none"> • <u>Essex Campus of the Community College</u> <p>Massachusetts</p> <ul style="list-style-type: none"> • <u>Becker College</u> (Associate's and Bachelor's) • <u>Holyoke Community College</u> • <u>Mount Ida College</u> (Associate's and Bachelor's) • <u>North Shore Community College</u> <p>Michigan</p> <ul style="list-style-type: none"> • <u>Baker College of Cadillac</u> • <u>Baker College of Flint</u> • <u>Baker College of Jackson</u> • <u>Baker College of Muskegon</u> • <u>Baker College of Port Huron</u> • <u>Macomb Community College</u> • <u>Michigan State University</u> (Associate's and Bachelor's) • <u>Wayne County Community College</u> <p>Minnesota</p> <ul style="list-style-type: none"> • <u>Argosy University-Twin City</u> • <u>Duluth Business University</u> • <u>Globe University</u> • <u>Minnesota School of Business-Blaine</u> • <u>Minnesota School of Business-Plymouth</u> • <u>Minnesota School of Business-St. Cloud</u> • <u>Minnesota School of Business-Shakopee</u> • <u>Ridgewater College</u> • <u>Rochester Community and Technical College</u> <p>Missouri</p> <ul style="list-style-type: none"> • <u>Crowder College</u> • <u>Jefferson College</u> • <u>Maple Woods Community College</u> • <u>Sanford Brown College-St. Peters</u> • <u>Sanford Brown College-Fenton</u> 	<ul style="list-style-type: none"> • <u>Western School of Health and Business Careers</u> • <u>Wilson College</u> (Bachelor's) <p>Puerto Rico</p> <ul style="list-style-type: none"> • <u>University of Puerto Rico</u>(Bachelor's) <p>South Carolina</p> <ul style="list-style-type: none"> • <u>Newberry College</u> (Bachelor's) • <u>Tri-County Technical College</u> • <u>Trident Technical College</u> <p>South Dakota</p> <ul style="list-style-type: none"> • <u>National American University</u> <p>Tennessee</p> <ul style="list-style-type: none"> • <u>Columbia State Community College</u> • <u>Lincoln Memorial University</u>(Associate's and Bachelor's) <p>Texas</p> <ul style="list-style-type: none"> • <u>Cedar Valley College</u> • <u>McLennan Community College</u> • <u>Midland College</u> • <u>Palo Alto College</u> • <u>Sul Ross State University</u> • <u>Lone Star College – Tomball</u> <p>Vermont</p> <ul style="list-style-type: none"> • <u>Vermont Technical College</u> <p>Virginia</p> <ul style="list-style-type: none"> • <u>Blue Ridge Community College</u> • <u>Northern Virginia Community College</u> <p>Washington</p> <ul style="list-style-type: none"> • <u>Pierce College Ft. Steilacoom</u> • <u>Pima Medical Institute-Seattle</u> • <u>Yakima Valley Community College</u> <p>West Virginia</p> <ul style="list-style-type: none"> • <u>Pierpont Community & Technical College</u> <p>Wisconsin</p> <ul style="list-style-type: none"> • <u>Madison Area Technical College</u> • <u>Moraine Park Technical College</u> <p>Wyoming</p> <ul style="list-style-type: none"> • <u>Eastern Wyoming College</u>
---	---

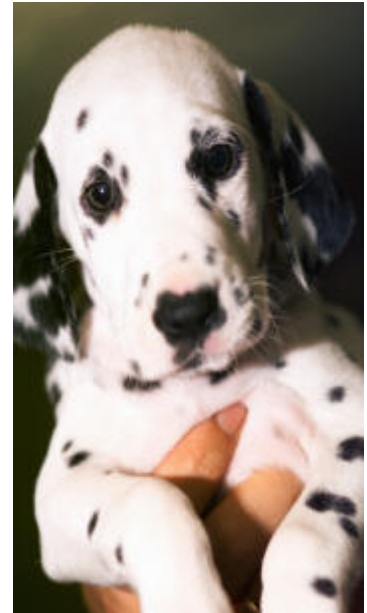
"Veterinary Technicians and Technologists Overview"

Prepared as part of the Sloan Career Cornerstone Center (www.careercornerstone.org)

Day in the Life

People who love animals get satisfaction from working with and helping them. However, some of the work may be unpleasant, physically and emotionally demanding, and sometimes dangerous. At times, veterinary technicians must clean cages and lift, hold, or restrain animals, risking exposure to bites or scratches. These workers must take precautions when treating animals with germicides or insecticides. The work setting can be noisy.

Veterinary technologists and technicians who witness abused animals or who euthanize unwanted, aged, or hopelessly injured animals may experience emotional stress. Those working for humane societies and animal shelters often deal with the public, some of whom might react with hostility to any implication that the owners are neglecting or abusing their pets. Such workers must maintain a calm and professional demeanor while they enforce the laws regarding animal care. In some animal hospitals, research facilities, and animal shelters, a veterinary technician is on duty 24 hours a day, which means that some may work night shifts. Most full-time veterinary technologists and technicians work about 40 hours a week, although some work 50 or more hours a week.



Employment and Earnings

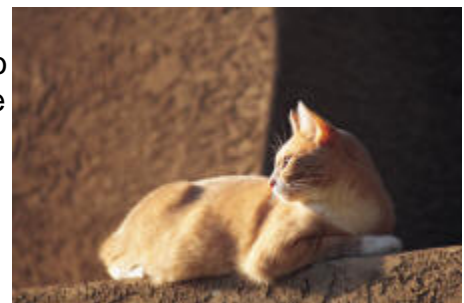
Veterinary technologists and technicians hold about 71,000 jobs in the United States. About 91 percent worked in veterinary services. The remainder worked in boarding kennels, animal shelters, stables, grooming salons, zoos, State and private educational institutions, and local, State, and Federal agencies.

Median hourly earnings of veterinary technologists and technicians is \$12.88. The middle 50 percent earn between \$10.44 and \$15.77. The bottom 10 percent earn less than \$8.79, and the top 10 percent earn more than \$18.68.



Career Path Forecast

According to the U.S. Department of Labor, Bureau of Labor Statistics, excellent job opportunities will stem from the need to replace veterinary technologists and technicians who leave the occupation and from the limited output of qualified veterinary technicians from 2-year programs, which are not expected to meet the demand over the 2006-16 period. Employment is expected to grow much faster than average.

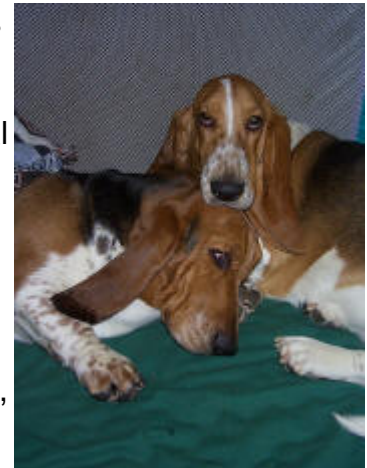


"Veterinary Technicians and Technologists Overview"

Prepared as part of the Sloan Career Cornerstone Center (www.careercornerstone.org)

Employment of veterinary technologists and technicians is expected to grow 41 percent over the 2006-16 projection period, which is much faster than the average for all occupations. Pet owners are becoming more affluent and more willing to pay for advanced veterinary care because many of them consider their pet to be part of the family. This growing affluence and view of pets will continue to increase the demand for veterinary care. The vast majority of veterinary technicians work at private clinical practice under Veterinarians. As the number of Veterinarians grows to meet the demand for veterinary care, so will the number of veterinary technicians needed to assist them.

The number of pet owners who take advantage of veterinary services for their pets -- currently about 6 in 10 -- is expected to grow over the projection period, increasing employment opportunities. The availability of advanced veterinary services, such as preventive dental care and surgical procedures, also will provide opportunities for workers specializing in those areas as they will be needed to assist licensed Veterinarians. The rapidly growing number of cats kept as companion pets is expected to boost the demand for feline medicine and services. Further demand for these workers will stem from the desire to replace veterinary assistants with more highly skilled technicians and technologists in animal clinics and hospitals, shelters, boarding kennels, and humane societies.



Biomedical facilities, diagnostic laboratories, wildlife facilities, humane societies, animal control facilities, drug or food manufacturing companies, and food safety inspection facilities will provide additional jobs for veterinary technologists and technicians. However, keen competition is expected for veterinary technologist and technician jobs in zoos and aquariums, due to expected slow growth in facility capacity, low turnover among workers, the limited number of positions, and the fact that the work in zoos and aquariums attracts many candidates.

Excellent job opportunities are expected because of the relatively few veterinary technology graduates each year. The number of 2-year programs has recently grown to 131, but due to small class sizes, fewer than 3,000 graduates are anticipated each year, which is not expected to meet demand. Additionally, many veterinary technicians remain in the field for only 7-8 years, so the need to replace workers who leave the occupation each year also will produce many job opportunities.



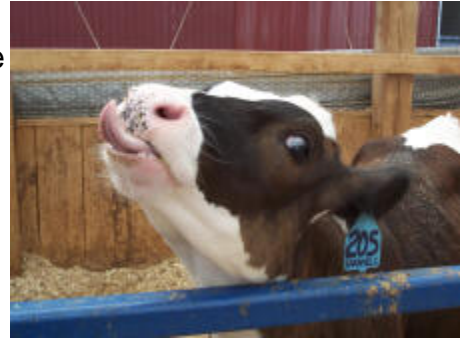
Employment of veterinary technicians and technologists is relatively stable during periods of economic recession. Layoffs are less likely to occur among veterinary technologists and technicians than in some other occupations because animals will continue to require medical care.

"Veterinary Technicians and Technologists Overview"

Prepared as part of the Sloan Career Cornerstone Center (www.careercornerstone.org)

Professional Organizations

Professional societies provide an excellent means of keeping current and in touch with other professionals in the field. These groups can play a key role in your development and keep you abreast of what is happening in your field. Associations promote the interests of their members and provide a network of contacts that can help you find jobs and move your career forward. They can offer a variety of services including job referral services, continuing education courses, insurance, travel benefits, periodicals, and meeting and conference opportunities. The following is a partial list of professional associations serving veterinary technicians and technologists.



A broader list of professional associations is also available at www.careercornerstone.org.

▶ **American Animal Hospital Association (www.aahanet.org)**

The American Animal Hospital Association (AAHA) is an association of members who primarily treat companion animals, or pets. They have over 36,000 members who hold different jobs in a veterinary clinic, including veterinarians, technicians, managers, receptionists and more.

▶ **American Association for Laboratory Animal Science (www.aalas.org)**

The American Association for Laboratory Animal Science is a nonprofit membership association, is the premier forum for the exchange of information and expertise in the care and use of laboratory animals.

▶ **American Board of Veterinary Specialties (www.avma.org/education/abvs)**

The American Board of Veterinary Specialties (ABVS) of the American Veterinary Medical Association (AVMA) recognizes and encourages the development of recognized veterinary specialty organizations promoting advanced levels of competency in well-defined areas of study or practice categories to provide the public with exceptional veterinary service.

▶ **American Veterinary Medical Association (www.avma.org)**

The American Veterinary Medical Association (AVMA), established in 1863, is a not-for-profit association representing more than 74,000 veterinarians working in private and corporate practice, government, industry, academia, and uniformed services. Structured to work for its members, the AVMA acts as a collective voice for its membership and for the profession.