

Dramika Lopez

Pathophysiology of anaphylactic shock

What I learned from watching the video is anaphylaxis is a severe systemic reaction. It occurs when a person meets allergen they have been sensitized to. It's the body's way of reacting to foreign material. Some of the signs and symptoms of anaphylaxis are swelling of the conjunctiva, lips, tongue, and throat. Symptoms of the central nervous system are lightheadedness, confusion, headache, and anxiety. In the respiratory system there can be wheezing, pain with swallowing, cough, and shortness of breath. Anaphylaxis can also cause tachycardia, bradycardia, and low blood pressure. It can also cause hives, itching and rash on the skin. Abdominally it can cause pelvic pain, abdominal cramping, diarrhea, vomiting, and loss of bladder control. The symptoms can become so severe a person can stop breathing. It can also make a person have heart dysrhythmias, cardiac arrest, and heart attacks. If the person's blood pressure drops, they might become lightheaded or become unconscious. Clinical symptoms of anaphylaxis can be mild, moderate, severe, protracted, or biphasic. With exposure and antigen molecules enter blood and interact with antibodies. This combination produces histamine to be released. Which flow through the body and bind to receptor sites. Which then they create vasodilation and vascular permeability. When transported to the lung it produces muscle contraction that cause obstruction wheezing and shortness of breath in the person. When this happens, they must administer epinephrine immediately. When injected it works immediately to mediate the chemical effect. It relaxes the airway and stimulates the heart. This then reverses the reaction to where they can be transported to a healthcare facility for further treatment. Some patients may require an extra dose. If symptoms do not improve within five minutes another dose may be administered. Patients at risk for anaphylaxis should carry two doses of epinephrine. Pollen can cause sneezing, runny nose watery eyes, dermatitis, and asthma attacks. Food allergies bring thirty million people to the emergency room per year. Allergies are when the immune system try and fight off things in the environment. Pollen, dust, animal hair, and food are allergens and can cause anaphylactic shock. When in contact with the allergen your body tries to fight it thinking it's a foreign invader. Which makes your immune system make your body fight off the allergen. An antigen can be ingested, injected, inhaled, or absorbed. Epinephrine is called adrenaline and gives you an energy surge. Peanuts affect nearly 1.5 million people. Most common allergy is to shellfish more than 5 million have a shellfish allergy. More adults than children are allergic to shellfish. In America over thirty-one million people are allergic to animals. One hundred seventy million people have been tested for some type of allergies. Symptoms can occur within minutes of being exposed. The nurse should always ask what patient was doing before onset and if the patient has any drug or food allergies, and any other medical conditions the patient might have. To promote adequate tissue perfusion patient might need oxygen and an IV to get the proper fluids. Epinephrine will be given to dilate the airway and constrict the vessels to help with blood pressure. Benadryl should be given to block the histamines. Which will help with itching and swelling. Nurses should learn how to identify patients that are at risk of reactions. To prevent anaphylactic shock. Patients who are in a crisis should be elevated to help with breathing and should be instructed to take slow deep breathes.