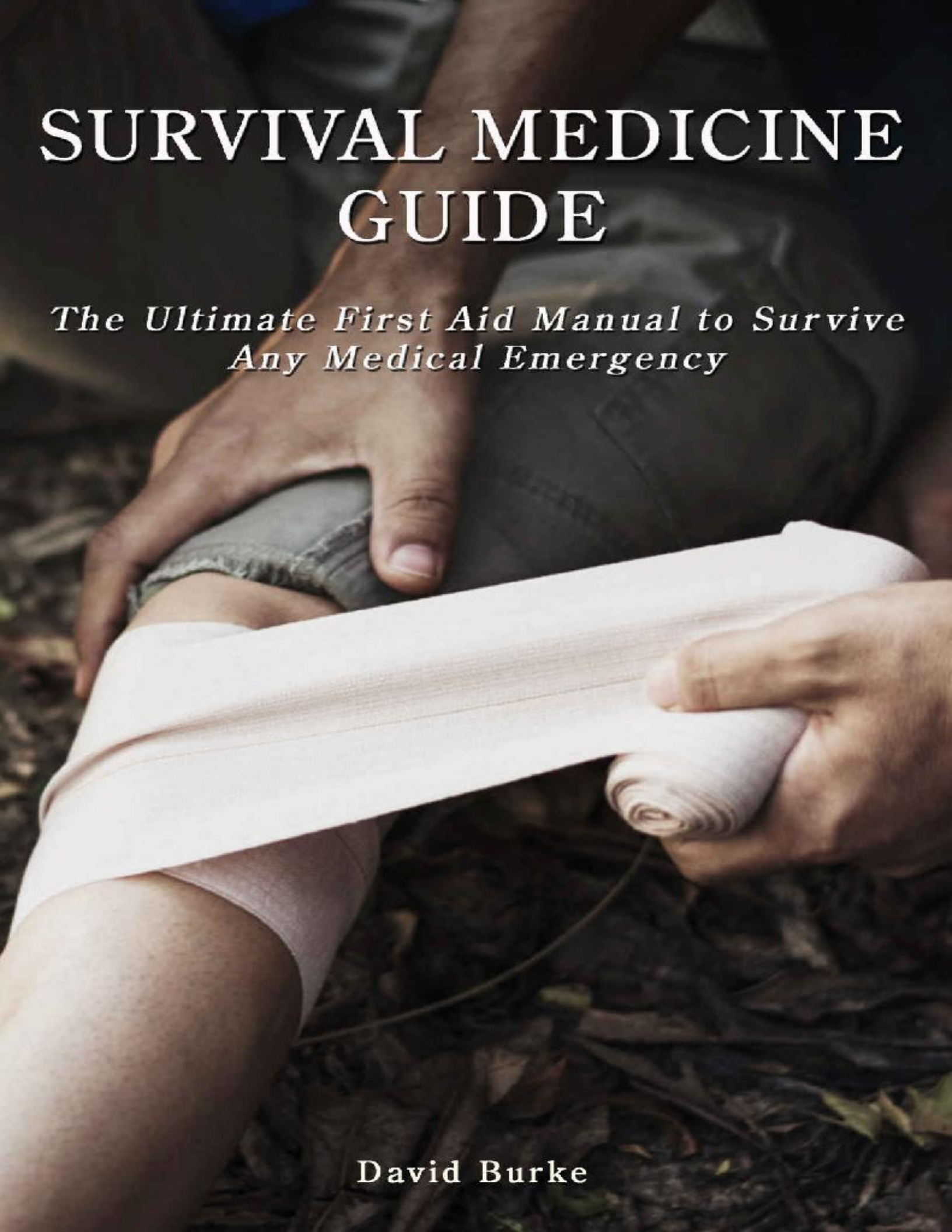
SURVIVAL MEDICINE GUIDE
The Ultimate First Aid Manual to Survive Any Medical Emergency
David Burke

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The Ultimate First Aid Manual To Survive Any Medical Emergency

DAVID BURKE

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INTRODUCTION

To emergency preparedness and response plans for all types of events, including natural or human-made disasters, pandemic outbreaks or terrorist attacks, health facilities and their personnel are important. As healthcare access is essential to address a growing demand for public-medical emergency care, this book is intended to support healthcare facilities in all aspects of emergency planning, including mitigation, preparedness, response and recovery.

This book aims to provide basic tools and resources from federal authorities, professional organizations, universities and state and local public health agencies. We chose some selected resources on this list, including education and training materials, main records, items and equipment, sample procedures and lessons learned.

This is particularly relevant given the risk that radioactive sources may be misused. The experience gained from past accidental exposures is that radiation victims often do not know if they have been exposed to radiation. Even if medical medics first see the health consequences of exposure, the right diagnosis may not be immediately established. Lack of awareness of the health effects of radiation exposure is one of the key reasons why many serious accidents are not early enough to avoid exposure and ensure the best possible treatment.

This educational material is focused on a medical preparedness and radiation response course of IAEA-WHO that promotes a broader

understanding of the health consequences of radiation exposure among health authorities and medical staff.

MEDICAL PREPAREDNESS BECOMING A MEDICAL RESOURCE

Medical practice in an environment or in circumstances when standard medical treatments and facilities are unavailable, often for people who do not have formal health training. "This includes medical attention during trekking in third world countries, deep water ocean sailing, isolated trapping and trekking, and after a large natural disaster or another catastrophe. The basic assumption is that qualified medics and hospital services will remain inaccessible for a long time and, in addition to providing first aid-definitive medical treatment and rehabilitation (if necessary). The fundamental principles of personal and public health must also be taken into consideration.

Many are reassessing and updating their current emergency preparedness plans with increasing awareness of the importance of health facilities responding to emergencies. General elements of healthcare emergency management include mitigation, preparation, response and recovery.

Although hospitals have general emergency management plans in place, they cannot plan a large-scale incident until federal and state public health groups establish communications plans and networks to address such incidents. It also trains staff to handle minor cases with hazardous materials, for example, industrial accidents, where both personnel and equipment can be affected unless such events are expected in advance. The preparation will address the concerns of care workers and the possibility for contaminant spread across the emergency department or even hospital.

Key Planning Resources

• Premier Health Care Alliance: Disaster Preparedness and Response Tools to help Premier members with their planning and potential disaster response; participants can include Preparedness checklists, possible emergency playbooks, monthly guides, suppliers, legislative and support services and real-time alerts (member sign up required).

• CDC Healthcare Preparedness Toolbox website provides healthcare preparedness tools and resources to support communities in preparing crises and public health. Both the sections "Clinical Services and equipment" and "Preparing Resources" provide resources for clinicians.

• CDC Public Health Preparedness and Response Partner Resources

• U.S. Dept. of Health & Human Services

• The HHS Response and Recovery Resources Compendium is an easy-to-navigate and comprehensive web-based repository of HHS resources and capabilities available before, during or following public health and medical incidents to federal, state, local, territorial and tribal stakeholders. The resources in this repository could also be useful to officials in public health and medical emergency management. Each topic contains a list of the main HHS functionality, products and services, a brief description of each and information about access.

• HHS Response and Recovery Resources Compendium links with a wide range of NGO and governmental tools, resources and situational awareness portals.

• CDC Public Health Program: Emergency Preparedness Central repository for statues, regulations, orders, reports and legal instruments relating to emergency preparedness to assist jurisdictions in taking into consideration

updates and clarifications on their emergency legal preparedness in public health activities.

FEMA has an online list of State Offices and Emergency Management Agencies

• Risk assessment of the facility: the risk assessment of the facility should be a multidisciplinary process with representatives of all emergency services involved. This includes infectious disease, infection control and safety personnel to assist in distinguishing biological from exposure to chemical agents and monitoring.

• Assessment of dangerous risk: Since 2001, the Joint Commission mandates member hospitals to conduct an annual hazard exposure assessment (HVA), which is expected to be the basis for emergency response activities. Current HVAC should be conducted or reviewed by facilities. The process includes an assessment of the probability of each type of event, the risk it poses and the current level of preparation of the organization. The HVA also should take account of nearby community resources that may be affected or requested for help, such as schools, churches, public transportation, news media, telephone and communications networks, volunteers (such as the Red Cross and the Health Army), restaurants and food suppliers.

Training

U.S. government agencies (specifically the CDC, FDA and FEMA) are offering a considerable number of emergency response and preparedness

resources. Education opportunities for almost all professions and levels of accountability can be used for public health medics and physicians.

CDC

• CDC Learning Connection / Emergency Management CDC Learning Connection includes emergency preparedness and responding learning products developed by CDC and CDC partners for public health professionals and clinicians.

• CDC-Sponsored Emergency Preparedness and Response Learning CDC funding preparedness education based in U.S. public health schools to meet U.S. public health personnel's preparedness and response and education needs. PERLC offers state, local and tribal public health authorities core competence-based training in the field of public health preparedness and response in both short, one-module and series courses.

FDA

• The Emergency Preparedness and Response FDA offer a free online training course ICS-100.FDA on the use of ICS principles in incidents involving FDA products.

FEMA

• Independent Study Programs Emergency Management Institute and the Federal Emergency Management Agency (EMI / FEMA) offers self-study courses for emergency management personnel and the general public. All are free for those who qualify for registration.

• Healthcare Scheduled Classroom and simulation courses are available rotating. FEMA Center for Domestic Preparedness Resident Training: Urgency preparation in the FEMA Institute for Domestic Preparedness with members in various disciplines and varying levels of obligation. U.S. All-hazard preparation training is fully funded, including travel, meals and accommodation for state, local and tribal government emergency responders. Homeland Security Agency.

• Additional training resources

Command And Coordination

Generally, at the start of a medical emergency, the patient faces uncertainty and turmoil. Nonetheless, if management responds rapidly with the organization and concentrated action, certain negative effects can be reduced. Furthermore, emergency plans must be coordinated at the local community level based on the community's individual needs. The Hospital Emergency Incident Command System (HEICS) is an emergency management system that uses a logical managerial framework, defined responsibilities, clear reporting channels and a common nomenclature to support the unification of hospitals and others. All hospitals use the particular emergency management system, which is rapidly becoming the standard for health disaster response, with clear advantages. HEICS guides for medical and hospital settings to enhance their response and emergency planning capacity. The Committee for HICS Education and Training Hospital Incident Command System (HICS) was established by a joint working party of U.S. leaders. Homeland Security Council; U.S.

Department of Health and Human Services; AHA; the United States Joint Commission.

Updating Preparedness

Facilities should reassess their emergency preparedness plans continuously. Both aspects of preparation need to be checked. Above all, coordination with local emergency planning agencies should be strengthened in surrounding communities, as should communications with local and state public health.

• The American Hospital Association offers several tools and resources, which are both timely and useful for the evaluation and re-evaluation of emergency plans.

THE EFFECTIVE SURVIVAL MEDIC

Most agree that self-safety is the most important priority in a long-term crisis after water, food and shelter. But many of these tough survivors don't realize, but that's it: you can get all the boobs and bullets there, but this won't mean the beans hill, and you'll shoot yourself at the foot, except you got the bandages.

If the unforeseen occurs, survival, medical supplies and gear repair are critical.

Few in your group are used to daily survival activities such as cutting wood for fuel. This will lead to injuries, burns, illnesses and other medical problems to be treated. Therefore, somebody has to play the role of survival medicine. You could be an average citizen with little formal medical training. If the ambulance is not only around the corner, you are perhaps the only medical commodity left to your family or group.

As you medically reach the end of the line for your people, how can you be sure that you are an effective caregiver? I'm frequently asked this question as I travel across the country, learning about disaster preparedness. The success of survival medicine depends on three things accumulating: knowledge, education and supplies. Over time, effort and dedication can be achieved.

One thing an inexperienced medic can not easily get is the ability to avoid squeamish feelings in the sight of blood. A reflex close to the process for "battle or flight" is a common panic response, which causes arteries to dill, blood pressure to collapse and heartbeat slowing, all of which contribute to lightheadedness and nausea.

Of course, regular blood contact is one way to get used to it. One medical center director states that his students learn to compartmentalize fear responses by repetitive words or numbers in their heads, by rocking side by side, tensioning and relaxing leg muscles and even drinking a sugary, caffeinated drink to raise blood pressure, hydrate and prevent low levels of glucose (called "hypoglycemia") from making them feel weak.

(Aside, it's commonly thought that coffee is dehydrated, but it doesn't cause you to lose more water than you consume in the drink.)

In addition to that of the Chief Medical Officer, the assigned medic shall assume certain functions. They include a sanitation inspector, a dentist, a medical officer, a counselor and an archivist.

As sanitation boss, it is the duty to ensure that water is washed, food is properly prepared and human waste is properly disposed of. If an appropriate latrine is not installed, for example, it can lead to infectious diseases running rampant in the people.

If you are worried about a week's powerlessness due to a storm, you won't have to deal with many dental problems. Nevertheless, people start having dental problems in their long-term live, such as broken teeth, abscesses and toothache, which endanger their performance, if not their life. Dental supplies become as important in this scenario as medical supplies.

Let's say that you have a lot of medical supplies and have prepared. What decides whether these valuable things are dispensed, many of which are unavailable after a disaster? Who gets the last antibiotic course? This decision must be defined clearly as yours.

In the aftermath of a life-changing disaster, fear and depression will be more common than gunfighting on the OK corral (I hope). You must be calm, understanding and confidential to keep your people alive and productive.

Finally, you must be the group archivist. Your job is to know the history of those you are professionally responsible for: their conditions, medicines, previous surgeries, allergies and more. When you predict the likely challenges you are faced as a specialist, you will store supplies accordingly.

You will need more than you already have when it comes to materials. How can I know, not seeing your kit? Because you're going to be responsible for more people you think. You can be ready to care for the number of people in your mutual assistance group, but be sure you bring family members or find additional survivors with skills that increase your chances of survival. Such individuals may be helpful but will make the medical resources added burden.

The greatest error of the survival medication is a shortage of resources for the number of people in your party. You can't have enough, any exceptions are valuable trade pieces. Watch out for kits that claim to be sufficient for 25 to 50 people, as they are often announced: only one major hemorrhage can take all the bandages in those products. If you doubt this, empty one or two liters of fluid onto the floor and see how many bandages to absorb it is needed.

While I agree that medical supplies may be valuable for barter purposes, I believe that it is better to conserve them and to help those in need of medical assistance. Once you know your skills, supplies and willingness to

help, it is so valuable for others in your community that they spend resources on protecting you.

Another error made by the medic is to preparing for traumatic injuries while avoiding the minor conditions that can impair operating effectiveness. Toothaches, foot fungus and hemorrhoids are just a few of the problems that can plague and make members less productive.

Another is that the medication fails to recognize which plants and other natural substances could have medicinal benefits in its field. Aloe plants can be useful for burning. The green bottom of willow and other trees contains Salicin, the original ingredient of the first aspirins. Finally, commercial products are spent; you have to learn what is in your backyard that can help you keep your people healthy. Use all emergency woodshed devices.

As a survival medic, it is important to recognize that you may not have the luxury of stabilization and evacuation in modern medical facilities. It ensures that, from beginning to end, you are responsible for injuries and infectious disease, something that even seasoned paramedics are not trained for addressing. You need to understand that you are the highest remaining medical resource and deal with issues in the foreseeable future without the hope of transport. To care for your patients, it is important to create a reasonable sick room or hospital tent.

FACTORS TO CONSIDER WHEN PREPARING

Medical factors are sometimes important because they are interconnected with parenting variables and other social development aspects. Low birth weight, for example, affects the behavior of mothers towards children and not only physical and cognitive competences (Landry, Chapieski, Richardson, Palmer and Hall 1990). In a similar study (Lewis & Bendersky, 1989), the individual impacts of extremely intraventricular hemorrhage, other specific premature medical complications and socioeconomic status were moderated by the socioeconomic conditions and degree of medical complications on growth in the second year of life.

FACTORS

As people explore and explore remote areas of our planet, they experience significant physical stress factors such as high or low ambient temperatures, intense solar radiation, strong winds and so forth. If unprepared participants are forced into extreme natural conditions, they often reach resistance thresholds and fail to adapt. This is attributed to pressures on molecular, psychological and social adaptation processes. A range of approaches and interventions must, therefore, be designed to provide effective protection against adverse effects of factors so that organ structures can be converted into different functional forms. A complex of medical, ecological, social, scientific and technical adaptation measures is a single, interconnected defense system.

However, adaptation may also be necessary for harsh and abrupt circumstances.

There are considerable difficulties in protecting people who suddenly find themselves in extreme natural circumstances, including shipwrecks or forced aircraft landing in uninhabited countries. Natural calamities and war can follow analogous conditions. In such circumstances, man's tiny interrelationships with his environment are most strained. Without civilization facilities, the impact of injuries and diseases is increased. According to data reported by AGARD, for example, around 70 percent of people are injured while landing on a forced aircraft. When a rescue service locates the victims, almost all have been injured or ill.

People suffer enormous psychological injuries under conditions of extraordinary stress. Most can be known as stress reactions. Surprised people can respond in a rather placid way, but they are not aggressive enough. Many victims have emotional reactions that manifest themselves as intense hyperactivity, sorrow, irrational acts, or profound stupor and indifference.

Although a rescue operation sometimes plays a decisive role, other considerations hinder a quick response. Therefore, people are forced to live alone and have to fulfill their basic needs without external support.

The term "survival" is often used very specifically to express the effort to remain alive. The term began to be used in a different sense with the advent of polar and spatial exploration. Survival is understood as an active, expedient activity to preserve life and health under autonomous conditions. This qualification takes more account of the rational use of personal experience with maximum inventiveness and resourcefulness to define an ability to use improvisations in an unfavorable environment.

MEDICAL ISSUES YOU WILL FACE

It is necessary to tailor your training and education to the possible medical issues that you will have to contend with. By looking at the caregivers ' experience in remote settings, you can determine what medical supply is needed and prepare for the most likely medical problems.

Your medical supply store should correlate well with your number of people. If you have stored five antibiotic treatment courses, it may be enough for a couple or a single individual, but it will go fast if you care for 20 people.

Note that most of these people will do things that they are not used to. They're going to make campfires, cut wood and tot gallons of water. You will see additional injuries such as sprains and strains, fractures, laceration, and burns among these people while performing daily survival activities.

This makes sense only to gather as many resources as you can. You could end up dealing with more survivors than you expected; you almost certainly will in reality. The major error that the survival medic is likely to make is to underestimate the number of individuals who are on the doorstep in times of trouble.

Don't worry, you've stored too much away. Any "excess" items are always highly requested for trading purposes. Food and medical supplies will be more valuable in hard times than silver and gold. Don't be complacent simply because you have a bandage closet; it is used faster than you think. Constantly have more medical items on hand than the number of people in your group you believe is enough.

For long-term recovery, what medical conditions will the doctor face most? Here are a few to expect: Trauma • Minor Musculoskeletal injuries (sprains and strains) • Minor trauma (lacerations, abrasions, etc.) • Major traumatic injury (fractures, occasional knife and gunshot wounds) • Burn injuries Infections • Respiratory infections (pneumonia, bronchitis, influenza, common colds) • Diarrheal disease (sometimes a community-wide outbreak) • Infected wounds • Minor infections (for example, urinary infections, “pinkeye”) • Lice, Ticks, Mosquitoes, and the diseases they carry Allergic reactions • Minor (bees, bed bugs, or other insect bites and stings) • Major (anaphylactic shock) Dental • Toothaches • Broken or knocked-out teeth • Lost fillings • Loose crowns or other dental work Women’s issues • Pregnancy and delivery • Miscarriage • Birth control

MEDICAL SKILLS YOU WILL WANT TO LEARN

A very good question for an aspiring medic to consider is, "What do I need to know?"The response is," As much as you are ready to learn!" You can expect to face many ankle sprains, resistance, cuts, rashes, and other common medical problems that affect you today. You should however know how to address more serious issues, such as limb breakage or other traumatic injuries. You will also have to learn what medical supplies are required and how they are to be used. Effective medic has learned the following:

- How to take important indications such as beats, heart levels, and blood pressure.
- How to position wounds and bandages.
- Cleaning and examination of an open wound.
- How to treat different burn degrees.

The guidelines on the use of different medications and herbal remedies, as well as their dose, their duration of administration, and their side effects. You can not do this yourself; you're going to need tools like the Doctors ' Desk Guide. This weighty volume comes out annually and contains all the information you need for both prescription and non-prescription medicines.

• How to deliver a baby and placenta naturally.

• Splinting, covering, and binding sprains, dislocations, or split.

• How to identify infectious bacterial diseases (e.g., strep throat).

• How to identify infectious viral diseases (for example, influenza).

• How to identify infectious parasites and protozoa (such as giardiasis).

• How to recognize and handle lice of the eyes, pubic, back, insect bites, and stings.

• How to recognize venous snakes and handle their bite injuries and other animals ' wounds.

• Which various sources of the stomach, pelvic, and chest pain can be detected and managed.

• How to manage anaphylactic shock and allergic reactions.

• How can sexually transmitted infections be detected and treated.

• Why dental illness (such as removal of fillings, care of abscesses, and extractions) is diagnosed and handled.

• How skin diseases and rashes are identified and treated.

• How the patient is cared for (such as bedsores diagnosis, travel considerations).

• Good standards in grooming, diet, and sanitation. • How to advise the patient who is depressed or anxious (usually in times of trouble).

• Intravenous line (IV) insertion. • How to heal a cut. (EMT classes teach this.) Also, when to do this is more important than knowing how to close a wound. Most outdoor injuries are dirty injuries, and closure of such an injury may lead to bacteria being locked into the tissues and cause infection.

Perhaps the most important skill to achieve is how injuries and diseases are prevented. See if your people are properly dressed for the weather, for example. Ensure the hand and eye safety are used at workshops. Learn to

recognize situations that put your physician at risk, and many injuries and diseases will be avoided.

Don't feel that it is impossible to learn all of this information, or that you can't do it if you only learn something above. The important thing is to learn at least enough to deal with some of the most common medical problems.

MEDICAL SUPPLIES

Proper care for other people's medical needs requires the right tools. Imagine that a carpenter must use a steak knife like a saw, or a hunter using a pea shooter rather than a rifle. The same applies to medicine.

The value of many medical supplies depends in large part on the knowledge and skills the user has acquired through study and practice. A blood pressure cuff isn't helpful for someone who can't take blood pressure. Concentrate on obtaining items you can use effectively first, and then buy advanced equipment as your skills progress.

Don't forget that a lot of things can be improvised, bandanna can also be used for the sewing of a wound as the sling, ironing board as a stretcher or a thin fishing line and a sewing needle. A thorough examination of your own home would probably reveal things that could be adapted for medical use. Look with a creative eye, and you are surprised by the medical problems with which you are already equipped.

STERILE VS. CLEAN

The cleanliness of the equipment used is a major factor in the quality of medical care given in a survival situation.

"Sterility" means, from a medical point of view, the complete absence of microbes. The method of sterile handwashing requires special procedures and the use of sterile equipment, dressings and towels. When used in a patient, the area around these items is known as the "sterile field" immediately. The sterile field is closely monitored to prevent contact with anything that could allow the microorganisms to invade them.

An autoclave–a type of pressure cooker–is used for instruments, towels and other items that can touch the patient to allow the elimination of all species. All hospitals, clinics, and medical offices use this device to clean their equipment. With a pressure cooker as part of your supplies, your tools can approach the level of sterility necessary for minor operations.

Of course, if you are in an austere environment, it may be very hard to achieve a sterile field. In this case, we can only keep things "clean" and the techniques to achieve this focus on reducing the number of microorganisms that can be transferred from person to person with medical devices. The cornerstone of a clean field is thorough hand washing of soap and warm water.

Certain disinfectants are used to maintain a clean area. Disinfectants are chemical substances used to destroy microbes for non-living objects. This includes surfaces where patients are treated, or food is prepared. Disinfection does not kill all bugs and is not as effective as sterilization. Bleach would be an example of a disinfectant.

Disinfection removes bacteria, viruses, and other bugs, sometimes decontamination. However, decontamination may also include the removal of noxious toxins and may involve the elimination of radiation or chemicals. Therefore, decontamination, not disinfection, would be the removal of non-living toxins such as radiation from a surface.

The difference between a disinfectant, an antibiotic, and an antiseptic is useful to know. While disinfectants destroy the surface of non-living tissues with bacteria and viruses, antiseptics kill pathogens on living tissue. Antiseptic examples include BetadineTM, chlorhexidine (Hibiclens), iodine, and BZK chloride.

Antibiotics can destroy the human body microorganisms. Drugs like amoxicillin, doxycycline, metronidazole, and many others are included. Later in the book, we will discuss these in detail.

MEDICAL KITS

• IFAK or Personal Carry Kit

• 1 cold pack or hot pack

• 1 ACETM wrap (4 inches)

• 1 Israeli bandage or another compression bandage (6 inches)

• 1 CeloxTM hemostatic agent (stops bleeding)

• 1 tourniquet

• 2 eye pads

• 1 pack (2 sheets) Steri-StripsTM

• 1 nail scissors

• 1 straight hemostat clamp (5 inches)

• 1 nylon suture (size 2–0)

• 1 Superglue or medical glue packet

• 1 tweezer

• 1 LED penlight

• 1 stainless steel bandage scissors (7.25 inches)

• 20 adhesive bandages (1 inch by 3 inches)

• 10 adhesive bandages (2 inches by 3 inches)

• 2 sterile dressings (5 inches by 9 inches)

• 5 pairs of large nitrile gloves

• 20 nonsterile gauze pads (4 inches by 4 inches)

• 10 sterile gauze pads (4 inches by 4 inches)

• 5 nonstick sterile dressings (3 inches by 4 inches)

• 1 roll gauze sterile dressing

• 1 MylarTM solar blanket

• 1 cloth medical tape (1 inch by 10 yards)

• 1 duct tape (2 inches by 5 yards)

• 1 triangular bandage with safety pins

• 1 tube of triple antibiotic ointment

• 10 alcohol wipes

• 10 povidone-iodine (Betadine) wipes

• 6 BZK antimicrobial wipes

• 2 packets burn gel

• 6 sting relief towelettes

• 1 hand sanitizer

• Note: Quantities will depend on the number of people for which you are medically responsible.

- Family Kit
- First-aid reference book
- Antibacterial soap and hand sanitizers
- Antiseptic and alcohol wipes
- Gauze dressing (various sizes—sterile and nonsterile)
- Gauze rolls (Kerlix, etc.)
- Nonstick pads (Telfa)
- Triangular bandages or bandannas
- Safety pins (large)
- Moldable splints
- Israeli battle dressings or another compression bandage
- Adhesive Band-AidsTM (various sizes and shapes)
- Large absorbent pads (ABD, etc.)
- Neck collar
- Medical tape (Elastoplast, silk, paper varieties; 1 inch and 2 inches)
- Duct tape
- Tourniquet
- Moleskin or Spenco 2nd SkinTM blister kit
- Cold packs, heat packs, hot water bottle (reusable if possible)

- Cotton eye pads, patches
- Eyewash, eye pads
- Cotton swabs (Q-tipsTM), cotton balls
- Disposable nitrile gloves (hypoallergenic)
- Face masks (surgical and n95)
- Tongue depressors
- Bandage scissors (all-metal are best)
- Tweezers
- Magnifying glass
- Headlamp or penlight
- Stethoscope
- Blood pressure cuff
- Irrigation syringe (60–100 cc)
- Kelly clamp (straight and curved)
- Needle holder
- Nylon or silk sutures (sizes 2–0, 4–0) and/or stapler kit
- Scalpel or field knife
- Chest seals
- Styptic pencil

- Hemostatic agents (Celox or QuikClotTM powder)
- Saline solution (liter bottle or smaller)
- Steri-Strips or butterfly closures, thin and thick sizes
- Tincture of benzoin (glue to hold Steri-Strips in place long-term)
- Survival sheet/solar blanket
- Biohazard bags
- Thermometer
- Antiseptic solutions (Betadine, Hibiclens, etc.)
- Hydrogen peroxide (3 percent)
- Benzalkonium chloride wipes
- Witch hazel
- Antibiotic ointment
- Antacids
- Sunblock
- Lip balms
- Insect repellant
- Ammonia inhalants
- Hydrocortisone cream (1 percent)
- Lidocaine cream (2.5 percent; local anesthetic)

• Acetaminophen/ibuprofen/aspirin

• Diphenhydramine (BenadrylTM) or loratadine (ClaritinTM)

• Loperamide (ImodiumTM)

• Pseudoephedrine (SudafedTM)

• Bismuth Subsalicylate (Pepto-BismolTM)

• RIDTM Lice Killing Shampoo, Fels-Naptha, or Zanfel soap

• Soap for general use

• Oral rehydration packs (or make them from scratch)

• Water purification filter or tablets

• Gold Bond foot powder

• SilvadeneTM cream (for burns)

• Oral antibiotics

• Epinephrine (EpiPenTM, a prescription injection for severe allergic reactions)

• Zofran (for nausea and vomiting-prescription)

• Birth control accessories (condoms, birth control pills, etc.)

• Herbal teas, tinctures, salves, and essential oils

• Raw, unprocessed honey

• Dental Tray:

• Cotton pellets and rolls

• Dental mirror

• Dental scraper, toothpicks

• Dental floss

• Dental wax

• Clove bud oil

• Zinc oxide

• Commercial dental kits (Dentemp, CavitTM)

• Hanks’ solution

• Chromic suture (size 4–0)

• Needle holder

• accept oral hemostatic agent (stops dental bleeding)

• Extraction equipment (forceps and elevators)

• Gloves, masks, and eye protection

• Community Clinic Supply List

For a long-term care center

Obtain all of the above in larger quantities, plus the following:

• Extensive medical library

• Treatment table

- Plaster of Paris cast kits (4–6 inches)
- Naso-oropharyngeal airway tubes
- Nasal airways
- Resuscitation facemask with one-way valve
- Resuscitation bag (AmbuTM bag)
- Endotracheal tube/laryngoscope (enables you to breathe for patient)
- Portable defibrillator
- Blood pressure cuff
- Stethoscopes
- CPR shield
- Otoscope and ophthalmoscope
- Urine test strips
- Pregnancy test kits
- Sterile drapes
- Air splints
- SAM splints
- Scrub suits, goggles, or face shields
- Foldable stretchers
- Paracord (various uses)

• Triage tags (for mass casualty incidents)

IV equipment:

• Normal saline solution bags

• Dextrose and normal saline (50 percent) IV solution bags

• IV tubing sets

• Syringes (2, 5, 10, and 20 ml)

• Needles (gauges 20–24)

• IV kits (gauges 16–24)

• Paper tape (½ inch and 1 inch)

• IV stands

• Saline solution for irrigation (can be made at home as well)

• Penrose drains (to allow blood and pus to drain from wounds)

• Foley urinary catheters (sizes 18, 20)

• Urine bags and enema bags

• Nasogastric tubes (to pump a stomach)

• Pressure cooker (to sterilize instruments, etc.)

Prescription Medications

• Medrol dose packs

• Antibiotic and anesthetic eye and ear drops

- Oral contraceptive pills
- Metronidazole
- Amoxicillin
- Cephalexin
- Ciprofloxacin
- Doxycycline
- Clindamycin
- Sulfamethoxazole/trimethoprim
- Ceftriaxone
- Diazepam
- Alprazolam
- Oxytocin
- PercocetTM
- Morphine sulfate or Demerol

FIRST AID

The first step in any emergency is problem recognition and assistance. In case of doubt or serious injury or illness, you should always activate the emergency response system by calling 911. The 911 operator will ask you a series of questions to determine the gravity of the situation if you're not sure how serious the situation is.

Stay in line until further help arrives or until you are told by the 911 dispatcher to hang up. Emergency system dispatchers may guide you through the steps of carrying out cardiopulmonary resuscitation (CPR), the use of an external automatic defibrillator(AED).

Whether you're at home, at work, or at the hospital, know where the primary aid kit and the AED are stored and know their material. Know how to activate the emergency response program (if in the United States calling 911). Be mindful of any medical emergency procedures in the workplace.

The next step in providing assistance after assessing the issue is to assess the negligence of the wounded or the ill person. The best way to find out is to touch and talk loudly to the person: "Are you all right?"After the failure to respond, shout for help. Look for any medical identifiers, like a necklace or a bracelet. This can be a helpful indicator of the origin of the case. One collection of priorities that we should keep in mind for first aid is what we call the “Three P’s.”

THE THREE P’S

• Preserve life – your main goal should be to keep the person alive.

• Prevent further injury – keep the injured person safe and from becoming injured any more. It is always recommended that you do not move them until help arrives.

• Promote recovery – try to help fix their injuries as best as you can.

As a medic, you will control the likelihood of your family or group being exposed to unhealthy conditions. Yes, your dedication to this field is one of the key factors evaluating your caregiver's performance. Strict enforcement of good sanitation and hygiene policies will do more than anything any medic can to keep your family healthy.

In a scenario where common cleaning products, such as soap or laundry detergent, are absent, it is difficult to achieve the aim of staying clean even with the best of intentions. Therefore, it is in your best interest to collect these things in number.

Cleanliness issues cover many areas, including dental care and foot care. The dirtier we get, the more susceptible we are to problems like infections or infestations. We can avoid many medical problems with careful attention to hygiene.

LICE

Louse infestation, also known as pediculosis, is a common health problem related to poor hygiene. Lice are wingless insects found in many species. There are three types of people: brain, body, and pubic. Lice is a medium for the transmission of certain illnesses, with major consequences for whole families. Sometimes lice itching leads to skin breaks that can lead to further infections.

While human lice have been thought to have evolved from gorilla and chimpanzee animals, they are, in general, species-specific. That means you can't get your dog's lice like you might get fleas. You only get them from other people.

Lice spread rapidly in crowded, healthy fewer conditions or in situations where close personal contact is inevitable. These conditions, for instance, occur in many schools in which children come into contact during the day (mainly head lice). The sharing of personal items can also cause lyre infestations; pebbles, garments, pillows, and towels used by several people are common for spreading lice.

These types of infestation are killed by medications called “pediculicides,” which include the following:

• Nixon lotion (1 percent permethrin)

• RID shampoo (pyrethrin)

• Kwell shampoo (lindane)

• Malathion 5 percent in isopropanol

The lice and their eggs will be killed by nix lotion (permethrin). The RID shampoo is going to kill the lice, but their eggs are not. Be sure to repeat the shampoo 7 days later. This may not be a bad lotion strategy too. Ask your medic for a Kwell shampoo prescription to stock. In adverse cases, it's a far better treatment. It can cause neurological side effects in infants to discourage this drug from being used on them. Use the following products:

1. Begin on dry hair. If you are using hair conditioners, stop taking medicine for a few days. This will cause the hair shaft to have the most effect on the drug.

2. Apply this medicine to the scalp and hair.

3. Rinse yourself off after only 10 minutes.

4. Lice and nits check within 8–12 hours.

5. Repeat in seven days.

6. Wash all linens you don't dump into hot water (120 degrees minimum). Unwashable items such as stuffed animals you cannot throw away should be put in plastic bags for two to five weeks (to kill any remaining head and corporal lice), and then opened out to the air. Combs and brushes in alcohol or very hot water. If possible, clothes should be changed frequently.

Ticks

Ticks are not so obviously linked to poor hygiene as lice. While generally regarded as insects, they are arachnids like scorpions and spiders. Pathogens (organisms that cause disease) are present in Rocky Mountain's American dog tick, and the black-legged tick, which is also referred to as the deer tick, carries the microscopic parasite that causes Lyme disease.

Many tick-borne diseases are identical to influenza with symptoms, and the medic sometimes ignores them. Lyme disease has a telltale "bull's eyes" rash occasionally, but other infections associated with ticks may not.

Many people do not think about protecting themselves from ticks and other potentially harmful animals or plants, such as poison ivy, in the outside world. Anyone who spends the day in the fresh air should be careful:

- Do not leave the skin underneath the knee exposed.
- Wear heavy socks (pin the trousers inside).
- Carry top-notch socks.
- Use repellants against insects.

A decent insect repellent will improve your chances of stopping bites. Citronella can be naturally found in certain areas and is linked to plants, like lemongrass. Soybean oil or eucalyptus oil is also going to work. Try bringing them into your medicinal garden if your environment is suitable.

The risk of developing Lyme disease or other tick-borne illnesses increases as soon as it feeds on someone. It's important to know. The good news is that the first 24 hours of illness are usually not spread. After 48 hours, the chance of infection is highest, so it is worth removing the tick as soon as possible. Ticks sometimes don't lay on a person's skin for a few hours, and showering or swimming can just scrub them off after a woodland trip. Good hygiene pays off here.

In order to remove a tick, take the finest pinches you have and try to grab the tick as close to your skin as possible. Push the click straight up, giving you the best possibility to delete it intact. The mouthparts sometimes remain in the skin when removed from an angle, which may cause

inflammation on the bite site. Fortunately, this will not increase the likelihood of Lyme disease.

Subsequently, disinfect Betadine or so-called "triple antibiotic" ointment to the area. Although there are often other methods for removing ticks, such as smothering them with petroleum jelly or illuminating them on fire, no more efficient method is used than tweezers removal.

DENTAL ISSUES

Many of our readers are often surprised that part of their pages is dedicated to dental issues in a survival medicine book. Nevertheless, history tells us that teeth issues eat up a significant portion of the patient load of the drug. During the Vietnam War, medical staff noticed that half of all sick call patients had dental problems.

To be sure, neither one of us is a medic, nor dentistry without a license is illegal and punishable by the statue. The lack of formal training or experience in dentistry can cause much worse complications than a bum tooth. Search into it if you have access to modern dental care.

Anyone who has had to carry out a task while dealing with a bad toothache can prove that the problem causes decreased efficiency. Therefore, it is only appropriate that you learn to treat specific dental problems with basic dental care and procedures.

The philosophy of a survival medic should be that an ounce of prevention is worth a pound of treatment. This thought is particularly suitable when it comes to your teeth. When implementing a good dental hygiene system, you will save your loved ones from much suffering (and yourself from many headaches).

Other causes of tooth pain can consist of:

- An accumulation of food and debris in between your teeth, especially if your teeth have spaces in between them

- Inflammation or infection at the root of the tooth or in the gums

- Trauma to the tooth, consisting of injury or grinding your teeth

- Sudden fracture of the tooth or tooth root

- A split in the tooth that takes place in time

- Teeth that start to appear (emerge) through the gums, such as with teething or knowledge teeth that don't have sufficient space for emerging or generally establishing (affected knowledge teeth).

- A sinus infection can be sensed as pain in the teeth.

Tooth pain often requires some sort of treatment by your dental expert.

Self-care tips

Try those self-care tips for a toothache until you can see your dentist:

Rinse your mouth with warm water.

Use dental floss to protect some portion of your teeth from the food or plaque wedged.

Consider taking an over-the-counter pain reliever (OTC) to dull your ache, but do not place aspirin or another pain reliever directly against your gums because it may burn your gum tissue.

If the toothache is caused by tooth trauma, apply a cold compress to the outside of the cheek.

Caution for products containing benzocaine

Previous advice included a thin solution of the benzocaine-containing OTC antiseptic straight to the infected tooth and gum for temporary relief; Yet benzocaine has been linked to an unusual and serious condition, often fatal,

called methemoglobinemia, which reduces the amount of oxygen the blood can contain.

So follow these guidelines:

Talk to your dentist or doctor before using a benzocaine-containing OTC antiseptic.

Do not use benzocaine-containing products— such as benzocaine teething gels (Anbesol, Orabase, Orajel, others) — in children younger than 2 years.

Never take more benzocaine than the recommended dose.

Store items that contain benzocaine from children's scope.

Remember that all these are first-aid treatments that only offer a temporary solution to the problem. Even if you are feeling better in the morning, you should still see your dentist so that you can diagnose and treat your teeth and gums appropriately and avoid further damage.

RESPIRATORY INFECTIONS

Most of us can't avoid occasional respiratory infections, even with modern medical technology. Without strict adherence to the sanitary protocol, it is very easy for your whole community to suffer from colds, sinusitis, influenza or even pneumonia in a major disaster. One of 200 different viruses can cause common colds. Influenza is derived from influenza A, B, and C viruses (mostly A). Over the course of history, more than 100 million people have been killed by influenza outbreaks.

Most influenza deaths are not caused by the infection itself but by secondary pneumonia, which invades an immune system compromised by the virus.

In general, viral particles spread in most respiratory infections and many organisms that cause these infections can live on common household surfaces, such as kitchens and doorbells, for up to 48 hours. Contaminating viral particles can fly 4–6 feet quickly by sneezing.

Respiratory problems are normally split into upper and lower respiratory infections. The upper respiratory tract is regarded as anything on or above the vocal cord (larynx). The disease is often related to the upper respiratory system affected. Here’s how it works:

• nose—rhinitis

• throat—pharyngitis

• sinuses—sinusitis

• voicebox—laryngitis

• epiglottis—epiglottitis

• tonsils—tonsillitis

• ear canal—otitis

The lower respiratory tract comprises the lower windpipe, the airways (together known as "bronchi") and the pulm itself. In developed countries, respiratory infections such as bronchitis and pneumonia are the most common cause of infectious disease.

The common cold symptoms may include nausea, cough, sore throat, runny nose, inflammation of the nose, headaches and sneezing. Lower respiratory symptoms (pneumonia and some bronchitis) include cough (phlegm), high fever, shortness of breath, fatigue and tiredness. Most respiratory infections begin to show symptoms one to three days after exposure to the causative organism. It may take 7–10 days if it is higher and slightly longer if it is lower.

In the case of influenza, antiviral medications such as oseltamivir (TamifluTM) can shorten the duration of the virus if administered within the first 48 hours of symptoms. Antivirals have less medicinal effects after the first 48 hours.

Concentrate the treatment for colds on the region concerned: for example, nasal congestion medication for a runny nose or sore throat lozenges for pharyngitis. It will alleviate muscle aches and fevers, either by ibuprofen or by acetaminophen. Steam inhalation and proper hydration provide symptomatic relief as well.

Although most upper respiratory infections are caused by viruses, a bacterium called beta Streptococcus (strep throat) can cause some sore

throats. These patients often have small white spots on their throats, tonsils, or both and are antibiotic candidates. Amoxicillin or Keflex (Fish Flex) was included among the drugs of choice for non-penicillin-allergic medicines. Community medications for erythromycin (Fish Mycin) are beneficial for those who are allergic to penicillin.

In the majority of cases, however, antibacterial agents such as antibiotics are not suitable for upper respiratory infections. The treatment of these problems has been overused by antibiotics and this has led to some organisms ' resistance to the more common drugs. Resistance has made some of the newer antibiotics in the treatment of many infections almost ineffective.

Good respiratory hygiene is important to prevent the transmission of their infection to others by patients with respiratory infections. It's not just a good strategy for you and your family, but it shows social responsibility. Use the following protocols to prevent respiratory infection spread.

Sick individuals:

• Cover mouth and nose with tissues and dispose of those tissues safely.

• Use a mask often when hacking. Even though others who care for the sick person may wear masks (N95 masks are best for health care providers), wearing one is most important to the afflicted person.

• Hold other individuals at least 4 feet away (average distance droplets will spread), if possible.

Caregivers:

• Strict hand hygiene performed before and after contact. Wash soiled hands 15 seconds with soap and warm water, or clean hands with hand sanitizers based on alcohol.

• Wash all possible contaminated surfaces with a suitable disinfectant, such as kitchen counters or door nozzles (dilute bleach solution will do).

• Isolate the sick person in a particular quarantine region, especially if he / she has a high fever.

• Wear gloves whenever a patient is being handled.

Don't take self-medication, particularly with antibiotics, unless there is no access to modern medical care.

FOOD AND WATER-BORNE ILLNESS

Modern water treatments and disinfectant techniques have made drinking water and food much safer than before. Contaminated water caused many deaths in ancient times and still causes infectious disease epidemics in developing countries. It is, therefore, only reasonable that we can expect health issues in the aftermath of a disaster.

Any water not sterilized or food not properly cleaned and cooked may jeopardize the entire community. As a drug, it is your responsibility to ensure that water is drinkable and food preparation areas disinfected.

STERILIZING WATER

Water may be contaminated by floods, water disruptions and a number of random occurrences. A dead raccoon upstream from which your water supplies are collected could provide a source of deadly bacteria.

Even the clearest mountain river could be a source of disease-causing parasites called protozoa. A parasite is an organism that establishes and causes you once it is in your body:

• Boiling. Boiling. Use a source of heat to boil your water. Bacteria may withstand high heat but are in the minority. It would be even more comprehensive to use a pressure cooker.

• Chlorine. Chlorine. Household bleach sold in laundry clothes is a sodium hypochlorite solution of 3–8 percent. Bleach has an excellent track record of bacteria elimination and 8–10 drops in a gallon of water are going to

trick. You won't probably notice a difference in taste if you're used to drinking city-treated water.

• Iodine tincture (2 percent). Apply 12–16 drops of water per gallon. An eyelash is useful for this. You will wait 30 minutes for iodine or bleach to sterilize water.

• Radiation ultraviolet. Sunlight exposure will kill bacteria! The trick will take 6-8 hours in direct sunlight (even better on a reflective surface). Fill in your clear bottle of the gallon and shake for 20 seconds vigorously. The oxygen released from the water molecules will help and even enhance the taste.

STERILIZING FOOD

Anyone who eats food that has been left out for too long, I have a reason to regret it. Proper cleaning of surfaces for food and food preparation is key to disease prevention.

Your hands are a surface for food preparation. Wash your hands thoroughly before you prepare your meal. Other food preparation surfaces should be cleaned with water, soap or dilute bleach solution before using them, such as countertops, cutting boards, planks and utensils. Not all germs can be killed, but it helps to remove them from surfaces.

Wash your fruits and vegetables before eating them under running water. Food produced from soil-grown plants could have disease-causing species, without taking fertilizers such as manure into consideration. If the fruit has

a rind, you are not protected: the species on the rind are on your hand and are passed to the fruit when it is peeled.

Raw meats are known to contaminate food with their juices. Prepare meats from your fruits and vegetables separately. Ensure that the meats reach an appropriately safe and consistent temperature until they are cooked, which varies according to the type of meat. To ensure this, a meat thermometer is useful. The safe cooking temperature for different meats is listed below.

Naturally, all foods contain few bacteria. Nevertheless, inappropriate handling, cooking or storage of food can lead to the multiplication of bacteria in large numbers to cause disease. Parasites, viruses, toxins and chemicals may also contaminate and cause disease in food.

If you develop food poisoning:

• Sip liquids to prevent dehydration, such as a sports drink or water. Drinking fluids too fast can make your nausea and vomiting worse, so try taking small, frequent snacks over a few hours rather than drinking a large amount at a time.

• Remember urination. Note urination. You should urinate regularly and your urine should be clear and light. The unusual passage of dark urine is a signal of dehydration. Distress and luminosity are also signs of dehydration. When you encounter any of these signs and symptoms and cannot drink enough water, seek medical attention.

• Remove anti-diarrheal medications. The removal of organisms or toxins from your body may be sluggish. If in doubt, confirm the condition with your medic.

Anti-diarrheal medications should not be given to infants or young children because of potentially significant side effects. The foodborne disease often improves alone in a few days.

DIARRHEAL DISEASE AND DEHYDRATION

With deteriorating sanitation and hygiene, infectious diseases are likely to increase, with none more common than diarrhea. Diarrhea is defined as increased bowel frequency. If someone has three fluid stools in a row, the red flag tells you to look for signs of dehydration. Dehydration is the body's loss of water. If severe, a series of chemical imbalances may cause life-threatening effects.

Diarrhea is a common illness, which can go by itself easily by raising the patient to clear fluids and avoiding solid food for 12 hours. However, the following symptoms associated with diarrhea can be a sign of something more severe: • Fever equal to or greater than 101 degrees • Blood or mucus in the stool

• Black or grey-white stool

• Severe vomiting

• Major abdominal distension and pain

• Moderate to severe dehydration

• Diarrhea lasting more than 3 days

All of these signs could be signs of serious infection, intestinal bleeding, liver dysfunction, or even surgery conditions such as appendicitis. These symptoms also increase the probability that the affected person will not be able to control his fluid balance.

Since the history of organisms that cause diarrhea, epidemics have been part of the human experience. Cholera is an especially risky disease that has

been an epidemic in the past and can still be uncertain in the future. This infection causes abdominal pain to produce abundant watery diarrhea.

Another very dangerous disease caused by contaminated food or drink is typhoid fever. It is marked by bloody diarrhea and pain and, like cholera, over the years, it has caused deadly outbreaks. The fever rises daily in typhoid cases and you may see a split rash and spontaneous nosebleeds within a week or more. The state of the patient deteriorates from there.

Dehydration is the end result (and the most common cause of death) of untreated diarrheal disease. By weight, 75% of the body is water; the average adult requires two to three liters of fluid per day. Kids become more dehydrated than adults: 4 million children die from dehydration due to diarrhea and other causes every year in underdeveloped countries.

REHYDRATION

Fluid replacement is dehydration treatment. Oral rehydration is the first treatment, but fluid intravenously introduced that requires special equipment and skills may be needed if this fails. Always start with a small number of clear fluids for your patient. The body can easily absorb clear fluids, including water, clear broth, gelatine, GatoradeTM, and PedialyteTM.

Oral rehydration packages are commercially available, but you can easily produce your own homemade rehydration fluid: • 6–8 teaspoons of sugar (sucrose)

• 1 teaspoon of salt (sodium chloride) • ½ teaspoon of salt substitute (potassium chloride) • A pinch of baking soda (sodium bicarbonate) • For children, use 2 liters of water.

Since the patient is able to tolerate these fluids, advance the diet to juices, pudding and thin cereals, such as grains and wheat cream. It is wise to avoid milk because some people are intolerant to lactose. Once the patient is able to keep thin cereals down, you should give them solid food.

DEALING WITH SEWAGE ISSUES

Infection usually caused by poor hygiene and sanitation, such as diarrhea and lice. There are many other kinds of bacterial, viral and parasite diseases which may not be as harmful as sanitation and hygiene. For instance, appendicitis can occur in anybody, irrespective of cleanliness or retreat conditions. A simple ingested hair can cause boiling or abscess.

The lack of access to adequate and adequate hygiene and sanitation can be chronic challenges to public health, which contribute to disease spread in low-and medium-income countries. This situation can be aggravated in environmental and public health emergencies and disasters.

Prevention of open defecation and waste containment is essential to reduce the spread of the disease in response to disasters and emergencies.

In the long term waste management planning process, immediate sanitation solutions are usually needed in order to minimize the spread of disease in emergencies, including sanitation facilities, soap and water handwashing facilities, operating and maintenance systems, operator training, and community education.

The natural ability of our bodies to fight disease is impressive. There are, however, no organs immune to infections. For a successful medic, the ability to recognize and early treat these diseases is essential. In this segment, we discuss some of the more common ones.

The modes of exposure for the various infections are as follows:

• The most common way to eat is by hand-to-mouth contact. Drink and smoke, or wipe your face with hands or gloves contaminated or sprinkle on

the skin.

• Contacts by skin by cutting, scratching, or penetrating wounds i. e harmful organisms may enter the body through the eye surface, nose, and month from discarded hypodermic needles.

• By breathing it like a dust aerosol or nebula.

Leptospirosis Hepatitis and Helicobacter pylori, typhoid and worm infections are frequently studied among this group of workers.

FOOD POISONING

Food poisoning may be caused by eating contaminated food, usually when not properly cooked. Find out what you're looking for and what to do.

About 500,000 cases of food poisoning occur each year, without unreported cases. Salmonella is the deadliest stand and contributes to some 2,500 hospital admissions per year (FSA).

Food poisoning will cause, at least in some cases, severe dehydration and may be fatal in vulnerable groups such as the elderly and those with weak immune systems. First aid may be helpful in promoting recovery and determining whether professional medical assistance is needed.

Treatment

For mild-moderate forms of food poisoning fatigue will have the biggest impact on the body. First Aiders can help a casualty follow a clear four-step procedure

• Rest-allow the body to heal in its own time

• Rehydrate-water & sports beverages with electrolytes can help rehydration

• Feed-try eating bland foods such as toast, crackers and bananas after vomiting up

• Assess-seek medical attention if the casualty is severely dehydrated. If response levels are decreasing or the casualty becomes unconscious, dial 999.

• If they have accompanying diarrhea or diarrhea only, it is even more important to try to replace lost fluids and salts.

• You can advise them to take an oral rehydration solution (ORS) as directed on the packet from your local pharmacy. This is particularly important in more vulnerable people, such as the elderly, those with other health conditions, and children.

• When they feel hungry again, advise them to eat light, bland, easily digested foods, such as bread, rice, crackers, or a banana.

• Do not drink alcohol, caffeine, or fizzy drinks.

• If they get worse and the vomiting and diarrhea are persistent, particularly in the elderly, babies, or young children, seek medical advice. Call 999 or 112 for emergency help.

• Do not take anti-diarrhea medicines unless specifically advised by a healthcare professional.

• To prevent the spread of the infection, always use and encourage good hand hygiene.

• Stay off work or school until at least 48 hours after the last episode of diarrhea or vomiting

APPENDICITIS/ABDOMINAL PAIN

Appendicitis

Various infections can lead to abdominal pain, some of which can be medically treated and some are surgically treated. A relatively common problem, especially for young people in a long-term survival situation, could be appendicitis. Appendicitis (appendix inflammation) occurs in about 8 out of 100 people.

Anyone can experience appendicitis, but most likely affects people under the age of 40. The appendix is a tubular 2 to 4 inch long worm-shaped tissue connected to the intestine on the lower right side of the abdomen. The interior of this structure is a mesh opening to the large intestine. The aim of the annex is unknown, but one theory is that it is an example of an "investigator" organ, which means that it is an unprofitable remnant of our evolutionary past that has little to do now.

The appendix causes problems when it is blocked or when bacteria are transmitted from other parts of the body. The bacteria may spread and invade or cause inflammation and the appendix to fill with pus. If the problem is not treated, the appendix can burst and infected matter can spill into the abdomen. This causes peritonitis, a condition that can spread and become very serious throughout the entire abdomen. It was not rare to die from the infection before the advent of antibiotics.

Appendicitis begins with vague discomfort in the abdominal area, but after 12-24 hours goes down to the lower right quadrant of the abdomen. This section, also known as the "McBurney's Point," is approximately two-thirds from the belly to the top of the right pelvic bone.

A patient may avoid using her legs because it causes abdominal muscle movement. Other common signs and symptoms of appendicitis include nausea, vomiting and fever.

Press the bottom right of the abdomen to diagnose this condition. Probably your patient will find it painful. The so-called "rebound tenderness" may be the sign of a possible rupture of an appendix, but if you press down, you will have pain, but it will be even more painful if you remove your hand.

• The patient should be limited to small amounts of clear fluids when the diagnosis is made. Surgical removal of the appendix is curative, but without modern medical services is difficult to perform.

• When modern surgery is not feasible, the only option will be to mouthful provide the patient with antibiotics in the expectation that early infections will be prevented. Obviously, intravenous antibiotics like cefoxitin are more effective than related oral antibiotics like cephalexin. In early (uncomplicated) cases of appendicitis, studies in the United Kingdom succeeded in using intravenous antibiotics.

URINARY TRACT INFECTIONS

Skin waste is excreted through the urinary tract, in comparison to the bowels. The urinary tract comprises the lungs, the ureters, the urethra and the bladder. Essentially, it is plumbing for the body.

Most women have experienced urinary tract infection (UTI) at some point in their lives. Bladder infection (cystitis) usually also affects urethra (the bladder draining tube). Different bacteria can cause infection; the most common is Escherichia coli (E. coli). Although men are not immune to the infection of the bladder, male urethra is much longer. It is, therefore, harder for bacteria to enter the bladder.

Many urinary infections, such as gonorrhea, are sexually transmitted. In males, painful urination (dysuria) is very common, although most females may have only a yellowish vaginal release.

In this case, antibiotics will be necessary. If the infection is not treated, sepsis will develop if the infection is passed through the kidneys into the bloodstream. Such patients can experience symptoms of shock, including rapid respiration, decreased blood pressure, fever and chills, and confusion or loss of consciousness.

Preventative medicine plays a major role in reducing the probability of this problem. Adherence to basic methods of hygiene is warranted for those at high risk, especially women. Standard recommendations include wiping after urinating or defecating from the front to the back, as well as urinating right after a sexual episode. Also, don't postpone urination if there is a strong urge.

Therapy revolves around intensive fluid administration. A lot of water will help to flush out the infection by reducing the bladder or kidney concentration of bacteria. Warmth is soothing in the bladder region. Antibiotics form another therapeutic cornerstone (brand names and parenthesis veterinary equivalents):

• Sulfamethoxazole/trimethoprim (Bactrim, SeptraTM; veterinary equivalent: Bird Sulfa)

• Amoxicillin (Amoxil; veterinary equivalent: Fish Mox)

• Nitrofurantoin (MacrobidTM)

• Ampicillin (veterinary equivalent: Fish Cillin)

• Ciprofloxacin (CiproTM; veterinary equivalent: Fish Flox)

Phenazopyridine is an over-the-counter drug that prevents excessive urination in urinary tract infections. (Brand names include Pyridium, UristatTM, and Azo.) If your urine turns reddish-orange, do not be alarmed; it is a medicine effect that is temporary. Vitamin C supplements are intended to reduce urinary bacterial concentration.

PELVIC AND VAGINAL INFECTIONS

Some of the signs of an inflamed appendix are maybe mimicking a female pelvic infection that is often triggered by sexually transmitted diseases such as gonorrhea or chlamydia. This is called "pelvic inflammatory disorder" (or PID). These patients, however, usually have fever-associated pain on either side of the lower abdomen and sometimes foul vaginal release.

The pelvic inflammatory disease may cause significant damage to internal female anatomy. Scarring happens when the body tries to heal and sometimes causes infertility and persistent pain. Serious pelvis female infections are best treated with antibiotics, such as doxycycline, sometimes twice a week in combination with metronidazole. It's also a good idea to treat sexual partners.

OVARIAN CYSTS

Other female problems in the pelvis, such as large or ruptured ovarian cysts, may also lead to pressure or bleeding pain. An ovarian cyst is a fluid buildup in an ovary surrounded by a wall. Many of them come from egg follicles, but others are benign or, less commonly, cancerous.

Most cysts cause ruptured pain. A breach can cause painful abdominal inflammation, internal bleeding, or both. Ovarian cysts sometimes go spontaneously; however, a ruptured cyst that bleeds actively requires surgery. A ruptured cyst on the right side could appear similar to appendicitis since the pain is located in the same place.

It is difficult to diagnose appendicitis or other causes of abdominal pain without the need for modern diagnostic equipment. Nevertheless, we must note that the medical staff used to have only the physical signs and symptoms to help them achieve a diagnosis.

Typically, these bacteria spread from the vagina through the cervix (the lower part of the uterus, which opens in the vagina). These infections can continue or spread upward in the cervix, leading to pelvic infections.

The pelvic inflammatory disease is also common in women suffering from bacterial vaginosis. The bacteria which cause bacterial vaginosis usually lie in the vagina. They cause symptoms and spread only if they increase (overgrowth) in number. It is unknown whether bacterial vaginosis is sexually transmitted.

More commonly, women are infected with dilation and curettage (D and C) or gynécologic operations during vaginal delivery, abortion, or medical treatment— whether bacteria are introduced into the vagina or when bacteria normally present in the vagina move into the uterus.

Douching increases the risk of infection.

Treatment

• Antibiotics

• If needed, drainage of an abscess

Antibiotics for gonorrhea and chlamydial infection are usually delivered by mouth or injection into a muscle as soon as possible. When required, after test results are available, antibiotics are modified.

Most women are treated with oral antibiotics at home. However, in the following situations, hospitalization is normally necessary:

The infection does not disappear after 72 hours.

A female suffering from severe pain of high fever.

• The lady could be pregnant.

• Suspected to have an abscess.

• The patient is bleeding and is therefore, unable to take antibiotics by mouth.

• Medics cannot confirm the diagnosis of pelvic inflammatory disease and cannot rule out disorders that require surgery (such as appendicitis) as possible causes.

In the hospital, antibiotics are given intravenously.

Abscesses persisting despite antibiotic treatment can be drained. A needle can often be used. It is placed in the skin via a small incision and an imaging test, such as an ultrasound or CT, is used to guide the needle into the abscess. A ruptured abscess calls for an emergency operation.

Women should stop sexual intercourse until antibiotic therapy has been completed and the medic confirms the complete elimination of the infection, even if the symptoms are gone.

All recent sex partners should be tested and, if required, treated for gonorrhea and chlamydial infection. A full recovery is more likely if pelvic inflammatory diseases are diagnosed and treated promptly.

WOUND INFECTIONS

Any damage to the soft tissue carries a risk of infection. Infections caused by minor wounds or insect bites are today relatively easy to treat due to the wide range of antibiotics available.

Despite your best efforts to cure a wound, an infection is always likely. Cellulite infection is a soft tissue infection below the skin's surface level. The main layers of the soft tissue of dermis (you saw this region when you scraped your knee as a child), subcutaneous fat and the muscle layers are underneath the epidermis.

Although cellulite can sometimes be resolved alone, treatment usually involves the use of antibiotics. These can be intravenous, oral or topical. Between 10 to 14 days of treatment with penicillin, erythromycin, or cephalosporin (Keflex) medications, the majority of cellulitis will strengthen and disappear. Particularly popular are Amoxicillin and Ampicillin. When cellulitis is in the extreme, it is helpful to keep your limb up.

It is useful to decrease discomfort by acetaminophen or ibuprofen (Advil). Warm-water soaks have been used for symptomatic relief for many years. In order to prevent a recurrence, a full 10–14 days of antibiotics should be completed.

First aid wounds A cut is any disruption or tear in the skin surface.

If proper first aid is applied to a wound, the healing process can be increased and the risk of infection reduced.

• First aid treatment for wounds involving minor cuts, lacerations, bites and abrasions.

• Washing the cut or scrape with water and soap and keeping it clean and dry is all you need to care for most wounds.

• Initially, it is acceptable to clean the wound with hydrogen peroxide and iodine but can delay healing and should be avoided in the long term.

• Apply an antibiotic ointment and cover the wound.

• Seek medical care within 6 hours if bleeding does not stop. because the wound may need stitches.

• A delay may increase the rate of infection of wounds.

• Any puncture injured by tennis shoes or boots is particularly susceptible to infection and should be seen by a doctor.

• Infection requiring medical treatment may be demonstrated by any redness, swelling, excessive discomfort, rash, red streaking, or pus drainage from the wound.

• If possible replace any skin flaps

• If a skin flap is present and still attached, gently reposition the skin flap back over the wound using a moist cotton bud or pad as much as possible.

• Cover the wound

• Use a non-stick or smooth dressing and smooth bandage in place; try to avoid using a bandage on fragile skin to prevent further dressing trauma.

• Seek help

• Contact your GP, nurse or pharmacist for further treatment and advice as soon as possible to ensure that the wound heals quickly.

• Manage pain

• Wounds can be uncomfortable and try relieving discomfort while the wound is healing. Speak to GP for pain relief options.

If the wound starts draining yellow or greenish fluid (pus) or if the skin around the wound gets red, warm, swollen or more painful, it may be a wound-infection and medical attention should be sought. Any red spread of the skin around the wound may imply an infection of the system which drains tissue fluid, called the lymphatic system. This (lymphangitis) infection can be severe, especially when accompanied by a fever. Prompt medical care should be sought if a wound is spreading redness.

MOSQUITO BORNE ILLNESS

Mosquito bites are common vectors of various infectious diseases (transmitters). As shown in bee pitting, anaphylaxis (severe allergic reaction) is seldom a problem with mosquitoes and is covered later in this book. Only female mosquitoes bite men.

The longer we spend outside in a survival situation would increase the likelihood of exposure to one or more mosquito-borne illnesses. Malaria is one of the most famous diseases caused by mosquito vectors.

Malaria is caused by a protozoan microscopic organism. They inject these microbes into your system when mosquitoes bite you. The protozoa colonize the liver once in the body. They're going to your blood cells and other organs from there.

Malaria symptoms seem fluid and are traditionally present as regular chills, fever and sweats. The patient becomes anemic as protozoa damage more blood cells. Time can lead to shorter periods between episodes and permanent organ damage.

Everyone who has regular fevers with severe chills and sweating should be considered treatment candidates. Malaria drugs include chloroquine, quinine and quinidine.

The antibiotic, such as doxycycline or clindamycin, is sometimes used in conjunction with the above-mentioned drugs. Physicians are usually sympathetic to the prescription of these drugs in places where mosquitoes are rampant.

Certain illnesses that are spread by mosquitoes include yellow fever, dengue fever and West Nile. The fewer mosquitoes near your escape, the lower the risk of one of these diseases. You can reduce the mosquito population in your area and improve the chances of disease prevention by taking the following precautions:

• Look for standing water areas that can serve as breeding grounds for mosquitoes. Drain some water you don't rely on for life.

• Replace any flaws or gaps in the windows and doors on your escape cameras.

• Be careful to avoid the outside dusk or dawn events. This is the time the most active mosquitoes are in.

• Wear long pants and shirts whenever outdoors.

• Have an excellent stockpile of insect repellants.

You may consider natural remedies if you are reluctant to use chemical repellents. Plants that contain citronella may be rubbed to avoid bites on your skin and clothes.

When using essential oil to repel insects, reapply often and feel free to combine oils. In addition to citronella oil, the following oils could be used:

• Lemon eucalyptus

• Cinnamon

• Peppermint

• Geranium

- Clove
- Rosemary

FUNGAL INFECTIONS

The foot of athlete (tinea pedis) is a skin infection caused by a type of fungus. The disease can be a chronic problem if not treated for years. Even though you normally see between your toes, you can also see it on other feet or even on your hands (often between your fingers). This problem is contagious and passes through sharing shoes or socks and even wet surfaces.

Any fungal infection is exacerbated by humidity. Those who are usually susceptible to athlete's foot • Spend long hours with shoes closed.

• Keep the feet moist for extended periods.

• Had a propensity to get injuries on hands and feet.

Most Perspire.

Check for

• Flaking of the skin between the toes or fingertips to make the diagnosis.

Itching and inflammation of affected areas.

• Skin reddish.

• Nails discolored.

• Fluid leakage from repeated scraping traumatized surfaces.

If the condition is mild, it can be enough to keep your feet clean and dry to slowly improve the condition. However, the removal of topical antifungal ointments or powders like miconazole or clotrimazole is often necessary.

A favorite home remedy for athlete's foot is to add liberal tea tree oil to a foot bath and soak for about 20 minutes. Dry your feet well and then apply a couple of drops to the area affected. Repeat this 2 times a day. Try to keep the area as dry between treatments as possible.

HYPERTHERMIA (HEAT STROKE)

In the wilderness or after a natural catastrophe, you may have no shelter to defend you against the weather. Hyperthermia (heat stroke), a common condition, is most likely to occur in the summer heat. In cold weather, however, significant physical exercise can lead to serious heat-related lesions for overclothed and underhydrated individuals.

The harmful effects due to overheating are termed' heat exhaustion' if mild to moderate, if severe' heatstroke.' Heat exhaustion does not normally result in permanent injury, but it does, in fact, permanently disable or even destroy its victim. It is a medical emergency that needs immediate diagnosis and treatment.

The probability of heat stroke is highly correlated to the heat index, which calculates air temperature effects combined with humidity. Full sun exposure increases the heat index by 10-15 degrees.

Simply muscular cramps or a fainting spell do not necessarily mean an important medical event related to heat. Heat cramps often occur in children who ran around on a hot day. Keeping them out of the heat, massaging the muscles involved and supplying hydration typically solves the problem.

Treat those suspected of having hyperthermia as follows:• Get them out of the sun or another source of heat.

• Take their clothes off.

• Drill them with the freshwater (and ice if available).

• Elevate your legs 12 inches above your heart level (the shock-treatment position).

• Ventilate the fans or otherwise, to assist with heat evaporation.

• Place cold, moist compresses on the neck, armpits and groin.

Why the groin, the axle and the neck? In these places, major blood vessels move near the skin and if you use cold compresses there, you'll cool the heart more efficiently.

Immersion into a cold stream in the forest can be all you have to do with a cooling technique. This is a useful option as long as you monitor your patient closely.

Oral rehydration is helpful in replacing lost fluids, but only if the patient is alert and awake. Patients who have a mental change may "swallow" the fluid through their airways, causing lung damage.

You may think acetaminophen or ibuprofen can help lower temperatures, but that's not actually the case. Such drugs are designed to reduce infection-caused fever and do not function well if no infection has induced fever.

Wear clothes suitable for the season. Tight swaddling of an infant with blankets is a disaster formula in hot weather. Have everybody wear a cover over their eyes. For instance, a bandanna soaked in water would be effective against the sun. Most of the sweating we do comes from our faces and heads, so towels often to help heat evaporation.

If you can avoid dehydration, heat exhaustion or heat stroke will probably be avoided. A person's work or workout in hot weather (especially with someone who is physically poor) easily leads to a loss of body water and to dehydration. Planing the outdoor work carefully in the summer heat and retaining fluids is an important step in maintaining safety and preventing heart diseases.

HYPOTHERMIA

Hypothermia is a disorder in which the body-core temperature falls below the required temperature of 97.0–99.5 degrees for normal body function and metabolism.

The body loses heat in various ways:

• Evaporation. The body sweats and cools the body as the sweat evaporates.

• Radiation. The body loses heat to the environment whenever the ambient temperature (rounding) is below the core. For example, when exposed to an outside temperature of 20 degrees, you lose more heat than when exposed to 80 degrees.

• Conduction. When its surface is directly in contact with cold temperatures, as in the case of someone falling from a boat into cold water, the body loses heat. Water, denser than air, removes heat much faster from the body.

Convection is a heat transfer type when, for instance, a cooler object is in motion against the body center. The air next to the skin is heated and removed to heat up the body. The wind chill is one example of the convection of air: if the ambient temperature is 32 ° C, but the wind chill factor is 5 ° C, you lose heat from your body as if it were 5 ° Ambient Temperature.

When exposed to cold, the body works to produce heat. The principal mechanism for heat production is shivering. Muscles shiver to produce heat, and that is the first symptom of hypothermia that you probably see.

More symptoms become apparent as the condition deteriorates if the patient is not warmed.

In addition to shivering, mental status is the most notable symptom of hypothermia: confusion, lack of coordination and lethargy. As the condition gets worse, speech can get slow; the patient is apathetic and uninterested or can fall asleep. This is because falling temperatures are having an effect on the brain: the warmer the body center becomes, the quicker the brain works. The brain function is stopped at around 68 degrees, although I have read exceptional cases of lower temperatures, usually children.

Preventing hypothermia means anticipating weather conditions that you can properly encounter and dress. It may be useful to remember the simple acronym COLD, which stands for cover, overexertion, layering, and dry:

Cover.

Protect your head by wearing a hat. This will stop losing body warmth, instead of using gloves to protect the face, using mittens. Mittens are more convenient than gloves, as it keeps your fingers in contact.

Overexertion.

Avoid activities that sweat a lot. Cold weather causes you to quickly lose body heat and wet, sweaty clothing speeds the process. Use regular rest periods to evaluate yourself for changes related to cold. Pay close attention to the status of members of your elderly, young or diabetic classes.

Layering. Loose, lightweight, layered clothing isolates you well. Use tightly woven, water-proof clothing to guard against the wind. Wool or silk internal layers hold the heat of the body better than cotton. Some synthetic materials work well as well.

Dry.

Keep as dry as you can, as dry as you can. Get out of wet clothes as quickly as possible. Snow is very quick to get into gloves and boots, so be especially careful with your hands and feet.

Travelers will expect the environment, like wind and wet weather, in which they will travel. We should be fit to the challenge, travel with a friend, if at all necessary, and have enough food and water available throughout the journey.

One thing most people do not understand is the impact alcohol consumption can have under cold conditions. Although it can make you feel "hot," alcohol actually causes your blood vessels to expand, which results in quicker heat loss on your body surface. The body reacts to cold by curbing the blood vessels, which prevents the body from expanding to remain warm. Alcohol also leads to a weakened decision, which could cause people under stress to choose clothing that does not cover them in cold weather, for example. This also refers to numerous "recreational" drugs.

When you meet a person asleep, confused or lethargic in a cold environment, you should always presume that he or she is hypothermic unless proven otherwise.

Immediate measures must be taken to reverse the harmful effects of hypothermia. Make sure you get the person out of the cold. If you can't move the person, shield them as much as you can from the cold and wind.

Take off your wet clothes. When the person wears wet clothes, remove them carefully. Cover them with dry blanket layers, including the head

(leave the face clear). When outside, cover the ground to avoid cold surface exposure.

Monitor breathing. Monitor breathing. An individual with severe hypothermia may not be aware of it. Make sure the patient breathes and check for a pulse. If necessary, start CPR.

Share the heat of the body. To warm the body of the person, remove your clothes and lie beside the person and touch the person's skin by skin. Then cover with blankets both of your heads. There may be some people who break this idea, but it's important to remember that you try to save a life. Smooth massage or rubbing can be helpful.

Give warm oral fluids. If the patient is alert and able to swallow, give him a warm, non-alcoholic drink without a caffeinated drink to heal the body.

Use warm, dry packs. Apply a dry, warm compress only to the back, chest wall or groin. These areas will spread the heat much better than placing warm compresses on the ends, which sometimes exacerbate the situation.

Avoid direct heat application. Do not use hot water, a heating pad, or a warming lamp. Extreme heat can harm the skin and strain the heart.

Hypothermia, if left untreated, leads to a complete failure of various organ systems and death. People who develop cold hypothermia are also vulnerable to other cold-related injuries, such as frostbite and immersion foot.

ALTITUDE SICKNESS

In any survival situation, we may have to switch from home at sea in the mountains to a retreat. When this becomes necessary, you will probably move quickly. For some, the rapid change in altitude causes altitude sickness, also known as acute mountain sickness (AMS). This is due to entering an area with a lower availability of oxygen and reduced air pressure without acclimatization in the first place.

AMS usually occurs at altitudes about 8,000 feet above sea level and is exacerbated by exercise. Although it is usually a temporary condition, some patients may develop some organ "edema" complications. Edema is the accumulation of fluid; it can occur in the lungs (pulmonary edema) or the brain (cerebral edema) during altitude disease. These can be life-threatening, either.

Like many diseases, avoidance is the best strategy against AMS. Choose the way to your retreat so that you can slowly climb. Don't try to climb more than 2,000 feet per day. Make sure that your people do not overwork as they rise and provide plenty of freshwaters. Stop alcohol consumption on the road.

Treating AMS requires rest if only further ascents are stopped and longer to acclimatize. A portable oxygen tank is useful when symptoms start. Carbohydrate-high diets are believed to minimize adverse effects.

Acetazolamide (DiamoxTM) is a medication commonly used for both the prevention and treatment of AMS. It has a diuretic effect, which means that excess fluid is removed by urination from the body quickly. The standard

doses of acetazolamide are 125–1000 mg per day, typically 2 days before the scheduled ascent.

You should normally inform your health care provider that you plan a trip to high altitudes and want to avoid altitude sickness. In the event of an emergency, you will usually be given an acetazolamide prescription.

There is some evidence that ginkgo giloba can help prevent altitude sickness naturally. A small amount of the extract was shown to allow the brain to tolerate lower levels of oxygen. The Americans have benefited from using ginkgo for AMS for decades.

WILDFIRE PREPAREDNESS

Fire is one of the ways of nature to renovate the land. In fact, some seeds, such as lodge poles, require fire to help them germinate. Despite the long-term positive effects on the forest, fire is a problem that puts people in the forest at risk. While wildfires that occur at any time of year, summertime is particularly dangerous in drought-prone areas.

Treat those suspected of having hyperthermia as follows:• Get them out of the sun or another source of heat.

• Take their clothes off.

• Drill them with the freshwater (and ice if available).

• Elevate your legs 12 inches above your heart level (the shock-treatment position).

• Ventilate the fans or otherwise, to assist with heat evaporation.

• Place cold, moist compresses on the neck, armpits and groin.

Why the groin, the axle and the neck? In these places, major blood vessels move near the skin and if you use cold compresses there, you'll cool the heart more efficiently.

Whether you are on flat land or on a steep slope, the amount of defensible space you need depends. Flatland fires spread slower than a slope fire. A fire on a steep slope blowing uphill is spreading quickly and creates fires at the spot— small fires that ignite vegetation in front of the main burn due to the bare bits of burning debris in the air.

You're going to want to dilute thick-canopied trees near your house. This means a nearby tree 50 feet away from your retreat, or 200 meters downhill. Prune branches below 10-12 feet tall; 10-20 feet of trees are to be separated. Remove all shrubs at the bottom of the trunks.

Of course, when you have defensible space, the natural inclination is, even against forest fire, to want to defend it. Sadly, you must remember you're going to be in the middle of a lot of heat and fumes. It would be hard if you're not in full fire protection gear. If there is a way out, the safest option would be to leave.

If you leave, have your supplies in the car, together with any important documents you might need to keep and some cash. If you have electricity, make sure that you shut off air-conditioning from the outside into the house. Turn all computers off, shut all windows, and lock all doors. Let other people know where you are going.

If you can find yourself trapped in a fire, wear long pants, a long-sleeved shirt, and heavy boots. A wool blanket is very helpful as an external layer because wool is quite fireproof.

If you are in a building, just stay outside the fire on the side of the building. Choose the least number of windows for a room. Stay there unless you have to leave the building because of the smoke of the burning fire.

If so, wrap yourself in that blanket, just leave your eyes closed. Some people think that first wetting the blanket is a good idea. Don't. Don't. Don't. Wet materials transmit heat significantly faster than dry materials and lead to more severe burns.

If you have trouble breathing due to the smoke, stay low and get out of the building if you need it. The lower you go, the less smoke and fire. Keep your face down to the ground. This protects the airways. Don't forget to wash your eyes, because your eyes are irritated by smoke.

When you meet a person who is in flames, you must act swiftly. In circumstances where a person’s clothes are on fire, remember the old adage “stop, drop, and roll”:

• Stop. The victim is panicked and will probably ride around in order to put the flames out. This generates wind that fans the flames. Stop running away from the victim.

• Drop. Knock on the ground, the victim. Wrap them in a blanket, if possible. The strongest are heavy fabrics.

• Roll. Roll the victim on the ground until the flames go out. Cool all burned skin areas with water immediately.

TORNADO PREPAREDNESS

A tornado, or "twister," is a spinning air column that comes into contact with the earth's surface and with the thunderstorm, which has caused it (sometimes called a "supercell"). Tornados usually appear from a distance in the form of a dark funnel with all kinds of flying debris around.

Tornadoes can have winds of up to 300 kilometers per hour and can travel several miles before they peter out. Both can be accompanied by granny and emit a sound that reminds of a train that passes by. It can be bad.

In the United States, there are almost a thousand tornadoes every year, more than any other country has recorded. The bulk of this happens in the area of "Tornado Alley," Texas, Oklahoma, Missouri, Kansas, Arkansas and the neighboring countries. The peak seasons are Spring and early summer.

Traumas from all flying debris are usually caused by injuries caused by tornadoes. Strong winds can carry and fling big objects in a way that is difficult to believe. It is, in fact, reported that an 83-ton train was lifted in 1931 and thrown 80 feet off the paths.

Although there may be sirens or other warning measures in some areas about a twister approaches, it is important that your family has a plan to weather the storm. The most likely way you will survive the event is to have a plan before a tornado approaches.

Take shelter immediately if you see a twister funnel. If it's a mobile home, leave! We are particularly vulnerable to wind damage. Get to the closest building with a tornado shelter; the best shelters are underground.

Consider putting together your own underground shelter if you live on Tornado Alley. In opposition to long-term protection bunkers and other structures, a tornado shelter must provide security for a short period of time. As such, it does not have to be very large; it would be suitable for 8–10 square feet per person. Nevertheless, ensure the ventilation and comfort or special needs of shelter users are taken into consideration.

Find a place where family members can gather if the tornado is heading for you if you don't have a shelter. The best options are cellars, bathrooms, closets and other indoor rooms without windows. Due to flying debris, Windows can easily shatter from impact.

Get under a heavy object, such as a robust table for added protection. A further shield will be provided by covering your body with a sleeping bag or mattress. Talk to every member of your family or group on this plan of action so that they know this process by heart. Children should be taught where medical kits should be found and how to use a fire extinguisher. Learn how to turn off gas and electricity safely, if possible.

If you're in a car and are able to drive to a refuge, do that. While you may be reluctant to leave your car, remember that high winds can easily tug around you; in a culvert or other area below the road, you can be safer.

In the city, it is appropriate to leave the car in a robust building. However, staying in your car will protect you from some of the flying debris if there is no other shelter. Keep your seat belt on, place your head below the level of the windows and, if possible, cover yourself.

If you are out and caught outdoors, stay away from the wooded areas when the tornado hits. Branches tore and other debris are turned into missiles so that the open field or ditch is safer. Lying flat in the ground at a low point

will cover you. Make sure you cover your head, even with your hands, if at all possible.

HURRICANE PREPAREDNESS

A hurricane is a big tropical storm with winds reaching 74 miles per hour or more. The Gulf of Mexico and the East Coast are battered annually in the United States by hurricanes that inflict trillions of dollars of damage. In contrast to tornados, which may pop up suddenly, when they are hundreds or even thousands of miles away, hurricanes are identified first. We should look at their growth and get a clear idea of how long we have to plan.

Hurricanes with the Saffir-Simpson hurricane wind scale are categorized on the basis of their severity. Higher class storms could cause unbelievable damage and death, as was the case in Hurricane Katrina in 2005. You will need to develop an effective action plan on shelter, food, power and other important issues.

You may also have to make an evacuation call. Contrary to some disaster scenarios, one of these storms can actually be overcome if you have enough head start.

If you live on the coast or in an area where the floods occur, the water (storm surge) will rise that might be enough to leave. In many cases, the authorities will issue an evacuation order. A municipality often assigns a resistant public building as a designated shelter in your own community.

If you decide to leave the city, go as far as possible inland. Hurricanes are gaining strength from the warm temperatures of the water over the tropical ocean, losing strength as they fly over land.

In any case, have your supplies ready for delivery. While most people spend 72 hours off the grid, this figure is fairly arbitrary; be prepared to supply food, drinking water and clothes and medical supplies at least a week.

You should have an idea of the weak spots of your house. After Hurricane Andrew ravaged South Florida in 1992, new homes must have the ability to withstand 125 mph of winds. However, most homes have 90 mph to handle. If the coming storm has more than sustained winds, you may not be able to rely on the structural integrity of your home.

Make sure that you designate a safe room in the interior of the house if you decide to stay. It should be the downwind in a part of the home from the direction of the winds. Make provisions for any animal that you are protecting and move all outdoor furniture and potted plants inside or up the house, preferably secured with chains. If you have them, put up hurricane shutters. During hurricanes, flying debris can turn into missiles.

Home planning is also important. The National Oceanic and Atmospheric Administration (NOAA) has weather radio and a lot of fresh batteries, so communications may be out in a major storm. You will probably lose capacity, so fill your propane and gas tanks in each hurricane season early.

As the storm approaches, bathtubs and other containers will be filled with water. Turn the refrigerator and freezer to its coldest place so that food will not spoil immediately if power fails. Make sure you know, if possible, how to shut down power, gas and water.

You should be thinking about another kind of power — purchasing power. After a storm, a search of the credit card may be insufficient; without cash, you may not have purchasing power.

Missing roof shingles are popular after a storm, so water-resistant tarps are available. Repair crews will be busy after a big storm and may not be reaching you immediately. More than a year later, tarps remained on roofs in South Florida after Hurricane Wilma in 2005.

When you hunker down in your home during the storm, make sure that when power drops, you have books, board games and light sources. It reduces anxiety and increases mortality. Take the time to talk about the coming storm; it will give everyone an idea of what to expect and minimize fear.

Inland floodwater may be polluted after the storm. Don't walk in this water, drink, or bathe. Careful sterilization is necessary. Do not eat food that comes in contact with floodwaters; wash it off before opening if unopened food cans are contaminated with soap and hot water.

Watch for power lines that have dropped; they have caused a number of electrocutions. You should never touch anyone who was electrocuted without first shutting down the power supply; if you can't shut down power, you must move the victim. Use non-metal objects such as a handle of a wooden broom or dry cloth. If you don't, the current can go through the body of the individual and shock you.

EARTHQUAKE PREPAREDNESS

Hurricanes are more important for Gulf or East Coast residents of the United States, but they are worried about the West Coast or even some regions of the Midwest— earthquakes. Some populated areas are close to fault lines, a fracture of a base rock volume. This is an area where seismic waves or movements release energy, which can lead to major surface disturbances.

An earthquake's strength is measured by the Richter scale. Quakes less than 2.0 on the scale will occur every day, but the average person is unlikely to notice them. Each 1.0 magnitude increase increases the strength by ten. The highest recorded earthquake was the 1960 Great Chilean Earthquake (9.5 on the scale of the Richter).

A tsunami will form when the energy is released offshore. A powerful earthquake (8.9 on the Richter scale) and tsunami caused major damage, destruction, and meltdowns at local nuclear reactors in Fukushima, Japan in 2011.

A major earthquake is particularly dangerous due to the lack of warning. Make sure that every member of your family knows what to do, regardless of where an earthquake happens. It's unlikely that you'll all be together in the house unless it happens in the dead night.

To be prepared, you’ll need, at the very least, the following:

• Food and water

• Power sources

• Alternative shelters

• Medical supplies

• Clothing appropriate to the weather

• Fire extinguishers

• Means of communication

• Money (don’t count on credit or debit cards being useful if the power’s down)

• An adjustable wrench to turn off gas or water

Find out where in case of tremors you will touch. Find out the plan for earthquakes in the school system, so you know where to find your children. You should at least have food, liquids and a pair of robust, comfortable shoes in your car in an emergency.

It is especially important to know where your water, gas and electricity shut-offs are. Make sure everybody has an idea of how to disable them if a leak or an electric shortage is present. You know where the nearest medical center is, but you can be alone; medical workers will have their hands full and may not be able to reach you quickly.

Check around for objects such as candlesticks and bookcases that may not be strong enough to survive an earthquake. Flat-screen TVs, particularly large ones, could easily overturn. Check out the kitchen and cupboard shelves.

ALLERGIC REACTIONS ASTHMA

In a situation of survival, you might have to leave your home and go outdoors. You may then be exposed to stings of insects, poison oak and ivy, and strange foods that you are not accustomed to. We call your body "allergy" when it reacts against a particular substance. Allergens are foreign substances that cause allergies. Our answer to them may be insignificant or life-threatening. Anaphylaxis is a severe reaction and can affect the whole body. It can be fatal if serious enough.

Minor and Chronic Allergies

Mild allergy reactions are usually caused by local itching and a patchy, elevated skin rash. Such reactions can go away on their own or using medications such as diphenhydramine (Benadryl).

Chronic allergies may occur as eczema in the skin. It's a dark, patchy rash, itchy and flaky in various places. Generally, this form of rash responds well to 1% hydrocortisone cream, but sometimes it may be appropriate to have a stronger steroid cream such as clobetasol. In the worst cases, oral steroids like prednisone may be needed.

If the allergic reaction is minor, there are various essential oils you can apply to relieve symptoms such as itching:

• Peppermint

• Lavender

• Chamomile (German or Roman)

• Calendula

• Myrrh

• Cypress

• Helichrysum

• Wintergreen

• Eucalyptus

• Blue Tansy

• Aloe Vera

To use the above oils, you would dilute 50/50 with olive or coconut oil; apply 2 drops to the affected area daily.

Asthma

Asthma is a chronic condition that affects your breathing skills. The airways that bring air to your lungs are affected. If asthma patients are exposed to an allergy, these airways become inflamed and swollen. This decreases the airway's diameter and reduces the air in the lungs. As such, you'll develop breathlessness, tightness in your chest and start wheezing and coughing (an "asthma assault").

In rare situations, the airways can become so constricted that a person could suffocate from lack of oxygen. The following are some common allergens that trigger an asthma attack:

• Pet or wild animal dander

• Dust or the excrement of dust mites

• Mold and mildew

• Smoke

• Pollen

• Severe stress

• Pollutants in the air

• Some medicines

Don’t underestimate the effect of your diet. To improve your diet and ease your asthma, try the following:

• Replace animal proteins with plant proteins.

• Increase intake of omega-3 fatty acids.

• Eliminate milk and other dairy products.

• Eat organically whenever possible.

• Eliminate trans fats and instead use extra-virgin olive oil as your main cooking oil.

Stay always well-hydrated; drinking fluids will reduce your pulmonary secretions.

In conclusion, various breathing methods, such as those taught in yoga classes, are intended to promote good health and to control the panic reaction seen in asthmatic attacks.

POISON IVY, OAK, AND SUMAC

If you don't live in Alaska, Hawaii, or the middle of the wilderness, the open-air will have poison ivy, poison oak, poison sumac, or all three inhabitants. When exposed to one person or the other, 85% of the population develops an immune response that causes an itchy rash of varying severity. Winter does not remove the possibility of a reaction since you can respond to urushiol (toxic oil that causes a reaction following the first exposure of the sensitizer), even when vines or shrubs sleep.

As the saying says, "leaves three, may it be." While it's true that "leaves of three" contain poison ivy, many other plants also do. Stay familiar with what it looks like.

Poison ivy and poison oak are very close because they have both urushiols. Poison ivy leaves may look pointer, and poison oak often looks like oak leaves. One or both are present in the continental United States almost everywhere.

Poison sumac is a shrub or a small tree that grows in the eastern United States up to almost 30 feet high. Each leaf contains between 7 and 13 pointy leaflets. Although the same irritant in poison ivy and poison oak is found in poison sumac, it is far more potent. It is reported that the inhalation of smoke from burning poison sumac causes death through suffocation.

All these plants have urushiol. The oil is found in the vineyards, leaves and roots. The best prevention is to avoid the touch of your skin with the wax. If you can’t avoid being close to these plants, take the following precautions:

• Wear long pants, long-sleeved shirts, work gloves, and boots in areas known to have the plants.

• Consider an over-the-counter lotion, IvyBlockTM, as a preventative. Apply it as you would a sunblock to likely areas of exposure. Theoretically, it will prevent the oil from being absorbed by your skin.

The rash takes several hours to several days and appears as red, itchy, patchy bumps. Sometimes the rash seems nearly linear.

Even in your clothing, Urushiol can remain active for years, so thorough washing is necessary. Routine corpse washing with soap after 30 minutes of exposure will not be useful because your system will already produce antibodies. Hot water seems to help the oil penetrate fat, so use cold water at an early stage. Once all the irritant is absorbed, however, some recommend hot-water baths to relieve itching.

Resin or oil retrieving cleansers like Fels-Naptha soap and TecnuTM poison and ivy cleansers are more effective than regular detergents. Another reasonable alternative is to rub alcohol easily carried as manual sanitizers or preparation pads.

Even if you do not decide to treat the rash, it will go away in 2-3 weeks by itself. It's temporary, but it might be so itchy that it makes you miserable. Diphenhydramine (Benadryl) is useful to alleviate the itching at 25–50 mg doses 4 times a day. Keep in mind that the 50 mg dosage will make you drowsy. Unfortunately, it will probably not be very useful to have a calamine lotion, old standby, and hydrocortisone cream. Some adverse solutions, such as Domeboro, have been reported to alleviate itching.

The prescription Medrol dose pack (methylprednisolone, a prednisone-like medicine) was treated with severe rashes. Prednisone is a strong anti-inflammatory medication and will be more effective in preventing inflammatory reactions caused by your antibodies.

There are several alternative treatments for poison ivy, oak, and sumac:

• Apple cider vinegar (use to cleanse the irritated area)

• Essential oils mixed with Aloe Vera gel, such as tea tree, lemon, lavender, peppermint, geranium, and chamomile

• Baking soda paste

• Epsom salt baths

• Jewelweed (mash and apply)

• Chamomile tea bag compresses

RADIATION SICKNESS

Radiation sickness is damage to your body because you often receive a large amount of radiation over a short (acute) time period. How ill you are is determined by the amount of radiation absorbed in the body— the absorbed dose.

Radiation toxicity is also known as acute or radiation poisoning syndrome. Radiation sickness is not a result of common image tests using low-dose radiation like X-rays or CT scans.

Although radiation disorders are serious and often fatal, they are rare. Since the nuclear bombings of Hiroshima and Nagasaki, Japan, during World War II, there have been several incidents of radiational sickness following nuclear industrial accidents such as the 1986 nuclear power plant explosion and fire in Chernobyl, Ukraine.

Shelter in place

If you are advised to stay where you are, be it at home or at work, or elsewhere, do the following: • Open and lock all doors and windows.

• Turn off fans, air conditioners, and outdoor heating systems.

• Dampers in fireplace tight.

Keep dogs inside.

• Switch to an interior room or cellar.

• Be tuned to your emergency response or local news network.

• Stay in place for 24 hours minimum.

HOW TO SUTURE/STAPLE SKIN

A laceration is a cut that passes through the skin. A small incision can be taken care of at home. A large cut needs immediate medical attention.

If the cut is large, stitches or staps may be required for the wound to close and the bleeding to stop.

It is important to take care of the site after the stitches have been applied by the health care provider. This helps to prevent infection and to heal the wound properly.

Stitches are special threads sewn through the skin on a wounded place in order to combine a wound.

Care for your stitches and wound as follows:

• Keep the area dry for the first 24 to 48 hours after stitches have been placed.

• Then, you can start to gently wash around the site 1 to 2 times daily. Wash with cool water and soap. Clean as close to the stitches as you can. DO NOT wash or rub the stitches directly.

• Dab the site dry with a clean paper towel. DO NOT rub the area. Avoid using the towel directly on the stitches.

• If there was a bandage over the stitches, replace it with a new clean bandage and antibiotic treatment, if so instructed.

• Your provider should also tell you when you need to have a wound checked and the stitches removed. If not, contact your provider for an

appointment.

Important Tips

Keep in mind the following:• Prevent reopening of the wound by keeping activity to a minimum.

• Make sure your hands are clean when dealing with a wound.

• If you have a laceration on your scalp, shampoo and wash are OK. Be gentle and avoid too much water exposure.

• Caring for your wound correctly to help reduce scarring.

• If you have questions or concerns about how to take care of the stitches or staples at home, call your provider.

• Pain medicine, such as acetaminophen, may be taken as directed to pain in the wound site.

• Follow up with your health care provider to ensure that the wound heals properly.

NAIL BED INJURIES

Nail bed injuries are the most common type of fingertip injury seen in the emergency hospital. These can be small or very painful and uncomfortable, even restricting the finger movement.

Injuries to the nail bed can occur in many ways. They often occur when you are hit between two objects or hit by something heavy, like being slammed inside a door, having something dropped inside, or hit by a hammer. Cuts, for example, from a knife or a saw, can also cause them.

Nail bed injuries can nearly ever be treated but can cause nail deformities in rare cases.

Many nail bed injuries require a medic. However, there are several steps you should take before seeing a medic when you injure your nail bed:

• Remove all jewelry from your hands. If your finger’s too swollen to get a ring off, call your medic immediately.

• Gently wash the injury, especially if it’s bleeding.

• Apply a bandage if necessary.

A common treatment for nail bed injuries include:

• For hematomas subungual. This can be drained by a small hole, usually made with a needle in your nail. It also alleviates pain and pressure. If your subungual hematoma is over 50% of your toe, you may need to cut the nail in order to have stitches.

• For lacerations on the nail bed. Stitches may be required for this injury. If the cut is severe, it may be necessary to remove your tooth. It ought to grow

back.

• For avulsions on the nail bed. This injury requires your nail to be removed. If there is also a finger fracture, it must be split. Depending on the severity of your injury, you may need a splint for up to three weeks.

BURN INJURIES

If you are outside the power grid, you will cook more frequently in the open. The potential for significant burn injuries will increase exponentially, particularly when your survival group includes small children; they might, of course, be too close to your campfires. Working knowledge and treatment of burns will be a normal capacity for each medical provider.

Depending on the percentage of the burned body area and the degree (depth) of the burn injury, the severity of the burn injury depends. Although measuring the surface percentage is useful for burning units in major hospitals, in austere conditions, the technique would probably be of little use.

Before we talk about the different burn levels, let's talk about prevention. The majority of burns you will see are due to excessive sun exposure.

To avoid sunburn, take the following steps:• Stay out of the sun whenever possible.

• Avoid work during the peak hours of sunshine (say, 11am–4pm).

• Wear long sleeves and pants, hats and sunglasses;

• Pass periods of rest in the shade.

If the exposure to sunlight can not be extended, make sure to apply a sunblock. Do so before going out and often all day long. Both waterproof and waterproof sunscreens should be kindly applied every 1-2 hours.

ANIMAL BITES

Millions of people in the United States are bitten by animals every year. Some animal dents are hand-puncture (in adults) and face, head and neck (in children). These bites are relatively small but can cause dangerous infections.

Most people have run away from an ornery dog or cat at some time in their lives. In the vast majority of bite cases, domestic animals, including cats, dogs and small rodents, are at fault. Any of these may cause infection, but cat bites inject deeper tissue into the bacteria and tend to become more regularly infected.

In addition to the trauma associated with the actual bite, different animals carry diseases that can be transmitted to humans. For example, tetanus can be developed from any animal bite.

Whenever someone is bitten, the first and foremost action is to put on your gloves and thoroughly clean your wound with water and soap. The wound is washed with a syringe to remove dirt and bacterial saliva. Make sure you avoid any direct-pressure bleeding.

Any bite of an animal should be seen as a "dirty" wound and not be taped, sutured, or shut with staps. Any rings or straps should be removed when the bite is on hand; when swelling occurs, they may be very difficult to remove later.

The best treatment for a bite wound is frequent cleansing. Add antibiotic ointment also to the area and look for signs of infection. You can see redness, swelling, or swelling. In many cases, the site may feel unusually warm.

The treatment of Oral Antibiotics (particularly in the aftermath of a cat bite) may be appropriate: Clindamycin (Veterinary Equivalent: Fish Cin), 300 mg orally every 6 hours, and Ciprofloxacin (veterinary Equivalent: Fish Flox). 500 mg every 12 hours. In those who have not been vaccinated for the last 5 years, a tetanus shot is shown.

Rabies is a dangerous but fortunately unusual disease transmitted by an animal bite. The vast majority of animals in the United States are commonly associated with dogs. Possible vectors include raccoons, opossums, skunks, coyotes and bats. It is estimated that 40,000 people are treated annually in the United States for the prevention of rabies.

A person with rabies typically has no symptoms for a period that differs in each case. The patient then begins to complain about fatigue, fever, headache, loss of appetite and fatigue. The bite wound site may be itchy or addictive. A few days later, nerve damage is reported as irritability, disorientation, hallucination, seizure and eventually paralysis. The victim can go to a coma or be arrested at heart or breathing. Once an individual develops the disease, it usually becomes fatal.

It is important to remember that people are animals and that you can also see dicks from this source. About 10-15% of human bites get infected because saliva carries about 100 million bacteria per milliliter.

Although rabies from a human bite would be extremely rare, hepatitis, tetanus, herpes, syphilis, and even HIV can be transmitted. Treat any contaminated wound as you would.

SNAKE BITES

In a grid-down situation, you will probably be much more often in the forest collecting wood, hunting, and feeding for food-producing wild plants. You can, therefore, encounter a snake or two. Most snakes are not venomous, but infections can occur even in nonvenomous snake bites.

Venom is not poisonous. While the skin or digestive system absorbs poisons, venoms must enter the tissue or blood directly. Therefore, drinking snake venom is usually not dangerous unless you have, say, cut into your mouth. North America has two types of venomous snacks, pit vipers (rattlesnakes, moccasins of water) and elapids (coral snakes). One or more of these snakes can be found in the continental United States almost everywhere. The common adder, a member of another family of the viper, is the only venomous snake in the United Kingdom but is widespread in all Europe, other than Ireland.

In general, these snakes have hollow fangs through which they deliver poison. In the warmer months, snakes are most active and therefore, most bite injuries are observed. Not every morsel of a venomous snake transferred its venom to the victim: 25 to 30 percent of these morsels showed no harm. It possibly has to do with the length of the snake's fangs.

Wear good, solid, high-top boots and long pants on wild walks to prevent snakebites. Treading creates heavy soil vibration and noise, often leading to snakes moving away. Snakes have no outer ear, so it's better to "hear" the vibrations of the ground than to shout in the air.

Many snakes, especially in warm weather, are active at night. Many everyday survival tasks, such as firewood collection, are not recommended

without a good light source. It's important to look in the wilderness where you put your hands and feet. Be especially attentive to places where snakes can hide, such as hollow logs, rocks or old shelters. It is a reasonable precaution to wear heavy gloves.

A venomous snake bite is treated with antivenin, an animal serum or a human serum containing antibodies that can neutralize a certain biological toxin. This commodity may not be necessary for a long-term situation of survival.

The following strategy, therefore, will be useful:

1. Keep the victim calm. Stress increases blood flow, thereby endangering the patient by speeding the venom into the system.

2. Stop moving the injured extremity. The movement is going to push the poison further into the circulation system, so do your best to keep the arm steady.

3. Thoroughly clean the wound and extract any poison that isn't deep within the wound.

4. Remove the bracelets and rings from the affected extremity. Swelling typically happens.

5. Position the extremity below the heart level; this also slows venom transport.

6. Tie as you would an orthopedic fracture in compression bandages, but proceed to tie it further up the leg than normal. Bandaging should start 2–4 inches above the bite (toward the heart), wind around and move upwards, then back down over the bite and past it toward the hand or the foot.

7. Keep the wrapping about as tight as a sprained ankle when dressing. The patient will reflexively move the limb if it is too tight and move the venom around. Don't use tourniquets to do more harm than good.

8. Draw a circle around the affected area, if possible. As time goes on, you'll see the site improve or worsen more clearly. This is a valuable technique for addressing any immediate response or illness.The body should then rest and possibly be immobilized by a splint or sling. Keep the patient on bed rest. The bite site is 24–48 hours lower than the heart. This strategy also works for venomous laggards such as Gila monsters.

After it bites you, a snake doesn't slither away. It is still likely to have more venom that it can inject, so move away from its territories or remove the threat in any way. Nevertheless, the killing of the snake may not make it harmless: the cutting head may bite reflexively for some time.

Snake bites that inflict burning pain are likely to contain venom instantly. Swelling at the site may start 5 minutes later and can travel through the affected area. Pit-viper bites tend to cause blistering at the wound's site. Bitten in the region or perhaps on the lips or the face may be found. Some victims describe in their mouth a metallic or other weird taste.

INSECT BITES AND STINGS

In a scenario of survival, you will see one million invertebrate people for each snake, such as insects and spiders; so many of them you could expect to be bitten regularly. Insect bites usually cause pain, local redness, itching, and swelling, but seldom endanger life. The hair and fibers of some caterpillars contain toxins, which can also cause a painful sting that is life-threatening unless the victim has a severe allergic reaction.

Arachnids — black widows, brown reclusive spiders and scorpions— are the invertebrates to be looked after. Many of these bites may cause serious damage to toxins. Obviously, we are concerned about the bite itself, not an insect disease. This topic is discussed in the mosquito-borne disease section.

Some reactions to bee venom can best be reduced by extracting the bee stinger as quickly as possible. Take it out with tweezers or scrape it with your fingernail, if possible. The longer the bee stingers can stay in the body, the higher the chance for a severe reaction.

Most stings of bee and wasp heal with little or no treatment. For those that experience only local reactions, the following actions will be sufficient:

1. Clean the area thoroughly.

2. Remove the stinger, if visible, with tweezers.

3. Place cold packs and anesthetic ointments to relieve discomfort and local swelling.

4. Control itching and redness with oral antihistamines, such as Benadryl or Claritin.

5. Give acetaminophen or ibuprofen to reduce discomfort.

6. Apply antibiotic ointments to prevent infection.

It can also be useful to use topical essential oils (after removing the stinger). Use Helichrysum (sunflower genus), tea tree, or peppermint oil and apply 1 to 2 drops 3 times a day to the affected area. When used on a pinch wound, a soda paste (baking soda mixed with a small amount of water) may be helpful.

The venom of the brown recluse is considered to be stronger than the venom of the rattlesnake. Venom compounds damage soft tissue, causing local blood vessels, skin and fat to collapse. In severe cases, this process leads to necrosis (tissue death) immediately surrounding the bite. The affected areas may be extensive.

Once bitten, the human body activates its immune response and can lead to the disintegration of the haywire, the destruction of red blood cells and kidney tissue and the blood's capacity for coagulation. Such effects will lead to coma and death. Nearly all deaths from brown recluse bites in children are recorded.

The treatment for spider bites includes the following:

• Thorough washing of the bite area

• Ice, applied to painful and swollen areas

• Pain medications, such as acetaminophen (Tylenol)

• Enforced bed rest

• Warm baths for those with muscle cramps (black widow bites only; do not apply heat to the area with brown recluse bites)

• Antibiotics to prevent secondary bacterial infection.

HEAD INJURIES

Soft tissue damage (brain, scalp, blood vessels) or osseous injuries (skull, face bones) may be a headache. Damage is usually caused by a direct impact on the skull containing the brain, such as the laceration in the scalp or a crane fracture. Everyone with a traumatic head injury must always be carefully observed as symptoms can take time to develop.

An "open" head injury leads to the penetration of the skull with possible brain tissue exposure. When the skull is not damaged, it's considered a "closed" fracture. Harm may also occur by the brain rebirth against the skull's inner walls, which could lead to blood vessel collapse and bleeding (countercoup injury). In this case, there can be no obvious penetrating wound. The aggressive shaking of an infant would be an example of this.

The brain requires the normal functioning of blood and oxygen. Intracranial pressure may increase due to traumatic brain injury (TBI), causing bleeding or swelling in the skull. This makes it harder for the heart to bring blood and oxygen into the brain. Hematoma (blood accumulation) may occur within or between the layers of brain tissue. High enough pressure will actually cause a portion of the brain to push down through the base of the skull. Known as "brain herniation," this almost invariably leads to death without modern healthcare.

A concussion is a head injury that results in brain function changes, even for a very short time and does not necessarily involve loss of consciousness. In fact, most commotions are not linked to loss of consciousness.

If a brief loss of consciousness occurs, the patient usually wakes "foggy" and may not know how the accident or incidents occurred shortly before or

after that. Symptoms are usually temporary but can include headaches (most common symptoms), ear ringing, dizziness, and concentration, memory, balance and coordination issues. We may seem lenient or tired.

It is important to ensure that the patient has returned to normal motor function once awake. In other words, ensure that all limbs move with normal range and strength. Still, rest is prescribed for one or two days, so they can be watched closely. Instead of aspirin or ibuprofen, Acetaminophen should be given because of the risk of bleeding.

It's all right to let your patient sleep. Once they are asleep, it may be appropriate to wake them up every 2 hours, so they can be excited and have no danger signs mentioned.

SPRAINS AND STRAINS

Bones, joints, muscles, and tendons give the body support and locomotion, and there is no replacement for the proper functioning of all parts. After a tragedy, the job these systems will do will be significantly increased. The medic will, therefore, expect more injuries; it is important to know how these problems can be identified and addressed.

Many people heard about ligaments, tendons, sprains and strains, but they have little understanding of what they are. Therefore, let's define some anatomical terms:

• Joint—the physical point of connection between two bones, usually enabling a certain range of motion, for example, the knee or elbow joint

• Ligament—the fibrous tissue that connects one bone to another, oftentimes across a joint

• Tendon—the tissue that extends from muscle to connect to bone

• Sprain—an injury where a ligament is excessively stretched by forcing a joint beyond its normal range of motion

• Strain—when the muscle or its connection to the bone (tendon) is partially torn as a result of an injury

• Rupture—a complete tear through a ligament or muscle

• Sprains

Our joints are really engineering marvels. They help to provide mobility and locomotion and sometimes they are unbelievably stressful. However,

they are moving parts and wear moving parts. In a disaster, our exercise level can increase; the risk of damage to our joints also increases.

You can expect your group's most common sprains to include the knee, brace, knee, or finger. Blowjob, swelling and pain are the most likely signs and symptoms.

For most sprains, treatment is relatively simple and follows the RICES protocol: resting. By not testing the wounded joint, it is important to avoid further injury. Stop any actions that have led to the injury and you'll be best able to fully recover.

Ice. Ice. Cold treatment reduces swelling as well as pain. The earlier it is applied, the more likely the healing process will be accelerated. If you are in the wild, have cold packs in your backpack instantly because ice can't be available.

Cold therapy for 20-30 minutes or so should be performed several times a day for the first 24-48 hours. This is accompanied by compression each time.

• Compression. For reducing swelling, a compression bandage should be used after each cold therapy. This will also allow the joint to be protected. After applying some padding in the field, wrap an elastic bandage tightly and start to work underneath the joint and go further.

• Any tingling, increasing pain or addiction tells you that the wrap is too tight and should be relaxed. An excessively tight wrap may affect the circulation and lead to white or blue fingertips.

• Elevation. Elevation. Increase the sprain above the heart level. This helps to reduce swelling at the injury site. Through raising the leg, you allow

inflammatory fluid to return to your circulation and support or at least not hinder the healing process.

• This also works for swollen ankles due to chronic medical conditions such as high blood pressure; even pregnant women are so relieved from swollen ankles.

• Stabilization. Further damage will be prevented if the injury is realized. This can be done with the compression bandage alone, or a splint or cast may be necessary. If the patient cannot give a lot of weight to the joint, this strategy is particularly useful.

THYROID DISEASE

The thyroid gland is situated just in front and under the laryngeal prominence of the Adam apple and produces hormones that help regulate the metabolism. The organ produces substances that control growth, energy, and the use of other hormones and vitamins by the body. Conditions of thyroid usually involve too little or too much production of these hormones. In women, these malfunctions are more common.

A thyroid problem common in an austere environment is the development of a goiter, a thyroid lump. This is a result of iodine deficiency in the body and is one of the reasons why iodine is added to popular table salt and "iodide" in the body. If no other source of iodine is available, potassium iodide tablets may become a treatment option. It should be remembered that iodine-containing drugs should not be used for people with seafood allergies.

DIABETES

Diabetes is a chronic but devastating disease that is characterized by high blood sugar (glucose) levels. Uncontrolled diabetes is known to different damage organs, including the kidneys, eyes and heart. Among developed countries, the prevalence of the disease has increased over time, maybe because of obesity issues.

Diabetes is particularly problematic for survival medicine since medications to treat the worst cases in a grid-down scenario are unlikely to be produced. Diabetic medications like insulin are losing power over time. Therefore, an alternative approach must be designed to keep diabetics from losing complete control of their blood sugar.

Two types of diabetes exist. Type 1 is the result of pancreas fails to produce insulin. Insulin is a hormone that controls your system's sugar level. An autoimmune response is thought to cause the destruction of cells in the pancreas, which produce insulin. This means that the immune system of the body attacks parts of itself. Diabetes of type 1 is often diagnosed first in infancy.

Type 2 diabetes is more commonly caused by cell resistance to the insulin produced by the pancreas in your body. Obesity is considered to be an important factor. Some cells do not respond appropriately to insulin in type 2 diabetes. Glucose does not enter these cells and accumulates, therefore in the blood. Diabetes (mild or severe) may also occur in some pregnancies, even in females that are not diabetic. High blood sugar is referred to as "hyperglycemia." Some believe that diabetes patients during pregnancy may become susceptible to diabetic problems later in life.

Complications, such as ketoacidosis, should be prevented. Diabetics will probably not have perfect off-grid control, but their sugars may remain below emergency levels. A period of less than optimal control could be survivable and could allow for some time to be restored.

One treatment option is to store the highest dose of metformin (oral diabetes medicine) in order to benefit the insulin-deprived individual. Sadly, the pancreas will not produce insulin. A recent study has indicated that metformin and insulin can be used. The addition of this drug has led to lower amounts of insulin needed for control in certain diabetics. Further study is justified.

Another option is to severely regulate diet and subsist on a diet consisting almost entirely of protein and fats. The key is to significantly restrict caloric intake. This may be harmful in the long term, but often small, high-protein foods can provide survival time for a type 1 patient.

Type 2 (especially obese) diabetics may actually improve by increasing physical exercise and dietary restrictions, which form part of a long-term survival situation. Here, a focus on restricting food consumption to frequent small meals is helpful.

HIGH BLOOD PRESSURE

High blood pressure (hypertension) is one of the most common chronic conditions. The measurement of the blood flow that pushes against the walls of your body's arteries is "blood pressure." If this pressure is increased over time, long-term damage can be caused. This disease is often asymptomatic (not noticeable) in millions of adults in the US. It makes it known as a "silent killer." Blood pressure rises with increasing weight and age.

The medic should have a stethoscope for listening and a sphygmomanometer (blood pressure cuff) as part of its equipment to monitor blood pressure.

At different times of the day and in different circumstances, blood pressure tends to vary. Document at least three high pressures in a row before the diagnosis is made. Readings over 160/100 are related to higher complication frequency. Persistent high blood pressure can lead to stroke, heart attack, heart failure, and chronic renal failure.

A headache is usually announced by a sudden headache. All functions related to the damaged brain will be lost or diminished. This could include the inability to communicate, blindness, or lack of natural understanding. Symptoms like paralysis or fatigue generally occur on the one hand only.

Although it may not be easy to diagnose an important CVA in an austere environment, there are few options for its treatment. Blood thinner may help a stroke caused by a clot, but a stroke caused by a bleeding vessel may deteriorate. It could be hard to tell which without advanced testing.

Keep the CVA victims in bed rest; after a period of time, they can recover partial function sometimes. Most changes will occur in the first few days if they do.

Hypertension (re-eclampsia) induced by pregnancy is a serious condition that happens late in pregnancy. It can lead to eclampsia and abnormalities in blood clotting. The first step in reducing high blood pressure is to return to normal height and age. Most overweight people find that their blood pressure decreases (often back to normal) after they lose weight due to dietary changes and exercise.

Dietary sodium restriction is crucial when it comes to lower pressures. Sodium is almost all you eat, so stop adding salt to food. Alcohol, nicotine or maybe also caffeine are known to increase blood pressure, so it is an additional strategy to avoid these substances. In a long-term survival situation, forced abstention can have a positive impact on overweight hypertension patients.

The DASH (Dietary Approaches to Stop Hypertension) diet is advised by the National Institutes of Health (NIH). The Plan mainly reduces sodium intakes and promotes nut, whole grains, fish, poultry, fruit and vegetables while reducing red meat, sweets and sugar.

A variety of drugs are available for the management of high blood pressure with impressive titles. Those with high blood pressure should be put on one or more of these medications before their reading is normal. In times of trouble, all these commercially produced items will be scarce.

Natural supplements were also used to reduce blood pressure. Any herb with a sedative effect can also reduce pressures. Several examples are Valerian, Passionflower and Lemon Balm. In this region, Coenzyme Q10

has shown some promise. Free radicals, including vitamin C and fish oil, can prevent damage to the walls of the arteries.

Don't forget the techniques of natural relaxation. Meditation, yoga and mild massage therapy should relax and benefit your patient's blood pressure.

HEART DISEASE AND CHEST PAIN

Unlike most health books, we won't spend much time talking about coronary artery disease, despite being one of the leading causes of death in society today. Why? Why? Due to the loss of all advancement in coping with coronary heart disease, it would be difficult to overcome heart attacks in a survival environment. We must accept that some people with heart problems do better than others.

The obstruction of an artery that provides oxygen to a portion of the cardiac muscle causes heart attacks (myocardial infarctions). Subsequently, this part of the heart dies, either killing or leaving the patient so unable to function. This decrease is most probably permanent. Coronary artery disease most often occurs in men because female hormones tend to protect women until menopause, at least.

The main approach is to give the patient immediately an aspirin chewable adult (325 mg). It acts as a thinner of the blood, helps prevent further coronary artery damage and maintains oxygen flow. In people with known coronary artery disease or angina (cardiac chest pain), aspirin can be used within 15 minutes to prevent the formation of blood clots.

A natural substance (capsaicin) found in cayenne pepper may also be helpful during myocardial infarction (at least 90,000 Scoville heat units, a spice measurement perceived heat). Give the conscious patient a glass of warm water combined with 1 cayenne pepper tablespoon. An alternative would be to give two full droppers of cayenne pepper tincture or extract below the tongue of the patient. Cayenne pepper findings at Cincinnati University indicate an 85% reduction in heart cell death.

A person suffering from a heart attack would feel more comfortable than lying flat in a 45-degree angle. Full rest may allow the weakened heart to have the least oxygen demand. Lock constrictive clothing as tight clothing makes a patient cardiac anxious and causes the damaged heart to beat faster, causing more stress.

Aspirin is also reasonable as a preventive strategy in small doses. One baby aspirin (81 mg) is thought to avoid plaque accumulation in the blood vessels daily. You might consider having forty or more of your adults on this medication.

Those with coronary artery problems in your group should store all medicines they use to treat their symptoms. Angina may be treated with tablets of nitroglycerine. Placed under the tongue, they will provide rapid relief in the majority of cases. Injury to abdominal muscles and joints will cause heart pain. That form of pain gets worse when the area in question moves and can be caused by pressing that spot. Remove angina patients and give ibuprofen or acetaminophen for discomfort.

Some patients with anxiety problems also have chest pain. Tremors, rapid heart rate and hyperventilation usually accompany this. Sedative herbs, such as valerian root, passion flora and chamomile, as well as certain prescription medications, such as diazepam (Valium), can be useful in this situation.

Acid reflux can also cause pain in the chest area (usually burning in nature). This pain is usually improved with tablet antacids like calcium carbonate or liquid versions with magnesium hydroxide or aluminum hydroxide (Maalox, MylantaTM). Relaxation techniques, like the sitting massage, can also help.

ULCER AND ACID REFLUX DISEASE

As can be seen in a survival environment, chronic stress can manifest emotionally and physically. One of the physical effects is the increased acidity of the stomach.

Excessive acid can cause inflammation of the esophagus, the stomach and the next section of the intestine (duodenum), from the throat to the belly. The irritated flap weakens and forms erosion (ulcer) and can lead to bleeding or even perforating the entire lining thickness.

A burning or ringing discomfort in the belly area is the main symptom of an ulcer. The discomfort is often referred to as heartburn and usually happens in the left or mid-upper abdomen or can travel to the breastbone. It is sometimes referred to as hunger pangs or indigestion.

The timing of the discomfort is important if ulcer or acid reflux disease is to be diagnosed. The pain of ulcer and acid reflux begins soon after eating, but it can continue after several hours. It can be differently differentiated from other causes of chest pain by drinking milk or taking antacids. This would not do much for angina, as you can imagine.

A bacterium, Helicobacter pylori, causes many ulcers and inflammation. The most effective treatment for these ulcers is the combination of antibiotics such as amoxicillin and metronidazole.

Some factors include the overuse of ibuprofen or aspirin, which can irritate certain people's stomachs. Preventing these treatments may reduce these ulcers and inflammatory pain.

Treatment abounds for acid reflux, including the following:

• Organic apple cider vinegar

• Mix 1 tablespoon in 4 ounces of water and drink before each meal.

• Aloe vera juice

• Mix 1 ounce in 2 ounces of water and drink before a meal.

• Baking soda

• Mix 1 tablespoon in a glass of water and drink right away when you begin to feel heartburn.

• Glutamine

• An amino acid that has an anti-inflammatory effect and reduces acid reflux. It can be found in milk and eggs.

SEIZURE DISORDERS

Convulsions occur when the electrical system in the brain fails. Rather than send out signals in a controlled way, an increase in haphazard energy passes through the brain. These abnormal signals may lead to unintentional muscle contractions, poor organ control and loss of consciousness. A person with chronic convulsions is sometimes called "epilepsy." Seizures may involve the whole or only one area of the brain. There are several types, but we will focus on the most serious "grand mal" attack. You'll see violent shaking and jerking with loss of consciousness and bladder control in big mishaps. Strange feelings, called "auras" (smells, colors, etc.), may declare an impending convulsion.

Natural alternatives have long been advocated to reduce convulsions frequency and severity. Most vitamins and herbal supplements have a sedative effect that calms the electrical energy of the brain. We can be used as a tea (1 herbal teaspoon per cup of water) or as a tincture (grain alcohol extract). The following are among those that have been reported as beneficial for prevention:

• Bacopa (Bacopa monnieri)

• Chamomile (Matricaria recutita)

• Kava (Piper methysticum—too much may damage the liver)

• Valerian (Valeriana officinalis)

• Lemon balm (Melissa officinalis)

• Passionflower (Passiflora incarnata)

• Vitamin B12 supplements

• Vitamin E supplements

• When a Person Collapses

Sometimes, a patient may collapse, not from a convulsion but from simple fainting or head trauma. This person

• Will not have jerky spasms.

• Will usually regain alertness quickly.

• Will not lose control of their bladder.

Dehydration, overheating, low blood sugar, and other conditions may lead to fainting. If someone feels they're about to fall off, they should sit between their knees and put their heads down to increase the blood flow to the brain. If you see someone fainting from a stand, grab him and lower him gently to the ground (in this case, on his back).).

Quickly assess the survivor. If someone just faints, they'll breathe and have a pulse. If so, lift your legs roughly 12 inches off the ground and above the heart and head level. It increases brain blood flow. Evaluate the patient for injuries, bleeding, or seizures. If so, handle as mentioned in this book previously. If there is no pulse or breathing, start CPR as later discussed.

If someone who has collapsed is able to breathe, has a pulse and has no hemorrhage, tap on your shoulder and inquire simply' Do you hear me?"Or" Are you all right?Naturally, remove any restrictive clothing and ensure they get a lot of fresh air by keeping people out of the area around them. If you are in a hot area, fan the patient or take them carefully to a cooler area.

If you succeed in exciting the patient, ask if they have any medical conditions such as diabetes, heart disease or epilepsy. Stay calm and talk reassuringly. Don't let them get up for a while, even if they say they're okay. Often people are embarrassed and want to stop the incident, but they are still in danger of falling again.

After the victim is awake and alert (do they know the name? Do they know where they are? What year does it take?), you can sit down slowly if they are not injured otherwise. Call emergency medical personnel in normal times and wait until they arrive before the patient stands up. Observe the rest of the day closely if they are not available.

Dehydration and low blood sugar are common causes of fainting, so some oral consumption can be useful. Do this only when it is clear that they are fully aware, alert and capable of working. Check your resilience by lifting your knees against your hands ' strain. If they're weak, they should rest. Closer patient monitoring will be very important since some internal injuries may not occur for hours.

KIDNEY AND GALL BLADDER STONES

Kidney stones are most often seen in people who don't keep well hydrated. Also, small stones may cause significant pain (renal colic), and larger ones may cause blocks that may interfere with the organ function. Once you have a kidney stone, you'll probably get it back at some point. Kidney stones are not usually related to infections.

Stones in the kidney usually do not cause symptoms until the tubes that connect the kidneys to the bladder (ureters) begin to move down. The stones will block the flow of urine if this happens. It causes inflammation and severe pain in the kidney. Kidney stones as small as sand grains can enter the bladder without an incident and then cause pain when trying to cross the channel that goes from the bladder (urethra).

In order to diagnose a kidney stone, look for pain that begins and goes suddenly. Pain is usually felt on the backside (the flank). Slight banging at the right and left flanks at the lowest rib induces severe pain in renal and kidney stone patients. As the stone moves, it moves like the pain; it goes down into the abdomen and can be in the groin or even the urethral region.

Pain relievers can help control pain (renal colic) of passing stones. ibuprofen is the available treatment for most pain. Stronger pain drugs may be appropriate for severe cases if you can get them.

Some of the bigger stones will be chronic problems because they are not available in the breakdown scenario with the technology and operational options. Drugs unique to the stone type may be beneficial. The following decrease the likelihood of formation of uric acid stones:

• Allopurinol (prescription medicine for uric acid stones and gout)

• Antibiotics (for struvite stones)

• Sodium bicarbonate or sodium citrate (which increases the alkalinity of the urine)

Lemon juice, olive oil and apple cider vinegar are good home remedies to alleviate discomfort and aid the passage of the stone. Drink a mixture of 2 ounces of lemon juice and 2 ounces of olive oil with the first twin of pain. Drink a big glass of water, then. Drink 1 tablespoon of raw apple cider vinegar in a large glass of water after 1 hour, with 2 ounces of lemon juice. Repeat the process until it improves every 1–2 hours.

Other natural substances that may help:

• Horsetail tea (a natural diuretic)

• Pomegranate juice

• Dandelion root tea

• Celery tea

• Basil tea

SKIN CONDITIONS

Skin is the human body's largest organ. It is soft to allow movement but hard enough to resist rupture or rupture. The texture and thickness of the body vary from part to part. It has two main layers–the epidermis and the dermis.

The epidermis is made of several sheets of skin cells and refers to the surface layer. The dermis lies below and consists of elastic fibers (elastin) for softness and the strength of protein fibers (collagen). The dermis is found in sebaceous glands, hair follicles, nerves and blood vessels.

Arrival and incised wounds First aid for abrasions The abrasion means that the skin surface layers (epidermis) have been damaged. Thin-skin cell areas (such as knees, ankles and elbows) are more susceptible to abrasion than thicker, more padded areas. Abrasion's scraped skin can contain dirt particles.

First aid treatment includes:

• Use an antiseptic like Betadine to clean the wound with a nonfiver shedding material or sterile gauze. If dirt is embedded, Savlon can be used to remove waste, as it contains an antiseptic and a surfactant. Rinse the wound with sterile saline or flowing tap water after five minutes.

• Don't scrub embedded dirt, because it can, even more, traumatize the site.

• Cover the cleaned wound with a sterile dressing that is not sticky.

• Change dressing to the instructions of the manufacturer (some may be left for a few days to a week). When antiseptic reapplies, wash off it after five minutes and repair the wound.

• First aid for wounds incised

Sharp objects, such as knives or glass shards, are causing incised wounds. The underlying blood vessels can be punctured, leading to substantial blood loss, according to the injury. A serious artery is a medical emergency because, in just a few minutes, the mechanical action of this blood vessel removes the entire blood supply from the wound.

First aid treatment for severe bleeding includes:• Remove the clothing for easier access around the site.

• Pressure your hands directly on the wound to stem the blood flow.

• If appropriate, cover the wound with a sterile dressing and continue to apply direct pressure (firm bandage).

• Try to elevate the injured area above the heart level.

• Do not remove existing dressings if they get saturated with blood, but add fresh dressings over the top instead.

• To seek urgent medical care. When you can't stop bleeding, you may need to call an ambulance, feel faint, sweating or dizzy

Tetanus-prone wounds

Many wounds are more likely than others to encourage the growth of tetanus bacteria unless the patient is resistant to tetanus. You may need a booster if it is more than five years since your last dose. You should immediately see your medic.

STAGES OF HEALING

The body immediately begins to repair an injury, and depending on the injury, the process may continue for days, weeks, months or even years.

The basic stages of healing include:

• The body acts to maintain a normal condition. Blood vessels surround the wound, reducing the loss of blood. Blood platelets accumulate to form coagulation at the site.

• The blood vessels dilate after the coagulation has formed, allowing maximum blood flow into the site. This causes swelling. Bacteria, microorganisms and other foreign agents will be cleaned from the site of white blood cells.

• New collagen layers are laid on the site. To support the new skin tissue, capillaries are created.

• Contraction takes place at the edges of the wound to reduce the wound size.

• Surface skin cells migrate from one side of the wound to the other and cover the wound with new skin cells.

• The site is left with a scar, depending on the injury. Scar tissue is generally not as strong as undamaged skin.

HEADACHE

Headaches are one of the most common symptoms in your medical position. Although there are almost more causes of headaches than you can reasonably say, the common causes in a survival setting are well known: headaches that occur suddenly, in particular in the ears or sinuses, colds or flux, may be linked to infection but can lead to life-threatening events such as the stroke.

Natural Headache Relief

If you would like a strategy to deal with a headache without drugs, try the following:

• Place an ice pack where the headache is.

• Have someone massage the back of your neck.

• Using two fingers, apply rotating pressure where the headache is.

• Lie down in a dark, quiet room. Get some sleep, if at all possible. If your blood pressure is elevated, lay on your left side (pressure is usually lowest in this position).

• Track what you were doing or perhaps what you ate before the headache started; avoid that activity or food if possible.

EYE PROBLEMS

By picking up this book, you have shown excellent prospects. Sadly, that doesn't necessarily mean you have a very good eye. People aren't perfect, and one of our most common defects is being nearsighted (with myopia) or farsighted (with hyperopia).

Most of us correct our eye problems with eye lenses. The vision aids in a survival environment is more valuable than gold, but most people have not made provision for replacement pairs in their storage. I can't think more barely about anything than being alone and unable to see. Your medical supplies should, therefore, have multiple pairs. You may even consider eye corrections (laser-assisted keratomileusis in situ, or LASIK). It is a very successful operation and one of the best.

Glasses for eye protection are another necessary item. When you chop wood or other works that are likely to be part of off grids, many of us with perfect vision neglect to wear eye protection. Absent eye protection, the risk of injury is much greater when performing certain strenuous activities.

Many people think sunglasses are not a medical service, but they are. Even if you just walk outside, sunglasses offer ultraviolet light eye protection. UV light damages retinal cells over time, which can lead to clouding over the lenses of your eye (cataracts). Only operations that will not be available in a collapse can remediate this condition. UV light protection helps to prevent long-term damage.

Sunglasses may also prevent the burning of the cornea from over exposition to UV light, known as "snow blindness" (photokeratitis). This is uncomfortable and dangerous in the wilderness, but thankfully it will be left alone if the eye is wrapped in a mask. Bottom line: Whenever you are standing, wonder why you don't wear eye protection.

INFECTIONS OF THE EYE

In a grid-down situation, different eye conditions are more common. Conjunctivitis (pinkeye) is the most common. Conjunctivitis is an inflammation that makes the affected eye red and itchy, and often causes a milky release. Chemical irritation, a foreign body, an allergy, or infection can cause it.

Pinkeye is highly contagious among children because they rub their eyes and then touch other people or objects. While children can do it more than adults, studies have shown that people of all ages often touch their faces and eyes all day long with (often dirty) hands.

In allergic reactions, irritated, red eyes with tears can also be seen that can be treated with an antihistamine or eye droplets. Eye allergies may be distinguished from eye infections in that eye allergies are less likely to be associated with a milky discharge.

Do the following to avoid spreading the germs that can cause eye infections:

• Don't exchange eye drops with others.

• Do not put the hands or eyes on the tip of a jar of eye drops, as this may contaminate it with germs. Keep the 3 "bottle above your eye.

• Don't share your eye makeup with other people.

• Never let the contact lenses to get them in your mouth. Most bacteria and viruses-perhaps even the virus that causes cold sores (herpes)-are found in your mouth and can easily spread to your skin.

• Change your contacts often. The longer they stay in your eyes, the higher the chance is that your eye can get infected.

• Wash your hands regularly.

Antibiotics such as doxycycline, 100 mg twice a day for a week, will relieve infectious conjunctivitis. To treat pinkeye using natural products, pick one or more of the following methods:

• Apply a wet chamomile or goldenseal tea bag to the closed, affected eye for 10 minutes every 2 hours.

• Make strong chamomile (Euphrasia Officinalis, also known as eyebright) tea. Let it cool and use the liquid as an eyewash (using an eyecup) 3–4 times daily.

• Use 1 teaspoon of baking soda in 2 cups of cool water as an eyewash solution.

• Dissolve 1 tablespoon of honey in 1 cup hot water; let cool and use as an eyewash.

• Use any of the solutions described above on gauze or cloth, and then apply a compress to the affected eye for 10 minutes every 2 hours. Placing a slice of cucumber over the eyes can cool them, providing relief.

A pattern, basically a pimple shaped on the eyelid, is another common problem for the eye. It causes redness and swelling and is usually uneasy. Warm, moist compresses are useful for draining the body. Any of the above-mentioned antibiotics or natural conjunctivitis medications can also be used.

NOSEBLEED

it's quite a rare person who never had a nosebleed. The nose has many small blood vessels and is fragile because it sticks out from the neck.

Nosebleeds can occur from external causes such as trauma to the face of factors that influence the nose inside, such as excessive "picking" or upper respiratory infections. Environmental factors may also play a role, for example, cold or dry climates. For rare cases, an underlying illness may be involved, such as defective blood clotting.

Do the following to effectively stop a nosebleed in a patient:

1. Have the patient sit upright with their head tipped slightly forward. Although you may have been taught to tilt your patient’s head backward, this may just cause blood to run down the back of the throat.

2. Have the patient breathe through their mouth.

3. Using your thumb and index finger, firmly pinch the soft part of the nose just below the bone. Push towards the face. Spray the nose with a medicated nasal spray, such as oxymetazoline hydrochloride, 0.05 percent (Afrin), before applying pressure.

4. Apply an ice pack to the side that is bleeding. Cold constricts the blood vessels and may help stop the bleeding.

5. Apply pressure for 5–10 minutes. Be patient.

6. Check to see if your patient’s nose is still bleeding after 10 minutes. If still bleeding, hold it for 10 more minutes.

7. Place a little petroleum jelly inside the nose.

A strip cut of gauze impregnated with Celox or QuikClot may be delicately placed in the nose with stubborn tweezers or a kelly clamp in prolonged cases. Otherwise, the bleeding nose may also be flushed into the nose with sterile saline; then, carefully introduce a thin cloth strip drenched with epinephrine (from an EpiPen or another anaphylactic shock kit). Do not remove the packaging for multiple hours. Additional commercial products, for example, Nasal CEASETM or Wound Seal, are available and are thought to be effective.

Whether the bleeding is caused by trauma or not, blood and clots should be avoided by blowing the nose as it may restart the bleeding.

EARACHE

It's a rare parent who doesn't have to deal with this problem at some point in his childhood. In some cases, this is a recurrent problem that affects an otherwise stable child's quality of life. The most common symptom of the ear is pain, usually caused by an infection.

The ear has three chambers: the outer ear, the middle ear, and the inner ear. Outer and middle ear chambers are the most common ear infections.

Cotton swabs of alcohol moistened to dry the canal after swimming or prolonged sweating are the best way to prevent ear infections. However, you should avoid the strong use of a cotton swab; normally, you should not put anything less in the ear canal than your elbow.

A number of natural remedies are available for earache. Try the following procedure:

1. Mix the rubbing alcohol and ammonia in equal quantities, or hydrogen peroxide as an alternative.

2. Place the affected ear 3–4 drops in.

3. Allow 5 minutes; then tip the head for the mixture to drain.

4. Use warm, plain olive oil and place 2–3 drops in the ear canal. During sleep, a cotton ball with 2 drops of eucalyptus oil may be secured to the opening of the ear.

HEMORRHOIDS

In the lower part of the rectum, hemorrhoids are painful, swollen veins that often protrude from the anus. Low dietary fiber is likely to cause hard stools. During bowel movements, this causes stress. During pregnancy, hemorrhoids are extremely common.

The diagnosis is made by looking at the region. Hemorrhoids appear on the edge of the anal opening as bluish lumps. If the hemorrhoid is internal, a rectal examination with a gloved finger will treat it.

Hemorrhoids only need symptomatic care. Treatments for hemorrhoids include the following:

• Mild corticosteroid creams, including Anusol HCTM or TucksTM pads, help reduce pain and swelling.

• Stool softeners to reduce the inflamed tissue further.

• Compresses hazel to minimize itching.

• Coldwater baths to reduce general discomfort. cold water baths.Even painful hemorrhoids will usually go away by themselves over a few weeks, but sometimes the discomfort is so severe that you may be required to remove the clot from the swollen vein. This is performed by incising the skin over hemorrhoids and draining the clotted blood.

After the area is carefully cleaned up with Betadine, a scalpel may be used (preferably under local anesthesia) to incinerate hemorrhoids. Cut deep enough for the clot to evacuate. As a result, the patient should be quickly relieved. To order to absorb any leakage, gauze pads should be put at the wound. A suture may be necessary in rare cases.

This procedure is not the best way to remove hemorrhoids, as a simple incision does not completely remove it. It could come back later. Modern processes are less traumatic and more permanent in the results, such as placing bands around hemorrhoids.

BIRTH CONTROL, PREGNANCY, AND DELIVERY

A pregnancy and possible complications will be a disaster burden. At the exact wrong time, a pregnant woman will be less than 100% successful and complications may occur.

The mortality rate among pregnant women (also known as the maternal mortality rate) was around 2 to 4 percent per pregnancy during the American Revolution. Since the average female reproductive life of 1800 could expect 6–10 pregnancies, the cumulative maternal mortality rate easily reached 25%. This means that one out of four women died of pregnancy complications either early, during birth, or shortly after delivery.

NORMAL DELIVERY

A couple of things will happen as the woman approaches her due date. The fetus starts to fall down in the pelvis. The abdomen of the patient can look different, or the uterus (fundus) can look lower. The patient may notice a mucus-like discharge sometimes with a bloody component as the neck of the uterus (cervix) relaxes. This is called the "butter show" and is usually a sign that things will happen soon.

You will notice that the cervix is firm, like your nose, when the time limit approaches and is soft, like your lips, once you examine the patient by gently inserting two fingers of a gloved hand. The cervix is called "effacement." As the work progresses, the cervical walls thin out until they are as thin as paper.

Dilatation of the cervical opening is first slow and will accelerate as soon as it is approx. 3-4 cm. At this dilation level, you can put two (normally-sized) fingertips in the cervix and feel firmly; this is the head of the baby. Nonetheless, repeated vaginal examinations are invasive and, in most cases, are not necessary.

Contractions are beginning to become more common. Feel the skin in the sensitive region of your cheek to define a contraction and then touch your forehead. A contraction will feel strong like your brow. False labor contracts are irregular and go away with bed rest and hydration (especially when the patient is on her left side). It's probably the real thing, because contractions come quicker and harder, even with bed rest and hydration! A gush of watery fluid from the vagina also indicates "water breakage" (amniotic sac break), which is also a sign of imminent effort and delivery. Nonetheless, the timing will be highly variable.

Wash your hands and put gloves on to prepare for delivery. Then, set up clean sheets to make the least possible contamination. Tuck a sheet under the mother's buttocks so that the baby, who comes out very slippery, lands on the sheet rather than lands on the ground if you lose grip. Put a towel on the belly of the mother; this is where the baby will go after delivery. Delivery kits with everything you need, including drapes, clamps and bulb syringes, are available online. Avoid touching anything but mum and baby if you can as the practice continues, the baby's head moves down the birth path and the vagina begins to blossom. When the head of the baby begins to appear, it is called' crowning.' If the water is not broken (which can occur even late), the lining of the water bag appears like a smooth gray surface. A certain pressure on the membrane will break it, which is all right at this point. It could help the process.

For space, position two gloved fingers by the perineum, the region between the vagina and the anus, along the edge of the vagina. Put your fingers side by side with gentle pressure. This extends the area to give the baby a little more space.

The head of the baby comes out a little more with each contraction. Don't worry if after contraction it goes back. It should advance slowly, with the head becoming more and more apparent. Encourage your mom to help with every contraction by taking a deep breath and pushing it out slowly.

As the head of the baby emerges, it usually faces up or down, then turns to the side. The cord may seem wrapped around his neck. If so, slip the cord over the head of the baby gently. If the cord is extremely tight and prevents transmission, you can doubly pinch it and cut it between. This releases tension and facilitates delivery.

Then grasp each side of the head of the baby gently and apply gentle pull straight down. This helps the top shoulder out of the birth channel. Then, raise the heat for the lower shoulder to release. When the shoulders are out, the baby comes with one last push. The mother can rest now.

Put the baby immediately on the belly of the mother and clean the mouth and nose with a bulb syringe. She usually starts crying, which is a good sign that she is a vigorous boy. If not, stimulate by rubbing the back of the baby. (It is more a cliché than a suggested practice to stretch the bottom.) Clean the baby and wrap it in a little towel or cloth. At that point, you can clamp the cord with Kelly or umbilical clamps twice (2 inches apart) and cut the cord between them with a scissor. This practice is not a matter of urgency.

Once the baby has given birth, this is the turn of the placenta. Be patient: the placenta is delivered in most cases in a matter of minutes. Generally,

removing the umbilical cord to push the placenta out is a bad idea. Break the cord because the placenta does not come out requires that your hand is deep inside the uterus to extract it. This is traumatic and infectious. You can ask your mother to push if the placenta is almost gone.

If traction is needed to provide the placenta for any cause, place your fingertips over the pubic bone and push as the mild traction is applied. This will prevent the uterus from turning inside (a situation that could potentially threaten life) when the placenta is stubborn. A moderate amount of bleeding following delivery is not uncommon.

After the placenta is out, look at it. The surface of the fetus (the surface to which the fetus is attached) is grey and brilliant; turn it out inside and you can see the maternal surface, which looks like a rough liver version. If a part of the placenta remains inside, it may have to be manually extracted.

The uterus (which now stands at the top of the belly button) naturally controls the bleeding. The uterus may, after delivery, be as tired as the mother and slow to contract. This can lead to excessive bleeding. A gentle massage from the top of the funds will restore it and therefore limit blood loss. This may be necessary from time to time during the first 24 hours after delivery.

Monitor the mother closely in the next few days for excessive bleeding. In normal situations, bleeding becomes increasingly watery as time goes on. This is normal. This is normal. Keep an eye out for fever, foul flushing or other problems.

Put the baby on the breast of the mother immediately after delivery. This starts the secretion of colostrum, a form of breast-generated milk, which is a thick, yellowish liquid; it is full of substances to enhance infection

resistance. Suckling also causes the uterus to contract, which reduces blood loss.

It should be remembered that some of the above knowledge regarding distribution has specific learning colleges. Remember that your goal is to produce physically and emotionally as a healthy mother and baby.

ANXIETY AND DEPRESSION

Depression is a persistent low-mindedness, with a wide variety of physical and psychological symptoms that vary depending on the condition and severity of the condition but may include: First aid for depressions.

Here’s our handy mnemonic for providing first aid for people experiencing depression: THE BLUES

• Time

Make sure you have sufficient time to speak. Interruptions will keep people from sharing what they think.

• Environment

Think about your environment. Try to find a quiet place where you will not be disturbed and where the person is comfortable.

• Be non-judgemental

Try not to offer advice or assumptions. Everyone's experience of mental health is different. It's talking, and you can't solve your problems.

• Listen

With the language of your ears and body. Try and say the least you can.

• Use open questions

Where possible to get the person to open up. “You don’t seem yourself at the moment, how have you been doing?” Avoid questions that have a yes/no answer.

• Encourage to seek help

The treatment of depression by healthcare professionals should be conversational therapies such as Cognitive Behavioural Therapy (CBT) or medicines (antidepressants).

• Suicidal intentions

Research has shown that it doesn't' put the idea in her head' or increase the risk of someone's thinking of committing suicide. If someone expresses suicidal thoughts, you should seek help from a healthcare provider.

Contact the emergency services if you are concerned about the safety of a person.

Try and remember that it doesn't matter what you say, actually, the little you're saying better. It's about showing the person you are there, that you have the time and that it matters.

SLEEP DEPRIVATION

Sleep deprivation occurs when an individual sleeps less than he or she needs to be alert and alert. People vary in how little sleep is required to be regarded as sleepless. Some people, such as older adults, appear more resistant to sleep deprivation effects, while others, particularly children and young adults, appear more vulnerable.

Occasional sleep breaks are usually just a nuisance, but continued failure to sleep can lead to excessive sleepiness during the day, emotional difficulties, poor job results, obesity and a lower perception of the quality of life.

There are a number of effective methods to enhance sleep that does not require medication, including:

• Relaxing techniques: Progressive muscle relaxation with tension in your body and loosening of various muscles to help calm the body. Meditation techniques, consciousness training, breathing exercises and guided imaging can also help. There are audio recordings that can help a person to sleep at night.

• Control of stimulation: This includes controlling before bedtime and the surroundings to moderate the pattern of sleep. For example, a person who controls their stimulation will spend time in bed only if he or she is sleepy, which controls the relationship between being in bed and being ready to sleep.

• Cognitive-behavioral therapy (CBT): This is a form of therapy that allows people to understand and alter the habits of thought behind certain behavior.

It can challenge beliefs that are not healthy and encourage rational and positive thinking. CBT can assist a person in developing a healthier pattern of sleep.

The good news is that the majority of sleep deprivation adverse effects reverse when adequate sleep is achieved. Sleep deprivation treatment is to meet the biological sleep requirements, avoid deprivation and reimbursement of sleep debt accumulated.

• going to bed when tired

• following a routine for bed and wake-up times, keeping it consistent every day of the week

• avoiding eating 2 to 3 hours before bedtime

• if unable to fall asleep after 20 minutes of trying, going to another room and trying to read until feeling sleepy, then returning to bed

• engaging in regular exercise during the day

• keeping the bedroom quiet, dark and a comfortably cool temperature

• turning off electronic devices when you go to bed

NATURAL PAIN RELIEF

Your limited supplies of the above drugs would eventually end in a long-term survival situation. This gives you natural product alternatives that you can develop yourself or maybe find in your environment. Their advantage varies from person to person. Some of these alternatives are described below.

• Capsaicin: An ingredient of chili peppers that deactivates pain receptors, which decreases the pain sensation. This is particularly good for those with headaches, muscle ache and arthritis and neuropathic pain. The most pain relief occurs after a month or so of capsaicin.

• Salicin: The first pharmaceutical ingredient, aspirin and salicin, has been produced since the 19th century. The bark of willow, aspen and poplar trees is home to salicin. Pain sufferers may be relieved by chewing or making tea from these trees on strips of the green Underdark (not outer bark). Like aspirin, salicin also contributes to fever reduction.

• Arnica: A natural anti-inflammatory substance that reduces swelling and, thus, injury to joints and muscles.

• Methylsulfonyl-methane (MSM): A sulfur-derived material that helps to slow down joint degeneration, especially in combination with glucosamine and chondroitin. Arthritis patients also experience significant pain relief over time.

• Curcumin: This substance is found in herbal turmeric that enhances body defense against inflammation and thus reduces pain.

• Ginger root: A ginger root tea is designed to reduce inflammation and alleviate stomach pain.

• Boswellia: This Indian herb produces certain acidic compounds, which are considered useful for chronic pain and decrease inflammation.

• S-adenosylmethionine (SAM-e): SAM-e seems to reduce inflammation and increase brain neurotransmitters to improve the feeling of well-being. Taking this supplement long-term appears to give you the best chance of pain relief.

Be open to any medical strategy; there are many medical woodshed tools, and all methods to keep your family and community health in uncertain times are to be used.

STOCKPILING MEDICATIONS

Accumulation of medicines for the potential collapse of ibuprofen and other non-prescription medicines can be easy. However, this will be a significant issue for those who need to stock prescription medicines; most people do not have a relationship with a medic who can or will accommodate their requests. Antibiotics are an example of drugs that are very useful in a collapse situation. It will be difficult, to say the least, to get these drugs in quantity.

The inability to store antibiotic supplies would cost some poorly prepared individuals their lives in a collapse. The incidence of infection is much greater if people have to fight and are injured. Any hard work is done with a power-down situation, particularly those most of us are not familiar with, can cause different cuts and scratches. Most possibly, these wounds will be filthy. Dirty wounds can get infected, appear red, swollen, and warm to the touch within a relatively short time.

SPECIALIZED MEDICINE

• Insulin & Metformin

Type 2 diabetes is common and if you or a family member suffers from it

Beta Agonists (like Ventolin)

For those who have asthma. Again, if you or someone you know suffers – you must build up a good stock of this ASAP drug. Buy it as you need. It's quite a poor strategy in an emergency and in collapse.

• Antihistamines (like Loratadine)

For the prevention of allergies. You can also utilize the sleeping aids listed immediately afterward because they are simply reused antihistamines of the first generation that have sleepiness as a major side effect.

• Doxylamine Succinate

To cope with insomnia and other sleeping conditions, allergies and the common cold. Antihistamines of first-generation are extremely versatile.

• Phenylephrine

For nasal and sinus congestion.

• Epinephrine Pen

Obviously, for those with disabilities (i.e., who have anaphylaxis during severe allergic reactions), it is important.

• Amoxil

A divisive subject and the jury are still at risk. If you do this, you have the potential for the infection to be temporarily beaten and come back, but with the added fun of antibiotic resistance. While I'd prefer to go to the medic for medicine, I'd prefer to use it instead of nothing (if it's a situation that you won't be able to get help–again, SHTF / TEOTWAWKI preppers). It's easy to talk about the ideal solution when society is still on its feet, but if you have only bad choices–choose the best.

• Ammonia Inhalant

To deal with fainting and general lightheadedness – commonly referred to as respiratory stimulants.

• Oral Rehydration Salts

To deal with water absorption after diarrhea and fatigue after extreme physical exertion and stress (Electrolyte replacement).

• Penicillin

Penicillin is the time-tested antibiotic reference. The fight against bacteria in your body and its historical lines makes it easy to get access to information about secondary effects and dosage after so many years of common use. Be mindful that certain individuals are resistant to antibiotics dependent on penicillin. Difficult to get in the neck of the woods without a script. Please note that you should be mindful of storage conditions even if you can get your hands on some of them.

HOW TO GAIN ACCESS TO AND USE VARIOUS ANTIBIOTICS, ANTI-FUNGALS AND ANTI-VIRAL DRUGS

Antibiotic Options

For many years we have had parrots. We are currently growing tilapia in an aquaculture pool as food fish. After years of use of aquatic medicines in fish and avian medicinal products in birds, we decided to evaluate them in the event of a collapse. They appeared to be good candidates: they were all widely available, available in various types and did not require a medical license to obtain them.

A close check of the bottles revealed that the drug itself was often the only ingredient, identical to that obtained by local pharmacy prescriptions. For example, when the bottle is called Fish Mox, the only ingredient is amoxicillin, an antibiotic commonly used by humans.

Many of these aquatic and avian antibiotics are only available in dosages corresponding to pediatric or adult human dosages. Why is this supposed to be? Why should a guppy with a length of 1 inch have the same dose of, say, Amoxicillin as a 180-pound adult human? I was told it was because the medication was dissolved in water. However, there are few instructions at the time of this writing which show you how much you can put in a 1⁄2 gallon fishbowl instead of a 200-gallon aquarium.

Ultimately, my acid test was to analyze my own pills or capsules. The aquatic or avian drug had to be the same as the one in human medicine bottles. The same applied when opening the bottle of Fish Mox Forte and

comparing it with Dava Pharmaceuticals ' human amoxicillin 500 mg bottle: rot and pink capsules and WC 731 letters and numbers on them.

It is, therefore, logical to believe that they are manufactured in the same way as human antibiotics. Moreover, I think they probably come from the same batches, and some go to human pharmacies, others to veterinary pharmacies.

This does not mean that my criteria are met by all the antibiotic medicines sold to animals. Most antibiotics of a cat, dog, and livestock contain toxins that may even have adverse effects on humans. Look only for the veterinary medicines with the antibiotic as the only ingredient.

Here is a list of the products that meet my criteria and that I believe will be beneficial to have as supplies and are discussed in the next section:

• Fish Mox (amoxicillin 250 mg)

• Fish Mox Forte (amoxicillin 500 mg)

• Fish Cillin (ampicillin 250 mg)

• Fish Flex (Keflex 250 mg)

• Fish Flex Forte (Keflex 500 mg)

• Fish Zole (metronidazole 250 mg)

• Fish Pen (penicillin 250 mg)

• Fish Pen Forte (penicillin 500 mg)

• Fish Cycline (tetracycline 250 mg)

• Fish Flox (ciprofloxacin 250 mg)

• Fish Cin (clindamycin 150 mg)

• Bird Biotic (doxycycline 100 mg). Used in birds, but the antibiotic is, again, the sole ingredient.

• Bird Sulfa (Sulfamethoxazole 400 mg/Trimethoprim 80 mg). They are also used for birds.

Such drugs are available from many online sites without a prescription. They come with many 30–100 tablets, and it seems that you can stock up as much as you need to survive. These quantities could hardly be obtained from even the most sympathetic medic.

Naturally, anyone could be allergic to one of the antibiotics, but it would be a very rare person who is allergic to them all. Cross-reactivity between penicillin drugs and Keflex is 10% likely. (If you have a penicillin allergy, you could also have Keflex allergy.) There are safe alternatives to penicillin-allergic patients. Any of the following antibiotics should not cause a reaction in a patient allergic to penicillin-family drugs:

• Doxycycline

• Metronidazole

• Tetracycline

• Ciprofloxacin

• Clindamycin

• Sulfa drugs

ANTIBIOTIC OVERUSE

It is important to understand that you do not want to use antibiotics indiscriminately for any minor illness. In a breakdown, the medicine is also a quartermaster; you want to wisely dispense this limited and, indeed, valuable provision of life-saving drugs. You have to line up fine between observant (do nothing) patient management and aggressive (do everything). Liberal antibiotic use is a bad strategy on a few grounds: overuse may encourage the spread of resistant bacteria, as you will recall from 2011 turkeys outbreak of salmonella (food poisons due to bacteria in the genus Salmonella). Since 100 people had been sent to the hospital with serious diarrheal disease, millions of pounds of turkey meat were discarded.

• Potential allergic reactions that may cause anaphylactic shock may occur.

• It may be harder to make a diagnosis. You may "mask" the condition if you give antibiotics before you know what medical problem you are actually dealing with. In other words, symptoms could be improved temporarily, which would have helped you to know your patient's disease. This might take you valuable time to determine the correct treatment.

You can see that the wise use of antibiotics is important, under your close supervision, to make full use of their benefits. Discourage members of your party from using these medications without contacting you first.

HOW TO USE ANTIBIOTICS

There are many antibiotics, but which would make good supplements to your medical storage accessible to the average person? When do you use a specific medicine? In this segment, we speak about antibiotics that you

want in your medical arsenal (all available in veterinary form without a prescription):

• Amoxicillin 250 mg or 500 mg (Fish Mox, Fish Mox Forte)

• Ciprofloxacin 250 mg or 500 mg (Fish Flox, Fish Flox Forte)

• Cephalexin 250 mg or 500 mg (Fish Flex, Fish Flex Forte)

• Metronidazole 250 mg (Fish Zole)

• Doxycycline 100 mg (Bird Biotic)

• Ampicillin 250 mg or 500 mg (Fish Cillin, Fish Cillin Forte)

• Sulfamethoxazole 400 mg/Trimethoprim 80 mg (Bird Sulfa)

• Clindamycin 150 mg (Fish Cin)

• Azithromycin 250 mg (Aquatic Azithromycin)

ANTIFUNGAL DRUGS

Not every drug you use is going to kill bacteria to treat the infection. Viruses and fungi may also cause infection and these medicines must also be preserved. Rare fungal infections such as ringworm, athlete's feet and jock itch are rife in wet weather conditions or in cases where socks or underwear can not be changed frequently.

It makes sense, therefore, to keep these antifungal drugs around. Clotrimazole (Lotrimin) is a good choice here because it comes in cream or powder without a prescription. For vaginal yeast infections, medicines like miconazole (Monistat) would be useful. Fluconazole (Diflucan) is also

available as an oral tablet that can be more convenient than creams or powders but requires a prescription.

ANTIVIRAL DRUGS

Finally, antiviral drugs will also be useful. Many of the infections, in particular respiratory infections, that we assume are more likely to be viral in nature. Antibiotics have no significant effect on viruses, but many patients are going to ask their medics for an antibiotic prescription. This overuse is one of the reasons for the growth of antibiotic resistance.

Tamiflu (oseltamivir) is one of the most popular antiviral influenza medicines. Tamiflu provides effective relief from influenza symptoms. It can be taken until symptoms start with exposure to the infection. If the medicine is taken early enough, it could even prevent the disease completely. Taking a flu-like syndrome in the first 48 hours, the severity and duration of the symptoms can be decreased.

Tamiflu's preventive adult dosage is 75 mg once a day for 10 days. Take 75 mg 2 times a day for 5 days to treat symptoms. For children, use this regimen but with the following doses:

- 15 kg (33 lbs) or less—30 mg dosage
- 16–23 kg (34–51 lbs)—45 mg dosage
- 24–40 kg (52–88 lbs)—60 mg dosage
- More than 40 kg (89 lbs or more)—adult dosage

If Tamiflu was taken after the first 48 hours of flu symptoms, it would not have much effect. It also has not been shown to be effective against anything other than influences (for example, it will not treat Ebola). However, it is wise to obtain prescriptions at the beginning of each flu season for each member of your family.

Other antiviral drugs, like acyclovir or famciclovir, are typically used to treat herpes virus conditions like the ones listed below.

• Shingles: 800 mg / kg for five to ten days per 4 hours

• Kids under 40 kg (and 2 years and older): 20 mg / kg for five days, 4 times a day.

• Adults: 800 mg 4 times a day for five days

• Children less than 40 kg (and older than two years): 20 mg / kg orally 4 times a day for five days.

Adults: 200 mg every 4 hours for 10 days or 400 mg every three times a day for 7–10 days.

• Children under the age of 40 kg (and older than 2 years): 40 to 80 mg / kg per day at three to four doses split for 5 –10 days.

Don't forget that natural products such as garlic and sweetheart have significant anti-infection properties. For example, garlic is believed to have antibacterial, antifungal and antiviral effects. Many people also report important antibacterial and antiviral effects with colloidal silver. Before antibiotics, there was silver, still used to prevent infection in topical creams.

Do Not Go Yet; One Last Thing To Do

If you enjoyed this book or found it useful, I'd be very grateful if you'd post a short review on it. Your support does make a difference, and I read all the reviews personally so I can get your feedback and make this book even better.

Thanks again for your support!