

# FIRE EXTINGUISHERS FOR CAMP

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## **FIRE EXTINGUISHERS:**

The threat of fire is always present in any colonial camp. One may always be on the lookout for any possible conditions that could lead to a fire that could involve, but not be limited to, tents, grass areas, artillery, cartridge boxes and powder storage boxes, etc.

The addition of straw for tent bedding creates a hazard in itself. Straw being hollow creates more of a hazard and burns much hotter than hay due to the fact that, being hollow, allows for more air within the burning material and a much hotter and faster burning fire. One should have second thoughts about using straw and hay as well.

A fire in a tent can completely consume the structure in 30 seconds allowing for limited time of escape and very little fire fighting time. Each unit should keep and maintain at least one fire extinguisher in their camp. Better still, each tent should have its own fire extinguisher.



When a fire starts, there is no time to run for a fire extinguisher and maybe have to look through the camp to find it. The unit camp should have a "camp fire station" in a location that all unit members should know about. In addition all tent fire extinguishers should be kept in the same place in each tent so that, in an emergency, anyone can grab it to fight a fire. Better still, governing or mother organizations should designate to tent and unit camp locations of fire extinguishers in camps at official events. There should be a location standard.

## **TYPES OF EXTINGUISHERS:**

One may ask, what type of fire extinguisher should I have for my tent or camp? Does the size of the tent dictate the size of and type of, fire extinguisher?

The size of the fire extinguisher needed may be determined by measuring the overall surface area of the tent canvas. For each 144 square feet of surface area the extinguisher should have a 2-A rating and 4 BC. However, if your tent is bigger, say 288 square feet then, you should go for at least a 4-A, 10BC extinguisher. However, this is only for the surface area of the canvas. It does not take into account the furnishing, (fire loading) which will be different for each tent. One should purchase the largest extinguisher that they can afford. When one looks at the price of a fire extinguisher and then the cost of the tent and furnishings of a tent, not to mention the life involves, the best and the largest extinguisher possible is well worth the purchase price.

ABC type extinguishers tend to be better than single letter rated extinguishers because they can be used to combat the three common classes of fire. A- ordinary combustibles, B- flammable liquids, (good for cooking areas), and C- electrical, (good for your car or generator). A 2-A rating is for about 144 square feet, a 4 B rating is good for about 4 square feet of deep 1" burning flammable liquids, and, C has no number rating. One must remember that the power source must be shut off if the C rating is to work on electrical fires.

One should remember that extinguishers can be heavy. Get the largest rated one without being so large that you can not handle it. The ratings are for use by a "trained" operator. Most people do not get hands-on training in the proper use of fire extinguishers so that in real world use by the average person, one may not expect to obtain the maximum rated fire fighting power of the rating on the extinguisher label.

There are many different types of extinguishing agents; water, Carbon Dioxide, Baking Soda, to name a few. The A, B, C extinguisher contains monoammonium-phosphate base chemical as the extinguishing agent. This agent tends to coat the ordinary burning material and assist in fire extinguishment when properly used. The bicarbonate-base or potassium chloride tends not to and is not generally "A" rated.

Generally to more the purchase price, the better the quality of the dispensing device. "Good" extinguishers can be refilled and used again. The bargain priced extinguishers generally can not be recharged or reservice. However, some persons rather buy another new extinguisher and not reservice an old one. However, price along does not always mean quality. One should always look at the rating in order to see if it is best for one's needs. Generally, the higher the rating the more fire fighting power and coverage of, area.

I currently use a 10 pound (amount of agent chemical), fire extinguisher. It has a rating of 10-A, 60-BC. The total weight of agent and extinguisher is about 14 pounds. This extinguisher is effective for my type of tent. But only can the rating be depended upon, as stated above, in the hands of a trained person.

Do two smaller extinguishers equal one larger one, even if the ratings are added together? no, not in all cases. The larger single extinguisher may do the job as rated. But, when using two extinguishers one must stop to change extinguishers or look for the second one. During this brief time the fire will continue to burn and get larger. All that you extinguished with the first extinguisher will be lost. This will leave you with the second extinguisher which is still too small to do the job. This is most true with flammable liquids when the "burn back" can be instantaneous. With a large extinguisher of the correct size there is no interruption in the extinguishing process.

Remember: in purchasing a fire extinguisher read the label and rating and purchase one with the larger rating if possible. Price should not be a consideration. Remember the cost to replace everything that you own.

Speak to a knowledgeable person if you are not sure. Explain that your tent is not the only thing that may catch fire. The items in your tent such as desk, bed, rugs, uniforms, muskets, black powder, food, etc. may be more of a problem than the tent alone. Make sure that you understand the operation of the fire extinguisher and that it is not to large or heavy for you to handle. One large one of the proper rating may be better than two smaller ones with combined ratings equal to the larger one. Maintain your extinguisher. It will be necessary in an emergency and ready for instant use. One should read the label for instructions in maintaining you extinguisher.

An extinguisher is of no use if you can't find it instantly in an emergency. Keep all extinguishers at the ready at all times. Other persons should have access to the extinguisher if you are not around.

For more information one may consult the National Fire Protection Handbook or Code #10 NFPA Recommendations for Fire Extinguishers. This paper is not the final word on fire extinguishers. It is more an introduction to the subject with information from the above stated material and information listed on the labels of fire extinguishers. There are many brand name ' extinguishers which leaves to the purchaser the decision of what to buy through research and knowledge.

### **COMMENTS ON FIREFIGHTING:**

As mentioned above, tent fires can take place very quickly. Each unit and the camp as a whole, should have a fire plan. Persons may want to keep in mind that fire can move from one area to another or one tent to another in a matter of seconds.

There should be a plan to take down all tents that are next to the burning tent in order to stop the spread of fire. In some cases this may be more important than first fighting the fire. However, if a person(s) are in the burning tent, then firefighting and rescue must take priority!

Someone should call the fire department and don't figure that someone else has already done this. Just go ahead and do it.

Some of the newer tents have flame-retardant materials. While this can slow the fire, it can also allow the fire to burn longer in the tent without being detected. Then, when one opens the door and allows more air to enter the 'fire can gain rapidly in size. One may want to consider aiming the fire extinguisher under the edge of the tent in order to start fire extinguishment This will help keep the agent confined to the inside of the tent. (if that is where the fire is). One may also want to consider collapsing the tent in order to help smother the fire. If a person is in the tent it is priority to get to the person and get that person out of the tent or fire.

Don't forget to check other tents not involved in fire. The burning process produces poison gases and smoke. Some persons may be sleeping or children may hide in tents and be overcome by the gases and smoke. Check surrounding tents and do a head count to include everyone in your unit.

Larger tents may present a problem because one may not be able to get the tent down quickly, fire may spread to other large or small tents, the fire will be much greater, and most of all it may be difficult to locate a person within the burning tent or there may be more persons in the tent or families.

Large tents should not use hay or straw or for that matter, no tent should use hay or straw.

Remember, wind can send the fire right down the tent line destroying all the tents down wind while leaving the tent up wind next to the burning tent, intact.

There should always be water available for fire extinguishment at camp fire and kitchen areas. Fire extinguishers should be positioned there as well. Fires should never be left unattended. Never place pine trees or pine boughs on the fire or any vegetation with needles or dry leaves, etc. No powder, cartridge boxes, loaded firearms should be allowed in the kitchen or camp fire areas.

A member of the unit should be assigned to check the fire/kitchen area and unit street before turning in for the night.

The term "open flame" means any fire directly open to the air or without any protection around it. A candle placed on a block of wood or in a can would be an example of an open flame. However, a candle within a lantern that has all sides intact, i.e.: glass and door that closes, and top, etc. may not be considered an "open" flame. Candles in any form should not be allowed in tents at night! Colonial lanterns are not really considered safe and gas lanterns are not recommended. Battery powered lights are safer.

When ever a unit camps the person acting in charge should have the emergency telephone numbers for authorities in the area where the camp is located. When the larger organization is running the event, someone on staff should have these numbers as well and both should have the means at hand to contact them without delay if needed.

#### **ARTILLERY CONSIDERATIONS:**

Fire extinguishers should be carried on the guns in the side boxes. A job for a young person not old enough to man the gun or any other person is for that person to be assigned as extinguisher person and to carry an extinguisher, in a canvas bag, in the field with the guns. There should be at least one person for each group of guns. Artillery may want to consider the addition of a CO2 extinguisher for blowing out the charge if the is a miss or hang fire and the charge must be removed. However, it is necessary to make an adapter so that the fire extinguisher can be used to blow out the charge by applying the pressure through the touch-hole.

Additional fire extinguishers should be at hand in the direct location of the powder storage area. All members of the unit should know that location and the location of the extinguishers.

No one other than unit members should be allowed in the area/camp when powder is being transferred from storage to guns or if, for some reason, charges must be made in camp, (not recommended). Guards should be placed at these areas when activities are taking place. There should be no smoking at any time in the artillery camp or artillery park. Also no smoking in the field at all or anywhere that powder is present.

Don't forget about the natural cover of the ground area. Under dry conditions fire can not only burn on the surface, but under the surface in the under brush, roots, and dead or rotting matter. Always dig down to check for fire and check the area before leaving camp fires, etc. Fire can burn under the ground a spread to other tents without being seen.

#### **PLANNING:**

Fire prevention, planning, and fighting is everyone's job at an historic reenactment. Fire planning and having a workable plan must take place well before there is a problem. Older members as well as new ones should review fire plans on a regular basis. Prevention is key and sound planning necessary if we all want a safe and enjoyable reenactment experience free of any injury from fire with no loss of equipment or tents. Horses should be part of the plan as to what should be done with them during a fire emergency and safety in the area where horses are kept, as well as any other areas of camp. If we all work together we can stay safe.

This information presents the basics for fire consideration for the reenactor. It is by no means, the final word on this subject, or, should it be.



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