Basic Guidelines for Operating an Equine Rescue or Retirement Facility
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**INTRODUCTION**

There are all types of equine management facilities, from state-of-the-art complexes with individual stalls and caretakers for each horse to more basic operations where horses are pastured year-round with access to simple run-ins for shelter. Depending on the resources available, including acreage, quantity and quality of forage, staff levels, management preferences, numbers of equines, and a variety of other factors (including financial considerations), management practices can vary widely. However, with a sound knowledge of equine management, good planning and some creativity, equines can be kept healthy and happy without spending too much money.

Caring for a horse or other equine (the broader term of equine is used throughout this document) is a significant, time consuming, and long-term commitment not to be entered into lightly. No organization or facility should house more equines than can be managed with available resources, particularly where the health and condition of the equines and sanitation of the facility are concerned. Taking in more animals than can reasonably be cared for endangers the welfare of the animals and their caretakers.

Equine rescue and retirement facilities must have good working relationships with local licensed veterinarians and should consult with them as needed on various matters, including routine health maintenance, emergency veterinary care, and the evaluation of incoming equines. Facilities also should have good working relationships with local farriers. Forging a relationship with local law enforcement, humane organizations, and other equine rescue and retirement facilities is also encouraged.

Telephone numbers for veterinarians, farriers and other professional service providers should be prominently displayed at the facility in case of an emergency. Written documentation on matters such as feeding, schedules and medications should be kept in a central location so that more than one person is aware of and has access to the standard operating procedures. Developing and practicing an emergency preparedness plan, including an evacuation routine for both people and animals, is also highly recommended.

These guidelines, while applicable to general equine management, are designed especially for use by non-profit equine rescue and retirement facilities. While not exhaustive, they offer basic parameters for operating such a facility. In addition, any facility or individual keeping equines must comply with all relevant federal, state and local laws and zoning ordinances.
ENCLOSURES, SHELTER AND FENCING

Various types of enclosures for equines include stalls, dry lots and pastures. Regardless of what type is employed, unless otherwise directed by a veterinarian, equines must have sufficient opportunity and space to exercise daily and freedom of movement so as to reduce stress and maintain good physical condition. Space and provisions for exercise should be appropriate for the age, breed or type, condition and size of the equine.

Provided the health and safety of any equine is not compromised, compatible equines should be pastured together to allow social interaction. Equines must be monitored to ensure that more dominant equines do not prevent others from accessing shelters. If this occurs, the animals must be separated as necessary to ensure the safety and welfare of each equine.

Equines must be provided with natural or man-made shelters that provide each equine protection from extreme weather (including, but not limited to, prevailing wind, snow, sleet, rain, sun and temperature extremes). Run-in shelters consisting of a roof and three sides are versatile and inexpensive to construct. In times of inclement weather, they allow equines protection from the elements, and in the summer, ample shade and relief from flies.

Shelters must be constructed to provide sufficient space for each equine to turn around, lie down, move his or her head freely, etc. For instance, a stall measuring 10½’ x 10½’ is the recommended minimum for the average 1,200 lb. horse.

Shelters must be constructed or modified to allow free air flow to control humidity, avoid temperature extremes, reduce airborne contaminants, and prevent air stagnation. As a general rule, ventilation should not be sacrificed for warmth.

All enclosures and shelters must be kept in good repair and free of standing water, accumulated waste, sharp objects and debris.

Fencing must be of solid construction, without sharp edges, and visible to equines. Electric wire or tape fencing may be used, but must be visibly marked for equines (via brightly colored hanging streamers or ties) and humans (via signage). Barbed wire and high tensile wire fencing pose serious safety risks and should never be used as fencing for equines. The sharp points and twisted barbed wire can injure an equine even when the fence is well maintained. Both barbed and high tensile wire can cause severe damage to an equine’s legs and even cause broken bones if the equine should get caught in downed or sagging sections of fence. All fencing must be monitored on a regular basis to maintain safety and effectiveness.
FEED

Under normal circumstances, equines must receive at minimum the equivalent of 1.5 to 2 percent of their body weight in high-quality forage per day, unless otherwise directed by a veterinarian. If natural forage is insufficient in quality or quantity, high-quality hay should supplement the diet. Nutritious grain may also be used to supplement the diet.

Diet should be planned with consideration for the age, breed or type, condition, size and activity level of the equine. Pregnant or lactating mares require significantly more feed to meet their nutritional needs, and their diets must be adjusted accordingly. Starved equines must receive a starvation refeeding diet, as directed by a veterinarian (see “New Arrivals” on page 10 for further information).

If more than one equine is fed at the same place and time, it is the responsibility of the owner, manager or caretaker to ensure that each of the animals receives nutrition in sufficient quantity. If necessary, equines must be separated during feeding to ensure each has access to adequate nutrition without interference from more dominant individuals.

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Equines must have access to trace mineralized salt formulated for equines. Both block and loose form work well.

All feeding receptacles must be kept clean and free of contaminants, such as feces, mold, mildew and insects. Grain must be kept in closable containers to prevent infestation by insects and rodents. Hay must be kept dry and free of mold and mildew.

WATER

Pastured or stalled equines must have access to clean, potable water at all times.

Equines who are being trained, worked, ridden or transported must be provided water as often as necessary for their health and comfort. Activity levels and climatic conditions such as relative humidity and air movement must also be considered.

All water receptacles must be inspected daily, kept clean and free of hazardous contaminants, and be positioned or affixed to minimize spillage.

In warm climates, water receptacles should be placed in available shaded areas.

Use of defrosters to prevent freezing of drinking water in inclement weather is recommended, although wiring must be secured out of equines’ reach. Any ice that forms must be broken and/or removed regularly so as to allow equines constant access to water.
GENERAL
EQUINE
HEALTH
AND
VETERINARY
CARE

Each equine must be observed for illness and/or injury at least once every 24 hours, and a veterinary professional must be contacted if an equine is known or suspected to have experienced injury or illness, or displays abnormal behavior attributable to injury or illness.

All equines must maintain a body condition score of 4 or above using the Henneke Body Condition Scoring System (see Appendix A on page 13). Exceptions can be made for equines having been at the facility for less than six months and showing continued and documented improvements, and for equines under the regular care of a veterinarian. Photographic and written records of the animal’s condition over time should include body condition, weight fluctuations, feeding program and veterinary care. This documentation is particularly important for any equine arriving at the facility in a poor condition or for any equine failing to reach a score of 4 on the Henneke scale within six months of arrival at the facility.

Quantitative fecal exams must be performed as recommended by a veterinarian and equines must be treated for parasites as needed or as otherwise directed by a veterinarian. Proper manure management will also help control insects and parasites. Manure must be removed from dry lots, paddocks and relatively small pastures on a regular basis, and stalls must be cleared of manure every 24 hours. Manure must be disposed of properly and can be spread onto empty pastures during hot, dry weather. Where feasible, remove standing water. Use of fly sprays, masks and other methods may also be used to control insects, particularly in summer months.

As recommended by a veterinarian, equines must receive vaccinations including, but not limited to, eastern and western encephalomyelitis (sleeping sickness), West Nile virus and tetanus. Other vaccinations to consider in consultation with a veterinarian include, but are not limited to, rabies, influenza, rhino and strangles.
Requirements for screening for equine infectious anemia (via Coggins test) vary from state to state, and facilities must comply with all relevant laws. In addition to being required generally when moving horses across state lines, a Coggins test is recommended for all new equine arrivals and when equines are being adopted out to new homes or are being taken to shows or other gatherings.

The facility must maintain, and have clearly posted for all staff and volunteers, the name and telephone number of one or more veterinarians able to make emergency calls to the facility. If foster facilities or homes are used to board equines, those caretakers must have access to veterinarians able to make emergency calls, and the names and telephone numbers of those veterinarians must be kept on file with the primary rescue or retirement facility.

**DENTAL CARE**

Equines must receive regular dental check-ups and treatment as necessary to facilitate proper and adequate food digestion. It is recommended that equines under 5 years of age and over 15 years of age receive dental check-ups twice annually, while equines between 5 and 15 years of age should receive dental check-ups once a year. Equines with dental problems must be examined by a veterinarian and receive treatment as needed.

**HOOF CARE**

Equines must receive hoof care, maintenance and trimming every six to eight weeks, or as directed by a veterinarian or qualified farrier. Hoof care must be performed by a qualified farrier or other experienced person knowledgeable in farrier practice. Exceptions may be made when a veterinarian determines that such care would endanger the equine and/or his caretaker(s), i.e., in the case of a newly arrived equine (see “New Arrivals” below), or in the case of a wild equine who is pastured in sufficiently rocky or rough terrain so as to be able to self-maintain his or her hooves. Whenever such exceptions are made, regular photographic and written documentation of hoof condition is recommended.

**NEW ARRIVALS**

Unless doing so would compromise the health and safety of the equine, veterinarian and/or caretakers, it is recommended that all new equines arriving at the facility without veterinary records undergo a physical examination by a veterinarian and be quarantined for at least two weeks. Where a full physical examination is not possible, a veterinarian must at least observe and make recommendations on the equine.

If emaciated, the equine must receive a starvation refeeding diet, along with other necessary veterinary care. (See Appendix B on page 17 for one suggested refeeding program.)

New arrivals who are debilitated, untamed or otherwise difficult to handle need not be vaccinated immediately, nor should they be bathed, groomed or have their hooves trimmed unless a veterinarian prescribes these treatments for a medical condition. Such equines are often best cared for through relative isolation, rest and handling by just one or two people.
Parasite control of an equine with unknown deworming history and who is in a debilitated state must be performed under the direction of a veterinarian.

**ADOPTIONS**

It is strongly suggested that all adoptions be accompanied by a legally binding document prohibiting the adopter from selling or placing the equine in question with another owner or facility without prior written approval of the sale or transfer from the facility from which the equine was adopted.

**BREEDING**

Equines in rescue or retirement facilities must not be bred. All studs should be gelded, except when determined by a veterinarian to be medically dangerous for the equine. Studs who cannot be gelded must be kept separate from mares. If pastured, studs must be physically separated from pastured mares with a buffer zone or aisle between each pasture, wide enough to prevent nose-to-nose contact and/or fighting.

If pregnant mares arrive at the facility, a veterinarian must provide necessary care. Following birth, mother and foal must be allowed to stay together for a minimum of four months, unless otherwise directed by a veterinarian. A veterinarian should advise on safe weaning techniques to minimize stress and digestive upset of the foals, and proper nutrition to meet the additional needs of pregnant or lactating mares.

**HUMANE EUTHANASIA**

Humane euthanasia should be employed when an equine:

- Is not mobile and a veterinarian is of the opinion that mobility will not return;
- Has a prospective quality of life that—with veterinary guidance—is deemed so poor that euthanasia is the most humane option within the means of the organization;
- Is experiencing chronic pain for which there is no medical relief or the relief is not within the financial capacity of the facility;
- Is affected by a degenerative medical condition for which there is no cure; or
- Poses a serious threat to other animals or humans.

Euthanasia should only be administered by a licensed veterinarian, except in emergency circumstances where the equine is injured beyond recovery and is suffering irreversibly. The carcass must be disposed of in compliance with all relevant laws.
Conformational differences between horses may make certain criteria within each score difficult to apply to every animal. In such instances, areas influenced by conformation should be taken into account when interpreting the final score.

Conformation also changes in pregnant mares as they approach parturition (birth). Since the weight of the foal tends to pull the skin and musculature tighter over the back and ribs, greater emphasis is placed upon fat deposition behind the shoulder, around the tailhead and along the neck and withers.

The chart rates the horses on a scale of 1 to 9. A score of 1 is considered poor or emaciated with no body fat, and a score of 9 is considered extremely fat or obese. Equine veterinarians consider a body score of between 4 and 7 acceptable, with 5 considered ideal. (Source: Habitat for Horses)

**SIX BODY POINTS TO CHECK**

Don Henneke, Ph.D., developed the Henneke Body Condition Scoring System during his graduate study at Texas A&M University. It is based on both visual appraisal and palpable fat cover of the six major points of the horse that are most responsive to changes in body fat. The Henneke Chart (see page 15) is a standardized scoring tool, whereas the terms “skinny,” “thin,” “emaciated,” or “fat” are all subjective terms that have different meanings to different people.

The Henneke Scoring System provides an objective means to evaluate a horse’s body condition regardless of breed or type, gender, or age. It is widely used by law enforcement agencies in horse cruelty cases, and is accepted as a scientific method of evaluating equine body condition in courts of law.

Six parts of a horse are evaluated—the neck, withers (where the neck ends and the back begins), shoulder, ribs, loin, and tailhead. When using the Henneke System, the person conducting the evaluation should always make physical contact with these parts, and the kind of touch used is important. Simply stroking the animal lightly won't provide an accurate idea of the horse's condition; the examiner must apply pressure to each part in turn. When a horse has a long haircoat it is particularly imperative that the horse be examined carefully by hand. Otherwise, in all but the most extreme cases, the horse's long haircoat will hide protrusions of bone.

The pressure applied should be similar to that of a massage; pressing a horse’s side with one’s hand and feeling the flesh covering the ribs will indicate how much fat is present. When checking the withers, the examiner should feel all around the area as if squeezing firm clay. Be both firm and gentle—both traits are necessary to properly score a horse.

After pressing each part of the horse with the hands to feel for body fat, the examiner assigns each area of the body the numerical score corresponding to the horse’s condition. The scores from each area are then totaled and divided by six. The resulting number is the horse’s rating on the Henneke Body Scoring Condition Chart.
# Henneke Body Condition Scoring Chart

<table>
<thead>
<tr>
<th>Condition</th>
<th>Neck</th>
<th>Withears</th>
<th>Shoulder</th>
<th>Ribs</th>
<th>Loins</th>
<th>Tailhead</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>1 Poor</strong></td>
<td>Bone structure easily noticeable</td>
<td>Bone structure easily noticeable</td>
<td>Bone structure easily noticeable</td>
<td>Ribs projecting prominently</td>
<td>Spinal processes projecting prominently</td>
<td>Tailhead, pinbones and hook bones projecting prominently</td>
</tr>
<tr>
<td><strong>2 Very Thin</strong></td>
<td>Bone structure faintly discernible</td>
<td>Bone structure faintly discernible</td>
<td>Bone structure faintly discernible</td>
<td>Ribs prominent</td>
<td>Slight fat covering over base of spinous processes/ Transverse processes of lumbar vertebrae feel rounded/Spinous processes are prominent</td>
<td>Tailhead prominent</td>
</tr>
<tr>
<td><strong>3 Thin</strong></td>
<td>Neck accentuated</td>
<td>Withers accentuated</td>
<td>Shoulder accentuated</td>
<td>Slight fat cover over ribs/ Ribs easily discernible</td>
<td>Fat buildup halfway on spinous processes but easily discernible/Transverse processes cannot be felt</td>
<td>Tailhead prominent but individual vertebrae cannot be visually identified/Hook bones appear rounded, but are still easily discernible/Pin bones not distinguishable</td>
</tr>
<tr>
<td><strong>4 Moderately Thin</strong></td>
<td>Neck not obviously thin</td>
<td>Withers not obviously thin</td>
<td>Shoulder not obviously thin</td>
<td>Faint outline of ribs discernible</td>
<td>Negative creases (peaked appearance) along back</td>
<td>Prominence depends on conformation/Fat can be felt/Hook bones not discernible</td>
</tr>
<tr>
<td><strong>5 Moderate</strong></td>
<td>Neck blends smoothly into body</td>
<td>Withers rounded over spinous processes</td>
<td>Shoulder blends smoothly into body</td>
<td>Ribs cannot be visually distinguished, but can be easily felt</td>
<td>Back is level</td>
<td>Fat around tailhead beginning to feel soft</td>
</tr>
<tr>
<td><strong>6 Moderately Fleshy</strong></td>
<td>Fat beginning to be deposited</td>
<td>Fat beginning to be deposited</td>
<td>Fat beginning to be deposited</td>
<td>Fat over ribs feels spongy</td>
<td>May have slight positive creases (a groove)</td>
<td>Fat around tailhead feels soft</td>
</tr>
<tr>
<td><strong>7 Fleshy</strong></td>
<td>Fat deposited along neck</td>
<td>Fat deposited along withers</td>
<td>Fat deposited behind shoulder</td>
<td>Individual ribs can be felt with pressure, but noticeable fat filling between ribs</td>
<td>May have a positive crease down the back</td>
<td>Fat around tailhead is soft</td>
</tr>
<tr>
<td><strong>8 Fat</strong></td>
<td>Noticeable thickening of neck</td>
<td>Area along withers filled with fat</td>
<td>Area behind shoulder filled in flush with body</td>
<td>Difficult to feel ribs</td>
<td>Positive creases down back</td>
<td>Tailhead fat very soft</td>
</tr>
<tr>
<td><strong>9 Extremely Fat</strong></td>
<td>Bulging fat</td>
<td>Bulging fat</td>
<td>Bulging fat</td>
<td>Patchy fat appearing over ribs</td>
<td>Obvious creases down back</td>
<td>Building fat around tailhead</td>
</tr>
</tbody>
</table>

(Source: Habitat for Horses)
WHAT HAPPENS DURING STARVATION

During the starvation process, the horse initially uses any fat and carbohydrate stores in his body to supply energy for metabolism. This is the normal process for any healthy horse: fat and carbohydrates are used for energy, exercise, brain function, circulation, etc., and are then replaced with nutrients from food. The cycle is constant and never-ending, even during sleep. In a starved animal, once this source of fat and carbohydrate is gone, energy is derived from the breakdown of protein. While protein is a component of every tissue, there are no inert stores of it in the body such as there are for fat and carbohydrates. Consequently, the starved body uses protein not only from muscles, but also from vital tissues such as the heart and even gastrointestinal tissues—tissue that is necessary for life. The starved body cannot select which tissue protein

APPENDIX B

NUTRITION FOR REHABILITATING THE STARVED HORSE

Dr. Carolyn Stull and her team of equine welfare experts provide new guidelines for refeeding starved horses.

It is difficult to comprehend the long-term neglect and surrounding situations that produce such a devastated, depressed creature as a starved horse. The bones are so prominent that the skeleton appears to belong to a larger horse, the head is disproportionately large compared with the body, and the tail is always low and motionless. But the low hanging head tells it all. The ears barely move to any sounds in the environment, no extra energy is spent interacting with herd mates. The eyes are dull, without expression, without expectations.

Researchers from the UC Davis Center for Equine Health conducted a survey to assess the prevalence of starved horses in California and found the results quite disturbing. Among the responders to the survey were animal control and humane society organizations in 36 counties, with an estimated equine population of 1,041,560. Of this number, 2,177 horses were found to be severely malnourished. The most common reason for these cases was owner ignorance, followed by economic hardship.

A research team comprised of Dr. Carolyn Stull (UC Davis Veterinary Medicine Extension), Dr. Anne Rodiek (California State University, Fresno), Dr. Christine Witham (private clinician), Dr. Pamela Hullinger (California Department of Food and Agriculture), and Kelly Weaver (UC Davis Veterinary Medicine Extension) has been studying the problem. Funded in part by Purina Mills, Inc., the study provides a standard body condition scoring system to assess the weight status of a horse and compares different diets for refeeding the malnourished horse. In both humans and horses, abrupt refeeding can cause dysfunction of the body’s metabolic systems, which can lead to failure of the heart and lungs and ultimately to death. The goal of this research is to provide new information and guidelines for recognizing and treating malnourished horses.

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will be metabolized for energy. As time goes by, the horse’s survival is in a precarious situation. When a horse loses more than 50 percent of its body weight, the prognosis for survival is extremely poor.

THE REFEEDING PROBLEM

Refeeding starved animals, including humans, is not an easy process. In humans suffering from starvation caused by illnesses such as anorexia, cancer, or gastrointestinal obstruction, patients can develop “refeeding” syndrome when they are given concentrated calories, and this in turn can lead to heart, respiratory, and kidney failure usually three to five days after the initial meal. This same syndrome has been reported in the literature for horses. Thus, our research team wanted to develop a refeeding program for horses that would minimize these effects and enable the horse to return back to normal body weight. Our goals were to test feeds that were commonly available and used in horse rations, so the refeeding program could be implemented easily in any area of the country.

EXPERIMENTAL DIETS FOR REFEEDING

We selected three types of feed that were very different in nutrient composition: alfalfa hay, oat hay, and a commercially available complete feed consisting of grain, molasses, fat, and alfalfa. Alfalfa is known to be high in protein (20 percent) but low in carbohydrate starch (3 percent). Oat hay is high in fiber but low in protein (7 percent). The complete feed represented a feed high in carbohydrate concentration, with 19 percent starch. The three types of feed were given to 22 starved horses that were brought to the UC Davis research site as representative of horses rescued by equine organizations. Horses were fed one of the three diets over a 10-day rehabilitation period. The researchers focused on this time period as critical to successfully transitioning the gut from a starved state to a fed state. Even though the diets were different in composition, they were fed in amounts that were equivalent on a caloric basis, so that horses assigned the oat hay diet, for example, received the largest volume of feed, while the horses on the complete feed received the smallest amount, but the same number of calories at each meal.
period, which was not advantageous
to the rehabilitation. Again, the
alfalfa diet was the most effective at
delivering the necessary nutrients
in the correct amounts to the
starved horse.

Our research showed that
starved horses had very different
responses to several diets. We
found that the best approach for
initial refeeding of the starved
horse consists of frequent small
amounts of high-quality alfalfa.
This amount should be increased
slowly at each meal and the number
of feedings decreased gradually
over 10 days. After 10 days to two
weeks, horses can be fed as much
as they will eat. The horse will
show signs of increased energy
after about two weeks. Ears, eyes
and head movement will be the
first noticeable movements. Some
weight gain can be achieved in one
month, but three to five months
usually are needed to rehabilitate
back to a normal body weight.
Veterinary care and nutritional
advice should be sought, as
complications can arise.

The oat hay diet was very bulky
and caused diarrhea in several horses.
Several essential nutrients such as
phosphorous and magnesium were
low in the oat hay compared with
the other diets; thus, this diet did not
support a successful rehabilitation.
The alfalfa had the best results
due to its high composition of
quality protein, but also the major
electrolytes, phosphorus and
magnesium. Since alfalfa hay is
very low in carbohydrate content,
there were minimal effects due to
insulin response.

In a subsequent feeding study,
we compared an alfalfa hay diet
to a diet of combination alfalfa hay
and corn oil. Equine diets usually
do not contain much fat, but in
recent years the use of corn oil
to increase the energy density of
a meal has been widely used in
nutrition programs for older horses
and in horses undergoing intensive
training programs. The two diets
were fed again on an equal-calorie
basis. Although the corn oil had
no harmful effects, substituting
calories from corn oil for alfalfa
decreased the total nutrient content
of phosphorous and magnesium
in the diet. Thus, the response to
the diet combining corn oil and
alfalfa showed a decreasing blood
phosphorous level over the 10-day
period, which was not advantageous
to the rehabilitation. Again, the
alfalfa diet was the most effective at
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JOIN THE HOMES FOR HORSES COALITION

The Homes for Horses Coalition (HHC) is dedicated to ending horse slaughter and other forms of equine abuse, while promoting growth, collaboration and professionalism in the equine rescue and protection community.

Founded in 2007 by the Animal Welfare Institute and The Humane Society of the United States, HHC is a group of professionals who work to provide care and homes to horses in need, advance the operating standards for equine rescue and retirement facilities, and promote responsible horse ownership. Many of the coalition’s members run equine care operations themselves, while others are involved in government policy affecting equines. We also partner with other professionals in the field, including breeders, trainers and veterinarians.

The cumulative expertise of our group puts HHC in a unique position to advocate for equines from a multifaceted, highly informed perspective that puts the welfare of equines above commercial interests.

To become a member of the fastest growing network of equine advocates in the country, visit the HHC website at: www.homesforhorses.org.

ACCREDITATION THROUGH THE GLOBAL FEDERATION OF ANIMAL SANCTUARIES

The Global Federation of Animal Sanctuaries (GFAS) was formed in 2007 by leaders in the animal protection field for the sole purpose of strengthening and supporting the work of animal sanctuaries worldwide. Through a rigorous accreditation process, GFAS identifies sanctuaries and rescue facilities that provide animals with the highest standards of care, by conducting a thorough evaluation of facilities, finances, veterinary care, staffing and much more.

GFAS accreditation helps to professionalize the equine rescue/sanctuary industry and provides credibility for donors, potential adopters, and law enforcement agencies who seek reputable organizations. For rescues, the process helps establish better standards, guidelines and record-keeping, and attract more support from donors.

For more information on GFAS, please visit www.sanctuaryfederation.org.

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