

HAYGAIN[®]

hay steamers

HG-ONE User Manual **Operating & Safety Instructions**

Before using your HAYGAIN[®] Hay Steamer,
please read this manual thoroughly
and retain it for future reference.



HGone

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HG-ONE User Manual

Operating & Safety Instructions

Working safely with your HAYGAIN® Hay Steamer is only possible when these Operating and Safety Instructions are read completely and the contents contained herein are understood and followed.

1. Unpacking your HAYGAIN

You will find the following:

- HAYGAIN Hay Container with fixed 5 spike Steam Manifold.
- JB Steam Generator with Hose/Quick Release Fitting.
- Plastic funnel.
- 1 Packet of Propress Equine Descaler.
- HAYGAIN Operating and Safety Instructions.

If any of these parts are missing or damaged, notify your supplier within 7 working days of the delivery date.

2. Locating your HAYGAIN



CAREFUL CONSIDERATION SHOULD BE MADE TO HEALTH AND SAFETY WHEN LOCATING YOUR HAYGAIN, RECOGNISING THAT THIS IS AN ELECTRICAL APPLIANCE THAT GENERATES HOT STEAM WHICH CAN BURN, HAS SHARP COMPONENTS AND SHOULD NOT BE ACCESSIBLE TO CHILDREN.

Power: Your HAYGAIN should be located within 2 metres of a mains electrical socket. Your Steam Generator is an electrical appliance and is designed for indoor use only.

Floor Surface: Location must be level, well draining and easy to clean for both your Steam Generator and Hay Container. Uneven surfaces can cause distortion to the Hay Container and Heating Element to fail prematurely.

Surrounding Environment: Must be well ventilated to avoid damp conditions.

Water Source: Your HAYGAIN is designed to be used with **clean tap water** only.

3. Assembling your HAYGAIN

To attach the Steam Generator Hose to the Hay Container: pull back the knurled brass barrel of the Quick Release Fitting located on the end of the Hose, push firmly onto the brass nipple located on the end of the Hay Container's Hose connector ensuring the barrel slides forward into the locked position, and pull the Hose to check it is secure, (see figure 1).

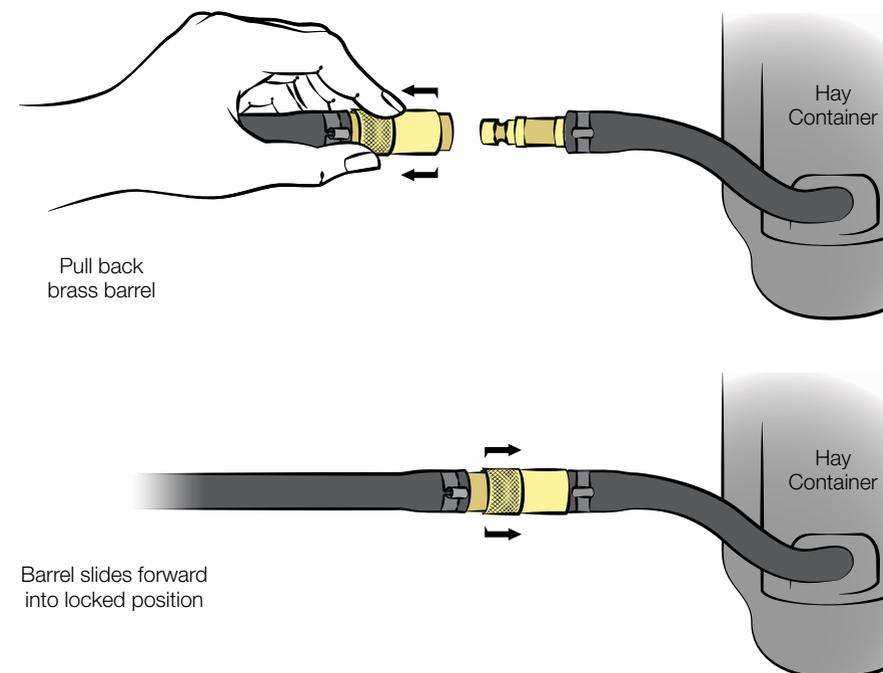


WARNING THE CONNECTOR BECOMES EXTREMELY HOT DURING USE. DO NOT TOUCH. ENSURE STEAM GENERATOR HOSE IS NOT KINKED OR RESTRICTED AND THE HAY CONTAINER IS NOT RESTING ON IT.

ENSURE ANY EXCESS ELECTRICAL CABLE IS HOOKED UP OFF THE FLOOR AND NOT LEFT ON THE FLOOR IN WET CONDITIONS.

Refer to 'Important Electrical Considerations', section 5.

Figure 1: Quick Release Fitting



Note

Nutritionalists and Vets recommend introducing any dietary changes slowly. Mixing HAYGAIN steamed hay with your existing forage for a few days will allow your horse's digestive system to adapt.

4. Operating Instructions**4.1 Filling the Steam Generator with water:**

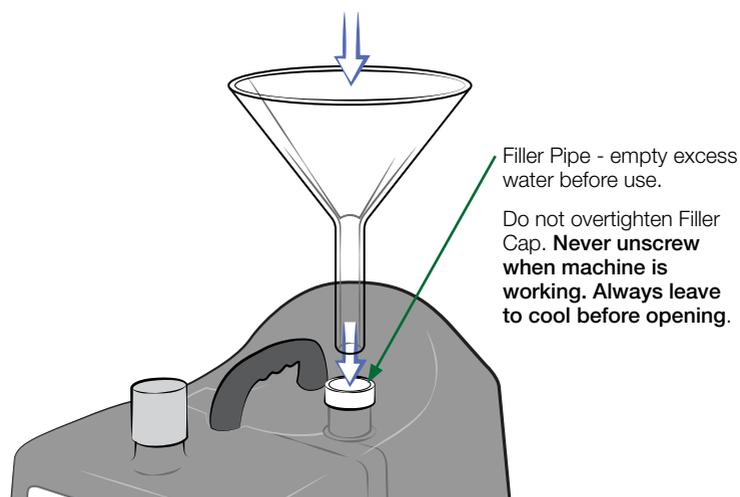
DO NOT POUR COLD WATER ON TO A HOT ELEMENT AS THIS MAY CAUSE IT TO FAIL PREMATURELY.

Remove the Filler Cap on the Steam Generator and fill with 3.5 litres of clean tap water using the Funnel provided (taking care not to spill water on the Steam Generator or overflow).

Check the water level with the measuring Dipstick provided. Ensure there are no foreign materials such as bits of hay/straw/shavings in the water as this can cause a blockage in the Steam Hose and result in damage to the unit.

Use only tap water. The use of antifreeze or other additives will seriously damage your Steam Generator, voiding the warranty and could be dangerous for you and your horse's health.

Figure 2: Filling the Steam Generator

**4.2 Loading the Hay Container:**

The HAYGAIN HG-ONE will steam up to 8kgs of loose hay / one large hay net. For best results pack the Steam Container tightly.

Wedges from loose hay should be placed vertically into the Hay Container parallel to the sides. For hay nets, take two or three segments from a bale, load into a hay net and then align them in the Hay Container in the same way.

Place the hay onto the Steam Manifold and push down firmly so the Manifold Spikes pierce the hay to their full length. **Failure to do so will result in inconsistent performance.** You can also top dress the hay with water by pouring 1-2 litres on top of the hay which will make the hay wetter and help the process. Replace Lid and push down firmly to seal.

4.3 Switching on:

Plug the Steam Generator into a suitable power outlet. Switch the Steam Generator 'on' by turning the Rotary Switch on rear of the Steam Generator to the STEAM position (3 o'clock position).

Note

The water in the Steam Generator will take 10-15 minutes to produce steam depending on the water temperature, ambient temperature and also the efficiency of your electrical supply.

4.4 Steam cycle:

Switch on for 60 minutes until the lid Thermometer needle has reached or is beyond the **green band** (refer to diagram (i) in Appendix) indicated around 80° Centigrade (corresponding to 100°C in the hay). It is not unusual for the Thermometer to read over 90°C, but it is important the Steam Generator is switched on for the full 60 minutes.

Timings are based on a hay load of up to 8kgs. (How the hay is packed into the Hay Container will determine the weight of hay you can fit in).

Upon completion of the steam cycle, switch off the Steam Generator by turning the Rotary Switch on the Steam Generator to the 'off' position and disconnect the power supply.



USE EXTREME CAUTION WHEN OPENING THE HAY CONTAINER AND REMOVING THE HAY. TEMPERATURES INSIDE IT CAN REACH IN EXCESS OF 100°C – STEAM CAN BURN. ☹️

‘Operating Instructions’ cont’d

When opening the Hay Container, **open the Lid by lifting it off and back towards you, with the Thermometer facing towards you - DO NOT LEAN OVER THE HAY CONTAINER** immediately after opening. If feeding straight after steaming, the hay in the Hay Container will be extremely hot; use extreme caution and wear gloves to remove and handle the hay. Distribute the hay as required. Steamed hay will cool rapidly and should ideally be fed within 24 hours of steaming. If steaming hay nets, the hay in the centre of the net will remain hot for quite some time as the hay around it insulates it.



METAL COMPONENTS (HOOKS, RINGS AND CLASPS) ON HAY NETS WILL BE VERY HOT IMMEDIATELY AFTER STEAM CYCLE. USE EXTREME CAUTION WHEN HANDLING.

Note

Some hay nets may shrink over time due to the high temperatures. HAYGAIN Ltd supply hay nets designed to withstand these temperatures.

4.5 Empty Steam Generator after use: (See instruction in ‘Care and Maintenance’, section 7)

Your Steam Generator should be emptied after use and regularly rinsed. Failure to do so will cause a build up of lime scale and sediment. This can cause blockages to the Manifold Spikes, Hoses, Filler Cap and Heating Element resulting in poor performance.

Neglecting to care for your Steam Generator will invalidate your guarantee. Periodic use of a HAYGAIN descaling product is recommended.

4.6 Safety Filler Cap:

Your Steam Generator is fitted with a Safety Filler Cap. In some circumstances steam or water can be released from the Cap. In the event that this occurs turn off immediately to ensure no damage is caused to the Steam Generator or Steam Hose. **DO NOT REMOVE THE FILLER CAP – WAIT FOR MACHINE TO COOL DOWN** and refer to ‘HAYGAIN Troubleshooting Matrix’, section 8.

The potential causes of this are:

- 1) The Steam Generator has been overfilled.
- 2) The Steam Generator needs rinsing out and descaling to remove build up of sediment or scale.

- 3) The Steam Hose is blocked, kinked, restricted or frozen (see ‘Using HAYGAIN in freezing conditions’, point 8.2).

5. Important Electrical Considerations

5.1 Electrical specification:

JB Steam Generator: 3.5 Litre water capacity | 1500W | 50/60Hz~ | 230 Volt

THIS APPLIANCE MUST BE EARTHED

5.2 Plug sockets:

Ensure the electrical circuit is sufficiently rated to accommodate the above specification of the Steam Generator either for its sole use or use with other appliances that may draw similar wattage on the same electrical circuit.

Ensure that neither the Steam Generator nor the Hay Container are directly located under a wall mounted socket as the steam could cause damage to it.

It is recommended that all sockets are RCD protected.

5.3 Extension cables:

Correctly rated extension leads should only be used as a temporary measure. We do not recommend that extension leads are used as a permanent method of power supply.

Before using an extension lead check that it is correctly rated (see above ‘Electrical specification’, point 5.1) and not damaged in any way. Only use an extension lead when it is fully unwound.



THE USE OF UNDERRATED OR WOUND UP EXTENSION LEADS IS DANGEROUS AND A FIRE HAZARD.

If you are unsure consult a qualified Electrician.

5.4 Wall Timers:

Wall timers should only be used if they are correctly rated and suitable for the environment in which you are using your HAYGAIN (see ‘Electrical specification’, point 5.1).

Wall timers should be regularly inspected to ensure they are securely fitted into the wall socket and the Steam Generator plug is firmly fitted into the wall timer. Do not use if the wall timer feels ‘loose’ or is damaged.

If you are unsure consult a qualified Electrician.

6. Operating Considerations

HAYGAIN Hay Steamers are designed for steaming forage and straw bedding; ***they must not be modified in any way.***

HAYGAIN Hay Steamers are electrical steam generating appliances and therefore ***components may get very hot during operation and could cause burns.*** ⚠

Your HAYGAIN should be regularly cleaned and maintained to ensure continued trouble free performance (see 'Care and Maintenance', section 7).

Persons using this equipment must be authorised to do so and must be familiar with the Operating and Safety Instructions. Children and animals should be kept away from the equipment at all times. Relevant Health and Safety checks should be carried out.

Where necessary, protective clothing should be worn.

ALWAYS:

- > When the equipment is cold, check the Steam Hose is securely attached to the Steam Generator and the Hay Container before operating.
- > Ensure Steam Generator and Hay Container are on level ground before operating.
- > Lift the Hay Container Lid carefully towards you. **CAUTION STEAM CAN BURN.**
- > Use protective gloves when handling hot steamed hay.
- > Disconnect power supply and wait for the Steam Generator to cool down before re-filling with water. Mop up any water spillage before connecting to power supply.
- > Check power cable and plug before commencing use. Do not use the Steam Generator if either is damaged. Contact an approved service agent for repair.
- > Regularly check the Steam Hose for damage or distortion. Do not use the Steam Generator if the Hose is damaged. Spare hoses can be purchased directly from HAYGAIN Ltd.
- > Maintain order in the working area. Disorder increases the risk of an accident.
- > Keep children away from HAYGAIN equipment.
- > Disconnect from power supply when not in use.

- > Use only genuine HAYGAIN spare parts and approved accessories.
- > The manufacturer, an approved service agent or a competent person should only carry out servicing.

NEVER:

- > Overfill the Steam Generator - use the Measuring Dipstick provided.
- > Remove or unscrew the Safety Filler Cap when steaming or when Steam Generator is hot.
- > Detach the Steam Hose when steaming or when Steam Generator is hot.
- > Over tighten the Filler Cap. Doing this can damage the rubber seal which will then require replacement.
- > Use under rated extension cables as this is dangerous.
- > Tilt or carry the Steam Generator when in use or when containing hot water.
- > Unplug the Steam Generator by pulling the electrical cord. Always switch 'off' at the socket and pull the plug out of the socket by gripping the plug itself.
- > Allow people, children or animals to get inside the Hay Container.
- > Touch the Brass Connector fittings when in use or hot.
- > Never pour cold water on to a hot element. Allow to cool before refilling.

Note

The Hay Container is manufactured from high performance materials which are designed to flex with changing temperatures; this allows steam to emit from the Hay Container prior to the completion of the steam cycle.

7. Care and Maintenance

7.1 Maintaining your Steam Generator:

Flush with fresh water after every use to avoid the build up of sediment. Descale regularly to ensure no unnecessary strain is put upon the Heating Element. Hard water causes scale to form on the Heating Element causing the Thermostat to operate prematurely causing the cycle to be aborted. Please contact Haygain on 0333 200 5233 for further instruction.

7.1.1 Cleaning your Steam Generator:

- 1) Ensure Steam Generator is cold before commencing.
- 2) Disconnect from the power supply.
- 3) Disconnect the Steam Hose from the Hay Container.
- 4) Half fill the Steam Generator with clean water; replace the Filler Cap and agitate vigorously - this action will suspend some sediment in the water; immediately remove the Filler Cap and empty the dirty water. Repeat this procedure until the water is completely clean.

It is recommended the Steam Generator be descaled every 6-12 weeks. Descaling frequency is dependent on usage and water hardness. Descaling frequency can be discussed with our Customer Helpline and HAYGAIN descaler can be purchased by ringing Haygain on 0333 200 5233 or visiting our website: www.haygain.com.

7.1.2 Descaling your Steam Generator:

- 1) Before descaling, carry out the above procedure (*'Cleaning your Steam Generator'*) to remove as much loose sediment as possible.
- 2) Leave Steam Hose **disconnected** from the Hay Container.
- 3) **Always read Caution Instructions on descaling product and carefully follow directions.**
- 4) Dissolve descaler in **warm water** as directed by the manufacturer ensuring the correct water volume:descaler ratio is followed. Pour the diluted descaler solution into the Steam Generator, replace Filler Cap and switch 'on' (*refer to 4.3 for instructions*).
- 5) When the water starts to boil turn it 'off' immediately. Disconnect power and leave for a minimum of 3 hours. For best results leave to descale overnight.
- 6) **Clearly label your Steam Generator so no one attempts to use the unit whilst it contains descaling product.**
- 7) Before flushing descaler from the Steam Generator, agitate vigorously to suspend any sediment in the water, then empty.

- 8) Half fill the Steam Generator with clean water, agitate vigorously then empty water out. Repeat this process until the water drained is completely clear.



FAILURE TO LABEL YOUR STEAM GENERATOR WHILST DESCALING OR FAILURE TO FLUSH TANK OUT AFTER DESCALING COULD BE A POTENTIAL HEALTH HAZARD TO YOUR HORSE.

FAILURE TO MAINTAIN YOUR STEAM GENERATOR WILL VOID ITS WARRANTY.

Note

The water in the Steam Generator must be allowed to cool to a temperature which will not cause injury before emptying.

7.2 Maintaining your Hay Container and surrounding area:

Clean out any loose hay in the base of the Hay Container. Ensure the Steam Manifold Holes are clear from obstruction, and clear Drain Holes in base after use.

Wash out once a week ensuring the space under the Manifold is cleaned.

When not in use disconnect the Steam Hose from the Hay Container's Hose and tilt backwards. This allows any condensation in the Hose to drain through the Brass Connector on the end of the Hose. During freezing weather this must be done after each operation to help avoid condensation in the Hose from freezing, (*see 'Using HAYGAIN in freezing conditions', point 8.2*).

The area surrounding the HAYGAIN should be regularly swept and cleaned to avoid damp and mouldy conditions.

Keep the Lid Seal and the Base clean and free from loose strands of hay to ensure a good seal when in use.

When not in use, leave the Hay Container Lid on.

After prolonged periods when the machine is not in use disinfect the interior of the Hay Container prior to use. Further information on suitable disinfectants can be sourced from our helpline. **Note** - not all disinfectants are suitable for this use and could potentially damage the equipment.

Make sure the Thermometer Probe on the inside of the Hay Container Lid is not damaged.

7.3 General maintenance:

In addition to mandatory electrical tests, check the condition of the Steam Generator's Plug, Cable and Cable Restraint where it enters the unit's Outer Case. Ensure all warning labels are legible.

Check the general condition and fit of the Steam Generator's Safety Filler Cap and Filler Pipe. Ensure there is no damage or excess corrosion and there is no hay or chaff in the Safety Filler Cap.

Ensure no Hoses or fittings are damaged and they fit correctly - (see section 3).

7.4 Storing your HAYGAIN when not in use:

The Hay Container should be cleaned appropriately before storing.

The Steam Generator should be emptied and cleaned. The electrical cable should be coiled up and then the Steam Generator put in a dry location.

If the Steam Generator is not to be used for an extended period it is recommended the unit be descaled before it is stored away.

When recommencing use, the Steam Generator should be checked to ensure there has been no damage to the cable from rodents etc. and the plug is clean, dry and untarnished to enable proper electrical connections. Dirty and damp plugs are a hazard and must never be used.

The Hay Container should be disinfected before use. **Note** - not all disinfectants are suitable for this use and could potentially damage the equipment. Further information on suitable disinfectants can be sourced from our helpline.

8. Troubleshooting

8.1 HAYGAIN Troubleshooting Matrix



WARNING: YOUR HAYGAIN OPERATES AT HIGH TEMPERATURES AND PRODUCES STEAM WHICH CAN BURN ☹️ - USE EXTREME CAUTION. TROUBLESHOOTING SHOULD ONLY BE CARRIED OUT BY A COMPETENT PERSON.

? The steam cycle takes longer than normal.	
Probable Cause	Solution
Ambient/water and hay temperature is low, therefore starting temperature of the hay and water is lower than normal.	Steam hay for longer than normal ensuring that the Thermometer reaches at least 80°C (indicated in the green band but never more than 70 mins - refer to diagram (i) in Appendix).
Hay load being steamed is heavier than normal or Hay Container is inconsistently packed.	The greater the weight of hay that is steamed per cycle, the longer it takes to reach temperature (like cooking meat in an oven). Increase steaming time until Thermometer reaches at least 80°C (indicated in the green band). Dressing the top of the hay with up to 2 litres of water can assist with the conduction of the heat within the hay and help to reduce the steaming time.
Element is scaled up reducing its efficiency.	Flush out the Steam Generator and descale (see point 7.1.2).
Electricity voltage may be lower than normal. This can happen in the winter when demand is high and also if you are running kettles, washing machines and heaters at the same time.	Check you have sufficient power supply to run all the equipment in your yard - if in doubt consult a qualified Electrician. If the supply is sufficient but the voltage is low then you will need to steam for longer.
Note - The use of hot water in your Steam Generator will help to speed the warm up time which will assist in reducing the steam cycle time.	
? Hay is not steaming properly / steam is not coming from all Manifold Spikes.	
Probable Cause	Solution
Hay load is very dense/heavy or the hay is very loosely packed.	It may be necessary to steam the hay for longer. Dressing the top of the hay with up to 2 litres of water can assist with the conduction of the heat within the hay and help to reduce the steaming time.
Check the HAYGAIN is on level ground.	If your Hay Container is not on level ground steam will find the easiest exit and may favour some Manifold Spikes over others.

'Troubleshooting' cont'd

 Hay is not steaming properly / steam is not coming from all Manifold Spikes (cont'd).	
<i>Probable Cause</i>	<i>Solution</i>
Hose from the Steam Generator to the Hay Container is restricted or has deteriorated.	Hoses will deteriorate over a period of time and may need to be replaced. Failing to drain hoses of condensation on a regular basis and allowing hoses to freeze with condensation in them will shorten the life span of the hoses. Replacement hoses can be ordered directly from your supplier.
Manifold has a build up of condensation/water which is restricting even steam flow.	Disconnect the Steam Hose from the Container's Hose and tilt the Container backwards. This allows any condensation in the Hose to drain through the Brass Connector on the end of the Hose.
 The Steam Generator trips the circuit breaker or RCD.	
<i>Probable Cause</i>	<i>Solution</i>
Power supply is not sufficient for total demand of appliances being used.	Switch off items such as kettles and heaters and check the supply is sufficient for the appliances that are being run from the circuit. If in doubt consult a qualified Electrician.
Steam Generator has been allowed to get damp.	The Steam Generator should always be kept in a warm dry environment. Allow the Steam Generator to dry out for 24hrs and try again. (Also see 'Using HAYGAIN in freezing conditions', point 8.2).
Note - If problem persists contact your supplier.	
 Steam is escaping from the Safety Filler Cap.	
<i>Probable Cause</i>	<i>Solution</i>
Steam Generator has been over filled.	Wait for the equipment to cool down. Check that your Steam Generator has not been over filled. Over filling can result in water and steam being forced out of the Safety Filler Cap and may also result in other damage.
Sediment, limescale or hay trapped in Safety Filler Cap.	Wash the inside of the Filler Cap and remove any impurities. Ensure you locate the Filler Cap Seal correctly and that no hay or straw is to be found inside the Cap as this can obstruct the Pressure Release Valve. If the Filler Cap Seal is damaged, replace it (see <i>Solution below</i>). If the Filler Cap has a build up of scale and sediment in it, this indicates that the Steam Generator is not being flushed or descaled regularly (refer to point 7.1).

 Steam is escaping from the Safety Filler Cap (cont'd).	
<i>Probable Cause</i>	<i>Solution</i>
Filler Cap Seal is damaged or missing.	Replace Filler Cap Seal with spare that was supplied with your unit. Ensure the replacement Seal is located in the base of the Filler Cap under the thread - (please note Seals are designed to be a very snug fit and will require the use of a screwdriver to slot firmly into place). Replacements can be ordered from your supplier. Use only genuine HAYGAIN replacement parts.
Blocked or restricted hoses.	Check the Steam Generator Hose for kinks and make sure the Hay Container is not sitting on the Steam Hose. Wait for the equipment to cool down. Disconnect the Steam Generator Hose at both ends and flush through with water. Re-attach to the Steam Generator but not to the Hay Container. Turn on the Steam Generator. If steam no longer comes from the Filler Cap when steam appears through the Hose, switch 'off' and allow to cool. Then re-attach the Hose to Hay Container and turn 'on' again. If steam still comes from Filler Cap it is likely that your Steam Generator Hose needs cutting down or replacing. Contact your supplier. If replacing the Filler Cap Seal and cutting down/ replacing the Steam Hose does not resolve the problem, the hose within the Hay Container will need to be replaced. Contact your supplier.
Please note - Hoses will deteriorate over a period of time and may need to be replaced. Failing to drain hoses of condensation on a regular basis and allowing hoses to freeze with condensation in them will shorten the life span of hoses.	
Hoses or Manifold are frozen.	Sub zero temperatures can cause condensation in the hoses and Manifold to freeze. Follow procedures in 'Using HAYGAIN in freezing conditions', point 8.2.
 Steam is emitted from the side or base of the Hay Container.	
<i>Probable Cause</i>	<i>Solution</i>
HAYGAIN is reaching the end of its steam cycle.	It is normal for steam to be emitted from the sides or drain hole of your Hay Container when it is nearing the end of the steam cycle.
Ensure the Hay Container is located on flat ground.	If your Hay Container is located on uneven ground it can flex and twist as it warms up which will enable steam to escape between the Lid and the Base. Re-locate the Hay Container to flat ground.
Hay is obstructing the Lid Seal.	Avoid hay sticking out of the unit and clear any debris.

'Troubleshooting' cont'd

8.2 Using HAYGAIN in freezing conditions:

When your HAYGAIN is not in use, your Steam Generator should always be empty and kept in a sheltered and warm (above freezing) environment.

If you are concerned there is frozen water in your Steam Generator you must allow it to defrost thoroughly before switching on. **Failure to do so will cause damage which will not be covered under warranty.**

Before use, ensure your Hay Container, Internal Hose and Manifold are not frozen. If you suspect any of these components are frozen, use an adequate amount of hot water to pour over the Hose and Manifold. Squeeze the rubber Hose in the Hay Container as this should break up any ice in the pipe work.

8.2.1 When starting up in extreme temperatures:

Turn on the Steam Generator without connecting it to the Hay Container to ensure the Steam Hose is clear and ice-free. If the Hose is not clear (i.e. steam is coming from the Filler Cap), immediately turn the machine 'off'.

DO NOT ATTEMPT TO UNSCREW THE FILLER CAP but immerse the Steam Hose in hot water and squeeze it to clear the frozen water. Try again.

Connect the Steam Hose to the Hay Container. **CAUTION - fittings will be extremely hot. DO NOT PUT HAY IN THE HAY CONTAINER.** Check that steam/condensation is coming through the hoses and Manifold Spikes.

If not, immediately switch 'off'. **DO NOT UNSCREW FILLER CAP** and defrost the Hay Container using hot water.

After use, disconnect the Steam Hose from the Hay Container and tip it backwards to drain any condensation that is in the Manifold or pipe work.

You can use normal pipe insulation on the Steam Hoses to both protect them from freezing and make them thermally more efficient. The use of pipe insulation can be discussed with our Customer Helpline by calling HAYGAIN: 0333 200 5233.

If there is still a problem, please contact your dealer.



NEVER USE ADDITIVES, LIKE ANTI FREEZE, WITH THE WATER IN YOUR STEAM GENERATOR. IT CAN CAUSE SERIOUS PROBLEMS AND WILL VOID YOUR WARRANTY.

9. Guarantee

The guarantee covers the repair or replacement (at the discretion of HAYGAIN Ltd) of your machine or part of your machine if it is found to be defective due to faulty materials or workmanship within the guarantee period. This includes all parts and labour required to get the machine working properly again without charge.

Guarantee work is normally carried out at a HAYGAIN authorised service centre, but at the company's discretion work can sometimes be carried out on site.

Where possible we will offer a loan machine whilst repairs are being carried out. However relevant charges will be applied to cover transportation costs.

If you require a loan machine you may be offered an exchange machine and the faulty machine will be collected from you. If this is the case, no charge will be made and the exchange machine will become your replacement machine.

If any part is no longer available, we will replace it with a functional replacement part.

HAYGAIN machines are engineered and constructed for continual high performance in normal use. If a machine is used in the way indicated by these instructions and it breaks down within the guarantee period, it is our responsibility to repair, replace or exchange it.

Your Steam Generator is covered by a 12 month HAYGAIN Guarantee if you maintain the unit as follows:

- Do not allow your Steam Generator to boil dry.
- Descale your Steam Generator at least every 6-12 weeks with HAYGAIN Descaler.
- Flush your Steam Generator out with clean water once a week.
- Use clean fresh **tap/distilled water**.
- Empty the machine of water when it is not in use.
- Ensure the Steam Generator and Hay Container are on a hard level surface.
- The machine is only to be used for steaming hay, haylage and straw.
- Regularly check the hoses for blockages.
- The warranty does not cover misuse or preventable damage.

'Guarantee' cont'd

There are some circumstances in which a HAYGAIN Guarantee will NOT cover the repair, exchange or replacement of a machine. These are detailed below:

- Normal wear and tear, including parts that might wear out over time (e.g. fuse, hose, seals, etc.).
- Accidental damage.
- Removal of blockages. If your machine becomes blocked, *please refer to 'Care and Maintenance', section 7*, for details of how to unblock it. If you are unsure, please call our Customer Helpline and a member of our team can help you.
- Faults caused as a result of scale or sediment build up within the Steam Generator, (*refer to point 7.1*). If you are unsure, please call our Customer Helpline and a member of our team can help you.
- **Faults caused by negligent use, misuse, neglect or careless operation of the machine, this includes:**
 - > Use of dirty water. Only **tap/distilled water** is approved.
 - > Foreign objects, such as hay and straw, found in the Steam Generator Tank or pipe work.
 - > Damage of the unit due to inappropriate storage or outdoor use.
 - > Steam Generator not emptied of water after use.
 - > Damage to the Heating Element or Thermofuse due to lack of water in the Tank or Tank being allowed to run dry.
 - > Not ensuring the Steam Generator Tank is filled sufficiently before use if used on a timer.
 - > Damage to the Heating Element due to use on uneven surfaces.
 - > Use of the machine that is not in accordance with the Operating and Safety Manual.
 - > Use of the machine for anything other than its specific designed purpose as described in the Brochure and Operating and Safety Manual.
 - > Use of parts not assembled or installed in accordance with the Operating and Safety Manual.
 - > Use of parts and accessories which are not HAYGAIN Ltd genuine components. Faulty assembly or installation of parts or accessories.
 - > Repairs or alterations carried out by parties other than HAYGAIN Ltd or its authorised agents.

Note

An inspection charge and carriage charge will be made if a fault is deemed to be caused by misuse.

If you have any questions about what is not covered please call our Customer Helpline: 0333 200 5233.

The Terms and Conditions of a HAYGAIN Guarantee are as follows:

- The guarantee becomes effective at the date of purchase or the date of delivery if this is later.
- You must provide proof of delivery/purchase before any work can be carried out on your machine under the guarantee. Please note that without this proof any work carried out will be chargeable. Please keep your purchase receipt as proof of purchase date; for reference enter these details into the back of this manual.
- HAYGAIN or its authorised agents will carry out all work.
- Any parts that are replaced will become the property of HAYGAIN.
- The repair, replacement or exchange of your machine under guarantee will not extend the period of the guarantee.

Any faults with your Steam Generator or Hay Container should be reported immediately on receipt of the unit to the dealer you purchased it from.

10. Frequently Asked Questions:

How much does HAYGAIN cost to run?

The running costs are minimal and you will use considerably less water compared to soaking. The Steam Generator uses just 1.5kW of electricity per hour.

Electricity costs vary between utility companies but typically are between 7-18p per kW/hour. In order to work out exactly how much it costs you, check your electricity bill to see how many pence per kW/hour your rate is and then multiply that number by 1.5(kW) to give you the electricity cost per hour.

For example: if you are paying 10 pence per kW/hour, it will cost 15p per hour (the average steam cycle time is 60 minutes).

How long does it take to process the hay?

This can vary according to how densely packed the hay is, the weight of hay being processed, the ambient and water temperature and the voltage supply. The Thermometer on the Lid is there to act as a guide.

From cold water, the cycle time is approximately 60 minutes, no longer than 70 minutes.

Once steamed, how long before I can feed the hay and how long does it last?

The hay is very hot when you first take it out and it should be handled with care. However it cools very quickly once it is in the air and the steamed hay can be fed immediately. It is best fed while it is warm and steamy and most horses prefer it like this. Otherwise it should be used within 24 hours. If steaming hay nets, the hay in the centre of the net will remain hot for quite some time. This is because the central hay in the net is insulated by the hay surrounding it. In our experience horses are very happy to eat from the net when there is still steam coming out of it.

What is the difference between soaking, and steaming in a HAYGAIN?

Soaking hay will dampen the spores down so they are less likely to be inhaled. Soaking, however, has also been shown to increase the bacterial content in hay. With HAYGAIN steaming, the combination of the heat and the moisture actually kills the mould spores and bacteria so the risk is completely eliminated.

Will my horse like it?

The hay comes out of the HAYGAIN looking and feeling like life has been breathed back into it! It is warm and sweet smelling. Most horses LOVE it

and find it more palatable than dry or soaked hay. Palatability trials at the Royal Agricultural College and Writtle College both concluded that steamed hay, once tasted, was the preferred choice. It is often used as an effective way to encourage fussy eaters and recovering post-op horses in Veterinary Hospitals. However, horses are individuals and we have come across the odd one that is initially skeptical about the steamed hay and appears not to like it simply because it is different. If this is the case you can try the following to encourage them to taste it:

- Mix it with their normal forage for a few days. This should be done anyway to allow the horse's digestive system to adapt to the new forage particularly if changing from haylage to hay.
- Feed the steamed hay cold.
- Sprinkle water on top of the hay prior to steaming. This will give a "wetter" steam and often works well for horses that are used to soaked hay.

How much water will be used?

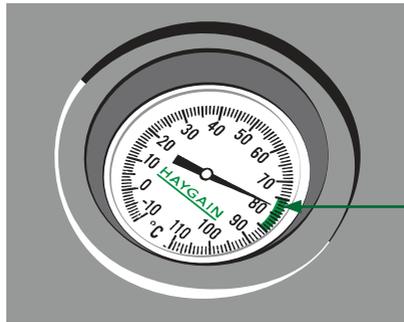
The hay will absorb the steam/water and therefore hydrate it. This brings the hay back towards its original moisture content that is approximately 15+% of its original weight. However the hay is neither soggy nor heavy. About 2.5L of water is processed per cycle and a residue of, on average, a teacup of water (condensed steam) remains from each steam cycle. If steaming hay nets or very light/loose bales you may get slightly more water residue at the end of the cycle.

What is the company background?

The Propress Group has been in business for 30 years and is a worldwide leader in high quality, professional steam appliances. We have supplied International and High Street names for years from large department stores to charity shops and hotels, as well as hundreds of thousands of independent customers. Our back up and after sales service is unparalleled.

11. Appendix

Diagram (i): Thermometer

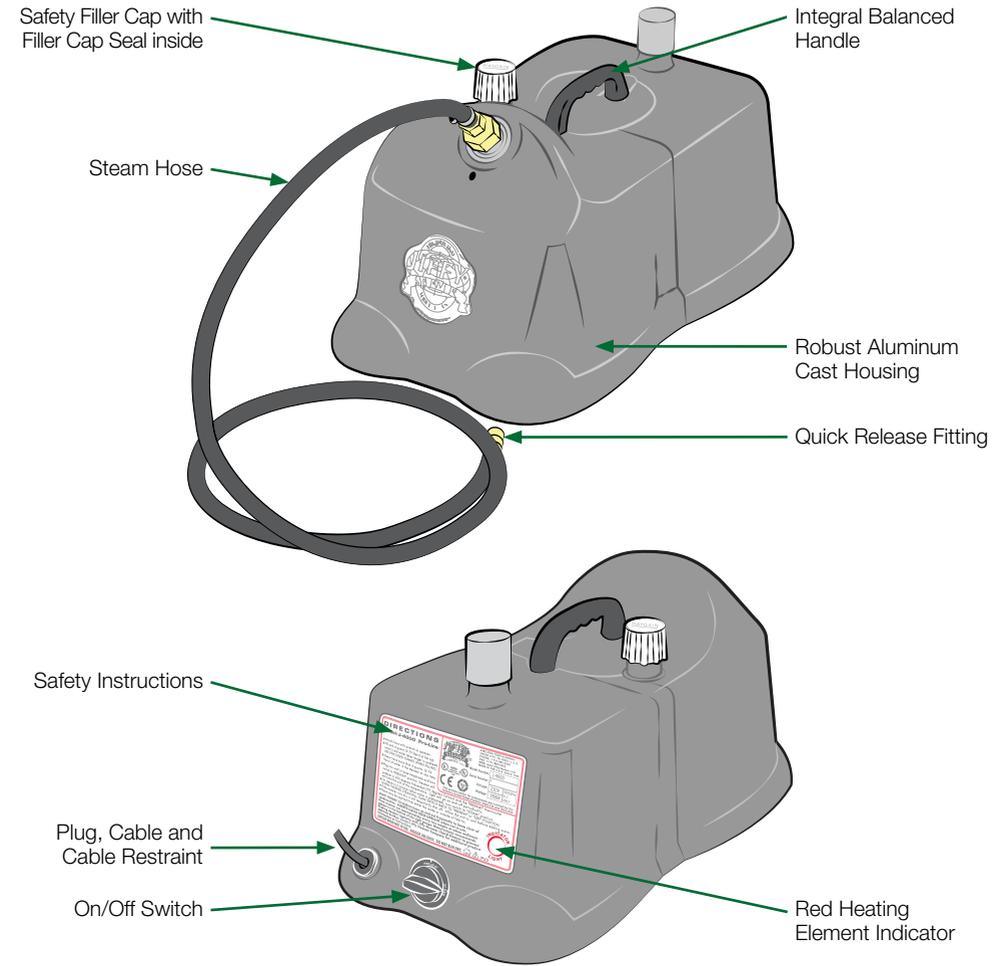


Green band (required temperature) on Thermometer, located on Hay Container Lid.

Diagram (ii): HG-ONE Hay Container



Diagram (iii): JB Steam Generator



Memo

Memo

Memo

Note - French and German translations of this User Manual are available upon request from HAYGAIN.

If you have any questions or comments relating to your HAYGAIN®, please contact the HAYGAIN Customer Care Team.

Tel: +44 (0)333 200 5233

Fax: +44 (0)333 200 5244

Email: info@haygain.com

www.haygain.com | www.propressequine.com

Head Office: HAYGAIN Ltd., The Stables, Bockhampton Manor Farm,
Lambourn, Berkshire, RG17 7LX

HAYGAIN[®]

hay steamers

Record your HAYGAIN[®] Hay Steamer serial number and purchase date here for future reference.

Serial Number:

Date of Purchase:

Date of Delivery:

Your HAYGAIN[®] Steam Generator and Hay Container are covered by a 12 month HAYGAIN Guarantee.

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