



Wheel cleaning with a mit

Winter Carriage Maintenance tips

With Bennington Carriages

For many the winter means a time for winding down and enjoying a break from the competitive season. It is also the ideal opportunity to give your carriage some TLC in preparation for spring.

Vehicle care and maintenance of carriages is time consuming but necessary, a well-cared and maintained vehicle not only makes a better impression if clean and polished, but you may also detect in parts or places where a repair is needed.

Don't underestimate regular care of your vehicle; it's safer for you and your horse or pony. If you don't feel confident in carrying out the work yourself contact the manufacturer of your carriage or a local mechanic to carry out the work.

Cleaning

This goes a long way in the maintenance of the carriage, and will highlight any area

needing attention such as damage, rust or cracks. There are various options when washing your carriage, but you will need a system which works for you.

Here are few suggestions: Firstly rinse the carriage thoroughly before beginning to wash, use a hose without a nozzle to remove all the mud, dirt, grit and sand. Resist jet washing your carriage, a modern carriage which is powder coated will withstand this abuse, however the high pressure water combined with dust, dirt and mud will be abrasive to the paint.

Avoid using hot water especially on painted wood, the quick change in temperature will cause the wood and the paint to expand

and contract at different rates, which will result in cracking.

Once the carriage is rinsed, use a car wash soap and with a soft sponge wash the carriage all over, getting inside the spokes. Take your time and rinse as you wash.

Finally use cloth, preferably a microfiber cloth or a chamois leather to dry all the surfaces.



Carriage on axle stand

TOP TIPS FROM BENNINGTON

Using a hand mit sponge or cloth allows you to get round all the corners and stops you banging your knuckles and remember to work from the top down.

Avoid areas of the carriage that have grease round the hubs, turntable and springs until you are nearly finished washing the carriage and use a separate cloth.

Polishing

Use a good quality polish from the car industry and a soft cloth, such as a microfiber cloth, which will not scratch the paint work.

Patent leather parts such as the dashboard and splashboards can be polished with shoe cleaner, whereas metal parts such as shaft fittings or rails need a specific metal polish. Parts made of leather (not patent leather) should be cleaned with saddle soap which will help to keep the leather well nourished.

Upholstery should be brushed thoroughly.

TOP TIPS FROM BENNINGTON

If you are planning to touch up the paint work, don't wax the area as it makes it more difficult, the wax would be silicone based and will react with the paint.

Do not spray the polish directly on to the carriage, spray on to the cloth first.

Touching up the paint work

Winter is the ideal opportunity to touch up any damaged areas of paint work. Rub down the damaged area with a fine sand paper e.g. 180 grit and make smooth and "feathered" in. Wipe with a solvent to remove any traces of grease and apply a metal primer such as red oxide by hand and allow to dry, repeat with a few coats where necessary.

Once dry, rub down and remove any elements of dust and apply the top coat. You may need a few coats of paint, but allow the paint to dry thoroughly between each coat.

TOP TIPS FROM CHRIS Powder coating and painting technician at Bennington

Ideally attend to any scratches and chips as soon as possible to prevent rust appearing.

Oiling

Now it's time to address those squeaks. Use WD40, this is a long lasting spray which has very good penetrating properties. Start at the front of the carriage and work back, carefully spraying areas where metal moves against metal.

Pay particular attention to the ends of the elliptic springs and moving parts, and once sprayed wipe off the excess lubricant with a paper towel.

On a four wheel carriage check the wear on the ball bearing turntable and also check it is well lubricated, and grease should be inserted through a grease nipple.

TOP TIPS FROM SIMON, SERVICING TECHNICIAN AT BENNINGTON

Simon suggests not to use the lubricant around the brake calliper area as this will affect the performance of the brakes. This is a good opportunity to check all the fastenings and bolts are secure and also that there is not too much play in your swingline tree.



Jacking up a wheel



A carriage maintenance class

Wheels

Jack up the carriage under the axle and spin the wheels and see if they are running freely.

You will find hub caps on the outer end of an axle where the wheel is fitted. If there is any sign of rust we would recommend that the wheel is removed to enable you to thoroughly inspect the bearings and either replace the parts or re-grease and assemble.

If you suspect a problem with your wheels and are not an expert in taking these apart, we would advise consulting the



Secure for work

manufacturer or a specialist and allow them sort the problem out. We have noted the process below if you feel confident in having a go.

Process of removing the wheel

- Jack up front or back and chock the wheels on the floor.
- Remove the split pin with a set of pliers and remove from the castle nut. Undo the castle nut (see tip below). If the carriage is secure and safe, remove the wheel off the axle
- Clean the bearing, but if there is any sign of wear/rust replace with a new part

Winter maintenance

Re-grease

Re-assemble and tighten the castle nut as tight as possible then slacken off half a turn, but spin the wheel first as a test to see if the wheel spins freely. Adjust the tightness of the castle nut, until you are happy with how the wheel is spinning. Re-insert the split pin and hub cap.

TOP TIPS FROM BENNINGTON

On a Bennington Carriage the left hand side castle nut will have a left hand thread and vice versa on the right.

Make sure you have all the tools required before you start removing the wheel and any spare parts at hand. For safety, make sure the carriage is secure on an axle stand

Tyres

Check the tyres are secure and not loose in the channel.

TOP TIPS FROM BENNINGTON

If pneumatic tyres are fitted, check with the manufacturer the correct tyre pressure



Brake caliper up close

Brakes

For the first test, without your horse or pony sit in the carriage and test the brakes are working by asking a friend to pull the carriage.

For the second test put an axle stand under the axle and then spin each wheel independently, then firmly apply the brake all the way. The wheel should come to an abrupt and solid halt. Your assistant should not be able to turn the wheel by hand while the brake is on. If the above is not the case, your brakes will need to be adjusted.

If drum brakes are fitted there is usually an adjustment in the linkage or springs involved in the braking mechanism. If that adjustment has been maxed out, there is a good chance that the brake pads need to be replaced. In hydraulic systems these remedies may still leave your braking too soft. If this is the case you may need to bleed the brake system. This may be the time to take your carriage to a local mechanic or return the carriage to the manufacturer as bleeding brakes can be tricky.

If you have hydraulic brakes, check the fluid levels in the master cylinder. Remove the brake pads and check for wear, if worn replace with new. You don't want the brake pads to be worn to metal as they will then damage the brake discs, and they will then need replacing too.

TOP TIPS FROM BENNINGTON

A good test is to look for leakages under the carriage whilst in storage. View the video on "How to change brake pads" on the Bennington Carriages web site at: www.benningtoncarriages.co.uk/carriages/carriage-servicing-maintenance

Shafts

Check to see if you see any signs of material weakness on them. Wooden shafts can show visible cracks on the wood or the paint. Take these seriously and sort the problem straight away.

TOP TIPS FROM BENNINGTON

Always look for any signs of cracks. Always carry out visual checks to make sure the shafts are not bent.

Storing

Storing your precious and often expensive vehicle is like storing good clothes.

A vehicle needs to be stored in an ideal climate, so avoid heat because wooden parts may shrink. Try to store your carriage in a dry place and avoid damp which can cause metal parts to rust.

Ammonia fumes damage leather with time, and keep an eye out for woodworm and vermin. Remember to store all upholstered parts in a dry wardrobe to prevent moth infestation.

The shafts of two wheeled vehicles should not be placed on the ground as they could

break, scratch or be trampled on. Instead place the shafts on a rest or tip the cart backwards so the shafts are off ground.

Also cover your carriage with dry and light dust sheets as vehicles stored and cared for in such a manner should last a very long time.

A MESSAGE FROM BENNINGTON CARRIAGES

Whatever you are up to this winter stay safe and don't forget to keep a close eye on the condition of your carriage.

If you need any maintenance help or advice contact the manufacturer of your carriage or enlist a local mechanic to assist you.



Socket and wrench.



A carefully covered carriage

Bennington carriages will be holding carriage maintenance courses in 2015 so keep an eye on the website and Facebook page for updates.