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Effects of the Air Quality in Equine Stable Environments on the Respiratory Health and Allergy Response of Human Personnel: A Review

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Airy barns with high ceilings tend to have lower concentrations of air particulate matter within the breathing zones of horses and personnel when compared to barns with shorter ceilings and high solid walls separating each stall, due to increased ventilation throughout the barn and a greater amount of air held within the building which decreases the overall concentration of airborne particles (Claußen and Hessel, 2017).



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Original Research

The Effect of Management Regime on Airborne Respirable Dust Concentrations in Two Different Types of Horse Stable Design

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It is widely acknowledged that airborne respirable dust (ARD) of $<5\text{ }\mu\text{m}$ in size found in the stable environment has a major negative impact on respiratory health in horses and can cause the debilitating allergic condition known as equine asthma [1], [2], [3], [4], [5]. The

economic impact of respiratory problems in racehorses can be considerable and are linked to poor performance in young Thoroughbreds [6]. Respiratory problems as a whole are the second biggest cause of days lost to training in the Thoroughbred industry

In single stables, commonly 3.6×4.2 m, the airspace available to the horse is restricted by roof height, and air movement can be negligible particularly if back or side windows are kept closed.



Stable Fire Safety

The number of stable fires is on the increase -
don't let your stables become a statistic!

alarm will distress the horses.

- Stables of brick construction with tiled roofs behave better in a fire situation. Wood and felt/corrugated roofing burns and deforms quickly. These may be cheaper and water resistant but they do not behave well in fire, often melting and causing burns to the animals. Nylon rugs will melt and burn the horse's skin, consider using old jute style rugs.

Fire safety: how safe is your stable yard?



Madeleine Silver
13 January, 2014 10:00



 [Stable fires](#) [Stable safety and security](#)

A **stable yard fire** is every horse owner's worst nightmare. But if you are designing a new yard, or planning to make changes to an existing one, fire safety should be high on your list of priorities to avoid a potential disaster.

Shropshire Fire and Rescue Service (SFRS) advises that, where possible, you use **steel frames** and masonry walls that do not easily ignite, and to keep timber — particularly soft woods — to a minimum. **Cement** and **compacted earth floors** are also recommended.