EQUINE REPRODUCTION

noted there is little scientific backing for these supplements.

management techniques. Many nutritional supplements are marketed for use in EMS horses but Geor

in situations where laminitis episodes persist in

addicted that veterinarians will sometimes prescribe medications (e.g., levothyroxine sodium) for

surface, such as a sand arena, he said. Carefully monitor the horse's feet to assure no signs of

increase the time as the horse becomes more conditioned, and try to work on an even and consistent

horses with foot damage due to laminitis. Providing the horse is sound, physical exercise will assist

Physical exercise is also suggested to help manage EMS, however Geor said this can be difficult in

monitoring the blood serum insulin concentration as the weight loss program progresses to evaluate

With effective weight loss, Geor said that insulin resistance will likely improve as well. He suggests

be less than 10%.

the nonstructural carbohydrate content of the hay (starch plus ethanol soluble carbohydrates) should

He added that hay should be fed as a percentage of the horse's body weight (generally starting at

several tips to help fuel weight loss in EMS horses:

the body weight of an obese horse is essential for managing the disorder, he said. He suggested

major structural damage to hoof laminae. This emphasizes the importance of early EMS detection and

Many horses and ponies affected by EMS can be successfully managed such that the frequency and/

Management

ruling out other endocrine disorders, especially equine Cushing's disease.

are other diseases that could be plaguing the horse, however, and Geor stressed the importance of

Insulin regulates the glucose concentration in the blood and stimulates glucose storage in tissues.

- affected horses, indicating that a different subtype of EMS might be responsible for the disorder in non

obese. He explained that more research is needed to fully understand the variation in body types of

Geor cautioned that not all obese horses actually have EMS and that not all horses that have EMS are

can be indicators of EMS.

Increased adiposity also could point to EMS. Geor says that both generalized adiposity (displayed as

diet (e.g., introduction of new feed) also might trigger laminitis in EMS horses, he added.

laminitis are often associated with seasonal changes in grazing conditions. Other recent changes in

(in slow) onset, and there may be a history of recurrent episodes." In pastured horses, episodes of

horse being affected by EMS.

- insulin resistance, and laminitis

results of blood tests and radiographs of the feet (checking for evidence of laminitis), but obesity,

geography behind EMS.

many of the current EMS studies, researchers are currently exploring the possibility of different subtypes of EMS.

Factors that might increase the chance of laminitis in EMS horses include age (older horses are more

- decreased mobility

- digestive disorders, such as ulceration in the gut

- stressful events, such as being trailer-loaded or competition

- increased calorie intake

- decreased daily exercise

Identifying and Managing Equine Metabolic Syndrome (EMS)

is your horse obese? Has he ever tested positive for insulin resistance? Does he suffer from

- Do not feed grain or sweet feed, and avoid feeding treats;

- Feed late maturity hay;

- Do not turn the obese horse or pony out on pasture, as this results in uncontrolled calorie intake;

- Decrease daily calorie intake but maintain a reasonable feed intake to prevent excessive

Identification

increased adiposity, or a body condition score greater than 7 out of 9) and regional adiposity (generally on

general obesity, or a body condition score greater than 7 out of 9) and regional adiposity (generally on

obesity, or a body condition score greater than 7 out of 9) and regional adiposity (generally on

Geor explained that the endocrine/metabolic disorder EMS is currently defined as "increased adiposity

- general obesity, or a body condition score greater than 7 out of 9) and regional adiposity (generally on

Identification and Management of Equine Metabolic Syndrome (EMS) - An Update by Ray J. Geor

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