

2007 Iowa Senior 4-H Horse Bowl

ROUND ONE

One-On-One

- 1 -1 Q. At what age do the permanent 3rd or corner incisors erupt?
- A. 4 1/2 years
- S. HIH 240-1
- 2-2 Q. White markings covering the area from the coronet band to the area below the fetlock would be called what?
- A. Pastern
- S. HIH 140-2
- 3-3 Q. When the lower jaw is shorter than the upper jaw and the incisors don't align, this is an indication of what unsoundness?
- A. Parrot Mouth
- S. HIH 405
- 4-4 Q. The sole of the hoof is flatter on which pair of feet – front or rear?
- A. Front
- S. YLM – 321-2
- 5-1 Q. What is steam rolled grain?
- A. Grain that passes through steam before being rolled
- S. YLM-Int 202-2

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- 6-2. Q. What feed additive is commonly used to reduce dust and increase palatability of a feed?
- A. Molasses
- S. HIH 760-7
- 7-3 Q. A horse's body fat can be estimated using what method of evaluation?
- A. Body condition scoring
- S. HIH 720-3
- 8-4 Q. How old would a horse be with all adult teeth present and the Galvayne's groove beginning to show at the gum margin of the upper corner incisor?
- A. 10 years old (accept range of 9 to 10 years old)
- S. YLM 205-2, HIH 240-4,

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End One-On-One (Ask for alternate)

Begin Open Questions

- 9 Q. What structure of the hoof am I? I am arched in shape, I provide some weight support, I flatten slightly to help absorb concussion, but my primary function is protection.
- A. The sole of the hoof
- S. HIH 505-2, 4
10. Q. How many pounds of manure does a 1000 pound horse produce per day?
- A. 45 – 50 pounds
- S. HIH 360-2

Toss Up – Bonus Attached

11. Q. (Two part) What two things are found in the sensitive laminae of the hoof that cause it to be called sensitive?
- A. Nerves and blood vessels.
- S. HIH 505-2

Bonus Question

12. Q. (Bonus question) Name four different types of grass forage
- A. Bermuda Grass Reed Grass Wheat Grasses
Canary (reed) Grass Bluegrass Digit Grasses
Sudan Grass Brome Grass Redtop
Tall Fescue Orchard Grass Bahia Grasses
Timothy Rye Grass Johnson Grass
Sorghum Sudex Millet
- S. YLM 102-1

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Resume Open Questions

13. Q. What category of muscle is found in all of the following systems – Digestive, respiratory, circulatory, integument and urogenital
- A. Smooth muscle
- S. HIH 840-1
14. Q. Thrush is a black, strong smelling infection of the hoof that causes destruction of the frog. Is it caused by aerobic or anaerobic bacteria?
- A. Anaerobic bacteria
- S. YLM 334-1
15. Q. What is the name for the conformational defect described as the cannon bone being set too far to the outside of the knee?
- A. Bench or offset knee
- S. HIH 230-3

Toss Up – Bonus Attached

16. Q. (Two Part) When considering vision, where are the horse's two blind spots?
- A. Directly to the rear, behind its hindquarters
Directly below the head, or directly in front
- S. HIH 1220-1

Bonus Question

17. Q. Name two causes of acute laminitis.
- A. Enterotoxemia from excessive grain intake
Excessive foot concussion or fatigue
Sudden weather changes Infections
Toxins or poisons Allergies
Colic Changes in feed
Drugs Retained placenta (foal founder)
- S. YLM 334-2

Resume Open Questions

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18. Q. What is the name of the competitive equine sport that is one of the Olympic competition events and is derived from the French word for training?
- A. Dressage
- S. HIH 172-1
19. Q. What disease is caused by a spore forming, toxin producing bacterium found commonly in the soil named *Clostridium tetani*?
- A. Tetanus or Lockjaw
- S. AYHC-YLM-BEG 104-2 L

Last Question of the Round

20. Q. What is the term for the type of vision where the horse sees different images with each eye?
- A. Monocular vision
- S. HIH 1220-1

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ROUND TWO

One-On-One

- 1 -1 Q. What structure transfers the horse's weight from the bony structure to the hoof wall?
- A. Laminae
- S. HIH 505-1
- 2-2 Q. At what age do the deciduous 3rd or corner incisors erupt?
- A. 6 to 9 months
- S. HIH 240-1
- 3-3 Q. Which portion of the topline is most important in helping hold the saddle on without the need to excessively tighten the cinch?
- A. Withers
- S. HIH 220-6
- 4-4 Q. What is the most critical conformational factor in the balance of the horse?
- A. Slope of the shoulder
- S. HIH 220-6
- 5-1 Q. What is the most common cause of corns?
- A. Leaving a short heeled shoe on too long.
- S. YLM 334-1
- 6-2. Q. Where in the female reproductive tract does fertilization of the ova occur?
- A. Oviduct (in the ampulla)
- S. HIH 910-3
- 7-3 Q. Knobs are found on the end of which farrier tool to allow it to be easily distinguished from nippers?
- A. Pull offs or pinchers
- S. YLM 116-1

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- 8-4 Q. What breed of horse is best described as a horse with a small build, long arching neck, high tail carriage, chiseled head, and a dished face?
- A. The Arabian
- S. HIH 150-1

End One-On-One (Ask for Alternate)

Begin Open Questions

- 9 Q. Identify the horse color from the following description – body color yellowish or gold; mane and tail black; usually black on the lower legs, and usually no dorsal stripe.
- A. Buckskin
- S. HIH 140-1
10. Q. What is the absolute minimum stall size recommended by the AYHC for a horse?
- A. 10 foot by 10 foot
- S. YLM 107-2

Toss Up – Bonus Attached

11. Q. (Two Part) There are 64 total chromosomes in each cell of the horse. Of these how many are autosomes and how many are sex chromosomes?
- A. 62 autosomes and 2 sex chromosomes
- S. HIH 1060-1

Bonus Question

12. Q. Bonus question – There are over 150 types of internal parasites of the horse. Name the four most significant different types.
- A. Strongyles (lg/sm) Pinworms Roundworms Bots
- S. HIH 430-1

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Resume Open Questions

13. Q. Aluminum horseshoes have the advantage over steel horseshoes of being lighter in weight, but have what disadvantage compared to a steel shoe?
- A. Aluminum shoes wear faster.
- S. YLM 231-2
14. Q. At what age should foals be introduced to concentrates?
- A. 1 to 2 months (also accept as early as the foal shows interest)
- S. HIH 783-2
15. Q. What do weighted shoes do to a horse's action?
- A. Enhance leg action by changing the timing of and adding momentum to hoof flight patterns.
- S. YLM 231-2

Toss Up – Bonus Attached

16. Q. What fitting is being described by the terms – string, elastic–end contour, threefold and balding?
- A. Girths
- S. HIH 1100-3

Bonus Question

17. Q. (Bonus Question) Name four ways teeth can be used to age an adult horse?
- A. Occurrence of permanent teeth (eruption)
Disappearance of cups (would include presence of dental stars or enamel spots)
Angle of incidence
Shape of the surface of the teeth
Galvayne's groove
Hook on upper corner incisors
- S. YLM 205-2

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Resume Open Questions

18. Q. The coronary cushion is the elastic portion of what structure of the hoof?
- A. Coronary band
- S. HIH 505-5
- 19 Q. In the conformational defect bench knee or offset knee, what bone is set too far to the outside of the knee?
- A. Cannon bone, 3rd metatarsal
- S. HIH 230-3

Last Question of the Round

20. Q. What sense of the horse is the most essential in taking cues from the rider?
- A. Sense of touch
- S. HIH 1220-2

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ROUND THREE

One-On-One

- 1 -1 Q. Will the edges of a crack in the hoof wall – such as a sand crack or quarter crack – heal together if the hoof wall is supported and immobilized?
- A. No – the hoof must grow out to eliminate the crack.
- S. YLM – 334-2
- 2-2 Q. What nutritional component of the diet would you be monitoring if you are measuring the weight of a horse on a regular basis?
- A. Energy
- S. HIH 820-1
- 3-3 Q. The disturbance of the blood flow and the bond of the sensitive laminae to the horny laminae is the cause of what disease?
- A. Laminitis (accept founder – not really correct in current thinking)
- S. YLM 334-2
- 4-4 Q. What tool is used to level the bearing surface of the hoof after it has been trimmed by the nippers?
- A. Rasp
- S. YLM 116-1
- 5-1 Q. Electrical wiring in a barn is always run in conduit to minimize fire hazards. Why?
- A. To prevent chewing or rubbing by horses
- S. YLM 107-2
- 6-2. Q. What breed of horse is described as having contributed to almost every major American horse breed and is the oldest of the American breeds: Unlike most breeds this breed traces its foundation to a single stallion named Figure and is the only breed named after a horse.
- A. The Morgan
- S. HIH 151-1

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- 7-3 Q. What English saddle is being described? Padded knee roll, deep seat, forward flap, most popular type of forward seat saddle used for multiple disciplines.
- A. All purpose saddle
- S. HIH 1100-1
- 8-4 Q. What term would be defined as the degree of expression of a trait for which the horse has the gene?
- A. Penetrance
- S. HIH 1060-2

End One-On-One (Ask for Alternate)

Begin Open Questions

9. Q. In what part of the horse's digestive tract does the majority of sound-generating digestive action occur?
- A. Cecum
- S. HIH 710-2
10. Q. Based on cost per unit of energy, and comparing corn and oats, which is cheaper?
- A. Corn
- S. YLM 302-2

Toss Up – Bonus Attached

11. Q. (Two Part) What are two advantages of using bedding for your horse that is more absorbent?
- A. You use less bedding and replace it less frequently (also less labor and less expensive)
- S. HIH 330-1

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Bonus Question

- Q. (Bonus question) When examining a horse, what three things would you evaluate when looking at the mucous membranes?
- A. Color, moistness, and capillary refill time
- S. HIH 425-2

Resume Open Questions

13. Q. What hoof disease is commonly a result of owner neglect and dirty wet living conditions for the horse?
- A. Thrush
- S. HIH 540-1
14. Q. What is the proper name (genus and species) of the most dangerous of the three large strongyles?
- A. *Strongylus vulgaris*
- S. HIH 430-2
15. Q. What type of gene action is demonstrated when a trait of a horse is the result of the additive effect of many genes?
- A. Quantitative
- S. HIH 1020-3

Toss Up – Bonus Attached

16. Q. An egg bar horseshoe is used to provide additional support to what part of the hoof?
- A. Rear portion or heels.
- S. HIH 515-4

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Bonus Question

17. Q. (Bonus Question) No DEWORMING schedule fits all horses. Most veterinarians recommend deworming four times a year. List four factors that would influence your deworming program.
- A. Climate Humidity
Rainfall Season
Concentration of horses Size of pasture
Age of horses Parasite infection history
Travel of horses out of facility Fecal sample evaluation
- S. HIH 430-7

Resume Open Questions

18. Q. What type of hammer would you use to shape and make shoes on the anvil?
- A. Rounding or turning hammer
- S. YLM 116-2
19. Q. Other than dust and mold, what ventilation problem does storing hay above stalls create?
- A. Retention of heat and moisture (accept either – also accept fire – it would cause a ventilation problem and is a negative aspect of storing hay)
- S. YLM 107-3

Last Question of the Round

20. Q. What Western saddle is being described? Straight leg position, deep seat, tall horn, high cantle, rounded flap and lightweight.
- A. Barrel racing (gymkhana) saddle
- S. HIH 1100-5

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ROUND FOUR

One-On-One

- 1 -1 Q. What structure is commonly found on a barn roof and functions to properly ventilate the barn?
- A. Cupola, ridge vents
- S. HIH 320-8
- 2-2 Q. Wheat bran is a by-product that can be added to a horse's ration as a source of additional fiber. What part of the wheat is the bran?
- A. The bran is the outer covering of the wheat kernel which is removed during the cleaning and processing of the grain
- S. HIH 760-8
- 3-3 Q. Which nutrient can be used for energy, but is less efficient in conversion to energy and is commonly used for growth and tissue maintenance?
- A. Protein
- S. HIH 820-1
- 4-4 Q. What group of parasites are the most significant and common of all of the equine's parasites?
- A. Strongyles (bloodworms)
- S. HIH 430-1
- 5-1 Q. Which nutrient has the highest energy density?
- A. Fat
- S. YLM 302-2
- 6-2. Q. What pack saddle is being described – normally a centerfire-rigged, single cinched with a half-breed, and is best suited for sling loads?
- A. Decker
- S. HIH 1125-1

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- 7-3 Q. Identify the horse color from the following description – body color yellowish or gold; mane and tail may be black, brown, red, yellow, white or mixed; usually has a dorsal stripe, zebra stripes on legs and transverse stripe over the withers.
- A. Dun
- S. HIH 140-1
- 8-4 Q. What is the primary means through which internal parasites are spread?
- A. Manure
- S. HIH 430-4

End One-On-One (Ask for Alternate)

Begin Open Questions

- 9 Q. What advantage do web or rubber reins provide over plain reins?
- A. More secure grip, not slippery when wet.
- S. HIH 1100-6
10. Q. An abscess of the hoof can cause intense pain and lameness. Other than protecting the area and antibiotics, what is the most important thing to do to encourage resolution of this infection?
- A. Drainage of the abscess.
- S. HIH 540-2

Toss Up – Bonus Attached

11. Q. You are evaluating a horse for purchase and it appears sound on examination and gaiting. What would you look for when examining the hooves to determine if the horse has experienced chronic laminitis?
- A. Irregular rings on the hoof wall (also a wide white line at the toe and a flat sole could be considered acceptable)
- S. HIH 540-5

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Bonus Question

- Q. Q. (Bonus question) From a genetic standpoint, what are the three basic colors of the horse?
- A. Black, bay, and chestnut.
- S. HIH 1040-1

Resume Open Questions

13. Q. What structure on the ventral surface of the hoof is used as the guideline for shaping the hoof and nail placement?
- A. White line
- S. HIH 525-1
14. Q. What is the proper term for the procedure to visualize, examine and count chromosomes under the microscope?
- A. Karyotyping
- S. HIH 1060-1
15. Q. What breed of horse is described as having a primary color of chestnut, but includes a wide range of other colors, having a refined head with small ears, a long neck with considerable arch, a high withers, used today primarily as a show horse and can be 3 or 5 gaited and shown in fine harness?
- A. American Saddlebred Horse
- S. HIH 156-1

Toss Up – Bonus Attached

16. Q. What class of horse, as defined for feeding management, might require increased quantities in the diet or unrestricted access to free choice salt?
- A. Working horses (lose salt through sweating)
- S. HIH 710-7

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Bonus Question

17. Q. (Bonus Question) Name three things baling hay too wet – moisture content greater than 20% - will cause?
- A. Cause hay to become moldy (brown/black in color)
Will generate heat that will cause a loss of vitamin content
Will decrease protein digestibility
May lead to spontaneous combustion
- S. YLM 337-2, HIH 750-4

Resume Open Questions

18. Q. Name one type of insurance that covers breeding mare infertility.
- A. Barrenness Insurance, Prospective Foal Insurance and Live Foal Insurance
- S. HIH 1340-3
19. Q. What is the minimum width for a stall door?
- A. 4 feet
- S. YLM 207-2, HIH 320-6

Last Question of the Round

20. Q. The two tough sheet-like structures called the broad ligaments support what organ in the horse's abdomen?
- A. Uterus
- S. HIH 910-3

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ROUND FIVE

One-On-One

- 1 -1 Q. What hormone would be influencing the cervix when it is flaccid, very pink and vascular, and produces a thin watery mucous?
- A. Estrogen
- S. HIH 910-3
- 2-2 Q. Considering the stomach, small intestine and large intestine, where do feeds being processed by the horse spend the least period of time?
- A. Stomach (15 minutes)
- S. YLM 203-1
- 3-3 Q. What is the vector for the equine disease caused by the bacteria *Borrelia buurgdorferi*, also known as Lymes disease?
- A. Ticks
- S. HIH 655-1
- 4-4 Q. What fat soluble vitamin is considered necessary for growth and development of a strong hoof wall?
- A. Vitamin A
- S. HIH 505-2
- 5-1 Q. What are added to horseshoes to help take the stress off of the nails and stabilize the shoe on the foot?
- A. Clips
- S. YLM 231-2, HIH 515-2
- 6-2. Q. When dividing horses into classes for nutritional management what nutritional class would weanlings and yearlings be placed in?
- A. Growing
- S. YLM 103-1

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- 7-3 Q. There are numerous disadvantages to using straw as a bedding, but what is the major safety issue with straw?
- A. It is highly combustible – fire hazard
- S. HIH 30-1
- 8-4 Q. Name the type of shoe that is used to elevate the heels of a horse that is confined to stall rest?
- A. Patten Shoe
- S. YLM 231-3

End One-On-One (Ask for Alternate)

Begin Open Questions

- 9 Q. Visual inspection is the most common method of evaluating forage. What is the most accurate method to assess the nutrient composition of forage?
- A. Chemical analysis
- S. HIH 750-5
10. Q. Slow eating, quidding, swelling of the face, draining tracts and nasal discharge can be indications of what dental problem?
- A. Tooth root infection (accept just infection)
- S. HIH 405-3

Toss Up – Bonus Attached

11. Q. Identify this bridle from the following description – double reined with the snaffle and curb bit separated, commonly used for 3 and 5 gaited horses.
- A. Weymouth bridle (Weymouth Set, Weymouth Curb), full bridle or double bridle
- S. HIH 1100-10

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Bonus Question

12. Q. (Bonus question) Name four things that can be done to help a horse with navicular disease.
- A. - Rest/restricted activity
Bar shoe (egg bar) to support the rear of the hoof
Rocker toe
Raise the heel with wedges
Improve blood circulation – medication Isoxsuprine
Nerving – low not high
Pain control
- S. HIH 540-3

Resume Open Questions

13. Q. In natural conditions, horses demonstrate few vices. What is it about stalls and stabling that promotes the development of these vices?
- A. Boredom
- S. HIH 320-1
14. Q. If a pair of alleles are not identical, what should that individual be considered with respect to those genes?
- A. Heterozygous
- S. YLM 335-1, HIH 1020-2
15. Q. As the cups on the horse's incisors disappear, what starts to form first as a narrow elongated yellow mark?
- A. Dental star
- S. YLM 205-2

Toss Up – Bonus Attached

16. Q. What is the proper name (genus and species) of the large internal parasite of the horse where larval migration can damage the liver and lungs, the adults live in the small intestine, and they primarily affect foals?
- A. *Parascaris Equorum* (not Strongyloides or Threadworms – do not affect the liver and are not large)
- S. HIH 430-1

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Bonus Question

17. Q. (Bonus Question) In qualitative gene action what are the three primary types of action that effect the expression of the trait?
- A. Dominance, co-dominance and partial dominance
- S. HIH 1020-2

Resume Open Questions

18. Q. What metal alloy can be used for horseshoes that maintains the light weight of aluminum, but has the durability of steel
- A. Titanium
- S. HIH 515-4
19. Q. What classification of shoeing would be used to describe the application of a horseshoe to support or protect a weak portion of the hoof to help prevent pain?
- A. Therapeutic shoeing
- S. YLM 231-1

Last Question of the Round

20. Q. What is the reason for putting a 6 inch wide board at the top of a wire fence?
- A. To allow the horse to see the fence better and to prevent damage to the horse and the fence.
- S. HIH 350-3

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ROUND SIX

One-On-One

- 1 -1 Q. Why is the phenotype of the horse not always representative of the horse's genotype?
- A. The effects of recessive genes may not be expressed in the phenotype (Also accept environmental factors)
- S. HIH 1060-2
- 2-2 Q. To eliminate parasite problems from your horse, all of your parasite control procedures are directed to accomplishing what key event?
- A. Interruption of the parasite life cycle
- S. HIH 430-4
- 3-3 Q. Radiographs and nerve blocks are commonly used to confirm a diagnosis of navicular disease. What other simpler diagnostic instrument or tool can your veterinarian use to best make this diagnosis?
- A. Hoof testers
- S. YLM 334-2L
- 4-4 Q. A heart bar shoe is used to transfer weight from the hoof wall to assist the wall in healing. What part of the hoof is the weight transferred to?
- A. The frog
- S. YLM 231-3
- 5-1 Q. The Kimberwicke bit is considered a leverage bit. How is it different from a typical leverage bit like a curb bit?
- A. The Kimberwicke does not have shanks. It also uses slots on top of the rings for attachment of a curb chain to provide leverage.
- S. IDET 161, HIH 1100-9
- 6-2. Q. What does a skin pliability test check for?
- A. Dehydration
- S. YLM 115-1

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- 7-3 Q. What term is used to describe the process of desensitization of the foal to the farrier and the routine handling and examination of the feet?
- A. Imprint training
- S. HIH 525-2
- 8-4 Q. In removing a traditional nailed on keg shoe, what is the first step the farrier will do to remove the shoe after cleaning and examination of the hoof ?
- A. Open or cut the clinches
- S. HIH 535-2

End One-On-One (Ask for Alternate)

Begin Open Questions

- 9 Q. Drainage of a potential site should allow water to drain away from buildings, rings, and training areas. To prevent muddy conditions or erosion, what should the slope of the land be?
- A. Two to six percent
- S. HIH 3201-2
10. Q. Shaping or dressing the hoof is done to remove any outward distortion of the hoof wall before applying the shoe. What is the maximum amount of hoof wall that can be removed without excessively thinning and weakening the wall?
- A. One half of the thickness of the wall.
- S. HIH 535-4

Toss Up – Bonus Attached

11. Q. (Two Part) Name two areas to which a non-leverage bit like the snaffle applies pressure.
- A. Corners of the mouth, tongue, and bars. (Also accept roof of the mouth)
- S. HIH 1100-8

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Bonus Question

12. Q. (Bonus Question) Name that parts of the mare's reproductive tract.
- A. Vulva, vagina, cervix, uterus, oviducts, and ovaries
- S. HIH 910-1

Resume Open Questions

13. Q. Why is properly composted manure and bedding safe to spread on pastures without worry about the spread of parasites, pathogenic bacteria, or weed seeds?
- A. Composted manure will reach a temperature that will destroy these problems.
- S. HIH 360-3
14. Q. Ideally, how much wider should the web of the horseshoe be compared to the width of the hoof wall?
- A. Twice the thickness.
- S. HIH 535-5
15. Q. What structure of the hoof am I? I am very elastic and have few blood vessels or nerve endings. I am located between the lateral cartilages and absorb concussive forces from the pastern coffin bones and frog. I am wedge shaped and composed of fibrous tissue and fat.
- A. Digital cushion
- S. HIH 505-4

Toss Up – Bonus Attached

16. Q. (Two Part) What are the two most effective stimuli that can be used in horse training?
- A. Hearing – voice commands
Touch – pressure – bit, legs, seat etc
- S. HIH 1240-2

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Bonus Question

17. Q. (Bonus question) What are three major problems with wooden floors?
- A. Slippery when wet
Prone to attracting rodents by creating an environment for urine to accumulate and feed to fall through the cracks.
Splinters
Difficult to disinfect
Need to be periodically replaced
- S. HIH 320-3

Resume Open Questions

18. Q. Therapeutic shoeing to treat limb deviations of a foal needs to be done before what event occurs to the foal's orthopedic structure.
- A. Before the epiphyseal plates (growth plates) close
- S. HIH 525-3
19. Q. Abnormalities that do not affect the intended use or serviceability of the horse are what?
- A. Blemish
- S. HIH 230-1

Last Question of the Round

20. Q. (Two Part) What is the term used to describe a horse where all of the permanent incisors are in wear and what is the minimum age of the horse?
- A. Full mouth, 5 years old
- S. YLM 205-2

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ROUND SEVEN

One-On-One

- 1 -1 Q. What is the stage of the mare's estrous cycle that follows her estrus or heat and lasts approximately 14-15 days until she is either pregnant or reverts back to anestrus?
- A. Diestrus
- S. YLM 326-2
- 2-2 Q. Which premolars are present as permanent teeth only?
- A. Wolf teeth
- S. HIH 405-1
- 3-3 Q. The leaves of hay contain a greater content of non-structural carbohydrates and proteins than the stems. How does this affect their nutritional value?
- A. The leaves are more digestible
- S. YLM 337-2L
- 4-4 Q. Retention of deciduous teeth (i.e. caps) is most commonly seen in which teeth?
- A. Premolars
- S. HIH 405-2
- 5-1 Q. A normal keg shoe has four nail holes on each side. What term is applied to the second and third holes?
- A. Quarter nail holes
- S. YLM 231-4
- 6-2. Q. What two items can be added to a stock saddle to make it more suitable for packing?
- A. Breeching and a breast collar
- S. HIH 1125-1

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- 7-3 Q. How long (in months) do the bot larvae remain attached to the horse's stomach lining before passing out with the manure and pupating into adult flies?
- A. 8 to 10 months
- S. HIH 430-3
- 8-4 Q. How many air exchanges per hour should an adequately ventilated barn have?
- A. Four to eight
- S. YLM 107-2

End One-On-One (Ask for Alternate)

Begin Open Questions

- 9 Q. What is the minimum distance a manure pile should be located from a well used for drinking water.
- A. A minimum of 100 feet
- S. HIH 360-2
10. Q. In race horses, why are traction devices such as toe grabs not being used by trainers as commonly as they use to be?
- A. They produce too many injuries
- S. YLM – 231-2

Toss Up – Bonus Attached

11. Q. (Two Part) When horses lick at the areas where bot eggs are attached, what two necessary factors is the horse providing that allows the bot eggs to hatch?
- A. Friction, moisture and warmth
- S. HIH 430-3,

Bonus Question

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12. Q. (Bonus question) What are three functions progesterone plays in the mare's reproductive cycle?
- A. 1 – Maintains pregnancy by stimulating the uterus
2 – Inhibits the release of LH by the pituitary gland
3 – Changes the mare's behavior pattern so she will show no signs of estrus
- S. HIH 910-6

Resume Open Questions

13. Q. In designing an equine facility, one of the primary considerations is the safety of the horses and the handlers. Design is influenced significantly by one **primary** behavioral response that the horse exhibits as a defensive measure. What is that behavior?
- A. Flight when fearful
- S. HIH 320-1
14. Q. What is the proper name of the structure of the uterus which is being described? It is composed of two sheets of tissue – one longitudinal and one circular, it is the middle layer, and it is responsible for powerful contractions of the uterus at birth of the foal.
- A. Myometrium
- S. HIH 910-3
15. Q. When the horse is undergoing strenuous exercise what waste product produced by anaerobic glycolysis causes muscle fatigue?
- A. Lactic acid
- S. HIH 850-2

Toss Up – Bonus Attached

16. Q. The percentage of a horse's trait that is due to genetics is measured by what?
- A. Heritability estimate
- S. YLM 335-2, HIH 1020-3

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Bonus Question

17. Q. (Bonus question) In evaluating a site for an equine facility, the natural environment needs to be assessed. Name five natural environmental factors you would have to consider to be successful.
- A. Topography of the land – i.e. slope
Drainage – both above and below ground
Prevailing winds
Solar radiation
Precipitation (do not accept cost or any other non-environmental factor)
Vegetation
Soil characteristics
- S. YLM 333-1, HIH 310-1

Resume Open Questions

18. Q. Why would you choose to use a rocker-toe horse shoe for a healthy young horse?
- A. A rocker-toe shoe eases the breakover of the hoof and to help prevent forging – accept either answer.
- S. HIH 525-4
19. Q. FSH (Follicle Stimulating Hormone) exerts its effect in stimulating spermatogenesis in the stallion by acting on what cells in the testes?
- A. Sertoli cells
- S. YLM 327-1

Last Question of the Round

20. Q. The terms “varus” and “valgus” are used to describe deviations of what structure of the foal?
- A. Deviations of the legs – more specifically the knees and hocks.
- S. HIH 525-2

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ROUND EIGHT

One-On-One

- 1 -1 Q. During the winter season, most mares are in a state of reproductive hibernation called what?
- B. Anestrus
- S. HIH 910-5
- 2-2 Q. An extension backward of the flexion tendons, caused by tearing or stretching is called what?
- A. Bowed Tendon
- S. HIH 230-4
- 3-3 Q. What part of the hoof absorbs concussion from two directions?
- A. Frog
- S. HIH 505-4
- 4-4 Q. Put in order from head to tail the following parts: Back, Loin, Croup, Withers, Poll, Buttock
- A. Poll, Withers, Back, Loin, Croup, Buttock
- S. HIH 220-3
- 5-1 Q. Horses who don't want to leave the barn are called what?
- A. Barn sour
- S. YLM 111-2
- 6-2. Q. TWO PART. Name two (2) breeds that have a higher percentage of fast twitch muscle fibers?
- A. Quarter Horses, Paints, and Appaloosa (Stock Type)
- S. HIH 851-8
- 7-3 Q. What does EVA stand for?
- A. Equine viral arteritis
- S. HIH 620-1

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- 8-4 Q. A structural deviation with the knees set too far forward from the body in relation to the leg is called what?
- A. Over at the knees or commonly referred to as buck-kneed
- S. HIH 230-5

End One-On-One (Ask for Alternate)

Begin Open Questions

- 9 Q. In a horse's foot, where would you find a corn?
- A. In the heel area of the sole
- S. YLM 334-1
10. Q. How many incisors does a horse have?
- A. 6 on the top, and 6 on the bottom, 12 total
- S. HIH 405-1

Toss Up – Bonus Attached

11. Q. THREE PART. What are the three components of blood?
- A. Red Blood Cells, White Blood Cells, and Platelets
- S. HIH 830-1

Bonus Question

12. Q. (Bonus question) Name 5 parts of an English bridle.
- A. Crown piece, brow band, nose band, bit, reins, head stall, throat-latch, cavesson, cheek piece
- S. HIH 1100

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Resume Open Questions

13. Q. Name the exterior opening to the reproductive canal of a mare that serves to protect the mare from vaginal contamination.
- A. Vulva
- S. HIH 910
14. Q. What organ in the digestive system is the horse missing compared to the human?
- A. Gallbladder
- S. HIH 710-1
15. Q. The parasite that causes irritation around the tail and may cause the horse to rub his tail are what?
- A. Pinworms
- S. HIH 430-1

Toss Up – Bonus Attached

16. Q. What are the two basic classifications of forages?
- A. Legumes and grasses
- S. HIH 760

Bonus Question

17. Q. (Bonus question) Name the four stages of the life cycle of the horse fly?
- A. Egg, Larva, Pupa, Adult
- S. HIH 415-1

Resume Open Questions

18. Q. Chronic Obstructive Pulmonary Disease is commonly known as what?
- A. Heaves
- S. HIH 810-3

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- 19 Q. What strain of rhinopneumonitis can cause abortions between 8 & 11 months of gestation?
- A. Equid Herpesvirus I
- S. HIH 610-1

Last Question of the Round

20. Q. How many pairs of chromosomes are in the cell of a horse?
- A. 32
- S. HIH 1020-1