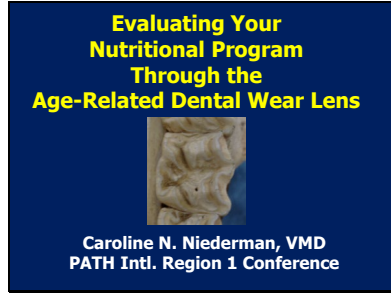
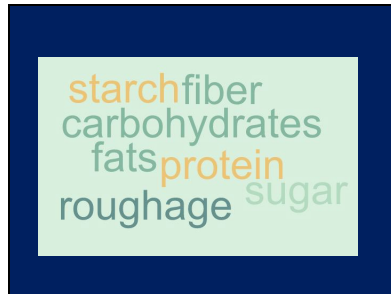


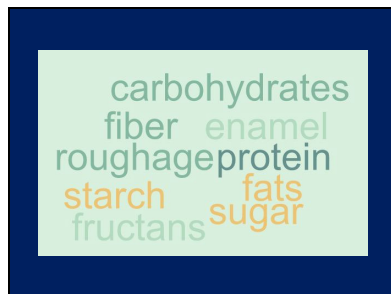
Slide 1



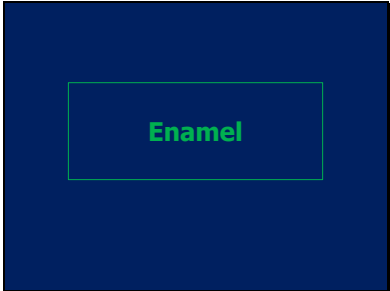
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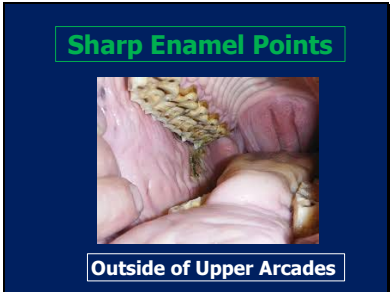
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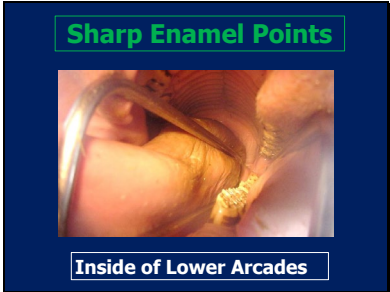
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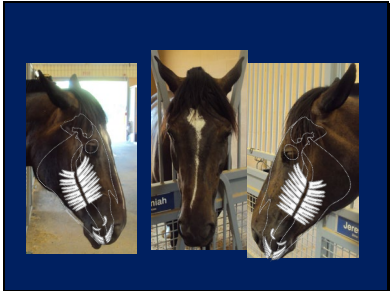
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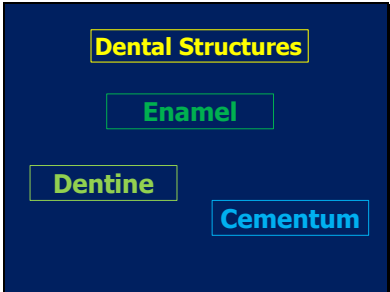
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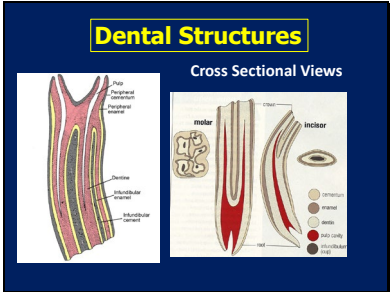
Slide 7



Slide 8



Slide 9



Slide 10

Dental Structures

Dentine **Cementum**

**New Layers Added
Over the Course of
Horse's Life**

Slide 11


Dental Structures

Enamel

**Fixed Amount
that Decreases
with Age**

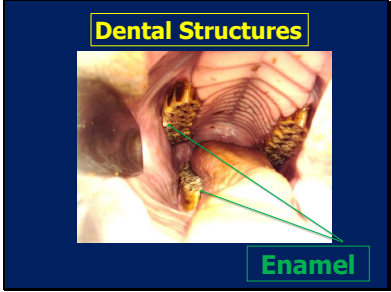
Slide 12

Dental Structures

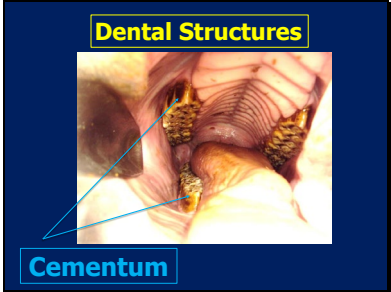


Cementum **Enamel**

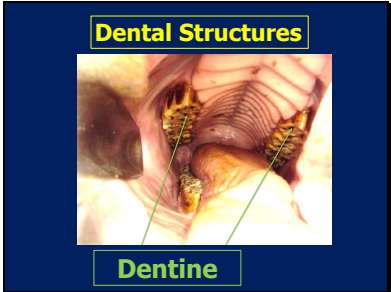
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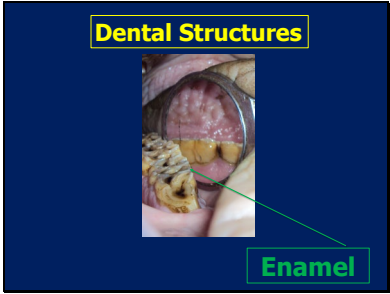
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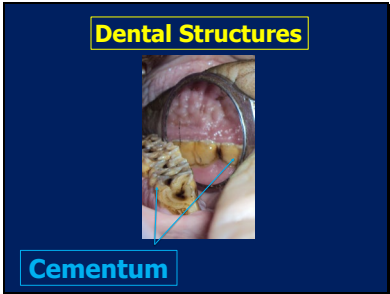
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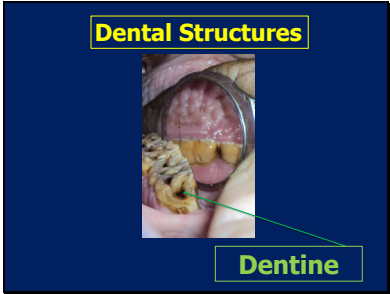
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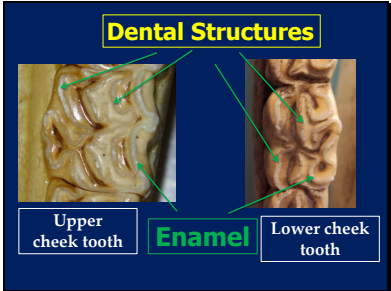
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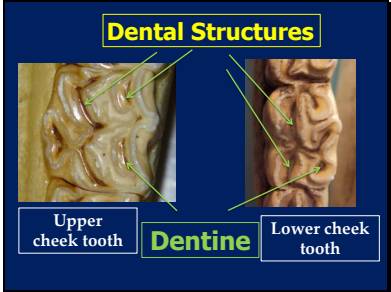
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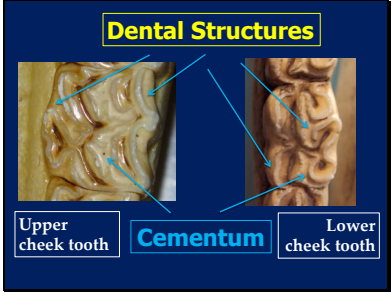
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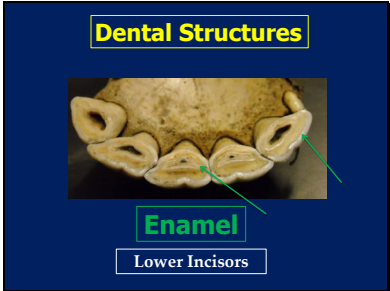
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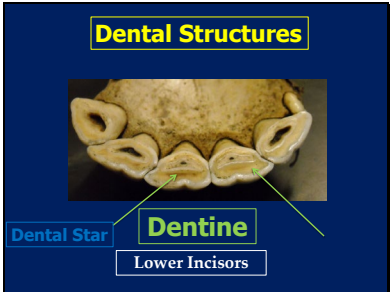
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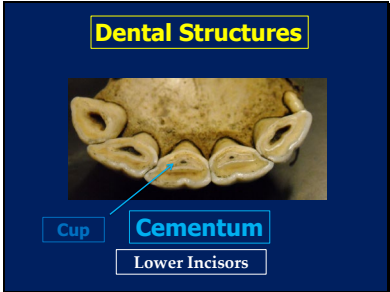
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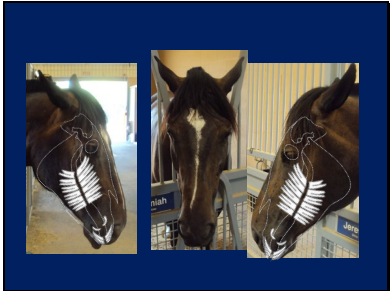
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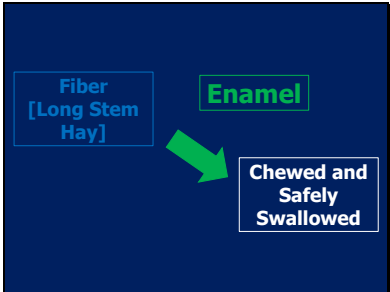
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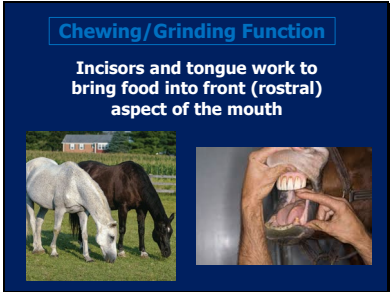
Slide 25



Slide 26




Slide 27



Slide 28

Chewing/Grinding Function


Food is then passed along the occlusal surface of the cheek teeth [six teeth acting as a unit] in an auger like fashion.



Slide 29

Chewing/Grinding Function

Cheeks keep food in between the teeth

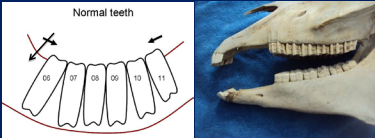


Slide 30

Chewing/Grinding Function

Each row: Tightly compressed together

Normal teeth




Acts as one functional grinding unit

Slide 31

Chewing/Grinding Function


Upper (maxillary) cheek teeth wider apart than lower (mandibular) counterparts.



Slide 32

Chewing/Grinding Function

Chewing surface not level:
roughly 10-15 degrees




Creates shearing force

Slide 33

Chewing/Grinding Function

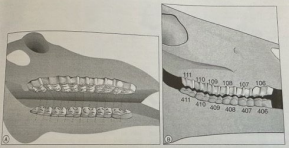
Saliva produced in large quantities to
moisten the food



Slide 34

Chewing/Grinding Function


Food passed in rotary fashion through food channels created by folded enamel on the chewing surface of the teeth.



Slide 35

Chewing/Grinding Function


Enamel folds along chewing surface



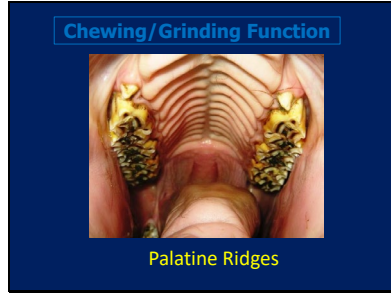
Slide 36

Chewing/Grinding Function

And the corresponding ridges on the horse's palate



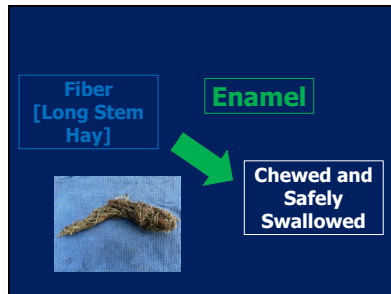
Slide 37



Slide 38




Slide 39




Slide 40

Chewing/Grinding Function




Maintain healthy body condition



Produce normal manure

Slide 41



Slide 42

Nutritional Program

Forage

Grain

Slide 43

Nutritional Program

What to Feed

Slide 44

Horse: Hindgut Fermenters

Foregut: Esophagus, stomach & Small intestine

Hindgut: Cecum, Large colon, small colon, rectum

Slide 45

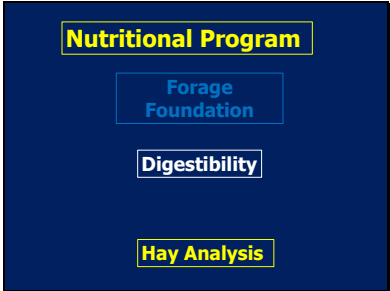
Nutritional Program

Forage Foundation

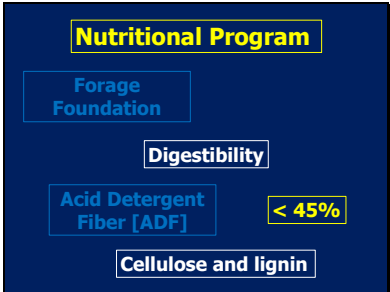
Digestibility

Will your horses eat it?

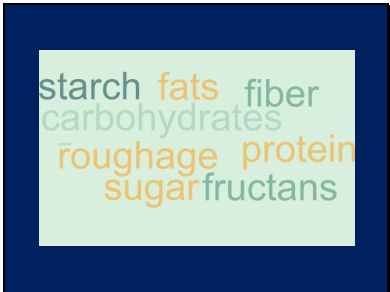
Slide 46



Slide 47



Slide 48



Slide 49

Nutritional Program

Forage Foundation

Composition

Hay Analysis

Slide 50

Nutritional Program

Forage Foundation Composition

Structural Carbohydrates [CH0]

Non- Structural Carbohydrates [CH0]

Slide 51

Forage Foundation Composition

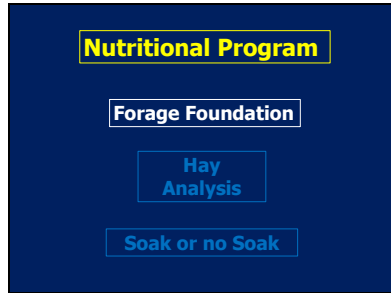
Sugars Fructans Starch

Nonstructural Carbohydrates (NSC)

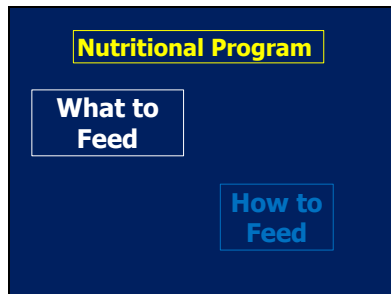
Water Soluble Carbohydrates (WSC)

Ethanol Soluble Carbohydrates (NSC)

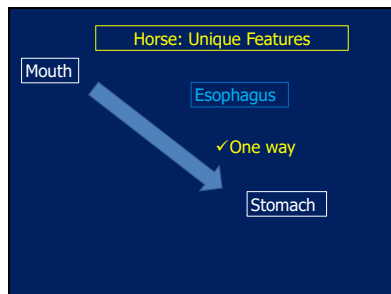
Slide 52



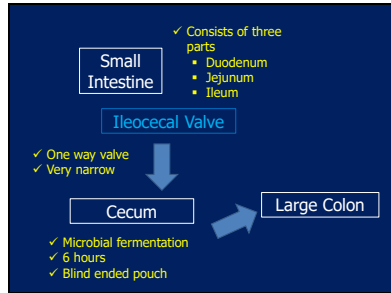
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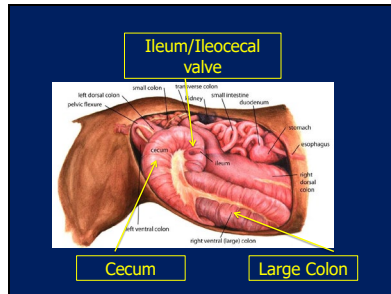
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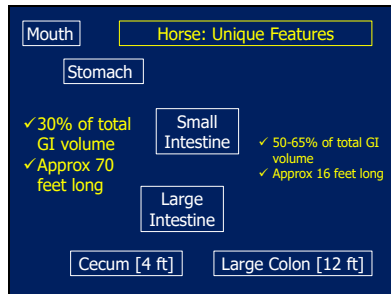
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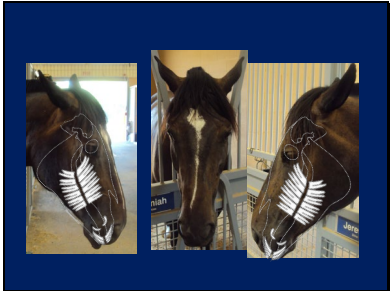
Slide 56



Slide 57



Slide 58



Slide 59

Nutritional Program

What to Feed **How to Feed**

What will/should the horse eat?

Slide 60

Nutritional Program

What to Feed **How to Feed**

Cheek Tooth Enamel

Slide 61

Nutritional Program

Cheek Tooth Enamel

Surface Area for Grinding/Chewing

Slide 62

Nutritional Program

Cheek Tooth Enamel

Fixed Amount that Diminishes with Age

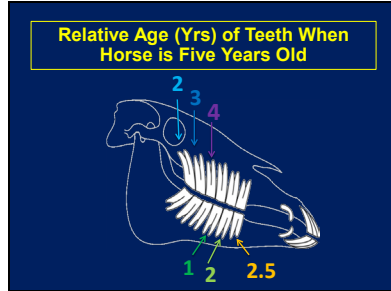
Slide 63

Nutritional Program

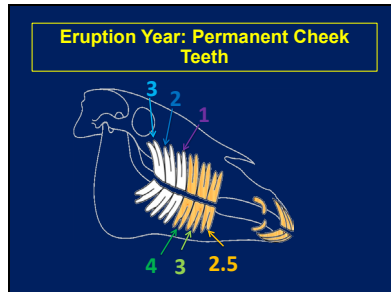
Cheek Tooth Enamel

Teeth are All Different Ages

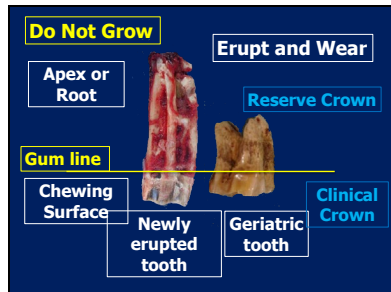
Slide 64



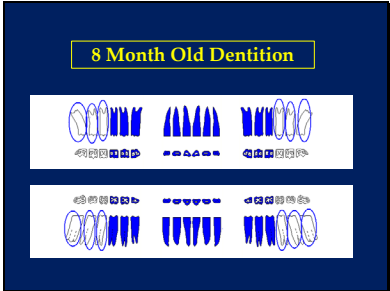
Slide 65



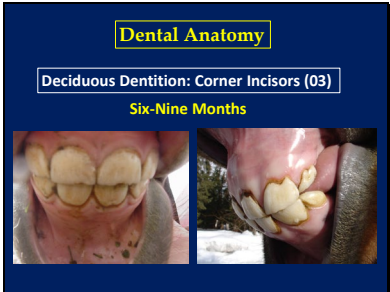
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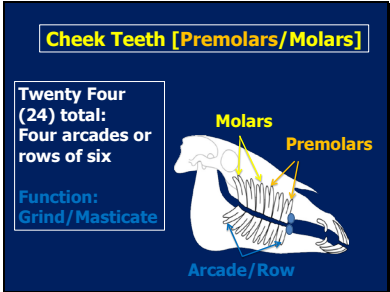
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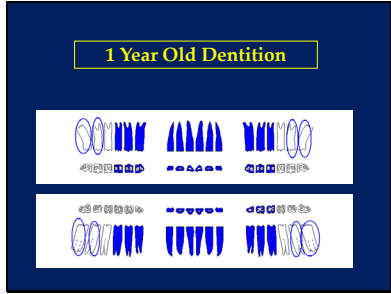
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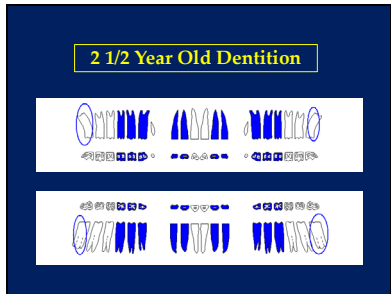
Slide 69



Slide 70



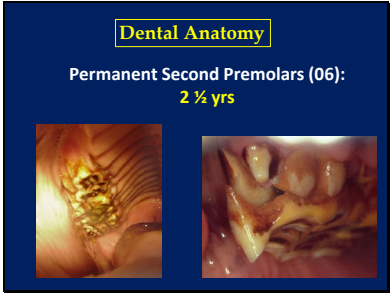
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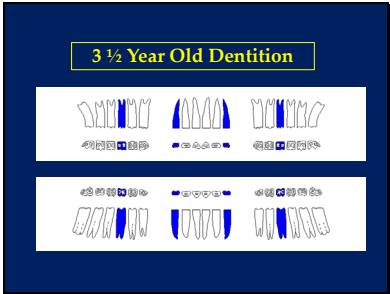
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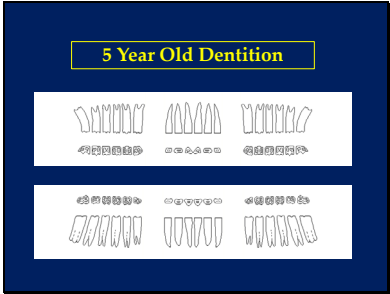
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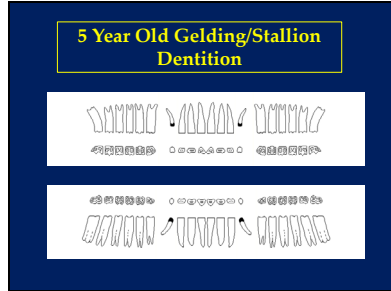
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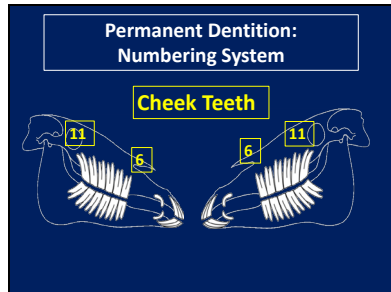
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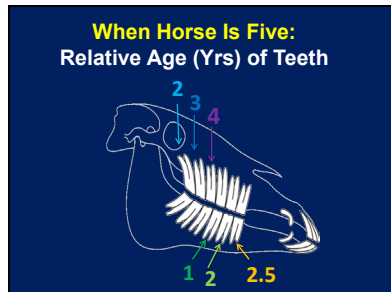
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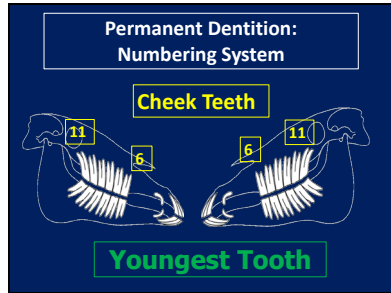
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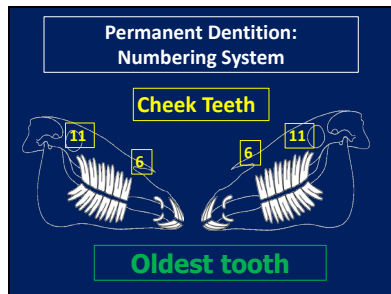
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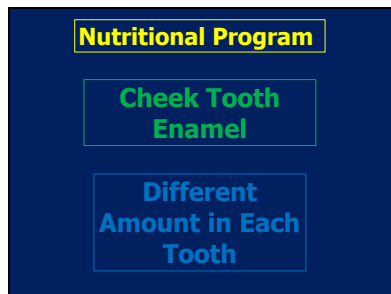
Slide 79



Slide 80



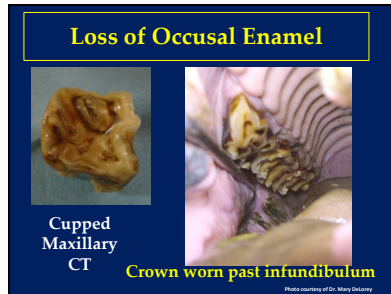
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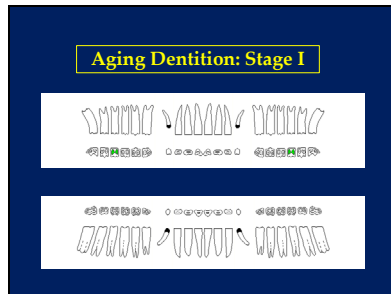
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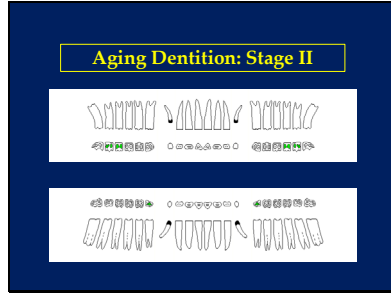
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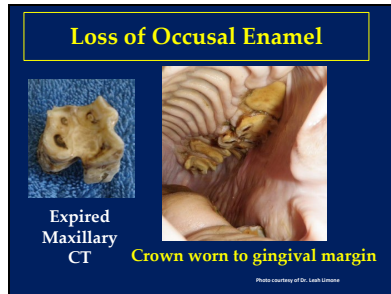
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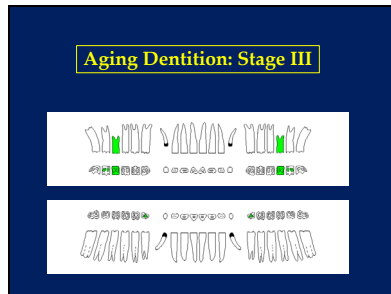
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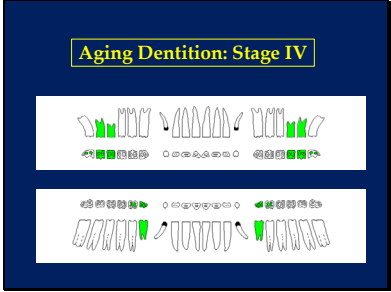
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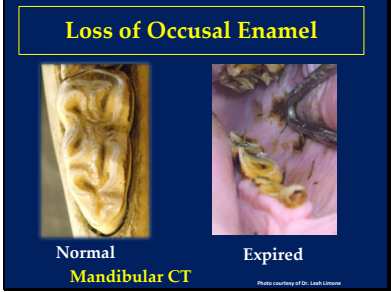
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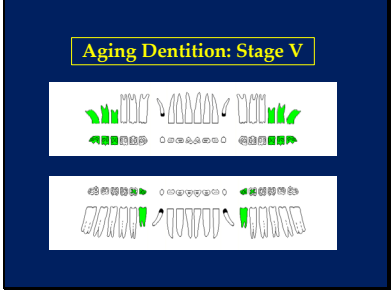
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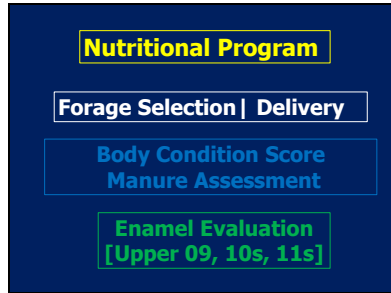
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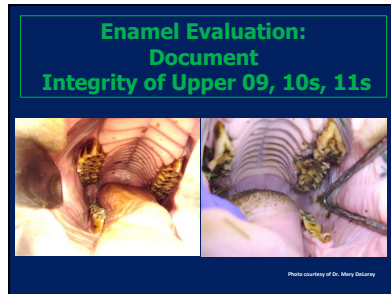
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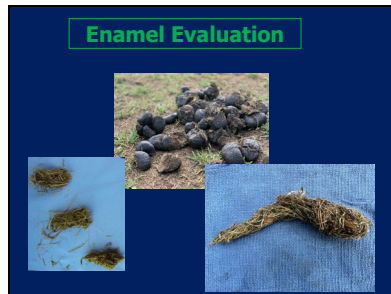
Slide 91



Slide 92



Slide 93

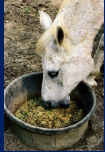


Slide 94

Enamel Evaluation

Proactive Plan to transition away from long stem hay

Weight Loss



Choke

Impaction
