Module # 1 ~ Component # 4

Reptile Questions
Class Reptilia

**QUESTION 1**
Re-draw and complete the following table to correctly associate the species of Chelonian with the appropriate habitat.

<table>
<thead>
<tr>
<th>HABITAT</th>
<th>SPECIES</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mozambique channel</td>
<td>?</td>
</tr>
<tr>
<td>?</td>
<td>Helmeted terrapin</td>
</tr>
<tr>
<td>?</td>
<td>Leopard tortoise</td>
</tr>
</tbody>
</table>

**QUESTION 2**
How can the bursa of terrestrial chelonia be used in self defence? (2)

**QUESTION 3**
(True / False). Tortoises are all complete vegetarians. (1)

**QUESTION 4**
Name two lizard families whose members do not exhibit autotomy. (2)

**QUESTION 5**
(True / False). All reptiles have movable eyelids. (1)

**QUESTION 6**
Define ectothermy. (2)

**QUESTION 7**
Re-draw and complete the following Table.

<table>
<thead>
<tr>
<th>Venom Type</th>
<th>Dentition</th>
<th>Species</th>
<th>Venom Effect</th>
</tr>
</thead>
<tbody>
<tr>
<td>?</td>
<td>Rear fanged</td>
<td>Boomslang</td>
<td>?</td>
</tr>
<tr>
<td>?</td>
<td>Fixed Front fanged</td>
<td>?</td>
<td>Nerve damage</td>
</tr>
<tr>
<td>?</td>
<td>?</td>
<td>African python</td>
<td>?</td>
</tr>
<tr>
<td>Cytotoxic</td>
<td>Hinged front fanged</td>
<td>?</td>
<td>?</td>
</tr>
</tbody>
</table>

**QUESTION 8**
(True / False). Crocodiles are sexually dimorphic. (1)

**QUESTION 9**
(True / False). All crocodile species are entirely freshwater specific. (1)
QUESTION 10
How does temperature impact crocodile reproduction?  (3)

QUESTION 11
Why are Turtles, Tortoises and Terrapins grouped separately? Explain  (2)

QUESTION 12
Name the three different types of venom found in snakes and provide a common name example of a snake that uses each type. (6)

QUESTION 13
Which abiotic factor is the most significant in the reproductive strategy of the Nile Crocodile? What is its influence? (4)

QUESTION 14
Lizards are ectothermic. What does this mean? Explain how this influences their day to day activities. (2)

QUESTION 15
The Chelonia (tortoises, turtles and terrapins) are differentiated from other reptiles by five taxonomic specific characteristics. Name them. (5)

QUESTION 16
Name the member from the Order Squamata that is able to adapt its own colouration to that of its immediate environment. (1)

QUESTION 17
Snakes can be roughly classified into four groups according to their dentition. Name these four groups and indicate the one group which is non-venomous. (5)

QUESTION 18
Differentiate crocodiles from alligators on external morphology. (3)

QUESTION 19
Why are Turtles, Tortoises and Terrapins grouped separately? (3)

QUESTION 20
Describe the peculiar anatomical structure of chelonia that is unique in the Animal Kingdom. (2)
QUESTION 21
Which member from the **Order Squamata** has the ability to adapt its **colouration** to that of its immediate surroundings? (1)

QUESTION 22
Describe **autotomy** including its **function**. (3)

QUESTION 23
Name the three different types of **venom** found in snakes and provide a common name **example** of a snake that uses each type. (6)

QUESTION 24
(True / False). Snakes such as the python kill their prey by constriction or strangulation, and therefore do not have teeth. (1)

QUESTION 25
Name the additional 'sense' that pit vipers, boas and pythons possess to compensate for **poor sight** and **lack of hearing**. (2)

QUESTION 26
How many species of **crocodile** are found on the **African continent**? (1)

QUESTION 27
What type of **mouth parts** are found on all **terrapins**? (2)

QUESTION 28
Name the three different types of **venom** found in snakes. (3)

QUESTION 29
Name a method other than venom that certain snake species use in **prey capture**. Give a common name example to substantiate your answer. (2)

QUESTION 30
Which **abiotic factor** is the most significant in the **reproductive strategy** of the Nile Crocodile? (1)

QUESTION 31
To which **Phylum**, **Class** and **Order** do **chameleons** belong? (3)

QUESTION 32
Which type of animal exhibits **Autotomy**? Of what is this **function** comprised? Why is it done? (5)
**QUESTION 33**
Name the type of mouthpart exhibited by all chelonia.  

**QUESTION 34**
Match the following three types of Chelonia with their correct habitat

a) The Vaal dam  
b) The Roodepoort Botanical Gardens  
c) Rock − tail bay

Chelonia = Tortoises, Turtles, Terrapins

**QUESTION 35**
Explain the correlation between incubation, gender determination and temperature in terrestrial chelonians.

**QUESTION 36**
Terrapins are said to be ‘ectothermic’. What does this imply?

**QUESTION 37**
Describe ‘autotomy’ in geckos.

**QUESTION 38**
Chameleons have a prehensile tail. What does this enable them to do?

**QUESTION 39**
Name the two types of reproduction exhibited by lizard species.

**QUESTION 40**
Name the two venomous species of Squamata.

**QUESTION 41**
(True / False). Snakes are really just highly specialized limbless amphibians.

**QUESTION 42**
What percentage of snakes world-wide are venomous?

**QUESTION 43**
(True / False). Most snakes have colour vision.

**QUESTION 44**
From which common feature in snakes is venom derived?
**QUESTION 45**
Explain the term ‘ovo-viviparity’ as its relates to certain snake species.  

(2)

**QUESTION 46**
Explain the effect for each of the following venom types and provide a common name example of a snake that uses each type.

- a) Neurotoxic
- b) Haemotoxic
- c) Cytotoxic  

(9)

**QUESTION 47**
Crocodiles are said to be ‘riparian’. Explain this term.  

(2)

**QUESTION 48**
Why can’t crocodiles prevent water from entering their mouths? How do they then prevent their own drowning while submerged?  

(5)

**QUESTION 49**
What are the maximum size dimensions (length and weight) attainable by our endemic species of crocodile?  

(2)

**QUESTION 50**
Name one natural predator of the adult crocodile.  

(1)

**QUESTION 51**
(True / False). Cryptodira described a tortoise that has side – necked, neck retraction system.  

(1)

**QUESTION 52**
Terrapins are classified as ectothermic reptiles. Define this term and explain how this type of physiology influences its daily activities.  

(4)

**QUESTION 53**
Into what kind of state would the leopard tortoise enter if its core body temperature dropped below 10º C?  

(2)

**QUESTION 54**
Name three threats to South African chelonia.  

(3)

**QUESTION 55**
(True / False). The left lung in many lizards is absent.  

(1)
QUESTION 56
List five types of defensive behaviour shown by various lizard species. (5)

QUESTION 57
Using common names, list any four of the eight families of lizard endemic to Southern Africa. (4)

QUESTION 58
Southern African snakes can be grouped according to their dentition. Name these different groups providing a common name example of an endemic species for each group. (8)

QUESTION 59
Which snake species has the ability to change its colour? (1)

QUESTION 60
A snake's olfactory ability is its most developed sense. Briefly explain how this is accomplished. (3)

QUESTION 61
From which common feature in snakes is venom derived? (1)

QUESTION 62
List three types of locomotion commonly used by snakes. (3)

QUESTION 63
Describe two distinct behaviourisms exhibited by snakes that are classified as warning signs. (4)

QUESTION 64
Which abiotic factor is the most significant in the reproductive strategy of the Nile crocodile? What is its influence? (4)

QUESTION 65
Explain the parental care shown by female crocodiles. (6)

QUESTION 66
Correlate the temperature during incubation of chelonia eggs with the gender of the hatchlings. (4)

QUESTION 67
Name five of the six families of chelonia recognised in South Africa. (5)
QUESTION 68
Instead of teeth, all turtles, tortoises and terrapins have a .......... (1)

QUESTION 69
Name the Order given to lizards (1)

QUESTION 70
(True / False). The Majority of lizards do not exhibit Autotomy. (1)

QUESTION 71
Describe four characteristics of chameleons. (4)

QUESTION 72
Define ectothermy. (3)

QUESTION 73
Which of the following species is non-venomous? The Mexican bearded lizard, the Komodo dragon or the Gila monster. (1)

QUESTION 74
List five characteristics of snakes that differentiates them from other reptiles. (5)

QUESTION 75
Re-draw the following table to include the missing information.

<table>
<thead>
<tr>
<th>Venom Type</th>
<th>Dentition</th>
<th>Venom effect</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Cytotoxic</td>
<td>?</td>
<td>Local tissue damage</td>
<td>Puff adder</td>
</tr>
<tr>
<td></td>
<td>?</td>
<td>Rear fanged</td>
<td>Blood complications</td>
</tr>
<tr>
<td></td>
<td>?</td>
<td>Fixed front fanged</td>
<td>Cobra</td>
</tr>
<tr>
<td>Non-venomous</td>
<td>?</td>
<td>n/a</td>
<td></td>
</tr>
</tbody>
</table>

(7)

QUESTION 76
What colour are black mambas? (1)

QUESTION 77
Which is the largest venomous snake world-wide? (1)

QUESTION 78
Which is the largest non-venomous snake world-wide? (1)

QUESTION 79
Describe what is meant by ovo-viviparous reproduction (3)
QUESTION 80
(True / False). Venomous snakes are NEVER without a set of functional fangs. (1)

QUESTION 81
By approximately how many years do snakes predate the origin of mammals?

a) 35 thousand years
b) 350 thousand years
c) 3½ million years
d) 35 million years
e) 350 million years (1)

QUESTION 82
Name the three families of crocodile found world-wide. (3)

QUESTION 83
When looking at each of the animals named above, to which distinctive feature would you look at to determine which of the three is a crocodile? (2)

QUESTION 84
Describe a crocodile hunting and killing an impala. (5)

QUESTION 85
(True / False). Chelonii means shield reptile. (1)

QUESTION 86
From where is the word “terrapin” derived? (2)

QUESTION 87
(True / False). Land tortoises can be accurately aged by counting their shell growth rings. (1)

QUESTION 88
Name three threats to the survival of tortoises, terrapins and turtles. (3)

QUESTION 89
Provide the scientific names for the upper and lower portions of a tortoise shell. (2)

QUESTION 90
Name a Family of marine chelonia. (1)

QUESTION 91
Describe the sense of smell exhibited by monitor lizards. (3)
QUESTION 92
Which lizard has a prehensile tail? (1)

QUESTION 93
Lizards display two types of reproduction. Differentiate oviparity from ooviviparity. (4)

QUESTION 94
Using common names, name four lizard Families endemic to Southern Africa. (4 x ½ = 2)

QUESTION 95
Re-draw and complete the following table to correctly associate dentition in snakes with a relevant example

<table>
<thead>
<tr>
<th>Tooth Type</th>
<th>Common name Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>Rear fanged</td>
<td>Mole snake</td>
</tr>
<tr>
<td>Hinged front fanged</td>
<td>Cape cobra</td>
</tr>
</tbody>
</table>

(4)

QUESTION 96
Give the common name of a marine snake. (1)

QUESTION 97
Describe heat sensing organs. Provide a common name example of a species that possesses them. (4)

QUESTION 98
What is an egg-tooth? Where would you find one? What is its purpose? (3)

QUESTION 99
Provide two snake examples for each of the following venom types:

a) Neurotoxic (affects the nervous system)
b) Haemotoxic (affects the blood system)
c) Cytotoxic (local tissue damage) (6 x ½ = 3)

QUESTION 100
List four characteristic common to all crocodiles (4)

QUESTION 101
Describe colouration in Nile crocodiles. (2)
QUESTION 102
(True / False). Crocodiles hibernate. (1)

QUESTION 103
What are the two leading causes of death resulting from crocodile attacks. (2)

QUESTION 104
Yes / No). Due to the fact that crocodile consider man a natural prey species, more people are killed by crocodile attack, in Africa, than by any other wild species. (1)

QUESTION 105
State whether the following characteristics attributed to Order Chelonia are: True or False

a) Their limbs end with claws
b) None have moveable eyelids
c) None have external ear openings
d) All have a hard shell
e) Some have teeth
f) All are oviparous

QUESTION 106
Describe the relationship between temperature and gender determination in the leatherback turtle. (6)

QUESTION 107
Some lizard tails are termed prehensile and some autotomous. Describe these terms providing a common name species example of each. (6)

QUESTION 108
Provide the name of either the largest or the smallest extant lizard species. (1)

QUESTION 109
What is unusual about the copulatory organ of male lizards? (2)

QUESTION 110
(True / False). All lizards hibernate at some stage during the year irrespective of habitat. (1)

QUESTION 111
There are 160 snake species in Southern Africa. How many are capable of inflicting a potentially fatal bite? (1)
QUESTION 112
List four characteristics of snakes that differentiates them from other reptiles.

(4)

QUESTION 113
You are guiding a group of tourists through the bush. One of the guests is bitten by a green mamba, one by a boomslang and another by a puff adder. Describe the symptoms experienced by each of these unfortunate guests.

(3 x 3 = 9)

QUESTION 114
Not that it is always advocated; would it have been possible for your unfortunate guests in the above question to have outrun all the snake species listed?

(1)

QUESTION 115
Explain the term slough as it pertains to snakes.

(2)

QUESTION 116
Describe the phenomenon of ovo-viviparity in the puff adder.

(4)

QUESTION 117
Identify the type of animal (not the species) in the diagram below. Explain how you made your identification.

(4)

QUESTION 118
Why don’t crocodiles drown when submerged underwater?

(3)

QUESTION 119
Answer Yes or No to the following questions:

a) Crocodiles are basically just very large lizards
b) Crocodiles make up one of the “big five”
c) Crocodiles are the longest reptile species in the world
d) Crocodiles are only found on the African continent
e) Crocodiles are only found in fresh water.

(5)
QUESTION 120
Tortoises, terrapins and turtles are classified in the Order Chelonii.
What does “Chelonii” refer to?  

QUESTION 121
Redraw and complete the following table matching the species with its correct habitat.

<table>
<thead>
<tr>
<th>Habitat</th>
<th>Species</th>
</tr>
</thead>
<tbody>
<tr>
<td>Kruger National Park</td>
<td>?</td>
</tr>
<tr>
<td>Rocktail bay</td>
<td>?</td>
</tr>
<tr>
<td>Hartebeestpoort dam</td>
<td>?</td>
</tr>
</tbody>
</table>

- Leather backed turtle
- Mountain leopard tortoise
- Marsh terrapin

QUESTION 122
Which characteristic does tortoises share with birds?  

QUESTION 123
Where will adult female loggerhead turtles lay their eggs if given the opportunity?  

QUESTION 124
Redraw the following table to associate chelonia with their dominant feeding preference.

<table>
<thead>
<tr>
<th>Group</th>
<th>Dominant Feeding Category</th>
</tr>
</thead>
<tbody>
<tr>
<td>Turtles</td>
<td></td>
</tr>
<tr>
<td>Terrapin</td>
<td></td>
</tr>
<tr>
<td>Tortoise</td>
<td></td>
</tr>
</tbody>
</table>

- Omnivorous
- Herbivorous
- Carnivorous

QUESTION 125
Name 3 reasons why lizards may change their colouration.  

QUESTION 126
Why are the exoskeleton of prey species visible in the faecal pellets of lizards?  

QUESTION 127
Which lizard group have rearward facing nostrils as an adaptation to a burrowing lifestyle?  

QUESTION 128
The tail of chameleons are .................., but not ..................
QUESTION 129
What is the **preferred temperature range** for most diurnal lizards? (2)

QUESTION 130
Redraw and complete the following table to include the missing information.

<table>
<thead>
<tr>
<th>Venom Type</th>
<th>Dentition</th>
<th>Venom Effect [2 marks]</th>
<th>Example</th>
</tr>
</thead>
<tbody>
<tr>
<td>?</td>
<td>Rear fanged</td>
<td>?</td>
<td>Puff Adder</td>
</tr>
<tr>
<td>?</td>
<td>Fixed front fanged</td>
<td>Affects the nervous system</td>
<td>?</td>
</tr>
<tr>
<td>Non-venomous</td>
<td>?</td>
<td>N/A</td>
<td>?</td>
</tr>
</tbody>
</table>

(12)

QUESTION 131
Which is the **most developed sense** in most snakes? (1)

QUESTION 132
(True / False). Certain snake species are able to differentiate colour. (1)

QUESTION 133
How do snakes **prevent suffocation** to themselves when swallowing large prey victims? (2)

QUESTION 134
What **causes the death of mammals** that become prey species for non-venomous snakes? (1)

QUESTION 135
List **5 forms of locomotion** displayed by snakes. (5)

QUESTION 136
Name **3 cobra species** endemic to *Southern Africa*. (3)

QUESTION 137
List the **3 crocodile families** that occur world-wide. (3)

QUESTION 138
What is the **main cause of death** due to crocodile attack?

  a) Blood loss
  b) Dismemberment
  c) Drowning
  d) Suffocation
  e) Being ripped to pieces (1)
QUESTION 139
Crocodiles are Ectothermic / Endothermic (1)

QUESTION 140
Compare the influence of temperature on the sexual determination of hatchlings between crocodiles and tortoises. (4)

QUESTION 141
(True / False). Crocodile attacks account for more deaths on the African continent than any other animal. (1)

QUESTION 142
There are two methods of neck retraction used by chelonians. Name the two groups that use the different methods and give a brief description of each method. (6)

QUESTION 143
Name any four families of Chelonia in Southern Africa. (4)

QUESTION 144
Redraw the following table and arrange in the correct order.

<table>
<thead>
<tr>
<th>FAMILY</th>
<th>CHARACTERISTIC</th>
<th>PREFERRED PREY</th>
</tr>
</thead>
<tbody>
<tr>
<td>Tropical worm Lizards</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Agamas</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Monitors</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

(6)

QUESTION 145
What does the term hemipenes refer to? (1)

QUESTION 146
Name two venomous lizards. (2)
**QUESTION 147**
(True / False). Chameleons display autotomy. (1)

**QUESTION 148**
(True / False). Rear fanged snakes are always non-venomous. (1)

**QUESTION 149**
List the four groups of snakes according to their dentition. (4)

**QUESTION 150**
In table form:

| a) name the **three types** of snake venom |
| b) give a brief description of the **effects** of each venom type |
| c) describe the **symptoms** exhibited by victims of each venom type |
| d) provide a **common name example** of a snake for each venom type |

(4 x 3 = 12)

**QUESTION 151**
(True / False). Not all vipers have large hinged fangs in the front of their mouths. (1)

**QUESTION 152**
Snakes essentially all hatch from eggs, name the two types of incubation that occurs before the young snakes take their first breath? Associate each incubation type with a common name example. (4)

**QUESTION 153**
Describe hibernation in snakes. (3)

**QUESTION 154**
Describe the characteristic that distinguishes crocodiles from alligators. (3)

**QUESTION 155**
Which part of the anatomy saves the crocodile from drowning when opening its mouth underwater? (2)

**QUESTION 156**
With reference to dentition and method of feeding, describe briefly how a crocodile disposes of its prey once it has been caught. (5)

**QUESTION 157**
Why are Turtles, Tortoises and Terrapins grouped **separately**? (3)

**QUESTION 158**
Describe the **peculiar anatomical structure** of chelonia that is **unique** in the Animal Kingdom. (2)
| QUESTION 159 | Name three threats to South African Chelonia | (3) |
| QUESTION 160 | Terrapins are said to be ectothermic. What does this mean? | (2) |
| QUESTION 161 | Which member from the **Order Squamata** has the ability to adapt its **colouration** to that of its immediate surroundings? | (1) |
| QUESTION 162 | Describe **autotomy** including its **function**. | (3) |
| QUESTION 163 | Chameleons have a prehensile tail. What does this enable them to do? | (2) |
| QUESTION 164 | List two types of defensive behaviour exhibited by various lizard species | (2) |
| QUESTION 165 | List any two of the eight Southern African lizard families | (2) |
| QUESTION 166 | Name the **three** different types of **venom** found in snakes and provide a common name example of a snake that uses each type. | (6) |
| QUESTION 167 | **(True / False)**. Snakes such as the python kill their prey by constriction or strangulation, and therefore do not have teeth. | (1) |
| QUESTION 168 | Name the additional 'sense' that pit vipers, boas and pythons possess to compensate them for **poor sight** and **lack of hearing**. | (2) |
| QUESTION 169 | Name South Africa’s most venomous snake | (1) |
| QUESTION 170 | Snakes can be roughly classified into four groups according to their dentition. Name these four groups and indicate the one group which is non-venomous. | (5) |
| QUESTION 171 | How many species of **crocodile** are found on the **African continent**? | (1) |
QUESTION 172
Which abiotic factor is the most significant in the reproductive strategy of the Nile crocodile? What is its influence? (4)

QUESTION 173
Why can’t crocodiles prevent water from entering their mouths? How do they then prevent their own drowning while submerged? (4)

QUESTION 174
Name one predator of the adult crocodile. (1)

QUESTION 175
Differentiate turtles from terrapins from tortoises. (3)

QUESTION 176
Which morphological characteristic do chelonia share with birds? (1)

QUESTION 177
(True / False). The diet of the Leatherback turtle is exceptionally varied consisting of fish, crustaceans, seaweed and jellyfish. (1)

QUESTION 178
What occurs during autotomy, what is its function? (2)

QUESTION 179
(True / False). The chameleons are the only lizards with the ability to change colour. (1)

QUESTION 180
Provide the common name for two venomous lizards. (2)

QUESTION 181
Re-draw and complete the following Table.

<table>
<thead>
<tr>
<th>Venom Type</th>
<th>Species</th>
<th>Effect</th>
</tr>
</thead>
<tbody>
<tr>
<td>?</td>
<td>Puff adder</td>
<td>?</td>
</tr>
<tr>
<td>Neurotoxic</td>
<td>?</td>
<td>?</td>
</tr>
<tr>
<td>?</td>
<td>Boomslang</td>
<td>Venous system damage</td>
</tr>
</tbody>
</table>

QUESTION 182
Snakes can move in four ways, name them. (4)
QUESTION 183
(True / False). On careful examination, a snake's 'ears openings’ can be found. (1)

QUESTION 184
List three crocodile predators. (3)

QUESTION 185
What is the maximum length and weight attainable by Nile crocodiles? (2)

QUESTION 186
Why are Turtles, Tortoises and Terrapins grouped separately? Explain (2)

QUESTION 187
Name the three different types of venom found in snakes and provide a common name example of a snake that uses each type. (6)

QUESTION 188
Which abiotic factor is the most significant in the reproductive strategy of the Nile Crocodile? What is its influence? (4)

QUESTION 189
Lizards are ectothermic. What does this mean? (2)

QUESTION 190
Explain how this influences their day to day activities. (2)