Lighting – The Basics Created by: Viki Calhoun, RVT

Always read the packaging of any light source being used and know what type of light is being produced. Reptiles should be provided with both UVA and UVB rays; different types of bulbs may produce both types, only one, or none at all. It is also important to know how much, if any, heat is being produced, as this can impact how much additional heat support may be needed.

The best source of UV rays is direct sunlight, so allow your pet to spend some time outside when the temperature allows (do not leave them outside unattended).

• Never place the enclosure near a window – the glass will filter out the UV rays and the enclosure can become overheated.

Most species require 12 hours of light per day (providing both UVA and UVB), but always check the requirements for your specific animal. Lights can be plugged into timers to help keep them on a regular schedule.

• Heat support is still required at night, so ceramic heat emitting bulbs (no light produced) are recommended (red/black "nighttime" lights are not recommended).

UVB Lighting

This is needed for the animal to synthesis vitamin D, which they need to properly absorb any calcium they are receiving in their diet.

Different types of bulbs produce UVB waves in different ways and amounts. Knowing this will help determine the best way to position the light:

- Mercury vapor and metal halide bulbs produce high heat and project the waves a further distance.
- Fluorescent lights produce low heat and project waves a shorter distance.
- LED lights do not typically produce UVB.

Glass or plastic coverings will block UVB rays, so it is best to use a mesh cover for the enclosure.

UVB bulbs will stop producing UVB rays before they burn out and stop producing light. Because of this, they must be replaced regularly. Most are good for 6 months, but always check the manufacturer's guidelines for the most accurate information.

• There are UVB measuring devices that can check whether a light is still emitting enough, or if needs replaced.

Typically, a hatchling or juvenile requires a 10.0 UVB bulb, and an adult requires a 5.0.

UVA Lighting

This is needed to stimulate a proper photoperiod (day/night cycle) for the animal.

UVA is not typically found in LED lighting and may be limited in basking lights.

Lights that are too powerful can cause trauma – it is safer to use multiple lower watt bulbs versus one high watt bulb