

بِسْمِ اللَّهِ الرَّحْمَنِ الرَّحِيمِ



LOUISH.com



# LEARNING OBJECTIVES

- Define thanatology.
- Define death.
- Describe stages of death.
- Describe medico legal importance of stages of death.
- Define mode of death.
- Describe different modes of death.

# THNATOLOGY

- Thanatology is the scientific study of phenomena and practices relating to death.
- The medico legal study of death is called forensic thanatology.
- The onset of death ends life and makes the personality extinct.
- Life depends upon the integration of three vital systems namely respiration circulation and innervations also called tripod of life.

*thanatology*

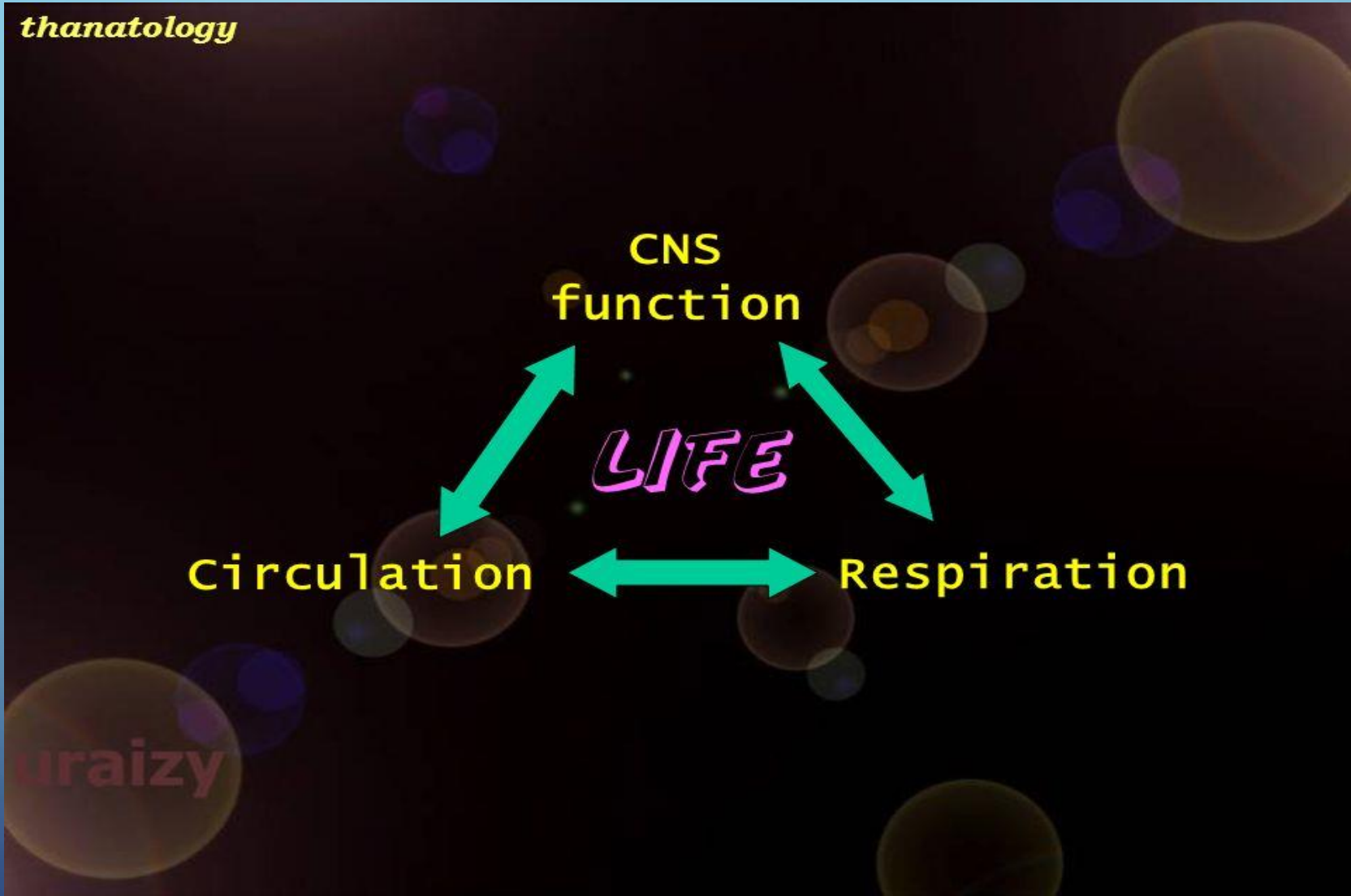
CNS  
function

*LIFE*

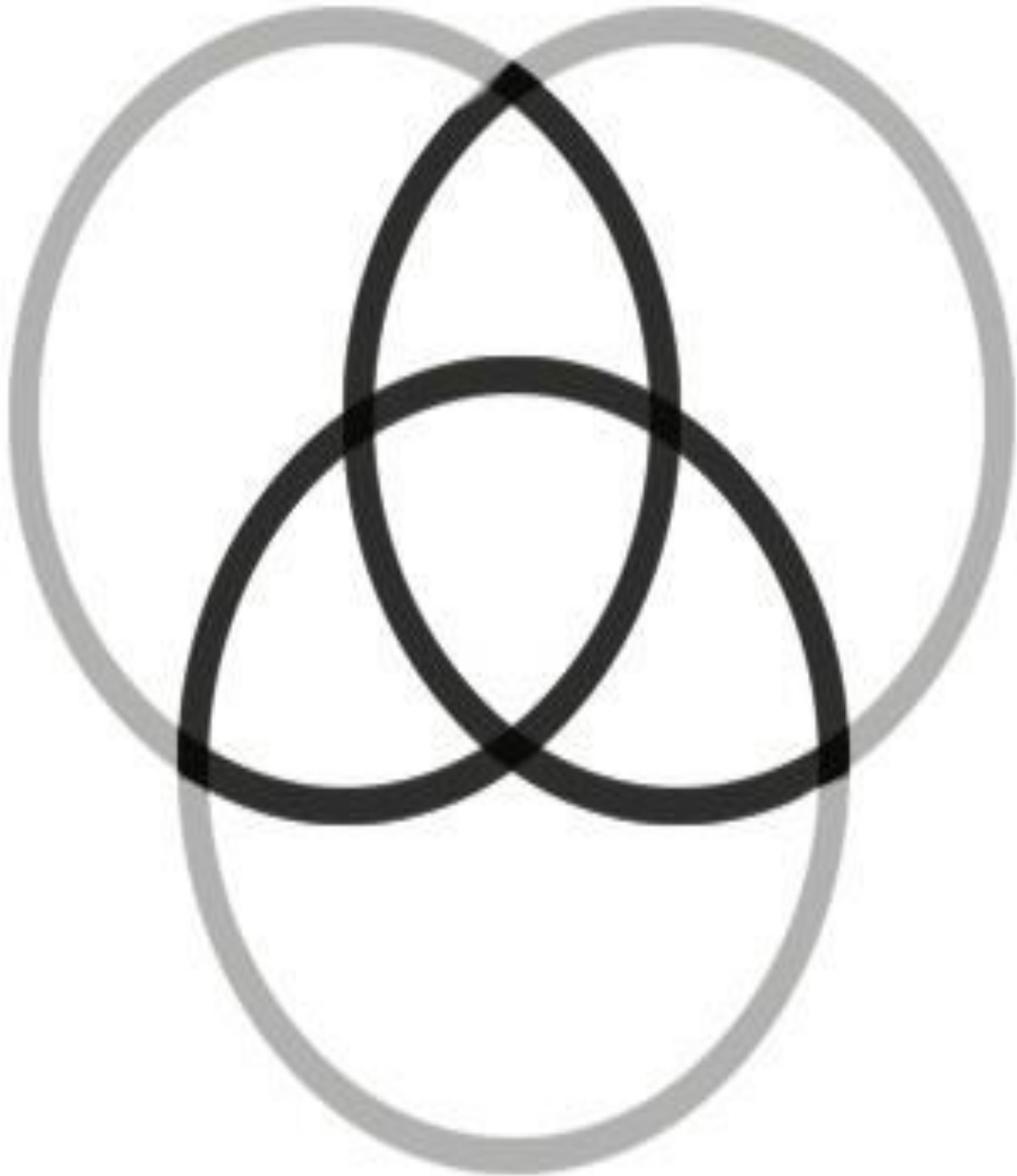
Circulation

Respiration

*uraizy*







# Tripod of death

DEATH

~~respiration~~

~~circulation~~

~~CNS function~~

uraizy















# MEDICOLEGAL IMPORTANCE OF STAGES OF DEATH

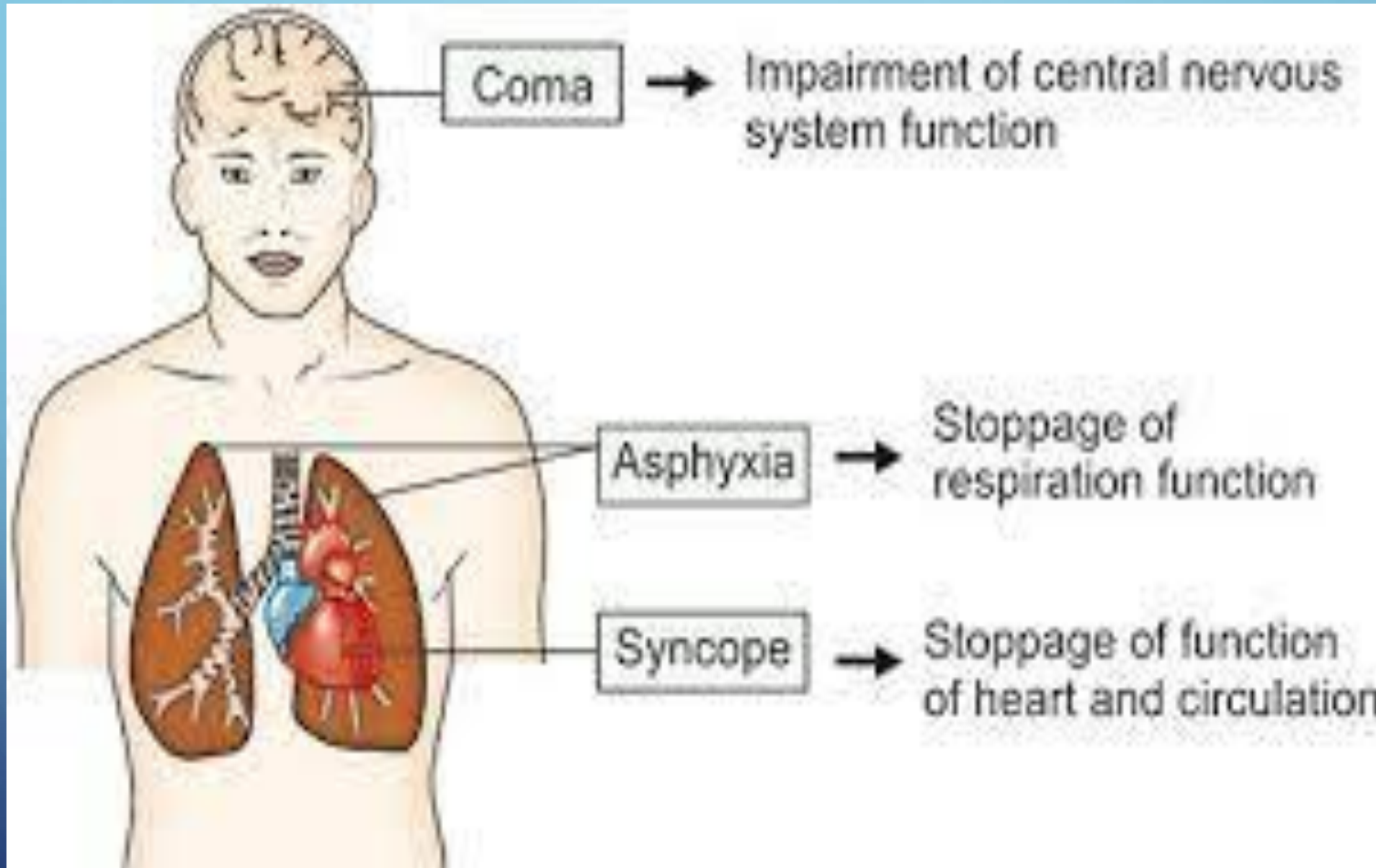
- The distinction between somatic and molecular death is important for two reasons
  - Disposal of the body and
  - Transplantation.





- **TRANSPLANTATION:** the viability of transplantable organs falls sharply after somatic death. A liver must be taken within 15 minutes a kidney within 45 minutes and a heart within an hour.
- A person whose brain may have been injured irreversibly can now be kept alive by maintaining circulation of oxygenated blood to the brain stem by artificial means.
- Such a patient, after appropriate brain stem reflex testing can be declared dead legally, and organs required for transplantation can be removed.





# COMA

failure of function of brain and irreversible damage to its vital centers

- **CAUSES :**

- Raised Intracranial Pressure, due to injuries to or diseases of brain and meninges
- Poisons such as opioids and alcohol 3.
- Metabolic disorders like Uremia

- **POST MORTEM FINDINGS :-** edema and congestion of brain and membranes

# SYNCOPE

- Death due to failure of function of heart resulting in decrease flow of blood to brain and leading to hypoxia of brain.
- **CAUSES:**
  - Heart diseases
  - Diseases of blood
  - Hemorrhage
  - Poisoning due to digitalis, aconite, potassium.
- **POSTMORTEM FINDINGS:-** Viscera appear pale and capillaries appear congested.

- A syncopal type of death may result from reflex cardiac inhibition due to
  - Vagal stimulation
  - Ventricular fibrillation due to cardiac problems or spontaneous sympathetic discharge.
- **POSTMORTEM FINDINGS:** non specific

# ASPHYXIA

Death due to failure of respiratory system.

- CAUSES

- Lung diseases e.g pneumonia

Paralysis of respiratory centers as in Opioid poisoning

- Breathing of irrespirable gases
- Traumatic asphyxia

- **POSTMORTEM FINDINGS:-** Cyanosis, petechial hemorrhages, visceral congestion, pronounced lividity and sometimes cardiac dilatation, injury mark on neck.

*Jazak-Allah khairan*  
(MAY ALLAH REWARD YOU WELL)