

Infanticide

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Apta-Vira-: Refer
to a female ,
capable of
performing sexual

Definition

The killing of the new-born infant with willful act of omission or act of commission by mother or relatives or any other person

Primary issues in Infanticide

- 1. The child was capable of survival after birth (degree of maturity).*
- 2. The child was born alive & had a separate existence outside the mother's body.*
- 3. The death was caused by willful act of commission or omission.*

Secondary issues in Infanticide

- 1. Probable duration of life of the child after Birth*
- 2. It may also be necessary to prove that the mother has recently delivered.*
- 3. Connection between the new-born infant & mother*

1. Probable duration of intra-uterine life of the child (Degree of maturity)

- 1. Intra-uterine Age of Neonate/
Fetus:- $> 210 \text{ day} = 30 \text{ week} = 7 \text{ month}$**
- 2. Weight of Neonate/Fetus:- $> 1.3 \text{ kg}$**
- 3. Crown-heel length of Neonate/
Fetus:- 35 cm (Haase's Rule)**

1. Probable duration of intra-uterine life of the child (Degree of maturity)

4. Centre of Ossification of bone:-

Intra-uterine age of Neonate/Fetus

a) 28th week- Calcaneum & Talus

b) 30th week- All Sacral Vertebra

c) 36th week- Lower end of Femur

1. Probable duration of intra-uterin life of the child (Degree of maturity)

- 5. Scalp Hair -: about 2.5 cm long**
- 6. Nails almost reaches the tip of finger.**
- 7. Left kidney in Scrotum & Right near external ring.**

*2. The child was born
alive & had a separate
existence outside the
mother's body.*

Difference between born alive & Dead born

| Sr. | Feature | <i>born alive</i> | <i>Dead born</i> |
|------------|------------------------------|---|---|
| 1 | Shape of Chest | Drum like | Flat |
| 2 | Position of Diaphragm | 6th – 7th Rib of level | 4th - 5th Rib of level |
| 3 | Volume of Lung | Large | Small |
| 4 | Margin of Lung | Rounded | Sharp |
| 5 | Pleura of Lung | Thin, Tense | Wrinkled loose |
| 6 | Consistency of Lung | Spongy, Elastic & Crepitate | Dense, Firm, Non-crepitate like liver |
| 7 | Colour of Lung | Marble like | Reddish-Brown like liver |
| 8 | Blood in Lung | Froathy | Little Froathless |
| 9 | Weight of Lung | 60 – 70 gm | 30 – 40 gm |
| 10 | Hydrostatic Test | Squeezed pieces of lung float on water | Squeezed pieces of lung sink in water |

Difference between born alive & Dead born

| Sr. | Feature | <i>born alive</i> | <i>Dead born</i> |
|-----|---|---|--|
| 11 | <i>Anatomical position of Thoracic Cavity</i> | <i>Occupies almost whole cavity</i> | Not Occupies almost whole cavity |
| 12 | <i>Vessels within Lung</i> | <i>Prominent with increased circulation</i> | Not Prominent & not increased circulation |
| 13 | <i>Alveoli</i> | <i>Expanded & rises above the surface</i> | Not So |
| 14 | <i>Microscopy</i> | <i>Alveolar sacs dilated & lined with flat cells, Vascularity Prominent</i> | Alveolar sacs closed & lined with columnar/cuboidal cell |
| 15 | <i>Air in Stomach & Intestine</i> | ++ | -- |
| 16 | <i>Milk/ Feed in Stomach</i> | ++ | -- |

Hydrostatic Test

- 1. Definition:-** *Squeezed pieces of lung float on water in infant in case of respired lungs (live born) & sink in water in infant in case of non-respired lungs (dead born) is c/as Hydrostatic Test.*
- 2. Principle:-** *Specific gravity of respired lungs (live born) is 0.94, while non-respired lungs (dead born) varies from 1.04 – 1.05 (Water:- 1.00)*

Hydrostatic Test

1. Procedure:-

- a) Remove the lungs along with trachea, by tying at the laryngeal end & place them in a jar water & note for their floatation.*
- b) The lungs are then separated & each is tested separated for presence or absence of floatation.*
- c) Then each pieces of lung tested for presence or absence of floatation.*
- d) Then Squeezed pieces of lung tested for presence or absence of floatation.*

False positive Hydrostatic Test

A] Expanded Lungs:-

- 1. Death due to Acute oedema of the lungs*
- 2. Death due to Aspiration Pneumonia*
- 3. Death due to Bronchopneumonia*

B] Non Expanded Lung:-

- 4. Atelectasis may be due to obstruction by alveolar duct membrane or due to extreme feeble respiration.*

False Negative Hydrostatic Test

- 1. Presence of putrefactive gases due putrefaction**
- 2. Artificial Respiration**

Hydrostatic Test is not necessary

- 1. The foetus is born before 180 days of gestation***
- 2. The foetus is a monster & thereby is capable of leading a separate existence***
- 3. The foetus shows signs of intra-uterine maceration.***
- 4. The umbilical cord has separated & the umbilicus has cicatrised.***
- 5. The stomach contains milk showing active digestive function***

3. The death was caused by willful act of commission or omission.

The death was caused by willful act of commission

- 1. Smothering*
- 2. Strangulation*
- 3. Drowning*
- 4. Head Injury*
- 5. Multiple Injury*
- 6. Poisoning*
- 7. Live Burial*

The death was caused by willful act of omission.

- 1. Omission to make the necessary preparation for the birth of the child (e.g. arrangement for medical aid)***
- 2. Omission to tie the cord after dividing it***
- 3. Omission to remove the child from the mother's discharge***
- 4. Omission to protect the child from exposure to cold or heat***
- 5. Omission to supply proper feeding***



Secondary issues in Infanticide

Probable duration of life of the child after Birth

1. Umbilical cord

| <i>Sr. no.</i> | <i>Feature</i> | <i>Duration</i> |
|-----------------------|---|---|
| <i>1</i> | <i>Dry & Shrinks</i> | <i>12 to 24 hrs</i> |
| <i>2</i> | <i>Inflammatory Ring (Redness)</i> | <i>36 to 48 hrs</i> |
| <i>3</i> | <i>Shrivels up</i> | <i>48 to 72 hrs</i> |
| <i>4</i> | <i>Mummifies & falls off</i> | <i>5th to 6th days</i> |
| <i>5</i> | <i>Heals & Cicatrizes</i> | <i>10th to 12th days</i> |

Probable duration of life of the child after Birth

2. Changes in Skin

| <i>Sr.no.</i> | <i>Feature</i> | <i>Duration</i> |
|----------------------|--|---------------------------|
| <i>1</i> | <i>Bright Red & covered with Vernix Caseosa</i> | <i>Newly born</i> |
| <i>2</i> | <i>Vernix Caseosa removed</i> | <i>1 to 2 days</i> |
| <i>3</i> | <i>Skin darken</i> | <i>2 to 3 days</i> |
| <i>4</i> | <i>Yellowish of Skin</i> | <i>3 to 6 days</i> |
| <i>5</i> | <i>Normal Skin</i> | <i>Within week</i> |

Probable duration of life of the child after Birth

3. Changes in Caput Succedaneum

| <i>Sr. no.</i> | <i>Feature</i> | <i>Duration</i> |
|-----------------------|--|----------------------------|
| <i>1</i> | <i>Oedematous Swelling of Scalp</i> | <i>Newly born</i> |
| <i>2</i> | <i>Caput Succedaneum disappear</i> | <i>After 24 hrs</i> |

Postmortem Appearance

1. External & 2. Internal

Postmortem Appearance:-1. External

Depends on Manner of Death of Infant

- 1. Clothing & Wrapping:-**
- 2. Measurements:- Weight + Crown-Heel length + Crown-Rump lengths + Head Circumference**
- 3. Changes of Decomposition:-**
- 4. Presence/Absence of Vernix Caseosa:-**
- 5. Umbilical Cord & Placenta:-**

Postmortem Appearance:-1. Internal

Depends on Manner of Death of Infant

- 1. Head :-**
- 2. Neck :-**
- 3. Thorax :-**
- 4. Abdomen :-**
- 5. Limbs & Sternum :- for Ossification centre.**



THANK YOU