Avian Vibrionic Hepatitis

- Probably not a clinical disease of chickens.
- Described as a chronic, contagious disease of laying hens in the 1960s. Occasionally seen in pullets.
- The organism is found in the gall bladder and a common gut inhabitant. It is an opportunist and secondary infection.
- This condition usually occurs concurrent with other problems such as internal parasites or “chronic” coccidiosis.
- Vibrios are commonly found in GI tract of poultry with no apparent disease.
Causative Agent

- Described as vibrio-like organisms (VLO) in the 1960s
- *Campylobacter jejuni* is microaerophilic, gram-negative, motile, comma or s-shaped rod.
- Usually identified by staining with methylene blue and observing for characteristic shape.
- May be cultured from gall bladders of normal chickens.
Method of Spread

Under natural conditions, fecal contamination.
Postmortem Lesions

- The gall bladder is usually about 2x and the bile is thick and tenacious.
- But, the gall bladder gets large when the bird has been off feed.
Postmortem Lesions (Cont.)

- Acute cases have been described with hemorrhages and necrosis of the liver.
Affected Liver

CASE NO. 622
10 Mo. Hens
Affected Liver

CASE NO. 61-149
Infectious Hepatitis
Diagnosis

- Positive – isolation and identification of causative agent.
- Difficult to culture special agars available.
Culture Method

**CULTURE METHODS**

*Campylobacter jejuni*

- Gall bladder (scrape mucosa)
- Blood agar
- Incubate - 48 hr. - 10% CO₂ tension
- Colonies are tan
- Oxidase (+) blue
- Gram (-); "s" shaped rods (chains)