

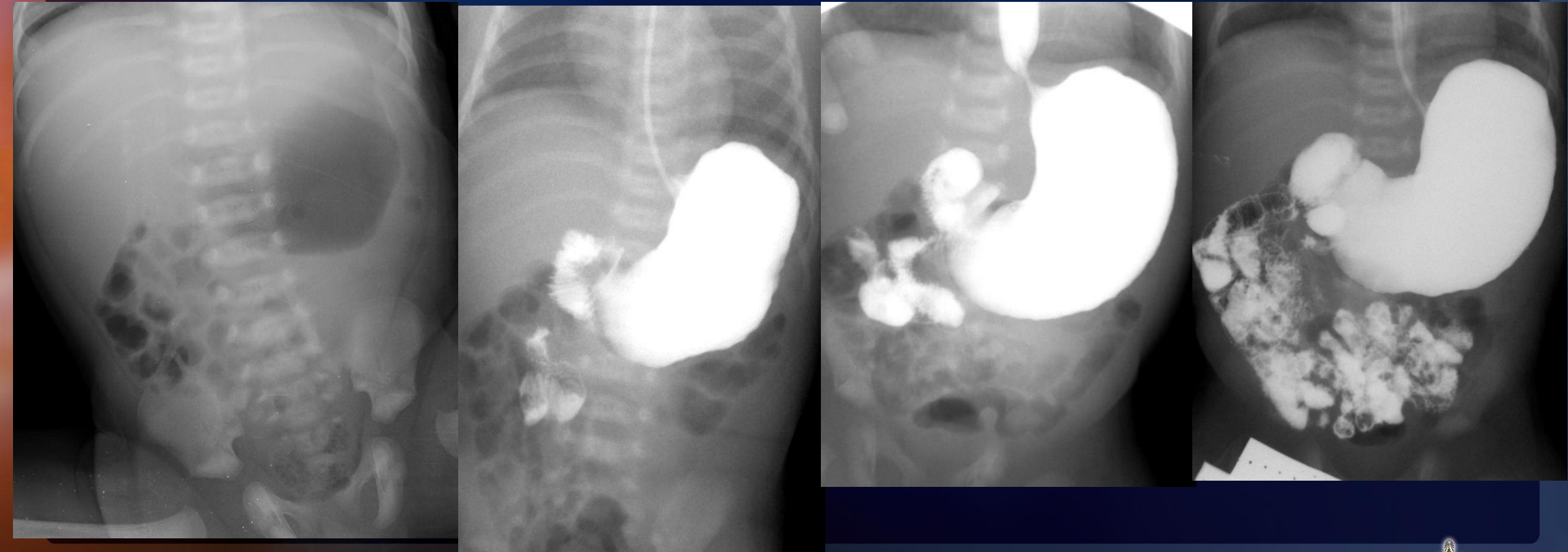
Case of the day : Case 5 - Ped

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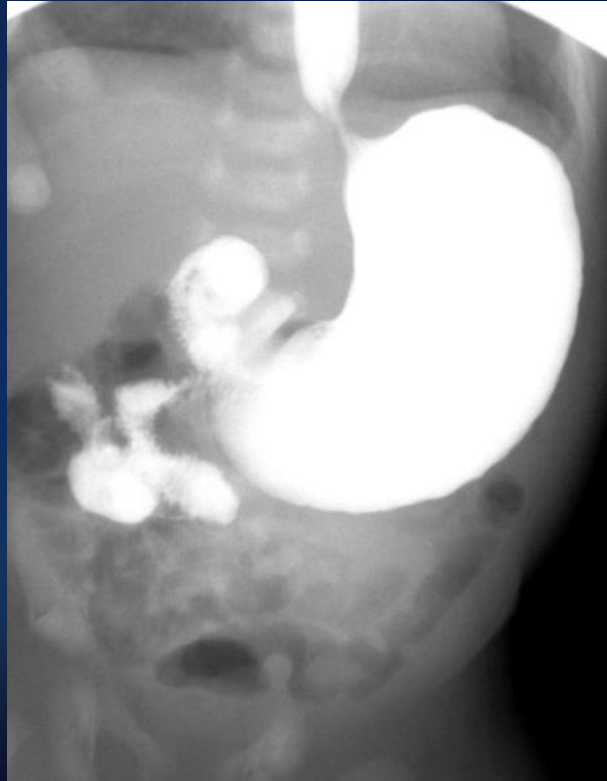
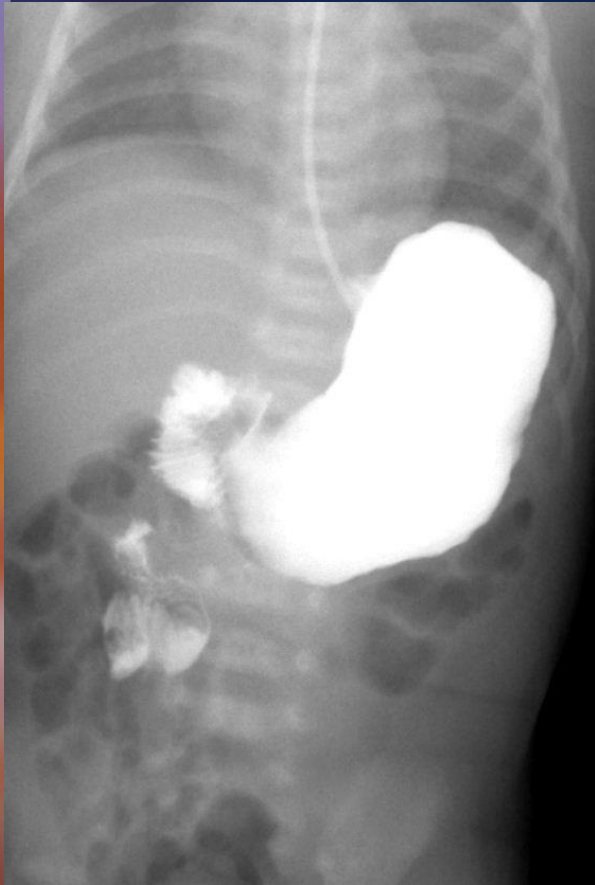


Case of the day: Ped

A 14-day old infant with feeding intolerance. US upper abdomen was unremarkable.



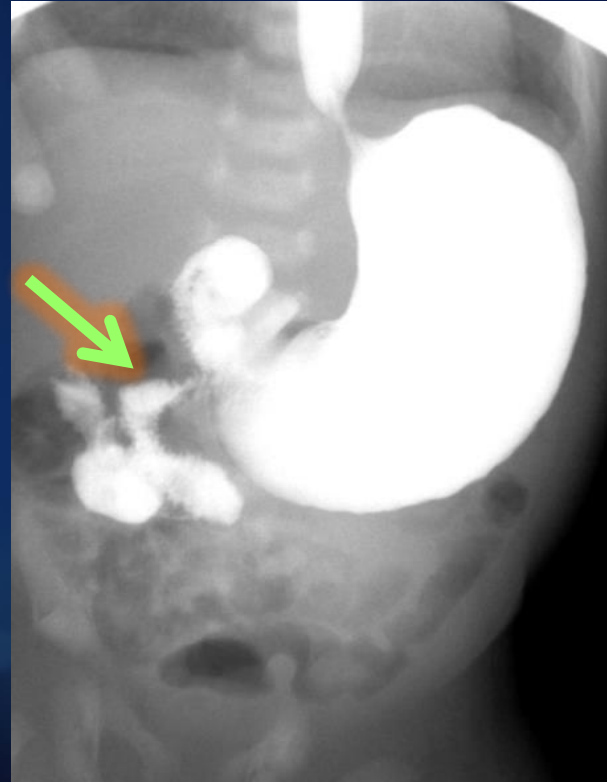
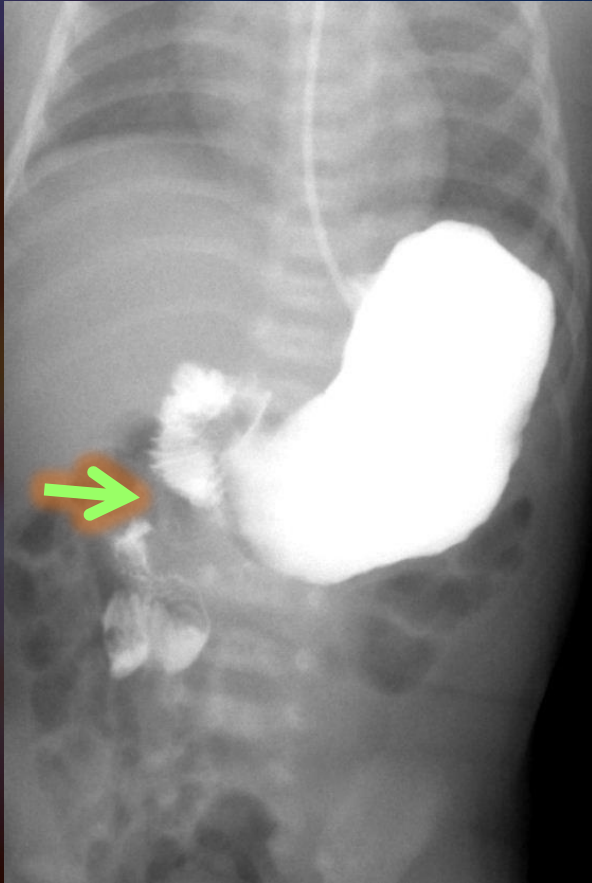
Case of the day: Ped



What is the most likely diagnosis?

- A. Normal
- B. Hypertrophic Pyloric stenosis.
- C. Redundant duodenum
- D. Midgut volvulus**
- E. Duodenal stenosis

FINDINGS



- a spiral twisting of the duodenum (classically described as a “corkscrew”) ←
- Partial obstruction of duodenum

Diagnosis

- Midgut volvulus



Key Points

Classic presentation:

- Infant with bilious vomiting
- Requires emergent upper GI

Diagnostic Checklist

- Complete obstruction at D2-D3 with beak considered midgut volvulus until proven otherwise
- Delayed diagnosis can lead to diffuse bowel necrosis or death



DIFFERENTIAL DIAGNOSIS

- **Malrotation With Obstructing Ladd (Peritoneal Fibrous) Bands**
 - May be completely obstructive with beaking, mimicking midgut volvulus (MV)
 - Cannot distinguish from MV fluoroscopically if corkscrew sign not seen
 - US could distinguish by showing target/swirl sign of MV
 - Must consider as tight MV & send for immediate surgical treatment
- **Duodenal stenosis or web**
 - Usually has transition to normal distal duodenum & normal DJJ
 - Can mimic MV fluoroscopically if corkscrew
- **REDUNDANT DUODENUM**
 - Duodenum may make several retroperitoneal loops prior to extending leftward across spine to normal DJJ
 - **No** duodenal dilation or obstruction



References

1. Caffey's Pediatric Diagnostic Imaging 12th Ed.
2. Kraus, Steven J., MD, MS. (StatDx)

