

Examining Gastric Emptying Half-times in Water versus Carbohydrate Groups in Early Labor

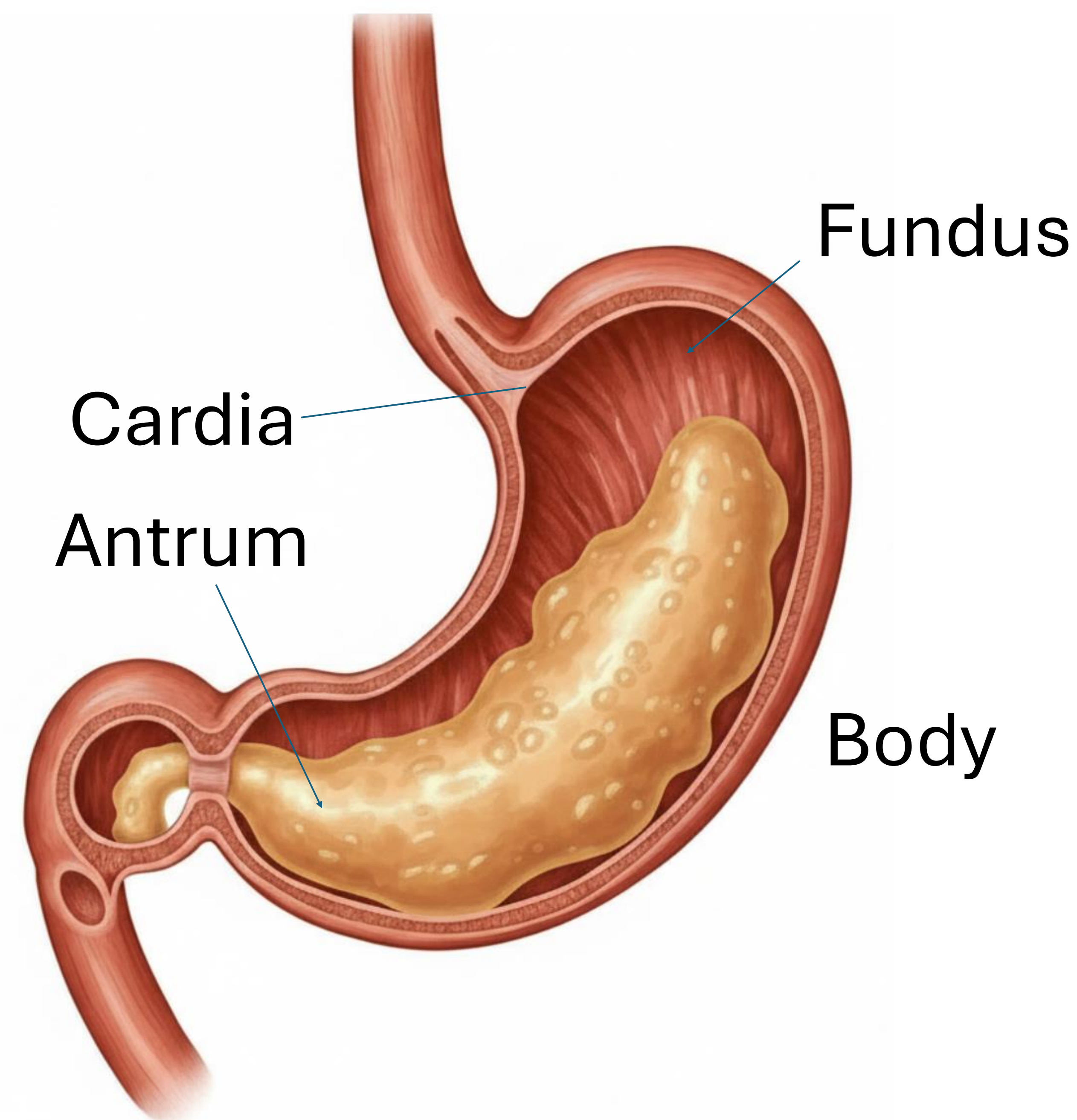
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Background

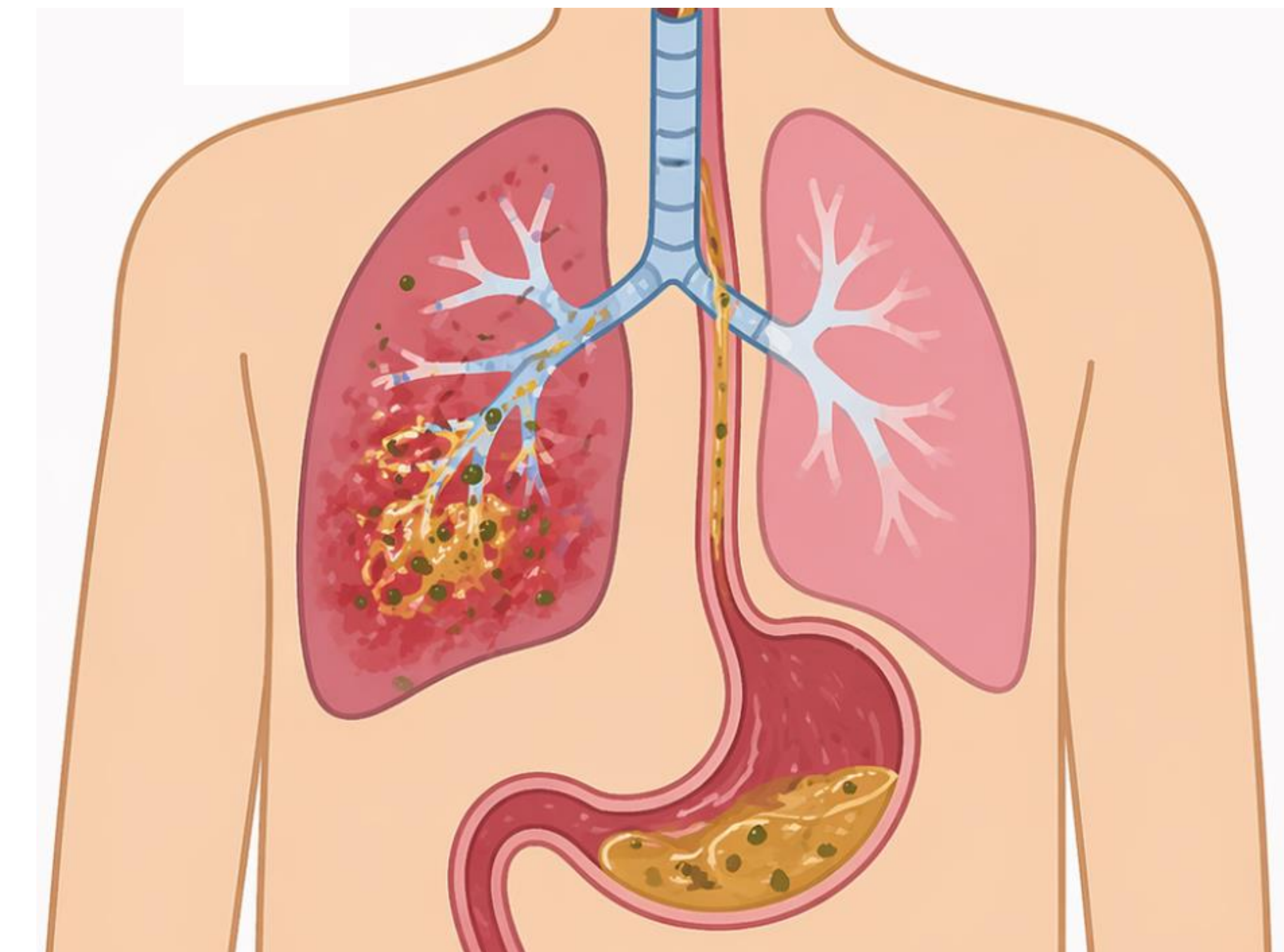
Oral intake is restricted during labor¹

Caloric content influences gastric emptying speed²

Unknown:
How does caloric content of a liquid impact gastric emptying rate during labor epidural analgesia?



Chat GPT



Chat GPT

Hypothesis: That water will empty faster than a sports drink (SpDr)

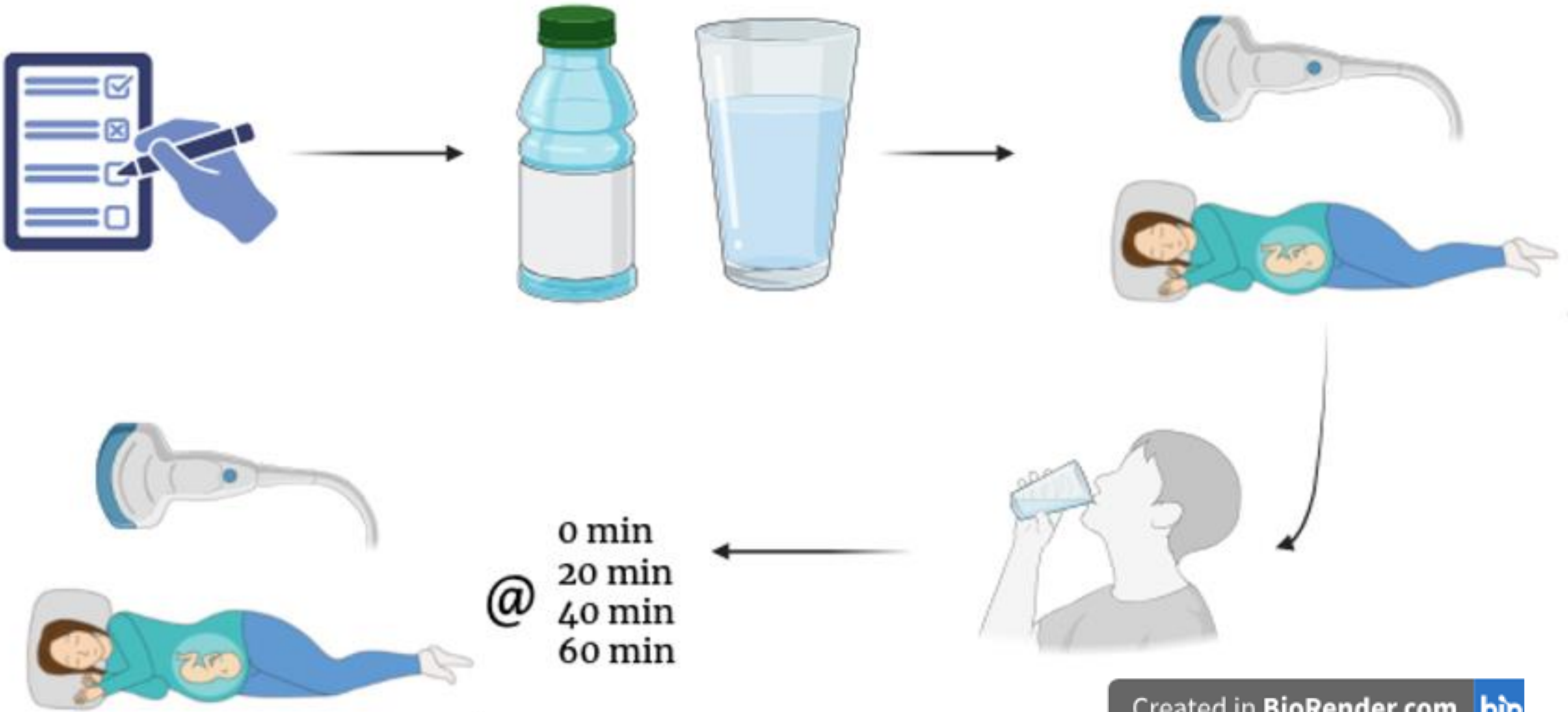
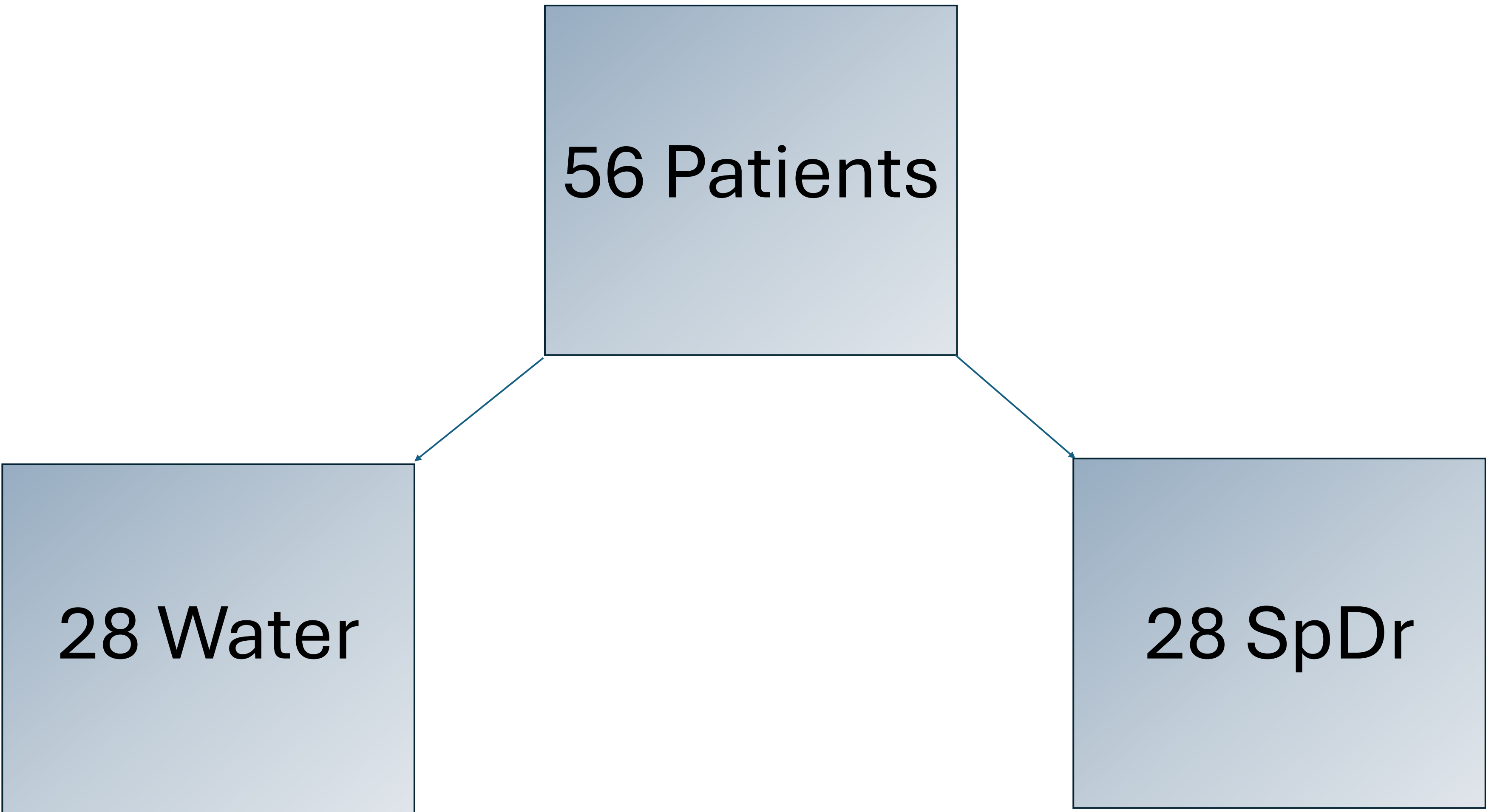
Study Design

Exclusion Criteria

- Recent food ingestion < 3hrs
- Preeclampsia
- Active nausea or reflux symptoms
- Diabetes mellitus
- Received narcotics within 12hrs
- Receiving magnesium sulfate
- Multiple gestations

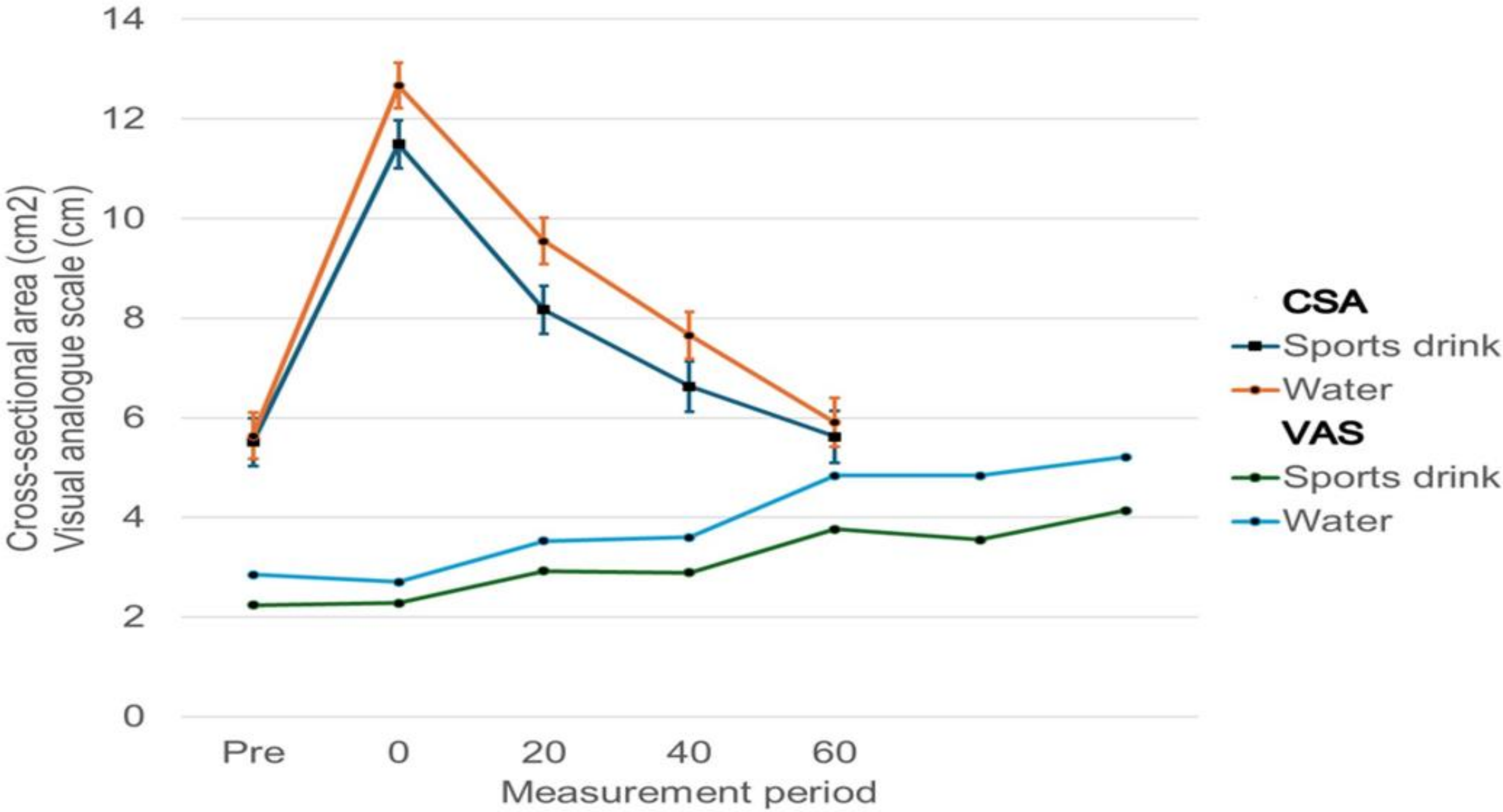
Inclusion Criteria

- Gestational age 36w or greater
- ASA 2 or 3
- Induction of labor or early labor (cervical dilation < 6cm)
- Singleton gestation



Results

Half-Times
Water: 22.9±10.5min
SpDr: 17.2±13.1min
P= 0.20



Discussion and Next Steps

- We found no statistically significant differences in gastric emptying half-times between water and sports drink groups
- Risk of aspiration due to volume in stomach is transient after 100 ml ingestion
- Future avenues for research
 - Larger volumes
 - Repeated volumes
 - More calorically dense liquid

References:

1. PMID: 19318702
2. PMID: 25260696