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Research Article

**STUDY TO KNOW THE PREVALENCE OF ACUTE
PANCREATITIS IN PREGNANCY AND ITS CONSEQUENCES**¹Dr. Mehak Fatima, ²Dr. Muqaddas Zahra, ³Dr. Ghulam Abbas¹WMO at RHC Shah Jewana, Jhang Pakistan²WMO BHU Jamalwal, Chakwal Pakistan³MO at RHC Shah Jewana, Jhang Pakistan**Abstract:**

Objective: To evaluate the incidence of acute pancreatitis in pregnancy and the associated maternal and fetal complications.

Study Design: A case series.

Configuration and Duration: In the Department of Surgery, Unit II of Services Hospital, Lahore for one year duration from December 2016 to December 2017.

Methodology: All pregnant women with suspected acute pancreatitis were examined and included in the health of the mother and fetus.

Results: The most common cause of acute pancreatitis during pregnancy was 61.53% of biliary cases and the most common symptom, epigastric pain and sensitivity was 7.83%. While the total number of maternal deaths was 4 (30.76%) and 9 patients (69.23%) had significant morbidity, the rate of recurrence during the same pregnancy was 15.38%. A total of 6 (46.15%) fetuses had morbidity and the mortality was six (46.15%).

Conclusion: Acute pancreatitis during pregnancy is a rare but frightening condition. Associated maternal and fetal complications can be reduced by early diagnosis and are therefore prematurely referred for adequate specialist care.

Key Words: Pregnancy, acute pancreatitis, gallstone, morbidity, mortality.

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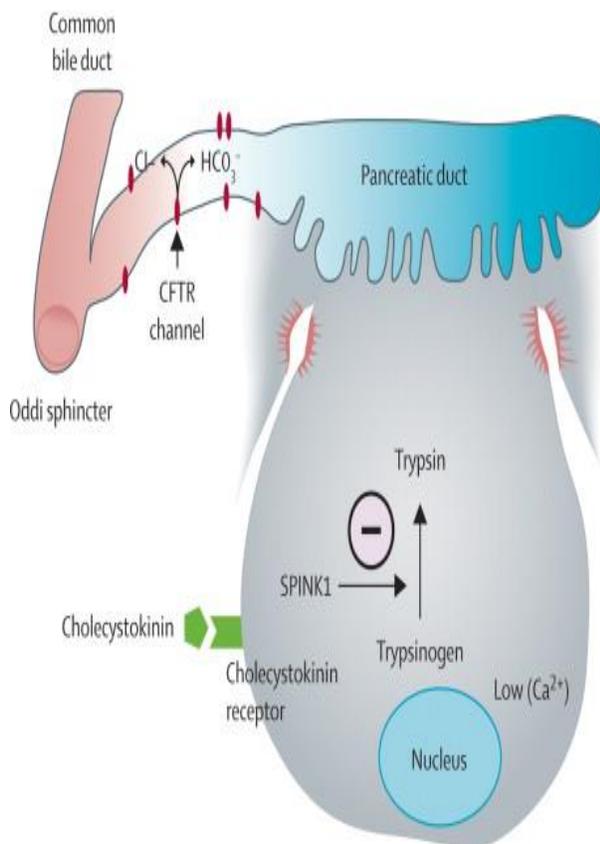
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INTRODUCTION:

Acute pancreatitis is a common complication during pregnancy, but it is certainly feared for maternal and fetal mortality. Acute pancreatitis during pregnancy is a complication that occurs 10 months after birth and up to 10 months after birth. Among the etiological factors, cholelithiasis is the most common in pregnancy. Clinical findings may vary, but the most common symptoms are upper middle abdominal pain, sometimes spreading to the back or any side associated with nausea and vomiting. The incidence of pregnancy-related acute pancreatitis is between 1000 and 1 in 1 of 4000 pregnancies, as shown by Ramin. The most sensitive and specific laboratory diagnostic test is serum amylase, which should always be performed in suspected cases; because

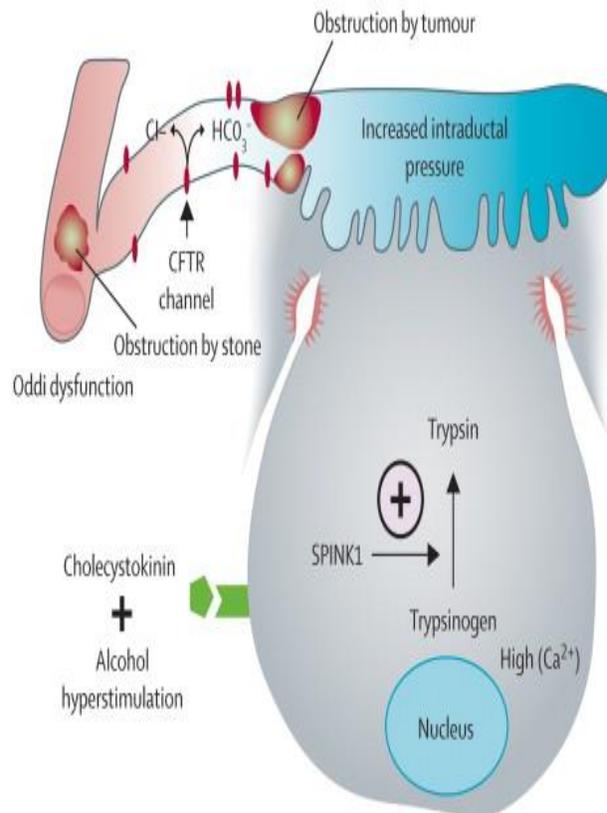
Normal**RESULTS:**

During the study period, a total of 166 cases with acute pancreatitis were diagnosed in 13 pregnant women, so the frequency of acute pancreatitis in pregnancy was 7.83% of the target population. The mean age is 31 years; SD is 23 years old and has a maximum of 4 years. The average gestational week was 29 SD weeks and the maximum number of cases occurred in the third trimester. Most of the patients

early diagnosis and subsequent treatment improves the prognosis of this potentially sinister condition.

MATERIALS AND METHODS:

This case series was taken place in the Department of Surgery, Unit II, Services Hospital, Lahore for one year duration from December 2016 to December 2017. All pregnant women or puerperium patients with suspected symptoms were included in the study. These patients were reviewed for their etiology, risk factors, maternal and fetal outcomes, and their treatment. The patients were diagnosed with epigastric pain with high serum amylase and the diagnosis of acute pancreatitis supported by ultrasound findings.

Acute pancreatitis

(30.8%) had a 5 or more parity (14.5%) family history. All patients had epigastric pain, tenderness, jaundice, fever, nausea and vomiting, 10 (76.9%) each. The most common etiology was biliary pancreatitis, a total of 8 (61.53%). In 5 (38.46%), having only gallstones, 2 (15.38%) had hyperlipidemia and 3 (23%), one (7.7%), followed by symptoms of acute pancreatitis, had abortus induced hyperlipidemia and the presence of gallbladder.

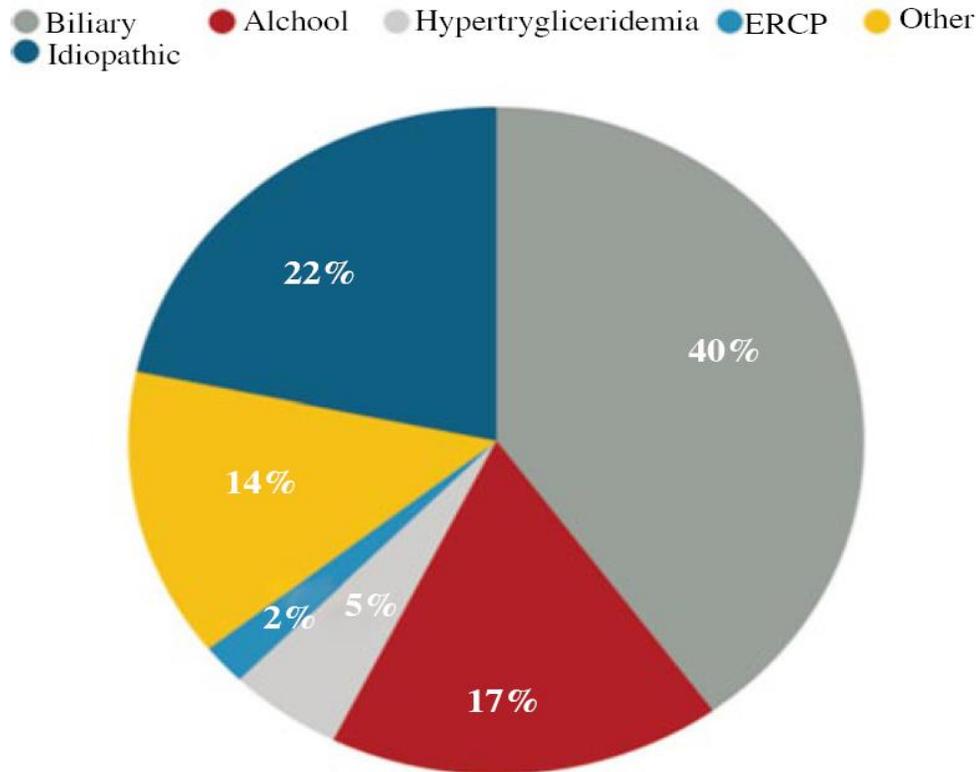
There were 3 (23.1%) recurrences of pancreatitis in the same pregnancy. Two of the patients with bilateral pancreatitis (15.38%) had recurrence after conservative treatment and a chemocystectomy was performed. With the presence of risk factors in 9 (69.23%), but especially in the case of misdiagnosis and late complications had only significant morbidity

by pulmonary edema (15%) had 4 (30.76%) maternal deaths 4%), pulmonary embolism 1 (7.69%). Preterm delivery was 3 (23.07%), 1 (7.7%) was pancreatic abscess and renal failure. Total fetal mortality and morbidity was 6 (46.15%), while 4 (30.76%) newborns needed intensive care.

Symptoms	Laboratory findings
Abdominal pain: <ul style="list-style-type: none"> • Colicky or stabbing character • Rapid onset • Focused on epigastrium or right hypochondrium • Radiating to the right flank, scapula, shoulder 	Pancreatic: <ul style="list-style-type: none"> • Increased serum lipase activity (up to 3 times greater than the upper limit of normal) • Increased serum amylase activity (up to 3 times greater than the upper limit of normal)
Gastrointestinal: <ul style="list-style-type: none"> • Anorexia • Vomiting • Nausea • Dyspepsia • Fatty food intolerance • Jaundice 	Metabolic: <ul style="list-style-type: none"> • Hyperglycemia • Hypertriglyceridemia • Hypocalcaemia
Circulatory: <ul style="list-style-type: none"> • Tachycardia • Orthostatic hypotension 	Cholestatic: <ul style="list-style-type: none"> • Increased ALP and γ-GT • Increased AST/ALT • Increased Bilirubin
Systematic: <ul style="list-style-type: none"> • Low-grade fever 	Hematological: <ul style="list-style-type: none"> • Leukocytosis up to 16,000/μl • Elevated neutrophils >75%
Signs: <ul style="list-style-type: none"> • Hemorrhagic: <ul style="list-style-type: none"> • Gray-Turner • Cullen • Pain: <ul style="list-style-type: none"> • Kehr • Murphy 	Markers of acute inflammation: <ul style="list-style-type: none"> • Increased CRP • Increased ESR
	Urine: <ul style="list-style-type: none"> • Increased amylase activity

DISCUSSION:

The result of this study reflects the findings of studies that have been published by other authors that confirm that acute pancreatitis is a disturbing condition with 30% maternal mortality. However, this contradicts the figures in a study by Choy. In this study, the maximum number of cases presented in the last quarter is related to Ramn's findings.



In this study, the parity is equal to the maximum of five, which is similar to other studies conducted by Shantu Kumar. The average age of the patients in this study was similar to that of Javed Naeem. In this study, the most common etiology in a study by Zahra and William was biliary pancreatitis. Hyperlipidemia is the cause in 38.4% of the patients in this study, which is similar to the findings of Choy. The most common symptoms were epigastric pain, which was later spread as in other authors' studies. Recurrence was more common in patients with biliary pancreatitis during the same pregnancy and required surgical intervention as in the Maev study. In contrast to the findings of Alejandro¹⁰, this study was 4.7% and maternal mortality was 30.76%, which is a direct contrast, but similar to the study by Taj. Perinatal mortality was 46%, which was significantly higher than the others. This was more likely due to misdiagnosis or delay in diagnosis and, consequently, delayed referral. Laparoscopic cholecystectomy does not only reduce recurrence, but also decreases maternal and fetal mortality if done at an appropriate time.

CONCLUSION:

Acute pancreatitis is not very common during pregnancy. Although biliary causes are the most common, non-biliary causes are associated with poor prognosis. However, biliary disease is associated with increased recurrence.

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