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Kırk Günlükken Safralı Kusma Şikayetiyle Başvuran Anüler Pankreaslı Yenidoğan Olgusu

A Newborn with Annular Pancreas Who Presented with the Complaint of Bilious Vomiting at the Age of Forty Days

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Özet

Anüler pankreas, genellikle duodenumun ikinci kısmı ve nadiren üçüncü kısmı etrafında kısmi veya tam rotasyon yapan, bant benzeri bir pankreas dokusu ile karakterize nadir bir doğumsal anomalidir. 21 yaşında, 34 haftalık, 2040 g, sezaryen ile dünyaya gelen 21 yaşındaki annenin ilk gebeliğinden ilk canlı olarak dünyaya gelen ve 40 günlükken safralı kusma ile başvuran erkek hastamıza annüler pankreas tanısı konuldu ve 41. günde opere edildi. Anüler pankreastaki klinik semptomlar duodenal stenozun derecesine bağlıdır ve minimal duodenal stenozlu veya hiç olmayan bebeklerde ömür boyu asemptomatik olabilir veya olgumuzda olduğu gibi nadir bir semptom olarak safralı kusma ile karşımıza çıkabilir.

Anahtar Kelimeler: Anüler pankreas, kusma, yenidoğan

Abstract

Annular pancreas is a rare congenital anomaly characterized by a band-like pancreatic tissue, usually partial or complete rotation around the second part of the duodenum and rarely around the third part. Our male patient, who was born as the first living from the first pregnancy of a 21-year-old mother, who was 34 weeks old, 2040 g, by cesarean section and presented with bilious vomiting when she was 40 days old, was diagnosed with annular pancreas and was operated on on the 41st day. Clinical symptoms in the annular pancreas depend on the degree of duodenal stenosis, and in babies with minimal or no duodenal stenosis, they may be lifelong asymptomatic or may present with bilious vomiting as a rare symptom.

Keywords: Annular pancreas, vomiting, newborn

Case report

A 21-year-old, 34-week-old, 2040-g male baby, born by cesarean section, was admitted to our hospital at the age of 40 days with the complaint of vomiting. The patient was hospitalized in the neonatal intensive care unit, as the vomiting of the patient gradually increased and the character of vomiting turned into bile. It was learned that there was no problem in the patient's history and family history, and the pregnancy of the mother was not followed up. On physical examination, his general condition was moderate, conscious, slightly dehydrated, body weight was 2180 grams(10-50p), height 46 cm (50p), head circumference 31 (50-75p) cm. Peak heart rate was 135/min, respiratory rate was 55/min, and blood pressure was 68/53-47. There were findings supporting the Down syndrome phenotype.(epicantus, depressed nasal root ,slanted eyes, mild hypotonia, other system examinations were normal. Na:127 mEq/L, F:3.3 mEq/L, Cl:73 mEq/L). The feeding of the patient was interrupted and the stomach was taken to free drainage with an orogastric catheter (Fig.1). The patient's orogastric biliary discharge continues and he has not had stool for the last two days. Stool discharge seen after enema. Annular pancreatic tissue was seen during the operation (Fig.2).

Figure 1: Double-Bouble Sign image on standing direct abdominal radiography taken during admission to our hospital (postnatal 40th day)

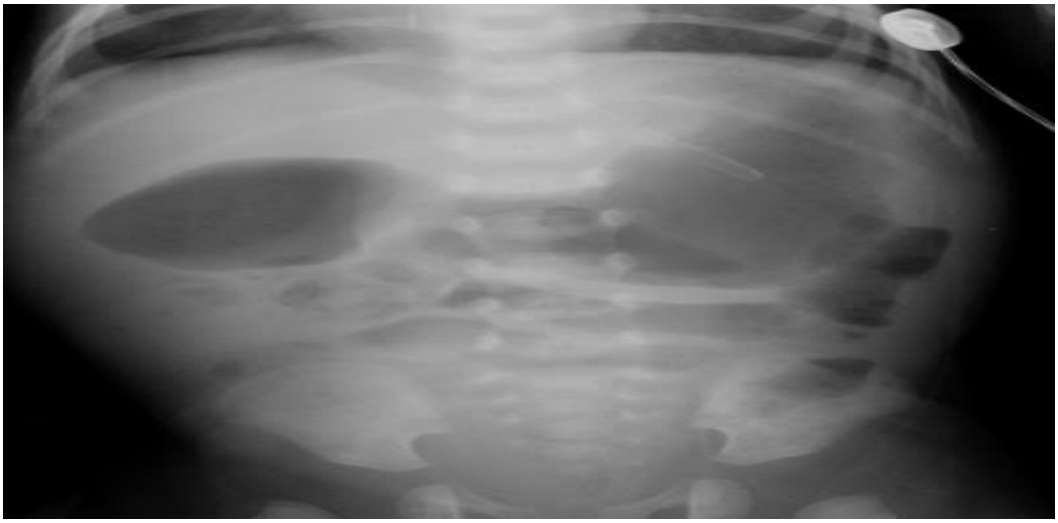
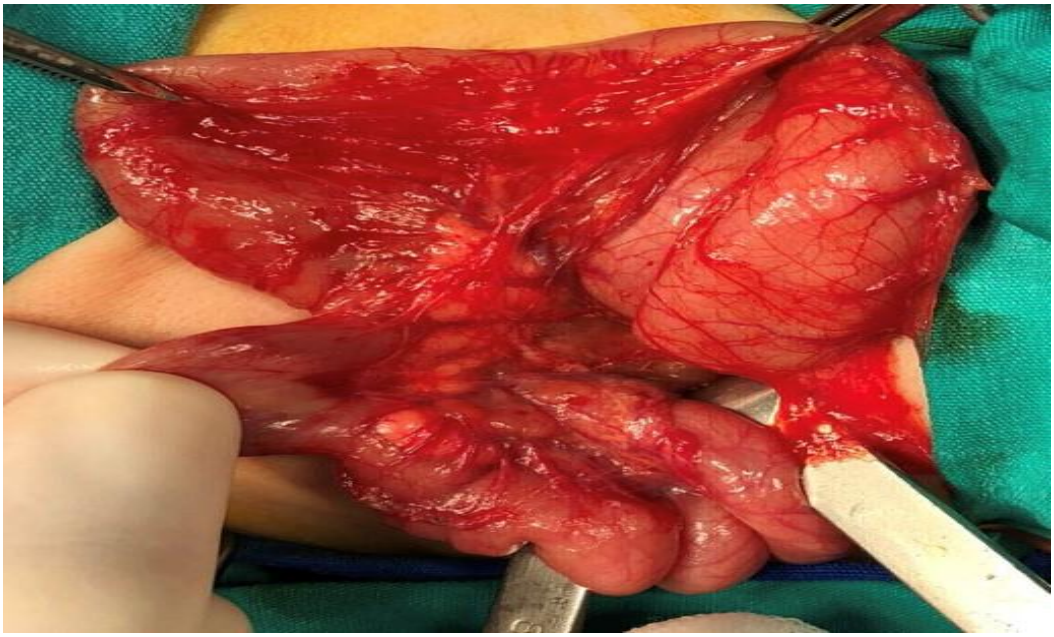


Figure 2: Annular pancreas image during the operation
Duodenum was freed and duodenoduodenostomy was performed.



Feeding was started on the 5th postoperative day. No additional anomaly was detected in the patient (echocardiography, abdominal ultrasonography and transfontanel ultrasonography were normal). No complications were observed during the follow-up. The patient's nutrition was gradually increased and he was discharged on the 14th postoperative day. The patient's chromosomal gene analysis was compatible with trisomy 21.

Discussion

We are thinking, in this case, we present a patient with annular pancreas who was not diagnosed antenatally and was operated on the 41st postnatal day and discharged on the postnatal 47th day, who presented with bilious vomiting on the postnatal 40th day.

Annular pancreas is estimated to occur in 1/ 12,000 - 1/ 15,000 newborns. Annular pancreatic cases have become more frequently defined with new developments in imaging methods and advances in diagnostic methods (5-9). It is symptomatic in the neonatal period in 50% of the cases and vomiting is observed from the first day of life. In these cases, polyhydramnios (fetal gastrointestinal system obstruction finding) accompanies in the intrauterine period.

Early signs and symptoms of the abnormality include low birth weight and intolerance to feeding (immediately after birth), especially the tendency to epigastric swelling associated with nonbilious vomiting (obstruction is usually over the Vater papilla) (10). Annular pancreas cases usually present to the hospital with the complaint of nonbilious vomiting in the early period in infants, and our case presented with bilious vomiting, which is a rare symptom, since obstruction is in the third part of the duodenum.Infants usually present with classic double-bouble and duodenal obstruction on imaging. More than half of babies with duodenal

obstruction are born prematurely. Often the cause of prematurity is the onset of premature labor due to polyhydramnios. If amniotic fluid is reduced by amniocentesis, the risk of preterm birth is also reduced (11). In our case, there was a history of premature birth and double buble appearance in accordance with the literature. Approximately 33% of infants affected by annular pancreas have different frequencies of chromosomal diseases (trisomy 21 and a small part of them, trisomy 18 and trisomy 13) (12,13). The genetic analysis result of our patient was compatible with trisomy 21.

Annular pancreas has been associated with other congenital anomalies. Other congenital anomalies such as malrotation, tracheoesophageal fistula, esophageal atresia, duodonal atresia, renal anomalies, duodenal diverticulum, pancreatic divisium, biliary atresia, anorectal malformation and congenital heart diseases can be seen in many babies (14). Whether these pathologies accompany or not should be investigated carefully as they may affect mortality and morbidity. We did not find any additional accompanying anomaly in our case.

Annular pancreas cases usually present with the complaint of non-bilious vomiting. We should be alert that they may present with bilious vomiting as in this case.
Early detection of malformations and chromosomal anomalies that may accompany these cases is important in reducing mortality and morbidity (15).

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Conflict of Interest: The authors declared no conflict of interest.

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