

# Esophageal perforation management: a single-center experience

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## ABSTRACT

**BACKGROUND:** Esophageal perforation is a serious medical condition where a hole or tear develops in the esophagus, the muscular tube that connects the throat to the stomach. Although rare, the condition is potentially life-threatening, as it can lead to infection and inflammation in surrounding tissues, including the mediastinum, pleura, and peritoneum.

**METHODS:** Between 2014 and 2022, a retrospective study was conducted on cases of esophageal rupture treated at our institution. Eighteen cases were included in the study. Patient data, including age, gender, risk factors, delay in diagnosis, diagnostic method, site of perforation, etiology of perforation, treatment approach, complications, length of hospital stay, and outcomes, were collected. The Pittsburgh Severity Score (PSS) was calculated for each patient.

**RESULTS:** The mean patient age was 46.33 years, with a male predominance (72.2%). Causes included iatrogenic (22.2%), foreign body (50%), and trauma (27.8%). Perforations primarily occurred in the cervical (38.9%), thoracic (33.3%), and distal esophagus (27.8%). Higher mortality was associated with elevated white blood cell count (WBC), delayed diagnosis, and contrast leakage ( $p<0.05$ ). Computed tomography (CT) findings and complications significantly influenced intensive care unit (ICU) stay, with abscesses reducing and mediastinitis increasing the duration ( $p<0.05$ ). Other factors, including age, length of hospitalization, gender, etiology, and treatment type, did not significantly affect Pittsburgh Severity Scores ( $p>0.05$ ).

**CONCLUSION:** Esophageal perforation remains a challenging clinical condition associated with significant morbidity and mortality. To optimize patient outcomes, rapid diagnosis, risk stratification using tools such as the PSS, and tailored management strategies are essential.

**Keywords:** Complications; esophageal perforation; intensive care unit (ICU) stay; management; Pittsburgh Severity Score.

## INTRODUCTION

Esophageal perforation, a rare yet serious condition, occurs when there is a tear or rupture in the esophageal wall. It can result from various causes, including trauma, iatrogenic factors, or underlying health problems. Treatment can be either medical (conservative) or surgical, depending on the cause, location, extent, symptoms, and radiological findings.<sup>[1]</sup> Despite its infrequency, esophageal perforation requires urgent medical attention due to its potential to cause severe compli-

cations, including infection, mediastinitis, and sepsis. Prompt diagnosis and tailored management are vital in mitigating risks and improving patient outcomes in this challenging medical problem.<sup>[2]</sup>

The Pittsburgh Severity Score (PSS), a valuable tool in assessing and categorizing the severity of esophageal perforations, aids in making informed decisions regarding treatment strategies. This scoring system plays a crucial role in guiding interventions and improving patient outcomes by stratifying the

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severity of this critical condition.<sup>[3]</sup> Early diagnosis and prompt treatment are of significant importance. The mortality rate can increase up to 60% if there is a delay in diagnosis and initiation of treatment. However, if treatment is started within 24 hours of perforation, this rate can decrease to 10%.<sup>[3]</sup>

The management of esophageal perforations continues to be challenging, and each case should be evaluated individually. This study aims to analyze the characteristics, treatments, and outcomes of patients with esophageal perforation who presented to our hospital over the past eight years.

## MATERIALS AND METHODS

### Patient Selection and Ethical Statement

All procedures performed in this study involving human participants were conducted in accordance with the ethical standards of the institutional and/or national research committee and the 1964 Helsinki Declaration and its later amendments or comparable ethical standards. The study was approved by the Scientific Research Ethics Committee from the local Ethical Committee (2024-28).

Between 2014 and 2022, a retrospective study was conducted on cases of esophageal rupture treated at our institution. Eighteen cases were included in the study. Data collected included patient age, gender, risk factors, delay in diagnosis, diagnostic method, site of perforation, etiology of perforation, treatment approach, complications, length of hospital stay, and outcomes.

Patients were classified into three groups based on the etiology of the perforation: iatrogenic, foreign body, and trauma. The site of perforation was categorized as cervical esophagus, thoracic esophagus, and distal esophagus (gastroesophageal junction). Clinical presentations were categorized as dysphagia, vomiting, chest pain, and sepsis, while complications were classified as mediastinitis and deep neck infection.

Oral contrast-enhanced computed tomography (CT) was used as the diagnostic method, with particular attention to the presence of contrast leakage. The length of hospital stay for each patient was evaluated separately for the regular ward and the intensive care unit (ICU), and factors influencing the length of stay in the intensive care unit were investigated.

Both conservative and surgical approaches were used in treatment. The conservative approach included intravenous antibiotics, intensive care support, gastric decompression (nasogastric tube), and nutritional support (parenteral) in some cases. Additionally, percutaneous drainage was applied, especially for thoracic esophageal perforations. The primary approach for distal esophageal perforations was surgical, involving repair and, if necessary, major resection. The group with cervical esophageal perforation included patients whose etiology was a foreign body. These patients were managed

with surgical removal of the foreign body without repair, followed by drainage in the wound area.

### Pittsburgh Severity Score

The Pittsburgh Severity Score was calculated for each patient, with points assigned to each variable according to the following scale: 1 point for age >75, heart rate >100 bpm, white blood cell count >10 or pleural effusion; 2 points for temperature >38.5°C, uncontrolled leakage, respiratory failure (respiratory rate >30), increased oxygen requirement or mechanical ventilation requirement, or time to diagnosis >24 hours; 3 points for the presence of cancer or hypotension. The Pittsburgh Severity Score was categorized as <9 (non-mortal) or ≥9 (mortal) to distinguish patients with increased mortality and morbidity.

### Statistical Analysis

Histogram and Q-Q plots were examined, and the Shapiro-Wilk test was applied to assess data normality. The Levene test was used to assess variance homogeneity. To compare differences among groups, the Kruskal-Wallis test was applied for continuous variables, and Pearson's  $\chi^2$  test was applied for categorical variables. To compare differences between groups, independent sample t-tests or Mann-Whitney U tests were used for continuous variables. Factors affecting the length of stay in the intensive care unit were investigated using linear regression analysis. Analysis was conducted using R 4.3.2 software (<http://www.r-project.org>). A p-value of less than 5% was considered statistically significant.

## RESULTS

The mean age of the patients was 46.33 years. The median value of the white blood cell count (WBC) variable was 12.565. The median hospitalization duration was 12.5 days. The median length of stay in the ward and intensive care unit was found to be 6 days. Thirteen (72.2%) of the patients were male, and five (27.8%) were female. Five (27.8%) of the patients had no contrast leakage, 10 (55.6%) had an abscess but no contrast leakage, and three (16.7%) had both contrast leakage and an abscess.

Regarding the etiology, four (22.2%) patients had iatrogenic causes, nine (50.0%) had foreign body ingestion, and five (27.8%) had trauma. The site of perforation was the cervical esophagus in seven (38.9%) patients, the thoracic esophagus in six (33.3%) patients, and the distal esophagus in five (27.8%) patients.

A patient with thoracic esophageal perforation due to a gunshot wound (Fig. 1a) underwent surgery with debridement and drainage. Another patient with cervical esophageal perforation caused by chicken bone impaction (Fig. 1b) was similarly operated on, and the bone was removed. Due to tissue fragility, a drainage catheter was placed without suturing. The most notable iatrogenic case involved a distal esophageal perforation that occurred during the removal of a gastric

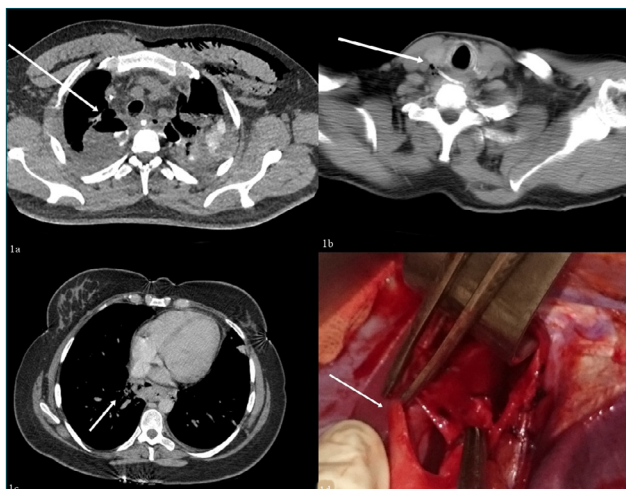
balloon (Fig. 1c). In another case, a full-thickness iatrogenic perforation of the distal esophagus occurred during laparoscopic Heller myotomy (Fig. 1d). In this case, open surgery was performed, and the perforated area was sutured.

Symptoms included dysphagia in four (22.2%) patients, vomiting in two (11.1%) patients, chest pain in four (22.2%) patients, and sepsis in eight (44.4%) patients. Seven (38.9%) patients were treated conservatively, while eleven (61.1%) were treated surgically. Nine (50%) patients did not develop complications.

Four (22.2%) patients developed mediastinitis, and five (27.8%) developed deep neck infections. The Pittsburgh Severity Score was below 9 in 12 (66.7%) patients and 9 or above in six (33.3%) patients. The time to diagnosis was 24 hours or more in nine (50%) patients and less than 24 hours in nine (50%) patients. Three (16.6%) patients had contrast leakage on oral contrast-enhanced computed tomography, while 15 (83.4%) did not (Table 1).

Total days of hospitalization, days of hospitalization in the ward, days of hospitalization in the intensive care unit, symptoms, complications, Pittsburgh Severity Score variables, time to diagnosis, and the presence of contrast leakage did not show a statistically significant difference based on the anatomical location of the perforation ( $p>0.05$ ) (Table 2).

WBC count, CT findings, time to diagnosis, and contrast leakage variables were statistically significantly different between the Pittsburgh Severity Score groups ( $p<0.05$ ). It was observed that white blood cell count was higher in individuals in the mortal group ( $PSS\geq 9$ ) compared to those in the non-mortal group ( $PSS<9$ ). Additionally, due to the limited number of patients in our study, this classification was preferred. The number of individuals with both contrast leakage (CL +) and abscess (A +), as well as those with CL (-) and A (+) in



**Figure 1.** (a) Thoracic esophageal perforation due to a gunshot wound, revealing contrast leakage. (b) Chicken bone causing cervical esophageal perforation. (c) Distal thoracic esophageal perforation after gastric balloon removal. (d) Distal esophageal perforation during myotomy for achalasia.

**Table 1.** Demographic and clinical features of the patients

Variables	Descriptive Statistics
Age	46.33±17.49
White Blood Cell Count (WBC)	12,565.0 (8,447.5-16,677.5)
Length of Hospital Stay (LOS)	12.5 (9.0-22.5)
Ward Stay	6.0 (3.5-8.5)
Intensive Care Unit (ICU) Stay	6.0 (2.8-16.0)
Gender	
Male	13 (72.2)
Female	5 (27.8)
Computed Tomography (CT)	
Contrast Leakage (CL) (-)	5 (27.8)
CL (-), Abscess (A) (+)	10 (55.6)
CL (+), A (+)	3 (16.7)
Etiology	
Iatrogenic	4 (22.2)
Foreign Body	9 (50.0)
Trauma	5 (27.8)
Site of Perforation	
Cervical Esophagus	7 (38.9)
Thoracic Esophagus	6 (33.3)
Distal Esophagus	5 (27.8)
Symptoms	
Dysphagia	4 (22.2)
Vomiting	2 (11.1)
Chest Pain	4 (22.2)
Sepsis	8 (44.4)
Treatment	
Conservative	7 (38.9)
Surgery	11 (61.1)
Complications	
None	9 (50.0)
Mediastinitis	4 (22.2)
Deep Neck Infection	5 (27.8)
Pittsburg Severity Score	
PSS<9	12 (66.7)
PSS≥9	6 (33.3)
Time from Perforation to Arrival	
≥24 hours	9 (50.0)
<24 hours	9 (50.0)
Contrast Leakage	
Yes	4 (22.2)
No	14 (77.8)

Values are expressed as mean±standard deviation, median (1st quartile-3rd quartile), and n (%).

the computed tomography group, was higher in the mortal group than in the non-mortal group. In the non-mortal group, the number of individuals with CT results showing CL (-) and A (+) was higher than those with CT results showing CL (+) and A (+). The number of individuals in the mortal group whose time to diagnosis exceeded 24 hours was greater than the number of individuals whose diagnosis time was less than 24 hours. In contrast, in the non-mortal group, the number of individuals whose time to diagnosis exceeded 24 hours was lower than those diagnosed in less than 24 hours. The number of individuals in the mortal group with contrast leakage was higher than those without contrast leakage (Table 3).

It was observed that the number of individuals in the non-mortal group with contrast leakage was lower than the number of those without contrast leakage. Variables such as age, total days of hospitalization, days in the ward, days in the intensive care unit, gender, etiology, location, treatment, and complications did not generate a statistically significant difference between the Pittsburgh groups ( $p>0.05$ ) (Table 3).

Among the 18 patients, seven had cervical, five had abdomi-

nal, and six had thoracic esophageal perforations. A patient with a distal esophageal perforation and a PSS of 14 at the time of admission underwent a total gastrectomy and was discharged after a prolonged stay in the intensive care unit. A patient with cervical perforation caused by a foreign body had a PSS of 10 at the time of admission. This patient underwent drainage for a deep neck infection and was discharged after an extended hospitalization period. Another patient with an iatrogenic thoracic esophageal perforation and a PSS of 16 at admission underwent a total esophagectomy with a colonic interposition procedure. This patient was also discharged following a prolonged hospital stay. A patient who presented 72 hours after a cervical perforation caused by a foreign body had a PSS of 14 at admission. This patient developed systemic sepsis due to a deep neck infection and subsequently passed away. Of the 18 patients, 17 were discharged, and only one patient died. The follow-up and treatment of the other patients were consistent with their low PSS scores.

The effects of CT findings and complication variables on the duration of intensive care unit stay were statistically significant ( $p<0.05$ ) (Table 4). Abscess development without con-

**Table 2.** Comparison of results of variables according to site of perforation

Variables	Site of Perforation			p
	Cervical Esophagus (n=7)	Thoracic Esophagus (n=6)	Distal Esophagus (n=5)	
Day of Admission	13.0 (9.0-15.0)	18.0 (8.8-38.0)	11.0 (7.5-27.5)	0.727
Length of Clinical Stay (LOS)	6.0 (0.0-8.0)	5.0 (2.0-12.0)	8.0 (5.5-10.5)	0.421
Intensive Care Unit (ICU) Stay	5.0 (2.0-9.0)	13.0 (5.3-29.0)	3.0 (1.0-18.5)	0.176
Symptoms				
Dysphagia	3 (42.9)	1 (16.7)	0 (0.0)	0.225
Vomiting	0 (0.0)	0 (0.0)	2 (40.0)	
Chest Pain	1 (14.3)	2 (33.3)	1 (20.0)	
Sepsis	3 (42.9)	3 (50.0)	2 (40.0)	
Complications				
None	4 (57.1)	2 (33.3)	3 (60.0)	0.339
Mediastinitis	0 (0.0)	3 (50.0)	1 (20.0)	
Deep Neck Infection	3 (42.9)	1 (16.7)	1 (20.0)	
Pittsburg Severity Score				
PSS<9	4 (57.1)	4 (66.7)	4 (80.0)	0.833
PSS≥9	3 (42.9)	2 (33.3)	1 (20.0)	
Time from Perforation to Diagnosis				
≥24 hours	4 (57.1)	4 (66.7)	1 (20.0)	0.371
<24 hours	3 (42.9)	2 (33.3)	4 (80.0)	
Contrast Leakage				
Yes	1 (14.3)	2 (33.3)	1 (20.0)	0.791
No	6 (85.7)	4 (66.7)	4 (80.0)	

Values are expressed as mean±standard deviation, median (1st quartile-3rd quartile), and n (%).

**Table 3.** Comparison of variables according to Pittsburg Severity Score

Variables	Pittsburg Severity Score		p
	Mortal (≥9) (n=6)	Non-Mortal (<9) (n=12)	
Age	53.67±13.65	42.67±18.55	0.218
WBC	14,495.0 (12,467.5-19,800.0)	10,260.0 (6,520.0-13,447.5)	0.039
Day of Admission	19.0 (13.5-38.0)	11.0 (8.3-13.8)	0.055
Length of Clinical Stay (LOS)	6.0 (0.0-22.5)	6.0 (5.0-8.0)	0.962
Intensive Care Unit (ICU) Stay	12.0 (5.0-29.0)	5.0 (1.5-6.8)	0.090
Gender			
Male	4 (66.7)	9 (75.0)	0.999
Female	2 (33.3)	3 (25.0)	
CT Findings			
CL (-)	0 (0.0)	5 (41.7)	0.013
CL (-), A (+)	3 (50.0)	7 (58.3)	
CL (+), A (+)	3 (50.0)	0 (0.0)	
Etiology			
Iatrogenic	2 (33.3)	2 (16.7)	0.551
Foreign Body	2 (33.3)	7 (58.3)	
Trauma	2 (33.3)	3 (25.0)	
Site of Perforation			
Cervical Esophagus	3 (50.0)	4 (33.3)	0.828
Thoracic Esophagus	2 (33.3)	4 (33.3)	
Distal Esophagus	1 (16.7)	4 (33.3)	
Treatment			
Conservative	1 (16.7)	6 (50.0)	0.316
Surgery	5 (83.3)	6 (50.0)	
Complications			
None	2 (33.3)	7 (58.3)	0.550
Mediastinitis	2 (33.3)	2 (16.7)	
Deep Neck Infection	2 (33.3)	3 (25.0)	
Time from Perforation to Diagnosis			
≥24 hours	6 (100.0)	3 (25.0)	0.009
<24 hours	0 (0.0)	9 (75.0)	

Values are expressed as mean±standard deviation, median (1st quartile-3rd quartile), and n (%).

trast leakage was associated with a shorter intensive care unit stay, while the development of mediastinitis increased the length of stay in the intensive care unit. The effects of age, gender, place of residence, PSS, and time to diagnosis on ICU stay were not statistically significant ( $p>0.05$ ) (Table 4).

## DISCUSSION

Esophageal perforation is a rare but serious medical condition associated with significant morbidity and mortality. Rapid diagnosis and appropriate management are crucial for

improving patient outcomes.<sup>[4]</sup> In this study, we aimed to analyze the characteristics, treatments, and outcomes of patients with esophageal perforation over an eight-year period at our institution.

The demographic profile of our study, with a predominance of male patients and an average age of 46.33 years, aligns with findings from previous studies.<sup>[5]</sup> The etiology of esophageal perforation varied, with foreign bodies being the most common cause in our study (50.0%), followed by trauma (27.8%) and iatrogenic factors (22.2%). This distribution differs some-

**Table 4.** Logistic regression analysis of factors predicting intensive care unit (ICU) stay

Variables	Univariate Linear Regression	
	Beta (95%CI)	p
Age	-0.14 (-0.45-0.17)	0.342
Gender		
Female	-3.05 (-14.99-8.90)	0.596
CT Findings		
CL (-)	-13.20 (-27.91-1.51)	0.075
CL (-), A (+)	-15.00 (-28.26--1.74)	0.029
Site of Perforation		
Thoracic	9.69 (-2.35-21.73)	0.107
Distal	2.26 (-10.42-14.93)	0.710
Complications		
Mediastinitis	15.44 (4.06-26.83)	0.011
Deep Neck Infection	7.24 (-3.32-17.81)	0.165
Pittsburg Severity Score		
≥9 (Mortal)	8.00 (-2.64-18.64)	0.130
Time from Perforation to Diagnosis		
≥24 hours	5.56 (-4.83-15.94)	0.274

CI: Confidence Interval; CT: Computed Tomography; ICU: Intensive Care Unit.

what from previous studies, which have reported a higher prevalence of iatrogenic causes. Wigley et al. reported that 55.2% of perforations were iatrogenic.<sup>[6]</sup> In the series of 270 patients with foreign body-induced esophageal perforation by Liao et al., the cervical esophagus was the most frequently perforated region, with fish bones being the most common foreign body, followed by animal bones.<sup>[7]</sup> In our study, the cervical esophagus was also the most frequently affected region, with chicken bones being the most common etiological factor.

Diagnostic methods play a critical role in the timely recognition of esophageal perforation. Oral contrast-enhanced computed tomography is a widely used imaging technique that allows for the detection of contrast leakage and assessment of the extent of the injury.<sup>[8]</sup> In our study, CT findings were significantly associated with the severity of the perforation and patient outcomes. Specifically, the presence of contrast leakage on CT was more common in patients with higher PSS, indicating a greater degree of injury and subsequent complications.

Management strategies for esophageal perforation encompass both conservative and surgical approaches, depending on the patient's condition and the severity of the injury. Clinical presentations varied among patients, with symptoms such as dysphagia, chest pain, vomiting, and sepsis being observed. Significant advancements have been made over the years in

transitioning from aggressive surgical treatment to more conservative management methods.<sup>[9]</sup>

The choice of treatment method depended on factors such as the size and location of the perforation, the presence of associated complications, and the patient's overall clinical condition. Surgical intervention typically involved repair of the perforation, with resection performed in cases of extensive damage. Conservative management included measures such as intravenous antibiotics, nutritional support, and gastric decompression, often supported by percutaneous drainage in cases of thoracic perforation.<sup>[10]</sup> The selection of the optimal treatment approach remains a complex decision that requires multidisciplinary collaboration and consideration of various clinical factors.

Cervical esophageal injury generally necessitates surgical intervention due to the association of exploration with low mortality.<sup>[11]</sup> In our series, surgical intervention was performed for cervical esophageal perforations. Given that many were caused by foreign bodies, surgical removal of the foreign body was conducted. However, due to tissue edema and fragility, the operation was concluded by placing a drain at the edge of the perforation without repair.

The decision to treat a patient non-operatively varies among centers. This variability led to the development of the Pittsburg Severity Score, a scoring system aimed at determining the severity of esophageal perforations (EP), identifying

risk groups, and creating appropriate treatment strategies for these risk groups. In a study by Moletta et al. involving 73 cases, patients with lower PSS scores had shorter hospital stays and experienced lower morbidity and mortality rates.<sup>[3]</sup> In our series, no significant relationship was found between hospital stay duration and PSS score, which was attributed to the small number of patients.

Some patients in our study experienced complications such as mediastinitis and deep neck infections, which significantly impacted patient outcomes and required prompt recognition and management. Schweigert et al. divided the population in their study at the midpoint of the possible score range (PSS<9 vs. PSS≥9) to test their finding that there were no surviving patients with a score of 9 or higher in Pittsburgh, and examined the outcomes.<sup>[12]</sup>

The Pittsburgh Severity Score emerged as a valuable tool for risk stratification and guiding treatment decisions in our cohort. Patients with higher PSS scores (≥9) were more likely to experience adverse outcomes, underscoring the importance of early diagnosis and aggressive management in this subset of patients.

Both ward and intensive care unit stays varied among patients but did not show a significant relationship with the anatomical location of the perforation. However, factors such as the development of complications and CT findings were determinants of prolonged ICU stays. Patients with abscess formation without contrast leakage tended to have shorter ICU stays, while those with mediastinitis experienced longer ICU stays, highlighting the impact of associated complications on clinical outcomes. Our findings are supported by literature showing that higher PSS values significantly extend ICU stays.<sup>[6]</sup>

Traditional treatment has often involved surgical repair of the perforation, but over the past two decades, there has been a shift towards the use of endoluminal esophageal stents as an alternative approach. Studies have shown that esophageal stent placement is an effective treatment for esophageal perforations, with success rates ranging from 60% to 95%.<sup>[13,14]</sup> However, complications can occur, including stent migration, hemorrhage, aspiration pneumonia, and esophagorespiratory fistula formation.<sup>[10]</sup> Prompt recognition and treatment of these complications are essential to minimize morbidity and mortality. In summary, endoluminal esophageal stent placement has emerged as a safe and effective alternative to surgical repair for the management of esophageal perforations. By combining stent placement with appropriate drainage procedures and supportive care, successful outcomes can be achieved in many patients.<sup>[15]</sup> Due to the small patient group in our study and the retrospective design, a comparison regarding the use of stents could not be made. Future studies should aim to provide more data on this subject.

Our study has several limitations, including its retrospective design and relatively small sample size. Additionally, the single-center design limits the generalizability of our findings

to other settings. Future research with larger, multicenter cohorts is needed to further elucidate the factors affecting the management and outcomes of esophageal perforation.

## CONCLUSION

In conclusion, esophageal perforation remains a challenging clinical entity associated with significant morbidity and mortality. To optimize patient outcomes, rapid diagnosis, risk stratification using tools such as the PSS, and tailored management strategies are essential. Multidisciplinary collaboration and a comprehensive treatment approach are crucial in addressing this complex medical issue. Further research is needed to improve diagnostic and treatment algorithms and enhance the overall care of patients with esophageal perforation.

**Ethics Committee Approval:** This study was approved by the Health Sciences Research Ethics Committee (Date: 29.05.2024, Decision No: 2024/28).

**Peer-review:** Externally peer-reviewed.

**Authorship Contributions:** Concept: S.C., M.A.; Design: S.C., M.A.; Supervision: S.C., F.İ., M.A.; Resource: S.C., M.K.; Materials: S.C., M.G.; Data collection and/or processing: S.C., M.K., M.G.; Analysis and/or interpretation: S.C., F.İ.; Literature search: S.C., M.A.; Writing: S.C., F.İ., M.A.; Critical review: M.A.

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## ORİJİNAL ÇALIŞMA - ÖZ

### Özofagus perforasyonu yönetimi: Tek merkezli bir deneyim

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**AMAÇ:** Özofagus perforasyonu, boğazı mideye bağlayan kaslı tüp olan özofagusta bir delik veya yırtığın geliştiği ciddi bir tıbbi durumdur. Bu durum nadirdir ancak mediasten, plevra ve periton dahil olmak üzere çevre dokularda enfeksiyon ve enflamasyona yol açabileceğinden potansiyel olarak yaşamı tehdit eder.

**GEREÇ VE YÖNTEM:** 2014 ve 2022 yılları arasında kurumumuzda tedavi edilen özofagus rüptürü vakaları üzerinde retrospektif bir çalışma yapıldı (18 vaka çalışmaya dahil edildi). Hastanın yaşı, cinsiyeti, risk faktörleri, tanı gecikme, tanı yöntemi, perforasyon bölgesi, perforasyon etiolojisi, tedavi yaklaşımı, komplikasyonlar, hastanede kalış süresi ve sonuç verileri toplandı. Her hasta için Pittsburgh Severity Skoru (PSS) hesaplandı.

**BULGULAR:** Ortalama hasta yaşı 46.33 yıldır ve erkek baskınlığı (%72.2) vardı. Nedenler arasında iyatrojenik (%22.2), yabancı cisim (%50) ve travma (%27.8) yer alırken, perforasyonlar başlıca servikal (%38.9), torasik (%33.3) ve distal özofagusta (%27.8) görüldü. Daha yüksek mortalite yüksek WBC, gecikmiş tanı ve kontrast sızıntısı ile ilişkiliydi ( $p<0.05$ ). BT bulguları ve komplikasyonlar YBÜ’de kalış süresini önemli ölçüde etkilemiş, apse azalmış ve mediastinit artmıştır ( $p<0.05$ ). Yaş, hastanede yatış günü, cinsiyet, etioloji ve tedavi türü gibi diğer faktörler Pittsburg skorlarını anlamlı şekilde etkilememiştir ( $p>0.05$ ).

**SONUÇ:** Özofagus perforasyonu, önemli morbidite ve mortalite ile ilişkili zorlu bir klinik antite olmaya devam etmektedir. Hasta sonuçlarını optimize etmek için hızlı tanı, PSS gibi araçlar kullanılarak risk sınıflandırması ve özel yönetim stratejileri gereklidir.

**Anahtar sözcükler:** Komplikasyonlar; özofagus perforasyonu; pittsburg severity score; YBÜ’de kalma süresi; yönetim.

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