Comment on "Causes and Management of Endoscopic Retrograde Cholangiopancreatography-Related Perforation: A Retrospective Study"

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To the Editor:

I read with great interest the article by Shimizu et al.[1], entitled "Causes and Management of Endoscopic Retrograde Cholangiopancreatography-Related Perforation: A Retrospective Study". This study offers significant value by providing a detailed analysis of complication management in ERCP procedures, based on more than two decades of data from a single institution. The systematic organization of etiology, incidence, and treatment strategies according to the Stapfer classification offers a practical reference for clinical decision-making.

The clear delineation of selection criteria for conservative management, endoscopic intervention, or surgery based on the Stapfer classification is particularly noteworthy and holds strong relevance for facilities seeking to establish or refine treatment algorithms. Furthermore, the analysis of contributing factors—such as the predominance of perforations in elderly patients (aged 70 and above) and the consideration of postoperative adhesions—provides additional clinical insight.

However, it is notable that the study did not report any cases classified as Stapfer Type IV. This subtype, characterized by retroperitoneal emphysema resulting from guidewire misplacement or minor mucosal injury, is typically considered low-grade and amenable to conservative treatment. Since the introduction of the Stapfer classification in 2000, this framework has been widely adopted for categorizing ERCP-related perforations and guiding their management. Type IV perforations are often viewed as occupying a "gray zone," where diagnosis and treatment approaches may vary between institutions.

Liang et al.[2] described Stapfer Type IV as distinct from "true perforations," advising against overtreatment and recommending a cautious approach based on the correlation between imaging findings (retroperitoneal air) and clinical signs of infection. In their case series, even patients with extensive pneumoretroperitoneum and systemic inflammatory responses recovered well with conservative management, underscoring the importance of distinguishing Type IV from more severe perforation types.

Similarly, Plecic et al.[3] reported that two of eight perforation cases (25%) were classified as Type IV and emphasized the essential role of high-resolution CT imaging in improving diagnostic accuracy. Zhou et al.[4] also found that 11 of 76 perforation cases were diagnosed postoperatively via imaging, suggesting that CT implementation timing and criteria can significantly influence classification outcomes.

Furthermore, Al Manasra et al.[5] noted that while most Stapfer Type IV cases are managed successfully without surgery, diagnostic delays or underrecognition may compromise patient outcomes. They highlighted the need for early imaging and heightened clinical vigilance to prevent misclassification or oversight.

In light of these findings, the absence of Stapfer Type IV cases in the study by Shimizu et al. may reflect differences in institutional diagnostic protocols, criteria for CT utilization, or classification practices.

I would therefore be grateful if the authors could provide clarification on the following two points:

1. In your institution, is CT imaging routinely performed in suspected cases of ERCP-related

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perforation, or is it reserved for selected cases based on clinical symptoms and findings?

2. What operational criteria or clinical indicators do you use to diagnose and classify Stapfer Type IV perforations?

I regard the study by Shimizu et al. as a highly informative contribution to the literature, offering not only a clear depiction of ERCP-related perforations but also a thoughtful approach to clinical management. I hope that this correspondence may offer a complementary perspective on Stapfer Type IV perforations and contribute to continued academic dialogue in this area.

I sincerely wish the authors continued success in their important clinical research.

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