Finally, Dr Hadda and colleagues refer to the Charlson index score reflected in Table 2 of our article, which is an average of 3 and 2 points in the development and validation cohorts, respectively. Obviously, it is not possible to have a mean Charlson score adjusted by age of ≤3 points in patients with COPD aged > 70 years because the minimum score in this situation is 4. The explanation is that in Table 2, comorbidity is expressed through the most frequently used version of Charlson index, that is, without age adjustment, because the mean age of the patients in each cohort is included in the same table, and adding the Charlson index score adjusted for age seemed redundant. Conversely, when we referred to the index adjusted by age (less used), it is expressly specified (Table 1, e-Table 1 in our article). In this situation, a mean score of 3 points implies the concurrence of COPD and two other chronic diseases or other more severe disease. Of interest, the increase of comorbidity observed in patients hospitalized for COPD between the ESMI study (most recent) and another previous cohort has been described, highlighting its growing importance in this population.4,5

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Comprehensive Clinical Evidence for Pulmonary Embolism Diagnosis and Workup

Dear Editor:

The article by Nazerian et al1 in this issue of CHEST (see page 950) strives to demonstrate that “multigorgan ultrasonography sensitivity is significantly superior to that of lung, heart, and leg vein ultrasonography alone,” and aims to establish “a diagnostic algorithm based on multigorgan ultrasonography for patients with suspected pulmonary embolism [PE].”2 We itemize some limitations of this report.

First, thoracic ultrasound (TUS) was performed mainly on supine patients, although most of the lesions described were located posteriorly.3 Only 70% of the subpleural lung is visible by TUS,4 and one-half is posterior; a comprehensive workup cannot be mostly focused on the anterolateral chest surface as, seemingly, the authors suggest.5 Orthopnea is a frequent presentation of PE,6 observed in 45% of patients whom we have seen (57 of 127; years 2010-2012) and is due also to associated conditions. To examine patients in the supine or lateral/supine position has no rationale.

Second, “the detection of pulmonary subpleural infarcts, which consist of pleural-based, well-demarcated echo-poor triangular or rounded consolidations of at least 0.5 cm in size” describes a seemingly semiquantitative and subjective overview evaluation; no actual measurement is reported in the results.1 Triangular or rounded TUS images are nonspecific for PE, even when TUS was adequately performed on sitting patients.4,5

Third, the number of patients, number of lesions for each patient, and the total number, as displayed by Nazerian et al1 in Figure 2 of their article, do not seem concordant. Also, the statement “TUS detected some image suggestive of PE in 77 of the 110 patients” sounds very generic.

Fourth, the diagnostic accuracy of a combination of lung, heart, and leg vein ultrasonography for detecting PE was studied. Can the authors describe in how many patients the findings of two or three ultrasonography procedures were suggestive of PE? Actually, the echocardiography results seem to be suggestive of PE in 60 of 110 patients, and leg veins positive for PE on ultrasonography were observed in 57 of the 110 patients. We wonder about the overlap of these observations; that is, in how many patients was there a double or triple positivity for these criteria?

Last, a positive D-dimer level (≥500 ng/mL) was observed in 107 patients with PE (97.3%) and in 187 patients without PE (75.7%). Some information and comment on D-dimer positivity usefulness, if any, is needed. The conclusion implies that diagnostic workup and therapy could be tailored as soon as the patient, although asymptomatic, shows shared US signs. This is speculative and does not improve the reliability and objectivity of the existing best-practice comprehensive approach to PE diagnosis and treatment.

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Drug-Eluting Stents and Noncardiac Surgery

To the Editor:

We were intrigued to read the article by Darvish-Kazem et al. published in CHEST (December 2013) regarding guidelines for the perioperative management of patients with implanted coronary artery stents requiring noncardiac surgery. The review of the guidelines appears to have included some studies that identified an increased risk of major adverse cardiac events at the time of noncardiac surgery, but no studies reporting a decreased incidence of bleeding and stent thrombosis.\(^5\)\(^6\) The Geelong Hospital group first reported the successful use of tirofiban and heparin “bridging” therapy for patients with implanted drug-eluting stents (DESs).\(^2\) Since then, T1 cases of successful perioperative DES management have been described in the literature, including the tirofiban bridging therapy described by the Conroy et al.\(^3\) and Savonitto et al.\(^4\) groups. Including our unreported but recorded experience, >100 patients with DESs and at risk of major adverse cardiac events or perioperative bleeding have successfully received tirofiban or tirofiban and heparin bridging therapy for urgent noncardiac surgery.\(^5\)

The early success of The Geelong Hospital tirofiban and heparin bridging therapy allowed one of our group to recommend this treatment to the Australian and New Zealand Cardiac Society. Correlation Writing Committee, of which he was a member.\(^5\) Thus, despite the lack of uniform international guidelines on this specific topic, there is considerable documented experience in the management of these devices in Australia and Italy that has contributed to national guidelines in Australia and New Zealand. We hope that perioperative stent thrombosis may now be a diminishing problem as the risk/benefit assessment of bare-metal stents and DESs, along with the newer generations of percutaneous coronary artery stents, is reevaluated in elderly patients.\(^3\)

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References


Response

To the Editor:

We thank Drs Bolsin and Gillett for their interest in our article.\(^1\) In our review of the clinical practice guidelines pertaining to perioperative antiplatelet therapy in adult patients with coronary stents, we aimed to address four major clinical questions, including the use of bridging strategies. Five guidelines provided advice regarding the perioperative use of bridging with an anticoagulant or antiplatelet agent. Of these guidelines, only the Cardiac Society of Australia and New Zealand provided a corresponding strength of recommendation and level of evidence with its advice.\(^1\) The society advised that patients at high risk of stent thrombosis who stop dual-antiplatelet therapy should be considered for bridging with either heparin and/or glycoprotein IIb/IIIa antagonists. However, this guidance was based on low-quality evidence from case series, with a weak (Grade B) recommendation that this particular judgment may not apply to a substantial proportion of patients.\(^2\)