



Fig. 1. Pericapsular nerve group (PENG) block sonogram image. FA: femoral artery, IPT: iliopsoas tendon, IPE: iliopubic eminence, LA: local anesthetic, AIIS: anterior inferior iliac spine.

er, as the innervation of the joint is complex, using the same guide points may not always be appropriate [3]. Redirecting the needle can also increase the risk of arterial and venous injuries. In one study, fluoroscopy and USG were used together for hip denervation. After inserting the needle under fluoroscopy, the distance between the needle and vascular structures was measured using USG. A distance of 0.55 cm was observed between the femoral vein and needle tip [5]. Under fluoroscopy, the vessel can be injured with minor redirections of the needle after insertion.

In conclusion, denervation methods should be considered in patients who have hip pain with advanced functional limitations and comorbidities. The articular sensory branches of the femoral and AON may be appropriate targets for hip joint analgesia.

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Received: January 5, 2023; **Revised:** March 6, 2023; **Accepted:** March 18, 2023

Funding: None.

Conflicts of Interest: No potential conflict of interest relevant to this article was reported.

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Korean J Anesthesiol 2023;76(4):389-390

<https://doi.org/10.4097/kja.23015>

Comment on “Effect of total intravenous versus inhalation anesthesia on long-term oncological outcomes in patients undergoing curative resection for early-stage non-small cell lung cancer: a retrospective cohort study”

Dear Editor,

An interesting article published recently in the *Korean Journal of Anesthesiology* by Seo et al. [1] features pertinent research investigating the role of anesthetic immunomodulation on oncological outcomes. This study outlines improved recurrence-free survival (RFS) and overall survival (OS) in the total intravenous anesthesia group compared to the inhalational anesthesia group by analyzing the retrospective data of 1,508 patients with non-small cell lung cancer (NSCLC) undergoing curative resections [1]. While we commend the authors on their research endeavors, the findings must be carefully interpreted in consideration of the following observations.

First, the index analysis did not account for the nutritional status of the participants in the respective study groups. Considering that existing literature associates low serum albumin (SA) levels with poor survival in NSCLC, this is an important omission [2]. A study by Jin et al. [3] highlighted

significantly longer RFS following surgical resection in patients with stage I NSCLC with preoperative SA levels ≥ 3.5 g/dl than in patients with documented hypoalbuminemia (SA < 3.5 g/dl, P = 0.008), and notably, the study by Seo et al. [1] also included the early-stage malignancies.

Second, outcome prediction literature has also delineated the merits of composite immuno-nutritional profiling in oncology. In this context, a meta-analysis conducted by Peng et al. [4] that included a pooled analysis of 11 studies (3,029 patients) evaluating the effect that controlling patients' nutritional status pre-treatment (Controlling Nutritional Status [CONUT] score computed using SA, total cholesterol, and lymphocyte count) had on NSCLC prognosis has attracted attention. A major finding of this meta-analysis was the correlation between a high CONUT score and poor OS and shortened disease-free survival (DFS) or RFS (hazard ratio [HR], 95% CI: 1.63, 1.40, 1.88 and 1.65, 1.35, 2.01; P < 0.001) [4]. Moreover, the CONUT score continued to predict poor OS in the subgroup analysis, regardless of the treatment modality (surgical or non-surgical). The fact that 9 out of 11 of the studies employed surgical resection as the central treatment modality is worth mentioning, as the study conducted by Seo et al. was limited to patients undergoing curative resections [1,4].

Lastly, it is equally difficult to overlook the prognostic implications that patient frailty has on surgical outcomes, particularly in early-stage cancers, as Shaw et al. [5] have emphasized. We hope that this discussion will motivate well-designed future research aimed at further clarifying the links between anesthetic immunomodulation and oncological outcomes.

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Received: January 7, 2023; Accepted: February 3, 2023

Funding: None.

Conflicts of Interest: No potential conflict of interest relevant to this article was reported.

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Korean J Anesthesiol 2023;76(4):390-391

<https://doi.org/10.4097/kja.23017>

General anesthesia using remimazolam and remifentanyl in combination with local anesthetics without neuromuscular blocking agents in a patient with myotonic dystrophy

Patients with myotonic dystrophy (MD) have greater sensitivity to general anesthetics and neuromuscular blocking (NMB) agents; therefore, critical issues associated with general anesthesia have been reported, such as delayed emergence from anesthesia and postoperative cardiovascular and respiratory complications [1]. As volatile anesthetics may induce malignant hyperthermia in patients with MD [2], total intravenous anesthesia (TIVA) is commonly used for general anesthesia in this patient population. However, propofol, which is commonly used in TIVA, may induce delayed emergence from anesthesia and respiratory depression even at low maintenance doses in this population [1,3]. Morimoto et al. [3] reported that the effect-site propofol concentration at which patients with MD recovered from anesthesia was lower than the institutional average for healthy adults, suggesting that sensitivity to propofol might be higher in patients with MD.

Remimazolam is a benzodiazepine receptor agonist that was approved as a general anesthetic in Japan in 2022. This ultrashort-acting anesthetic can produce hemodynamic stability with a fast onset and offset and can be fully antagonized with flumazenil. Herein, we report the successful anesthetic management of a patient with MD using remimazolam and remifentanyl with local anesthetics, without NMB agents, as a preventive measure for delayed emergence from anesthesia and postoperative respiratory failure. Written informed consent was obtained from the patient for publication of this case.

A 59-year-old man with a one-year history of MD was scheduled to undergo temporomandibular joint arthroplasty. His MD symptoms included eyelid dropping, mild anarthria, and mild lower-extremity muscle weakness. He was also diagnosed with a complete