

## Preanesthetic Assessment Clinic: Early Beginnings in the Bronx

*To the Editor:*

The article in the August 2016 issue of *ANESTHESIOLOGY*, “Preoperative Evaluation Clinic Visit Is Associated with Decreased Risk of In-hospital Postoperative Mortality” by Blitz *et al.*,<sup>1</sup> brought back memories of my attempts at founding a preanesthetic clinic in the Bronx more than 40 yr ago.

With the help of an internist, Dr. Richard Collens, I started a program at the Bronx Municipal Hospital Center (New York City, New York), initially designed to help women. After leaving their children at school, women scheduled for surgery would come to the hospital where I would discuss their anesthesia with them, order appropriate tests, and perform a physical examination. Later in the day, they would return to see me as it was convenient for them, and I would discuss the results of their tests and we would schedule them for surgery. Patients quickly realized what they could expect, especially that they did not have to come in ahead of time for tests, and moreover, they did not have to spend longer postoperative time in the hospital. They actually told their surgeons that they were ready to go home now! Whenever possible, I either anesthetized the patients or followed up with them in the recovery room or telephoned them at home. The program was expanded to all patient populations within a few weeks. The program was also used by Bronx high school students as a type of elective to observe and follow patients.

Within 3 yr, we had gathered data on more than 3,500 patients. Inpatient hospital days were reduced in some cases by as much as 7 days. The situation was becoming critical for the hospital, and I was summoned to the director’s, Dr. Leonard Piccoli, office. He insisted that I close the clinic immediately as the hospital was losing money because there were so many empty beds; he would have to lay off personnel and even close Van Etten Hospital (an extension of Jacobi Hospital, New York City, New York). I was stunned as I believed after hearing so many comments from patients that we were doing a good service. As luck would have it, I shared a common driveway with the editor-in-chief of the *New York Times*, Seymour Topping. I took my story to him. He agreed it was a worthwhile program, and he sent one of his chief writers, Jane Brodie, to talk to me. The next day, the article on the clinic was the front-page news on the *New York Times*. Certain that my career had come to an end, I waited to hear from the director. Sure enough the next day, I awoke to the radio at 6:30 AM. Mr. Piccoli was explaining about the wonderful new program that had been started in the Bronx. That morning I went to his office and most apologetically told him that I could not see the firing of so many people

and I would close the clinic right away. In a panic, he ranted that I could not do that as Heraldo Rivera, one of the most outspoken journalists in New York, as well as several other reporters were coming that day to interview him and see the clinic. Again, I expressed my reluctance to cause economic difficulties. He insisted that I must keep the clinic going. Finally I capitulated, but only as long as he gave the Department of Anesthesiology \$10,000/yr to run the program. And so the preanesthetic assessment clinic was established in the Bronx and became the precursor for the ambulatory center. Mr. Topping, who is now 92 yr, still remembers the incident with glee.

A lead article appeared in *Anesthesia and Analgesia* the following year.<sup>2</sup> The study also merited an editorial comment as I recall.

I do not doubt that mortality is decreased as Blitz *et al.*<sup>1</sup> show, “...shorter stays in hospital are always a good idea.” Also, empowering patients to understand what they might expect and involving them in their own care are situations that are invaluable.

### Competing Interests

The author declares no competing interests.

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### *In Reply:*

We thank Dr. Frost for sharing her personal experience with founding a preoperative evaluation clinic, and we wish to acknowledge her contributions to the field of preoperative medicine.<sup>1</sup> Her story highlights that the concept of anesthesiologists as leaders of successful healthcare redesign projects is not new. Moreover, efforts to improve important determinants of perioperative outcomes such as patient engagement, interdepartmental collaboration, and value-based care have always been an integral part of our specialty. While Dr. Frost and others<sup>1–3</sup> have demonstrated an improvement in perioperative efficiency through the use of an outpatient preoperative evaluation clinic, Rathmell and Sandberg<sup>4</sup> suggest in their recent editorial view that there is new opportunity for anesthesiologists to welcome process engineers and other systems experts to our collaborative perioperative care redesign teams to maximize our impact on patient outcomes.

Our study was motivated by the desire to better understand the impact that our preoperative evaluation clinic was having on the perioperative outcomes of patients at our institution.<sup>5</sup> We believe that the value of the preoperative evaluation clinic lies in its ability to improve the quality of the preoperative preparation process. We appreciate Dr. Frost's account because it emphasizes the power of patient engagement and that recognition of the preoperative evaluation clinic's value by senior administration can be a potentially powerful force for change.

### Competing Interests

Dr. Jain served as an expert case reviewer for Dopf, P.C. (New York, New York) and Schiavetti, Corgan, DiEdwards, Weinberg and Nicholson, LLP (New York, New York). The other authors declare no competing interests.

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## Rapid Fluid Infusion and Depth of Anesthesia

To the Editor:

We read with great interest the recent article by Itakura *et al.*<sup>1</sup> The authors clearly demonstrated a decrease in plasma propofol concentration during rapid fluid infusion, especially hydroxyethyl starch. Several studies have evaluated cardiovascular effects on plasma propofol concentrations and proposed mechanisms for a decrease in drug concentration.<sup>2–4</sup> Itakura *et al.*<sup>1</sup> emphasized the effect of increased metabolic clearance of propofol. It was suggested that rapid fluid infusion would decrease the blood concentration of drugs during target-controlled infusion and recommended that anesthesiologists increase propofol infusion rates up to two times during rapid infusion. However, rapid fluid

infusion may affect propofol pharmacodynamics as well as pharmacokinetics.<sup>5</sup> Hemodilution secondary to rapid fluid infusion might enhance the hypnotic activity of propofol despite decreasing plasma concentration.<sup>4,6</sup> Propofol pharmacodynamics may vary due to many factors, including cardiac output, metabolic rate, and hemodilution (which results in anemia and hypoalbuminemia).<sup>5,7</sup> The free propofol percentage is modified by fluid infusion.<sup>8</sup> Propofol and hydroxyethyl starch might form a complex and potentially result in a clinically important interaction.<sup>9</sup> Thus, the conclusions of Itakura *et al.*<sup>1</sup> may need some revision.

Although target-controlled infusion techniques are available for patients with various medical conditions,<sup>10</sup> practitioners should focus more on maintaining the appropriate depth of anesthesia than on maintaining a constant plasma concentration of propofol. It is surprising therefore that Itakura *et al.*<sup>1</sup> conducted the study without evaluating depth of anesthesia. Further investigations of the effects of rapid fluid infusion on the pharmacodynamics of propofol and depth of anesthesia may be informative.

### Competing Interests

The authors declare no competing interests.

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