



Perceptions, Relationship, and Management of Morbidly Obese Patients and the Role of Robotic Surgery

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Letter to the Editor

“I can’t remember what difficulties I had when I operated on obese patients by laparoscopy.” This statement heard after a robot-assisted hysterectomy for a patient with a high body mass index (BMI) reminds us, surgeons, how robotic surgery has changed our perception of obesity.

Our institution, Pitié-Salpêtrière University Hospital, is a national multidisciplinary referral center for the treatment of obese patients with complex gynecologic pathologies. In our robotic surgery center, more than 500 procedures are performed yearly. Our gynecological surgery department is facing various challenges in the surgical management of gynecological pathologies in this population. It is well established that healthcare providers hold strong negative attitudes and stereotypes for obese patients. There is evidence that such attitudes influence person-perceptions, judgment, interpersonal behavior, decision, and finally the quality of provided care [1]. In Europe, the prevalence of obesity is still lower than in the USA and this reality may explain why our view of obese patients remains prejudiced.

Obesity is a major health problem worldwide and its prevalence is on the rise. The World Health Organization (WHO) defines obesity as a body mass index (BMI) superior to 30 kg/m². Morbid obesity or BMI more than 40 kg/m² is responsible for a significant augmentation of perioperative and postoperative morbidity and remains the main challenge

affecting medical or surgical management, but also the quality of the physician-patient relationship [2–4]. When asked physicians to rank a dozen of social and disease characteristics to which they responded most negatively, they ranked obesity fourth, after drug addiction, alcoholism, and mental illness [5]. Caregivers unconsciously consider obesity to be due to laziness, self-indulgence, lack of intelligence, and lack of self-control [5]. This negative attitude towards obese patients, also called “anti-obese bias” is frequently reported. Obese patients complain that they feel misunderstood and abused by the medical and paramedical teams caring for them, including when it comes to treat them for their obesity [6]. The fact that obese patients are from socially underprivileged backgrounds and the perceptions commonly associated with obesity would probably increase these feelings of abuse. Overweight patients have reported delaying or avoiding interaction with the health care system because of “not wanting to get on the provider’s scale” and “knowing they would be told to lose weight” [7]. An important factor contributing to the feeling of medical abuse is the lack of specific equipment [8]. Poor compliance with screening and vaccination in this population was also observed [9]. The management of obese patients often requires specific skills, materials, and organization. Why would it be different in the operating theater?

Performing minimally invasive surgery for superobese patients is a challenge because of the increased risk of conversion despite the proven benefits of reducing the postoperative complications, more severe in this population [10]. The fear of surgical complications and the surgeon’s ergonomics during the procedure contribute to a feeling of insecurity for surgeon. This may considerably affect the decision of treatment and the quality of care. It has been shown that obese patients suffer from suboptimal route of surgery. In 2018, Loaec et al. showed that for the management of endometrial cancer, patients with morbid obesity had a risk of under treatment (renunciation of a lymphadenectomy when indicated) in 40% of cases [3]. For benign cases, mistreatment and surgery refusal is more pronounced despite an important clinical benefit such as chronic pelvic pain relief or chronic anemia treatment.

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As for medical equipment, minimally invasive surgical tools need to be adapted to this challenging population. Robot-assisted surgery has specifically shown its benefits for the treatment of superobese patients, particularly in reducing the conversion rate to laparotomy [4], thus maximizing the benefits of minimally invasive surgery and reducing postoperative complications. The additional technical improvements make the robot more effective in this population: The use of the fourth arm enables the surgeon better exposure and reduces the need for higher pressure pneumoperitoneum and steeper Trendelenburg angles [4]. The absence of the fulcrum effect, often seen in conventional laparoscopy, allows the surgeon to perform fine and precise dissections in narrow spaces. The 3D vision and the dexterity of the instruments mitigate the dissection difficulties. Finally, performing the surgery seated at the console improves the ergonomic for the operator and reduces the fatigue and musculoskeletal pain [11].

These advantages appear to bring clinical benefit for these patients. There would be no further complication when performing a robotic-assisted laparoscopic hysterectomy for patients with a BMI > 40 kg/m² compared to those with a BMI < 30 kg/m² [12]. The conversion rate would be lower by robot-assisted surgery than by traditional laparoscopy [4]. Moreover, by decreasing the rate of laparotomy, a robotic approach would provide significant health and cost benefits in this obese population [2].

A “obese-friendly” attitude, while important for the patient, should not lead to neglecting medical perspectives aiming to decrease the risks associated with obesity and to improve the long-term health benefits of weight loss. Surgeon should strive to educate sensitively the patients about the benefits of weight loss and its associated improvement of gynecological symptom such as menorrhagia, infertility, and endometrial hyperplasia [13], and surgery should be the last resort if medical treatments fail. When considering surgical management in obese, the robot enables surgeons to offer a confident discussion regarding the risks associated with obesity and the measures to accompany weight loss.

In conclusion, we strongly believe that robotic surgery may enhance the global management of superobese patients and their well-being. It offers multiple benefits including better ergonomics [11], perioperative safety, and reduction of surgical complications. It is our obligation to provide optimal care for this patient population and have specialized personnel and centers of excellence equipped with state-of-the-art devices to improve the value of care we provide to this subset of patients.

Compliance with Ethical Standards

Conflict of Interest H.A. reports no conflict of interest.

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