

Combination of video-assisted thyroid surgery and hypnosis as a full minimally invasive approach

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Introduction: In selected patients, video-assisted thyroidectomy (VAT) fully adheres to the principles of conventional surgery with equivalent safety to the patient. It is generally carried out under general anaesthesia (GA). Thyroidectomy under hypnosis (HY) as an alternative to GA has been shown to be effective. However, the combination of VAT and HY, as a complete minimally invasive approach, has not yet been reported. The aim was to investigate the feasibility and safety of performing VAT in combination with HY.

Methods: Between January 2010 and December 2011, 130 patients were selected for VAT according to size criteria. Eighty patients opted voluntarily for GA and 50 patients for HY associated with local anaesthesia. Anaesthesia was standardized in each group of patients.

Results: The 2 groups were comparable in terms of age, sex and primary disease. Total thyroidectomy was performed in 53.75% and 56% of cases in the GA and HY groups respectively. The remaining patients underwent thyroid lobectomy. Operating time was significantly longer in the HY group than the GA group. No significant difference between groups was observed in time spent in the operating room. Intraoperative bleeding was significantly higher in the HY group than the other group. Significant differences were observed for blood pressure parameters and heart rate during surgery. Maximal and minimal systolic, mean and diastolic blood pressure and maximal and minimal heart rate were significantly lower in the GA group than the HY group of patients. After surgery, blood oxygen desaturation was observed in one patient in the HY group and 10 patients in the GA group. Conversion to open conventional approach occurred in one and 4 patients in the GA and HY groups, respectively. One patient in the GA group experienced postoperative bleeding, requiring surgery. In the HY and GA groups respectively, 98% and 77.5% of patients required just one overnight stay in hospital. Postoperative calcemia was significantly lower in the GA group than the HY group. There was no permanent RLN palsy or permanent hypoparathyroidism in either group.

Conclusion: The combination of video-assisted thyroid surgery and hypnosis is feasible without additional morbidity. The success relies, in one hand, on the ability of the patient to cooperate with the anesthetist and a motivated anesthetist trained in HY techniques. In the other hand, combined skills in VAT and surgery under HY are two prerequisite conditions for the surgeon.

Biography

Michel Mourad was graduated as a doctor in 1987 from the Catholic University of Louvain Medical School in Belgium. He achieved his postgraduate surgical training in several European Universities in Belgium and France. He has completed his Ph.D. in the field of pharmacokinetics of immunosuppressive drugs in 2002. He is the head of the kidney and pancreas transplantation and endocrine surgery division in Saint-Luc University Hospital in Belgium. His research program includes pharmacokinetics/pharmacogenetics relationship of immunosuppressive drugs, minimally invasive endocrine surgery and surgery under hypnosis.

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