

# Surgical and Clinical Risk Factors of Postoperative Hypocalcemia after Total Thyroidectomy

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## Letter to the Editor

Total thyroidectomy is one of the most common endocrine surgeries and postoperative hypocalcemia is a champion among the troubles for thyroidectomy. The incidence of postoperative hypocalcemia is reported ranging from 1.6% to 53.6%. A study by Nellis et al., [1] showed that the disorders of magnesium metabolism are an independent risk factor for postoperative hypocalcemia as increased calcium receptor sensitivity in the setting of low magnesium levels inhibits parathyroid secretion. In most of the multivariate analysis, lack of experience by the surgeon is also considered as a major risk factor.

Grubbs et al., [2] used a gamma probe to identify parathyroid glands tagged with sestamibi during central neck compartment surgery thereby helping in maximize parathyroid preservation. Cheng et al., [3] in a meta analysis concluded the use of variety of ultrasonic devices in thyroidectomy as superior to conventional procedures for most outcomes including faster operative time, less blood loss and postoperative hypocalcemia. Yu et al., [4] revealed that the potential use of carbon nanoparticle injection decreases the number of cases with accidental removal of parathyroid gland and thereby decreasing transient hypocalcemia postoperatively.

This article was worth reading as postoperative hypocalcemia is a very relevant topic in postgraduate training. However, conducting a multicentric study with a larger population considering various surgical, patient related, disease related and laboratory risk factors is very essential for future studies and better patient care.

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