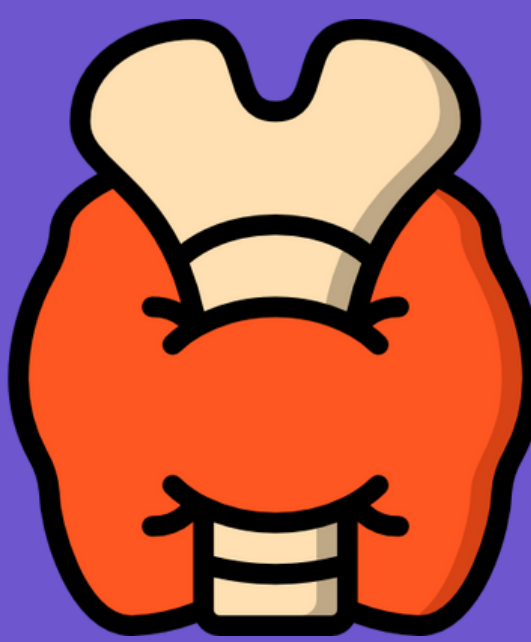




AGE-RELATED TRENDS OF THYROIDECTOMIES IN SAUDI ARABIA: A MULTICENTER RETROSPECTIVE STUDY



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INTRODUCTION

Saudi Arabia follows the global increase in aging population. Understanding the relationship between aging and post-operative complications is critical because it may influence how the condition is managed. The safety of thyroidectomy in the older age group is debated in literature. All previous studies were conducted outside of the Middle East, and there is a scarcity of data in the literature describing the relationship between age and postoperative outcomes after thyroidectomy. This study aimed to compare the clinical trends of patients undergoing thyroidectomy between younger and older age groups.

METHODOLOGY

- A multicenter retrospective study was conducted at 3 tertiary care centers in Jeddah, Saudi Arabia.
- Inclusion criteria: patients of all ages of both sexes who underwent thyroidectomy.
- Patients were divided into 2 age groups, <60 years and ≥60 years.
- Chi-square test and independent t-test were used to evaluate the differences between qualitative and continuous variables.

RESULTS

- 798 patients were included in this study. The <60 years age group was comprised of 81% females and 19% males, compared to 63.4% females and 36.6% males in the ≥60 years age group ($P<0.001$).
- The ≥60 years age group had a statistically significant longer mean postoperative length of hospitalization (5.37 ± 7.21 days) compared to the <60 age group (3.33 ± 4.24 days) ($P=0.003$).
- 14.4% of the patients in the <60 years age group developed at least one postoperative complication compared to 17.9% of the patients in the ≥60 years age group ($P=0.385$).
- Seroma and recurrent laryngeal nerve injury occurred more commonly in the ≥ 60 years age group compared to the <60 years age group with a statistically significant difference ($P=0.003$ and $P<0.001$, respectively).
- In contrast, hypocalcemia occurred more commonly in patients of the <60 years age group with a statistically significant difference ($P=0.044$).

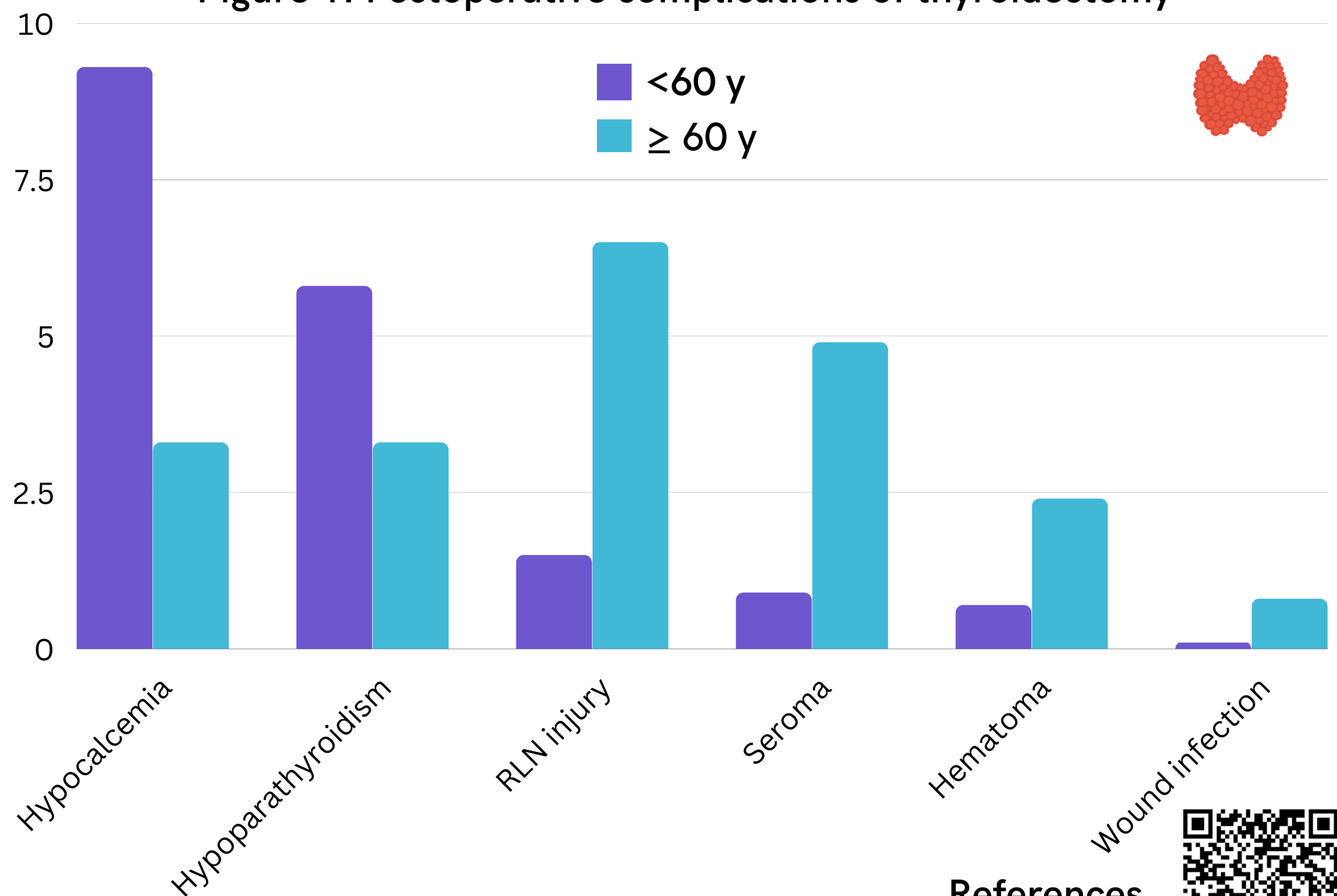
CONCLUSION

- Certain complications were more likely to develop in the older age group which requires vigilance from surgeons performing thyroidectomy.
- Length of hospitalization was significantly longer in the older population.
- Awareness of complications and challenges of thyroidectomy in the older age group is crucial to improve care.

Table 1. Demographic and other characteristics of thyroidectomy patients

Characteristic	Overall (n=798)	<60 y (n=675)	≥ 60 y (n=123)	P-value
Age	44.00 ± 14.38	39.85 ± 11.19	66.82 ± 6.17	<0.001
Gender, %				<0.001
Male	21.7	19	36.6	
Female	78.3	81	63.4	
Thyroidectomy type, %				0.423
Total	70.6	69.6	75.6	
Hemithyroidectomy	25.8	26.7	21.1	
Completion	3.6	3.7	3.3	
Type of disease, %				1.000
Benign	53.2	53.3	52.8	
Malignant	46.8	46.7	47.2	
Length of hospitalization, in days				0.003
	3.64 ± 4.87	3.33 ± 4.24	5.37 ± 7.21	
Operative time, in minutes				0.081
	176.55 ± 72.17	178.79 ± 71.11	161.92 ± 77.76	

Figure 1. Postoperative complications of thyroidectomy



References

