



## THYROID CANCER

### Prevalence of thyroid cancer found in autopsy studies has not increased since 1970

#### BACKGROUND

Thyroid cancer is the most common endocrine cancer. Unlike most other cancers, the incidence of thyroid cancer has reportedly been rising and it is the fastest rising cancer diagnosed in women in the last few years. However, it is unknown whether this increased incidence can be explained by better detection techniques or represents a true increase in the cancer across the world. Prior studies of autopsies done on people who died of non-thyroid-related causes have shown that thyroid cancer is a rather common finding. If the incidence of thyroid cancer has increased, recent autopsy studies should reflect this. This study reviewed all recently reported autopsy studies to determine if there is truly a rising incidence of thyroid cancer.

#### THE FULL ARTICLE TITLE

Furuya-Kanamori L et al. Prevalence of differentiated thyroid cancer in autopsy studies over six decades: a meta-analysis. *J Clin Oncol*. September 6, 2016 [Epub ahead of print].

#### SUMMARY OF THE STUDY

The authors looked at all recent thyroid cancer autopsy papers in the literature and combined their data to perform a meta-analysis. The final number of papers included was 35 and the final number of patients 12,834,

with 40% of the autopsies in females. The authors found that the rate of thyroid cancer in an autopsy specimen was dependent on how thoroughly a thyroid specimen was examined. The more thorough a thyroid was examined the more likely it was to have a thyroid cancer found in it. The overall incidence of thyroid cancer in autopsy specimens ranged from 4-11%. There was no difference in the rate of thyroid cancer found in autopsy specimens over time, meaning there was a constant rate of thyroid cancer and an “increase” was not seen.

#### WHAT ARE THE IMPLICATIONS OF THIS STUDY?

This study suggests that, since the rate of thyroid cancer found on autopsy over the years has been stable, the incidence of thyroid cancer is really not increasing around the world. Instead, this study indicates that the increasing rate of diagnosis of thyroid cancer is most likely due to better detection techniques. This study also shows that thyroid cancer is a common finding at autopsy and that the closer you look, the larger the chance that you will find it. Further, this study suggests that it is relatively rare for most thyroid cancers to become clinically important.

— Melanie Goldfarb, MD

#### ATA THYROID BROCHURE LINKS

Thyroid Cancer: <http://www.thyroid.org/thyroid-cancer/>

#### ABBREVIATIONS & DEFINITIONS

**Papillary thyroid cancer:** the most common type of thyroid cancer. There are 3 variants of papillary thyroid cancer: classic, follicular and tall-cell.

**Meta-review:** a study that combines and analyzes the data from several other studies addressing the same research hypothesis.

**Autopsy:** a detailed examination of all of the tissues and organs of the body after a person dies to determine why that person died