### **BIOGRAPHICAL SKETCH**

Provide the following information for the Senior/key personnel and other significant contributors. Follow this format for each person. DO NOT EXCEED FIVE PAGES.

### NAME: Toni Beninato

eRA COMMONS USER NAME (credential, e.g., agency login): tbeninato

POSITION TITLE: Associate Professor, Department of Surgery, Rutgers Cancer Institute of New Jersey, Rutgers Robert Wood Johnson Medical School.

EDUCATION/TRAINING (Begin with baccalaureate or other initial professional education, such as nursing, include postdoctoral training and residency training if applicable. Add/delete rows as necessary.)

INSTITUTION AND LOCATION	DEGREE (if applicable)	Completion Date MM/YYYY	FIELD OF STUDY
New York University, New York, NY	BA	05/2004	Biology
Rutgers – New Jersey Medical School, Newark, NJ	MD	05/2008	Medicine
New York Presbyterian Hospital – Weill Cornell Medicine, New York, NY	Residency	06/2015	Surgery
University of California, San Francisco, San Francisco, CA	Fellowship	06/2016	Endocrine Surgery
Cornell University, New York, NY	MS	05/2019	Health Policy and Economics

## A. Personal Statement

I am an Associate Professor of Surgery and Public Health, and my research focuses on insurance-based disparities in patients with endocrine surgical disease. I have a Masters in Health Policy and Economics, which has improved my expertise in working with large data and the influence of policy on certain outcomes. Much of my research has focused on the association of the Affordable Care Act on access to appropriate surgical care for thyroid cancer and benign endocrine surgical disease as well as access to high volume institutions. Thyroid cancer care is costly, and mostly performed by low-volume surgeons. Multiple studies have shown the benefits of surgical care by high volume surgeons in terms of perioperative morbidity and mortality, but the association of volume with textbook oncologic outcomes in thyroid cancer remains unknown. There has been a push for centralization of care for patients with cancer undergoing high-risk procedures, but whether this has happened, or its association with outcomes is also unknown. This study builds on my prior work by examining the distribution of Medicare patients with thyroid cancer among high and low volume centers in the United States and examines textbook oncologic outcomes in terms of pre- and post-operative treatment and surveillance, appropriate use of surgical therapy, and survival data.

#### **Research Support**

NY State Empire Clinical Research Investigator Award\$150,00001/2018-01/2020PI: Rainu Kaushal, MD, MPHThe goal of this grant is salary and training support for predictive modelingPrincipal Investigator, Percent Effort: 60%

# B. Positions and Honors

# Positions and Employment

2016-2020	Assistant Professor, Department of Surgery, Weill Cornell Medicine, New York, NY
	Assistant Attending Surgeon, New York Presbyterian Hospital – Weill Cornell Medical
	Center
	Attending Surgeon, New York Presbyterian Brooklyn Methodist Hospital
2020-2022	Assistant Professor, Department of Surgery, Rutgers Cancer Institute of New Jersey,
	Rutgers Robert Wood Johnson Medical School.
2022-present	Associate Professor, Department of Surgery, Rutgers Cancer Institute of New Jersey,
	Rutgers Robert Wood Johnson Medical School.

## Other Experience and Professional Memberships

2018-	Fellow, American College of Surgeons
2018-	Member, American Association of Endocrine Surgeons
2016-	Member, Association of Women Surgeons
2017-	Member, Association for Academic Surgery
2018-	Member, American Thyroid Association

# C. Contribution to Science

- The main focus of my research is in disparities in the diagnosis and treatment of patients with endocrine surgical diseases, particularly in relation to insurance status. My more recent research investigates the association of policy and guidelines on practice patterns in patients with endocrine surgical diseases. I am particularly interested in disparities in access to care for patients with endocrine surgical diseases and specifically the association of the Affordable Care Act with access to care for these patients.
  - a. Manzella A, Kheng M, Chao J, Laird AM, **Beninato T**, "Association of Medicaid Expansion with Access to Thyroidectomy for Benign Disease at High Volume Centers." *Accepted as a poster presentation at the American Association of Endocrine Surgeons Annual Meeting, Birmingham, AL, April 29-May 1, 2023.*
  - b. Kheng M, Manzella A, Chao J, Laird AM, **Beninato T.** "Evolving incidence trends of papillary thyroid carcinoma diagnosis across race and socioeconomic status: a joinpoint regression analysis." *Accepted as a poster presentation at the American Association of Endocrine Surgeons Annual Meeting, Birmingham, AL, April 29-May 1, 2023.*
  - c. Manzella A, Laird AM, **Beninato T**. "Association of Medicaid Expansion of the Affordable Care Act with Access to Surgery for Benign Endocrine Surgical Disease." Am J Surg. 2022 Oct 25. Online ahead of print.
  - d. Thiesmeyer JW, Limberg J, Ullmann TM, Greenberg JA, Egan CE, Moore M, Finnerty BM, Laird AM, Zarnegar R, Fahey TJ 3<sup>rd</sup>, **Beninato T**. "Insurance Type is Associated with Appropriate Use of Surgical and Adjuvant Care for Differentiated Thyroid Carcinoma." Surgery. 2022 Jan;171(1):140-146.Additional research has examined trends in treatment patterns for endocrine surgical disease associated with the release of guidelines or public health events, such as the COVID-19 pandemic.
- 2. My thyroid cancer research has focused on outcomes in patients with various characteristics and subtypes of thyroid cancer, with the aim of better identifying features that would predict more aggressive tumor behavior. The research on the tall cell variant of papillary thyroid carcinoma found that even a small percentage of these cells can be associated with a more aggressive tumor. In contrast, our research on the follicular variant of papillary thyroid carcinoma was one of the early studies that contributed to the well-encapsulated variant to recently have been "downgraded" from a cancer. My more recent work has continued to examine the outcomes of patients with more rare subtypes of thyroid cancer to better help clinicians appropriately risk-stratify these patients.

- a. Limberg J, Ullmann TM, Stefanova D, Buicko JL, Finnerty BM, Zarnegar R, Fahey TJ 3<sup>rd</sup>, Beninato T. "Does Aggressive Variant Histology Without Invasive Features Predict Overall Survival in Papillary Thyroid Cancer? A National Cancer Database Analysis." Ann Surg. 2021 Sep 1;274(d):e276-e281.
- b. Stefanova DI, Bose A, Ullmann TM, Limberg JN, Finnerty BM, Zarnegar R, Fahey TJ 3<sup>rd</sup>, Beninato T. "Does the ATA risk stratification apply to patients with papillary thyroid microcarcinoma?" World J Surg. 2020 Feb;44(2):452-460
- c. Beninato T, Kluijfhout WP, Drake FT, Khanafshar E, Gosnell JE, Shen WT, Duh QY, Suh I. "Squamous Differentiation in Papillary Thyroid Carcinoma: a Rare Feature of Aggressive Disease" J Surg Res. 2018 March;223:39-45.
- d. **Beninato T,** Kluijfhout WP, Drake FT, Suh I, Shen WT, Duh QY, Clark OH, Gosnell JE. "Preoperative Diagnosis Predicts Outcomes in Patients with Both Medullary and Papillary Thyroid Carcinoma." World J Endoc Surg 2017;9(3):94-99.

# Complete List of Published Work in MyBibliography:

https://www.ncbi.nlm.nih.gov/sites/myncbi/1X7Wjqhhclkj/bibliography/50717445/public/?sort=date&direction=ascending.