

Screening Mammograms in Palpable Breast Cancers Delays Time to Treat

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Introduction

- Diagnostic imaging is recommended for the workup of palpable breast masses. Screening mammograms are inappropriate in the setting of a breast complaint and clinical breast exams are recommended prior to any mammogram. ^{1,2,3,4,5}
- Some studies suggest that delays in treatment of breast cancer can lead to worsened survival outcomes. ^{6,7,8,9}
- It is uncertain if type of mammogram ordered for a palpable breast cancer affects time to biopsy or treatment.

Objectives

Determine if type of initial imaging ordered for palpable breast cancers affected time to biopsy and treatment.

Methods

- IRB Approved
- Retrospective Chart Review
- Institutional Tumor Registry
- January 1, 2016 – December 31, 2016
- All palpable breast cancers were reviewed
 - All patients included had a physical exam performed by the breast surgeon prior to biopsy
 - Biopsies were performed by the breast surgeon
- Excluded patients with external imaging, Stage IV disease, invasive biopsies
- Data Variables Collected
 - Patient Ages
 - Date of Initial Imaging
 - Date of Core Biopsy
 - Date of Diagnosis
 - Date of Initial Treatment
 - Systemic Neoadjuvant Chemotherapy or Hormonal Therapy
 - Surgery
 - Clinical Breast Exam documentation

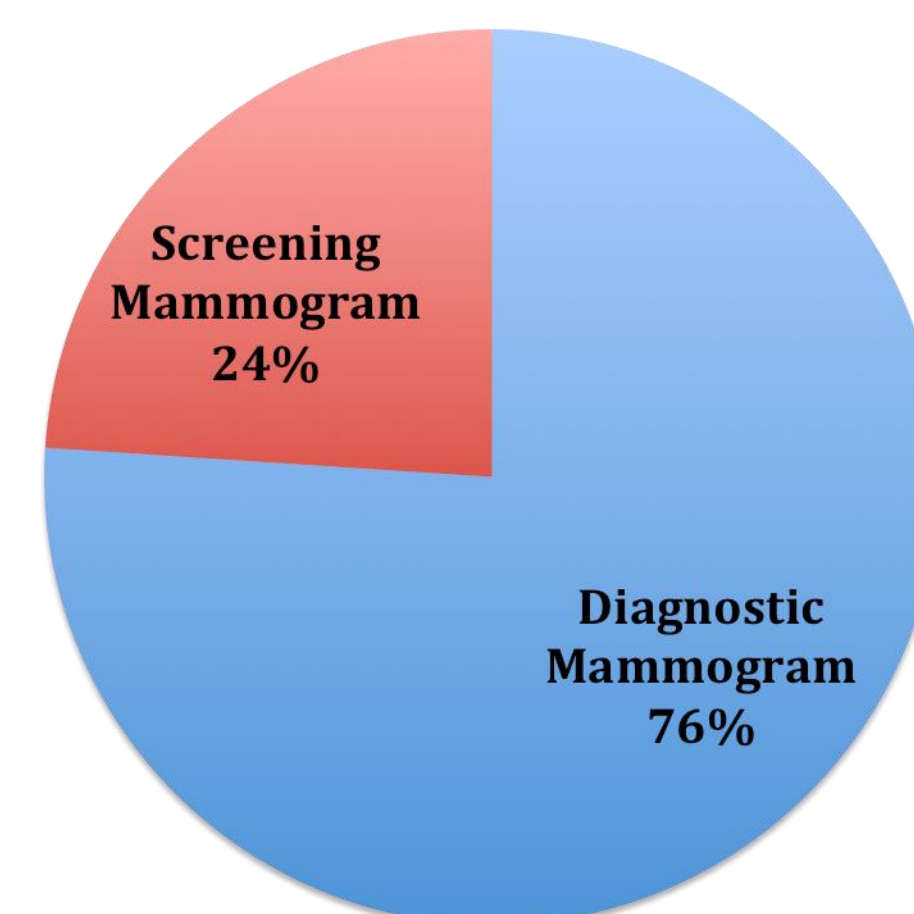
Results

96 patients with a palpable breast cancer were included for analysis

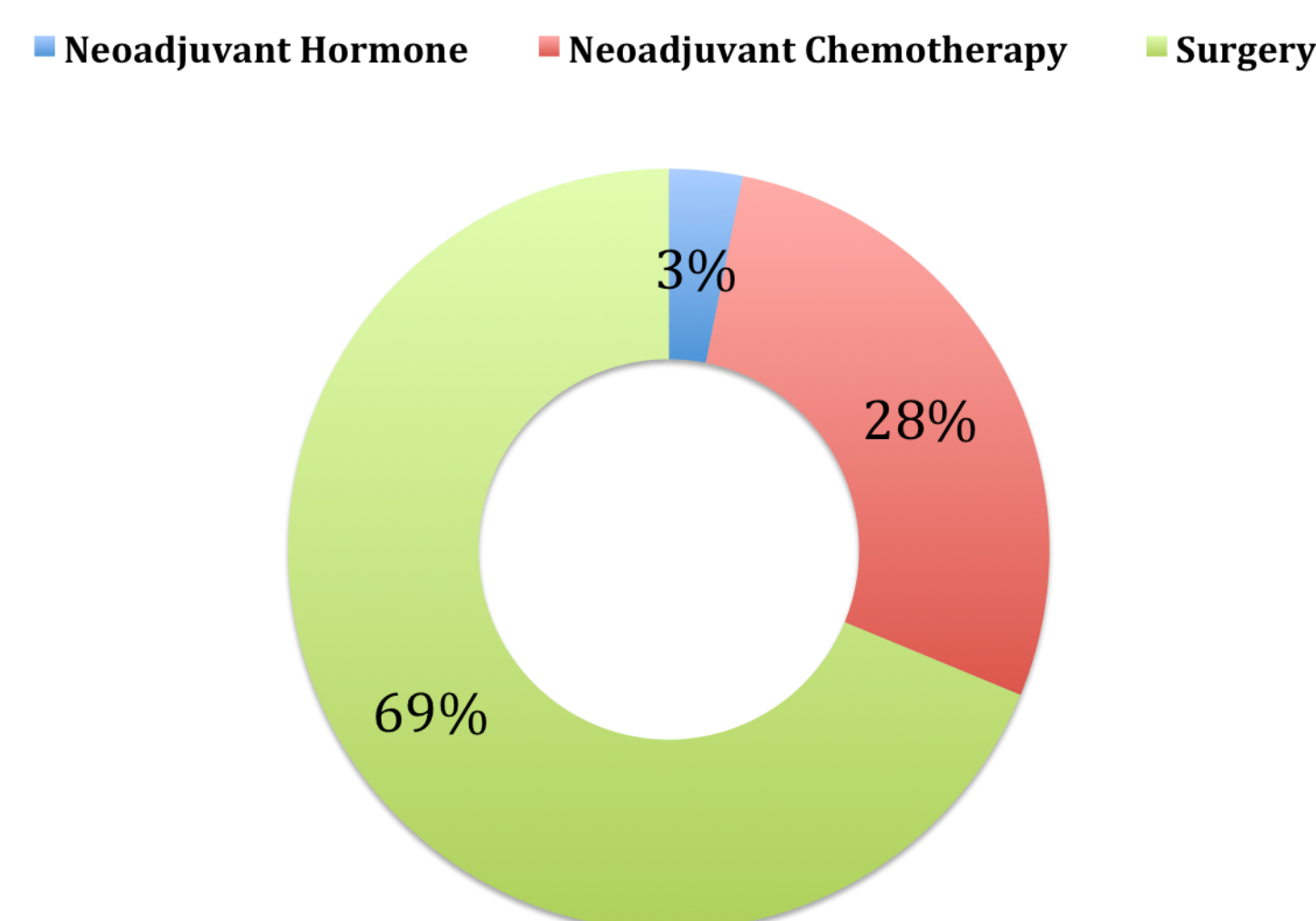
Median Age was 64.5 years (30-92)

Results

Type of Initial Imaging Performed

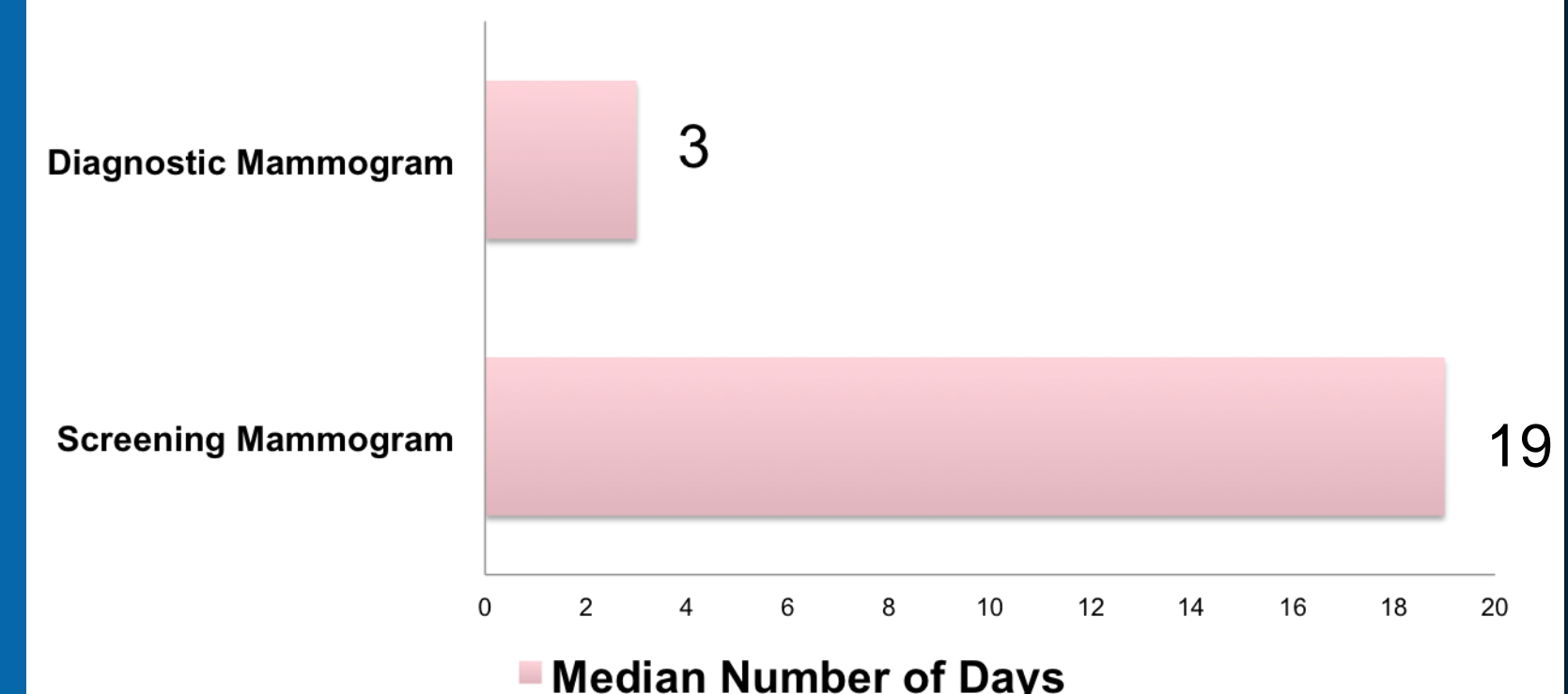


Type of Initial Treatment

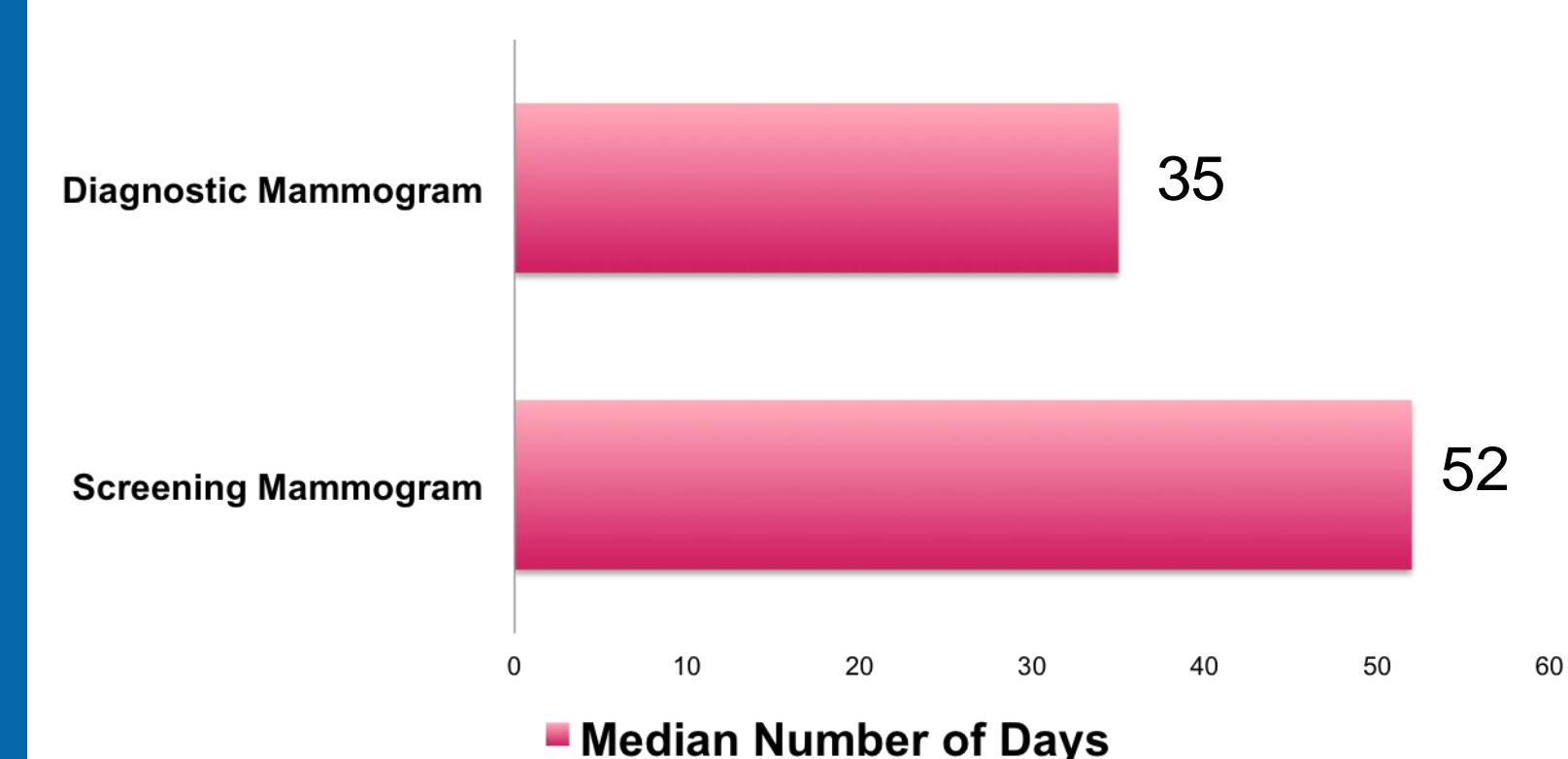


Results

Median Time from First Imaging to Biopsy



Median Time from First Imaging to Initial Treatment



Median Number of Days from Imaging to Biopsy and Imaging to Treatment was significantly longer in patients who had inappropriate screening mammograms (p<0.05)

Conclusion

Patients with palpable breast cancers who had appropriate initial diagnostic imaging experienced shorter time from initial imaging to biopsy and first treatment.

In agreement with NCCN guidelines, Clinical Breast Exams are encouraged prior to mammograms to determine if the patient has a palpable mass and the appropriate diagnostic imaging can be ordered.

- Limitations included:
 - No delineation of type of surgery chosen
 - Did not account for delays in biopsy due to patient medications such as blood thinners
 - Did not account for patient driven delays such as second opinions or scheduling conveniences

References

- Breast Cancer Screening and Diagnosis. NCCN Guidelines. Available: https://www.nccn.org/professionals/physician_gls/pdf/breast-screening.pdf. Updated October 4, 2018 [Accessed March 24, 2019]
- Moy L, Heller SL, Bailey L, et al. ACR Appropriateness Criteria Palpable Breast Masses. Journal of American College of Radiology. 2017; 14:S203-S224.
- Consensus Statement on Screening Mammography. ASBS. Available: https://www.breastsurgeons.org/about/statements/PDF_Statements/Screening_Mammography.pdf. Updated October 29, 2015 [Accessed March 24, 2019]
- Mammogram Basics. American Cancer Society. Available: <https://www.cancer.org/cancer/breast-cancer/screening-tests-and-early-detection/mammograms/mammogram-basics.html>. Updated October 9, 2017 [Accessed March 24, 2019]
- Larson KE, Cowher MS, O'Rourke C, et al. Do Primary Care Physicians Perform Clinical Breast Exams Prior to Ordering a Mammogram. The Breast Journal. 2016; 22(2):189-93.
- Bleicher NJ, Ruth K, Sigurdson ER, et al. Time to Surgery and Breast Cancer Survival in the United States. JAMA Oncology. 2016;23(3):330-339.
- Polverini AC, Nelson RA, Marcinkowski E, et al. Time to Treatment: Measuring Quality Breast Cancer Care. Annals of Surgical Oncology. 2016. 23: 3392-3402.
- Richards MA, Westcombe M, Love SB, et al. Influence of delay on survival in patients with breast cancer: a systematic review. The Lancet. 1999;353:1119-26.
- Khorana AA, Tullio K, Elson P, et al. Time to initial cancer treatment in the United States and association with survival over time: An observational study. PLoS One. 2019; 14(3):e0213209.