

# Chest-Wall Metastasis of Prostate Cancer

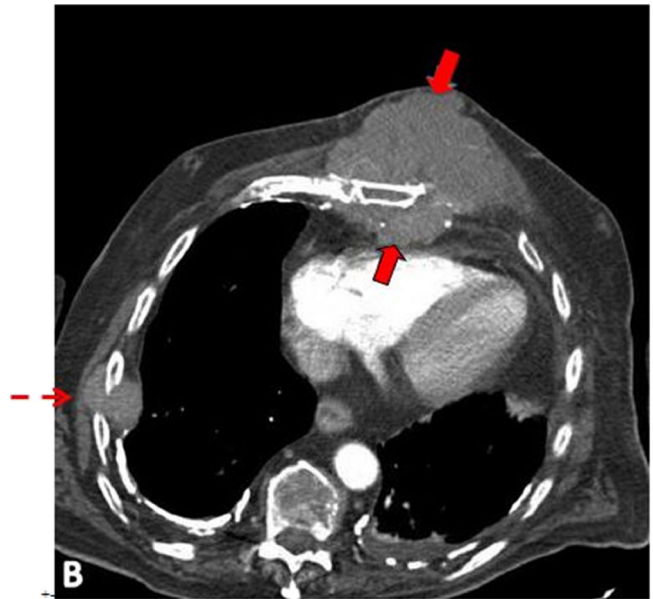
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Panel A Showing the large anterior chest wall mass.



Panel B Computed tomography demonstrating a permeative chest-wall mass (Panel B; between *solid arrows*) destroying the body of the sternum, abutting the pericardium, and indenting the anterior mediastinal fat. Rib lesion with a soft tissue component (Panel B; *dashed arrow*).

An 88-year-old male presented with a gradually enlarging, painless mass on his anterior chest wall for 1 year (Panel A). On exam, there was a 12×10×5 cm, non-tender, firm, immobile mass over the body of the sternum. Computed tomography (CT) demonstrated a permeative chest-wall mass (Panel B). Serum prostate-specific antigen (PSA) was 3,019 ng/ml. Histopathology was consistent with prostate adenocarcinoma. The patient had poor functional status and requested hospice.

Chest wall tumors account for less than 1 % of all neoplasms and can arise from either a soft tissue or bony structure.<sup>1</sup> More than 50 % of chest wall tumors are malignant. Malignant primaries include Ewing's sarcoma, osteosarcoma and chondrosarcoma. Malignant lesions tend to grow faster, are painful, and present as larger masses than benign lesions. Primary malignant tumors of the chest wall should be resected with wide margins and receive adjuvant therapy as appropriate. Metastatic disease accounts for 16 % of malignant chest wall tumors. Chest wall

metastases occur more commonly from blood-borne spread than lymphatic or direct spread. The chest wall is an extremely rare site of prostate cancer metastasis.<sup>3</sup> Case reports have described chest-wall metastasis regression with standard hormonal chemotherapy, with median survival of 12–24 months.<sup>2,4</sup>

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