Hormone therapy for prostate cancer may increase risk of depression

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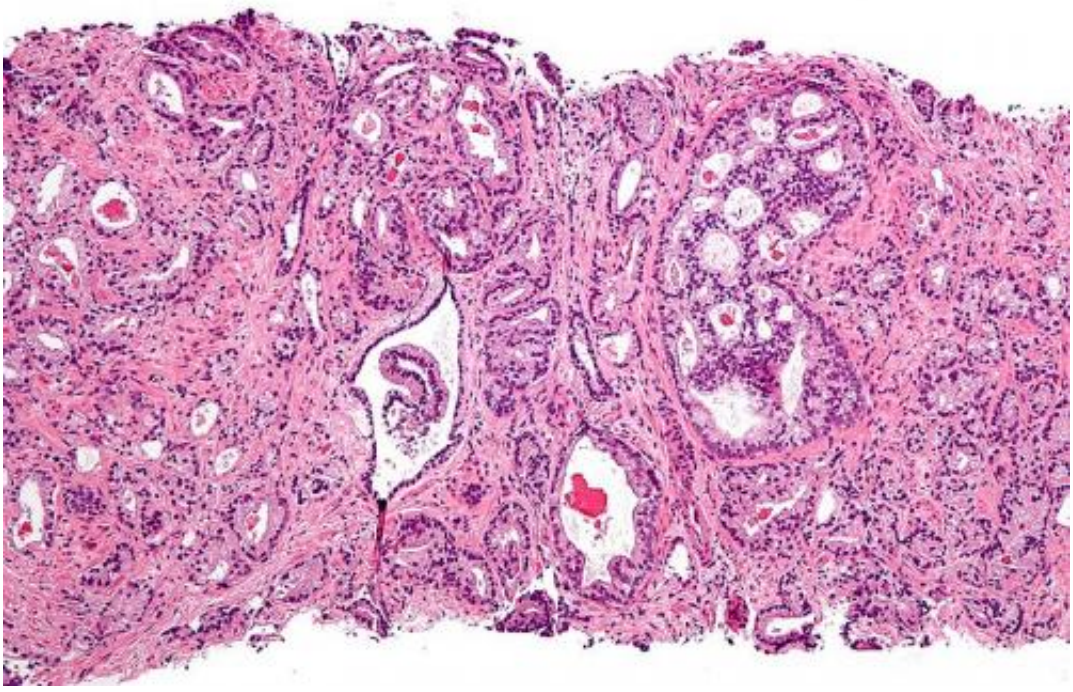

Micrograph showing prostatic acinar adenocarcinoma (the most common form of prostate cancer) Credit: Wikipedia, CC BY-SA 3.0

A new study led by researchers at Brigham and Women's Hospital (BWH) has found a significant association between depression and patients being treated for localized prostate cancer (PCa) by androgen deprivation therapy (ADT).

The findings are published online in the *Journal of Clinical Oncology* on

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"We know that patients on hormone therapy often experience decreased sexual function, weight gain and have less energy - many factors that could lead to depression. After taking a deeper look, we discovered a significant association between men being treated with ADT for PCa and depression," says senior author Paul Nguyen, MD. "This is a completely under-recognized phenomenon. Around 50,000 men are treated with this therapy each year. It's important not only for patients to know the potential side effects of the drugs they're taking, but also for the physicians to be aware of this risk in order to recognize signs of depression in these patients and refer them for appropriate care," says Nguyen, who is also the director of Prostate Brachytherapy at BWH. "Patients and physicians must weigh the risks and benefits of ADT, and this additional risk of depression may make some men even more hesitant to use this treatment, especially in clinical scenarios where the benefits are less clear, such as intermediate-risk disease."

Researchers reviewed data from the SEER Medicare-linked database from 1992 to 2006 of 78,552 men over the age of 65 with stage I to III PCa. They investigated the association between ADT and a diagnosis of depression or confirmation of inpatient or outpatient psychiatric treatment. Additionally, they looked at the association between duration of ADT and depression.

When compared to patients who did not receive the therapy, researchers found that the patients who received ADT had higher incidences of depression and inpatient and outpatient psychiatric treatment. Adjusted analyses demonstrated that patients who received ADT had a 23 percent increased risk of depression, a 29 percent increased risk of inpatient psychiatric treatment, and a non-significant 7 percent increased risk of outpatient psychiatric treatment when compared with patients not being treated with ADT. The risk of depression increased with the duration of

ADT, from 12 percent with less than six months to 26 percent from 7 to 11 months of treatment, to 37 percent with patients being treated for 12 months or longer. A similar duration effect was seen for inpatient and outpatient psychiatric treatment.

Researchers encourage future studies to focus on interventions that could successfully reduce this risk and to examine whether particular subpopulations are at a higher risk, such as patients with a history of depression.

Provided by Brigham and Women's Hospital