

A Case of Panic Attack Induced by St John's Wort

To the Editor: St John's wort (*Hypericum perforatum* L) is one of the oldest and best investigated medicinal herbs.¹ *Hypericum* extracts have been shown to be significantly effective in treating mild-to-moderate depression.²

To the best of our knowledge, we report the first case of panic attack induced by a single dose of St John's wort extract.

Case report. Mr A, an otherwise healthy 35-year-old man, was admitted to the hospital for gradually increased trembling and fear of dying. He stated that, 2 hours after he drank a glass of St John's wort extract (because of difficulty falling asleep), he became restless, anxious, and agitated. He also reported palpitations, sweating, chest discomfort, shortness of breath, nausea, blurred vision, and feelings of derealization. The patient denied hallucinations or delusions. An electrocardiogram showed tachycardia. Vital signs were remarkable for a pulse of 110 bpm and respiratory rate of 22 breaths/min. Improvement was seen in the panic state, and vital signs returned to normal within 25 minutes after oral alprazolam 1 mg was administered. He denied any psychiatric history (apart from difficulty falling asleep 1 or 2 days a week), current stressors, or use of alcohol. Family history was noncontributory. When questioned, Mr A reported a similar episode after drinking a glass of St John's wort extract approximately 2 months previously.

The patient met the *Diagnostic and Statistical Manual of Mental Disorders*, Fourth Edition, diagnostic criteria for panic attack. According to the Naranjo Adverse Drug Reaction Probability Scale,³ there was a probable association between St John's wort and panic attack. After being discharged, Mr A denied any further panic attacks at his 1- and 3-month visits.

Although the exact mechanism of action is not known, there is good evidence from in vitro experiments that St John's wort extracts are potent but nonspecific inhibitors of the synaptosomal reuptake

of serotonin, norepinephrine, and dopamine.⁴ In vivo studies have shown that *Hypericum* extracts lead to a down-regulation of β -adrenergic receptors and an up-regulation of 5-HT₂ receptors.⁴

The most important risk associated with *Hypericum* extracts is reported to be the interactions with other drugs.⁵ However, as reported here, a single dose of St John's wort extract can induce a panic attack. It is crucial to investigate herbal drug use in patients presenting with psychiatric complaints. It is important that clinicians become aware of the potential psychiatric adverse effects associated with St John's wort, which is a widely used medicinal herb, and explain these effects to their patients.

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Potential conflicts of interest: None reported.

Funding/support: None reported.

Published online: January 24, 2013.

Prim Care Companion CNS Disord 2013;15(1):doi:10.4088/PCC.12l01453

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