

# Memoirs of Mattress Man: A Tale of an Unusual Presentation of Tactile Hallucinations Due to Spinal Cord Compression

Authors: Lauren Stephens, DO; Kevin Johns, MD  
The Ohio State University Wexner Medical Center; Department of Psychiatry



THE OHIO STATE  
UNIVERSITY

WEXNER MEDICAL CENTER

## Background

- Hallucinations can be found in psychiatric and neurologic disorders.
- Tactile hallucinations (TH) can be associated with substance intoxication, amputations (phantom limb pain) as well as spinal cord pathology (1).
- In this case, a patient presenting with TH was found to have severe spinal stenosis.

## Case Presentation

- 70 year old female presenting with aphasia and hallucinations.
- Psychiatry consulted to evaluate new-onset TH despite resolved visual hallucinations and aphasia.
- Patient reported feeling as if someone were touching her from beneath the bed and referred to this as "Mattress Man."
- TH were also described as being painful/sharp and were located below the waist in locations where the mattress contacted her body.
- Psychiatry recommended haloperidol due to concern for lingering delirium in the context of AKI, possible UTI, polypharmacy and hypothyroidism.
- Patient reported some improvement in symptoms but continued to experience TH.
- Psychiatry recommended spinal imaging which demonstrated severe spinal stenosis at T12-L1 with compression of the conus medullaris requiring surgical repair.
- Following vertebral laminectomy and posterior fusion, TH continued to improve until hospital discharge.

## Pathophysiology

- Spinal cord injuries have been shown to produce complex (ex: movement, position) and simple sensations (ex: light touch, tingling) (1).
  - Complex sensations: occur more often with complete spinal cord injuries, onset is closer to time of injury, more frequently associated with conus medullaris and are believed to be attributed to sensory "imprint."
  - Simple sensations: onset is delayed after injury and are thought to occur as a result of neuronal sprouting.
- A previous study in a patient with schizophrenia identified the thalamus, insula and posterior cingulate gyrus to be involved in somatic hallucinations on fMRI(3).



Figure: Disc herniation resulting in T12-L1 spinal stenosis with compression of the conus medullaris.

## Discussion

- Previous studies have found TH associated with syringomyelia and spinal cord injuries (2).
- In our case, a patient with various medical comorbidities but without previous psychiatric history developed TH.
- Initial concerns for delirium however TH persisted with haloperidol treatment.
- The pattern of distribution of TH and intact sensorium indicated concern for underlying neurologic cause of presentation.
- Spinal imaging demonstrated severe spinal stenosis requiring surgical repair.
- TH improved post operatively until hospital discharge.

## Conclusions

- There are a variety of medical settings in which a patient may present with hallucinations.
- A broad differential diagnosis is essential to rule out underlying causes of hallucinations.
- Patients with TH should be screened for possible neurological etiologies including spinal cord pathology.

### References:

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