Case Report

"Radio Inside My Head": A Curious Case of Early Onset "Stuck Song Syndrome" or Obsessive-Compulsive Disorder with Predominant Musical Obsession

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ABSTRACT

Musical obsessions also called "stuck song syndrome" is a topic of limited research. It is among the most poorly understood and rare phenomenology. There are only a few cases reported across the world which describes it. Subjects usually present with complaints of continuous play of a musical tune in the head which the subject is unable to remove. Because of its similarity in presentation with auditory musical hallucination, it presents a diagnostic dilemma to the clinician. Here, we present the case of a 25-year-old man who presented with this particular phenomenon, and the approach we took to manage it.

Key words: Musical obsession, obsessive compulsive disorder, stuck song syndrome

INTRODUCTION

Obsessive-compulsive disorder (OCD) is characterized by the presence of repetitive and persistent thoughts, images or urges which cause marked distress or anxiety (obsessions). The individual attempts to ignore or suppress these by repetitive behaviors or mental acts in response (compulsions).^[1] Here, we report a special case of early onset OCD with a rare symptom of musical obsession along with various other obsessions and compulsions. Very few cases have been reported regarding musical obsession and

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with the exception of one study^[2] most have reported as isolated and solo musical obsession. The literature regarding musical obsession is over a century old, and it has been mentioned in the works of Ebbinghaus,^[3] Walsh^[4] and Kraepelin (1904).^[5] Kraepelin classified this symptom as a part of obsessive-compulsive neurosis.^[5] Musical obsessions are best explained as miscellaneous obsessions which consist of repetitive, intrusive thoughts of musical words/sound/tunes which the patient is not able to suppress, and this causes

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marked anxiety and distress.^[6] Musical obsessions are also referred as earworms,^[7] stuck song syndrome,^[8] or involuntary musical imagery.^[9] At present, the OCD symptom checklist Yale-Brown Obsessive Compulsive Scale (Y-BOCS)^[10] includes an item of intrusive nonsense sounds, words, and music.^[11] However, musical obsessions are not mentioned in the most recent version of the Diagnostic and Statistical Manual of Mental Disorders.^[12]

CASE REPORT

We report a 25-year-old man hailing from a lower middle-class rural background from North-Eastern India who presented with repetitive, intrusive thoughts of musical tune and songs, blasphemous thoughts about Hindu goddesses, inability to concentrate in any activity and persistent low mood. These symptoms were present for the last 15 years but for the last 1 year those are increasing in intensity. Alongside these symptoms, he also reported as having decreased sleep and appetite and increased fatigability for the last 4 months. The patient reported that he had a difficult childhood because of his alcoholic father, who would often beat up his mother and him. On attaining puberty, like any adolescent he started having sexual thoughts about the opposite gender; however, soon he realized that these thoughts were coming even when he looked at any idol of Hindu female Goddesses. Distressed by the severely blasphemous nature of these thoughts he tried to control it by diverting his attention elsewhere, but, soon he realized that those thoughts were repetitive and intrusive and it was only following masturbation he could attain a temporary relief. Convinced that he is a grave sinner beyond penance, he stopped attending any religious ceremony and would cover his eyes when he would pass in front of a temple. At the age of 15, while in class XI, he got ragged including physical abuse by his school seniors. He considered this incidence, as an act of God for his sins. However, soon after this, he developed a new symptom. Whenever he used to hear a new song/tune/poetry, it would repeatedly play in his head for long duration despite his efforts to stop them. He described the feeling as, "as if I have a radio without control in my mind." This repetition of tune/song would continue until he hears a new one. These songs were quite clear and varied from religious to sensual/sexual in content. He reported that these songs/tunes were coming from inside his head and it never from outside. He was forced to sing these songs alone to himself for long hours. In the year 2008, a consultation was sought at this tertiary care hospital, where after detailed investigations and physical and mental state evaluation a provisional diagnosis of OCD was made. Routine blood and urine investigation, electroencephalogram, and computed tomographic scan were done which came

out to be normal. He was started on pharmacotherapy along with behavior psychotherapy. The patient took treatment for many years in which a variety of molecules (escitalopram, desvenlafaxine, clomipramine, fluvoxamine, and risperidone) were used in adequate dose along with psychotherapy in form of thought blocking. The patient responded well to treatment, and there was decrease in intensity and frequency of his symptoms. He also developed good insight and understanding toward his illness. He left medication about I year back thinking that he was cured, following which there was gradual relapse of the symptoms. When he came to us again, he had marked social and occupational dysfunction. We evaluated the patient in detail and did necessary investigations. Mental state examination showed a properly groomed, ectomorphic built individual with reduced psychomotor activity with coherent and relevant speech. Patient's mood was depressed with the appropriate affect of constricted range. He did not have any formal thought disorder but thought content included intense guilt feeling, death wish, predominantly obsessive musical thoughts along with blasphemous thoughts about Hindu Goddesses and compulsive masturbation. He did not have any perceptual abnormalities. The patient however, had grade IV insight about his problem. Hamilton's Anxiety and Depression Rating Scale (HAM-A and HAM-D)[13] was applied which showed moderate level of anxiety (HAM-A score 23) and depression (HAM-D score 20). Patient scored 26 on Y-BOCS.^[10] Magnetic resonance imaging (MRI) of the patient was done which came out to be normal. After application of MINI International Neuropsychiatric Interview^[14] a diagnosis of OCD with the depressive disorder was formulated. He was started on escitalopram 20 mg/day with gradually increasing dose and behavior psychotherapy in the form of thought blocking. He was made to understand the nature and course of his illness and also relaxation techniques were taught to control anxiety whenever required. After 4 weeks of treatment, the patient started responding to the treatment with escitalopram (40 mg/day) and behavior therapy. At the time of discharge, his HAM-A and HAM-D score was 11 and 8, with a Y-BOCS score of 9.

DISCUSSION

There has always been a diagnostic dilemma between the musical obsession and musical hallucinations as both these disorders have a similar presentation. Many studies have reported presence of musical hallucinations in persons with schizophrenia. They have also been described in patients with epilepsy, acquired hearing loss, brain lesions, delirium, psychosis, drug-induced states, and hypnagogic states. They have been typically described as clear, undesired vivid voices

coming outside the head in patients having altered sense of reality with poor insight. In contrast to this, our case reported these musical voices being generated inside the head which were repetitive and intrusive causing him distress and social and occupational dysfunction. Patient had intact reality testing with full insight and could momentarily suppress these thoughts by engaging in different work. Also while few case study reported defects in the frontal lobe, temporal lobe, and basal ganglia on radio imaging[18,19] our case had normal results on MRI. Regarding treatment, most of the study material suggest that patients with musical obsessions benefit from a combination of pharmacotherapy and psychotherapy.^[20] In pharmacotherapy, selective serotonin reuptake inhibitor and clomipramine have been efficacious.[20] While in cognitive-based psychotherapy strategies such as cognitive reconstructing, reappraisal, and acceptance strategies[21] and distractions-based treatment^[22] have shown good results. To conclude musical obsession is a rare uncommon phenomenon which presents as a challenging task for clinicians to diagnose and differentiate it from other closely linked entities such as musical hallucinations, palinacousis, and pseudo-hallucination and manage satisfactorily.

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Conflicts of interest

There are no conflicts of interest.

REFERENCES

- Abramowitz JS, Jacoby R. Obsessive-compulsive disorder in the DSM-5. Clin Psychol Sci 2014;21:221-35.
- Praharaj SK, Goyal N, Sarkar S, Bagati D, Sinha P, Sinha VK. Musical obsession or pseudohallucination: Electrophysiological standpoint. Psychiatry Clin Neurosci 2009;63:230-4.
- Ebbinghaus H. About Memory: Studies For Experimental Psychology. Leipzig: Duncker and Humblot; 1885. Available from: http://www.scholar.google.com/scholar?hl=en&btnG =Search&q=intitle: ber+das+Gedchtnis#2. [Last accessed on 2016 Oct 24].
- Walsh JJ. Obsessions and psychasthenia. J Nerv Ment Dis 1903;30:318. Available from: http://www.content. wkhealth.com/linkback/openurl?sid=WKPTLP:landingpage &an=00005053-190305000-00025. [Last accessed on 2016 Oct 24].
- Diefendorf AR. Clinical Psychiatry. A text-book for students and physicians. Abstracted and adapted from the seventh German edition of Kraepelin's "Lehrbuch der Psychiatrie." New York: The Macmillan Company; 1907.

- Aneja J, Nebhinani N, Grover S. Musical obsessions: A case report and review of literature. Indian J Psychol Med 2015;37:102-4.
- Islam L, Scarone S, Gambini O. Obsessive-compulsive disorder presenting with musical obsessions in otosclerosis: A case report. J Med Case Rep 2014;8:384.
- Euser AM, Oosterhoff M, van Balkom I, Taylor S, McKay D, Miguel E, et al. Stuck song syndrome: Musical obsessions – When to look for OCD. Br J Gen Pract 2016:66:90.
- Farrugia N, Jakubowski K, Cusack R, Stewart L. Tunes stuck in your brain: The frequency and affective evaluation of involuntary musical imagery correlate with cortical structure. Conscious Cogn 2015;35:66-77.
- Goodman WK, Price LH, Rasmussen SA, Mazure C, Fleischmann RL, Hill CL, et al. The Yale-Brown Obsessive Compulsive Scale. Arch Gen Psychiatry [Internet] 1989;46:1006.
- Goodman WK, Price LH, Rasmussen SA, Mazure C, Fleischmann RL, Hill CL, et al. The Yale-Brown Obsessive Compulsive Scale. I. Development, use, and reliability. Arch Gen Psychiatry 1989;46:1006-11.
- American Psychiatric Association. Diagnostic and Statistical Manual of Mental Disorders [Internet].
 2013. Available from: http://books.google.com/ books?id=EIbMlwEACAAJ&pgis=1. [Last accessed on 2016 Oct 24].
- Hamilton M. A rating scale for depression. J Neurol Neurosurg Psychiatry 1960;23:56-62.
- Lecrubier Y, Sheehan DV, Weiller E, Amorim P, Bonora I, Sheehan KH, et al. The Mini International Neuropsychiatric Interview (MINI). A short diagnostic structured interview: Reliability and validity according to the CIDI. Eur Psychiatry 1997;12:224-31.
- Hammeke TA, McQuillen MP, Cohen BA. Musical hallucinations associated with acquired deafness. J Neurol Neurosurg Psychiatry 1983;46:570-2.
- Keshavan MS, Kahn EM, Brar JS. Musical hallucinations following removal of a right frontal meningioma. J Neurol Neurosurg Psychiatry 1988;51:1235-6.
- 17. Evers S, Ellger T. The clinical spectrum of musical hallucinations. J Neurol Sci 2004;227:55-65.
- Nath K, Bhattacharya A, Hazarika S, Roy D, Praharaj SK. A case of early-onset obsessive-compulsive disorder with musical obsessions and comorbid tic disorder. J Neuropsychiatry Clin Neurosci 2013;25:E14-5.
- Zungu-Dirwayi N, Hugo F, van Heerden BB, Stein DJ.
 Are musical obsessions a temporal lobe phenomenon? J
 Neuropsychiatry Clin Neurosci 1999;11:398-400.
- Taylor S, McKay D, Miguel EC, De Mathis MA, Andrade C, Ahuja N, et al. Musical obsessions: A comprehensive review of neglected clinical phenomena. J Anxiety Disord 2014;28:580-9.
- Abramowitz JS. The practice of exposure therapy: Relevance of cognitive-behavioral theory and extinction theory. Behav Ther 2013;44:548-58.
- Gomibuchi T, Gomibuchi K, Akiyama T, Tsuda H, Hayakawa T.
 Obsession of hearing music: From the viewpoint of Morita theory. Psychiatry Clin Neurosci 2000;54:203-6.