

Case Report

Post-operative Adult Onset Tic Disorder: A Rare Presentation

Suneet Kumar Upadhyaya, Chintan M. Raval, Devendra Kumar Sharma¹, Devendra Kumar Vijayvergiya¹

ABSTRACT

Tics are rapid and repetitive muscle contractions resulting in stereotype movements and vocalizations that are experienced as involuntary. Onset before 18-year is a diagnostic criterion for tic disorders. Children and adolescents may exhibit tic behaviors after a stimulus or in response to an internal urge. Tic behaviors increase during physical or an emotional stress. Adult onset tic disorders are reported by infections, drugs, cocaine, toxins, chromosomal disorders, head injury, stroke, neurocutaneous syndromes, neurodegenerative disorders and peripheral injuries. Only few cases have yet been reported having onset after surgery though surgery brings both physical and emotional stress to the patient. We report a case of a 55-year-old lady who developed tic disorder as post-operative event of cataract surgery. Our patient had a dramatic response to haloperidol which is in contrast to all earlier reports.

Key words: *Cataract surgery, movement disorder, Tourette's syndrome*

INTRODUCTION

Tics are sudden, rapid, recurrent, non-rhythmic, stereotyped movements or vocalizations that are experienced as involuntary. Tic disorders is usually present in childhood or adolescence.^[1] Tic disorders presenting during adulthood have infrequently been described in the medical literature, mostly in relation to neurological disorders.^[2] Adult onset tic disorders are considered as persistence of tics from childhood with the assumption that patients cannot remember having childhood tics.^[3] Various reports depict the adult onset tic disorders caused by infections, drugs, cocaine, toxins, chromosomal disorders, head injury,

stroke, neurocutaneous syndromes, neurodegenerative disorders.^[4] only few cases have been linked to surgeries^[5,6] and peripheral injuries.^[7]

Here we report a case of tic disorder developing after cataract surgery, which showed a dramatic response to haloperidol in contrast to earlier reports of adult onset tic disorders.

CASE REPORT

A 55-year-old uneducated widow presented by her son with the complaints of abnormal facial movements and slurring of speech to the out-patient Department of Psychiatry and she had right eye cataract surgery with implantation of intraocular lens 1 year back. After the surgery, she felt dryness and itching in eyes which was resolved with the use of artificial tears for 1 month. After 2 weeks itching and pain of the face and neck restarted along with movements, which gradually increased. Her facial tics were frequent, although movements free periods of few hours were not uncommon. Son reported her irritability and decreased frustration tolerance in those days. As her movement

Access this article online	
Website: www.ijpm.info	Quick Response Code 
DOI: 10.4103/0253-7176.140740	

Departments of Psychiatry, GMERS Medical College, Patan, Gujarat, ¹Government Medical College, Kota, Rajasthan, India

Address for correspondence: Dr. Suneet Kumar Upadhyaya
Department of Psychiatry, GMERS Medical College, Patan, Gujarat, India. E-mail: dr_suneet12@yahoo.com

increased, she started showing a non-gregarious nature spending an appreciable time in reclusion.

On examination, she had eye blinking, mouth twitching, facial grimacing, lip pouting, lip licking, chewing on the lip, irregular tongue movements and lower jaw protraction. With hard effort she was able to partially suppress her movements for 5-10 s. No other vocal or motor tics were found in enquiry or examination. Her speech slurring was due to tongue movements and was suppressible for few seconds and even more when distracted from the topic of her illness. She was never found to scratch her face or eyes. Examination by Ophthalmologist and Dermatologist didn't reveal any problem in eyes or face respectively.

There was no history of intellectual decline. She denied history of symptoms suggestive of tics, attention deficit disorder, obsessive-compulsive disorder, impulse control disorder or any other psychiatric illness. There was no history of prolonged drug intake, head injury, seizure, chorea, dystonia or any other involuntary movement disorder. There was no history suggestive of pre morbid personality traits of obsessive, histrionic, narcissistic, antisocial or borderline type.

Patient was a chronic tobacco smoker who had a problem of acidity for last 8 years, which restricted her to bland foods. She attained menopause 12 years back. She had mild grade uterine descent for last 4 years. Patient was working as a caretaker of other's cattle.

Her cognitive functions were intact. She scored 27 out of maximum 50 on Yale Global Tic Severity Scale with "moderate" impairment. General physical examination, neurological examination and routine investigations including blood smear and lipid profile were within the normal limits. To rule out cerebral vascular pathology case was referred to higher center as electroencephalography (EEG) and neuroimaging were not available at our center, but she refused to go, due to the financial constraints.

After telephonic discussion of the case with a Neurologist, she was started with haloperidol 3 mg/day, which increased to 6 mg/day on 2nd day. On the 4th day, she had dramatic response with complete resolution of all the symptoms. She was advised surgery by a Gynecologist for uterine descent. She was discharged on the same dose with advice to review after 20 days. After 20 days, she voluntarily stopped treatment and didn't turn up. 2 weeks later, she relapsed and reported back to outpatient department. Treatment was resumed with 6 mg/day haloperidol and the same response obtained. She returned after a span of 6 months to reveal that during this time she tried to stop treatment twice, but

relapsed within 1 to 2 weeks and started self-medication with partial response. Her dose was increased to 9 mg/day. She was asymptomatic for next 6 months after which she lost to follow-up.

DISCUSSION

Clinical features of adult onset tic disorder usually resemble those described in childhood onset tic disorders.^[8] However, childhood onset tic disorders have more frequent problems with behavior, in comparison to adults who find social embarrassment and isolation as most disabling consequences of tic disorders.^[9]

Motor and phonic tics are often preceded by premonitory sensations like localized paresthesia or discomfort, which are temporarily relieved after the execution of the tic. Various premonitory sensations as burning feeling of eye before blinking, itching before a rotatory movement of scapula, have already been described.^[10] This patient reported feeling of itching and later pain preceding the onset of tics. Two possibilities exist for its explanation. First, this may be rationalization to avoid social embarrassment as she was never found to itch during her hospital stay, nor her son reported it. Second, she might have really felt premonitory sensations which she couldn't describe properly.

Adults with new onset tics are more likely to have an underlying provocative event in contrast to childhood onset tic disorders, which are rarely linked to specific etiology.^[11] In our patient, tics were precipitated after surgery for cataract, details of which were not available. She was not reported to be very anxious before eye surgery, so emergence of tic disorder might have some local physical insult as important factor. Chouinard and Ford have described the onset of vocal tics after pharyngitis and facial grimacing after intranasal cocaine use.^[11] Similarly Factor and Molho reported facial and neck movements after injuries to face and neck respectively.^[7] In both studies, tics were started from or were confined, to the region of physical stimulation.

It is difficult to precisely comment on pathophysiological mechanism underlying in this case as we did not have detailed workup like EEG and neuroimaging. It might be related to central nervous system dysfunction, local insult, effect of drugs during anesthesia, or recurrence of forgotten Tourette's syndrome of childhood. We also acknowledge that tics might be unrelated to cataract surgery.

Our patient had a dramatic response to haloperidol, the first drug tried in the case. In most of the previous studies, treatment attempts by various drugs were generally found unsuccessful,^[11] although some exceptions are

there.^[12] We did not find any clue for dramatic response to treatment, probably multifactor mechanism that applies to drug response in any illness, was at play, which is almost impossible to ascertain precisely.

REFERENCES

1. American Psychiatric Association. Task force on nomenclature and statistics. Diagnostic and Statistical Manual of Mental Disorders. 4th ed. (DSM-IV). Washington DC: APA; 1994.
2. Kumar R, Lang AE. Tourette syndrome. Secondary tic disorders. *Neurol Clin* 1997;15:309-31.
3. Jankovic J, Kattner RG, Davidson A. Tourette's syndrome in adults. *Mov Disord* 2010;25:171-5.
4. Jankovic J. Tourette's syndrome. *N Engl J Med* 2001;345:1184-92.
5. Chemali Z, Bromfield E. Tourette's syndrome following temporal lobectomy for seizure control. *Epilepsy Behav* 2003;4:564-6.
6. Salinas C, Dávila G, Berthier ML, Green C, Lara JP. Late-life reactivation of obsessive-compulsive disorder associated with lesions in prefrontal-subcortical circuits. *J Neuropsychiatry Clin Neurosci* 2009;21:332-4.
7. Factor SA, Molho ES. Adult-onset tics associated with peripheral injury. *Mov Disord* 1997;12:1052-5.
8. Goetz CG, Tanner CM, Stebbins GT, Leipzig G, Carr WC. Adult tics in Gilles de la Tourette's syndrome: Description and risk factors. *Neurology* 1992;42:784-8.
9. Wand RR, Matazow GS, Shady GA, Furer P, Staley D. Tourette syndrome: Associated symptoms and most disabling features. *Neurosci Biobehav Rev* 1993;17:271-5.
10. Jankovic J. Tourette syndrome. Phenomenology and classification of tics. *Neurol Clin* 1997;15:267-75.
11. Chouinard S, Ford B. Adult onset tic disorders. *J Neurol Neurosurg Psychiatry* 2000;68:738-43.
12. Sutula T, Hobbs WR. Senile-onset vocal and motor tics. *Arch Neurol* 1983;40:825-6.

How to cite this article: Upadhyaya SK, Raval CM, Sharma DK, Vijayvergiya DK. Post-operative adult onset tic disorder: A rare presentation. *Indian J Psychol Med* 2014;36:428-30.

Source of Support: Nil, **Conflict of Interest:** None.