Letters to the Editor

Tricyclic Antidepressant Withdrawal – A Case Report

Sir,

Kuhn in 1957 for the first time reported that abrupt discontinuation of imipramine resulted in withdrawal phenomenon, and since then there have been many reports of the same. Dilsaver and Greden (1984) reviewed the literature and found four discrete syndromes: i) general somatic or gastrointestinal distress with or without anxiety or agitation, ii) sleep disturbances characterised by excessive and vivid dreaming and initial and middle insomnia, iii) movement disorders and iv) a mania like picture. In this report we present a case who developed the first syndrome after abrupt discontinuation of tricyclic antidepressants.

Case Report

Mr. K., a 24 year old male who had received a diagnosis of obsessive compulsive disorder, of 6 years duration, came with a history of persistent ruminations about the past and doubts about daily activities. There was history of depressive neurosis in the father and chronic schizophrenia in a sibling. He had been attending our outpatient department regularly but had not shown response to adequate doses of imipramine and amitryptiline and a course of behaviour therapy. To try a new drug regime, his daily dose of 300 mg of amitryptiline was inadvertently stopped. He immediately experienced marked nausea and vomiting and came back within 3 days. Amitryptiline was reinstated at the same dosage and the gastrointestinal symptoms subsided. Amitryptiline was then gradually tapered off with no recurrence of withdrawal phenomenon, over a period of 2 weeks.

Discussion

Most of the earlier work on tricyclic withdrawal was with imipramine. The dose has been as low as 30 mg per day in only a single case while most of the time it has been within 100 to 400 mg (Dilsaver et al 1983). Children seem to be particularly susceptible to develop withdrawal symptoms (Petti and Law, 1981). Gastrointestinal and psychic phenomenon seem to be the most prominent withdrawal symptoms.

Withdrawal symptoms with amitryptiline were first observed in a child. Subsequent case reports have stressed that the dose is often low and the presentation was with psychic, sleep and dream disturbances. In this case marked malaise, and gastrointestinal symptoms were observed with abrupt discontinuation of amitryptiline, but were absent on gradual withdrawal. Various other drugs like desipramine, clomipramine, doxepin, amoxapin and protryptilline have also been implicated (Dilsaver and Greden 1984). The syndrome develops within hours to days of discontinuation and lasts for 5 hours (Gawin and Markoff 1981) to several weeks (Kraft 1977).

Recent reports have tended to stress evidence for a cholinergic overdrive hypothesis which results in the withdrawal phenomenon (Dilsaver and Greden 1984). However, there have been more reports with imipramine than with amitryptiline, which is contrary to what would have been expected if this was the case. Interactions of cholinergic and monoaminergic pathways in susceptible individuals would most probably explain the pathology, but exact mechanisms remain unclear.

Coming to clinical implications of this case report, the most important one is recognition of withdrawal phenomenon...
when they occur. As far as management is concerned, one of the ways as used here and when feasible, is gradual tapering off of the drug. Based on the cholinergic overdrive hypothesis Dilsaver and Greden (1984) advocate the use of belladona alkaloids where gradual tapering is not feasible.

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