Chloroquine induced depression

Dr. Kajal Chakrabarti*

Abstract

Certain drugs are known to induce depressive states; chloroquine - an antimalaria, in therapeutic doses administered for treatment of malaria, may produce symptoms rather indistinguishable from depression.

Depression is the commonest psychiatric illness seen by general practitioners; in fact, it is one of the commonest clinical problems that general practitioners have to deal with. Prevalence rates for depressions, based on standardized interview, vary considerably between studies (*Casey et al*, 1984, Robins *et al*, 1984) probably due to differences in research method rather than true inter practice variation. A number of studies suggest that about 5% of the consulting patients show major depression, another 5% milder episodes, and a further 10% depressive symptoms (Blacker and clase, 1987). Depression is so common that point prevalence rate varies between 13 and 20 percent of the population (Michael Gelder Dennis Gath, Richard Mayan and Philipcowen, 1996).

Commonly used drugs for depression include barbiturates, contraceptives, anti-hypertensive, digitalis, ethanol, steroids, phenytoin and analgesics agents (Jr., Ayd, J, Frank, 1995) and depression maybe due to chronic medical illness and other endocrine disorders. The present article describes two cases of depression related to the administration of chloroquine as antimalarial drug.

Keywords: Chloroquine induced depression; depression; antimalarial drug.

Method

The sample consist of patient diagnosed as depressed according to criteria and diagnosed of ICD - 10 (WHO 1992). Evaluation tools were Hamilton Rating Scale for Depression (1960.

Case report

- 1. A 38-year old male reported to the psychiatric clinic with complaints of disturbed sleep, chain of thoughts, restless, loss of interest in daily usual works and feeling sad; all these symptoms started on the fourth day after ingesting a total dose of 1.5 gm of chloroquine for malaria. He was sound normal before illness and no history of mental illness in the past or any family leading to mental illness. Mental status examination revealed feature of moderate to severe depression with emotional incontinence and suicidal ideas.
- 2. A 32-year old male after taking 1.5 gm of chloroquine for malaria six days prior to attending psychiatric clinic, was found to have been in depressive mood, disturbed sleep, restless and having suicidal ideas. He was put on tetracycline antidepression; dramatic improvement was found on the seventh day. Also he did not have any past or family history of mental illness.

Discussion

Chloroquine administrated for various clinical conditions have resulted in the development of psychosis (Burrel and Martinez, 1958; Sapp, 1964; and Labir, 1969). Neff (1964) described a 15-year old boy developing depression with suicidal thoughts, disturbed sleep and panic reaction, after 10 days of chloroquine therapy for facial granuloma annulae; on discontinuation of the drug, the symptoms subsided. Drew (1962) had drawn attention to the development of depression in patients treated with chloroquine for rheumatoid diseases. All depressive symptoms disappeared on withdrawal of the drug.

Conclusion

I would like to mention that these cases demonstrate one of the potential hazards of chloroquine therapy, a fact which may easily be overlooked since depression occur too commonly as part of the physical illness.

However, clinically, it may even be wise not to continue with choloroquine as prophylaxis therapy to the people who are in endemic zone of malaria and those who have had history of depression in the past.

References

- 1. Blacker CVR and Clare AW. Depression disorder in primary care. British Journal of psychiatry 1987; 150: 737-51.
- 2. Burrel, Zl, Jr. Martinez, AC. Chloroquine and hydroxychloroquine in the treatment of cardiac arrhythmias. New Eng J med 1958; 258, 798.
- 3. Casey PR, Dillon Sand Tyrer PJ. The diagnostic status of patients with conspicuous psychiatric morbidity in primary care. Psychological medicine 1984; 14: 673-83.
- 4. Drew, JF. (1962) concerning the side effect of antimalarial drugs used in the extended treatment of rheumatic diseases med. J. Australia, 2, 618.
- 5. Jr., Ayd, J. Frank. Lesicon of psychiatry 1995; 197.
- 6. Kabir, SMA. Chloroquine psychosis, Trans, R.Soc, Trop, Med, Hyg, 1969; 63, 549.
- 7. Hamilton M. A rating scale for depression. Journal of Neurology, Neurosurgery and psychiatry 1960; 23: 46-62.
- 8. Michael Gelder, Dennis Gath, and Richard Mayou (eds). "Oxford Text Book of Psychiatry". Oxford University Press: Oxford. 1996; 210.
- 9. Neff, L. Drug reactions in adolescence. G.P. (Kansas) 1964; 29, 112.
- 10. Sapp, O, L. Toxic psychosis due to quinacrine and chloroquine. *JAMA* 1964; 187, 373.
- 11. World Health Organization. ICD 10, Mood Disorder. 1992.