NEURO-PSYCHIATRIC MANIFESTATIONS IN SLE PATIENT AFTER STEROID ADMINISTRATION: A CASE REPORT

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ABSTRACT
SLE is an uncommon disease. In SLE, the incidence of psychosis is rare. Psychosis in SLE can be due to SLE or due to steroids. Sometimes, it can be a combined effect of both. One study has showed that hypoalbuminemia can also induce psychosis in SLE patients. Here, we are reporting a case of an SLE patient who develops psychosis.

KEYWORDS: hypoalbuminemia, hypoalbuminemia.

CASE REPORT
This is a case report of 34 year old female who was diagnosed with SLE 3 years back. The patient came to us with complaints of psychotic behavior, auditory hallucinations and increased speech. The symptoms started a week ago. The presentation of the SLE was 3 years ago when she had cutaneous and articular involvement of SLE. She was started on oral prednisone 30mg/day at that time for the coetaneous flare up. During the course of time, her labs were normal and serum albumin level was within normal limits. 2 weeks ago the patient visited us for cutaneous flare up of SLE. A renal biopsy was also done which showed diffuse proliferative lupus nephritis. She was started on oral prednisone 60mg/day and she had no psychiatric symptoms at that time. The patient then came to us after 2 weeks with psychotic complaints. Albumin levels were checked and it turned out that she had hypoalbuminemia with albumin levels of 31g/l. Proteinuria was 2.1g/l. She was advised to have a high protein diet. At this point, Prednisone dose was progressively tapered and then stopped. Over the course of 1 month, her symptoms improved gradually. Hallucinations, odd behavior and other symptoms stopped completely at the end of the month. The cutaneous flare up subsided by itself. Albumin levels were checked at the end of the month and it was 34g/l which is little low. The cause of the psychosis remains unclear whether it was due to SLE flare up which subsided by itself or due to steroid administration which was then tapered. As per some studies, we can even consider hypoalbuminemia as a potential cause of the psychosis.

DISCUSSION
SLE is an autoimmune disorder. The symptoms of SLE are painful and swollen joints, chest pain, hair loss, swollen lymph nodes, mouth ulcers, fatigue and a butterfly rash on the face. The patient experiences flares and remissions in the course of the disease.[1]

The cause of SLE is unknown. It is considered to be a have hormonal, environmental and genetic factors involvement. Some studies also say that sunlight, smoking, female sex hormones may increase the risk of development of SLE.[2] The other types of lupus are discoid lupus erythematosus, neonatal lupus, subacute cutaneous lupus erythematosus and drug induced lupus. SLE is more common in women as compared to men. African Americans and Asians are more affected than other races. It can occur at any age but the most common age of onset is between 15 and 45. About 70% of patients with SLE have skin symptoms. 90% of patients of SLE have joint or muscle pains.[3] Anemia is seen in about 50% of the patients.[4] There is no cure for SLE. NSAIDs and steroids are used to control the symptoms.

SLE can affect central as well as peripheral nervous system. This leads to neuropsychiatric problems. The
diagnosis of neuropsychiatric problems in a patient of SLE is very difficult. The neuropsychiatric manifestations in SLE are mood disorders, seizures, anxiety disorders, psychosis, depression. Psychosis is an important neuropsychiatric manifestation in SLE. SLE can also lead to severe damage to epithelial cells in the blood brain barrier and this contributes to high morbidity and mortality in SLE patients.\(^5\)

The psychosis in this patient was due to hypoalbuminemia, SLE induced or steroid induced. The subsequent relapse of the flare up episode of SLE points towards SLE as the potential cause of the psychosis. Initially the patient tolerated 30mg steroid well but then the patient was started on 60mg steroid and soon after that the patient suffered the psychotic episode. Steroid is known to be a cause of psychosis. Also, with the tapering of the steroids and then relapse of the psychosis, it can inferred that steroid was causing psychosis. It is hard to differentiate as to what caused the psychosis. The low albumin content in the blood at the time of psychosis followed by management with high protein diet and subsequent increase in the hypoalbuminemia suggests that hypoalbuminemia can also be a potential cause of psychosis. The best way to learn the cause of psychosis is to wait for another episode of psychosis and then manage the patient.

REFERENCES