ABSTRACT

DRUG UTILIZATION STUDY CORTICOSTEROID IN GUILLAIN-BARRÉ SYNDROME PATIENTS
(Study was performed at Neurology Department of Dr. Soetomo General Hospital Surabaya)

BACKGROUND: Guillain-Barré syndrome (GBS) is an acute, immune-mediated polyneuropathy that often follows an antecedent infection. On the mechanism of immunosuppressant corticosteroids inhibit the release of cytokines in GBS disease, which is one of the pathology of GBS. However, the use of corticosteroids are still controversies, because further research states that corticosteroids do not provide a significant therapeutic effects. Questions regarding dosing, timing, and concern for adverse events often hinder their use in clinical practice.

OBJECTIVE: To documented corticosteroid therapy which received by GBS patients at Neurology Department of Dr. Soetomo General Hospital Surabaya in order to assess drug utilization by knowing the drug therapy profiles, dosage regimens, route, time, and duration of drug administrations.

SUBJECTS AND METHODS: By observational retrospective method GBS hospitalized-patients in any age admitted between January 1, 2010 and March 31, 2014 were reviewed. Patient’s medical history, clinical and laboratory data, and therapy were documented. The results were compared with literature.

RESULTS: All of 15 patients GBS was showed men (53.3%), women (46.7%), age <15years (20.0%), 15-24years (20.0%), 24-44years (26.7%), 45-64years (33.3%). Corticosteroids was used in the form of glucocorticoids. Methylprednisolone was prescribed in 93.3% dose given 62.5mg IV (6.7%), 125mg IV (33.3%), 250mg IV (33.3%), 8mg PO (6.7%), 4mg PO (13.3%). Dexamethasone 13.3% dose given 4mg IV (6.7%), 4mg PO (6.7%), prednisone 6.7% dose given 15 mg PO (6.7%).

CONCLUSIONS: Corticosteroids in patients with GBS is used as a supportive therapy for the treatment of diseases and other complications. Methylprednisolone was prescribed in 93.3% dose given 62.5mg IV (6.7%), 125mg IV (33.3%), 250mg IV (33.3%), 8mg PO (6.7%), 4mg PO (13.3%). Dexamethasone 13.3% dose given 4mg IV (6.7%), 4mg PO (6.7%), prednisone 6.7% dose given 15 mg PO (6.7%).

KEYWORDS: Guillain-Barré Syndrome (GBS), Drug utilization, Corticosteroid