Abstract
Cortisol is an indispensable hormone to life and with a multifaceted effect. It is synthesized in the adrenal glands; its production is enhanced during stressful situations. Major Depression is a pathology accompanied by a hypercortisolemia, which is in part responsible for its origin. The raise in the cortisol levels causes hippocampal lesions and alters the function in of the glucocorticoid receptors (GRs), lowering the negative feedback made by cortisol and deregulating the Hypothalamus--Pituitary-Adrenal (HPA) axis, which will in turn create a hypercortisolemia. Both sleep and cortisol secretion have a circadian rhythm. The raise in the cortisol levels is very important in a wakening; cortisol levels reach their highest point in awakening and reach their lowest points at the beginning of the night. Cortisol levels remain high in individuals who sleep less, or have a light sleep or have insomnia. There is a connection between cortisol secretion and the different sleep phases, especially rapid eye movement (REM) phase. One of the possible symptoms of depression is insomnia, and insomnia is a risk factor for depression. There is a hyperactivity of the HPA axis in both pathologies.

Keywords
Hypothalamus-Pituitary-Adrenal (HPA) axis; Cortisol; Circadian variations with sleep and awakened states; Hypercortisolemia; Depression.