

ABSTRACT

Adverse life experience during so called critical developmental periods is known to exert detrimental effects on central nervous system. Early stress may predispose to cognitive impairment, depression or other mental problems as well as to aggravation of existing neuropsychiatric problems. Consequences of early stress are highly age-dependent and affected by sex, genetic predispositions and type of stressor. In addition to prenatal stages, also postpartum period and adolescence are considered as periods of increased sensitivity to environmental disturbances of various origins (chemical, hormonal, physical and particularly social). Utilization of animal models is a direct approach to find out whether exposure to specific stressor alters mental functions and increases risk of behavioral problems. Animal studies also enable to study stress-induced molecular, cellular and structural changes and their role in later development of behavioral alterations.