

BORDERLINE PERSONALITY DISORDER AND SCHEMAS ORIENTATE WORDS PROCESSING - FMRI STUDY

A. Grambal¹, Z. Tüdös², J.P. Praško³, P. Hluštík⁴

¹Psychiatry, Radiology, ²Radiology, ³Psychiatry, ⁴Neurology, University Hospital Olomouc, Olomouc, Czech Republic

Introduction: Schemas are self-defeating life patterns of perception, emotion, and physical sensation. Borderline personality disorder patients are characterized by a negative self-image and pronounced vulnerability to negative stimuli activating schemas, which leads to strong negative emotions and conflict in social situations.

Objectives: We hypothesized that emotional faces and words stimuli will activate amygdala and limbic structures. The activation will be higher in patients compared to healthy controls subject

Aims: The aim of our study is to find the differences of schemas orientate words and emotional faces processing in borderline personality disorder compared to healthy controls. To identify neuronal correlates of negative self-image in BPD patients.

Method: Fifteen patients suffering from BPD and healthy controls (HC) were studied in fMRI during the exposition of negative schemas related words compared with positive schemas related words and emotional faces (anxious, angry, neutral) compared with fixation points. Psychopathology was assessed using Clinical Global Impression rating scale (CGI), Beck Anxiety Inventory (BAI) and Borderline personality severity index (BPDSI).

Results: Schema-oriented words showed right amygdala activation and strong precuneus and dorsal cingulum activation in BPD group compared with HC. Emotional faces Activations differ in both groups, BPD patient activated more anterolateral brain regions, HC activated more posteromedial areas.

Conclusion: Schema-oriented words are very hurtful for BPD patients and our fMRI findings confirmed this clinical experience. Processing of emotional faces in patients with borderline personality disorder involve multiple brain regions.

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