



EFFECT OF COGNITIVE BEHAVIOURAL THERAPY ON POLYCYSTIC OVARIAN SYNDROME-A REVIEW

Dr.Soniasharma (PT)

Jagannath University, Jaipur

A Polycystic ovary/ovarian syndrome (PCOS) is a set of symptoms related to an imbalance of hormones that can affect women and girls of reproductive age. It is defined and diagnosed by a combination of signs and symptoms of androgen excess, ovarian dysfunction, and polycystic ovarian morphology on ultrasound. The diagnosis of polycystic ovary syndrome requires at least two of the following criteria: oligoovulation and/or anovulation, clinical and/or biochemical evidence of hyperandrogenism and morphology of polycystic ovaries. Cognitive-behavioural therapy (CBT) refers to a class of interventions that share the basic premise that mental disorders and psychological distress are maintained by cognitive factors. The core premise of this treatment approach, as pioneered by Beck (1970) and Ellis (1962)

Introduction

Polycystic ovary syndrome (PCOS) is the most common endocrine disorder amongst women of reproductive age. PCOS is a heterogeneous disorder of uncertain aetiology, but there is strong evidence that complex interactions between genetic, environmental, and behavioural factors contribute to causing this syndrome. It is defined and diagnosed by a combination of signs and symptoms of androgen excess, ovarian dysfunction, and polycystic ovarian morphology on ultrasound. Though the exact cause of PCOS is unknown but it is thought to be multifactorial. Mostly due to hormonal imbalances that is elevated luteinizing hormone (LH) and normal or suppression of follicle stimulating hormone (FSH) resulting in altered LH/FSH ratio. Also, the clinical features of hyperandrogenism are related hyperinsulinemia and insulin resistance. It does not clear what are the factors that may predispose a women for development of PCOS, however it was observed in some cases that PCOS is genetic in nature and obesity was found to contribute for hyperinsulinemia there by predisposing individuals for PCOS.

Signs of PCOS

Dermatological Features- Hirsutism, Balding, Oily Skin, Skin Discolouration, Acne.

Menstrual disorders- Amenorrhea, oligomenorrhea, Menorrhagia

Polycystic Ovaries- Enlarged Ovaries, Excessive follicles.

Complications of PCOS can include:

- Infertility
- Gestational diabetes or pregnancy-induced high blood pressure
- Miscarriage or premature birth
- Non-alcoholic steatohepatitis — a severe liver inflammation caused by fat accumulation in the liver.
- Metabolic syndrome — a cluster of conditions including high blood pressure, high blood sugar, and abnormal cholesterol or triglyceride levels that significantly increase your risk of cardiovascular disease
- Type 2 diabetes or prediabetes
- Sleep apnea
- Depression, anxiety and eating disorders
- Abnormal uterine bleeding
- Cancer of the uterine lining (endometrial cancer)

Effects of CBT ON PCOS-

Cognitive-behavioural therapy is one of the most extensively researched forms of psychotherapy. Over 120 controlled clinical trials were added to the literature in the eight years between 1986 and 1993 (Hollon & Beck, 1994) and this proliferation has continued (Dobson, 2001). A defining feature of cognitive-behavioural therapy is the proposition that symptoms and dysfunctional behaviours are often cognitively mediated and, hence, improvement can be produced by modifying dysfunctional thinking and beliefs (Dobson & Dozois, 2001).

Obesity and CBT- Obesity, defined as a body mass index of $>30 \text{ kg/m}^2$, is a growing, expensive, and chronic public health problem today, and could be considered an epidemic (globesity).^{1,2} In 2006, the World Health Organization (WHO) estimated that globally >700 million adults will develop the condition of obesity by 2015. Evidence-based strategies to improve weight loss, maintain a healthy weight, and reduce related comorbidities typically integrate different interventions: dietetic, nutritional, physical, behavioural, psychological, and if necessary, pharmacological and surgical ones. Such treatments are implemented in a multidisciplinary context with a clinical team composed of endocrinologists, nutritionists, dietitians, physiotherapists, psychiatrists, psychologists, and sometimes surgeons. Cognitive behavioural therapy (CBT) is traditionally recognized as the best established treatment for binge



eating disorder and the most preferred intervention for obesity, and could be considered as the first-line treatment among psychological approaches, especially in a long-term perspective; however, it does not necessarily produce a successful weight loss.

Stress , Anxiety and CBT: In general, CBT is a reliable first-line approach for treatment of this class of disorders (Hofmann & Smits, 2008), with support for significant positive effects of CBT on secondary symptoms such as sleep dysfunction and anxiety sensitivity (Ghahramanlou, 2003).

Eating Disorders and CBT: For bulimia nervosa, meta-analyses compared the efficacy of CBT to control treatments and found effect sizes in the medium range (Thompson-Brenner, 2002). However, the effect of behaviour therapy was greater than that of CBT, with the average effect size for behaviour therapy in the large range (Thompson-Brenner, 2003).

Insomnia and CBT: CBT for insomnia (CBT-I) has long been shown to be more efficacious than control treatments. A recent meta-analysis examined its efficacy on both subjective and objective sleep parameters in comparison to a control group for individuals with primary insomnia (Okajima, Komada, & Inoue, 2011).

Discussion:The main objective of this study was to investigate the effect of CBT on depression, anxiety, and stress on subjects having PCOS. In fact, research results have indicated that CBT is highly effective in reducing depression. According to a case report, Correa et al., examined the effect of CBT on depression and anxiety of a 19-year-old girl with PCOS. Intervention in 11 personal and family sessions was conducted to accept lifestyle changes by the patient using CBT techniques and exercise training. This study showed that the use of CBT techniques was very effective in lowering BMI and decreasing depression, as well as regulating menstruation and reducing the menstrual bleeding of a girl. Bayt and colleagues, in Semnan (2015), in a randomized controlled clinical trial, 30 obese children with a BMI higher than 95 percentiles, considered CBT to be effective in reducing body mass index (29). Another study in Tehran, in 2008, based on the DSM-IV criteria for 90 patients with major depressive disorder, showed the effect of cognitive-behavioural therapy in combination with mindfulness based cognitive therapy in reducing depression in patients.