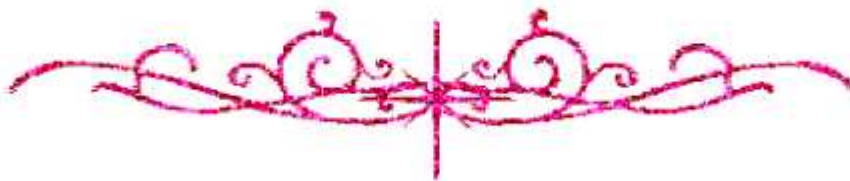


بسم الله الرحمن الرحيم





شبكة المعلومات الجامعية التوثيق الالكتروني والميكرو فيلم



جامعة عين شمس

التوثيق الإلكتروني والميكرو فيلم

قسم

نقسم بالله العظيم أن المادة التي تم توثيقها وتسجيلها
علي هذه الأقراص المدمجة قد أعدت دون أية تغييرات



يجب أن

تحتفظ هذه الأقراص المدمجة بعيدا عن الغبار





Effects of tobacco use on psychotic symptoms in male nicotine-dependent subjects with psychotic disorders

A thesis

For fulfillment of Master Degree in Psychiatry

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بِسْمِ اللَّهِ الرَّحْمَنِ الرَّحِيمِ

قالوا

اسجدوا لآلِهنا

إلا ما علمتنا إنك أنت

العليم

صدق الله العظيم

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List of abbreviations

CB1	
CDS	Cigarette Dependence Scale
CI	confidence interval
CMS	Centers for Medicare & Medicaid Services
CNS	Central nervous system
COX-2	cyclooxygenase-2
dACC	dorsal anterior cingulate cortex
DSM	Diagnostic and Statistical Manual of Mental Disorders
FGAs	First generation antipsychotics
fMRI	functional magnetic resonance imaging
FTCD	Fagerström Test for Cigarette Dependence
FTND	Fagerström Test of Nicotine Dependence
GABA	γ -aminobutyric acid
GWASs	genome-wide association studies
IQR	interquartile range
MR	Mendelian randomization
nAChRs	Nicotinic acetylcholine receptors
NDSS	Nicotine Dependence Syndrome Scale
NF-κB	nuclear factor kappa B
NMDA	N-methylD-aspartate
NNN	N'-nitrosonornicotine
NRT	Nicotine replacement therapy
NSDUH	National Survey on Drug Use and Health
PANSS	Positive and Negative Syndrome Scale
PET	positron emission tomography
PFC	prefrontal cortex
PPI	prepulse inhibition
SAES	Symptom Rating Scale
SCID I	Structured clinical interview for DSM-IV
SMH	self-medication hypothesis
SNP	nucleotide polymorphism
SPEM	smooth pursuit eye movements
SSD	schizophrenia spectrum disorders
TNP	transdermal nicotine patch
TSNAs	tobacco specific nitrosamines
VTa	ventral tegmental area
WISDM 68	Wisconsin Inventory of Smoking Dependence Motives

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INTRODUCTION

A meta-analysis has demonstrated that smoking prevalence among young people at the time of presentation for treatment of first-episode psychosis is around 60%, and six times higher than in age- and gender-matched controls (**Arnott et al., 2013**).

One of the most severe psychotic disorders is schizophrenia. It has long been acknowledged that there is a strong relationship between cigarette smoking and psychotic disorders. More recently, smoking has also been found to be associated with psychotic experiences in the general population (**Quigley and MacCabe, 2019**).

Between 72% and 90% of schizophrenic patients smoke cigarettes compared with 24% of the general population. Patients with schizophrenia smoke many more cigarettes on average per day, and often spend one third of their weekly income on cigarettes. In addition, some studies have found that these patients have higher serum levels of cotinine, the primary metabolite of nicotine (**Evins, 2008**).

Approximately 60% to 80% of current smokers fulfill classic criteria for drug dependence; e.g., they have difficulty stopping, have withdrawal when they stop, are tolerant and continue despite knowledge of personal harm (**AAAP, 2015**).

There has been emerging evidence of an association between tobacco smoking and schizophrenia spectrum disorders (SSD). There was substantial though inconclusive evidence supporting a causal relationship between tobacco smoking and increased risk of SSD. If a causal relationship does exist, nicotine is most likely responsible for this association (**Scott et al., 2018**).

Data indicate that the smoking rate in schizophrenia is also somewhat higher compared to that seen in other psychiatric disorders, such as mood disorder and bipolar disorder. In the latter condition, prevalence and severity of smoking is found to be associated with the severity of psychotic symptoms (**Kumaria & Postma, 2005**).

The reason for the increased rate of cigarette smoking in patients with schizophrenia is uncertain. The “self-medication” theory suggests that schizophrenic patients smoke cigarettes to reduce the severity of their positive and negative symptoms and to improve their cognitive functions. It is thought that nicotine reduces negative symptoms and improves cognitive functions by causing a temporary increase in the activity of the mesocortical dopamine system. (**Baran Tatar, 2018**)

The rates of tobacco addiction in individuals with psychiatric disorders (mental illness and addiction) continue to remain alarmingly high despite substantial decreases in smoking in the general population (**Ziedonis & Williams, 2003**).

Rationale:

Although the association between psychotic illness and cigarette smoking is well known, the reasons are unclear why people with psychosis are more likely to smoke than are the general population. **(Gurillo et al., 2015)**

The relationship between tobacco use and Schizophrenia spectrum disorders (SSD) remained significant even after adjusting for factors that might confound the relationship including family socio-economic status, cannabis use, parental substance abuse and parental psychosis. **(Scott et al., 2018)**

People with schizophrenia are three times more likely to smoke than other people and they tend to smoke more heavily. One of the most common explanations of this is that people with schizophrenia use smoking to control or manage some of the symptoms associated with their illness and to reduce some of the side effects of their medication **(Mental Health Foundation, 2007)**

Hypothesis:

The study presents a hypothesis that psychotic symptoms are probably severer in patients with nicotine dependence than patients who don't smoke, and that there may be a positive correlation between severity of nicotine dependence and severity of psychotic symptoms found in patients with psychosis who have nicotine dependence.