

Nicotine Addiction

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Abstract

Nicotine is found in tobacco plants and some other sources as well. Nicotine addiction through cigarette smoking is a serious problem to adolescents as well as adults. This has led to many premature deaths and disease. Tobacco use is one of the leading causes of death in the United States. Amongst college students some take the risk of smoking seriously and some do not. The treatment of nicotine addiction has been given prime attention. The manufacturers of tobacco have been misleading the people on the effect of smoking. Environmentally, the dangers of smoking are on both smokers and nonsmokers. Secondhand smoke is considered in humans, as a known cause of cancer. Billions of dollars a year are spent directly and indirectly on illnesses related to smoking by the United States.

Keywords: Nicotine, Tobacco, College Students, Death, Illness

Nicotine is found in several types of plants including tobacco plants. Nicotine is a chemical that contains nitrogen. It is the nicotine that is the driving force in tobacco that leads to addiction. According to A.C. Hoffman, "since tobacco use is driven by dependence on nicotine, the primary addictive substance in tobacco, much research has focused on nicotine dependence. Less well understood, however, is the role that menthol plays in nicotine dependence" (Hoffman

& Simmons, 2011, p. 1). From this, it is important to consider the role that menthol has to play in nicotine dependence in adults and adolescents.

There are some contributory factors that lead to reaching the conclusion on what role menthol plays on nicotine addiction. These factors include the time that the first cigarette was smoked on waking up and the wake-up time at night to smoke. Nicotine dependence also takes into account the number of cigarettes per day. Therefore, it is suggested that non-menthol smokers and nicotine smokers experience different level of nicotine dependence. Non-menthol smokers are less dependence on nicotine.

College Students Perception on Smoking and Addiction to Nicotine

There are two schools of thoughts amongst adolescents regarding what they think about the risk associated with being exposed to those that smoke. To substantiate this view, there was a study consisting of a survey conducted in the fall of 2001. Smokers and nonsmokers differed markedly in their “perceptions about the health risks associated with short-term exposure to smoking” (Murphy-Hoefer, Alder, & Higbee, 2004, p.372). The risk of smoking with reference to the frequency and quantity has become a debatable amongst smokers and nonsmokers college students.

The survey substantiated that amongst college students comparing smokers and nonsmokers, more nonsmokers believed that smoking on weekends or a few days a week has health risk than their smoking counterparts. This perception of the smokers does not discourage them to slow down in their smoking habit, and they do not believe that there is damage caused by each cigarette they smoke.

Treatment of Nicotine Addiction

Nicotine Replacement Therapy (NRT) is one means of treating nicotine addiction. Nicotine Replacement Therapy (NRT) is a way to gradually reduce the nicotine addiction by replacing something that has a lesser dose of nicotine. There are five different types of nicotine replacement therapy. These include patch, gum, nasal spray, inhalers and lozenges. All these types of replacements have side effects. Due to the serious havoc caused by nicotine addiction, Nicotine Replacement Therapy is being introduced to reduce the effect. But there are some therapeutic limitations in the cause of treatment. “Currently, nicotine replacement therapies (NRTs) ... are approved by the regulatory agencies as first-line treatments for nicotine addiction. Emerging evidence indicates that varenicline and bupropion have some therapeutic limitations for treating nicotine addiction with oral route of administration” (Islam & Rahman, 2012, p.123). In developed and developing nations, nicotine addiction has become the leading cause of death; thereby, increasing the mortality rate around the world. In some parts of the world, there is very little or no efforts made towards the treatment of this addiction. A part of the reason for this lack of treatments is limited resources. The expectation is that in due course, as knowledge advances to a higher level on the application of pulmonary drug delivery, better management will be extended to nicotine addiction.

Misleading and Minimizing the Effect of Nicotine Addiction by Manufacturers

The tobacco manufacturers have battled for years to down play the dangers of nicotine addiction. The main reason for doing this is to maximize profit at the expense of smokers' health effects caused by nicotine in cigarette. For instance, the United States Justice Department took the cigarette companies to court for defrauding the public for years. Regarding the U.S government case, "even though the tobacco companies knew fully well that cigarette smoking was harmful, they conspired a scheme that involved false and misleading statements about the health effects of smoking and second-hand smoke" (O'Rourke, 2004, p. 8). This implies that the tobacco manufacturers sometimes engage in sponsoring research that manipulates nicotine levels to sustain addiction.

As a result, misleading information is sent out to the consumers. "If the past 50 years have taught us anything, it is that the tobacco industry cannot be trusted to put the public's interest above their profit no matter what they say" (Cummings, Brown, & O'Connor, 2007, p. 1). This supports the fact that tobacco industries have misled the public for years on the effect of nicotine. They have deceived society about the risk of smoking low-tar cigarettes, nicotine addiction and secondhand smoke exposure. It is a well-known fact that the tobacco industries have known for years that cigarette smoking caused cancer. The tobacco industry even went further to funding scientific research that helped keep the ongoing debate about smoking and health for a long time.

Prevention Role by Anesthetists

As major as the issue of nicotine addiction is, all hands are on deck from different experts to prevent or minimize this addiction. Anesthetists are teaming up in hospitals to provide counseling and Nicotine Replacement Therapy as their own professional contribution.

As reported in the Tobacco intervention and anesthesia review, "with advances in surgical and anesthesia techniques and prolonged life expectancy, anesthetist will be faced with management of these patients. Tobacco consumption affects every major organ system of the body; especially lung, heart and blood vessels" (Saha, 2009, p.618).

This indicates that amongst the preventable agents of death in the world, tobacco is in the lead. Despite tremendous effort by the World Health Organization (WHO) to educate the masses that smoking is classified as a chronic progressive disease, tobacco consumption is on a large scale. This asserts that death from tobacco use is on the rise (Saha, 2009).

Environmental Tobacco Smoke (ETS)

Non-smokers who are around smokers do suffer also from the dangers of smoking. It affects their health as they get exposed to the second hand smoke. World Health Organization has certified this health hazard: "passive smoking (so-called ETS - Environmental Tobacco Smoke), which means accompanying smokers negatively influences the health of passive smokers" (Sikorska-Jaroszynska, Mielnik-Blaszczak, Krawczyk, Nasilowska-Barud, Blaszcak, 2012, p. 548).

This means that though an individual who is in a cigarette smoking environment may not smoke, his or her health status will be adversely affected because of the cigarette burning smoke in that environment. It is very important to emphasize that the benefit of nicotine addiction will be to both the cigarette and non-cigarette smokers who are exposed to a smoking environment. In order to help non-smokers from the adverse effects of nicotine addiction, more environments should be made non-smoking. In addition, smokers should be allowed to smoke in designated smoking areas only. To protect our children from secondhand smoke, the general population should be educated and encouraged to reduce exposing children to smoking environments by making their cars and homes smoke-free.

Environmental Influence on Smoking Pattern of People

Studies have proven that the environment where one is born and lives influences their smoking habits. A study was conducted to find out the impact that a parent region of birth has on the child with regards to exposure to second hand smoke for infants. The result of the environmental influence on smoking pattern of people was revealed in the study. Fathers born outside of Sweden smoked more often than Swedish-born fathers irrespective of region of birth (adjusted odds ratios [ORs] 1.77–3.02). Mothers born in Africa didn't smoke as much compared to Swedish-born mothers (adjusted OR 0.29; Wallby, 2008, p.1543). From the research, mothers born in Africa smoked less than Swedish-born mothers. Also, the research showed that single parents, low income, and mothers of 24 years of age or less had a greater risk for parental smoking.

Vital Statistics on Tobacco Smoking and Nicotine Addiction

The following editorial provides just a little glimpse of what danger Nicotine has posed to the general population:

Nov. 19--Sadly, West Virginia has America's worst rate of deadly cigarette smoking and exposure to dangerous second-hand smoke inside homes. That's the finding of a Centers for Disease Control survey released last week. A CDC announcement said:

Among states, smoking prevalence was highest in West Virginia (26.6 percent), Indiana (26.1 percent) and Kentucky (25.3 percent). ... Home exposure [to second-hand smoke] varied widely from 3 percent of adults exposed in their homes in Arizona to 10.1 and 10.6 percent, respectively, in Mississippi and West Virginia.

An average of 443,000 Americans die prematurely each year from heart attacks, cancers, strokes and other ailments linked to nicotine addiction, the CDC said. Sickness from cigarettes adds \$96 billion a year to U.S. medical costs. (Miller, 2009, p. 1)

In many parts of the world, the statistics on tobacco smoking and nicotine addiction are not even available. However, tobacco smoking and nicotine addiction is on the rise and this is a global problem.

It is an established fact that despite the health problems associated with nicotine addiction from smoking, such as diseases and death, thousands of people start smoking every day. Billions of cigarettes are sold every day. As a result, the government spends billions of dollars for smoking related health problems.

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