The Association for the Treatment of Tobacco Use and Dependence (ATTUD; www.attud.org) is a non-profit organization of nearly 450 Tobacco Treatment Specialists world-wide, dedicated to increasing the quality and availability of scientifically-proven tobacco treatments. Helping those who are addicted to tobacco is one of the most important public health interventions available. Countless clinical trials, observational studies, and evidence-based guidelines illustrate the benefit of using proven treatments for smoking cessation. As an organization devoted to helping tobacco users achieve healthier and happier lives, ATTUD is very concerned that the recent study by Alpert, et al. (2012), reports what we believe is a false conclusion that over-the-counter (OTC) nicotine replacement therapies (NRTs) are not effective, and thereby discourages smokers from accessing the most commonly used scientifically-proven treatment option. There are several reasons we believe the conclusion is false.

First, the authors omitted a number of critical previous studies in their review that had concluded OTC-NRTs are effective (Hughes et al, Nicotine & Tobacco Research, 13:512-522, 2011; West, et al. Thorax; 62(11):998-1002; 2007). The authors also make the mistake of evoking causality based on association. They observed less quitting among those who self-selected to use NRT than those who chose not to use NRT. Studies have shown that those who chose to use NRT have more past failures, more dependence, etc. and thus should have lower quit rates. This bias, in which the more severely-ill subjects receive a treatment and the less-ill do not is known as “indication bias.”

However, the main problem is the misunderstanding of how OTC NRT is beneficial. The Alpert study selected smokers who had used NRT in the last year and followed them over a second year. They found the rate of relapse in the second year to be no different between NRT users and non-users. The article did not report how long it had been since smokers had used NRT, which is currently marketed for short-term use as an aid to smoking cessation. Over 100 randomized studies have found NRT increases short term abstinence and in these studies, after NRT has stopped the rate of relapse back to smoking does not differ from that of smokers who quit without treatment. The benefit of treatment is of increasing the initial quit rates, not preventing relapse. Studying relapse rates in smokers several months after stopping NRT does not constitute the indictment of these aids that it might at first appear. Instead, it is like studying whether those who used penicillin sometime in the last year are less likely to have infections in the following year.

Therefore, ATTUD does not believe this study shows that NRT doesn’t help smokers to quit. This is not a groundbreaking study, but just one of 11 case-control studies on OTC NRT, many of which have found efficacy, while others have not. Unfortunately many reputable news agencies ran the press-release of the article without examining the findings. We fear that the consequences may be that many people who very much need to quit smoking and would benefit significantly from OTC NRT will not use it because they now believe that OTC NRT does not work. We would encourage clinicians, the media, health administrators, etc. to read the article and compare our interpretation of the findings with those of the authors. Falsely concluding that a proven treatment is ineffective can be tragic, especially when the targeted disorder is the leading cause of preventable death in the world.

Submitted on behalf of the members of the Association for the Treatment of Tobacco Use and Dependence (ATTUD) by
Michael Steinberg, MD, MPH; President