## 2016 Research Week Proposal

**Title** – The Reading Level of Smoking Cessation Information on Leading Health Organizations' Websites: A Descriptive Analysis

**Program of Study** – Public and Community Health

**Presentation Type** –Oral Presentation (Residential)- Digital Poster

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**Category – Choose one of the following:** Textual

## Abstract:

Smoking can be attributed to one in five deaths in the United States each year. When surveyed, seven out of ten current smokers admit that they want to quit smoking. One method that health professionals use to promote smoking cessation is providing smokers with informational materials. Such information is often made available via the internet by leading health organizations, including the CDC, National Cancer Institute, and American Lung Association. Experts recommend that literature provided over the Internet should correspond to the reading ability of the intended audience. The reading comprehension ability of the average American is currently a 6<sup>th</sup> grade level. This descriptive analysis uses the Statistical Measure of Gobbledygook (SMOG) formula to assess the reading level of leading health organizations' smoking cessation information on the Internet.

For the purpose of this study, smoking cessation educational literature from the major public health organizations and each state's health department website (61 webpages total) was located and analyzed for readability. Once this information was collected, the online SMOG

Readability Formula Calculator was used to determine reading level of the educational materials regarding smoking cessation.

Results showed that the average SMOG score including all words (raw score), for every website with a numerical score was 6.991. The SMOG average score excluding the words tobacco, nicotine, and cigarette (final score), which are well-known to the smoking population, was 6.414. The average SMOG score of the national websites was 7.536 (raw) and 6.973 (final). The average SMOG score of the state departments was 6.858 (raw) and 6.278 (final).

The above results show that while the average readability of online smoking cessation material is written within the recommended range in the United States, much of the online literature is still not written at a level that is compatible with reading level of the current smoking population. The readability level of the health literature, especially regarding such a prominent public health issue such as smoking, needs to be written at a level that is fitting to the needs of the intended population, United States smokers who want to quit smoking.

While many of the state and federal sites fall in the recommended range, 100% of the webpages produced by state and federal departments need to meet guidelines to provide maximum efficacy. States such as Georgia (8.0 final), Idaho (8.0 final), and Maine (8.2 final) and national websites such as the FDA (10.4 final) and World Health Organization (8.3 final) need to revise their literature for its readability level.

The practicality of this descriptive analysis is that these sixty-one organizations can read through their SMOG readability scores and edit their information to be more accurately targeted to their readers.

## **Christian worldview integration:**

My Christian worldview has helped me to better understand the gift that God has bestowed upon His creation in wisdom. God has given us science, technology, and information to better understand ourselves as creation in relation to Him, the Creator. My research design was greatly impacted by my faith because I understand the weight that this research has on the people in the United Status currently battling a smoking addiction, especially if they are not informed of all of the health side effects that are associated with the addiction.

God has given us bodies that are to be honored and glorified up to Him. 1 Corinthians 6:19-20 speaks into this theme when Paul tells the Corinthians, "Do you not know that your bodies are temples of the Holy Spirit, who is in you, whom you have received from God? You are not your own; you were bought at a price. Therefore, honor God with your bodies" (NIV).

My research is impactful because science, together with public health, has been able to chronicle the detrimental effects of smoking upon one's health in aspects including fertility, cancer, lung disease, oral health, etc. The purpose of my study was to get all of the smoking cessation information grouped and analyzed together so that health organizations can determine whether or not they are accurately meeting the needs of smokers in the United States.

Knowledge is power, but even greater than that power is the ability to apply knowledge in a practical way. It is clear from Scripture that we are to honor our bodies and God has given research professionals an incredible outlet to share information on the Internet.

Without writing at an appropriate level though, the knowledge isn't helping the average

American understand the effects of this health choice.