

Alachua County Florida Smoking Cessation

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The purpose of this paper is to discuss the smoking rates, sustained smoking cessation rates, comorbidities, and determinants of smoking in the underserved population of Alachua County. The number 1 ranking in the state for health care drew the interest in writing this paper about Alachua County. It's interesting to see if being first in the whole state of Florida when it comes to health care would have any bearing on smoking and smoking cessation rates in the community.

Overview of Alachua County

Alachua County is in north Florida about a hundred miles north of Orlando. The county seat is located in Gainesville, which is the home of the University Florida. Alachua's land area is 875 square miles with a population of about 283 per square mile (National Association of Counties, 2016). The population is mostly white at 63.7%, followed by 20.0% black, 8.4% Hispanic, 5.3% Asian, and 2.1% two or more races (City-data, 2016). The bulk of the economy of Alachua revolves around the University of Florida. The county is also known for culture, diversity, local artisans, markets, outdoor activities, parks, fishing, and golfing (Visit Gainesville, 2016).

Alachua County is 79% urban and 21% rural. Most of the population are working class at 66%, with 18% in the government, and 16% as self-employed. The top industries providing employment in the county include educational, followed by health or social services, professional, scientific, management, administrative, and retail trade (City-data, 2016). The three major employers are University of Florida with 14,723 employees, Shands Hospital with 12,588 employees, and Veterans Affairs Medical Center with 4,317 employees (National

Association of County & City Health Officials, 2012). The average household income in the county is \$38,454. The average age of a person in residing the county is 30 years, which is 10 years less than the state average. The major medical centers in Alachua County include Shands Hospital UF, Shands Hospital AGH, North Florida Regional Medical Center, and Veterans Affairs Medical Center. The county also has a lot of independent birthing centers, nursing homes, ambulatory care, dialysis, and surgery centers. The health care industry being the second largest employer in the county, the county has the highest number of providers per capita in the state of Florida (Gatorhomes.com, 2016).

Comparison of Local vs. State Findings

The poverty rate in Alachua County is high compared to the state. According to the U.S. Census Bureau, one out of four children in the county lives at or below the poverty line (2014). The percentage of the population living in poverty is 26.8% in 2013, while the state is 17%. The high school graduation rate in the county is about the same when compared to the state. The percentage of Alachua County residents that are 25 and older, with a high school diploma is at 74%, which is not far from the state average of 75%. The percentage of the population in Alachua that doesn't speak English, as their primary language is about half when compared to the state. In Alachua, 13.57% of the population does not use English as their primary language compared to 26.64% for the state. Alachua County is number one in the state when it comes to clinical care. There's 1 health care provider for every 670 individuals in Alachua compared to 1 for every 1,390 in the state of Florida (City-data, 2016).

Analysis and Interpretation of Data

Identified Strengths

The strengths of Alachua County include ranking number 1 in the state for clinical care, higher percentage of adults with college education, and lower percentage of uninsured individuals. One of the major strengths of Alachua County is that it ranks 1st in the state for clinical care. The county has a very low physician to patient ratio of 1:670 (County Health Rankings and Roadmaps, 2013). Besides the low primary care giver to patient ratio, the medical community in the county has the most modern facilities and skilled practitioners available in the country (Gatorhomes.com, 2016). This means that quality care is more readily obtained in the county in comparison to the state. Another strength of the county is that it has a higher percentage of adults with college education. Alachua has 75% of its population with some post secondary education while the state is at 61% (City-data, 2016). People with higher levels of education usually have lower rates of chronic diseases when compared to those with less education (The Centers for Disease Control and Prevention [CDC], 2016). The number of uninsured adults and children in Alachua county is also less than that of the state. The percentage of uninsured adults in Alachua falls at 22%, while the state is at 29%. The percentage of uninsured children in Alachua is at 10%, while the state is at 12% (County Health Rankings and Roadmaps, 2013). This is important because having health insurance is a major determinant of access to health care.

Identified Weaknesses

Areas in need of improvement in the county include high percentage of the population that falls below poverty level, low access to exercise opportunities, and high percentage of excessive drinking. In 2014, the percentage of individuals in Alachua that falls below the

poverty level is at 25.4% compared to 16.7% in the state (County Health Rankings and Roadmaps, 2013). People with lower incomes have higher rates of many chronic diseases (CDC, 2012). In Alachua County, only 84% of the population has access to exercise opportunities while the state boasts 92%. The Centers for Disease Control and Prevention recommends regular exercise because not only does it improve the overall health and fitness, but it also reduces risk for many chronic diseases (CDC, 2016). Alachua County also has a higher percentage of excessive drinking when compared to the state. Adults who reported binge or heavy drinking in Alachua falls at 20% while the state is at 17% (County Health Rankings and Roadmaps, 2013). This is important because excessive alcohol use can lead to increased health risks, such as cancer, liver disease, injuries, and violence (CDC, 2016).

Priority Health Issue

Almost everyone has heard of cancer. They may have known cancer personally, via a loved one, or by association with someone. Cancer is the 2nd leading cause of death in the United States and lung cancer kills more people in the U.S. than any other type of cancer (CDC). Cigarette smoking is the most common cause of lung cancer and it is also the most preventable cause of cancer in the world (Cancer Research UK, 2016). Cigarette smoking and poverty are inextricably linked. Poverty is associated with higher prevalence of smoking and smoking exacerbates poverty (World Health Organization, 2016). This makes smoking a priority health issue in Alachua county because of the high percentage of the population that falls below poverty levels. Alcohol use is also linked to smoking. Studies showed that with current alcohol users, 63.1% are also smokers and with current smokers, 61.9% were also alcohol users (De Silva, V., Samarasinghe, D., & Hanwella, R., 2011). This puts Alachua County at further risk because of the high percentage of adults that reported heavy drinking. Physical activity is also supported by

both psychological and physiological mechanisms as a very useful coping tool when it comes to smoking cessation and overall improvement of health (Trevino, L.A., Baker, L., McIntosh, S., Mustian, K., Seplaki, C.L., Guido, J., & Ossip, D.J., 2014). Less access to exercise opportunities in Alachua County also puts the county in even more risk when it comes to smoking.

Impact of Community Health Model

The determinants of health influence the health outcomes of a population. The determinants of health model include the social, personal, economic, and environmental factors that exert influence on health outcomes (Healthypeople.gov, 2016). These determinants must first be known and studied in order to address a population based health issue. Interventions are developed by first knowing the causative factors of the health issue. One biological factor that impact smoking cessation is age. Smoking is primarily started and established during adolescence (CDC, 2016). Socioeconomic status also plays a big role in smoking cessation since income and poverty are both closely linked to smoking. Lifestyle factors such as nutrition and activity levels also have an effect on smoking cessation (De Silva et al., 2011). By using this model and being aware of the different factors that have an impact, leaders can effectively address and effect a change on the priority health issue at hand.

Population Diagnosis

The population in Alachua County that falls under poverty line is at risk for increased prevalence of lung cancer due to tobacco use and lack of smoking cessation support.

Community/Population-based Interventions

Primary Level of Prevention

The primary level of prevention is aimed at the adolescent members of the community. Since smoking is primarily established during this age, early education in regards to the dangers

of smoking should be continued and solidified in the community. Parents and teachers would need to be made aware of how to provide appropriate education and guidance, since school and the home environment are both places where learning occurs. Legislators would also need to keep the laws in place for not selling tobacco products to minors. Hard-hitting and graphic anti smoking media campaigns should also be continued since studies show that these emotional and evocative campaigns are effective in preventing tobacco use (Tobaccofreeflorida.com, 2015). The role of the public health nurse in the primary level of prevention would be to educate. This role is especially important for the public health nurses who may be working for the school district.

Secondary Level of Prevention

The secondary level of prevention is aimed at the individual members of the population at risk. This involves the screening and intervention given by health care providers. The health care providers are major stakeholders in this level of prevention since the screening and treatment of smokers can greatly affect the health outcome of their patients. The limitations of this prevention would include the funding needed for the public health nurse or other health care provider to provide population specific care, such as smoking cessation. In this level of prevention, the public health nurse can give direct intervention via education, support, home visits, and follow up to the specific at risk members of the population.

Tertiary Level of Prevention

The tertiary level of prevention's aim is system-wide. It involves monitoring the intervention effects on the population and preventing further negative impacts on health. The community members can help monitor the effects of the intervention by being conscious of any decrease or increase in tobacco use. Public officials can help do their part by ensuring the

financial welfare of the at risk population by creating jobs and other means of decreasing poverty in the community. The limitation of this prevention is the economy and the funding, which are both crucial determinants in the creation of jobs. The community health nurse role involves the further prevention of negative impacts on health by advocating for the impoverished and the underserved, which are the most at risk members of the community for smoking (CDC, 2016).

Development of Health Policy

Decreasing the number of smokers and increasing the percentage of sustained smoking cessation rates in the underserved population of Alachua County will be the focus of this health policy. Due to the high percentage of the population that falls below poverty level (County Health Rankings and Roadmaps, 2013), the inextricable relationship of poverty and smoking (De Silva et al., 2011), and the low percentage of former smokers who have sustained cessation in Alachua County (Florida Department of Health, 2016), the proposal is to use the secondary level of prevention which involves providing smoking cessation as a population specific intervention. The proposal is to create a new position for a public health nurse as a smoking cessation specialist. A cluster randomized trial done on 2015 in Sydney and Melbourne showed that people who received complete or partial support from a nurse smoking cessation specialist were more likely to have sustained abstinence from smoking than those who did not (Zwar, N. A., Richmond, R. L., Halcomb, E. J., Furler, J. S., Smith, J. P., Hermiz, O., Jajasinghe, U. W., Borland, R. & Blackberry, I. D., 2015). Community members, health care providers and funding sources are the stakeholders that would be directly affected by this proposal. Community members would be likely to be in support of this policy since a dedicated smoking cessation nurse specialist would be a very valuable and useful asset in smoking cessation for the population. Funding sources and administrative health care providers may not be in support of

this policy due to the additional costs of creating a new position on top of the already astronomical costs of health care. Community members can exert a lot of influence on this policy by meeting and working together in having one voice to express the need for a nurse specialist to funding sources and administrative health care providers. Ultimately, however, the decision to create a new position lies on the opposing side.

The general plan in putting this policy in action would be to raise awareness of the need for a new public health nurse position by first reaching out to the community and getting a consensus of how the public feels. From here, presenting the policy to boards of the largest hospitals in Alachua County would be the next step. Since most boards include members of the community, health care providers, public health officials, and CEOs, a dialogue can be started between these different members of the community. This policy would address the need of the underserved population for a smoking cessation instrument that is evidenced based practice. Having a position for a smoking cessation nurse specialist would enhance the population health in general by helping to decrease the percentage of smokers in Alachua County and therefore decreasing the associated health care costs with smoking in general.

Conclusion

Smoking is a real problem in the underserved population of Alachua County. The relationship of tobacco use and poverty perpetuates the current problem of higher poverty rates in the county when the needy population uses their funds for smoking instead of basic necessities. The low rate of sustained smoking cessation in Alachua County necessitates the creation of a new position for public health nursing as a smoking cessation specialist.

References

- Cancer Research UK. (2016). *Smoking and cancer*. Causes of cancer. Retrieved from:
<http://www.cancerresearchuk.org/about-cancer/causes-of-cancer/smoking-and-cancer>
- Centers for Disease Control and Prevention. (2012). *Higher education and income levels keys to better health*. Annual report on nation's health. Retrieved from:
https://www.cdc.gov/media/releases/2012/p0516_higher_education.html
- Centers for Disease Control and Prevention. (2016). *Physical activity*. Physical activity basics. Retrieved from: <https://www.cdc.gov/physicalactivity/>
- Centers for Disease Control and Prevention. (2016). *Alcohol and public health*. Retrieved from: <https://www.cdc.gov/alcohol/>
- Centers for Disease Control and Prevention. (2016). *Lung cancer statistics*. Lung cancer. Retrieved from: <http://www.cdc.gov/cancer/lung/statistics/index.htm>
- Centers for Disease Control and Prevention. (2016). *Youth and tobacco use*. Fact sheets. Retrieved from:
http://www.cdc.gov/tobacco/data_statistics/fact_sheets/youth_data/tobacco_use/
- City-Data.com. (2016). *Alachua County Florida*. Retrieved from http://www.city-data.com/county/Pinellas_County-FL.html
- County Health Rankings and Roadmaps. (2013). *2013 National benchmarks*. Retrieved from <http://www.countyhealthrankings.org/sites/default/files/resources/2013%20National%20Benchmarks.pdf>
- De Silva, V., Samarasinghe, D., & Hanwella, R. (2011). *Association between concurrent alcohol and tobacco use and poverty*. *Drug Alcohol*. 30(1):69-73. doi: 10.1111/j.1465-3362.2010.00202.x. Retrieved from: <https://www.ncbi.nlm.nih.gov/pubmed/21219500>

Gatorhomes.com. (2016). *World class community health care*. Retrieved from:

<http://www.gatorhomes.com/gl-health.htm>

HealthyPeople.gov (2016). *Determinants of health*. Foundation health measures. Retrieved

from: <https://www.healthypeople.gov/2020/about/foundation-health-measures/Determinants-of-Health>

National Association of Counties. (2016). *Alachua County*. Retrieved from:

<https://web.archive.org/web/20110531210815/http://www.naco.org/Counties/Pages/FindACounty.aspx>

National Association of County & City Health Officials. (2012). *Alachua county community*

health profile. Alachua County Health Department. Retrieved from:

<http://www.naccho.org/uploads/downloadable-resources/Alachua-County-Community-Health-Profile-2012.pdf>

Trevino, L.A., Baker, L., McIntosh, S., Mustian, K., Seplaki, C.L., Guido, J., & Ossip, D.J.

(2014). *Physical activity as a coping strategy for smoking cessation in mid-life and older adults*. Addict Behaviour. doi: 10.1016/j.addbeh.2014.01.014. Retrieved from:

<https://www.ncbi.nlm.nih.gov/pmc/articles/PMC3999960/>

Tobaccofreeflorida.com. (2015). *Powerful anti-smoking ad campaigns work*. Retrieved from:

<http://www.tobaccofreeflorida.com/powerfuladswork/>

United States Census Bureau. (2014). *Quick facts*. Alachua county, Florida. Retrieved from:

<http://www.census.gov/quickfacts/table/HSG445214/12001>

United States Census Bureau. (2015). *QuickFacts Florida*. Retrieved from

<http://www.census.gov/quickfacts/table/PST045215/12,12103,00>

Visit Gainesville. (2016). *Get outdoors*. Alachua county visitors & convention bureau.

Retrieved from: <http://www.visitgainesville.com/get-outdoors/?p=3&id=0&search=&sort=-1>

World Health Organization. (2016). Poverty. *Tobacco free initiative (TFI)*. Retrieved from:

<http://www.who.int/tobacco/research/economics/rationale/poverty/en/>

Zwar, N. A., Richmond, R. L., Halcomb, E. J., Furler, J. S., Smith, J. P., Hermiz, O., Jajasinghe,

U. W., Borland, R. & Blackberry, I. D. (2015). Quit in general practice: A cluster

randomized trial of enhanced in-practice support for smoking cessation. *Oxford Journals*,

32(2), 173-180 8p. doi: 10.1093/fampra/cmu089