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Changing Health Care Policy by Utilizing Kingdon's Policy Stream Theory

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Abstract

The purpose of this paper is to describe the policy process of changing current regulations regarding rural health clinics (RHCs). Using Kingdon's Policy Stream Theory for guidance, the change project was designed to amend current regulations regarding the directorship of the RHCs, consequently allowing Nurse Practitioners (NP) to act as medical directors for rural health clinics (RHCs). This change fulfills the Institute of Medicine's charge to have nurses work to the highest level of their education, as well as a defined need to fill a gap in the health care system by decreasing rural health disparities. The Rural Health Care Services Act of 1977, or Public Law (PL) 95-210, was created to assist with these health disparities by providing all-inclusive rate funding to health centers in rural areas. With the current physician shortage and a large number of health care provider shortage areas in rural areas, it is necessary to amend PL 95-210 and provide reimbursement for nurse practitioners who reside in states that recognize nurse practitioner autonomy and who wish to operate clinics in these rural, underserved communities.

Key words: PL 95-210, inclusive rate funding, autonomy, rural, rural health, rural health clinic, nurse practitioner, 42 USC 1395x, disparities, underserved

Changing Policy by Utilizing Kingdon's Policy Stream Theory

Background and Significance

Rural health disparities are well documented throughout the United States (Douhit, Kiv, Dwolatzky, & Biswas, 2015; Arcury, Gesler, Preisser, Sherman, Spencer, & Perin, 2005; Belasco, Gong, Pence, & Wilkes, 2014; Bhatta & Phillips 2014; Johnson & Johnson, 2015). These disparities result in poorer health outcomes and higher mortality rates (Miller, 2017; Singh 2012; Weaver, Geiger, Lu, & Case, 2012; Kulshreshtha, Goyal, Dabhadkar, Veledar, & Vaccarino, 2014; Singh & Siahpush, 2013; Logan, Guo, Dodd, Muller, & Riley III, 2013; County Health Rankings, 2017). Of the 325 million people in the United States (World O Meter, 2018) approximately 60 million people currently reside in rural areas (United States Census Bureau, 2016). Rural residents represent 19.3% of the US population and rural America spans 97% of the country's land (United States Census Bureau, 2016).

The Rural Health Care Services Act of 1977, or PL 95-210 (1977), was intended to deal with the systematic indicator of health disparities in rural areas. One major requirement of PL 95-210 is that a physician must be the medical director of the clinic; however, the physician is not required to care for patients at the clinic. The benefit of qualifying as an RHC is reimbursement at an all-inclusive rate. This means the health clinic is reimbursed based on all allowable charges during the visit at one rate and not based on each individual test completed (Centers for Medicare and Medicaid Services, 2016). As supported by research, nurse practitioners are uniquely positioned to not only manage patient care for Rural Health Clinics but assist in ensuring there is an adequate number of health care providers and clinics available in rural areas.

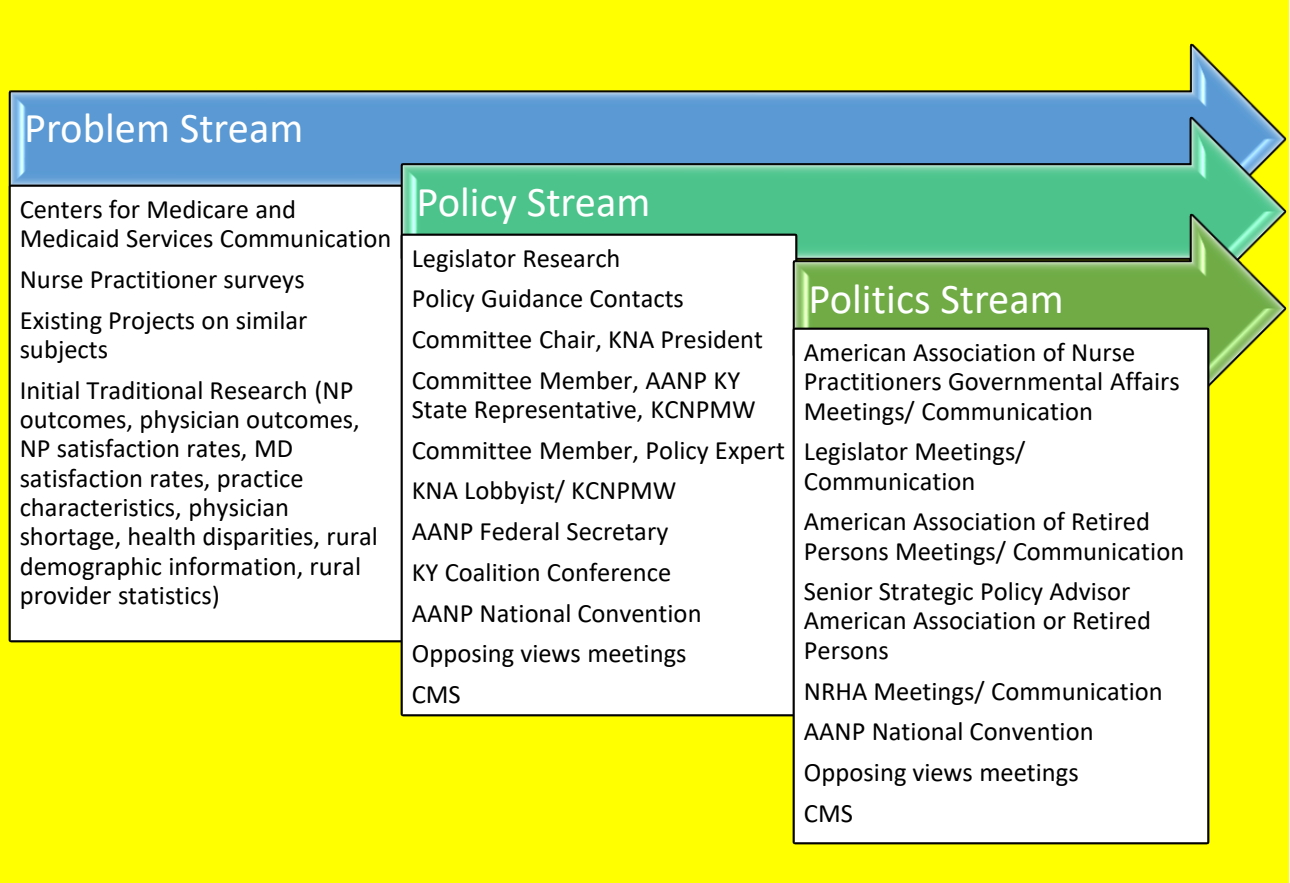
As a nurse who was born and raised in a rural area, who worked as a registered nurse in a rural area and who has witnessed the impact of decreased access to providers in rural areas, it was important to pursue a project that increased access to patients in rural areas and work towards decreasing health disparities to these underserved populations. This basic understanding of health disparities and lack of access to providers in rural areas assisted in framing the understanding that this issue does not simply impact a single community, but all the rural communities across America.

Purpose Statement

The purpose of this paper is to describe the policy process of changing current regulations regarding rural health clinics (RHCs). Supportive data is provided, expanding federal reimbursement for nurse practitioner (NP)-operated rural health clinics in states where statutes uphold NP independent practice. When this project was originally conceptualized, the goal was amendment of PL 95-210 the ultimate goal being increased access to health care in rural areas. This paper describes deliberate processes for methodically moving legislative initiatives, using Kingdon's policy streams.

Kingdon's Policy Streams

Kingdon's Policy Stream theory has three independent streams considered essential for the success of a policy change. These streams are independent in that they have individual characteristics that must be met; however, they interact with one another because the strength of one stream can strengthen or weaken the other streams. All three of these streams meet at a window of opportunity, the point in time in which the environment is right for passage of the legislative piece (Kingdon, 1995).



The Problem Stream

Identification of a problem, or the problem stream, identifies and defines the actual problem. According to Kingdon, this includes indicators; indicators are not simply statistics, but any indication of some systemic problem (Kingdon, 1995). PL 95-210 was enacted to offer reimbursement for Rural Health Clinics and incentivize providers to serve the medically underserved communities of rural areas. A Rural Health Clinic is defined by the clinic's location. It must be located in a non-urbanized area, as designated by the United States Census Bureau; it must either be located in a primary care health professional shortage area, be designated as a medically underserved area, or be recognized as a Governor-designated and Secretary-certified shortage area (Health Resources & Services Administration, 2016).

Medically underserved populations are those that have a high population-to-provider ratio, higher than average infant mortality rate, higher percent of the population below the federal poverty level, and a higher percent of the population age 65 or older (Health Resources & Services Administration, 2016). Inadequate numbers of providers, financial constraints, cultural differences, and lack of transportation are all indicators that impact the ability to see a medical provider on a regular basis or in a timely manner (Douhit, Kiv, Dwolatzky, & Biswas, 2015). A multivariable logistic analysis showed that individuals living in a rural area have unequal access to health care services (Arcury, Gesler, Preisser, Sherman, Spencer & Perin, 2005). Although this author recognizes this article is dated, geographic factors affecting rural areas are unchanged and remain relevant today.

Belasco, Gong, Pence, and Wilkes (2014) found that individuals living in rural areas have a 14% decreased breast cancer screening rate, 10% higher smoking prevalence, and 8% higher obesity prevalence, when compared to those in high accessibility areas. Bhatta & Phillips (2014) found that information about routine HPV vaccination in rural areas was only provided by health care providers 24.6% of the time and knowledge about the vaccine was only reported by 19.6% of rural health adolescents. A systematic review and meta-analysis suggested that rural children have a higher incidence and odds ratio of childhood obesity (Johnson & Johnson, 2015).

Focusing Events, Crises, and Symbols

Additional aspects of the problem stream, as identified by Kingdon (1995), are focusing events, crises, and symbols. These are factors that can give more focus and a sense of urgency to the topic for legislators, when indicators are inadequate alone to advance the policy. This author would argue that there are indicators that are symbolic of the crisis in rural America. Higher

mortality rates and a higher incidence of chronic medical conditions in rural areas further emphasize this crisis.

Suicide rates are statistically higher in rural areas (Miller, 2017). Covering an eight-year span, Singh (2012) found that cervical cancer mortality rates were up to 20% higher in rural areas. A study of cancer survivors showed that rural survivors had poorer overall health (Weaver, Geiger, Lu, & Case, 2012). Although mortality rates from coronary heart disease have decreased throughout the urban United States, mortality rates from coronary heart disease in rural areas were 10% higher (Kulshreshtha, Goyal, Dabhadkar, Veledar, & Vaccarino, 2014). In 2012, the overall mortality level was 13% higher for non-Hispanic whites, 8% higher for blacks, and 162% higher for American Indians/Alaska Natives living in rural areas. This disparity is attributed to heart disease, diabetes, chronic obstructive pulmonary disease, lung cancer, unintentional injuries, pneumonia/influenza, suicide, cirrhosis, stroke, and Alzheimer's disease (Singh & Siahpush, 2013). Rural areas have a higher prevalence of cardiovascular disease, diabetes, arthritis, and depression (Logan, Guo, Dodd, Muller, & Riley III, 2013). Rural areas continue to have the highest premature death rates throughout the United States. These deaths include suicide, homicide, drug overdose, motor vehicle accidents, and all other unintentional injury deaths (County Health Rankings, 2017). These indicators represent a crisis in rural America and signify an urgent need for change.

Feedback

In order to expose the need for change, government officials must obtain feedback on how existing programs are operating. PL 95-210 is an outdated law that has been in place since 1977 (Rural Health Services Act, 1977). Although created with the right intent, it has been inadequately updated. The above statistics show that the disparities in rural America persist.

The Affordable Care Act, 42 Code of Federal Regulations 491 (2010), extended the opportunity to qualify for reimbursement as rural health clinics to providers who hold doctoral degrees in the fields of optometry, dental surgery, dental medicine, surgical chiropody, and podiatry. This expansion to include more providers does not include doctoral prepared nurses or nurse practitioners who are educated to independently provide care at the primary care level.

Progress in the Problem Stream

A major component of the problem stream is verifying the intricacies of the state and federal law, as well as the regulations and statutes that allow for reimbursement by the governing body. Keeping consistent contact with the Center for Medicare and Medicaid Services (CMS) was essential throughout this project in order to ensure the most up-to-date information on regulations and statutes. This proved to be a very time-consuming process as many individuals throughout CMS had to verify and research the information that was requested. Since initial contact with CMS, there have been approximately fifteen follow-up phone calls to ensure proper understanding of specific regulations and statutes. A main contact, Region 6 Rural Health Clinic Specialist for CMS, has proven to be an invaluable resource. This contact confirmed that according to all current regulation, RHCs must have an overseeing physician. She has also been pivotal in providing survey information for RHCs and regulation and amendment data.

Initial research also included obtaining specific information from nurse practitioners regarding the process used to obtain contracts with physician medical directors. This is essential information and impacts the nurse practitioner's decision when determining whether or not to establish a rural clinic. Preliminary research on this proved ineffective. It consisted of contacting the clinics listed as RHCs according to the CMS database and trying to make contact with their owners. This was very time consuming and owners were very difficult to contact without

traveling to the site in person. No substantial information was obtained through this means, as many of these health clinics are hospital associated RHCs.

The next method to determine the relationship medical directors have with their operating NPs was to elicit information through Listserv sites and nursing community rooms such as those hosted by the American Nurses Association (ANA). This route was much more effective and resulted in six substantial responses. The responses from NPs working in rural areas indicated that NPs could pay their medical director up to $3000 a quarter to sign off on their patient charts. This would obviously not be ideal for an NP who wishes to establish a clinic in a rural area.

An additional step in the initial research was to determine whether other nurses, including DNP, EdD, or PhD students, were working on similar projects. ANA was contacted; no real communication process had been established for doctoral student communication. Deans and Professors of Graduate Schools of Nursing from all 50 states across the country were contacted to determine whether someone else had made progress in this particular area. There were no responses that indicated anyone else was currently working on a similar project. Working with other colleagues would have been helpful to compare approaches for policy change and assist in establishment of resources and contacts that could move the initiative forward.

The Policy Stream

The policy stream is comprised of experts within groups or committees. These specialists consider the known indicators and propose the proper course of action moving forward. Throughout this stream, the feasibility, value acceptability, and potential constraints of a proposal are discussed, as well as how to properly navigate any issues that may arise in these areas. Sufficient investigation into all of these areas assists in ensuring the best possible chance for success of a policy change (Kingdon, 1995).

Feasibility

In 2017, there were 4,171 primary medical health provider shortage areas located in rural areas (Health Services and Resources Administration, 2017). It is predicted that within the next decade, the United States physician shortage will grow from 61,700 to 94,700. Currently, the United States ranks 30 out of 35 countries in the number of medical school graduates annually, and 23 out of 28 in the number of established physicians / 1,000 residents (Association of American Medical Colleges, 2016). In rural areas there were 68 primary care physicians per 100,000 patients versus 84 in urban areas (Glenn, 2013). Physicians alone cannot resolve this issue.

Kippenbrock, Lo, Odell, and Buron (2015) found that 75% of NPs practiced in health professional shortage areas and approximately 47% percent practiced in rural areas. In 2015, only 17% of physicians practiced in rural areas (Buerhaus, DesRoches, Dittus, & Donelan, 2015). Nurse practitioners are statistically more likely than physicians, to care for Medicare beneficiaries in designated underserved populations and rural areas (DeRoches, Gaudet, Perloff, Donelan, Iezzoni, & Buerhaus, 2013). Nurse Practitioners are competent practitioners that are capable of independent practice. Twenty-three states allow all NPs to evaluate, diagnose, interpret diagnostic tests, initiate and manage treatments; sixteen states allow reduced NP practice, requiring collaboration with a physician for a least one element of NP practice (American Association of Nurse Practitioners, 2018).

Value Acceptability

A meta-analysis of 23 observational studies and 14 randomized-controlled trials focused around eleven patient outcomes, comparing physician and NP performance. The data demonstrated that NPs achieved equivalent scoring on patient satisfaction, hospitalization rates,

unexpected emergency department visits, self-perceived health status, functional status, patient mortality rates, blood glucose control, blood pressure control, lipid-panel control, patient safety outcomes, and length of stay in an acute care setting (Stanik et. al, 2013). One study of outcomes for patients of nurse practitioner managed-health clinics for patients with cardiac surgery follow-up, indicated that at two-weeks post-op, patients had fewer symptoms and a higher level of functioning, when cared for by a nurse practitioner at a nurse-managed health clinic, as compared to a traditional clinic (Sawatzky, Christie, & Singal, 2013).

Lutfiyya et al. (2017) analyzed the care provided by nurse practitioners and physicians to diabetic patients and found that nurse practitioners actually had improved patient outcomes and decreased healthcare costs, when compared to their physician counterparts. Pirret, Neville, & La Grow (2015) demonstrated that there was no significant difference in nurse practitioner ability to diagnose, identify a problem or propose actions in complex patient case scenarios, when compared to physicians. Seven randomized controlled trials showed that NPs had equivalent or better patient outcomes when compared to physicians (Swan, Ferguson, Chang, Larson, & Smaldone, 2015).

Potential Constraints

Kingdon (1995) emphasizes the importance of considering potential constraints and anticipating possible solutions. This author anticipates that there may be some hesitation from the medical community to allow amendment of this particular law allowing NPs to independently operate Rural Health Clinics. Multiple statutes have addressed increased levels of NP autonomy. Senate Bill S1869-A (2017) allows Texas NPs to sign do-not-resuscitate orders. In Michigan, NPs may authorize and issue orders on a Physician Orders for Scope of Treatment (POST) form as newly passed House Bill 4170 dictates (Public Act 154 of 2017). Arkansas

House Bill 1180 allows NPs to determine handicapped status for placard and disability parking permits, administer sports physicals for students, physicals for bus drivers, sign death certificates, sign jury excuses related to illnesses, sign worker compensation forms, absentee release forms for school, and sign forms authorizing medical equipment (Act 372, 2017). Like the requested change for recognition of NP qualifications for federal reimbursement of rural health clinics, these are all pieces of legislation that are addressing the current health care needs and the current educational level and training of the nurse practitioner.

Navigating the Policy Stream

Committee Chair, Kentucky Nurses Association President and nursing activist, was absolutely the largest resource available to me. Throughout her career, she has lectured graduate level nurses on health policy and has had a substantial impact on policies that affect patients throughout America. She is well-known throughout the nursing community and provided the project numerous contacts, including team members, AANP Kentucky State Representative and active Kentucky Coalition for Nurse Practitioners and Midwives and a policy expert. She has regularly pointed out areas in need of strengthening and possible points of contact throughout the entire project (Personal Communication, 2017 & 2018).

One of the first contacts made and a member of the project team is the Kentucky state representative for the American Association of Nurse Practitioners (AANP). This committee member is also an active member of the Kentucky Coalition of Nurse Practitioners and Midwives (KCNPMW) and an owner of a Rural Health Clinic. She was key in the forward movement of this project and has offered guidance, insight, and points-of-contact throughout both organizations, as well as a personal perspective on the current status of health care in rural America. Her insight has proven immensely valuable in understanding the intricacies of the

political system and professional organization hierarchy. Although this committee member is absolutely an influential stakeholder and therefore would also fall under the political stream, she was acting in the capacity of a resource; therefore, it is necessary to reference her in both the policy stream and the political stream (Kingdon, 1995).

KNA and Kentucky Coalition of Nurse Practitioners and Midwives state lobbyist, has also offered valuable insight into political workings on several occasions and has given highly educated and informed positions on different aspects of the bill moving forward, ways to achieve the desired outcome and legislators that may be open to the initiative. During a meeting with Dr. Schuster, she explained that there may be more than one way to achieve the desired result; there is irony in that early remark as the result of this project is not exactly the desired result but obtains the same goal (Personal Communication, 2017 & 2018).

This project's policy expert, also a member of the project team, has been a valuable resource in navigation of the policy arena and policy stream. She has provided insight into how to best tackle the large and complex issue of amending an existing federal law and she has been a continuous point of reference throughout the entire project. She has guided this project by encouraging the use of Kingdon's Policy Stream as a means of driving the completeness of the project and explaining the processes to effect change (Personal Communication, 2017 & 2018).

American Association of Nurse Practitioners Federal Secretary also provided key feedback during an interview and subsequent follow-up emails. One critique the AANP Secretary had of this project during the interview was to obtain personal testimonials (Personal Communication, 2018). This perspective and advice proved valuable in the overall execution and evaluation of the project.

An important aspect of considering the constraints within this policy stream is understanding key players that will need to be favorably influenced in order to succeed in the amendment process. To give this full consideration, thorough legislator research must be completed. Although legislator research has been a continuous process throughout this project, because of their relevance to success or failure of the amendment, it appears appropriate to place this work in the policy stream. One-hundred and three members of Congress were initially researched for this project. After initial review of political affiliations, voting records, and social affiliations, one member of Congress from each state, except Washington, was contacted for a comment/interview and were encouraged to act on the amendment of PL 95-210 (Rural Health Services Act, 1977). Although two key representatives for Washington were researched, this author was excluded from forwarding information to these representatives since this author does not reside in one of their zip codes.

Interviews with legislators regarding amendment of PL 95-210 (Rural Health Services Act, 1977) yielded valuable information. Since the original goal was to amend the law to include nurse practitioners as clinic directors, speaking with legislators was an essential part of moving the initiative forward. Five legislators agreed to a meeting. During the meeting, all five appeared to recognize the importance of increasing access to rural areas, but they were very non-committal with their dedication to the policy change. This was a valuable insight because although they did not cite specific concerns, their lack of support and commitment can attest to a number of issues with the delivery or can attest to the need for subsequent meetings with them to identify and address their concerns.

Part of assessing the weakness and strengths of a policy project, is to meet with some opponents as well as supporters of the proposed change. For this proposed change, a meeting

took place with two stakeholders from whom it was anticipated there would be opposing views on the ability of the nurse practitioner to own and operate RHCs without physician oversight. One additional opposing view came from a member of a stakeholder group that was anticipated to be fully in support of the initiative, the National Rural Health Association. These stakeholders dually lend to this project in both the policy and the political arena. Their views and opinions were utilized to strengthen the arguments of this project and therefore lend strength to the policy stream. They are major stakeholders in this project related to their focus on healthcare and in the instance of the NRHA, their work in rural areas, so they also fall under the political stream as well. Some concerns these oppositional physician stakeholders have regarding the proposed policy change were the anticipated hesitations. One physician voiced concerns of inadequate training to do the job of a physician; another physician felt as though NPs needed oversight.

Political Stream

The political stream, as described by Kingdon, consists of the political atmosphere, which is a continuously changing stream. The national mood or public opinion regarding an issue has a major bearing on whether or not the issue will even be addressed. Special interest groups have an impact and should be approached as they can impact national opinion, and consequently, legislators. Recent election outcomes or even impending elections can influence the weight of a policy proposal. Perhaps one of the more prevailing issues when discussing a new piece of legislation is the ideologic distribution of Congress. Ideally, this would have no bearing on passage of an important piece of legislation; however, realistically it absolutely does and must be considered (Kingdon, 1995). Bipartisan support must always be sought.

Public Opinion

Studies suggest that patients are very satisfied with nurse practitioner care (Ryan & Rahman, 2012; Swan, Ferguson, Chang, Larson, & Smaldone, 2015). In an Association of American Medical Colleges Consumer Survey of more than 670,000 individuals, only 25.4% strongly preferred seeing a physician over an NP or a Physician Assistant (PA), when there was no time allocation tied to the scenario. When a more clinically specific scenario was presented, one of seeing an NP or a PA today or a physician tomorrow for a worsening cough, 60% preferred to see someone today while only 25% preferred to wait a day to see a physician. This study also showed that those patients that had previously seen an NP or a PA showed a preference to those types of providers, compared to those who had only seen physicians (Dill, Pankow, Erikson, & Shipman, 2013).

Special Interest Groups/ Stakeholders

The American Medical Association (AMA) is a strong opponent of independent nurse practitioner practice and states they believe there is no alternative to a physician-led health care team (American Medical Association House of Delegates, 2017). Following the proposal to allow advanced practice registered nurses (APRNs) to practice independently within the Department of Veterans Affairs, the AMA came out with a strongly worded press release opposing the Veterans Administration (VA) action (American Medical Association, 2016). When the Institute of Medicine released its report in 2010 calling for nurses to practice to the full capabilities of their education and training, the American Medical Association, American College of Physicians, and The Physicians Foundation issued statements that the nurse practitioner's role is best suited under the direction of a physician (Eastman, 2010; American College of Physicians, 2010; Isaacs & Jellinek 2012).

Although some physician groups are banding together to restrict nurse practitioner practice, not all physicians are opposed to NP autonomy. An article in the American Medical Association Journal of Ethics detailed an example case study in which a physician and CEO of a health network advised her physician staff that she was going to encourage nurse practitioners to pursue leadership roles and to accept their own teams. The physician author of this article noted that it was unethical to deny patients quality, competent care simply because it is being offered by a nurse practitioner and not by a physician. The author cited studies that indicate nurse practitioner practice has no statistically significant difference in outcomes, when compared to that of a physician (Bakanas, 2013).

Professional nursing associations, such as the American Nurses Association, the Kentucky Coalition of Nurse Practitioners and Midwives, and the American Association of Nurse Practitioners would be strong supporters of this proposal. Since the Robert Wood Johnson Foundation and the American Association of Retired Persons supports the Institute of Medicine's stance on the nurse practitioner's role, the Foundation may also be a strong advocate of the proposed amendment. The Institute of Medicine Report, The Future of Nursing: Leading Change, Advancing Health details four key messages: nurses should practice to the full extent of their education, nurses should strive to achieve higher levels of education in an improved health care system, nurses should be full partners with physicians and other health care professionals, and effective planning and policy in the workplace require better data collection (Institute of Medicine, 2010). Other stakeholders such as patients and caregivers can all be key supporters in passage of this amendment by contacting their representatives and asking them to amend PL 95-210.

Ideologic Distribution

Understanding the ideologic difference between parties can be essential in delivering the appropriate message and ensuring passage of a legislative initiative (Kingdon, 1995). The United States currently has a supermajority Republican Congress, both in the House and in the Senate. Obtaining support from a Republican representative is imperative for the passage of this requested amendment. Republicans are historically financially conservative but can see the value of eliminating the financial strain that lack of primary care providers in rural areas has on the United States economy.

National health expenses grew 4.3% in 2016 to $3.3 trillion. Medicare spending grew to 3.6%, or $672 billion, and Medicaid spending increased 3.9% or $565 billion. Private insurance increased to $1,123 billion and out-of-pocket expenses rose to $353 billion. Hospital expenses grew 4.7% to $1,083 billion (Centers for Medicare & Medicaid Services, 2017). Health care expenses are staggering and increased access to primary care can assist in decreasing this expense. A recent study suggests that when primary care was made available to patients, overall health care utilization is decreased (Bradley & Walker, 2018).

Navigating the Political Stream

In the process of seeking information from rural health nurse practitioners on the American Nurses Association's online community, contact was made by the Senior Strategic Policy Advisor for the AARP. An appointment was immediately scheduled with her. In her role at the AARP, she spear-headed the Campaign for Change, along with the Institute of Medicine that called nurses to rise to their full potential by practicing to the full capabilities of their education and training. Since the initial meeting, the Senior Strategic Advisor has kept in frequent contact to check in to ensure this initiative is moving forward. She is actively petitioning AARP to pressure CMS to make the appropriate changes to the regulations and is

partially responsible for obtaining a meeting with a very large supporting stakeholder for this initiative, the American Association of Nurse Practitioners (AANP) (Personal Communication, 2018).

The National Rural Health Association (NRHA) is a very large national organization with over 21,000 members that strives to provide leadership on rural health issues (NRHA, 2018). This group is a stakeholder in the effort to increase health care access in rural areas. Some key contacts at the NRHA include the Chairman of Rural Health Clinics, and the Chairman of Federally Qualified Health Clinics. Although these relationships have not been as fruitful as initially anticipated, there are some positive aspects that may further the legislative process. For instance, the Chairman of Federally Qualified Rural Health Clinics was unaware of the current public law and brought to light important oppositional views that may be appeased by simple education. His concern was that if the law no longer requires oversight by a physician medical director, then collaboration would be stunted. It is important to note that physicians and dentists are allowed independent practice, but that all professionals may seek assistance of specialists when needed. Collaboration and subordination are two completely separate concepts and unfortunately, the current law demands subordination. Compelling data regarding lack of access in rural areas due to an inadequate number of physicians, made a very sound case and perhaps resulted in support of an amendment (Personal Communication, 2018).

Initial contact with the AANP was a state policy analyst. Although she was initially not very familiar with this specific topic, it allowed the opportunity to educate and plead the case for amendment and further meetings within the AANP at the federal level (Personal Communication, 2018). The state policy analyst with AANP initiated contact with an office manager, an individual with multiple roles within the AANP. One of his roles includes assisting

policy analysists at the state and federal level; he works closely with AANP's Vice President of Federal Governmental Affairs. After several emails with the office manager and a telephone conversation, a meeting with the Vice President of Governmental Affairs of the AANP and the entire Governmental Affairs team was scheduled (Personal Communication, 2018).

During the AANP Governmental Affairs meeting, this author thanked for my thorough and dedicated work on this initiative and for bringing it to their attention. A member of the committee, Director of Reimbursement and Regulatory Affairs, advised that although federal and state regulations state that NPs cannot be medical directors, there are statutes that are contradictory, citing 42 United States Code 1395x § aa (2) (Rural Health Services Act, 1977). He considered this favorable, explaining that when there is such a disconnect between statutes and regulations and laws, then the appeal can be made directly to CMS to have the regulations changed and that formal amendment of the law is not necessary. AANP is currently pursuing that directive as a result of this meeting and research (AANP Governmental Affairs, Personal Communication, May 2018).

Following the AANP meeting, there was some confusion because these regulations had been thoroughly reviewed on several occasions with key stakeholders. In fact, CMS had previously referenced this particular regulation in a conversation to support the stance of the necessity of a physician medical director. After determining there had been no recent amendments, a representative with CMS was contacted again as well as various other contacts including the committee member with the Kentucky Coalition of Nurse Practitioners and Midwives, the Senior Strategic Advisor with the AARP, and the Secretary with the AANP. The CMS contact and all other resources confirmed that they were not aware of a statute that was

oppositional to that of the information presented in the regulation, implying that another meeting with AANP was necessary to obtain clarification (Personal Communication, 2018).

While attending the AANP National Convention in an attempt to obtain more testimonials from NPs from across the nation and to speak with AANP Secretary and Kentucky State Representative and various other stakeholders, information was relayed that the Vice President of Government Affairs would be willing to meet again. Another appointment with the Director of Reimbursement and Regulatory Affairs from the AANP Governmental Affairs Committee was scheduled. During this meeting it was clarified that 42 United States Code 1395x § aa (2) (Rural Health Services Act, 1977) has verbiage for instances in which the clinic is not owned / operated by a physician and verbiage for when it is. The Director stated this speaks to the authority of CMS to change the specific statute. He also stated that since our first meeting in May 2018, AANP had met with CMS and expressed the disconnect in the verbiage for this specific statute. The Directr of Reimbursement and Regulatory Affairs stated that CMS seemed open to changing the statute to allow NPs to assume the director role of rural health clinics (Personal Communication, July 2018).

Policy Window

The opening of a policy window is an opportunity for the advocates of a proposal to push the policy forward for official review. Prior to opening the policy window, the problem stream, policy stream, and the politics stream all have to be addressed and constantly updated, to ensure all information is relevant, in anticipation of the window opening. Predictability is not always possible when managing a policy change; the window can open and close at any time and it may open and close for a specific policy several times for various reasons, including changes in officials, sensationalism, recent events or crises (Kingdon, 1995).

It is essential to note that recent enactment of the Affordable Care Act, 42 CFR 491 (2010), has provided the opportunity for doctorate holders in the fields of optometry, dental surgery, dental medicine, surgical chiropody, and podiatry to qualify for reimbursement as rural health clinics, but not doctoral prepared nurses or nurse practitioners who are educated to independently provide care at the primary care level. This is part of the open window.

The Affordable Care Act authorized funding for nurse-managed health clinics in an attempt to decrease health care costs and compensate for the lack of access to primary care physicians (Patient Protection and Affordable Care Act, 2010). The Affordable Care Act (ACA) has identified nurse-managed health centers as critical safety net providers for underserved populations (Robert Wood Johnson Foundation, 2011). Nurse-managed health centers are centers operated by advanced practice registered nurses, primarily nurse practitioners (American Association of Colleges of Nursing, 2014). It must be noted that these nurse-managed health clinics do not qualify for reimbursement as a federally qualified rural health clinic, even when the clinics are located in rural areas. As noted above, in order to qualify for this all-inclusive rate funding, the clinic must have an over-seeing physician (Rural Health Services Act, 1977).

Policy Window Application

After meeting with a major stakeholder, AANP, it was discovered that it is not necessary to change the Public Law, but to petition CMS to utilize their authority to re-word regulations. This project started as a policy change piece. It sounded so simple, but policy change requires a web of collaboration and constant reflection and update. Throughout this project, it was necessary to continuously update key stakeholders with the status and progress in order to keep them interested in the project. If there was a failure to do so, their interest would wane, and the project would fail.

It is also important to understand that policy change is full of compromises. I did not expect to have a statute arise towards the end of my project that supports the position of amendment or to make total amendment unnecessary. Ideally, amendment would still take place to demonstrate to the world that NPs are fully capable providers of independent practice. If regulations may be changed more promptly and still deliver the much-needed access to care, that the individuals living in rural areas so desperately need, then it is still absolutely a victory.

The persistence in this policy change does not conclude with this paper or even at the conclusion of the project defense. Policy change requires consistency, persistence and follow-up. Follow-up with key stakeholders is essential to ensure that rural areas obtain the needed access to health services. Intended follow-up strategies include monthly communication with the Governmental Affairs Committee of the AANP, communication with contacts at AARP to determine willingness to influence change within CMS, and communication with CMS to determine if a policy change has taken effect.

IRB

IRB approval was waived for this project.

References

Act 372, House Bill 1180, (2017).

Acurary, T. A., Gesler, W. M., Preisser, J. S., Sherman, J., Spencer, J., & Perin, J. (2005). The effects of geography and spatial behavior on health care utilization among the residents of a rural region. Health Services Research, 40(1), 135-155. Retrieved from https://www.ncbi.nlm.nih.gov/pmc/articles/PMC1361130/pdf/hesr_00346.pdf

American Association of Colleges of Nursing. (2014). Nurse-managed health clinics: Increasing access to primary care and educating the health care workforce. Retrieved from http://aacn.nche.edu/government-affairs/FY13NMHCs.pdf

American Association of Nurse Practitioners. (2018). State practice environment. Retrieved from https://www.aanp.org/legislation-regulation/state-legislation/state-practice-environment

American College of Physicians. (2010). American College of Physicians response to the Institute of Medicine's Report, The Future of Nurse: Leading Change, Advancing Health. Retrieved from https://www.acponline.org/acp_policy/policies/future_nursing_leading_change_advancing_health_2010.pdf

American Medication Association. (2016). AMA Statement on VA proposed rule on advanced practice nurses. Retrieved from https://www.ama-assn.org/ama-statement-va-proposed-rule-advanced-practice-nurses

American Medical Association House of Delegates. (2017). Resolution: 214. Retrieved from https://www.ama-assn.org/sites/default/files/media-browser/public/hod/i17-214.pdf

Association of American Medical Colleges. (2016). New research confirms looming physician shortage. Retrieved from

https://www.aamc.org/newsroom/newsreleases/458074/2016_workforce_projections_04052016.html

Bakanas, E. L. (2013). Resistance to changing roles in the medical team. AMA Journal of Ethics, 15(6), 498-503. Retrieved from http://journalofethics.ama-assn.org/2013/06/ecas2-1306.html

Belasco, E., J., Gong, G., Pence, B., Wilkes, E. (2014). The impact of rural health care accessibility on cancer-related behaviors and outcomes. Applied Health Economics and Health Policy. 12(4), 461-470. Retrieved from https://www.ncbi.nlm.nih.gov/pubmed/24889860

Buerhaus, P. I., DesRoches, C. M., Dittus, R., & Donelan, K. (2015). Practice characteristics of primary care nurse practitioners and physicians. Nursing Outlook, 63(2015), 144-153. http://doi.dx.org/10.1016/j.outlook.2014.08.008

Bradley, C. & Walker, L. (2018). The effect of primary care visits on health care utilization: Findings from a randomized controlled trial. In Research Briefs in Economic Policy. (104). Retrieved from https://object.cato.org/sites/cato.org/files/pubs/pdf/rb104.pdf

Centers for Medicare & Medicaid Services. (2017). NHE Fact Sheet. Retrieved from https://www.cms.gov/research-statistics-data-and-systems/statistics-trends-and-reports/nationalhealthexpenddata/nhe-fact-sheet.html

County Health Rankings. (2017). 2016 county health rankings and key findings report. Retrieved from http://www.countyhealthrankings.org/2017-county-health-rankings-key-findings-report

DesRoches, C. M., Gaudet, J., Perloff, J., Donelan, K., Iezzoni, L. I., & Buerhaus, P. (2013). Using Medicare data to assess nurse practitioner- provided care. *Nursing Outlook, 61*(6), 400-407. http://dx.doi.org/10.1016/j.outlook.2013.05.005

Dill, M. J., Pankow, S., Erikson, C., Shipman, S. (2013). Survey shows consumers open to a greater role for physician assistants and nurse practitioners. Health Affairs, 32(6). http://dx.doi.org/ 10.1377/hlthaff.2012.1150

Do Not Resuscitate Orders, S Senate Bill 1869, (2017).

Douhit, N., Kiv, S., Dwolatzky, T., & Biswas, S. (2015, June). Exposing some important barriers to health care access in the rural USA. *Public Health*, *129*(6), 611-620. http://dx.doi.org/10.1016/j.puhe.2015.04.001

Eastman, P. (2010). New Institute of Medicine Report calls for transformation of nursing, increased empowerment and responsibility. Oncology Times, 32(20), 42-43. http://dx.doi.org/ 10.1097/01.COT.0000390564.39748.93

Glenn, B. (2013). Is unequal primary care workforce distribution a bigger problem than the physician shortage? Medical Economics. Retrieved from http://medicaleconomics.modernmedicine.com/medical-economics/content/tags/american-academy-family-physicians/unequal-primary-care-workforce-dis

Grant, R. (2016). The U.S. is running out of nurses. The Atlantic. Retrieved from https://www.theatlantic.com/health/archive/2016/02/nursing-shortage/459741/

Health Resources & Services Administration. (2016). Medically underserved areas and populations. Retrieved from https://bhw.hrsa.gov/shortage-designation/muap

Health Resources & Services Administration. (2017). Designated health professional shortage area statistics. Retrieved from https://datawarehouse.hrsa.gov/topics/shortageAreas.aspx

Institute of Medicine. (2010). The future of nursing: Leading change, advancing health. Retrieved from http://nationalacademies.org/hmd/~/media/Files/Report%20Files/2010/The-Future-of-Nursing/Future%20of%20Nursing%202010%20Report%20Brief.pdf

Isaacs, S. & Jellinek, P. (2012). Accept no substitute: A report on scope of practice. Retrieved from http://www.physiciansfoundation.org/uploads/default/A_Report_on_Scope_of_Practice.pdf

Johnson III, J. A. & Johnson, A. M. (2015). Urban-rural differences in childhood and adolescent obesity in the United States: A systemic review and meta-analysis, 11(3), 233-241. Retrieved from https://search-proquest-com.libproxy.bellarmine.edu/docview/1684999225?OpenUrlRefId=info:xri/sid:wcdiscovery&accountid=6741

Kingdon, J. W. (1995). Agendas, Alternatives, and Public Policies. 2nd edition. HarperCollins: New York.

Kippenbrock, T., Lo, W., Odell, E., & Buron, B. (2015, December). The southern states: NPs made an impact in rural and healthcare shortage areas. *Journal of the American Association of Nurse Practitioners*, *27*(12), 707-713. http://dx.doi.org/10.1002/2327-6924.12245

Kulshreshtha, A., Goyal, A., Dabhadkar, K., Veledar, E., & Vaccarino, V. (2014). Urban-rural difference in coronary heart disease mortality in the United States:1999-2009. *Public Health Reports, 129*(1), 19-29. Retrieved from http://www.jstor.org

Logan, H., Gou, Y., Dodd, V. J., Muller, K., Riley III, J. (2013). The burden of chronic diseases in a rural north Florida sample. BMC Public Health, 13(906). Retrieved from https://www.ncbi.nlm.nih.gov/pmc/articles/PMC3849941/pdf/1471-2458-13-906.pdf

Lutfiyya, M. N., Tomai, L., Frogner, B., Cerra, F., Zismer, D., & Parente, S. (2017, January). Does primary care diabetes management provided to Medicare patients differ between primary care physicians and nurse practitioners? *Journal of Advanced Nursing, 73*(1), 240-252. http://dx.doi.org/10.1111/jan.13108

Miller, J. (2017). Rise in suicide rates haunts rural areas. Georgia Health News. Retrieved from http://www.georgiahealthnews.com/2017/10/rise-suicide-rates-haunts-rural-areas/

NRHA. (2018). About the National Rural Health Association. Retrieved from https://www.ruralhealthweb.org/about-nrha

Patient Protection and Affordable Care Act, §5316 (2010).

Patient Protection and Affordable Care Act, 42 CFR § 491 (2010).

Pirret, A. M., Neville, S. J., & La Grow, S. J. (2015, March). Nurse practitioners versus doctors diagnostic reasoning in complex case presentation to an acute tertiary hospital: A comparative study. *International Journal of Nursing Studies, 52*(3), 716-726. http://dx.doi.org/10.1016/j.ijnurstu.2014.08.009

Public Act 154 of 2017, House Bill 4170: Authorize physician orders for scope of treatment. (2017).

Robert Wood Johnson Foundation. (2011). Health care reform law begins to have effect on nursing. Retrieved from http://www.rwjf.org

Rural Health Services Act of 1977, 42 USC 1395x § aa2 (2).

Ryan, K. & Rahman, A. (2012). Examining factors influencing patient satisfaction with nurse practitioners in rural urgent care centers. Journal of the American Association of Nurse Practitioners, 24(2), 77-81. http://dx.doi.org/ 10.1111/j.1745-7599.2011.00688.x

Sawatzky, J., Christie, S., & Singal, R. K. (2013, September). Exploring outcomes of a nurse-practitioner managed cardiac surgery follow-up intervention: A randomized trial. *Journal of Advanced Nursing*, *69*(9), 2076-2087. http://dx.doi.org/10.1111/jan.12075

Singh, G. (2012). Rural-urban trends and patterns in cervical cancer mortality, incidence, stage, and survival in the United States, 1950-2008. *Journal of Community Health*, *37*(1), 217-223. http://dx.doi.org/10.1007/s10900-011-9439-

Singh, G. K., & Siahpush, M. (2013). Widening rural-urban disparities in all-cause mortality and mortality from major causes of death in the USA, 1969-2009. *Journal of Urban Health*, *91*(2), 272-292. http://dx.doi.org/10.1007/s11524-013-9847-2

Stanik-Hutt, J., Newhouse, R. P., White, K. M., Johantgen, M., Bass, E. B., Zangaro, G., ... Weiner, J. P. (2013, September). The quality and effectiveness of care provided by nurse practitioners. *The Journal for Nurse Practitioners*, *9*(8), 492-500. http://dx.doi.org/10.1016/j.nurpra.2013.07.004

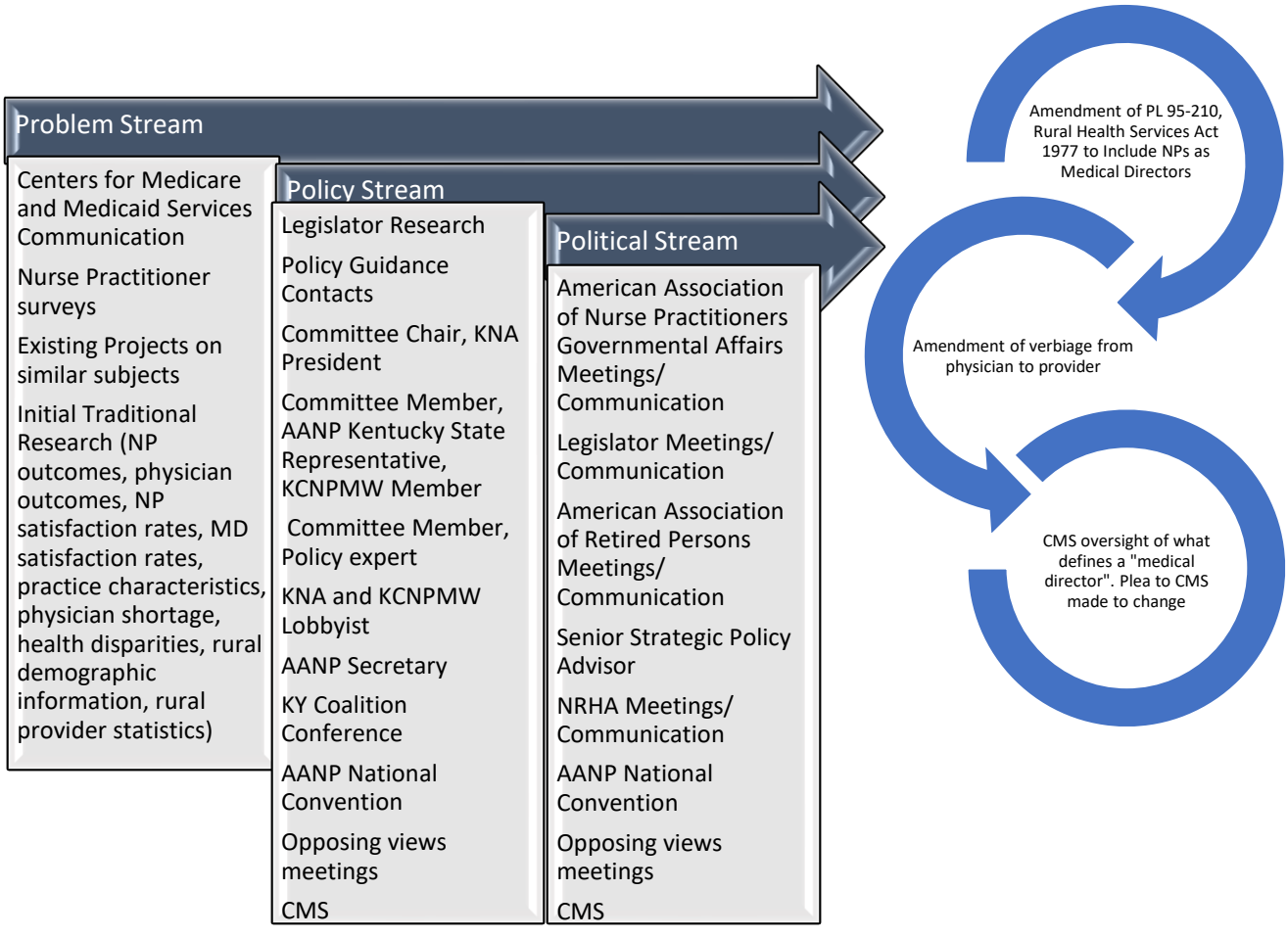
Swan, M., Ferguson, S., Chang, A., Larson, E., Smaldone, A. (2015). Quality of primary care provided by advanced practice nurses: A systematic review. International Journal for Quality in Health Care, 27(5), 396-404. http://dx.doi.org/10.1093/intqhc/mzv054

United States Census Bureau. (2016). New census data show differences between urban and rural populations. Retrieved from https://www.census.gov/newsroom/press-releases/2016/cb16-210.html

Weaver, K. E., Geiger, A. M., Lu, L., & Case L. D. (2012). Rural-urban disparities in health status among US cancer survivors. Cancer, 119(5), 1050-1057. Retrieved from http://onlinelibrary.wiley.com.libproxy.bellarmine.edu/doi/10.1002/cncr.27840/abstract

World O Meter. (2018). US population. Retrieved from http://www.worldometers.info/world-population/us-population/

APPENDIX I


Problem Stream
Centers for Medicare and Medicaid Services Communication
Nurse Practitioner surveys
Existing Projects on similar subjects
Initial Traditional Research (NP outcomes, physician outcomes, NP satisfaction rates, MD satisfaction rates, practice characteristics, physician shortage, health disparities, rural demographic information, rural provider statistics)
Policy Stream
Legislator Research
Policy Guidance Contacts
Committee Chair, KNA President
Committee Member, AANP Kentucky State Representative, KCNPMW Member
Committee Member, Policy expert
KNA and KCNPMW Lobbyist
AANP Secretary
KY Coalition Conference
AANP National Convention
Opposing views meetings
CMS
Political Stream
American Association of Nurse Practitioners Governmental Affairs Meetings/ Communication
Legislator Meetings/ Communication
American Association of Retired Persons Meetings/ Communication
Senior Strategic Policy Advisor
NRHA Meetings/ Communication
AANP National Convention
Opposing views meetings
CMS
Amendment of PL 95-210, Rural Health Services Act 1977 to Include NPs as Medical Directors
Amendment of verbiage from physician to provider
CMS oversight of what defines a "medical director". Plea to CMS made to change