HEALTH CARE PROVIDER RECRUITMENT AND RETENTION

IN MILLARD COUNTY, UTAH

by

Ronald T. Draper

A thesis submitted in partial fulfillment of the requirements for the degree of

MASTER OF SCIENCE

in

Sociology

Approved:

Sojung Lim, Ph.D.  Gabriele Ciciurkaite, Ph.D.
Major Professor  Committee Member

Guadalupe Marquez-Velarde, Ph.D.  Richard S. Inouye, Ph.D.
Committee Member  Vice Provost for Graduate Studies

UTAH STATE UNIVERSITY
Logan, Utah
2019
Copyright © Ronald T. Draper 2019

All Rights Reserved
ABSTRACT

Health care provider recruitment and retention in Millard County, Utah

by

Ronald T. Draper, Master of Science
Utah State University, 2019

Major Professor: Dr. SoJung Lim
Department: Sociology

Millard County, Utah, rural and sparsely populated, continues to experience challenges in recruiting and retaining primary health care providers. My study addressed the lack of a rigorous and systemic analysis of this problem by collecting and analyzing data from a series of semi-structured interviews conducted from January to March 2019. Data came from interviews with nineteen (nine current and ten former) of the twenty-four known health care providers who began practice in the county from the mid-1980s to 2018 as well as from four administrators involved in recruitment and retention.

The study, taking advantage of this comprehensive analysis, provided a more extensive understanding of the root causes underlying the recruitment and retention short-comings. Findings showed that decisions to stop practice in the county were not typically made for a single over-riding reason but occurred when the cumulative effect of negative experiences reached a tipping point, prompting the provider to seek another practice venue. Negative factors such as not receiving effective on-going support, help in building one’s patient pool, or access to loan repayment, ultimately contributed to the provider
determining that the magnitude of differences between on-going experiences and expectations exceeded an acceptable level. Providers who left reached this tipping point in spite of most having a rural background.

To more effectively overcome past failures, the study recommended implementing a comprehensive and on-going support program aimed at addressing providers’ concerns. Additional recommendations included improved family engagement, expanded loan forgiveness opportunities, and a more explicitly stated contract delineating clearly practice boundaries, advancement expectations, and future opportunities. Further, proposed or on-going changes to practice dynamics need to be discussed openly between providers and clinic or hospital leaders in a positive setting, embracing mutual trust, while seeking common ground and objectives. Stressors associated with rural health care practices need to be regularly assessed and resolved in a timely fashion.

(84 pages)
PUBLIC ABSTRACT

Health care provider recruitment and retention in Millard County, Utah

Ronald T. Draper

Millard County, Utah, rural and sparsely populated, continues to experience challenges in recruiting and retaining primary health care providers. My study addressed the lack of a rigorous and systemic analysis of this problem by collecting and analyzing data from a series of semi-structured interviews conducted between January and March 2019. These interviews were with nineteen of the twenty-four known health care providers who began practice in the county from the mid-1980s to 2018, as well as with four administrators.

The study, taking advantage of this comprehensive analysis, provided a more extensive understanding of the root causes underlying the recruitment and retention shortcomings. Findings showed that decisions to stop practice in the county were not typically made for a single over-riding reason but occurred when the cumulative effect of negative experiences reached a tipping point, prompting the provider to seek another practice venue. Providers who left reached this tipping point in spite of most having a rural background.

The study recommended implementing a comprehensive and on-going support program aimed at addressing providers concerns. The stressors associated with rural health care practices need to be regularly assessed and resolved in a timely fashion.
ACKNOWLEDGMENTS

I owe a debt of gratitude to all the health care providers, past and present, who served so diligently to provide personal and effective care to the residents and visitors of Millard County. Their dedication to the profession and the people of the community provided an unmeasurable gift that benefited so many lives. My deep appreciation goes out to all the health care providers who graciously consented to be part of this study and shared their insightful and candid advice that formed the substance my research, furthering our joint objective of improving health care outcomes to all those live in or visit Millard County.

I especially thank my committee chair, Dr. SoJung Lim, and committee members, Dr. Gabriele Ciciurkaite and Dr. Guadalupe Marquez-Velarde, for their support and assistance throughout the entire process. I am grateful for all the help and encouragement I received from the faculty, staff, and fellow graduate students in the department of sociology, and in particular, I thank Dr. E. (Eddy) Berry, Director of Graduate Studies, for her continued advice, guidance, and encouragement during my time in Logan.

In addition, I am grateful to the Mountain West Center for a small grant that helped to cover the costs associated with doing the interviews.

Finally, I owe a deep debt of gratitude to my wife, Lorelei Draper, who sacrificed in untold ways and provided unwavering support for all of my graduate studies, of which this thesis is the cumulative project.

Ronald T. Draper
# CONTENTS

<table>
<thead>
<tr>
<th>Chapter:</th>
<th>Title</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>i.</td>
<td>THEORETICAL AND EMPIRICAL BACKGROUND</td>
<td>1</td>
</tr>
<tr>
<td></td>
<td>A. Introduction</td>
<td>1</td>
</tr>
<tr>
<td></td>
<td>B. Literature Review</td>
<td>3</td>
</tr>
<tr>
<td></td>
<td>1. Rural Upbringing</td>
<td>3</td>
</tr>
<tr>
<td></td>
<td>2. Economic Incentives</td>
<td>5</td>
</tr>
<tr>
<td></td>
<td>3. Inter-Personal Relationships - Health Care Providers</td>
<td>6</td>
</tr>
<tr>
<td></td>
<td>4. Spousal Perspectives</td>
<td>7</td>
</tr>
<tr>
<td></td>
<td>5. Evidence from Non-US Societies</td>
<td>7</td>
</tr>
<tr>
<td></td>
<td>6. Factors Associated with Successful Retention</td>
<td>8</td>
</tr>
<tr>
<td></td>
<td>C. Study Background – Millard County</td>
<td>9</td>
</tr>
<tr>
<td></td>
<td>D. Research questions</td>
<td>14</td>
</tr>
<tr>
<td>II.</td>
<td>ANALYTIC PLAN</td>
<td>15</td>
</tr>
<tr>
<td></td>
<td>A. Data collection</td>
<td>15</td>
</tr>
<tr>
<td></td>
<td>1. Identifying Interview Participants</td>
<td>15</td>
</tr>
<tr>
<td></td>
<td>2. Eligibility Criteria</td>
<td>16</td>
</tr>
<tr>
<td></td>
<td>3. Categories of Study Participants</td>
<td>16</td>
</tr>
<tr>
<td></td>
<td>4. Contact Method</td>
<td>17</td>
</tr>
<tr>
<td></td>
<td>5. Interview Format</td>
<td>18</td>
</tr>
<tr>
<td></td>
<td>B. Data analysis</td>
<td>20</td>
</tr>
<tr>
<td>III.</td>
<td>FINDINGS</td>
<td>21</td>
</tr>
<tr>
<td></td>
<td>A. Recruitment Issues and Factors</td>
<td>22</td>
</tr>
<tr>
<td></td>
<td>1. Introduction</td>
<td>22</td>
</tr>
<tr>
<td></td>
<td>2. Recruited Actively</td>
<td>22</td>
</tr>
<tr>
<td></td>
<td>3. Loan Forgiveness and Financial Issues</td>
<td>23</td>
</tr>
<tr>
<td></td>
<td>4. Rural Factors</td>
<td>25</td>
</tr>
<tr>
<td></td>
<td>5. Desired to Use a Wide Range of Clinical Skills</td>
<td>26</td>
</tr>
<tr>
<td></td>
<td>B. Retention Successes</td>
<td>27</td>
</tr>
<tr>
<td></td>
<td>1. Introduction</td>
<td>27</td>
</tr>
<tr>
<td></td>
<td>2. Actual Experiences: Expectations and Work Balance</td>
<td>27</td>
</tr>
<tr>
<td></td>
<td>3. Rural Preparation and Family Aspects</td>
<td>28</td>
</tr>
<tr>
<td></td>
<td>4. Compensation and Additional Options</td>
<td>30</td>
</tr>
<tr>
<td></td>
<td>C. Retention Failures</td>
<td>32</td>
</tr>
</tbody>
</table>
1. Introduction.................................................................32
2. Challenges Associated with Practicing in Rural Areas.............32
3. Expectations Not Met ..................................................34
4. Left after Finished Loan Forgiveness Obligations ..................41
5. Summary.........................................................................41

IV. CONCLUSIONS ..................................................................42
   A. Summary of Main Findings ...........................................42
      1. Introduction............................................................42
      2. Key findings............................................................44
      3. Summary of Findings...............................................48
   B. Recommendations for Future Recruitment and Retention Efforts ....50
      1. Introduction............................................................50
      2. Develop a Comprehensive Program ..............................50
      3. Summary ..................................................................54
   C. Limitations and Suggestions for Future Research ...................56

REFERENCES ..........................................................................58

APPENDICES ............................................................................62

   A. INTERVIEW QUESTIONS FOR HEALTH CARE PROVIDERS.......63
      1. Questions Related to Recruitment ................................63
      2. Questions for Providers Who Stopped Practicing ................64
      3. Questions for Providers Who Continued Practicing ............65

   B. INTERVIEW QUESTIONS FOR ADMINISTRATORS ..................66

   C. RECRUITMENT FORMS ..................................................67
      1. Invitation to Participate in Study ................................68
      2. Verbal Script for Invitation to Participate in Study ..............70
      3. Informed Consent Form ..............................................72
      4. Research Packet Introduction and Reply Form ..................76
CHAPTER I.

THEORETICAL AND EMPIRICAL BACKGROUND

A. Introduction

“I mean rural medicine is hard. I think you have to have the exact right fit of a person” [Study Interviewee 2019].

Recruitment and retention of health care providers to rural sites has been a longstanding problem that has been addressed in a number of studies (Hancock et al. 2009; Li et al. 2014). Prior research identified several factors associated with the successful recruitment and retention of health care providers to rural areas including increased availability of loan forgiveness, relief from malpractice insurance costs, the importance of having a rural background, training health care providers to be equipped with needed expanded skills to deal with the broad range of health care issues in a rural setting, and supporting families of health care provider with the necessary adjustments required in a rural setting. Prior research also pointed out challenges associated with practicing in rural places. Health care providers serving in rural communities often face lengthy on-call hours, emergency room demands, requirements of obstetrical services, lack of specialty backup, and relatively poor compensation for the amount of work or responsibilities required of them (McGrail et al. 2017; Pepper et al. 2010; Scarbrough et al. 2016).

As a health care provider in a rural Utah community for over thirty years, I saw directly the successes and failures associated with hiring and retaining health care providers. Although perspectives generated from the literature on recruitment and
retention of health care providers in rural areas provides valuable insights, rural Utah has its own unique context, which needs to be taken into account in order to understand the underlying specific factors affecting challenge of maintaining an adequate supply of health care providers (Williams and Cutchin 2002). Unfortunately, there are no known systemic studies on health care provider recruitment and retention in rural Utah. This current study is among the first efforts to fill this gap, as it describes reasons behind decisions to either continue or discontinue practicing in Millard County from the perspective of current and past health care providers, supplemented by additional insights offered by administrative personnel closely involved with the recruitment and retention efforts. Through the lens of practicing providers, the potential root causes of recruitment and retention successes and failures were explored and analyzed then compared and contrasted with the results from previously published studies.

By bringing forward the insights and experiences of the majority of primary care health care providers who practiced or who continue to practice in the county this study identified the salient ideas associated with practice recruitment and retention successes and failures. Specifically, nineteen out of twenty-four identified providers over this thirty-year time period participated. Of the five who did not participate, two are known to have died, one declined to participate, one did not respond to requests for participation, and one was not located.
B. Literature Review

Prior research examined the issues of health care provider recruitment and retention in rural areas of the United States. As Williams and Cutchin (2002) noted, “problems in rural areas have been longstanding, indeed intransigent, across much of the world”. While many rural areas face similar challenges, it is important to approach the issue of health care provider recruitment and retention with contextual specificity. There is no standardized definition to what is meant by rural. Therefore, it is important to situate each study “through understanding the rural in a holistic and locally contingent manner” (Williams and Cutchin 2002). As I will detail below, there is no systematic research done in Utah with regard to the problem of recruiting and retaining health care providers in rural areas. This poses a serious limitation since Utah rural communities may have unique aspects that may mitigate or exacerbate this problem. In this section, I will review findings from studies undertaken in various U.S. states, including Pennsylvania, West Virginia, Idaho, and Michigan (Bazemore 2016; Goins et al. 2006; Goodfellow et al. 2016; Schmitz et al. 2015; Vick 2015; Wendling et al. 2016) as well as findings from non-US societies (Li et al. 2014).

1. Rural Upbringing

An exemplary study, Hancock et al. (2009), examined the problem of retaining health care providers in rural areas in Northeastern California and Northwestern Nevada. The authors conducted a qualitative research study involving twenty-two health care providers in rural northeastern California and northwestern Nevada, an area noted for its historically low population density and difficulties in recruiting and retaining physicians.
The semi-structured interviews done in this study included information on “place and upbringing, place and training, recruitment, community integration, current community and patient profile, activities/retention/satisfaction, self-image and community role, and future plans and projections” (Hancock et al. 2009). Their findings include:

Shortages of health care professionals have plagued rural areas of the USA for more than a century. Programs to alleviate them have met with limited success. These programs generally focus on factors that affect recruitment and retention, with the supposition that poor recruitment drives most shortages. The strongest known influence on rural physician recruitment is a "rural upbringing," but little is known about how this childhood experience promotes a return to rural areas, or how non-rural physicians choose rural practice without such an upbringing. Less is known about how rural upbringing affects retention.

Another study conducted in Wyoming (Pepper, Sandefer, and Gray 2010) provided similar evidence about the provider’s backgrounds, in particular whether they were raised and trained in rural areas, finding this an independent predicting factor in choice of practice locations. Pepper and her colleagues found that being raised in Wyoming as a child was strongly associated with a desire to move their practice within the state as opposed to out of state. They also noted the top factors given by physicians who were successful in a rural practice were: valuing rural life, outdoor activities, and the safety and closeness of small communities. At the same time, their research observed that the high malpractice rates charged to current providers as the most crucial factor in decisions to leave the state. While these authors did not give the rates or costs of malpractice insurance, they stated that Wyoming does not have a medical liability cap and features one of the highest average malpractice award settlement costs among the states. These research findings highlight the necessity of understanding local issues in formulating strategies for improving recruitment and retention of health care providers,
owing to the finding that important factors may vary across local contexts (see Williams and Cutchin 2002). To appreciate how this study’s findings could apply to another area, such as rural Utah, one needs to see what factors about rural life in Wyoming are consistent with those of Utah, such as if malpractice rates are similar in Utah and what impact these rates may have. To that end, the interview process of my study provided the means for identifying local data.

MacQueen et al. (2018)’s systemic review of seven screened databases with over 7276 citations on predictors for practicing in rural areas highlighted the importance of a rural background. In their review they judged 22 studies addressing a rural background of high grade with the rest being from very low to moderate grade. They also considered a variety of other attributes that may have contributed to providers choosing to practice in a rural setting. They asserted growing up in a rural area to be the strongest predictor of choosing a rural practice. The authors offered the caveat that the number of students with rural backgrounds was too small to make recruiting them to work in rural areas a viable policy option for alleviating chronic provider shortages in rural areas (MacQueen et al. 2018).

2. Economic Incentives

Some studies further identified economic incentives as additional factors associated with successful strategies for recruitment. Scarbrough et al. (2016) for instance, examined various efforts aimed at retaining health care professionals using the data from the National Health Service Corps throughout the country. The study focused on the Loan Repayment Program and scholarships but also looked at what was reported to be top strategies for recruiting. Given in percentages, the top choices of those surveyed
were: competitive salary, 88%; professional development, 70%; knowledgeable/competent support staff, 59%, and professional support, 58%. However, while Scarbrough and her colleagues commented on the importance of professional support opportunities for recruitment, they noted that these types of professional support opportunities were not part of the amenities offered in recruiting in the studied clinical sites (Scarborough et al. 2016).

3. Inter-Personal Relationships - Health Care Providers

Additionally, Williams and Cutchin (2002) emphasized the importance of addressing inter-professional relationships among health care providers. While much of the previous studies addressed relationships only with physicians, currently non-physicians provide increasingly larger portions of the care given in rural areas. These providers encompass what are often called mid-level providers: physician assistants (PA) and nurse practitioners (NP). Consistent with this, my study included PAs and NPs in the interviews and analysis.

Supporting the importance of integrating mid-level practitioners into a comprehensive approach for solving the recruitment and retention problem, Taylor (2016), a physician assistant, reported in her capstone project why physician assistants choose to work in rural areas. She identified the following as critical to retention of rural physician assistants: “increased autonomy, [a] wider scope of practice and good supervising physician relationships as reasons why they choose rural practice.” This desire for a positive working relationship with abundant practice autonomy among the various providers contrasted with formidable challenges in achieving stood out also in my study analysis.
4. Spousal Perspectives

Myroniuk et al. (2016) provided insights into an additional rural research gap, the impact of rural medical practice from the spousal perspective. They increased the understanding by raising “the voice and profile of the spouse in the process of rural recruitment and retention”. However, their methods varied from my study in that they employed an online survey where participants were invited to contribute their perspectives, and subsequently included those who chose to participate in semi-structured interviews. A potential study limitation was an inclusion bias as participants were self-selected online, with what portion of the rural populace they represented being unknown.

5. Evidence from Non-US societies

Several studies conducted outside the U.S. examined in-depth the underlying causes of recruitment successes and failures in rural Australia. For example, Li and colleagues (2014) looked at general practice providers in rural areas of Australia and the incentives they received to locate there. This study provided insights relative to the effectiveness of the Australian government’s incentives for retaining health care providers in rural areas. Specifically, recommended strategies included providing increased locum relief coverage, retention payments, and rural skills loading payments. This literature from Australia may have applicability to the United States due to similar socio-economic and cultural factors, e.g. an English-speaking democracy with a market based economic system, and a similar urban-rural agriculture structure. However, there are important differences in the health care systems between the universal coverage generally available in Australia and the decidedly non-universal coverage that exists in the United States. Therefore, findings of these studies on Australia or other non-U.S.
societies, while they may provide some important insights, need to be taken with caution as to their generalizability to other locations.

6. Factors Associated with Successful Retention

Previous studies focused more on recruitment than on retention of health care providers in rural areas (Williams and Cutchin 2002). One study, Daniels et al. (2007), summarized underlying factors related to recruiting and retaining health professionals in rural areas. Key features identified included: a rural background, additional rural training and a preference for smaller sized communities. Retention successes reported aligned with financial aspects, such as incentives and loan forgiveness, as well as professional opportunities.

Another study (Weigel et al. 2016) lamented that rural areas for decades have disproportionately encountered shortages in the numbers of practicing primary care providers in comparison to metropolitan areas. In spite of numerous policy enactments that attempted to improve recruitment, these efforts failed to resolve the dissimilarities in scope of practice and practice patterns that existed between the rural and urban areas.

This research implied that failing to take this into account contributed to persistent ineffectiveness in current policies. Illustrating their point by using claims data, they ascertained that rural physicians had a broader scope of practice, including the provision of more surgical, maternity, emergency, and nursing home services. Their data supported the concept that those physicians who value a diverse practice would find working in rural areas appealing, and those that don’t value this, would not. This has important policy implications.
C. Study Background - Millard County

Millard County, Utah continues to experience chronic provider issues stemming from a seeming “revolving door” of providers as a consequence of recruitment and retention failures. *The Millard County Chronicle Progress* recently reported on another primary care provider planning to leave Millard County and provided a list of underlying reasons for this:

As Delta loses another physician assistant, the challenge of healthcare provider retention remains a challenge. In less than 25 years, Delta has seen 13 health care providers come and go. The availability of accessible and efficient health care providers in rural American is a substantial and growing concern … Some of the challenges that face rural health care professionals are a heavy workload, difficulty taking time off, few opportunities for continuing education, and professional isolation. The professional’s family also brings concerns to the equation when considering a rural job offer. (Clark 2018)

Two local physicians wrote in the same newspaper their take on the problem:

> With recent changes in our medical community, many have wondered what, if anything, is wrong? Why won’t our doctors stay? We have a wonderful community but so many physicians and healthcare providers keep leaving. What is the answer?

> Since 1995, Delta has seen the loss of thirteen health care providers. We’re actually the oddballs, staying in the area for so long to practice medicine. The departure of so many of our friends and colleagues is, in reality, typical of healthcare providers across the country, especially in rural communities. Trying to bring in others to provide medical care to the community is really very time-consuming and expensive.

> We have worked so hard to bring in other medical providers because we are trying to provide quality care for the community. We feel it’s our duty. That’s why we have hosted and taught many students through the years… hoping our native sons would return and take care of us. It would be simpler and easier to cease our recruiting endeavors. (Shamo and Smith 2018)

Millard County, one of the largest in Utah by square miles but one of the smallest counties by population, has unique features that distinguish it from other rural areas. The
2017 population of 12,863, ranked 18\textsuperscript{th} by population, but third in area at 6,828 square miles, resulting in a very sparse population density of only 1.9 persons per square mile. Comparing the county’s demographics to U.S. states, illuminates interesting insights: Millard County is larger in size than four states: Hawaii, Connecticut, Delaware, and Rhode Island. New Jersey, only slightly larger in size at 7354 square miles, has almost 100 times the population at 8.8 million (Rand McNally 2017; Utah Demographics 2018).

The population of Millard County resides primarily in or near its two largest cities, which traditionally divide the county. The West Millard area (Delta and surrounding smaller farming communities) has about 8,000 residents, while the East Millard area (Fillmore with nearby primarily farming communities) is home to about 4,000 people. Delta and Fillmore are thirty-seven miles apart and are both located on the eastern portion of the county. On the county’s far western edge, across a wide swath of desert, are a few small farming communities in Snake Valley situated on the Utah-Nevada border. These isolated hamlets form the gateway to Great Basin National Park and are connected to Delta by ninety miles of desert highway, US 50, appropriately called by some the “Loneliest Highway in America”. People living in this sparse area drive long distances to access health care services, typically choosing between Delta to the east and Ely, Nevada to the west.

Millard County sub-populations at-risk for diminished health outcomes include: Native Americans, ethnic minorities, migrant laborers, elderly people, individuals with disabilities, homeless people, and travelers through the county. The potential negative impact health care provider shortages can have on health outcomes for the sub-populations of Millard County may be greatest for those with fewer resources such as
many Native Americans, minorities, and households headed by single females with children. These groups include children caught in intergenerational poverty and many more at-risk of becoming such. Impediments to access to health care services remains an important concern for those attempting to address intergenerational poverty.

According to U.S. Census Bureau *QuickFacts: Millard County, Utah* (2018) the county population on July 1, 2017 was 12,863, up 2.9% from the base estimate of 12,503 for April 1, 2010. 31.3% of the population was under 18 years while 16.6% were 65 years and older. Foreign born persons were 7.4% of the county population but made up 11.2% of all persons classified as being in poverty. Persons under age 65 without health insurance was listed as 13.1%. The percent of persons under 65 years with a disability made up 8.2% of the population.

The July 1, 2017 census data provided race classifications as follows: White alone, 94.0%; Black or African American alone, 0.7%; American Indian and Alaska Native alone, 2.0%; Asian, alone 1.4%; Native Hawaiian and Other Pacific Islander alone, 0.2%; Two or more races 1.7%; Hispanic or Latino, 13.3%; and White alone, not Hispanic or Latino 82.6%.

Highway connections are an important geographic feature of the county. Federal highways US 6 and US 50 go west from Delta, crossing the unpopulated desert, to the Nevada border. Fillmore, on the other hand, is located on the I-15 Interstate, a major highway that connects the populous Wasatch Front with St. George and further destinations to the south. Fillmore’s freeway location makes it a frequent travel stop, including for emergency health services, on this heavily traveled corridor in rural central Utah. While comparatively few people live in Millard County, robust health services
availability are critical not only to the county’s residents, but to the safety of the tremendous number of people who travel through the county daily on its major highways. Indeed, the Utah Crash Summary 2016 (Utah Department of Public Safety 2018) notes that 37% of traffic fatalities in the state occurred on rural highways.

There are two hospitals in Millard County, owned and operated by Intermountain Healthcare, and are located in Delta and Fillmore. Both hospitals were constructed in May 1985 using similar floor plans. While both hospitals have 20 in-patient beds, with Fillmore’s smaller population, about half of its beds are used as long-term patient beds. In Delta there is a 36-bed county owned skilled and long-term care center adjacent to the Delta hospital.

Both hospitals are full-service facilities with 24-hour emergency, laboratory, x-ray, surgical, obstetrics, anesthesia, and in-patient nursing services. Medical offices housing the county’s primary care providers are located on or near both hospital campuses. In Delta at the time of the study there were four physicians and one nurse practitioner, while in Fillmore there were four physicians. All physicians and mid-levels who resided and practiced within Millard County were primary care providers. Some of the primary care providers were employed by Intermountain Healthcare while others were affiliated with an independent medical group, Revere Health.

There were no specialty physicians whose principal practice was within the county, however a variety of specialists, on a scheduled basis see outpatients in the clinics. If patients seen by these visiting specialists needed additional care outside of what can be provided in a clinic visit, they typically were transferred or referred to the larger hospitals and clinics in the Salt Lake or Utah County areas. Inpatients or emergency room
patients needing advanced or critical care were transferred to these larger facilities, typically by ambulance or air transport (e.g. medical helicopters or fixed-wing planes). There were no air medical transfer planes or helicopters stationed in the county but were dispatched when needed from the larger centers to Millard County. Significant delays associated with air transport occurred from time to time due to weather issues or transport availability.

The family practice providers divided up on-call coverage between themselves. These responsibilities included being available around the clock for their respective emergency departments, surgical suites, and obstetrical areas. There were no surgeons or obstetricians located in the county to routinely share in this responsibility. Significant burdens may have accrued to these individuals as they shouldered this heavy duty. This pressure may have contributed to the on-going challenge of recruitment and retention of primary care health care providers.

As outlined above, the chronic and acute challenges associated with failures in recruitment and retention of health care providers in the county have not been solved. This study undertook a formal and rigorous analysis of the problem, and by so doing, generated insights into the fundamental dynamics underlying this problem in Millard County. The goal of this study remains that of contributing to improved health outcomes for county residents and visitors by making available additional objective data to inform future recruitment and retention efforts.
Millard County, Utah has long experienced problems associated with effective recruitment and retention of health care providers. The resulting mismatch of county health care needs with the continuous availability of health care providers potentially contributes to health inequality stemming from recurring hardships in accessing adequate health care for the residents of this rural county. There is no formal systematic documentation and examination of the reasons underlying the problems associated with health care provider recruitment and retention from the perspective of those individuals most closely associated with health care services in Millard County.

By conducting in-depth interviews with health care providers, both former and current, as well as with administrative personnel involved in recruitment and retention efforts, this study will advance the understanding of the root causes behind failures in recruitment and retention of health care providers in Millard County. Findings of this study will further help those involved in Millard County recruitment and retention efforts address this problem more effectively. Lessons learned from Millard County may further provide valuable insights for other rural counties that experience similar issues.
CHAPTER II.

ANALYTIC PLAN

A. Data Collection

In this study twenty-three individuals participated, either face-to-face or by phone, in an in-depth, semi-structured interview, or responded on-line to a set of formal questions. Participants were either current or former primary health care providers or administrators in Millard County. The information gathered through this study helped uncover the underlying causes for the turnover of health care providers in Millard County.

1. Identifying Interview Participants

After obtaining approval for this study from the Institutional Review Board at Utah State University (IRB protocol # 9699), interviewees were recruited from all known primary care health care providers who established their practice since the mid1980s and worked in Millard County on a permanent, full-time basis up until the interviews began in January 2019. Having worked as a full-time health care provider (Certified Registered Nurse Anesthetist, CRNA, and Family Nurse Practitioner, FNP) in Millard County, Utah from 1984 until 2017, I am familiar with those who are or who have been providers and administrators in Millard County and compiled the list from my personal knowledge of the eligible providers.
2. Eligibility Criteria

Eligibility criteria for the study included individuals who established a full-time practice as a primary care health care provider for at least a year in Millard County starting in the early 1980s. Health care providers who only provided intermittent coverage, office visits, or procedures, including surgeries and whose principal practice location was not Millard County were excluded. Other specialties not generally considered to be primary care were also not included, regardless where the provider established his or her primary practice location. Administrative personnel included a selection of current and former hospital, personnel, and nursing administrators from the hospitals in Millard County, and who had familiarity with the providers practicing in this time frame. The hospitals in Fillmore and Delta are owned and operated by Intermountain Healthcare and share administrative personnel.

3. Categories of Study Participants

The primary care providers included in the study were physicians as well as advanced practice clinicians (APC) who are also called mid-level providers (nurse practitioners and physician assistants). Physicians included medical doctors (MD) and doctors of osteopathy (DO). Only those physicians and mid-levels whose principal practice location was in Millard County and actively practiced in the primary care specialties of general practice, family medicine, pediatrics, and internal medicine were included in the pool of potential participants.

I identified twenty-four individuals who met the established criteria. Of these 24 potential interviewees, nineteen ultimately participated for a 79% overall participation rate. Of the five who did not participate, two were known to have died, one declined to
participate, one did not respond to the requests to participate, and one was not located. Of the nineteen provider participants, sixteen were interviewed (twelve in person, four over the phone) and three elected to fill out responses to the questions on-line.

Four administrative personnel came from the ranks of those who had been involved in the recruitment or retention of health care providers. All four invited agreed to participate and provided contemporaneous context and perspective that otherwise might be missed if all participants were exclusively health care providers.

The gender composition of the study, both participating and non-participating, was almost exclusively male. That is, of those who participated, 100% of current providers, 90% of former providers, and 75% of the selected administrative personnel were male. As far as race and ethnicity, all providers and administrative personnel were white. The composition of providers and administrators varies from the county race-ethnicity proportions outlined earlier.

4. Contact Method

The formal method of initial contact in all cases was approved by the university institutional review board (IRB) and consisted of a packet containing the invitation to participate in the study. The packet included an introductory letter, a three-page IRB approved informed consent, and a response letter with a stamped and addressed envelope to facilitate the return of the individual’s response. These forms are included in the appendices.

When I knew the participant’s location I either mailed or hand delivered their packet. For those whose location I needed, I relied upon publicly available sources to search for their current whereabouts. For example, for some I conducted an internet
search for their current office location. After identifying what appeared to be their current office, I initiated contact with the office, and using the approved contact dialogue, confirmed with the person answering the phone that I had the correct individual and contact information. I then mailed the invitation packet to this location. For those who did not initially respond a second, and sometimes a third letter, some by priority mail, was mailed.

After an individual agreed to participate, additional contact was made to confirm the time and method of participation. Locations chosen for the interview by the interviewee included their office, home, or an alternate site of their choosing.

5. Interview Format

While the goal was to conduct in-person, face-to-face interviews, those invited to participate were given the option of completing a set of on-line questions. The semi-structured interviews generally followed the format of the written questions, but the order varied as the flow of the interview often led to additional details and questions. The list of questions was reviewed before the interview ended to confirm that all essential areas of inquiry had been covered.

Telephone interviews were offered as needed in order to accommodate participant preferences and logistic considerations. The format of the face-to-face and by phone interviews were the same. Interview questions used for each category of interview are found in the appendices.

The following was the format used for the interviews: Initial greeting and review of the purpose of this research including expected benefits from it to the participant. Written consent, including a confidentiality statement was confirmed to be completed.
Written copies of the above were mailed to each of the interviewees prior to the interview. The format of the interviews, including that it was expected to take about thirty minutes and would be recorded, was explained and agreed upon. As part of the confidentiality agreement, the interviewees were advised that written and digital records will be kept in a secure manner to prevent individual statements and identity from being disclosed. Information from each interview was filed under a separately assigned number and not by name of the interviewee. A code book connecting the interviewee to the assigned number was kept separately from the interview data in a secure location.

I conducted personally all the interviews. The interviews were recorded and electronically transcribed digitally using the iPhone app: Rev Recorder. This format provided the ease of confidentially recording the interview and its access being password protected. After the study is completed, the digital copies of the recordings will be deleted. If a name or individual identifier was used by the interviewee, in spite of being advised not to do so, this was redacted from the transcript. Data from the interviews were tabulated and only reported in the aggregate to reduce the likelihood of individual identification. Specific quotes used in this were identified only in a generic, non-specific manner. Care was taken to not use information in the illustrative quotes that could readily be surmised as to whom had made the specific quote.
B. Data Analysis

The data from the interview consisted primarily of two types: Quantifiable data based on numbers and types of responses by interviewees; other demographic information obtained; and verbal responses to interview questions. The demographic data from the survey was summarized and tabulated to provide descriptive statistics of survey participants (e.g. means, ranges, and so forth). The content of the interviews was analyzed from the transcripts. The voice-recognition software, Rev Recorder, proved to be an effective, very accurate, and rapid means of transcribing the interviews.

Responses were analyzed for content and emphasis, revealing trends that were further summarized and quantified. An Excel file proved an efficient method to tabulate the data, run summaries, and create figures that described visually key points of analysis. Additionally, data aggregation of themes provided a means for comparing and contrasting of the study findings with those from the literature described earlier.
CHAPTER III.

FINDINGS

The findings from the interviews were summarized and analyzed in four general areas: Recruitment issues and factors present in Millard County; reasons for retention successes; reasons for retention failures; and recommendations for future recruitment and retention efforts. In describing the findings, quotes from the interviews were presented to illustrate applicable points.

Concerning the frequency of responses relative to various issues or factors, on one hand, if an item came up repeatedly, this could indicate that this was a generally held concern. On the other hand, sometimes a factor that may prove to be vital to understanding the problem may have been mentioned by only one, or perhaps only a few individuals. This did not necessarily discount its importance, as key insights may have been only articulated by a limited number of observers.
A. Recruitment Issues and Factors

1. Introduction

A variety of factors impacted the recruitment activities of health care providers and are identified or grouped by topic. This sorting helped identify what worked and what did not, with the goal of providing improved insight and heightened success in future recruitment and retention endeavors. Describing less successful recruitment efforts, one provider commented: “Recruiting out of desperation, just to get someone to come and hope they will be happy doesn’t necessarily solve the recruitment problem. …”. The current analysis aims to diminish the incidence of “desperate” recruitment efforts by offering a more comprehensive and broadly considered approach to recruitment and retention.

2. Recruited Actively

A difference in retention existed based on whether providers were actively recruited or sought the position on their own. Current providers were actively recruited at a rate of 56% while those who left were only 20% of the time. To better understand the underlying issues behind this difference, questions need to be explored. For example: Did this variance in active recruitment versus self-initiation impact the on-going attention given on-going to provider’s needs? If this variation exists, to what extent did it impact the degree that these needs were adequately met? Consistent with the study findings, an incremental accumulation of unmet needs may have contributed to the decision to stop practicing. Would more effective attention to non-recruited provider’s needs result in a
higher retention rate? These are important questions that this study did not answer but are brought up to encourage further exploration.

Another question raised was whether actively recruited applicants were more likely to stay because the organization sought applicants that it judged to be a better match for the community’s needs? This relationship also needs to be explored and further evaluated for possible causality.

3. Loan Forgiveness and Financial Issues

Many of the recruited providers began their search for a practice location by checking which sites qualified for loan forgiveness by the National Health Service Corps. The study further revealed that many of these sought out Millard County primarily because critical importance of loan forgiveness. Some indicated that they only considered sites where loan forgiveness was a possibility.

Most providers, current and past, indicated that loan forgiveness was important in site selection with about half indicating that it was the main factor that led them to Millard County. The striking difference between the current and former providers was that twice as many (89%) of current providers received loan forgiveness while only 50% of former providers did so. Several of the former providers expressed their frustration with the lack of loan forgiveness, and that this was part of their decision to leave the county. Another current provider indicated that he almost left when his loan forgiveness was reduced. Adding that if there had not been other positive, supporting factors, he too would have left. This supports one of the conclusions that decisions to leave are made when the accumulation of negative factors outweighs the positive ones. Elaborating on the importance of loan forgiveness, one successful candidate stated: “Health Service Corp
Scholarship was pivotal in my decision making. If I wanted to stay in Utah, which I did, I basically had to choose between [Millard County and one other rural Utah county].

The growing cost of advanced medical and health care education has made loan forgiveness a priority for family medicine and other primary care providers. One administrator stated that loan repayment availability was critical to successful rural recruitment: “I think the things that worked well, from my perspective, were the ability or the opportunities to present a loan forgiveness situation to providers.” Other providers lamented that in recently the ability to receive federal loan forgiveness has decreased in a number of areas, including Millard County. One administrator noted that his organization has been working on alternatives to federal loan forgiveness as a means to support future recruitment efforts.

Related to the financial assistance associated with loan forgiveness was the help, both financial and organizational, that came with setting up the initial practice. Another incentive to coming to the county, mentioned in several interviews, was a guaranteed salary for the first several years as a new provider was establishing their practice. In fact, 100% of current providers stated that they received help in either starting their own clinic or getting set up in an established clinic with a period of salary guarantees. On the contrary, only 60% of former providers reported this financial incentive. Was this an important difference that impacted the commitment on both the provider’s and organization’s end that could have affected the later decision to stay or not?

Another area that prompted concern by a number of former providers dealt with the expected or implied opportunity for future growth in salary or partnership
possibilities. When this did not materialize as expected, it proved to be an important source of dissatisfaction described by a number of former providers in their interviews.

4. Rural Factors.

There are several aspects related to the importance of “rural” in recruitment. These include the individual provider’s rural experience, either growing up rural or getting rural exposure in training, the provider’s family’s rural experience, and both the provider and his/her spouse’s desire to be in a rural area.

The literature and provider responses, particularly from those that have stayed, emphasized the importance of recruiting to rural areas those that have the desire to be a rural health care provider, and also who had rural living or work experiences. Interestingly, the interview data showed very similar rural backgrounds and experiences among those who left compared to those who stayed. Whether or not retention would have been worse if fewer had had a rural background is unknown, but the data does not support that a rural background was a prime factor in retention failures.

Several respondents noted the importance of having the spouse of the provider involved in the recruitment process, describing past inconsistencies with this. However, many former providers remarked that their families preferred the rural lifestyle and were disappointed that professional challenges led to the decision to leave the area.

Interestingly, while 100% of current providers noted that the family was supportive of being in the rural area, 90% of former providers expressed the same sentiment. This 10% difference could be looked at in various ways. One, is that with the small numbers in the sample, it may not be of statistical import. On the other hand, it could mean that focusing on the family’s interests in coming to a rural area, as a major
recruitment effort, may not change outcomes, but it supports the idea that, for the 10% that it mattered for, if more attention had been paid sooner, different outcomes might have been achieved.

5. Desired to Use a Wide Range of Clinical Skills

It was common for those who chose to Millard County to have visited the county and have had interactions with the providers here during their training. Of the current providers, 100% sought a residency or training with a rural focus and also believed their residency provided the needed skills. However, 67% indicated that they needed to seek out these additional skills using their own initiative. Some indicating that to do this was difficult and took perseverance on their part.

In contrast, those who left the area noted smaller percentages in these areas with 40% indicating that their training did not provide the skills they needed when they were in practice. Interestingly, only 40% of these stated that they sought on their own the additional needed skills for rural practice. It is unknown whether they did not take this additional initiative because they were unaware that their training was not providing the requisite skills or whether there were barriers preventing acquisition of the extra training.
B. Retention Successes

1. Introduction

In order to understand the reasons for retention successes, it is necessary to consider the reasons for retention failures at the same time. The differences often lie within gradients of the experiences. Both current and former providers reported frequently similar experiences but with varied intensities. In comparing these, insights emerged as to the underlying causes separating those continuing to practice in the county those that chose to leave.

These differences were revealed during the semi-structured interviews that were the core of this study. The study identified seven categories that conceptualize these key points, and they are discussed in more detail in the following sections. Of note, taking all seven areas together, current providers averaged 78% positive responses while the former providers had only a 35% average positive response rate. This disparity identified a clear demarcation between the current and former providers in key areas of positive experiences.

2. Actual Experience: Expectations and Work Balance

Two factors, “Expectations matched actual” and “Work balance satisfactory” combined to highlight how well actual experiences, including professional aspects, rural preparation, individual interests, matched initial as well as on-going expectations. Specific issues related to these factors included the number of on-call hours, clinic work demands, hospital, surgical and obstetrical duties and emergency call. The differences reported by former versus current providers in these two areas stood out. In both areas,
89% of current providers reported these as positive, as opposed to former providers reporting positively at 40% for “expectations met actual” and 30% for “work balance satisfactory”. The potential implications of this disparity will be explored in more detail in the chapter on recruitment failures and in the conclusion.

The following quote highlighted a current provider’s positive sentiments and was typical of those expressed by various providers concerning their practice expectations. He described the challenges of providing health care in a rural setting, and how he had found a balance allowed him to do what he wanted without being overwhelmed:

Well, I guess the main reason I wanted to come is because the practice kind of lined up with what … I wanted to do … rural family medicine … to be able to do OB and kind of have some procedural [things]. … and [another] reason I liked coming here, to be able to cover the ER. And then, why I stayed … I just like [it] here … rural medicine is hard, it's not for everybody. I can see why some people wouldn't enjoy it: Because its long hours, it’s kind of unpredictable. Sometimes … you're going out when you don't expect to be, and there's quite a lot of call that's involved too. But so, you’ve got to love it. … I can see where if you didn't like all those aspects it'd be hard to stay … but it fits well with me. I think if I had to do more ER than I do now, I would probably not like it as much, but the amount I do is just right for me. So, I don't feel like I'm too overworked. I work, probably an average of 60 hours a week. … The compensation has been fine. I think just the fact that we have family here [and] we enjoy a rural town, is probably the biggest reason to stay. It would probably take a lot to get me to leave.

3. Rural Preparation and Family Aspects

Rural providers typically treat a broad range of patient types: adults, children, infants, expected mothers, and the elderly, any of which may be experiencing emergent, acute, or chronic illnesses. The breadth and depth of training that is required to safely and efficiently attend to these many health care needs is increasingly difficult to acquire. Consistent with this, many in the interviews described challenging barriers impeding the
acquisition of the requisite training. Some indicated that they had to seek on their own this additional training. Several described the persistence and “not taking no for an answer” attitude that sometimes was needed.

Interviewees reported that the number of training programs offering extensive training in the skills traditionally required to practice the broad scope of medicine seen in rural areas is diminishing. Eighty-nine percent of current providers indicated that they felt adequately prepared for rural practice while only forty-percent of those who left felt this way. This differential is associated with the decreasing availability of the broad in scope residency and other training programs geared towards an extensive rural preparation. The breadth and depth of training offered in residency and other health care programs in the future may impact in adverse ways the ability to recruit well qualified practitioners for rural communities.

The next factor considered, “Family adapted to rural area”, describes how well the provider’s family adapted to the rural environment. Noted often by the current providers was how their families either came with the desire to live in a rural area or had adapted adequately to the varied advantages and challenges of being a family member of a rural health care provider. Among current providers, 89% expressed that their family had adapted to the expectations, challenges, and even opportunities, of the rural lifestyle. On the other hand, only 60% of former providers noted the same level of adaptation with their families. This successful adaptation to the rural lifestyle was described in one interview by a current provider:

I certainly miss lots of my family's events. So, I think you have to have a strong capable partner that also wants to live in a rural area. The best thing my wife had ever learned [is what an experienced provider’s] wife told her, you have to get comfortable doing things by yourself, and not being
unhappy [when] she would plan things and inevitably, I would have someone going into labor or something, and then I'd say, ‘Well I'll try to catch up’. And then the thing is canceled, and then she's frustrated, and then she's angry with me. But I'd say okay I'm working to support our family, and so, … ‘You know what? You need to be happy living your own life.’ So, she would say, [for instance] ‘Hey, I'm taking the kids, and we're going to [the zoo], and we're doing that this Friday. If you can join us great. If not, no hard feelings. We'll go and enjoy it.’ So, you have to have a spouse who's willing to live that. If you want somebody that just works nine to five, and is home every night, I think that doesn't really dovetail really well with rural medicine.

4. Compensation and Additional Options

Various providers who stayed noted the importance of compensation and incentives. Reimbursements issues varied from the need to get student loans forgiven to having an initial guaranteed salary, or having help setting up their practices. Overall, 78% of current providers indicated that they were compensated fairly for the amount of services they were provided. This was more positive than the former providers where only 70% felt they were being fairly compensated for the broad array of duties they were being asked to perform.

There existed, however, a greater separation between the current and former providers in the related assessment of “Treated Fairly by Organization” where current providers indicated a 78% satisfaction rate and former providers responded at a lower 50% rate. Being treated fairly involved the broader areas of organizational interactions that went beyond just salary and financial compensation, such as obtaining expected partnership offers, a sense of being respected and being included in clinic practice and business decision making. This disparity, as seen with current providers reporting positive interactions about 50% more often than former providers, may have been an important factor in retention failures, which will be detailed later. For instance, one
provider commented: “That's been one thing that's incentivized me to stay. The compensation's been really good.” Another added that while the compensation was average, the other benefits off-set that. He stated “… as far as the compensation goes, I haven't really had any raises in 6 years, but it's still not enough to make me want to leave … it's still worth it for me to stay just because of family and stuff”.

A recent development, increased availability of alternate clinic and practice arrangements in the county, appears to have positively impacted recruitment as well as retention. The data showed that 33% of current providers found that having alternative clinic options allowed them to come to Millard County or created an option for them to continue practicing in the county. This suggests that by increasing provider practice options, frustrations that may have contributed to some providers leaving in the past may be helping to improve recruitment and retention.

Illustrating this, one provider described how before committing to come, he talked with several providers who had left and learned of their concerns. Using this newly gained insight, he requested contract features that addressed these concerns. Another provided observed that when the hospital or clinic organizations worked with the providers, facilitating resolution of their concerns, their job satisfaction was increased. Several interviewees reported instances where colleagues were dissatisfied, but in at least some of these cases, an alternate practice site was instrumental in resolving their concerns.
C. Retention Failures

1. Introduction

An important strength of this study is that 79% of all eligible providers participated. Further, the open-ended nature of the semi-structured interviews helped identify root causes behind retention failures. One theme noted from the interview data was a difference in how actual experiences as a rural health care provider differed from expectations held when their rural practice began. Those that continued to practice in the county described that overall, their experiences matched expectations, while 70% of those who left cited important mismatches between expectations and actual experiences that was an important source of their dissatisfaction. This section will document further details of the interviewee responses to factors that contributed to their decision to leave practice in the area.

As will be shown, an important finding of this analysis was that for most of the providers who left described experiencing several negative factors where their accumulating impact contributed to the level of dissatisfaction until reaching the “tipping point” that motivated the provider to seek a practice opportunity elsewhere.

2. Challenges Associated with Practicing in Rural Areas

Rural health care practice differs in many aspects from urban practice. Part of the differences are with unique features of rural medicine while others are related to aspects of rural community life. This section will identify some of these factors from the provider’s viewpoint and delineate how they impacted the provider’s decision to stop practicing in this rural area.
An important aspect of a rural health care practice is the increased responsibilities demanded by the exigencies of providing health care services in remote areas with limited support and backup, both in personnel as well as medical technology. These were described by several in the following manner: long work hours, enlarged liability due to the complexity of procedures and cases, lack of backup from specialists, and requirements to cover multiple areas simultaneously, such as the emergency department, obstetrical services, and in-patients while managing a full clinic schedule. This overlap in responsibilities contributed to increased feelings of stress for the provider. As one provider described it: “We work a lot more hours, we have a lot more liability with obstetrics and the ER. …you can’t compare it to other family providers [in urban settings].”

An important finding that requires explanation was that while both current and former providers acknowledged the burden imposed by emergency department on-call requirements, more current providers, 100% vs. 60%, expressed this as a burden. Exploring this point revealed some of the nuances that might appear paradoxical initially. What the interviews showed was that some former providers were not as burdened by the amount of emergency department call because they welcomed the chance to treat patients in the ER because they were not as busy as they hoped to be in their clinic practice. As one former provider described his situation: He expected to be “busy from day one”, and when he wasn’t, he reported being very unhappy.

Delving into the dynamics at play here, it was found that recruitment at times was driven more by the desire on the part of senior partners to not have to cover the emergency room so much. They wanted to recruit new providers to give them relief with
this on-call responsibility, but not by reducing the number of clinic patients they routinely saw. This dynamic was the root of a conflict in expectations, i.e. senior providers wanted primarily relief in ER call while new providers wanted to build up their clinic pool of patients. That clinic patients weren’t being shared turned out to be a major source of dissatisfaction for several former providers and contributor to their decision to leave.

The emergency call situation frustrated another group of former providers but by a different mechanism. They explained in their interviews that they felt that they were being asked to do more than they felt could be reasonably and appropriately done. The gist of this was they were expected to cover a large share of call duties for the emergency room while still carrying a full clinic load. On days that the demands to see patients in the emergency room were high, they found it was very difficult to keep up with clinic patients at the expected level. Some noted frustration with this situation and the inability to resolve it with senior providers or administration contributed to their decision to leave.

Another area detailed by former providers as a source of dissatisfaction was the lack of availability of student loan forgiveness. More former providers than current ones, by a 40% to 22% margin, were unhappy with this.

3. Expectations Not Met

Considering all the different factors that contributed to sufficient level of dissatisfaction for a provider to make the decision to stop practicing in the area, an important aspect frequently identified in the interviews was the mismatch between the actual experience providing health care services and what they expected it to be like. This mismatch included both expectations held at the beginning of their service as well as the failure of expected opportunities to materialize.
The data describing these various areas of dissatisfaction with the rural practice arrangements are summarized below:

Position advancements commitments were not kept (44%); senior providers not helping to build their practice (33%); excessive call burden but too few clinic patients (33%); senior partners’ dissatisfaction with newer providers (44%); new provider not accepted as an equal or respected (67%); work load excessive (56%); and combined expectations, including excessive including ER call (56%). Details on these issues follow:

a. Expected Practice Arrangements Not Realized

Some described having an initial optimism about the opportunities available in the rural setting, but this positive outlook changed to dissatisfaction as time went by as practice arrangements either failed to develop or changed in ways that were inconsistent with initial expectations. Several commented that in the recruitment process expectations were generated of future opportunities such as becoming a partner and increased participation in business decisions and clinic operations. However, as time went by, they felt like they were being held back, not supported, not being given sufficient help to build their practice, or to become a respected partner in the organization. Some felt that senior providers had only a limited willingness to share their patients. One suggested that this occurred in subtle ways where established practitioners hesitated to recommend that their patients see the new provider. Others cited perception of a conflict existing between rural physicians and hospital or clinic administration in areas such as the pay differential between rural and urban family practitioners.
Other sentiments of dissatisfaction gleaned from the various interviews included: increased call time, dealing with challenging cases, lack of back up from specialists, and the distance to the larger medical centers. Compensation complaints were not so much on the actual compensation but a perceived lack of fairness in their pay in the rural area relative to what they were being asked to do, both in hours worked as well as complexity of the work. One provider described this sentiment: “Administration needs to realize that rural physicians are under a lot more stress, and rural family practitioners are a different type of doctor than what they have any place else.”

Pursuing another aspect of the practice challenge, another provider described his frustrations relative to the time it was taking for his practice to be built. He did acknowledge, however, that part of this frustration may have been brought on with him not being patient enough. He, none-the-less, felt he could have received more support from administrative personnel, noting his decision to leave might have been different if someone in a position to do so had recognized why he was struggling and helped him work through it.

Several attributed the negative feelings they felt as newer providers attempting to manage what they considered untenable practice requirements, as the most important factor in their decision to leave the rural setting. This practice frustration was more of a burden than the challenge of living in a rural area for them or their families. One who reluctantly made this decision described it in the following way:

Just that it's hard to move. I don't think anybody wants to leave. … I think a lot of tough decisions go into taking a job in a rural area, and that if people were treated better and their jobs were better, people would stay. Regardless of social factors, educational opportunities, that type of thing.
In contrast to the sentiments expressed by several who left, providers who were in more senior positions described the problem differently: The biggest part of the problem lay with the providers themselves, that they were “uncomfortable with the demands of the job. Family not liking the community. They didn’t realize how good they had it in [Millard County]. The grass really wasn’t any greener somewhere else.” A different provider summarized this mismatch in expectations contributing to former providers’ decision to leave:

Well I know there were two areas of major reasons why people left. One was, there's a mismatch in their expectations, what was going to happen and that was on a couple of levels. One was, they didn't realize how demanding [it would be]. They were unprepared for the demands of what was going on, and … what was going to be required here. … the demand was just too high, it was a bit more than they expected, or their skills were not equal to what was necessary.

The perceived attitude differences between long time providers who worked through the challenges and newer providers who did not, was described in the following terms:

Well, there is a difference between the physicians who came 20 years ago, then the ones that are now coming out in the last 10 years. Some of that has to do with expectations. The older physicians that came previously, their expectations were they were going to work hard, that this was going to be their life, they would be busy, they would be compensated for it well enough but, it really would be more of a calling, or their life. That it would take a lot of their time, and it would take a lot of their family time. More recent recruits are looking more for, this is a job. I go to my job, I come home, don't bother me after that.

b. Rural Practice Training Issues

Another aspect of dissatisfaction was the perception that training did not provide the requisite skills needed. This is in contrast to the sentiments expressed above in the section on successful retention of providers where they consistently noted that they had
received the training needed to practice effectively and somewhat independently in a rural setting. Thirty-three percent of former providers indicated that they felt that their training program had not provided them with the breadth and depth of skills needed to be safe and effective in a rural practice.

Some who left observed that the requirement to practice obstetrics in a rural setting was an important stressor for them and contributed to their decision to leave practice. One elaborated that this was a stressor principally because he felt that he had not been given sufficient training in his residency to be comfortable with the pressing demands that with obstetrical practice at any or all hours and often without experienced backup.

In considering the impact of the stressors that come from a rural practice (e.g. feeling inadequately trained for doing a certain procedure or not enjoying doing it), one provider offered the suggestion that not requiring all providers to do all things, particularly challenging aspects such as emergency care or obstetrics, may reduce the stressors on providers. However, another provider stated that to be successful and satisfied with rural medicine, a certain mindset is required.

I think [in] rural medicine you have to have a particular mindset, and I think you have to become comfortable with being uncomfortable … because the scope is so broad and unwieldy, and some people don't really adapt to that.

c. Family or Spouse Issues

Challenges of coming to a rural area include lifestyle issues for both the provider and the family. A number of current providers expressed that they believed that family
reasons were an important part of why former providers left the area. As one longtime current provider commented:

I think you have to have somebody that is oriented to rural life, and really wants to live that life, and really wants to do that practice. As I talk to my friends that have worked here and left, mostly it is you just don't have a life. That is who you are, and the stress just doesn't go away.

Another concern raised was variations in involvement of the spouse and family in the recruitment process. Some described the efforts made in a number of cases to include the family and the spouse in the recruitment efforts. One former provider, who grew up in a rural area, noted that for him the drive behind the decision to leave was a 70-30 split of family versus professional reasons. His remarks highlighted the difficulty in truly preparing a spouse and family for the realities impinging on the provider and the impact his work has on the family. He stated:

I think my family had reasonably good exposure to it, or at least as much as you can until you live there. Once you live there it's different. My wife met the spouses of the other doctors and some of the other hospital people there. So, that was helpful to hear their comments about living in a small area. … It's hard to get a feel for schools. You always talk about moving somewhere and looking at the schools. In a rural area, you can look at the schools all you want. There's one elementary school and that's where you're going. That's an interesting perspective. I think it depends a lot on what your spouse does or thinks that they want to do, and will they be able to do that, and find their peer group, or their community or group of friends there? That's hard to tell ahead of time.

Some questioned whether some of the spouses or the families really wanted to be in a rural area and were willing to make the necessary adjustments, musing that some may have not tried to fit in, or that others even though they tried, the lifestyle requirements just did not meet their expectations.

Another found that those who left may not have fully appreciated the potential that exists in a rural environment: “Sometimes the families chose to leave because they
didn't realize what actually was available here, because in our town, the education's actually excellent.” Another provider’s view was that family issues comprised only ten percent of the problem that drove the decision to leave, but that it provided a convenient excuse by which to hide the real job dissatisfaction:

In [my case it was] none, of those that I have talked to maybe ten percent. I think by and large people and their families are very happy in rural Utah, especially once you have lived there. … From what I can tell that was a very good excuse to use, to kind of hide the true job dissatisfaction.

d. Burnout

The issue of burnout was noted in the literature review, and interviewees brought it up various times as an underlying factor contributing to one-time satisfied providers subsequently deciding to leave. The following comment by a current provider illustrates this point:

I do think that … provider burnout is huge in a small area. Because the call burden is high, the scope of practice, while exciting, is difficult, and you have to keep up on so many things. And one of my good friends who's a provider will often say, ‘to be a rural physician or provider, you have to be comfortable with being uncomfortable’ … [burnout] is also a reason that providers leave.

Interestingly, none of the providers who left ascribed to themselves the feeling of being “burned out” with rural practice. Rather they described a series of frustrations and specific discontents with the work that added up over time. Perhaps because the term “burnout” carries with it negative or dismissive connotations, individuals shy away from using it on themselves, and that may be why it was more commonly attributed to behavior in others than oneself.
4. Left after Finished Loan Forgiveness Obligations

The literature review as well as several current providers suggested that a factor in non-retention was the prevalence of loan forgiveness recipients leaving within a comparatively short time after completing their loan forgiveness obligations. However, only 11% of the former providers in the interviews stated that this was the reason they left. In reference to the issue of loan forgiveness, it was more common for these former providers to express their frustration with the unavailability of loan repayment for them.

Almost all providers of both classes noted that loan forgiveness was important to them. Interestingly, while 88% of the current providers had received loan forgiveness in at least some portion but only 44% of the providers that left had received any loan forgiveness. On the contrary, several former providers remarked that the lack of loan forgiveness built on their cumulating dissatisfaction, as a stressor, to their decision to leave the county. Supporting their decision to leave, some added that in their new area of practice, loan forgiveness was available.

5. Summary

These observations may prove valuable to understanding root causes behind retention failures. Simply saying, for example, someone is experiencing a generic, hard to quantify term, such as “burnout”, doesn’t provide a framework for resolution. What is needed, rather, is to address the specific problems that individual providers have identified. As was observed throughout the course of the interviews, there was not just one thing in any of the cases that drove the provider out of the county, but a combination of factors that built on each other. This will be discussed further in the recommendations.
CHAPTER IV

CONCLUSIONS

A. Summary of Main Findings

1. Introduction

In the literature review documented prominent reasons for recruitment and retention failures in rural health areas. Highlighted concerns included difficulties in adapting to a rural area by providers and their families, inadequate financial incentives, including loan forgiveness, and challenges associated with the realities of a rural health care practice.

However, my study data demonstrated some variances from the literature for the underlying reasons that Millard County health care providers chose to leave. One of the prime differences identified was the disparity in expectations and actual experiences. Eighty-nine percent of current providers indicated that, by-and-large, their expectations had been met and were continuing to be met. On the other hand, only forty percent of former providers found this same overall congruency between expectations and actual experiences.

Current providers averaged over 15 years providing health care in the county (range from two to over twenty years) while those who stopped practice averaged under four years (range one to about 10). That current providers have stayed on an average over eleven years longer time practicing for those who stayed supports the association that those who stayed found a balance between work demands and individual and family needs that worked from them over many years that may have eluded those who left. The
appreciably shorter time that elapsed before former providers made the move to leave indicates that in one or more important aspects this balance had not been reached.

The study data shows important variations among providers for the reasons they chose to leave practice. Analyzing thirteen factors given in the interviews by providers that were behind their decision to leave, the average number of factors was 44% of these thirteen. The highest cited that sixty-nine percent of these factors contributed to the decision to leave, while the lowest reported twenty-three per cent. While there were patterns and similarities among them, each one had a unique set of motivations for leaving. While in some cases one factor given as the most prominent one, but in all cases the providers cited a variety of influences. Even the provider who after his loan forgiveness obligation was completed discussed other things that influenced his decision. For most it was the combination of a various things that were not as expected or desired with accumulating stressors, which led to the decision to leave.

An important corollary offered by some in the interviews was that if someone with the ability to make a difference would have helped resolve these issues that were causing stress and dissatisfaction, then they may not have left. Similarly, several of the current providers stated that if things were to change in negative ways, such as increased emergency call, failure to resolve some of the compensation issues, they could find themselves making a departure decision. This demonstrates the dynamic nature and constant tension between actual experiences and hoped for expectations. A concerted effort needs to be exerted, according to study findings, to keep current providers sufficiently satisfied with their dynamic balance expectations and experiences.
2. Key Findings

In contrast to the general themes in the literature and conventional assumptions about health care providers in Millard County just reviewed about, the differences in having a rural background between those who left and those who stayed was relatively small, 70 vs. 89 percent. The family background of those who left compared to those who stayed was lower, but closer in percentages: 60 vs 67%. In fact, an important portion of those who left indicated that their families did not want to leave, but preferred the rural life style to that found in more urban areas: 90% of those who left were supportive of a rural lifestyle compared to 100% of those who stayed. Only 33% of those that left cited that their family’s desire to leave the area was a strong consideration. In those who stayed, 89% indicated that their family had made a satisfactory adjustment, while those who left the number was lower at 60%.

Prior research implied that providers may leave soon after their debt repayment obligation is satisfied, this also was not found in this study. Only 11% of those who left cited it as the reason they left. Even with that, those who left and indicated that having their loan obligation was satisfied as an important factor, often cited it as being just one part of the reasons that they chose to leave. In the presence of other more positive factors, completing the loan forgiveness requirements would not have incentivized them to leave. Indeed, 89% of the current providers had received at least some loan forgiveness and have not left.

Loan forgiveness was found to be an important part, rather, in getting providers to be willing to come to the area in the first place but was not what kept them there. In fact, over half, 56%, cited that the loan forgiveness availability was a prime factor of what
made them consider locating in Millard County in the first place, and if it had not been available, they would have looked elsewhere. On the other side, lack of loan forgiveness availability was a major area of dissatisfaction for those who decided to come in spite of it. Almost half (44%) of those that left cited the lack of loan forgiveness in combination with other financial negatives was important in their decision to stop their local practice.

What was principally found, however, was dissatisfactions with practice arrangements. More specifically, providers commented about having an unrealistic number of clinic patients while doing emergency department call, with a sense of frustration with these demands. Senior partners also expressed direct or indirect concern that the newer practitioners were unwilling to work as much as was expected for their compensation. It was also noted by continuing providers that newer graduates were less willing than earlier health care providers to put in the effort that successful rural practice required. Related to that, providers also discussed an expectation to take a large portion of the call time and emergency department coverage, but not having enough clinic patients to be seen.

In addition, a sentiment was expressed by an important number of those who left that senior providers were unwilling, or at least not as helpful as they hoped for, in helping them to build their practice. What stood out is that a major missing piece in the retention puzzle was a variance in the perception of what is expected of new providers coming into a rural practice by those who are already there and those who are starting out. There was not a clear understanding at the beginning of a practice of expectations: work and rewards, and how these would be addressed and supported overt time. Several providers expressed the sentiment that they understood the practice would go a certain
direction and it did not. Other expressed that once they got into their practice, as frustrations or difficulties arose, if a senior provider or administrator would have taken them aside, helped them to figure out what the problems were, a solution may have been reached that would have kept them from making the decision to leave.

In a similar vein, an important finding was a mismatch in clinical skills with what was required in comparison to what the realities of clinical practice were. The majority of all providers came directly to Millard County from their training program (80% former, 89% current). Most had sought a training program that provided the needed skills. A differential existed, however, in how well prepared they were once they started practicing. Most expressed some amount of tension, especially at the beginning between the expectations of clinical skills and where their comfort level was. Almost 100% of current providers indicated that they felt that they had received the training needed to start a rural practice while only 40% of those who left felt their training had fully prepared them, while more current providers (67%) vs only 40% of the former had specifically sought extra training in expected rural clinical skills.

Along these same lines, a third of those who left indicated that they did not like practicing the full scope of health care provision that was expected in rural areas. Some areas more commonly noted as being undesirable included providing obstetrical care, covering the emergency room, and doing procedures, including surgeries. More than half (56%), cited that the amount of time on call and time away from the family was important in their decision to stop rural practice. With that, seventy percent of former providers indicated that in one or more factors, the experiences they encountered did not match what their expectations were with only 30 percent of them indicated that they had
achieved this overall balance. On the other hand, 89% of current providers found that they had achieved a satisfactory balance between job demands and their other life goals.

Another area of difference between current and former providers is in how they judged they were being treated by their practice organization. Three-fourths of current providers indicated that they were being treated fairly in contrast to only fifty percent of former providers reporting this. The difference in compensation was not remarkable between the two groups, however as both reported only 75% felt they were being compensated fairly, indicating that both groups had some issues with pay and incentive programs. Areas of dissatisfaction for both included feeling that the increased responsibilities associated with rural health care provision were not adequately being recognized. For the current providers, this difference in perceptions of compensation was not enough yet to drive them to leave practice. But for those who left, compensation issues became important when compounded by an increased sense of not being respected and supported.

Another important study finding was the potential that having the option to choose an alternative clinic arrangement may modify some provider’s decision to leave by allowing them to switch practice settings rather than leave county practice altogether. Conflict and misunderstandings between newer and more senior providers and administrators were important factors cited by many as contributing to their departure decision. The interviews revealed that for an important portion of those who continued to practice, being able to choose between alternative practice settings was an important factor in either choosing to practice in Millard County or to pull back a tentative decision to leave.
In contrast, a segment of those who left indicated that if they would have had other viable practice options or alternatively, could have had more support or improved understanding with senior people early on, they may not have left. Indeed, several expressed regrets that this had not happened.

3. Summary of Findings

Findings of this study suggest that there is no single factor responsible for recruitment and retention failures. Recruitment cannot just focus on a narrow set of issues, such as the importance of a rural background or student loan forgiveness, as important as these in themselves are. Rather, recruitment has to be comprehensive and take into account that an accumulation of stressors - negative experiences – can build up to the point that the individual provider reaches a tipping point and concludes that stopping practice in the county is in his or her best interest. This study proposes, as a solution, that the clinic, hospital, or community leadership need to adopt a broader towards recruitment, considering comprehensively what are the short-term and long-term goals and expectations of individual providers and their families. Next, how well these expectations are being met, needs to be continually assessed. Then, the stressors and issues troubling these providers must be addressed effectively in order to prevent the cumulative impact of a variety of negative experiences reaching the point where the provider determines to look for practice opportunities elsewhere.

This conclusion is supported by study data that showed providers who were recruited with a limited focus and not provided with on-going support, such as only emphasizing a rural background or being offered loan repayment, still chose to leave practice in the county. On the other hand, a number of those providers who continued to
practice, explicitly stated that their needs were largely met, and for that reason, they continued to provide health care services in the county. As a caveat, several explicitly stated that if things changed sufficiently in a negative way, they also would consider leaving.
B. Recommendations for Future Recruitment and Retention

1. Introduction

This study provided important insights into how the recruitment and retention processes could be improved and how resources allocated for this process may be more effectively employed in identifying those candidates who would be willing to establish and maintain health care practices in Millard County. As important as identifying the best candidate initially is the necessity of establishing effective mechanisms for supporting the continued services of recruited health care providers. This study identified the value of a program that continually assesses provider’s needs and concerns and has the resources to appropriately address these. To be effective, the study suggested, the program should encompass improved communication at the onset with clear, written practice agreements, including identifying explicitly incentives and future practice opportunities. Also, requisite is the establishment of mechanisms for providing on-going support.

2. Develop a Comprehensive Program

Developing this type of comprehensive recruitment and retention plan requires first focusing on the most compatible candidates, then having in place mechanisms for the on-going evaluation of their progress towards full integration of new providers into the clinic and hospital settings. To accomplish this, there needs to be sufficient resources available for addressing and resolving these emerging needs before they become so large that mutually beneficial solutions may be out of reach. An important recommendation that emerged in the interviews was the need to provide mentorship to new providers by senior practitioners in order to facilitate the transition to full practice capabilities.
Administrative personnel, whether senior partners in a clinic or hospital administration officers, need to develop and maintain an effective on-going working relationship with all practitioners in order to be aware of developing concerns. If these issues are effectively addressed early on, it’s possible to facilitate the continued practice in Millard County.

This concept was put forth by one former provider:

I wonder if [the administrator or a senior provider] would have pulled me aside and said: ‘We need somebody like you here, somebody that grew up in a small town, somebody that's happy living in a small town. … What can we do to get you to stay? I [can find the] resources to [get what] you think you need.’ … That's probably something that would have kept me there. … If somebody comes in that's kind of like me, that'll be happy to be there, his wife's happy to be there, children are not going to have a problem being there. Maybe you need to cultivate them some. That's probably something that I could have used. [If someone had said] … ‘We need you here and here’s what we're willing to do to keep you here’

The data indicated that the problem was not the lack of a rural background, as most providers had a rural background, received rural focused training, and had supportive families that liked the community. Factors found in the study that could help alleviate the problems encountered in the practice setting included: providing a more flexible schedule, sharing patients more equitably, reducing the pressure associated with covering multiple areas simultaneously, and helping newer providers acquire additional clinical skills needed in rural settings. Achieving this requires a consistent effort by individuals in the community with the resources and the ability to allocate them towards the areas of greatest need in order to solve these problems in a timely manner.

Suggestions aimed at facilitating this include beginning with an explicit delineation of responsibility for mentorship and support. Formal and informal interactions between the mentor or leader and the new provider need to take place. Open
communications and clear expectations need to be clarified and put down in writing, not just verbally. A number of interviewees reported that misunderstandings or misperceptions related to their responsibilities, such as time to be spent in the clinic, time on call, expectations in patient loads, and compensation benchmarks were fundamental problems driving their dissatisfaction. Compensation issues were not so much about how much they were paid, but rather differences in what were the expectations and perceptions of how compensation was to be determined.

Alternative practice sites and arrangements need to be further developed. As noted earlier, the lack of these, or perception of a lack, drove providers out of the county looking for a better fit. More recently, others stayed when they were able to better match their needs with those of the clinic. The data suggested that by communicating openly, honestly, and with trust built up over time, the potential exists for finding alternative solutions that better fit providers’ needs.

Regarding the importance of concentrating recruitment efforts on those with a rural background, the data does not support increased emphasis in this regard. Further, most of providers, whether those who stayed or those who left, had rural backgrounds, training, and interest. Increasing recruitment efforts towards finding more providers with a rural background than currently exists, may not yield improved results.

Summarizing the impact of loan forgiveness options, for many of the providers who came in the 1980s and 1990s, the availability of loan forgiveness was the key factor for selecting Millard County. More recently, several providers chronicled difficulties in receiving forgiveness of their medical related education loans. They noted that while the county still technically qualified for federal loan forgiveness, the county did not score
high enough on the scale derived from the formula that the federal government uses to calculate eligibility to actually receive for loan forgiveness. Hospital administrator’s actions are fundamental in the process of qualifying for loan forgiveness and they need to be proactive in this regard, engaging not only federal agencies but also state ones as well as health care organizations. As health care education expenses for both physicians and mid-level providers continue to increase, engaging in positive, creative, and on-going effort to assure that these funds are available is critical for successful recruitment efforts of future providers.

The loan forgiveness aspect has to be taken into account along with the total program of compensation and incentives. As described earlier, the areas of compensation and incentives being a mismatch with expectations was an important factor in a number of retention failures. Mid-level providers, that is nurse practitioners and physician assistants, also expressed concerns about the manner that compensation and practice arrangement were handled, so this issue is not just one that needs to be addressed with physicians who are at risk for leaving.

Attracting rural physicians and providers to rural areas is competitive, and as the literature notes, it is a problem observed in large portions of rural America. Many rural areas are providing various incentives, each area is many senses is competing with these other areas for what appears to be a diminishing number of individuals trained and desirous to work in rural areas. Millard County needs to establish a competitive recruitment and retention program in order to compete with other rural areas for these health care providers.
Not only must those responsible for recruitment and retention be proactive in creating the work environment that meets the provider’s needs as discussed above, but they must be proactive in establishing the kind of practice environment that has the ability to attract additional providers as established ones leave. The interviews described a variety of challenges such as the difficulty in getting desired training that is geared for the rural provider, in particular surgical and obstetrical training.

Adjusting to emerging realities associated with future rural medical practice, the county may need to allow increased flexibility in expectations, i.e. whether or not all new providers need to help provide coverage of the emergency department, deliver babies, or do surgeries. In urban areas the roles of family medicine providers are changing where many of them only provide clinic services and to not admit patients to hospitals, deliver babies or do surgeries. Rural facilities have traditionally required all primary care providers to be able to do this full range of care. The study brought out that even for those who want to do this, it is increasingly difficult to get appropriate training to be qualified to provide the full range of services. Future recruitment and retention efforts need to keep this important finding in mind.

3. Summary

Going forward, a recruitment and retention program needs to be a comprehensive and continuous endeavor. The supply of willing and trained primary care providers for rural practice is decreasing. Resources and attention need to be expended to listen to and work with the ones that are currently practicing in order to facilitate their continued commitment to rural practice. At the same time care must be taken to optimize resources
in order to be able to offer the most effective recruitment package. This begins with carefully listening to what the providers have to say.

This study provided an important window into the dynamics of rural health care practice through a series of individual interviews in a confidential atmosphere built on trust and confidentiality. In incorporating study findings, administrators and senior partners are advised to conscientiously build trust based open communications between all parties involved in the process.
C. Limitations and Suggestions for Future Research

Other areas for further research include issues of gender and ethnicity. There were only two females interviewed, one provider and one administrator. The numbers interviewed were limited by the reality that during the study period all but one of the identified primary health care providers were male. While approximately half the current medical students are female, few female providers have chosen to practice in Millard County. Future studies may need to explore the gender differences in the recruitment and retention processes.

The data identified the lack of racial and ethnic diversity. All of the past and current providers identified during the study period were white. Millard County, since its settlement in the 1850s by pioneers prominently of European descent who displaced and marginalized the Native American population, has been a predominately white county. However, the ethnic diversity of the county has increased in recent years. Future studies need to examine the potential consequences of a changing racial and ethnic composition in the region to health care services. Such a study could include the impact on outcomes of the interactions between white health care providers and ethnic minorities and explore improved methods to serve the needs of a diverse population. Additional research could identify barriers to bringing health care providers of various race/ethnicity background to rural communities.

Educational differentials in the recruitment and retention of health care providers in rural areas is another area for future research. The study included two basic different level of education of providers, namely physicians and mid-levels. The physician group is made up of medical doctors and osteopathic physicians while the mid-levels are nurse
practitioners and physician assistants. Because nurse practitioners can practice independently, additional research could help identify the potential for and limitations to increased use of NPs in reducing the rural health care provider shortage. As the county struggles to match the number of qualified providers with an ever-increasing need for accessible and effective health care services, adopting improved recruitment and retention modalities, such as the ones identified in this study may help mitigate the impact of past recruitment and retention failures.
REFERENCES


Rand McNally (2017) Road Atlas. Chicago: RM Acquisition, LLC.


APPENDICES
APPENDIX A

INTERVIEW QUESTIONS FOR HEALTH CARE PROVIDERS

1. Questions Related to Recruitment

a. Were you recruited directly from your training program? If not, what were you doing at the time you were recruited?
b. Were you working as a health care professional prior to being recruited?
c. How many years did you work as a health care professional before being recruited?
d. Recruitment specific questions:

e. Describe the manner that was used to recruit you to become a health care provider in Millard County.

f. What were some of the incentives you were promised as an inducement to come practice here?

g. Could you rank in order, starting with the most important, the top three offered incentives?

h. How well do you think the results of offered incentives matched what you actually received?

i. What are some of the things that were most important to you in selecting a job in Millard County?

j. How much did the concerns of your immediate family contribute to your decision to locate here?

k. What could have been communicated more effectively in the recruitment process that would have facilitated your decision or better allowed you to make a more informed decision locate in Millard County?
2. Questions for Providers Who Have Stopped Practicing

a. How much did family concerns or pressures impact your decision to stop practicing in the county?

b. How much did financial concerns impact your decision to stop practicing in the county?

c. How much did the distance of Millard County from urban centers impact on your decision to leave the county?

d. What factors in the distance from urban centers had the most impact, such as shopping, networking with colleagues, opportunities for professional growth, and opportunities for family members?

e. What would you say, rank wise, were the three top reasons that you stopped practicing here?

f. What level of regret, if any, do you have about deciding to stop practicing in Millard County?

g. What could have been communicated more effectively in the recruitment process that would have facilitated your decision or better allowed you to make a more informed decision to come or not?

h. How much did factors that were unrelated to recruitment or came up after the actual job commenced were part of your decision to leave?

i. Could these factors have been better anticipated on your part or on the part of the recruiting staff?

j. Is there anything else that you would like to add as to factors that contributed to successful or unsuccessful recruitment efforts in Millard County?

k. Do you have any questions?
3. Questions for Providers Who Continued Practicing

a. What are the principal reasons you have continued to practice in the county?

b. Once practicing in the county, how important were the recruiting incentives to continued practice?

c. What would you say, rank wise, were the three top reasons that other providers stopped practicing here?

d. Are you being aware of providers who have left having regrets about leaving?

e. What were some of these regrets?

f. Is there anything else that you would like to add as to factors that contributed to successful or unsuccessful recruitment efforts in Millard County?

g. Do you have any questions?
APPENDIX B

INTERVIEW QUESTIONS FOR ADMINISTRATORS

1. Questions Related to Recruitment and Retention

   a. What would you say, rank wise, were the three top reasons that providers stopped practicing here?

   b. What have you learned about the recruitment process that would benefit future recruitment efforts?

   c. How much did family concerns or pressures impact on provider's decision to stop practicing in the county?

   d. How much did financial concerns impact on provider's decisions to stop practicing in the county?

   e. How much did the distance of Millard County from urban centers impact on decisions to leave the county?

   f. What factors related to the distance from urban centers had the most impact, such as shopping networking with colleagues, opportunities for professional growth, or opportunities for family members?

   g. What would you say, rank wise, were the three top reasons that providers stopped practicing here?

   h. Are you aware of providers who stopped practicing having regrets for having decided to stop practicing in Millard County?

   i. Are their factors that contributed to providers leaving that could have been better anticipated or addressed in such a way that may have impacted providers deciding to stay instead of to leave?

   j. Is there anything else that you would like to add or discuss about things that may have contributed to successful or unsuccessful recruitment efforts in Millard County?

   k. Do you have any questions?
APPENDIX C

RECRUITMENT FORMS

1. Invitation to Participate in Study
2. Verbal Script for Invitation to Participate in Study
3. Informed Consent Form
4. Research Packet Introduction and Reply Form
I am conducting a research project in conjunction with my major professor, Dr. SoJung Lim, in connection with my master’s thesis in the Department of Sociology at Utah State University. The research is titled: Health care provider recruitment and retention in Millard County, Utah (IRB Protocol # 9699).

The purpose of this research is to conduct an in-depth analysis to better understand the root causes underlying the failures in recruitment and retention of health care providers in Millard County. This improved knowledge may pave the way for implementing more effective methods to address the incidence of health care provider shortages in Millard County.

This research consists of interviewing approximately twenty former and current health care providers as well as a few health care administrators who have worked in the Millard County area. You have been selected to participate, and if you choose to be interviewed, the process will consist of a one-on-one interview with myself. This interview is expected to last about a half an hour. There may be a follow-up interview based on the amount and types of information gained in the interview process.

Questions asked during the interview will be related to the recruitment and retention processes of health care providers in Millard County, Utah. You will have an opportunity to ask questions as well as make additional comments during interview and at its conclusion. You may also decline to answer any or all questions during the interview. If you would like to participate but prefer not to be interviewed in person or a satisfactory time for an interview cannot be reasonably arranged, then arrangements may be made to gather the information through an alternate format of your choice, such as by phone, electronic (email), or physical mail.

All data, including recordings of the interview, will be kept strictly confidential and individual identifiers will be deleted. Data from the interviews will be tabulated and only reported in the aggregate so as to remove the likelihood of individual identification. Specific quotes from interviews may to be used in reporting the data for illustrative
purposes, as this is a qualitative study, but identifiers will be redacted to prevent individual identification.

I am looking forward to your participation in this important research project. Your input will help generate important knowledge about more effective recruitment and retention strategies of health care providers in Millard County as well as in other rural communities. This may benefit the well-being of individuals, communities, and Utah as a whole.

If you have any questions, please call or text me at (435)406-9415 or email at ron@millardk12.org.

Sincerely,

Ron Draper
2. Verbal Script for Invitation to Participate in Study

Phone or in-person introduction to participation in research study:

Hello [give name of person with whom you are speaking]:

My name is Ron Draper and I am completing my master’s degree in sociology at Utah State University.

I am conducting a research project in connection with my master’s thesis. The study is titled: Health care provider recruitment and retention in Millard County, Utah.

The purpose of this research is to better understand the root causes associated with recruitment and subsequent departures of health care providers.

This research consists of interviewing approximately twenty former and current health care providers as well as a few health care administrators who have worked in the Millard County area.

[If speaking with the office manager or other authorized representative of the person who has been selected to be interviewed, add the following additional introduction:]

I would like to invite [name of person] to participate in this study. What is the best way to contact [give name]?

[Based on response, the additional requested information from the Introductory Letter or Consent to Participate form will be provided to facilitate getting the Introductory Letter to the designated person.]

As you are a [current or former health care provider or administrator in Millard County] you have been selected to participate in this research study.

If you choose to be interviewed, the process will consist of a one-on-one interview with myself. This interview is expected to last about a half an hour. There may be a follow up interview based on the amount and types of information gained in the interview process.

Questions asked during the interview will be related to the recruitment and retention processes of health care providers in Millard County, Utah. You will have an opportunity to ask questions as well as make additional comments during interview and at its conclusion. You may also decline to answer any or all questions during the interview.

If you would like to participate but prefer not to be interviewed in person or a satisfactory time for an interview cannot be reasonably arranged, then arrangements may be made gather the information through an alternate format of your choice, such as by phone, electronic (email), or physical mail.
[Answer questions and provide additional details from either the Introductory Letter or Consent to Participate form as requested by potential interviewee.]

[Confirm details of when interview will take place. Advice that a written confirmation of these details including contact information as well as the Consent to Participate form will be sent promptly to the interviewee.]

[Thank them for their time and participation, as appropriate.]
3. Informed Consent Form
Health care provider recruitment and retention in Millard County, Utah

Introduction

Purpose

You are invited to participate in a research study conducted by Dr. SoJung Lim and Ron Draper, a master's student in the Department of Sociology at Utah State University. The purpose of this research is to conduct an in-depth analysis to better understand the root causes underlying the failures in recruitment and retention of health care providers in Millard County. This improved knowledge may pave the way for implementing more effective methods to address the incidence of health care provider shortages in Millard County.

This form includes detailed information on this research study. Please read it carefully and ask any questions you may have.

Procedures

Your participation will involve an interview that is expected to last about a half an hour. There may be a follow up interview based on the amount and types of information gained in the interview process. Questions asked during the interview will be related to the recruitment and retention processes of health care providers in Millard County, Utah. You will have an opportunity to ask questions as well as make additional comments during interview and at its conclusion. Please note that all specific provider and participant details will be removed, and data will be reported only in the aggregate. We anticipate that approximately twenty people will participate in this research study.

Alternative Procedures

If you would like to participate but prefer not to be interviewed in person or a satisfactory time for an interview cannot be reasonably arranged, then arrangements may be made gather the information through an alternate format of your choice, such as by phone, electronic (email), or physical mail.

Risks

This study has minimal risks, meaning that the risks are no higher than those you encounter in everyday activities. Potential risks or discomforts may include being asked questions about your past or present workplace environment. In order to minimize those risks and discomforts, you are free to decline to answer any or all questions. Additionally, the interview may be conducted at a location away from the workplace environment, according to the desires or needs of the interviewee to minimize these risks.

This research may involve risks that are not yet known. If you have a bad research-related experience or are injured in any way during your participation, please contact the principal investigator of this study, Dr. SoJung Lim, promptly by calling (435)797-8458 or emailing sojung.lim@usu.edu.

Benefits

There is no direct benefit to you for participating in this research study. More broadly, this study will help the researchers learn more about health care provider recruitment and retention in Millard County, Utah and indirect benefits may accrue based on what we hope to learn through this research and analysis of the data. These indirect benefits may include an improved understanding of the recruitment and retention process for health care professionals in Millard County specifically. It is possible that others may find this information applicable to recruitment and retention efforts in other rural areas in Utah as well as outside of Utah.

Confidentiality
The researchers will make every effort to ensure that the information you provide as part of this study remains confidential. Your identity will not be revealed in any publications, presentations, or reports resulting from this research study. While the data reporting may contain some illustrative quotes, any individual identifiers or references will be redacted. Interviewees will be specifically cautioned to speak only in generalities and to not identify any individuals or specialties in their responses. However, in spite of these conscientious safeguards, it may be possible for someone to recognize your particular story, situation, or response.

We will collect your information through audio recordings, interviews, phone calls, email, or regular mail correspondence. This information or data will be securely stored in a restricted-access folder on Box.com, an encrypted, cloud-based storage system and/or in a locked drawer in a restricted-access location. Information from each interview will be kept filled under a separately assigned number and not by name of the interviewee. The codebook connecting the interviewee to the number assigned will be kept separately in a secure location. After the interviews are transcribed and assigned the coded number, the digital copies of the recordings as well as the codebook will be destroyed. No names will be used in the transcription process. De-identified copies of the transcripts may be kept by the principal investigator at USU as part of the research file.

This form will be kept for three years after the study is complete, and then it may be destroyed.

It is very unlikely, but possible, that others, including Utah State University, or state or federal officials may require us to share the information you give us from the study to ensure that the research was conducted safely and appropriately. We will only share your information if law or policy requires us to do so.

**Voluntary Participation, Withdrawal & Costs**

Your participation in this research is completely voluntary. If you agree to participate now and change your mind later, you may withdraw at any time by contacting the researchers with the contact information provided. If you choose to withdraw after we have already collected information about you, please also contact the researchers. Once data has been aggregated into anonymous files and the initial data with identifiers destroyed, it may not be possible to withdraw the data as we may not be able to determine whose data is whose.

There are no expected costs that you will incur other than the time it takes to complete the interview and respond to any correspondence associated with making the interview and follow up arrangements. The researchers may choose to terminate your participation in this research study if circumstances prevent the completion of the study or mutually satisfactory arrangements to complete the interview process are not agreed upon. Attempts will be made to notify you if this occurs.

**Payment or Compensation**

For your participation in this research study at the end of the interview, you will be offered as an honorarium a gift card redeemable at Amazon or similar with a value of $25.00.

**Findings & Future Participation**

Once the research study is complete, the researchers can email you a summary of the findings of the study, including aggregate results.

If you are interested in receiving this please initial here and include preferred contact information:

__________________________________  __________________________________

The researchers would like to keep your contact information in order to invite you to participate in future research studies. If you would like them to keep your contact information, please initial here: ______.
This information will be entered into a contact file kept by the researcher that is completely separated from anything to do with this research study and maintained for up to five years after this research is completed. You can contact the Principal Investigator at any time to be removed from this list.

**IRB Review**

The Institutional Review Board (IRB) for the protection of human research participants at Utah State University has reviewed and approved this study. If you have questions about the research study itself, please contact the Principal Investigator at (435)797-8458 or Sojung.lim@usu.edu. If you have questions about your rights or would simply like to speak with someone other than the research team about questions or concerns, please contact the IRB Director at (435) 797-0567 or irb@usu.edu.

Dr. SoJung Lim, PhD  
Principal Investigator  
(435) 797-8458; Sojung.lim@usu.edu  

Ron Draper  
Student Investigator  
(435) 406-9415; ron@millardk12.org

**Informed Consent**

By signing below, you agree to participate in this study. You indicate that you understand the risks and benefits of participation, and that you know what you will be asked to do. You also agree that you have asked any questions you might have and are clear on how to stop your participation in the study if you choose to do so. Please be sure to retain a copy of this form for your records.

__________________________  
Participant’s Signature  
Date

__________________________  
Participant’s Name, Printed

Preferred Contact information for future contact, if necessary:
Attached are the information and consent documents for my research project for my Masters’ Thesis at USU. This research explores health care provider recruitment in Millard County. Research data will come from a series of 30-minute interviews with current and past health care providers and administrators in Millard County.

I have enjoyed working with you in the past and hope you will participate in this research project.

Please mark one of the options below after reviewing the material. You may send your response in the provided stamped envelope or by calling, texting, or emailing me.

Thanks so much.
Ron Draper
ron@millardk12.org
435-406-9415
115 N. Center St.
Delta, Utah 84624

I would like to participate. Please contact me about setting up an interview time and place. Preferred contact information:

I would like to participate but would prefer responding in writing rather than in an interview. Please send me the questions and I will send back my responses.

Email the questions to:
Or, mail the questions to:

I need more information before deciding to participate. Please contact me.

Preferred contact information: