8-24-2010

Mapping in Philanthropy: Exploring the Use of Mapping in Foundation Grantmaking

Jim Casey

Jim Casey

Mapping in Philanthropy: Exploring the Use of Mapping in Foundation Grantmaking

University of Denver Department of Geography

Capstone Project

for

Master of Science in Geographic Information Science

August 24, 2010

_____

Matthew Taylor Ph.D.
Capstone Advisor

_____

Steven R. Hick
Academic Director

Table of Contents

Abstract

Foundations provide grants to nonprofit organizations in our communities, who then provide services locally. Choosing which nonprofit to fund, and which not to fund is difficult. This study examines current uses and upcoming uses of mapping and Geographic Information Systems (GIS) as part of funding decisions made by foundations. Foundations engaged in strategic funding, especially that which targets specific populations are more likely to use GIS and geospatial analysis in funding decisions. Grantmaking in response to proposals requires less strategic analysis and calls for mapping much less by comparison. As a field, nationally foundations and nonprofits have identified many uses for mapping, spatial analysis and data collaboration. Several overarching challenges to such analysis and collaboration are identified and reviewed. Results of this study indicate the circumstances which may affect foundations decisions to use mapping and spatial analysis. Using mapping for strategic grantmaking is identified as an opportunity for more informed funding decisions.

Introduction

In 2007, over 1,200 Colorado foundations awarded grants totaling in excess of $599 million to thousands of nonprofit organizations, mostly in Colorado.[1] Foundations provide funding in the form of grants to nonprofit organizations who are service providers in each of our communities. These organizations, in turn, provide much needed services to the most needy and disadvantaged among us. Examples of nonprofit organizations discussed as grantees may include libraries, homeless shelters, food pantries, after-school programs and numerous others. Each service provider must meet payroll, maintain staff, facilities and programs with grant dollars awarded by foundations.

This study seeks to learn how mapping and geographic information are being used by foundations to inform funding decisions. In particular, this study hopes to identify the motivators which drive funders to use or not to use maps and related analysis as part of their funding decision-making processes.

This study is informed by unstructured interviews with staff members from several of the largest grantmaking foundations in Colorado. As an example of the impact of five of these foundations, in 2007 their total giving

---

[1] The FoundationCenter."Top 50 Colorado Foundations by Assets, circa 2007". http://foundationcenter.org/findfunders/statistics/pdf/09_top50_aa/2007/co_07.pdf

was in excess of $105 million and they held over $1.6 billion in combined financial assets, as reported by The Foundation Center.[2] Also, private sector and other nonprofits contributed input on this topic. In four cases, maps were made based on grantmaking data from foundations. Those maps were presented at a follow-up meeting, and discussed, eliciting reactions to using maps as tools for grantmaking. This report summarizes findings from these discussions and offers conclusions about the current use of mapping and geographic information in the field of foundation grantmaking in Colorado.

Thesis Statement

The use of mapping and geographic analysis by grantmaking foundations as a component of their funding decision-making processes can enhance foundation effectiveness in addressing the intended funding purpose.

About Foundations

In the United States, many different types of foundations exist. Those discussed here were established for the purpose of making grants to nonprofit organizations, primarily in Colorado. Each foundation has its own mission, and each uses different decision-making processes. Also, different types of foundations have different leadership models. In this study, three

---

[2] The Foundation Center. "Guide To Funding Research". http://foundationcenter.org/findfunders/statistics/pdf/10_top50_tg/2007/co_07.pdf (accessed Aug 1, 2010).

different types of foundations provided input - Family foundations, Community foundations and one Private foundation. By definition, these types of foundations are different in their leadership structure and sources of funding. The Foundation Center provides a succinct description of each type of foundation discussed here:

> Family foundation: An independent private foundation whose funds are derived from members of a single family. Family members often serve as officers or board members of family foundations and have a significant role in their grantmaking decisions….
>
> Community foundation: A 501(c)(3) organization that makes grants for charitable purposes in a specific community or region. The funds available to a community foundation are usually derived from many donors and held in an endowment that is independently administered; income earned by the endowment is then used to make grants.
>
> Private foundation: A nongovernmental, nonprofit organization with funds (usually from a single source, such as an individual, family, or corporation) and program managed by its own trustees or directors. Private foundations are established to maintain or aid social, educational, religious, or other charitable activities serving the common welfare, primarily through the making of grants...[3]

As the above descriptions indicate, Family foundations and Community foundations have very different motivating forces driving each organization. Family foundations may adhere strictly to the wishes of the founding donor(s), often narrowing their focus. Community foundations tend to have a broad focus nonprofits serving their local community. It is common for

---

[3] The Foundation Center. "Guide To Funding Research". http://foundationcenter.org/getstarted/tutorials/gfr/glossary.html (accessed Aug 1, 2010).

them to have community representation on boards and committees. Private foundations funded by a single source often focus on a single funding area or small number of issue areas. In this case, the sale of the PSL Healthcare Corporation resulted in the establishment of The Colorado Trust, which is focused on "advancing the health and well-being of the people of Colorado."[4]

This categorical difference appears to contribute to significantly contrasting views on using maps and related analysis for grantmaking. Depending on the foundation's funding approach, the use of maps may be less necessary, or more so in other cases. Additionally, foundations using responsive versus proactive grantmaking styles were observed to employ the use of strategic research for funding decisions very differently . These will be discussed in more detail later.

Below is a summary of the foundations contributing input to this project, their comparative assets and giving from 2007.

[4] The Colorado Trust. "About Us". http://www.coloradotrust.org/about (Accessed Aug. 10, 2010)

	Giving 2007	Assets 2007	Rank by Assets 2007	Type
Anschutz Family Foundation	$2,520,593	$58,484,567	26	Family
The Colorado Trust	$16,346,250	$513,383,869	5	Private
The Denver Foundation	$65,127,294	$559,026,450	4	Community
Gates Family Foundation	$18,638,168	$509,015,727	6	Family
Rose Community Foundation	$2,929,718	$41,723,615	37	Community
Totals:	$105,562,023	$1,681,634,228		

Table 1 - Foundation key facts[5]

Non-Foundation Participants

Organizations other than foundations were also asked to provide input to this study. Three were selected based on their unique involvement with foundation and nonprofit data analysis and mapping. Because these organizations have provided services for foundations, they each have a history of working with foundations on data-focused projects, including mapping. Input from these parties was invited to provide a more technical and solutions-based perspective on the topic.

The Piton Foundation was selected because of their history of using and creating maps as a nonprofit in the Denver area. Piton's mission is to provide opportunities for children and their families to move from poverty

[5] The Foundation Center. "Guide To Funding Research". http://foundationcenter.org/findfunders/statistics/pdf/10_top50_tg/2007/co_07.pdf (accessed Aug 10, 2010).

and dependence to self reliance.[6] Piton aggressively works to identify communities where their mission is a strong fit. In many cases, Piton has made maps for other local foundations and nonprofit collaboratives. Because they are often central to discussions about mapping and nonprofits in the Denver community, Piton was asked to provide input to this study.

Despite the title of foundation, Piton was not participating in the capacity of a grant-maker in this discussion. Rather, they are a local nonprofit who actively makes and uses mapping to facilitate programs and identify areas of need. This is evident from the "create a map" and other related features on their website. In addition, Piton is co-creator with CiviCore of the "Mapping The Next Generation" online tool, currently focused on facilitating school choice in the Denver area.

CiviCore is a for-profit technology solution provider focused on improving the use of information within the social sector.[7] They develop solutions, including web-based mapping technologies for nonprofit organizations. Other products for foundations that CiviCore makes include knowledge management systems that help private foundations provide

---

[6] Piton Foundation. "Overview". http://www.piton.org/About (accessed Aug. 1, 2010)
[7] CiviCore. "About CiviCore". http://www.civicore.com/About (accessed Aug. 1, 2010)

critical community information to non-profits and policy makers.[8] CiviCore is also co-creator with the Piton Foundation of the Mapping the Next Generation online mapping tool.

Based upon their history in the Denver nonprofit community and their specialized services to foundations and service providers, Civicore was asked to provide input to this study.

OMNI Institute is a social science research firm based in Denver, specialized in a research areas including juvenile and criminal justice, substance abuse prevention and treatment, youth development and prevention, and community health.[9] OMNI has developed and hosted online evaluation and mapping tools specifically for foundations, nonprofits and entire communities to use. Among other skill areas, management of information systems, data collection and analysis and several related specialties made OMNI uniquely qualified to provide input on this topic.

Literature review

Nonprofit organizations are well known for their direct service in their communities. They assist those nearby or in their neighborhoods, and often in nearby neighborhoods. This description is very similar to a description of

---

[8] CiviCore. "About CiviCore". http://www.civicore.com/foundations (accessed Aug. 1, 2010)
[9] OMNI Institute. "About Omni". http://www.omni.org/omni_institute.aspx (accessed Aug. 12, 2010)

the potential of spatial data in a Geographic Information Analysis text. "Important spatial concepts… are distance, adjacency, and interaction, together with the closely related notion of neighborhood."[10]

A review of journals and articles on the subject of using spatial analysis for philanthropic funding yielded a small amount of existing research. Using spatial analysis to locate populations in need, however, is an area rich in research. Strategic provision of services and locating target populations were the overarching focus of the articles reviewed.

In Grengs article, he shows alternative methods to locating concentrations of poverty in Detroit not detectable at the census tract level.[11] Such measurements are not usually employed without prior knowledge or suspicion that certain populations, in this case the extremely poor, are not being represented in usual assessments. Also, Fielder demonstrated how significant immigrant homeless populations existed 'under the radar', resulting in reduced opportunity and service availability.[12] Using GIS analysis, these Vancouver populations were made evident, allowing services and attention to be directed toward them.

---

[10] O'Sullivan, David and Unwin, David. 2002. Geographic Information Analysis. John Wiley & Sons, Inc.
[11] Grengs J., , and . 2007. Reevaluating poverty concentration with spatial analysis: Detroit in the 1990S. Urban Geography. 28 (4):340-360.
[12] Fiedler R., Schuurman N., Hyndman J. 2006. Hidden homelessness: An indicator-based approach for examining the geographies of recent immigrants at-risk of homelessness in Greater Vancouver. Cities. 23 (3):205-216.

In 2001, The Urban Institute released a report about nonprofit capacity building, in which they stated the vision for greater information sharing among nonprofits and funders:

> By facilitating a flow of information in a systematic fashion, the research community can create a resource base that will serve as an important educational tool for both nonprofit practitioners and grantmakers, saving time and money in the design of capacity-building efforts....The Center on Nonprofits and Philanthropy (CNP) at the Urban Institute, as well as other research centers around the country, are beginning to fill this gap in knowledge.... This work requires a data infrastructure that will serve the information needs of the sector....Examples of research applications to the capacity-building process are beginning to emerge. Because nonprofit organizations are being viewed increasingly as a part of a community's assets, CNP has used geographical information systems (GIS) to map available resources against community needs in the District of Columbia. We have helped Knight Foundation build a database of nonprofit organizations in local communities and linked this information to community indicators.[13]

Since then, several initiatives have taken place across the country, but serious issues with data availability and opportunities for mapping remain.

> A documented historical unwillingness among agencies to share data for technological and organizational reasons might potentially be overcome by identifying boundary objects or shared stakes as a preliminary step towards standardization. This requires, however, the creation of an institutional infrastructure that supports spatial data sharing.[14]

---

[13] The Urban Institute. ed. Carol J. De Vita, Cory Fleming "Building Capacity in Nonprofit Organizations". (2001). www.urban.org/uploadedpdf/building_capacity.pdf (Accessed Aug. 20, 2010)
[14] Schuurman, Nadine. 2002. "Flexible Standardization: Making Interoperability Accessible to Agencies with Limited Resources. Cartography and Geographic Information Science." 29, no. 4 (2002):343-53

In addition to academic literature references, a survey of local strategic mapping projects in the nonprofit sector was done. The Front Range Economic Strategy Center (FRESC) has published two editions of map collections documenting key populations served by area nonprofits. In doing so, they have provided reference materials to the local community to help identify need where it exists.

> The Denver Atlas II… continues to explore unique perspectives on the social, economic and political dynamics in the Denver region, through visual mapping. Maps present suggestive and revealing pictures of the region, filled with geographic data and patterns that are often hard to convey with just narrative. They unveil hidden realities in our communities, present a new angle on familiar phenomena, and deepen our understanding of the world around us. Maps can suggest new courses of action, needed policy changes, or new strategies for community organizations, neighborhood leaders and local officials. .... The maps will take readers through immigration and policing patterns in Aurora, to gentrification patterns in inner-city Denver, to regional voting patterns, to educational challenges in Front Range schools. [15]

This is a summary of a very broad spectrum of research and project-based writing on this subject. It is the hope of this author that included summarizations of readings on this subject provide adequate information to inform further research and reading.

---

[15] Front Range Economic Strategy Center (FRESC). "Denver Atlas II". 2008. http://www.fresc.org/article.php?id=303. (accessed Aug. 1, 2010)

Design and Implementation

This study was intended be carried out in two basic steps. First, seek input from major funders of nonprofits about how, and how much they use maps and geographic information for funding decisions. This step was intended to generate feedback about their use of maps and geographic information in general. During this conversation, general opinions about using maps and geographic information were gathered. Views on how such information may be used in grantmaking were explored. Foundations also described how their internal processes did or did not support the use of maps.

Also during this first information-gathering step, three organizations which are not grant-makers were also asked to provide input. These organizations, mentioned above, offer an alternative viewpoint on the use of mapping in grantmaking. They have worked with foundations on data-centered projects, including making maps in many cases. These organizations were asked for their thoughts on the potential usefulness of mapping in foundation grantmaking. In particular, they were asked if they could identify particular social indicators that were often requested to identify areas of need or for targeting funding. Lastly, they were asked if they had noticed any key social indicators that were being overlooked by foundations. Input from these non-funders was sought during one meeting with each, then summarized, helping to inform this study.

In a second round of meetings, foundations were presented with maps created from their grantmaking data and asked for their reactions. The maps compared grants made with an agreed upon socioeconomic indicator, such as poverty. They were asked to comment on possible uses of mapping in their grantmaking processes, using maps presented as examples. Mapping their own data allowed foundations to see a new representation of their data. At this time, foundations provided reactions to their data presented on maps. We discussed, again, the potential uses of maps in grantmaking. At this time, they were able to make observations about the mapped versus expected distribution of grants, and comparisons with their chosen demographic indicator.

From these meetings, foundations input was reviewed and summarized. Findings and conclusions follow.

Research **methods**

Unstructured interviews was the primary method of researching this topic. In each case, questions were discussed in a conversational setting without forms or questionnaires. Foundations were asked whether or not they used maps, mapping or geographic information as part of their decision-making process in grantmaking. If so, they were encouraged to describe their uses of these approaches. More specifically, they were asked if

geographic information including maps is referenced either in planning or in review of past grantmaking activity. Specific examples were sought.

In cases where mapping or geographic information were not reported as being used, they were asked if there was any particular reason. In addition, each were asked what value they perceive the use of mapping or geographic analysis could bring to their foundation's grantmaking, if employed. The use of mapping was framed within the context of visualizing where the foundations had awarded grants, could be giving grants, or visualizing certain populations and conditions in the geographic areas they serve.

Each foundation was also asked about key social indicators that they may use as reference points when making funding decisions. Examples of such indicators are the poverty level, free and reduced lunch rates for school districts, crime, homelessness, or other statistics related to the overall health of the community or certain populations. These indicators are often provided by the U.S. Census Bureau or other organization focused on such societal measures. Widely accepted measures of community well-being are also often well-suited for use in maps.

Before closing this meeting, each foundation was asked if they would be interested in having one or more maps made using their foundation's grant data, and having it presented it to them at a later date. The purpose

was to elicit a reaction about potential usefulness of mapping when used to visualize some aspect of their own foundation's past grantmaking activity. If interested, we discussed what demographic indicator(s) would be meaningful to use as an overlay on their map(s). Examples chosen included free and reduced school lunch rates, and senior poverty. Upon deciding the general parameters for the maps, the foundation sent a sample set of data via email. Following receipt of the foundation data, from 2 to 4 maps were produced for each of four foundations who requested maps for later discussion.

Four foundations provided data and agreed to meet for a second time. When meeting the second time, I asked that they give me their reaction to seeing their own grant data compared with their chosen demographic measure on a map. None of the data chosen to be mapped for the second round of meetings had been represented on a map by these foundations before.

At the second round of meetings, each foundation was presented with their maps in multiple formats. Each map was laid out on a tabloid 11X17 inch size page. The maps were viewed with a projector as a simple power-point style presentation. Color printed copies of the same maps were provided. They were also able to view their maps on a tablet computer (Apple iPad) which allowed the viewer to use their fingers to zoom in and to navigate from page to page in multi-page documents.

Presenting the same maps in multiple viewing modes was used to overcome inherent differences between projected, printed and on-screen versions of the same maps. Some details that may have gone unnoticed in one mode (such as that projected on a screen) were often noticed when viewed on the print or tablet computer. The foundations were able to view their maps in the way they preferred.

Using multiple modes of viewing the same maps was used to introduce the topic of accessibility. Foundations were asked if the maps were more or less useful when delivered in a particular format. This was asked to learn if the delivery mode would drastically change the usefulness of maps to foundations.

At this second meeting, there were a number of questions that each foundation was asked when presented with maps of their grant data, and is included in the appendix. Each foundation responded to the questions and provided reactions about how much or little relevancy and usefulness mapping could bring to their grantmaking efforts. The input provided by each foundation and organization in this sample is the primary basis for discussion and conclusions reached in this study.

Data sources

Data used in foundation maps was obtained from a small number of sources. The foundations provided their own data, including the location of

grantees and grant amounts. Demographic data was obtained from the U.S. Census Bureau and the Annie E. Casey Foundation's Kids Count program, which tracks student free and reduced lunch statistics. An effort was made to make simple maps with only one variable other than grant amounts and time.

Research of software and web-based tools appropriate for use by foundations and nonprofits for mapping and related data analysis was carried out. Several tools were identified and evaluated. Also, inquiry was made about past and current efforts in the foundation community to address issues related to the collection and sharing of grant and nonprofit data.

Study area

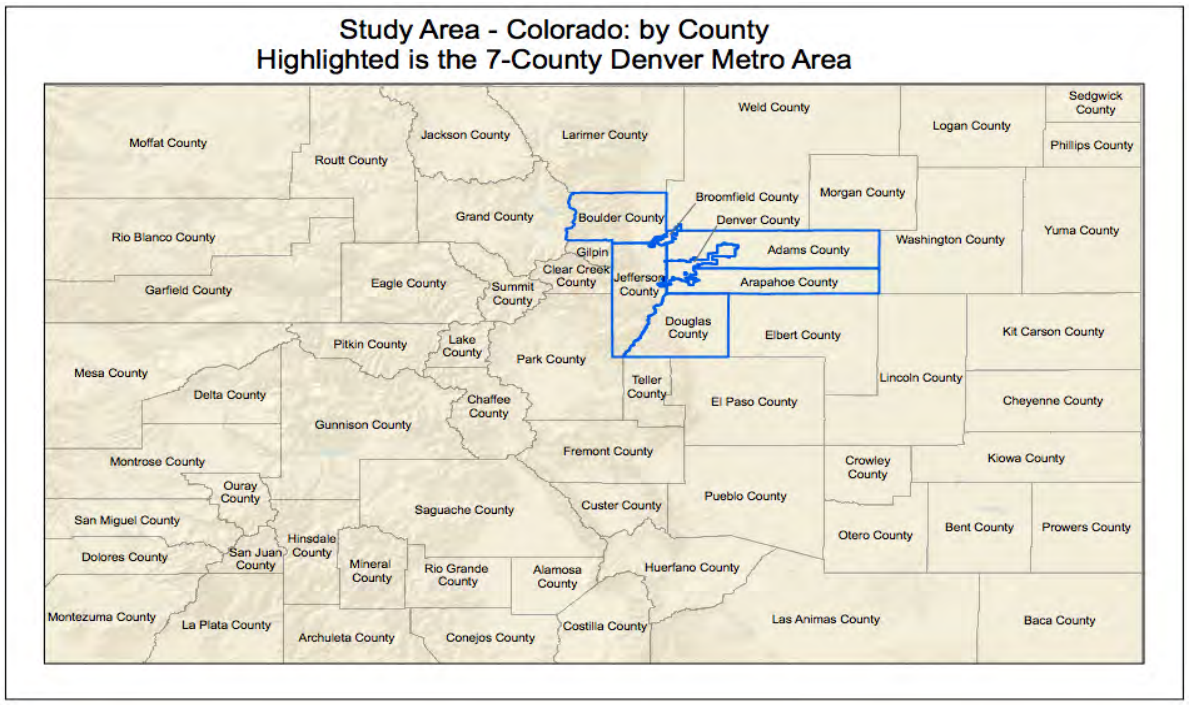


Figure 1 – Study Area

Colorado was the study area, reflecting where foundation grants are made. The 7-county Denver Metro area is one particular focus area.

Results

Discussions with non-foundation organizations were informative and represented an alternative viewpoint than the foundations.

All three organizations observed that the use of demographic indicators with maps to identify areas of need could be useful for foundations. Also, each indicated that such mapping and research would be most useful to foundations if the need being mapped matched the funding priorities of the particular foundation. Foundations have particular funding subject areas, and may find such analysis of use, but not in every case.

Each were asked if, over time, foundations or nonprofits had repeatedly sought out any particular data set or indicators to have researched or represented on maps. In each case, the answer was similar. Each agency or foundation whom they had worked with had been focused on a particular project and had data needs specific to those projects. No particular category of need being prevalent among requests. Rather, each were specific and relatively singular.

Overall, there was agreement that requests for mapping and related research were more likely to come from funders who were seeking to target specific populations in the community with funding opportunities.

Additionally, it appeared more likely that such map requests would originate from nonprofits who are themselves providing services to specific populations, rather than coming from funders.

One contributor pointed out that most foundations are not focused on solving, on a broad scale, the problems and issues listed as their funding priorities. Such systemic level change would be an impractical goal for all but a few foundations to take on. A clear distinction was made between funders seeking to 'move the needle' on an issue, which could require billions of dollars and many years, and smaller scale efforts to improve conditions in local communities. The latter description represents work funded by most foundations. Generally speaking, foundations are better equipped to fund local programs and agencies doing work within their stated priority areas.

It was also pointed out that the scale at which foundations and grantee agencies are commonly able to affect the target problems are different than the scales at which the same problems and issues are generally measured. Services are often provided at the neighborhood level, for example, whereas the problems they are addressing may be measured and reported at the county or state level. The impact of single instances of funding "are not

uniquely impactful"[16] when compared with measurements from entire geographic regions.

Each of the three non-foundation organizations suggested ways to use data collaboratively, and have built tools for this purpose. Again it was noted that foundations are more likely to use data collaboratively if the purpose fit within funding priority areas already held by the foundations.

It was observed that when comparing populations in need with the amount of grants which fund services for those populations, accurate data about the purpose of each grant is extremely important. Without having comparable descriptive data, it is problematic to track the amount of funding directed by separate foundations at specific problems or issue areas. Without interoperable data, collaboration becomes difficult and inconvenient.

Several taxonomies which are used by foundations were mentioned. The implementation of these taxonomies by foundations is often tailored to fit a foundation's grantmaking programs, resulting in taxonomies completely unique to that foundation. Such specialized data can stifle collaboration. More standardized use of grant taxonomies were mentioned as a possible way to facilitate a more holistic understanding of how funding streams are being directed, and where unintended funding gaps exist.

---

[16] Adams-Berger, Jim. 2010. Meeting on July 20.

Next follows a summary of discussions with foundations. Each foundation reported that they do use geography and location in some way. All have some geographic filters that they use in their grantmaking process. These include separating grant requests from rural and urban communities, focus on the Denver metro area, and grants made only to agencies located in Colorado. These guidelines help as a filter to narrow the universe of potential grant applicants. The foundations maintain broad catchment areas defined generally as being within Colorado and often based on county boundaries, which may differ depending on the grant program. Less well-defined areas such as rural vs urban, are defined more subjectively.

Foundations and grantmaking programs can be broadly characterized as either proactive or responsive. In simple terms, this differentiates those that primarily fund (respond to) proposals that are submitted from those who direct their funding toward agencies and issue areas proactively. Responsive grantmaking results in a wider variety of applicants and often requires broad guidelines detailing the type of applicant who qualifies or does not qualify. Proactive grantmaking, on the other hand, is usually very focused on a particular issue area. Foundations may select the grantees without any application being submitted. This type of grantmaking is more often associated with initiatives trying to achieve systemic change.

The Colorado Trust is an example of a proactive grantmaker. Their website states "The Colorado Trust is dedicated to achieving access to health for all Coloradans by 2018."[17] Tanya Beer of the Colorado Trust described their grantmaking as strategic and considers spatial information to be a very important tool in their work. An example that she offered was their effort to locate children who were eligible but not enrolled in available health care programs. They have used GIS to target such populations with increased enrollment opportunities and resources. The Colorado Trust maps resources and needs in order to strategically choose next steps for funding.[18]

Beer noted that differences in the granularity and time scales of different data sets sometimes limit the power of a researcher from finding answers. [19] Differences in the scale of data collection and reporting again were pointed out as a confounding factor in grantmaking research.

In particular, The Colorado Trust tracks the outcomes of some of their efforts with mapping. Using GIS has provided a means to identify concentrations of their target population who may go unnoticed due to their small numbers. When represented spatially, these cases have often been more easily identified and targeted.

---

[17] The Colorado Trust. "About Us". http://www.coloradotrust.org/about (Accessed Aug. 15, 2010)
[18] Beer, Tanya. Assistant Director of Research, Evaluation & Strategic Learning, The Colorado Trust. 2010. Meeting on July 2.
[19] Beer. 2010.

The Anschutz Family Foundation is a responsive foundation focused on supporting nonprofits serving needy populations, especially in rural Colorado. Evident from their mission statement, a wide variety of applicants are eligible to apply for funding. As a result, their grantees are widely scattered and deliver a diversity of services.

> The Anschutz Family Foundation supports Colorado nonprofit organizations that assist people to help themselves while nurturing and preserving their self-respect… There is a special interest in self-sufficiency, community development and programs aimed at the economically disadvantaged, the young, the elderly and the disabled. The Foundation is also dedicated to funding efforts in rural Colorado.[20]

Anschutz indicated that their primary use of mapping and geographic information was to identify urban and rural grant applicants. They seek to maintain a balanced level of giving between urban and rural parts of the state. Otherwise, Anschutz does not use mapping or geographic information as a basis for their funding work.

Anschutz carries out grantmaking on a local, agency by agency scale. Success is not measured by comparing their grants against changes in societal indicators such as the overall number of children in poverty. Instead, the foundation pays close attention to the quality of work at their grantee agencies, and measures success by the services delivered and

---

[20] Anschutz Family Foundation. "Home". http://www.anschutzfamilyfoundation.org/home (accessed July 13, 2010)

people served as a result of their grant dollars. They do not seek to change these county-wide demographic measures, rather to provide funding on a local basis where it is serves demonstrated need.

The Indicator which Anschutz chose as a comparison in their maps was seniors in poverty. Senior citizens represent a specific funding priority of Anschutz. They commented that they did not currently use this or other demographic indicators to proactively direct funding. They use such data as research information when reviewing grant proposals from various parts of the state. Indicators used in grant proposal reviews are often those provided in the grant proposals themselves.

When presented with maps of their grantmaking compared with data showing seniors in poverty, the first reaction received from Anschutz was "…these could be very interesting/useful to use in our processes and in our reporting back to the Trustees."[21]

The Gates Family Foundation is another responsive grantmaker who accepts applications from across Colorado. Their website describes their giving as follows: "The Gates Family Foundation generally confines its

[21] Johnson, Whitney. email message to author. August 18, 2010.

support to capital projects, which are typically building purchase, construction, expansion, renovation, and/or land acquisition."[22]

Grant proposals are presented to their board quarterly, and are accompanied by a simple map showing where in Colorado current proposals are from. Otherwise, the main use of geography in their grantmaking is to maintain a balance of grants to urban and rural communities.

Demographic indicators are used at Gates as part of the review of grant proposals. In some cases, they use a screening rubric which accounts for poverty and other pertinent indicators. Gates does not use such indicators to initiate funding, however. As a responsive grantmaker, requests are considered as they are received.

Gates decided to have maps made of grants for building libraries in Colorado, since their first library grant in 1976. As a demographic comparison, overall poverty by county was used. Gates does not usually consider any particular demographic indicators when considering the funding of a new library.

When presented with maps of their grantmaking, Gates staff immediately pointed out clusters of grants in some areas and lower concentrations of grants in others. The maps also served as a visual

---

[22] Gates Family Foundation. "Eligibility". http://www.gatesfamilyfoundation.org/ (accessed July 8, 2010)

accuracy check of their coding and data. Out of 59 grants spanning 33 years, two staff were able to notice and identify from memory the one (mistakenly) missing star where a grant should have been represented, all within minutes.

Gates noted that they could use such maps to help inform future grant decisions such as funding areas which have historically received less funding. Additionally, they noted that maps of their grantmaking would be particularly useful because of a current change in leadership and discussions about the foundation's future grantmaking direction.

The Denver Foundation and Rose Community Foundation are similar in many ways. Both are Community foundations. By definition, they are focused on a specific community, the Denver metro area in this case. Their grantmaking styles are responsive, and both have a large number of donors who direct the foundation to make grants from funds established by those donors. Rather than one single donor or fund, many donors and funds are involved. Both operate programs which are focused on specific neighborhoods and cultural populations. Also, both have very broad mission statements focused on the Denver metro area:

> Rose Community Foundation works to enhance the quality of life of the Greater Denver community through its leadership, resources, traditions and values.[23]

> The mission of The Denver Foundation is to inspire people and mobilize resources to strengthen our community. [24]

In each case, these two foundations were very interested in using maps to review their own grantmaking. Again, they wanted to use maps to evaluate how well they were meeting their mission, and goals of specific grant programs. Indicators of need were noted as useful to both because the giving of individual donors is sensitive to levels of need, while other grant programs remain responsive to proposals. Neither Community foundation currently use maps regularly. On occasion, they have worked with outside organizations such as Piton Foundation to have maps made.

When presented with their maps, each foundation did a visual check of the geographic extent and amount of grants shown. I mention this because each foundation commented that they could not do such a visual spot check from memory with rows and columns of data. It was again used as a method for checking the coding used to classify the grants, usually raising a few questions. In all cases, the maps were described as a tool which jogs the

---

[23] Rose Community Foundation. "Rose Community Foundation Overview". http://www.rcfdenver.org/about.htm (accessed Aug. 16, 2010)
[24] The Denver Foundation. "About Us". http://www.denverfoundation.org/foundation (accessed Aug. 15, 2010)

memory and provides a useful and different look at the same information. Each foundation agreed that presentation on a map added value to the information rather than being simply interesting to look at.

Maps for Rose depicted school districts compared with levels of free and reduced lunch eligibility by county. The Denver Foundation maps showed the home town of scholarship recipients compared with poverty levels by county. The indicators used for comparison were of immediate interest to both foundations. They quickly found places which may deserve more funding. Also, a few areas with relatively low poverty indicators were awarded greater than the average number of grant dollars, such as Boulder County. This type of information, presented on a map, was welcomed and referred to as very useful. The most common proposed use of maps were for self-evaluation, to facilitate discussion among committees and for presenting to their trustees. In addition, each foundation mentioned strategic planning as a likely use of mapping.

The mission of the Denver Foundation specifically intends to focus on the needs of the most disadvantaged in their community. Rebecca Arno commented that maps are a useful tool to learn whether their grant dollars are in fact reaching their target populations. She believes that there is data which can demonstrate these outcomes, but that data has historically been

difficult to access. Rose also commented that data representing needs and services at such a local scale is difficult to obtain.[25]

Individual donors want to find and support nonprofits in their local communities by using online maps. Because one can now easily perform a web search, filtered by location, such availability of information is becoming more expected by donors and nonprofits. Besides being responsive grantmakers, these Community foundations are a central point where donors and nonprofits become connected. This unique arrangement places a great deal of valuable local information about nonprofits and funding in the stewardship of Community foundations.

Nonprofits and donors alike look to these foundations as an information resource. Foundations receive progress reports from every grantee, summarizing current operations and financial status, often several years in a row. Having this large body of information enables them to advise their committees and individual donors about where to direct grant dollars. It was pointed out that foundations may one day be expected to become providers of this type of data.

In summary, the two Community foundations both reported many strategic uses for maps. They also noted similar issues with both the

---

[25] Arno, Rebecca. 2010. Meeting on Aug. 11, 2010.

availability and scale of data describing needs and services in the community. They want to be able to more easily make maps which overlay layers of indicator data with their own grantmaking data. Even for internal research, both foundations felt that more uses of mapping in their work were inevitable.

Discussion

This study was able to identify many ways in which maps and geographic information are currently used by foundations to more effectively make funding decisions. In addition, this study demonstrates several reasons why maps and geographic information are often not used by foundations for their grantmaking. The mission, funding priorities, level of responsiveness and scale of giving are all strongly connected to a foundation's likelihood to utilize mapping.

CiviCore, Piton Foundation and Omni Institute, providers of maps and technical solutions to nonprofit agencies, were very informative. Demand for maps and related data research for foundations was more often tied to specific projects rather than broad community-wide indicator collection. They had a clear impression that without corresponding funding priorities, such mapping efforts were unlikely. Questions about frequently requested indicators did not reveal any specific topic area that was being more actively researched than others.

Among the foundations in this sample, The Colorado Trust showed the greatest use of GIS and geographic analysis in their funding efforts. The Trust used a wide array of data sources as well as creating their own data. Other foundations used maps and geographic information at a much lower level. They used a combination of reference maps and possibly county-level indicator data. Often the data used was not sought out independently, rather provided by grant applicants.

None of the responsive foundations, however, expressed having difficulty in finding qualified nonprofit agencies performing work that fit their missions. They constantly receive proposals which specify exactly where the problems and issues are located, leaving little to the imagination. Considering this, it is more easy to understand why foundations have not led the charge in the use of mapping. They were designed to operate effectively without relying on maps or spatial analysis.

Mapping and data analysis at foundations appears to be consistent with the amount of strategic funding done by a foundation. In the case of The Colorado Trust, some programs are entirely strategic and require a great deal of research, including geospatial analysis. Community foundations perform research to inform their donors and for some strategic programs. Responsive grantmaking is less strategic in nature, and appears to result in a far lower need for research or analysis of data, including mapping. This

applies particularly to Gates and Anschutz, who do not have multiple donors with strategic funding interests. Responsive grantmakers in this sample are likely to use mapping and related data analysis for strategic planning more than for grantmaking decisions.

Strategic grantmaking, research for donors and strategic planning are the primary circumstances in which foundations in this sample use mapping. In order to map or analyze the combination of funding, services and needs across a community, several specific types of aggregate data are required. These include amounts granted to particular nonprofits and distinctly, amounts granted for particular types of services. An up-to-date listing of the universe of nonprofits, specifying the types of services they provide is an always sought after data set. Additional demographic data about the target populations is also needed for such analysis.

Major roadblocks prevent this aggregate level data from being collected or used. This is pointed out by by the Colorado Association of Funders:

> "The majority of grantmaking data available for analysis in the U.S. (and Colorado) is based on lists of grants provided by foundations on their annual form 990-PF tax returns. Typically these grants do not include much detail on intended beneficiary populations. Because of this, it is not possible to document the full extent to which different

population groups are benefiting from these grants."[26]

Incompatible grant data from disparate systems currently makes it extremely difficult for foundation grant data to be measured collectively. As stated above, one consequence of these islands of data is that populations being served are not able to be measured. Direct comparisons or compilation of foundation grants are extremely difficult to make because of the unique coding used by each. Efforts to facilitate such sector-wide data coding and collection have been attempted by local and national organizations. If successful, collaboration between foundations and more strategic funding are possible outcomes. There are several efforts underway at the time of this writing:

Colorado Association of Funders	Colorado data collection and research initiative
The Foundation Center[27]	National data collection and research Philanthropy In/Sight online mapping tool
Grants Managers Network[28]	Coding Structures and Best Practices
National Center for Charitable Statistics[29]	Multiple nonprofit coding schemas Community Platform - online mapping and nonprofit data collection platform
OMNI Institute[30]	ASPIRE - online grant mapping and indicators reporting tools ASPIRE - Community collaboration and indicator tracking online tools

[26] Colorado Association of Funders. "CAF Research Initiative". (2010):1
[27] The Foundation Center
[28] Grants Managers Network. "Coding Structures and Best Practices". Meeting Agenda. GMN Rocky Mountain Region meeting. June 24, 2010
[29] The Urban Institute. "NCCS Community Platform". Webcast on August 4, 2010.
[30] OMNI Institute

Table 2 - Grant Coding Projects

In addition to the data management and compatibility efforts mentioned above, online mapping tools have been developed which enable foundations to map their own data. Some tools are designed specifically for foundations and nonprofits, others are more general mapping tools which allow the user to upload data for visualization on a map or in charts or graphs. Below are several tools appropriate for most foundations to use. Five years ago, none of these online mapping tools existed.

The Piton Foundation[31]	Community Facts - social indicator data School Facts - school indicator data Create A Map - online mapping tool using school and social indicator data Mapping the Next Generation – school choice online mapping tool.
CiviCore[32]	Civic Indicators Platform - online mapping and statistical visualization tool Visual Impact Mapping – online mapping tool Mapping the Next Generation – school choice online mapping tool.
The Foundation Center[33]	Philanthropy In/Sight - online grant mapping tool

[31] The Piton Foundation
[32] Civicore
[33] The Foundation Center

ESRI, Inc. [34]	ArcGIS Online and iPhone app – online mapping tool Business Analyst Online and iPhone app – mapping and demographic analysis
Google[35]	Google Earth Pro – online mapping Google Fusion Tables – online data repositories and visualization tools
Social explorer[36]	Online mapping of demographic information about the United States from 1790 to present.

Table 3 - Online mapping and indicator tools available to foundations

Even if foundations do begin using maps to visualize their data at a higher frequency, there remains a problem of data scale. As pointed out by the Colorado Trust, the scale at which indicators are generally measured are much more broad than the impact of individual funders. This difference in the scale of measurement has an isolating effect on both funders and nonprofits. Both are working to accomplish goals which may not be measurably comparable with the more widely used societal indicators such as poverty, hunger or homelessness.

For strategic mapping, foundations must solve the problem of comparing their data to commonly available indicators. This may require more deliberate data collection methodologies. Also this may require more centralized or collaborative collection of grant data. With a more

[34] ESRI. "ESRI Products". http://www.esri.com/products/index.html
[35] Google. "Earth Pro". http://earth.google.com
[36] Social Explorer. "Home". http:www.socialexplorer.com

comprehensive view of grants across entire counties, valid comparisons could be made. Also, more informed funding decisions could occur as a result of greater comprehensive data. OMNI Institute has developed ASPIRE, a tool with such features. They described communities and nonprofits as the parties who have expressed the most interest in such tools. Currently, this is being used as a community collaboration tool, and used very little by foundations. Community members and service providers are responsible for most of the demand for such tools.

Overall, foundations were in favor of using GIS and mapping to visualize their data. In some cases, it is only exploratory and others have found more strategic uses. Gates noted that their staff would find many uses for maps in their grantmaking process if the creation of maps from their data were more easily accomplished. Until now, creation of maps has generally required a specialist.

Based upon recent development of online tools, the creation of maps will be accessible almost universally via the internet. A foundation or an individual with a spreadsheet of data and a web browser can now create their own maps and perform spatial analysis with the tools mentioned above. Many of them are free to nonprofits.

In summary, mapping and related data analysis are currently used at a low level by foundations. They are being used in cases of strategic

planning and strategic funding. The degree to which foundations engage in strategic planning and collaboration will be the largest factor leading to more use of mapping and spatial analysis by foundations.

Recent developments in online mapping tools are lowering the level of technical expertise required to create maps. Also, ongoing data management efforts among foundations may result in more ease of data sharing. Barriers are being overcome and user-friendly tools for such analysis are being more widely developed. These factors combined indicate many upcoming opportunities for funding decisions informed by mapping and spatial analysis.

Conclusion

The thesis statement of this study was largely, but not completely supported by the study results. The thesis proposed that grantmaking foundations could be more effective if the use of mapping were employed in their decision making process. There was no discernment of the type of foundation, or the type of grantmaking program. On this axis, mapping was observed as offering the widest variety of usefulness. The more strategic the grantmaking, the greater utility that mapping offered. The less strategic funding program, the less need for mapping.

Strategic grantmaking rose above the other factors in determining the likelihood of mapping being used for funding decisions. How strategic a

funding effort is designed to be will largely determine it's demand for mapping. Initiatives such as the Colorado Trust has undertaken are very strategic in nature and require spatial analysis. They seek to target a specific population which is sometimes difficult to find. They, therefore benefited from GIS and spatial analysis more than others.

Funding programs which are largely responsive to grant proposals, on the other hand, are often designed to be less strategic. Such responsive funding requires little use of mapping. Responsive grantmakers may use mapping and spatial analysis to review past grantmaking, probably as part of strategic planning. Incoming grant proposals provide much of the information that may otherwise have been used for mapping and research.

The funding priorities and mission of each foundation are important for orienting the funding direction of each foundation. Family foundations adhere closely to wishes of the original donor, and appear to have less cause to develop new funding strategies. Missions of Community foundations evolve more over time, and are especially broad. Both cases could lead to greater strategic funding. It is likely that Community foundations will adopt mapping more readily than Family foundations. They play a central role between donors and nonprofits, leading to a greater frequency of strategic funding research taking place.

Notably, neither the overall dollar value of the foundation's assets or annual grantmaking appeared to be a determining factor in the use of mapping. The Colorado Trust granted roughly one fourth the dollars that were granted by The Denver Foundation in 2007, but carries out a much more strategic and targeted funding operation. Strategy outweighed size in this case.

Foundations have a great opportunity before them. New tools are being developed to enable easier mapping. Data management efforts are underway and hold promise of simplifying data collaboration in this sector. The opportunity to develop a new data infrastructure for grantmaking has arrived. In the best case, this could result in more transparent funding streams and more easily focused funding. In any case, nonprofits and communities will continue to use mapping tools for their own purposes.

Without question, I expect nonprofits and donors to continually have raised expectations of foundations to analyze and visualize their data, especially in the form of maps. The bar has been raised. Future strategic philanthropy efforts will be done with the aid of GIS and mapping.

Works Cited

Adams-Berger, Jim. 2010. Meeting on July 20.

Anschutz Family Foundation. "Home". http://www.anschutzfamilyfoundation.org/home

Arno, Rebecca. 2010. Meeting on Aug. 11, 2010.

Beer, Tanya. 2010. Meeting on July 2.

CiviCore. "About CiviCore". http://www.civicore.com/About

CiviCore. "About CiviCore". http://www.civicore.com/foundations

Colorado Association of Funders. "CAF Research Initiative". (2010):1

The Colorado Trust. "About Us". http://www.coloradotrust.org/about

The Denver Foundation. "About Us". http://www.denverfoundation.org/foundation

ESRI. "ESRI Products". http://www.esri.com/products/index.html

Fiedler R., Schuurman N., Hyndman J. 2006. Hidden homelessness: An indicator-based approach for examining the geographies of recent immigrants at-risk of homelessness in Greater Vancouver. Cities. 23 (3):205-216.

The Foundation Center."Top 50 Colorado Foundations by Assets, circa 2007". http://foundationcenter.org/findfunders/statistics/pdf/09_top50_aa/2007/co_07.pdf

The Foundation Center. “Guide To Funding Research”. http://foundationcenter.org/findfunders/statistics/pdf/10_top50_tg/2007/co_07.pdf.

The Foundation Center. “Guide To Funding Research”. http://foundationcenter.org/getstarted/tutorials/gfr/glossary.html.

Front Range Economic Strategy Center (FRESC). "Denver Atlas II". 2008. http://www.fresc.org/article.php?id=303.

Gates Family Foundation."Eligibility". http://www.gatesfamilyfoundation.org/

Google. “Earth Pro”. http://earth.google.com

Grants Managers Network. “Coding Structures and Best Practices”. Meeting Agenda. GMN Rocky Mountain Region meeting. June 24, 2010

Grengs J. 2007. Reevaluating poverty concentration with spatial analysis: Detroit in the 1990S. Urban Geography. 28 (4):340-360.

Johnson, Whitney. email message to author. August 18, 2010.

OMNI Institute. "About Omni". http://www.omni.org/omni_institute.aspx

O’Sullivan, David and Unwin, David. 2002. Geographic Information Analysis. John Wiley & Sons, Inc.

Piton Foundation. "Overview". http://www.piton.org/About

Rose Community Foundation. "Rose Community Foundation Overview". http://www.rcfdenver.org/about.htm

Schuurman, Nadine. 2002. "Flexible Standardization: Making Interoperability Accessible to Agencies with Limited Resources. Cartography and Geographic Information Science." 29, no. 4 (2002):343-53

Social Explorer. “Home”. http:www.socialexplorer.com

The Urban Institute. ed. Carol J. De Vita, Cory Fleming "Building Capacity in Nonprofit Organizations". (2001). www.urban.org/uploadedpdf/building_capacity.pdf

The Urban Institute. “NCCS Community Platform”. Webcast on August 4, 2010.

Appendix

List of questions asked when speaking with foundations about their use of mapping and GIS:

1. Do you use maps or geographic information as part of your grant funding decisions?
2. Is geography or location used as a basis on which you consider grant requests differently?
3. When you are making funding decisions, do you use geographic categorization to distinguish some applicants from others?
4. Do you use maps or geographic information to review your past grantmaking activity?
5. Do you use maps or geographic information for planning?
6. Are there particular roadblocks or barriers to using mapping?
7. Do you use any mapping tools now?
8. If mapping were more accessible and less specialized, how would you use mapping more?
9. Would you be willing to have a sample of your data represented on maps and then discuss those maps?
10. If so, what demographic indicator would be meaningful to compare against your grant data?

List of questions asked when speaking with mapping and information service professionals about their experiences with foundations using mapping and demographic indicators:

1. Please tell me about your work, especially mapping and research that may have involved foundations and nonprofits.
2. At what level have foundations requested mapping of various populations or issues in the community?
3. Why do you think that foundations may have this current level of demand for mapping and data analysis?
4. What indicators have foundations requested most for projects involving mapping and data analysis?
5. What groups in the community use mapping the most?
6. What trends in mapping, data analysis and data visualization do you foresee?
7. Are there any other uses for mapping that could be used in grantmaking that we have not yet discussed?

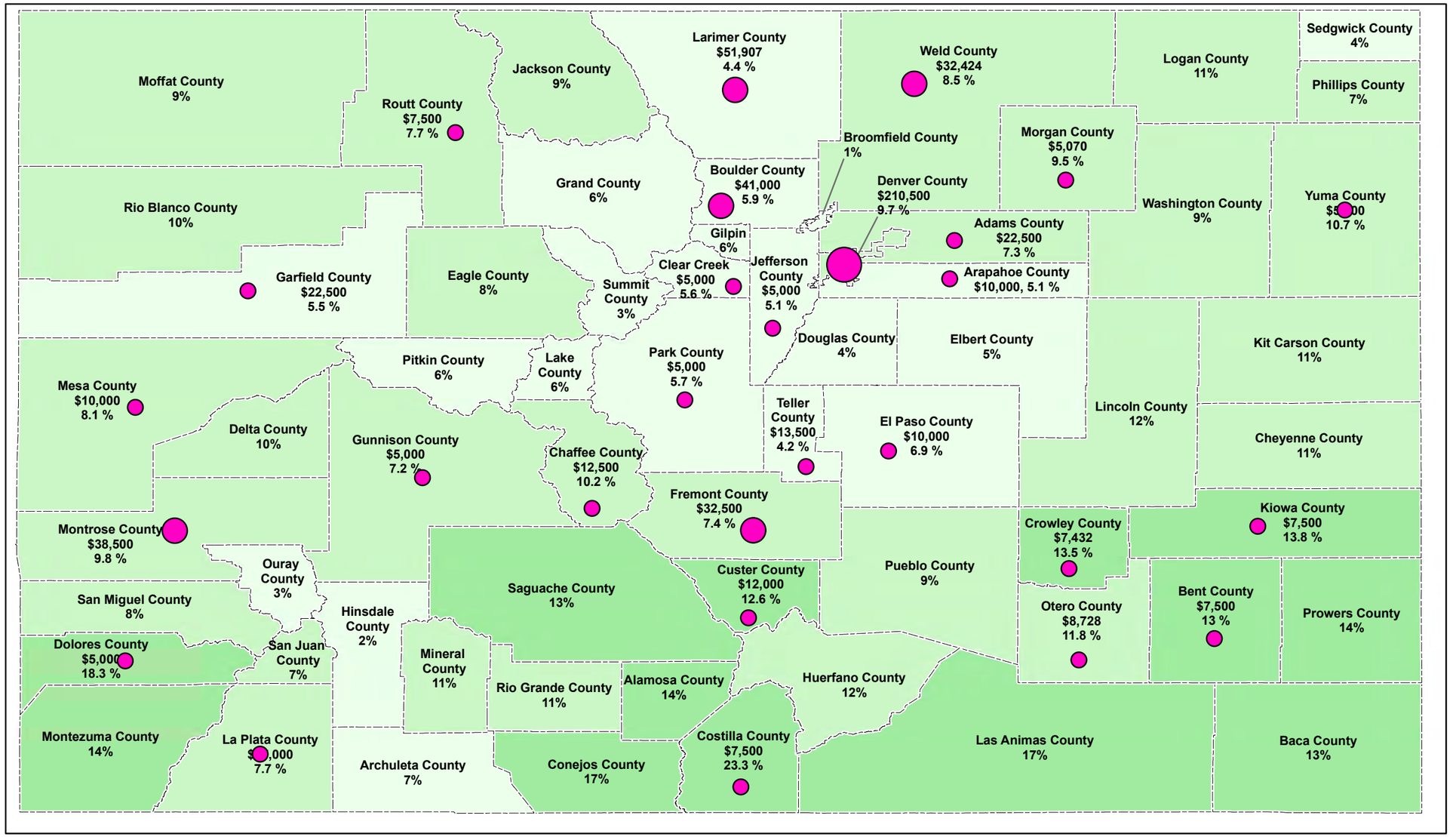
List of questions asked when presenting maps of foundation data:

1. Are there any surprises?
2. Do your grants look differently on a map than you expected?
3. Does it help to compare with key indicators? (ex. poverty)
4. Does it help to have a visual representation of your grantmaking?
5. Does it help to have an overview of key demographics such as poverty?
6. What would you change?
7. Could ready access to information such as this inform your grantmaking more?
8. Is this information redundant?
9. What other uses can you think of for using maps to assist funding decisions?

Maps of Foundation Data:

Appended on following pages.

Percent of Seniors in Poverty by County Compared to Total Grant Amount



Counties	Number	Total
Adams	3	$ 22,500
Arapahoe	2	$ 10,000
Bent	1	$ 7,500
Boulder	8	$ 41,000
Chaffee	2	$ 12,500
Clear Creek	1	$ 5,000
Costilla	1	$ 7,500
Crowley	2	$ 7,432
Custer	3	$ 12,000
Denver	36	$ 210,500
Dolores	1	$ 5,000
El Paso	2	$ 10,000
Fremont	5	$ 32,500
Garfield	4	$ 22,500
Gunnison	1	$ 5,000
Jefferson	1	$ 5,000
Kiowa	1	$ 7,500
La Plata	3	$ 17,000
Larimer	9	$ 51,907
Mesa	2	$ 10,000
Montrose	6	$ 38,500
Morgan	1	$ 5,070
Otero	1	$ 8,728
Park	1	$ 5,000
Routt	1	$ 7,500
Teller	2	$ 13,500
Weld	7	$ 32,424
Yuma	1	$ 5,000
Totals	**108**	**$ 618,061**

ANSCHUTZ FAMILY FOUNDATION

Total Grants

- $5,000 - $22,500
- $22,501 - $51,907
- $51,908 - $210,500

% Seniors in Poverty 2008

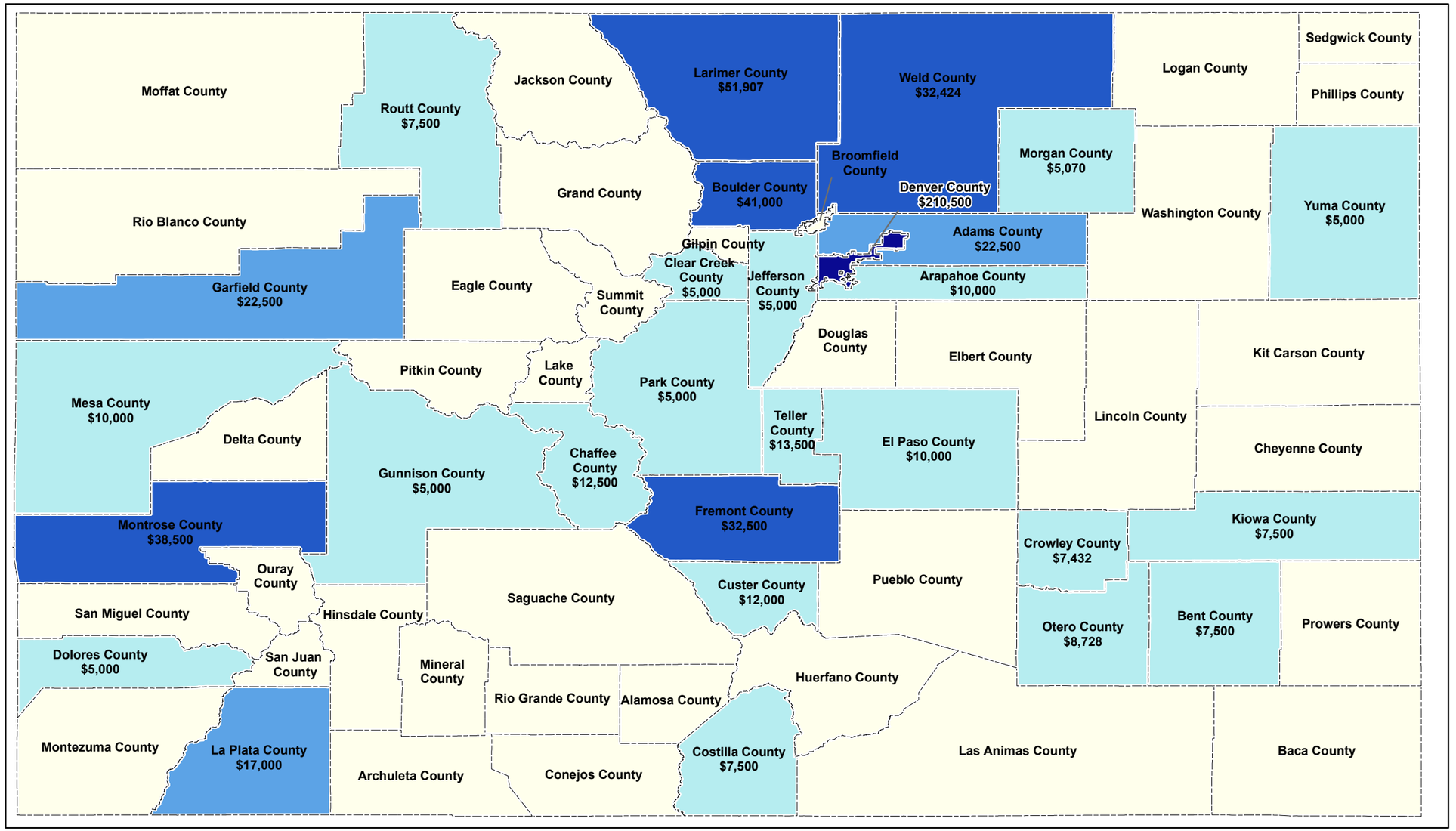
- 0% - 7%
- 8% - 12%
- 13% - 23%

0 50 100 200 Miles

Data Sources: Small Area Income and Poverty Estimates (SAIPE)
U.S. Census Bureau
Anschutrz Family Foundation

2010 Jim Casey D.U. Capstone Project jccasey@gmail.com

Total Grants By County 2006-2009



Counties	Number	Total
Adams	3	$ 22,500
Arapahoe	2	$ 10,000
Bent	1	$ 7,500
Boulder	8	$ 41,000
Chaffee	2	$ 12,500
Clear Creek	1	$ 5,000
Costilla	1	$ 7,500
Crowley	2	$ 7,432
Custer	3	$ 12,000
Denver	36	$ 210,500
Dolores	1	$ 5,000
El Paso	2	$ 10,000
Fremont	5	$ 32,500
Garfield	4	$ 22,500
Gunnison	1	$ 5,000
Jefferson	1	$ 5,000
Kiowa	1	$ 7,500
La Plata	3	$ 17,000
Larimer	9	$ 51,907
Mesa	2	$ 10,000
Montrose	6	$ 38,500
Morgan	1	$ 5,070
Otero	1	$ 8,728
Park	1	$ 5,000
Routt	1	$ 7,500
Teller	2	$ 13,500
Weld	7	$ 32,424
Yuma	1	$ 5,000
Totals	**108**	**$ 618,061**

ANSCHUTZ FAMILY FOUNDATION

Grants by County

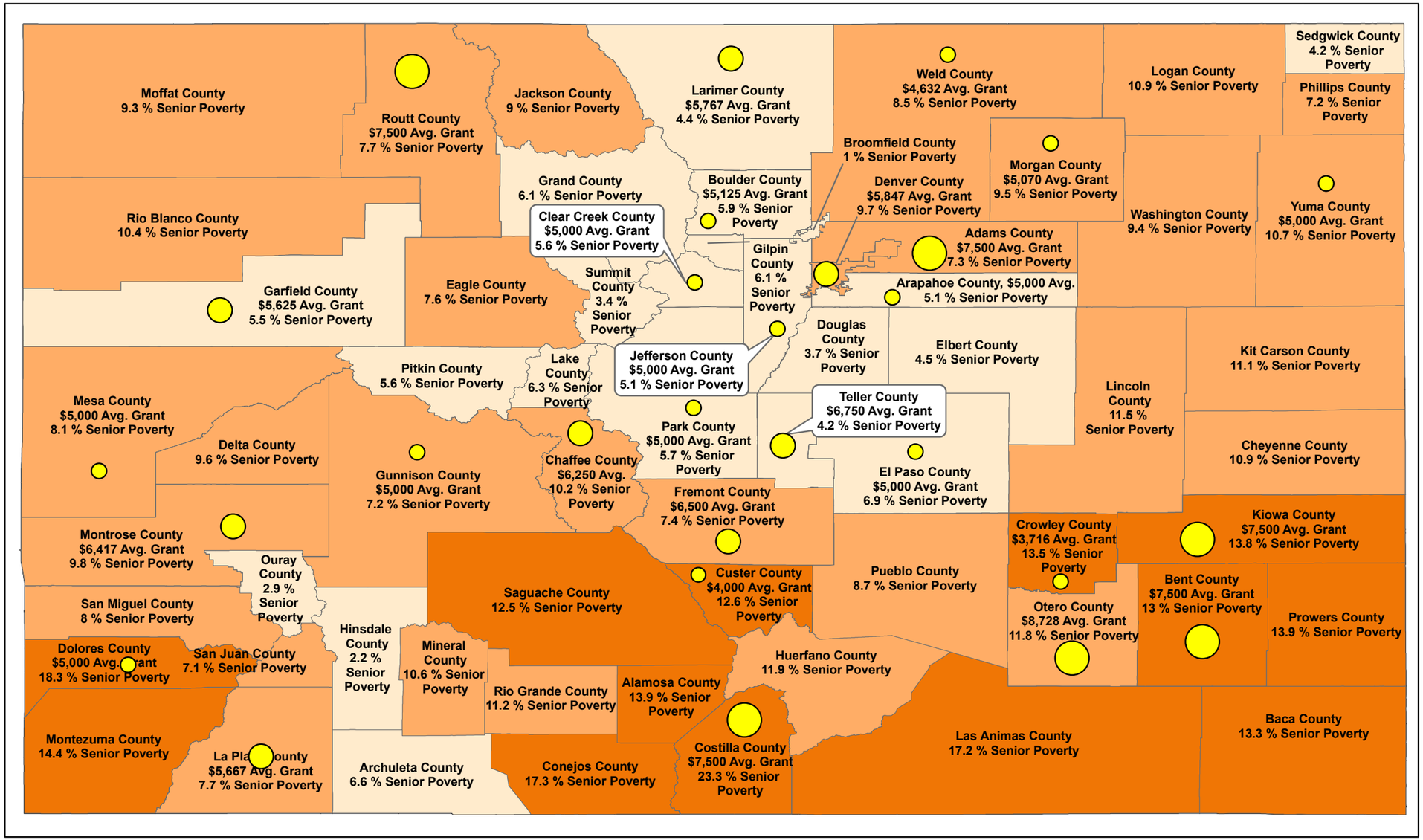
- $5,000 - $13,500
- $17,000 - $22,500
- $32,424 - $51,907
- $210,500

Data Sources: Small Area Income and Poverty Estimates (SAIPE)
U.S. Census Bureau
Anschutrz Family Foundation

2010 Jim Casey D.U. Capstone Project jccasey@gmail.com

0 50 100 200 Miles

Percent of Seniors in Poverty by County Compared to Average Grant Size 2006-2009



N
W E
S

By County

% Seniors in Poverty 2008

- 0% - 7%
- 8% - 12%
- 13% - 23%

Average Grant Size

- $3,716 - $5,125
- $5,625 - $6,750
- $7,500 - $8,728

108 Grants Totalling $618,061 Awarded in 28 Counties

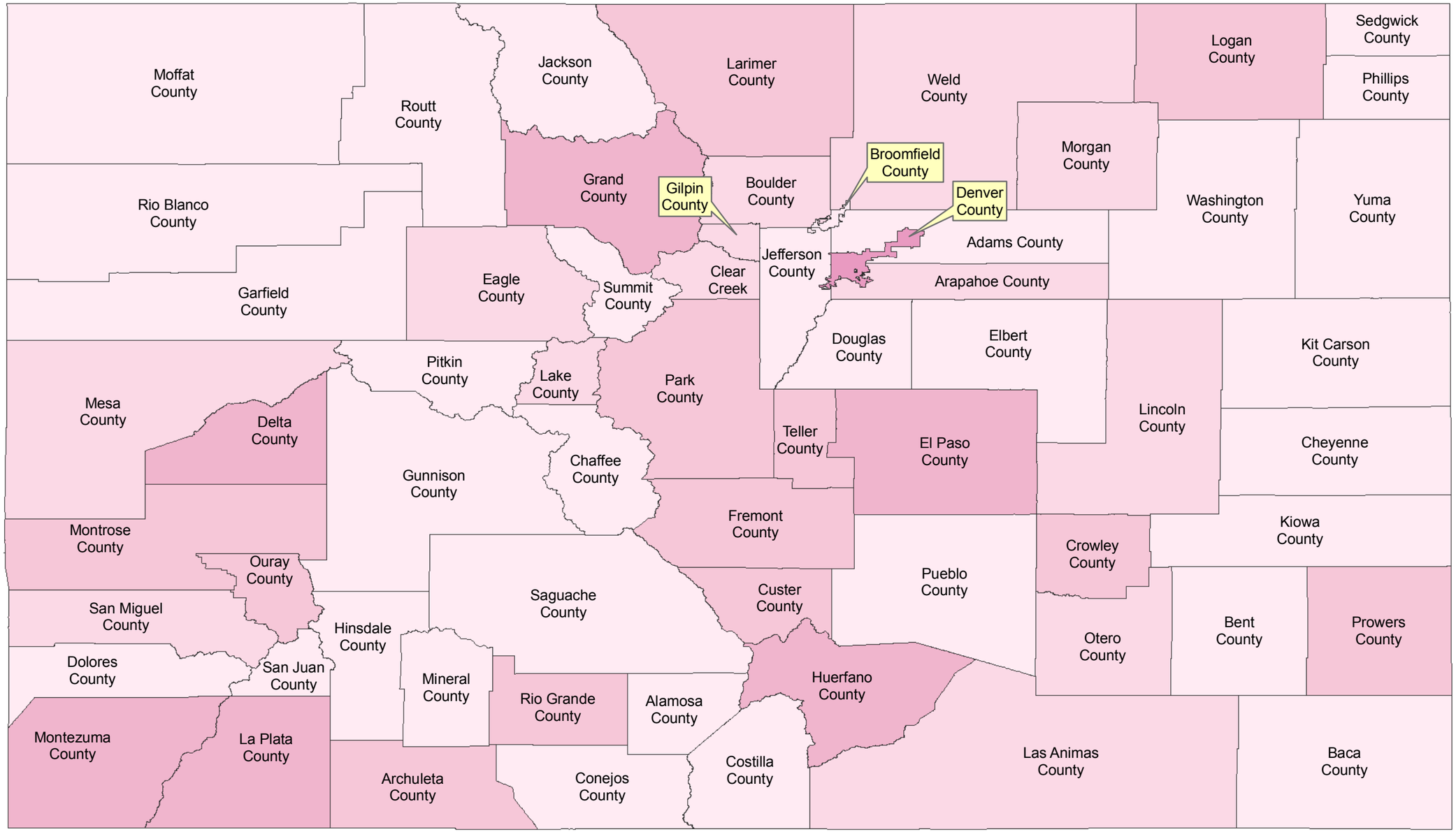
ANSCHUTZ FAMILY FOUNDATION

0 50 100 200 Miles

Data Sources: Small Area Income and Poverty Estimates (SAIPE) U.S. Census Bureau
Anschutz Family Foundation

2010 Jim Casey D.U. Capstone Project jccasey@gmail.com

Grants To Colorado Libraries 1976 - 2010



County	Total Grants
Arapahoe	$ 15,000
Archuleta	$ 125,000
Boulder	$ 7,335
Clear Creek	$ 13,400
Crowley	$ 70,000
Custer	$ 75,000
Delta	$ 492,819
Denver	$ 1,115,000
Eagle	$ 4,600
El Paso	$ 352,000
Fremont	$ 90,000
Gilpin	$ 15,000
Grand	$ 215,000
Huerfano	$ 260,000
La Plata	$ 233,000
Lake	$ 25,000
Larimer	$ 76,000
Las Animas	$ 5,900
Lincoln	$ 12,200
Logan	$ 100,000
Mesa	$ 5,000
Montezuma	$ 260,000
Montrose	$ 139,000
Morgan	$ 35,000
Otero	$ 12,100
Ouray	$ 77,000
Park	$ 72,102
Prowers	$ 150,000
Rio Grande	$ 166,100
San Miguel	$ 21,000
Teller	$ 100,000
Weld	$ 49,300
32 Counties	$ 4,388,856

GATES FAMILY FOUNDATION

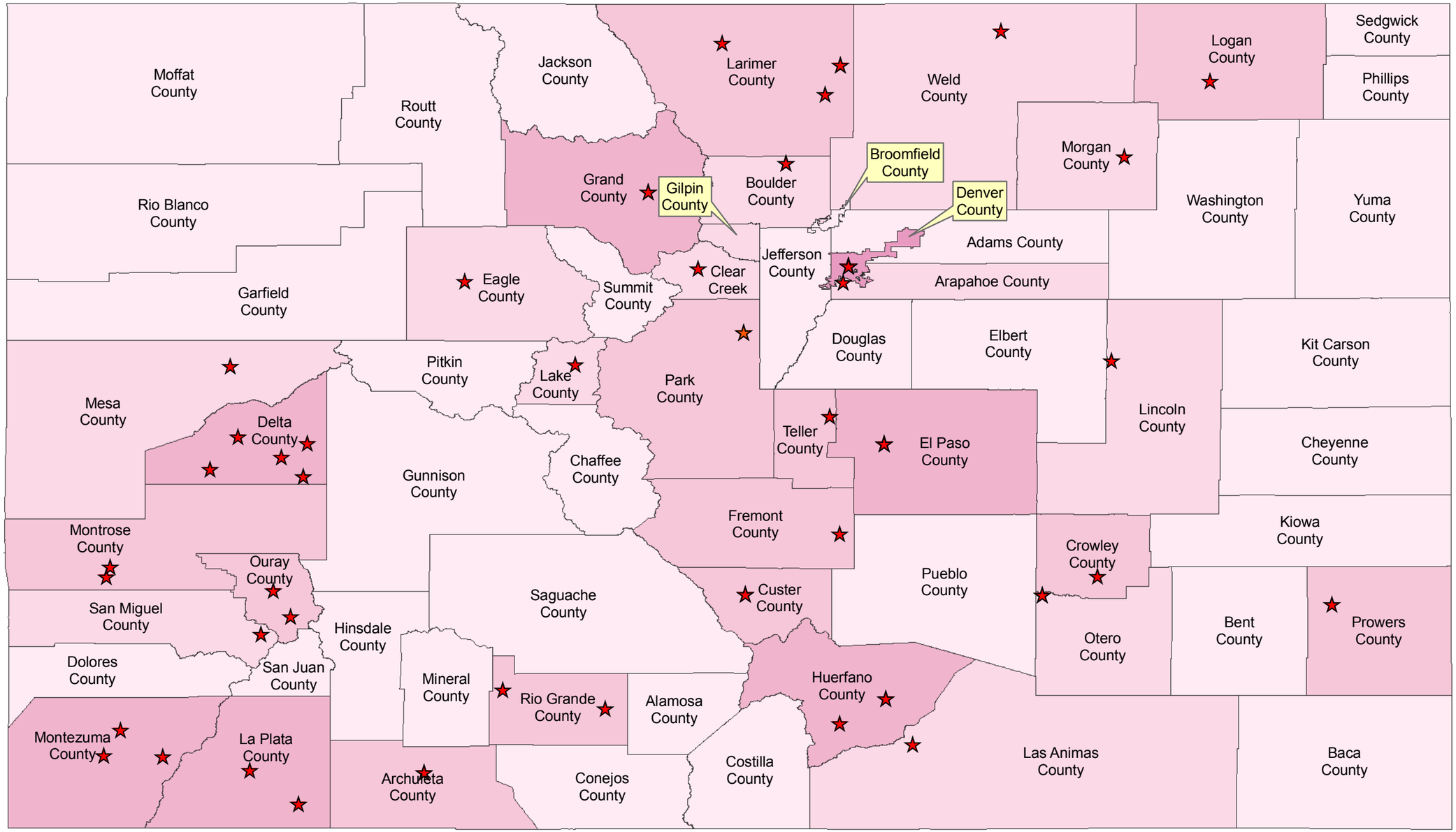
Grant Amounts by County

- $0.00
- $0.01 - $50,000.00
- $50,000.01 - $200,000.00
- $200,000.01 - $500,000.00
- $500,000.01 - $1,115,000.00

0 50 100 200
Miles

2010 - Jim Casey

Grants To Colorado Libraries 1976 - 2010



N
W E
S

County	Total Grants
Arapahoe	$ 15,000
Archuleta	$ 125,000
Boulder	$ 7,335
Clear Creek	$ 13,400
Crowley	$ 70,000
Custer	$ 75,000
Delta	$ 492,819
Denver	$ 1,115,000
Eagle	$ 4,600
El Paso	$ 352,000
Fremont	$ 90,000
Gilpin	$ 15,000
Grand	$ 215,000
Huerfano	$ 260,000
La Plata	$ 233,000
Lake	$ 25,000
Larimer	$ 76,000
Las Animas	$ 5,900
Lincoln	$ 12,200
Logan	$ 100,000
Mesa	$ 5,000
Montezuma	$ 260,000
Montrose	$ 139,000
Morgan	$ 35,000
Otero	$ 12,100
Ouray	$ 77,000
Park	$ 72,102
Prowers	$ 150,000
Rio Grande	$ 166,100
San Miguel	$ 21,000
Teller	$ 100,000
Weld	$ 49,300
32 Counties	$ 4,388,856

GATES FAMILY FOUNDATION

Grant Amounts by County

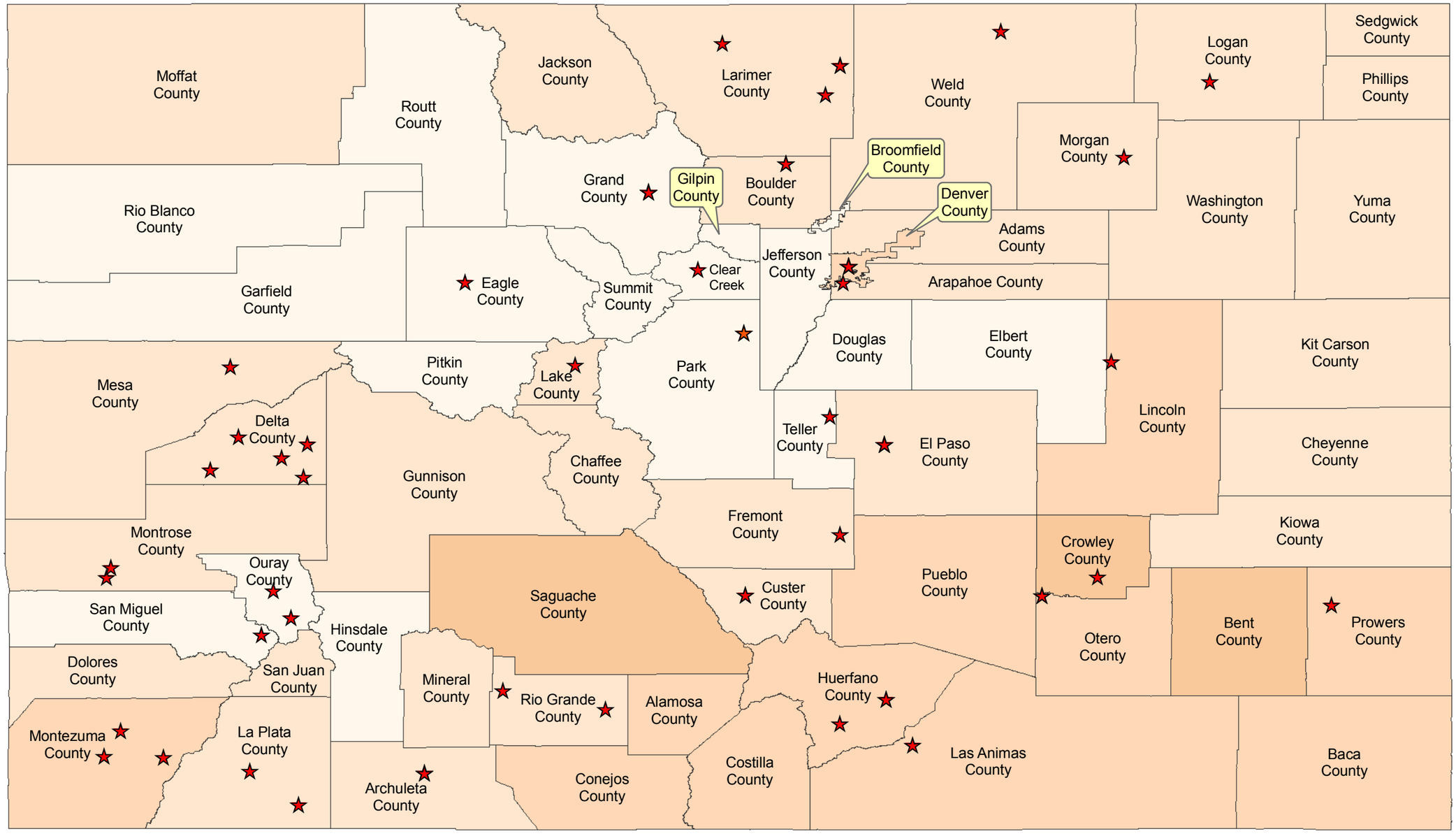
- $0.00
- $0.01 - $50,000.00
- $50,000.01 - $200,000.00
- $200,000.01 - $500,000.00
- $500,000.01 - $1,115,000.00

Grant Sites

0 50 100 200
Miles

2010 - Jim Casey

Grants To Colorado Libraries 1976 - 2010 and 2008 Poverty Levels



County	Total Grants	2008 % In Poverty
Arapahoe	$ 15,000	9.8%
Archuleta	$ 125,000	11.3%
Boulder	$ 7,335	10.3%
Clear Creek	$ 13,400	7.4%
Crowley	$ 70,000	46.2%
Custer	$ 75,000	11.8%
Delta	$ 492,819	12.1%
Denver	$ 1,115,000	18.0%
Eagle	$ 4,600	6.8%
El Paso	$ 352,000	10.6%
Fremont	$ 90,000	14.7%
Gilpin	$ 15,000	6.2%
Grand	$ 215,000	6.9%
Huerfano	$ 260,000	23.8%
La Plata	$ 233,000	10.9%
Lake	$ 25,000	12.7%
Larimer	$ 76,000	11.6%
Las Animas	$ 5,900	16.8%
Lincoln	$ 12,200	16.8%
Logan	$ 100,000	13.4%
Mesa	$ 5,000	10.6%
Montezuma	$ 260,000	16.3%
Montrose	$ 139,000	11.9%
Morgan	$ 35,000	12.7%
Otero	$ 12,100	22.2%
Ouray	$ 77,000	7.6%
Park	$ 72,102	8.2%
Prowers	$ 150,000	19.1%
Rio Grande	$ 166,100	15.4%
San Miguel	$ 21,000	8.2%
Teller	$ 100,000	7.3%
Weld	$ 49,300	12.0%
32 Counties	$ 4,388,856	Total

GATES FAMILY FOUNDATION

2008 Poverty By County

- 3.1% - 8.2%
- 8.3% - 15.6%
- 15.7% - 24.8%
- 24.9% - 46.2%

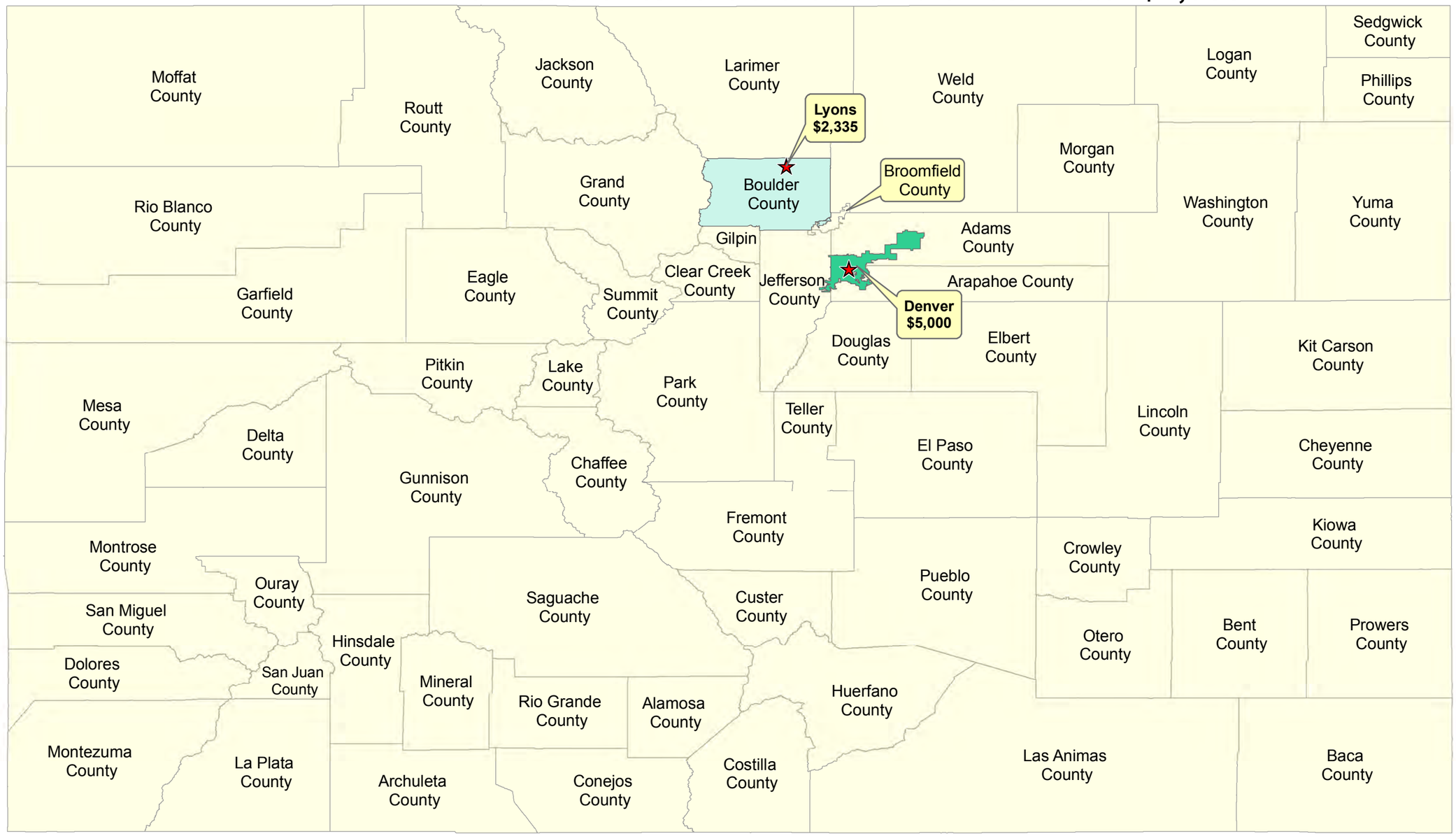
Grant Sites

Data Source: Small Area Income and Poverty Estimates
U.S. Census Bureau, 2008

0 50 100 200
Miles

2010 - Jim Casey

1970's Grants to Colorado Libraries - Total $7,335



N
W E
S

1970's Grants	
Denver	$5,000
Lyons	$2,335

GATES FAMILY FOUNDATION

1970's Grant Totals

- $2,335.00
- $2,335.01 - $5,000.00

1970's Grant Sites

0 50 100 200

Miles

1980's Grants to Colorado Libraries - Total $146,000

Fort Collins $1,000

Ouray $10,000

Westcliffe $15,000

Pagosa Springs $25,000

Moffat County
Routt County
Jackson County
Larimer County
Weld County
Logan County
Sedgwick County
Phillips County
Rio Blanco County
Grand County
Boulder County
Broomfield County
Denver County
Gilpin County
Morgan County
Washington County
Yuma County
Adams County
Garfield County
Eagle County
Summit County
Clear Creek County
Jefferson County
Arapahoe County
Douglas County
Elbert County
Kit Carson County
Pitkin County
Lake County
Park County
Mesa County
Delta County
Teller County
El Paso County
Lincoln County
Cheyenne County
Chaffee County
Gunnison County
Fremont County
Kiowa County
Montrose County
Crowley County
Ouray County
Saguache County
Pueblo County
San Miguel County
Custer County
Bent County
Prowers County
Otero County
Dolores County
San Juan County
Hinsdale County
Mineral County
Rio Grande County
Alamosa County
Huerfano County
Montezuma County
La Plata County
Archuleta County
Conejos County
Costilla County
Las Animas County
Baca County

1980's Grants	
Fort Collins	$1,000
Lyons	$5,000
Denver	$20,000
Ouray	$10,000
Denver	$70,000
Pagosa Springs	$25,000
Westcliffe	$15,000

N W E S

80's Grant Counties

- $1,000.00
- $1,000.01 - $10,000.00
- $10,000.01 - $15,000.00
- $15,000.01 - $25,000.00

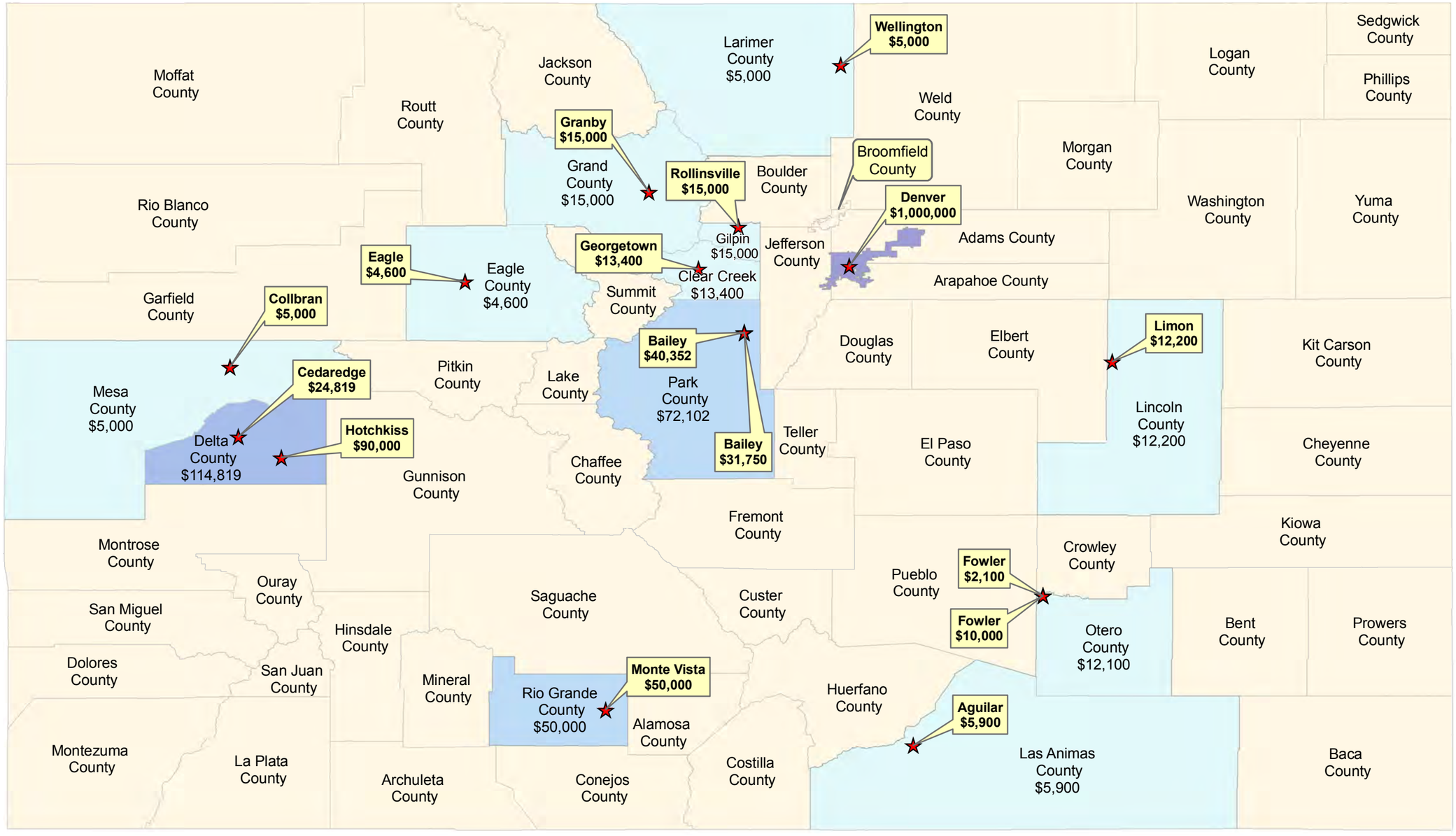
80's Grant Sites

0 50 100 200

Miles

GATES FAMILY FOUNDATION

1990's Grants to Colorado Libraries - Total $1,325,121



1990's Grants	
Aguilar	$5,900
Bailey	$40,352
Bailey	$31,750
Cedaredge	$24,819
Collbran	$5,000
Denver	$1,000,000
Eagle	$4,600
Fowler	$10,000
Fowler	$2,100
Georgetown	$13,400
Granby	$15,000
Hotchkiss	$90,000
Limon	$12,200
Monte Vista	$50,000
Rollinsville	$15,000
Wellington	$5,000

1990s Grant Totals

- $4,600.00 - $15,000.00
- $15,000.01 - $72,102.00
- $72,102.01 - $114,819.00
- $114,819.01 - $1,000,000.00

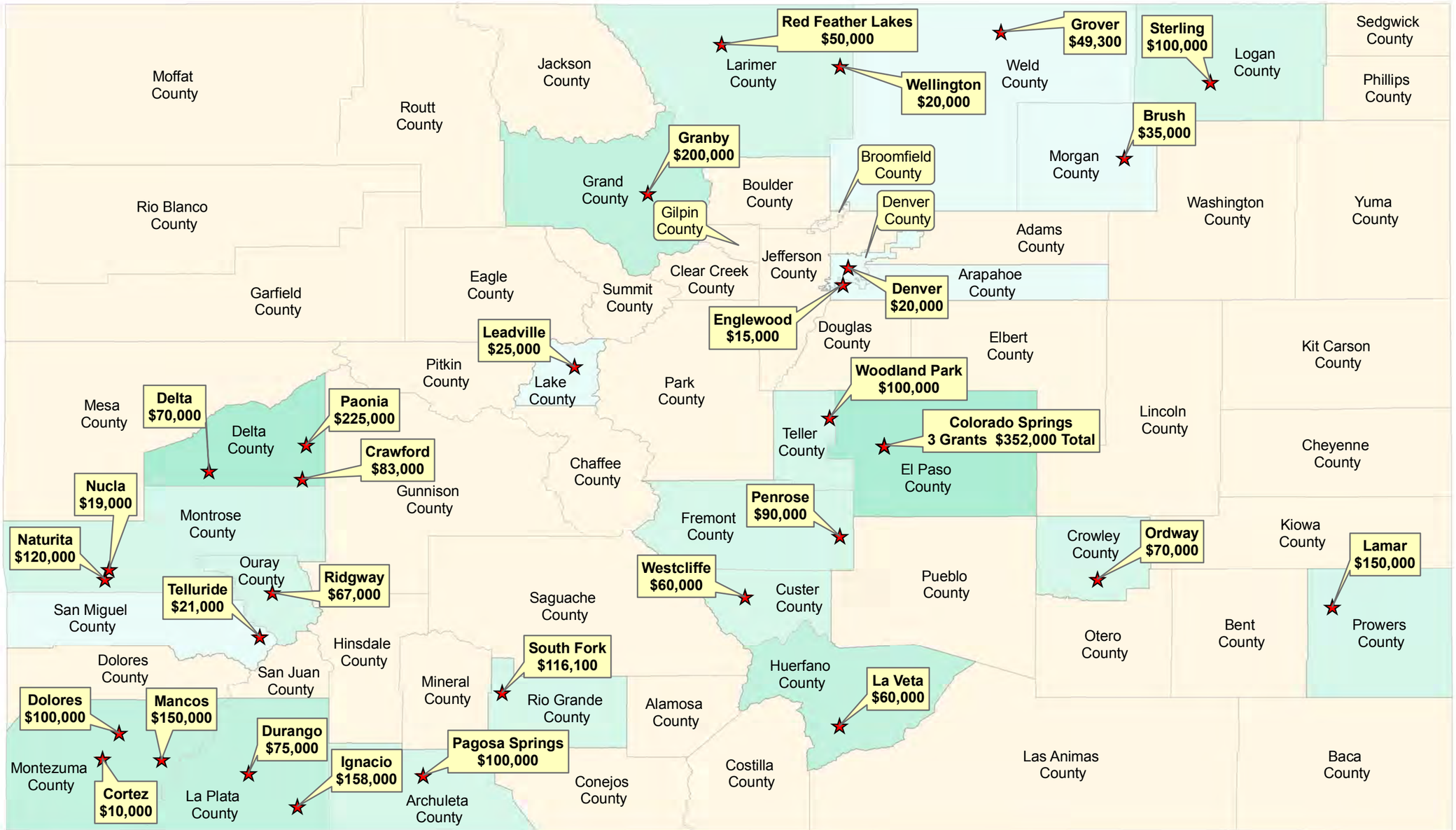
1990s Grant Sites

0 50 100 200

Miles

GATES FAMILY FOUNDATION

2000's Grants to Colorado Libraries - Total $2,910,400



2000's Grants	
Brush	$35,000
Colorado Springs	$200,000
Colorado Springs	$62,000
Colorado Springs	$90,000
Cortez	$10,000
Crawford	$83,000
Delta	$70,000
Denver	$20,000
Dolores	$100,000
Durango	$75,000
Englewood	$15,000
Granby	$200,000
Grover	$49,300
Ignacio	$158,000
La Veta	$60,000
Lamar	$150,000
Leadville	$25,000
Mancos	$150,000
Naturita	$120,000
Nucla	$19,000
Ordway	$70,000
Pagosa Springs	$100,000
Paonia	$225,000
Penrose	$90,000
Red Feather Lakes	$50,000
Ridgway	$67,000
South Fork	$116,100
Sterling	$100,000
Telluride	$21,000
Walsenburg	$50,000
Walsenburg	$150,000
Wellington	$20,000
Westcliffe	$60,000
Woodland Park	$100,000

2000's Grant Totals

- $15,000.00 - $50,000.00
- $50,000.01 - $150,000.00
- $150,000.01 - $260,000.00
- $260,000.01 - $378,000.00

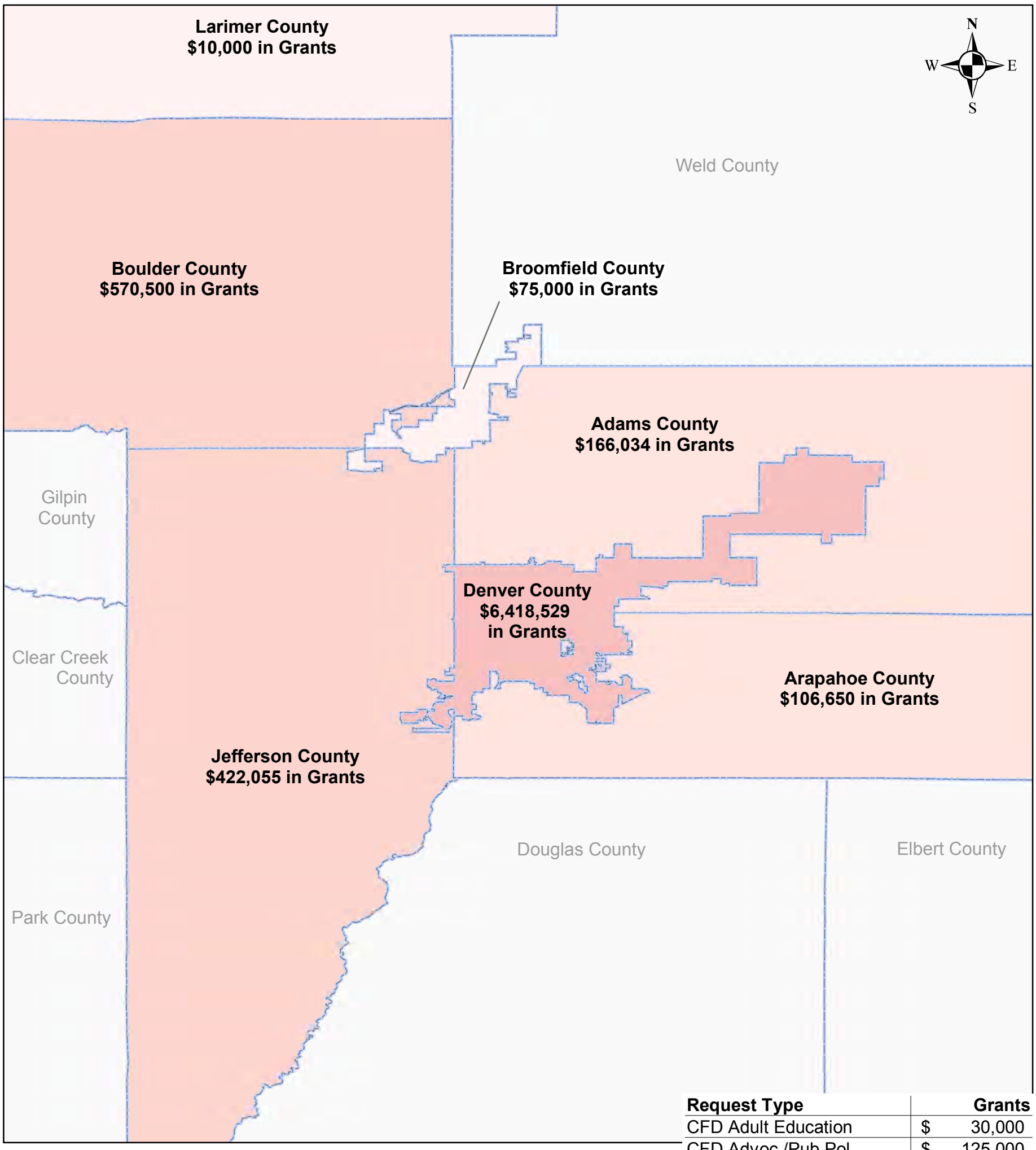
2000's Grant Sites

0 50 100 200

Miles

GATES FAMILY FOUNDATION

Rose Community Foundation
Child and Family Development Grants 2005-2009



Request Type		Grants
CFD Adult Education	$	30,000
CFD Advoc./Pub.Pol.	$	125,000
CFD Cap. Build. Org.	$	9,500
CFD Cap. Build. Prog	$	769,048
CFD Childcare	$	2,214,369
CFD Employment Place	$	564,000
CFD Employment Reten	$	187,972
CFD Employment Train	$	531,600
CFD Family Education	$	330,070
CFD Home Visition	$	246,871
CFD Housing	$	585,000
CFD Mental Health	$	236,350
CFD Micro Enterprise	$	140,000
CFD Parent Education	$	1,193,988
CFD Pub. Awareness	$	170,000
CFD Quality Improvem	$	140,000
CFD School Readiness	$	50,000
CFD Special Needs	$	160,000
CFD Staff Developmen	$	65,000
CFD Works Skills Tra	$	15,000
Childrenandyouth	$	5,000
Grand Total	**$**	**7,768,768**

By County

Child and Family Development

- 10,000 - 75,000
- 75,001 - 166,034
- 166,035 - 570,500
- 570,501 - 6,418,529

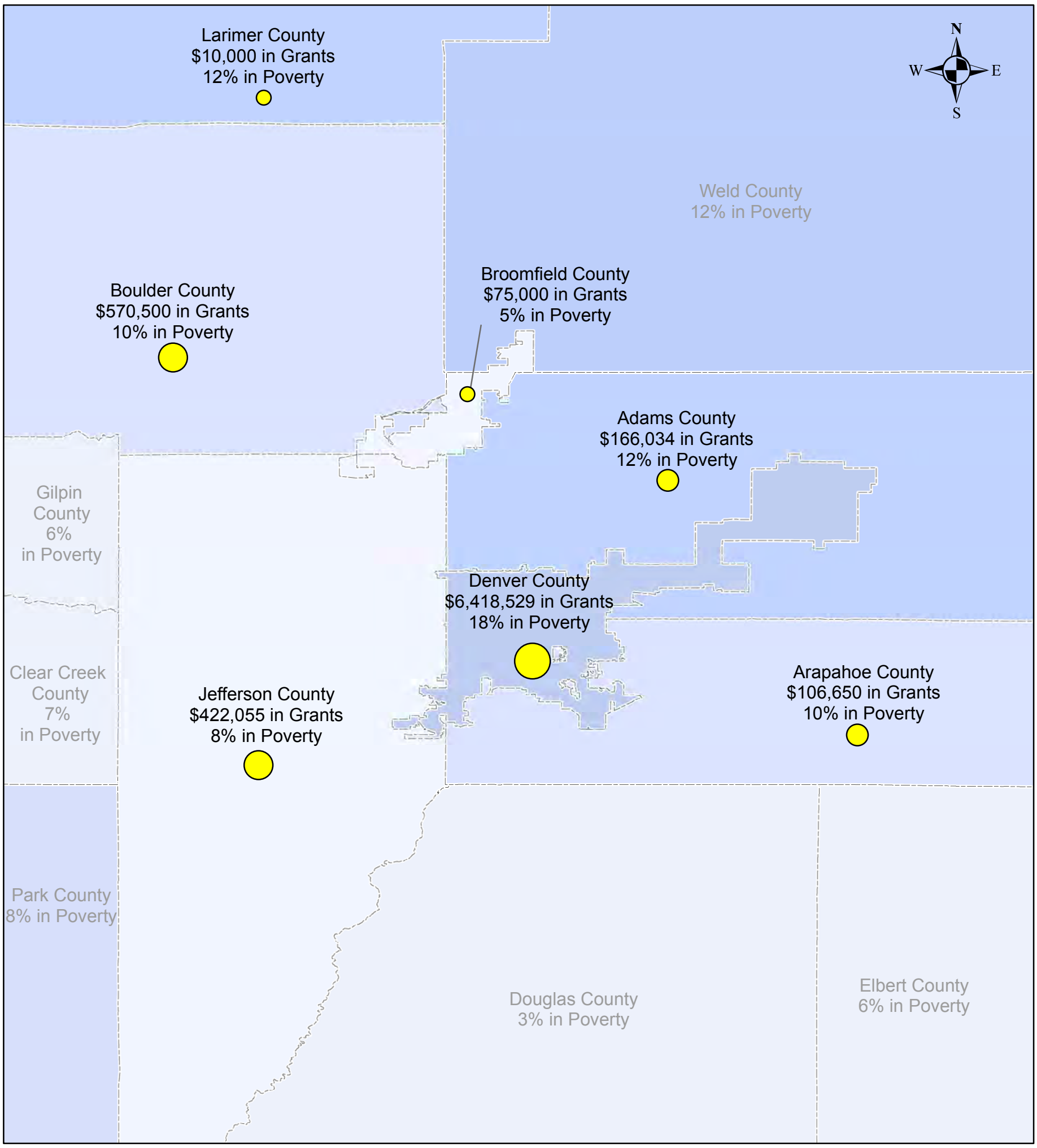
0 5 10 20

Miles

County	Number	Grants
Adams	6	$ 166,034
Arapahoe	4	$ 106,650
Boulder	21	$ 570,500
Broomfield	2	$ 75,000
Denver	126	$ 6,418,529
Jefferson	13	$ 422,055
Larimer	1	$ 10,000
	Total:	**$ 7,768,768**
Denver Metro	78	$ 3,884,895
Statewide	33	$ 2,037,974
	Total:	$ 5,922,869

Data Sources:
Rose Community Foundation
U.S. Census Bureau
2010 - Jim Casey
D.U. Capstone
jccasey@gmail.com

Rose Community Foundation
Child and Family Development Grants 2005-2009



By County

% In Poverty

- 3% - 8%
- 9% - 11%
- 12% - 16%
- 17% - 25%
- 26% - 46%

Grants

- $10,000 - $75,000
- $75,001 - $166,034
- $166,035 - $570,500
- $570,501 - $6,418,529

County	Number	Grants
Adams	6	$ 166,034
Arapahoe	4	$ 106,650
Boulder	21	$ 570,500
Broomfield	2	$ 75,000
Denver	126	$ 6,418,529
Jefferson	13	$ 422,055
Larimer	1	$ 10,000
	Total:	**$ 7,768,768**
Denver Metro	78	$ 3,884,895
Statewide	33	$ 2,037,974
	Total:	$ 5,922,869

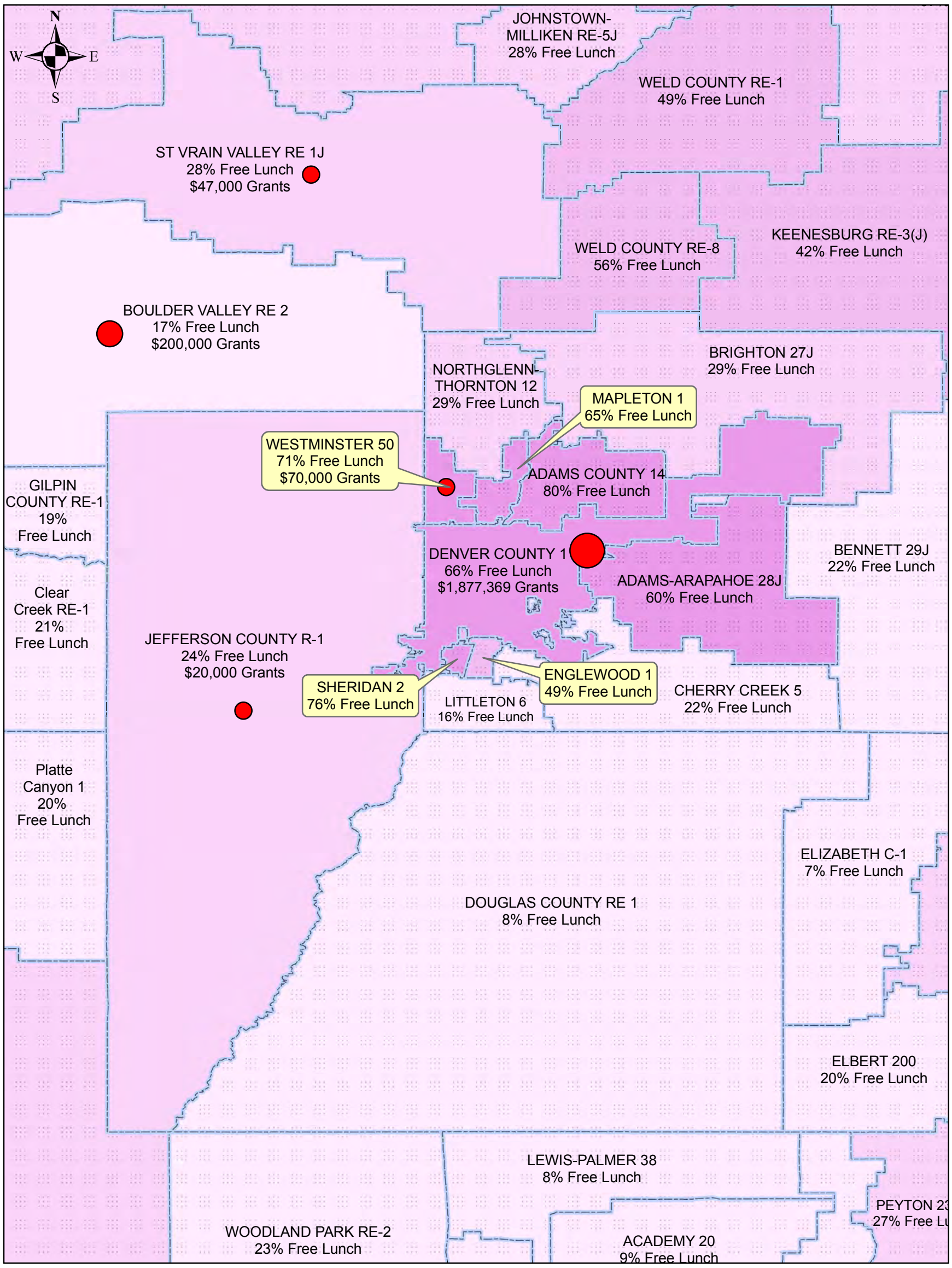
0 10 20 40

Miles

Data Sources:
Rose Community Foundation, U.S. Census Bureau
2010 - Jim Casey D.U. Capstone jccasey@gmail.com

ROSE COMMUNITY FOUNDATION

Child and Family Development
Child Care Grants 2005-2009



By School District

Childcare Grants

- $20,000 - $70,000
- $70,001 - $200,000
- $200,001 - $1,877,369
- No Childcare Grants

% Free or Reduced Lunch

- 6% - 24%
- 25% - 40%
- 41% - 58%
- 59% - 88%

Location	Number	Total Grants
BOULDER VALLEY RE 2	1	$ 200,000
DENVER COUNTY 1	1	$ 1,877,369
JEFFERSON COUNTY R-1	1	$ 20,000
ST VRAIN VALLEY RE 1J	1	$ 47,000
WESTMINSTER 50	1	$ 70,000
	Total:	**$ 2,214,369**

0 10 20 40

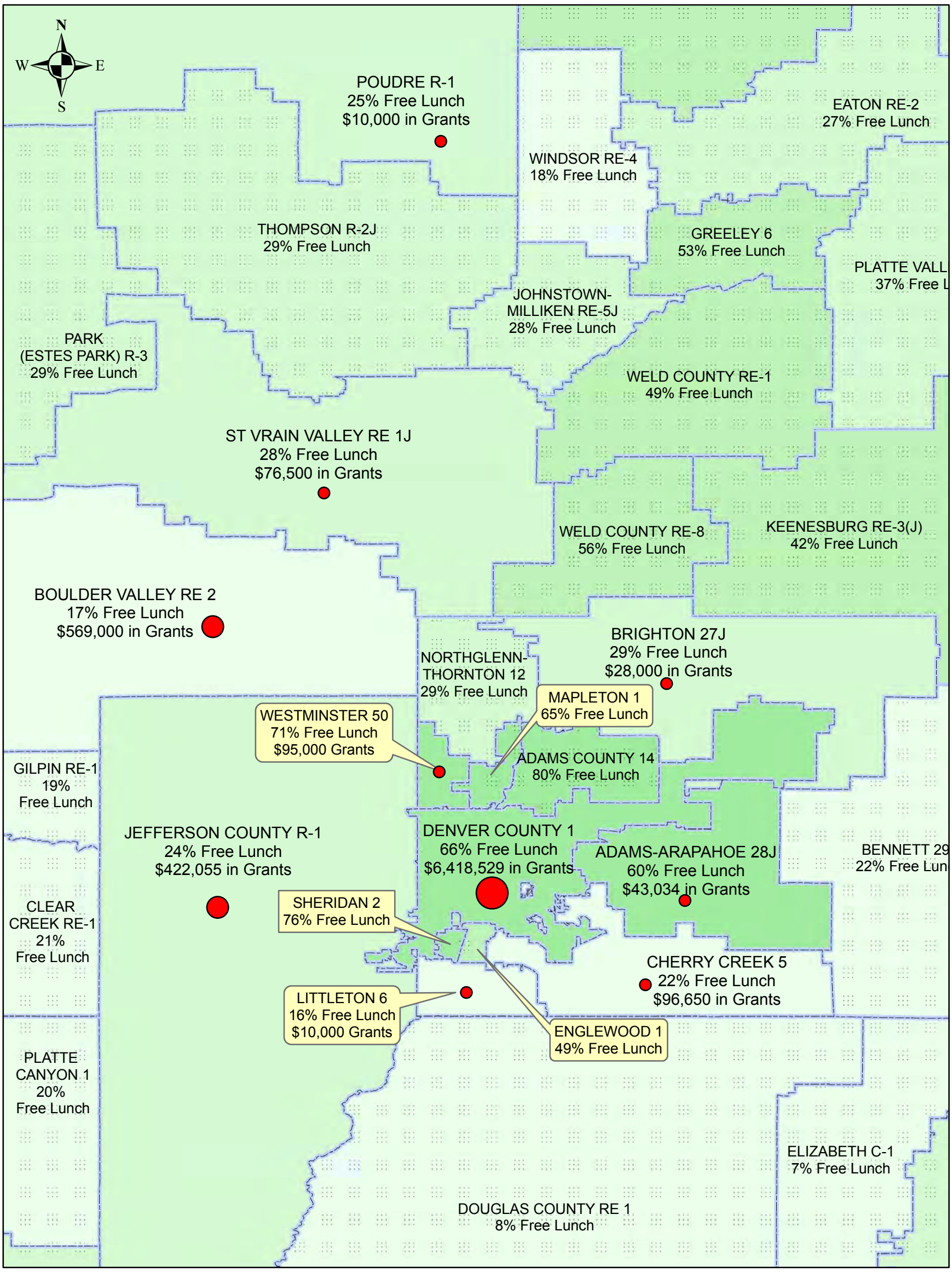
Miles

Data Sources: The Annie E. Casey Foundation; Rose Community Foundation; U.S. Census Bureau

2010 - Jim Casey, D.U. Capstone jccasey@gmail.com

ROSE COMMUNITY FOUNDATION

Child and Family Development Combined Grants 2005-2009



By School District

Child and Family Development % Free or Reduced Lunch

- 10,000 - 96,650
- 96,651 - 569,000
- 569,001 - 6,418,529
- No Grants
- 6% - 24%
- 25% - 40%
- 41% - 58%
- 59% - 88%

0 10 20 40

Miles

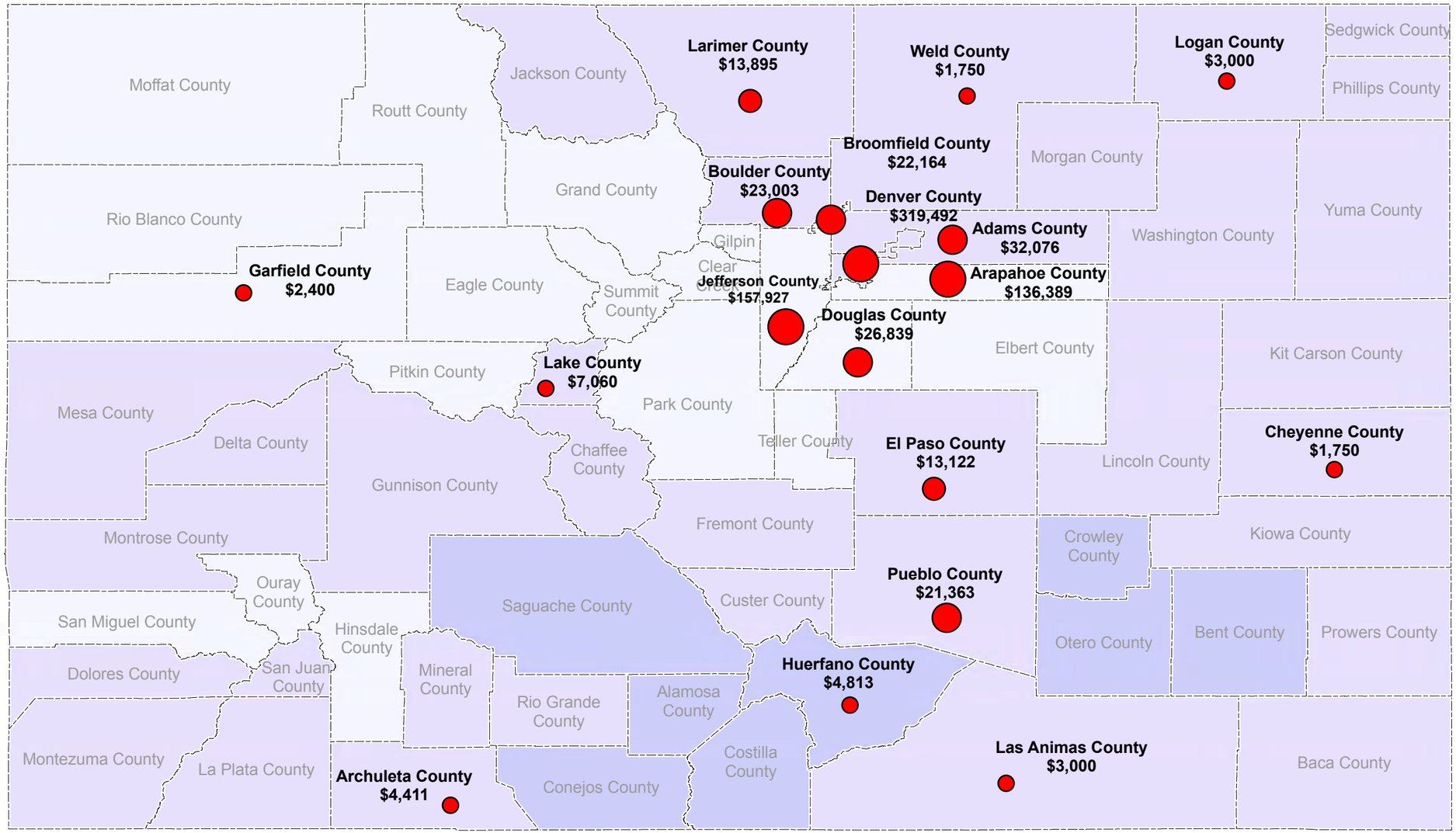
School District	Number	Total
ADAMS-ARAPAHOE 28J	1	$ 43,034
BOULDER VALLEY RE 2	19	$ 569,000
BRIGHTON 27J	1	$ 28,000
CHERRY CREEK 5	3	$ 96,650
DENVER COUNTY 1	126	$ 6,418,529
JEFFERSON COUNTY R-1	13	$ 422,055
LITTLETON 6	1	$ 10,000
POUDRE R-1	1	$ 10,000
ST VRAIN VALLEY RE 1J	4	$ 76,500
WESTMINSTER 50	4	$ 95,000
	Total:	**$ 7,768,768**

Data Sources: The Annie E. Casey Foundation; Rose Community Foundation; U.S. Census Bureau

2010 - Jim Casey, D.U. Capstone jccasey@gmail.com

THE DENVER FOUNDATION

2009 Scholarship Recipients - By Home County



County	Number	Scholarships
Adams	10	$ 32,076
Arapahoe	51	$ 136,389
Archuleta	1	$ 4,411
Boulder	10	$ 23,003
Broomfield	10	$ 22,164
Cheyenne	1	$ 1,750
Denver	115	$ 319,492
Douglas	6	$ 26,839
El Paso	3	$ 13,122
Garfield	1	$ 2,400
Huerfano	2	$ 4,813
Jefferson	55	$ 157,927
Lake	2	$ 7,060
Larimer	4	$ 13,895
Las Animas	1	$ 3,000
Logan	1	$ 3,000
Pueblo	6	$ 21,363
Weld	1	$ 1,750
	Total	**$ 794,453**

Scholarships

- $1,750 -$7,060
- $13,122 - $13,895
- $21,363 - $32,076
- $136,389 - $319,492

Poverty Level

- 3% - 10%
- 11% - 19%
- 20% - 46%

0 50 100 200

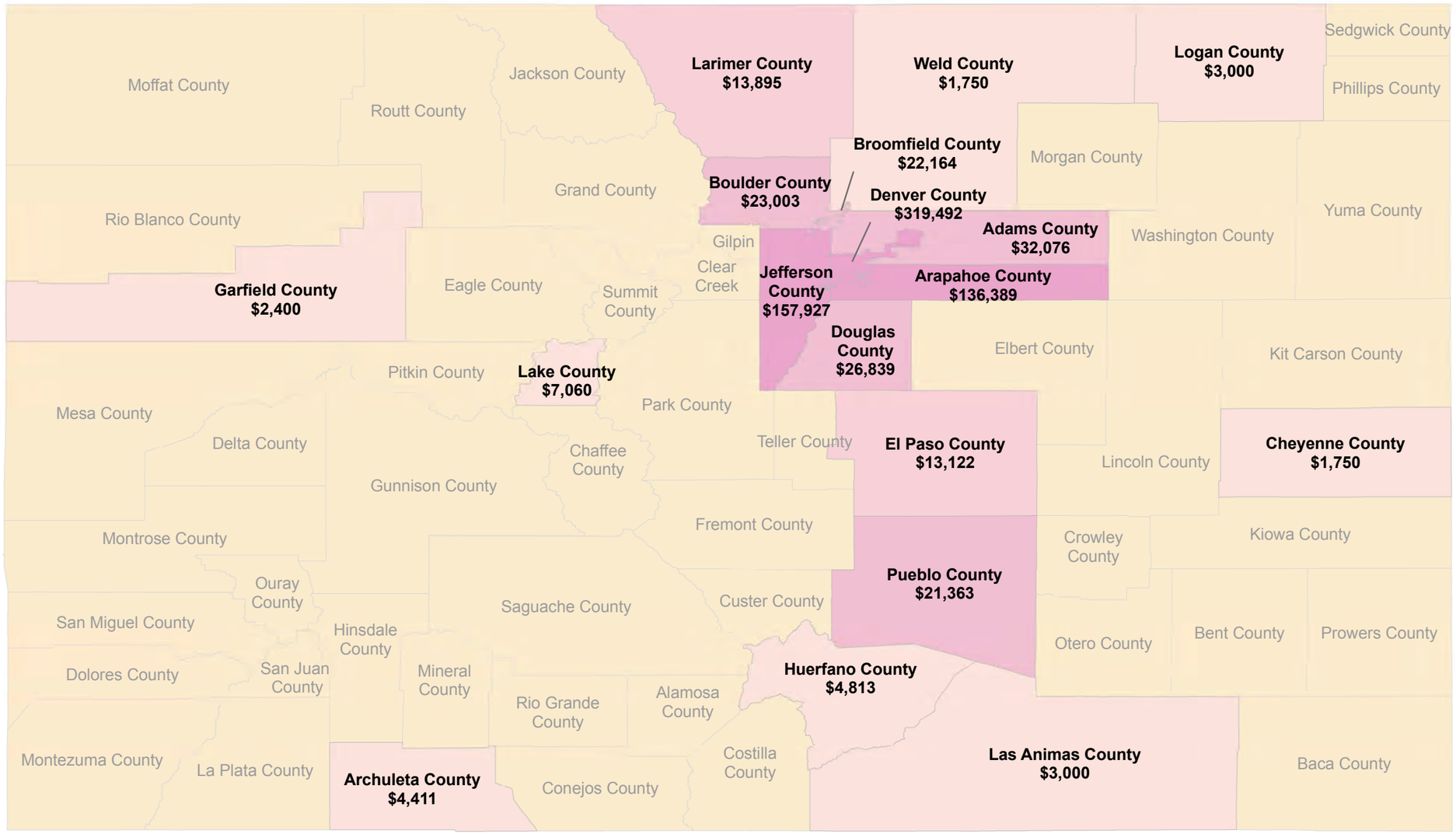
Miles

Data Sources: The Denver Foundation; U.S. Census Bureau
2010 - Jim Casey, D.U. Capstone jccasey@gmail.com

281 scholarships totalling $794,453 were awarded to students from across Colorado in 2009.

THE DENVER FOUNDATION

2009 Scholarship Recipients - By Home County



County	Number	Scholarships
Adams	10	$ 32,076
Arapahoe	51	$ 136,389
Archuleta	1	$ 4,411
Boulder	10	$ 23,003
Broomfield	10	$ 22,164
Cheyenne	1	$ 1,750
Denver	115	$ 319,492
Douglas	6	$ 26,839
El Paso	3	$ 13,122
Garfield	1	$ 2,400
Huerfano	2	$ 4,813
Jefferson	55	$ 157,927
Lake	2	$ 7,060
Larimer	4	$ 13,895
Las Animas	1	$ 3,000
Logan	1	$ 3,000
Pueblo	6	$ 21,363
Weld	1	$ 1,750
	Total	**$ 794,453**

Scholarships by County

$1,750 -$ 7,060

$13,122 - $13,895

$21,363 - $32,076

$136,389 - $319,492

0 50 100 200

Miles

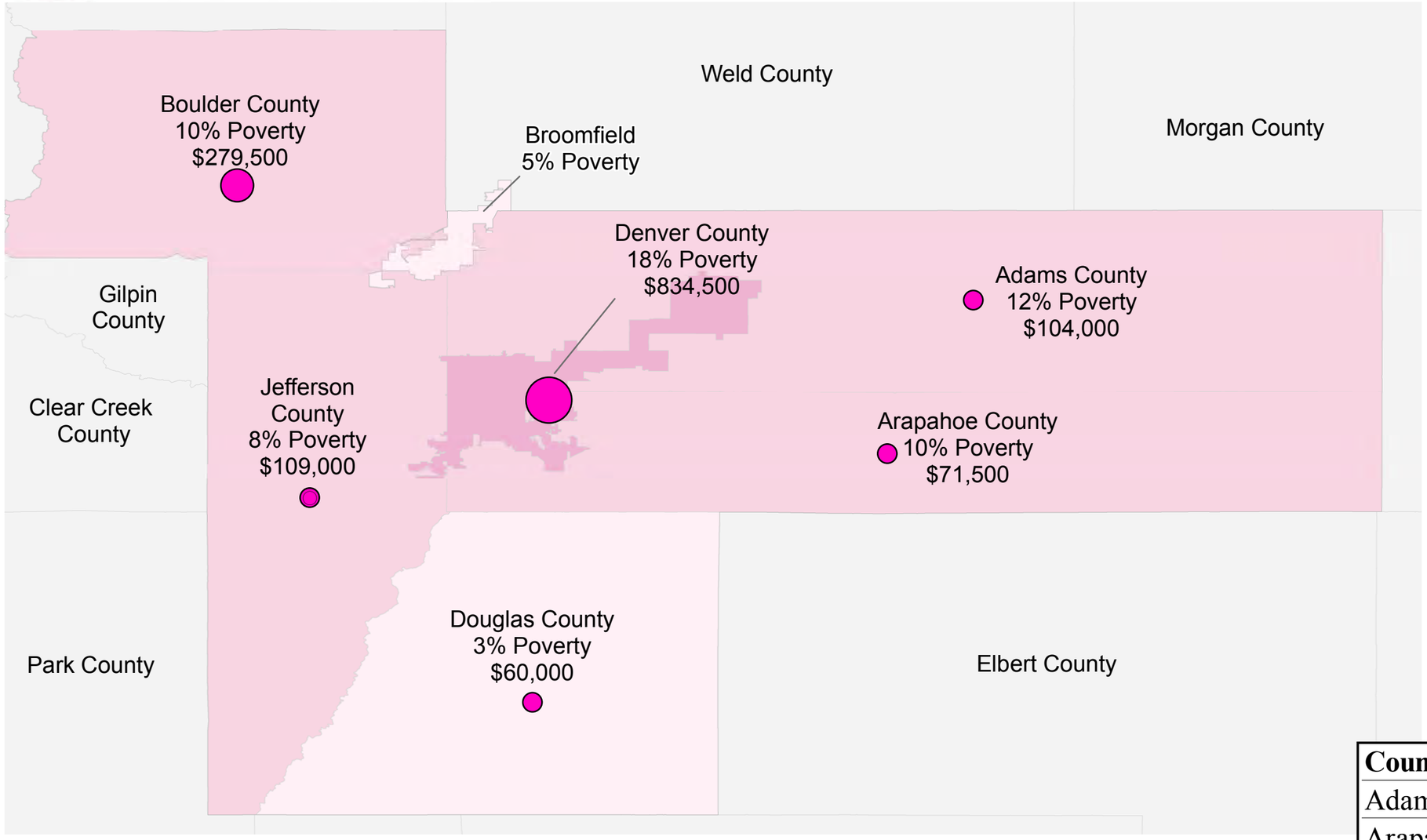
Data Sources: The Denver Foundation; U.S. Census Bureau

2010 - Jim Casey, D.U. Capstone jccasey@gmail.com

Scholarships totalling $794,453 were awarded to students from across Colorado in 2009.

THE DENVER FOUNDATION

2009 Human Services Advisory Committee Grants



In this map, grants from the Human Services Advisory Committee are contrasted with poverty levels in the 7 county area.

By County

Grants

- 60,000 - 109,000
- 279,500
- 834,500

Poverty Level

- 3%
- 4% - 12%
- 13% - 18%

0 10 20 40

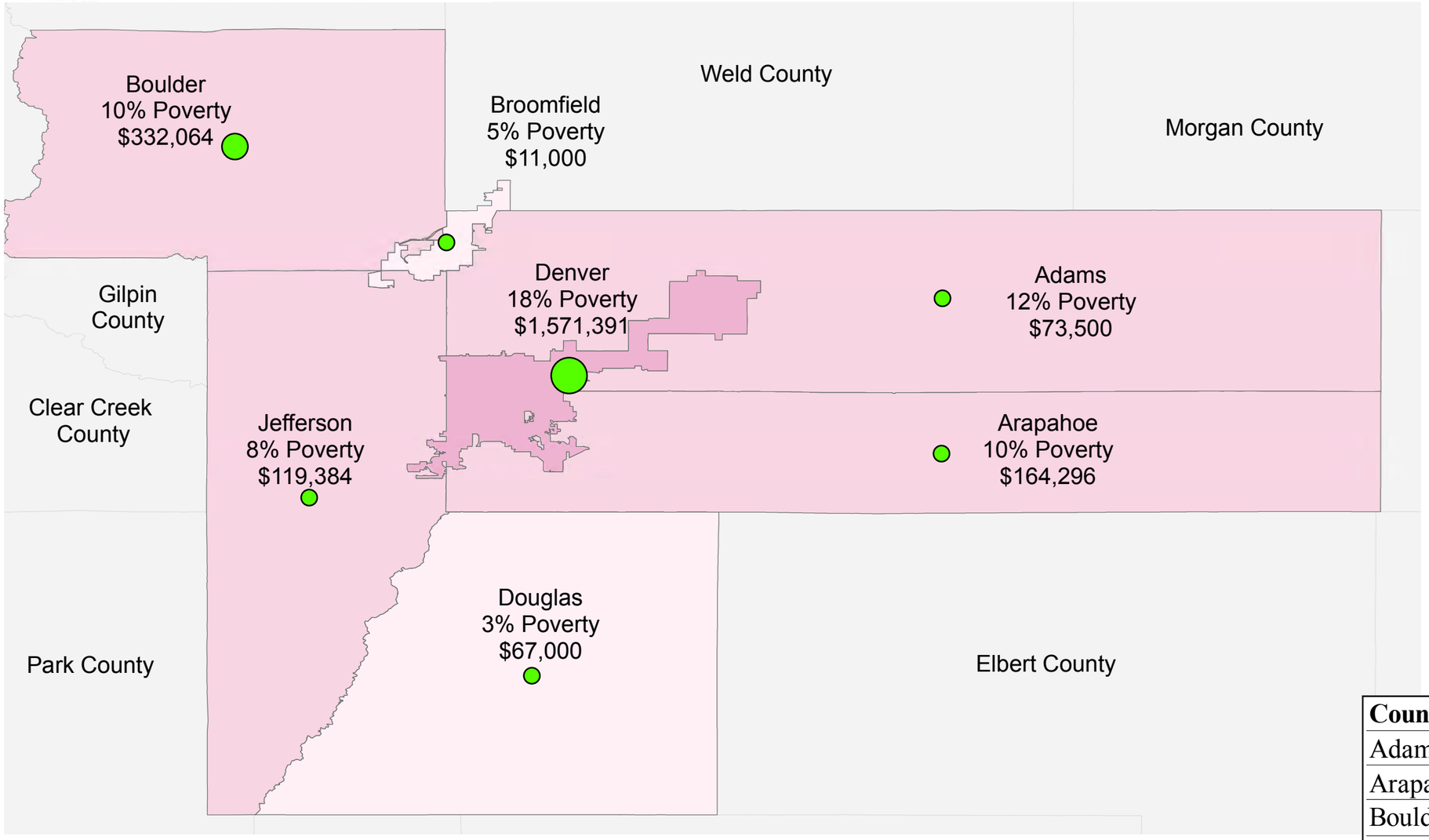
Miles

Data Sources: The Denver Foundation; U.S. Census Bureau
2010 - Jim Casey, D.U. Capstone jccasey@gmail.com

County	Number		Grants
Adams	7	$	104,000
Arapahoe	6	$	71,500
Boulder	16	$	279,500
Denver	48	$	834,500
Douglas	3	$	60,000
Jefferson	6	$	109,000
Total	**86**	**$**	**1,458,500**

THE DENVER FOUNDATION

2009 Human Services NTEE Coded Grants



In this map are all grants coded with the NTEE Human Services category, contrasted with poverty levels in the 7 county area.

County	Number	Grants
Adams	13	$ 73,500
Arapahoe	19	$ 164,296
Boulder	75	$ 332,064
Broomfield	2	$ 11,000
Denver	217	$ 1,571,391
Douglas	9	$ 67,000
Jefferson	19	$ 119,384
Total	**354**	**$ 2,338,635**

By County

Human Services NTEE

- 11000.0000 - 164296.1400
- 164296.1401 - 332064.0000
- 332064.0001 - 1571390.5900

Poverty Level

- 3%
- 4% - 12%
- 13% - 18%

0 15 30 60

Miles

Data Sources: The Denver Foundation; U.S. Census Bureau

2010 - Jim Casey, D.U. Capstone jccasey@gmail.com