





Getting Started

Even before you have collected all your data, you can begin interpreting the emerging trends. This will enable you to make adjustments in your data collection tools or approaches, as needed, to improve the quality of the responses you are getting or to fill information gaps. For example, if survey respondents are frequently skipping a particular question, consider whether rewording the question would result in more responses. In analyzing the data, ask your team to look deeper than simply tabulating results. What do the findings mean about trends and changes in your community? What patterns are occurring? What possible actions should be taken by your program based on what you have learned?



Learning **Objectives**

Step 4, Analyze and Make Decisions, is the main payoff of the community assessment. It is the reason you have been doing all this work. In this section you will learn:

- The purpose and procedures of data analysis
- Common data analysis strategies and procedures
- How to use community assessment findings to inform decision-making

66

Data analysis is the process of combining, comparing, and finding patterns in quantitative and qualitative data in order to highlight useful information, answer specific questions, and inform decision-making.

Tell Me More!



See <u>Appendix C-1</u> for community assessment requirements in the HSPPS or <u>Appendix C-2</u> for community assessment requirements in the Head Start Act.

Review Data Analysis Purpose and Procedures

Data analysis is conducted through a series of different procedures designed to reveal what the data has to "say." This process of obtaining results from the data you have collected is already a part of what program staff do in the course of their ongoing work. Think about data collection and data analysis as evolving. They are not finite processes, even though they do have to be conducted with timelines and deadlines in mind.

Here are some examples of data analysis techniques that are probably familiar:

- Calculating the percentage of enrolled children whose home language is Spanish
- Tallying the average scores provided by staff asked to rate the effectiveness of an inservice training on a scale of 1–5
- Summarizing the most important comments from parents asked to indicate their preference for half-day versus full-day program options.

Purpose of Data Analysis

Data analysis is the process of combining, comparing, and finding patterns in data to highlight useful information, answer specific questions, and inform decision-making. Quantitative data includes numerical counts, percentages, community demographics, and qualitative data refers to opinions, feelings, themes, ideas. Throughout Step 4, it is crucial to keep in mind the overarching purpose of the community assessment and the reason why your program is analyzing detailed information about the service area:

To design a program that meets community needs, and builds on strengths and resources (45 CFR §1302.11 (b))

As you begin to develop your data analysis plan, you will need to make decisions about what kinds of analytic procedures to use and how to present the findings. Although the process may seem overwhelming at times, data analysis is a logical sequence of steps. As you tackle each step sequentially and in a deliberate and thoughtful way, a clearer picture of your community will begin to emerge. If you are unclear about whether it is important to analyze a particular data set, review the HSPPS requirements and ask if the data analysis is addressing the topics set forth in Step 2.

Considerations in Conducting Data Analysis

Planning is an integral part of the data analysis process. It is helpful to identify in advance the resources you will need to implement data analysis. For example, will data from parents or others need to be translated? Will additional clerical, administrative, or technological support be needed? Will you need to plan for staff to work additional hours?

It will help enormously if some team members can devote time to data analysis as it begins to come in, rather than after all the data has been collected. When problems with data quality or gaps in data sets are identified early on, adjustments in collection can be made immediately. In addition, ongoing analysis may enable you to follow up on preliminary results by asking more in-depth questions or contacting additional people with experience or expertise in the emerging issues.

Key Considerations in Preparing to Analyze Data

- Ensure all data analysis team members and others on the community assessment team understand the importance of the data analysis and its impact on the provision of Head Start services to eligible children and families.
 - If your program has hired consultants to help with the community assessment, ask them to provide preliminary analysis of collected data at specified intervals.
 - Keep key staff informed of your progress and ask them to support the data analysis process by reviewing preliminary findings. This can allow for early course correction or the inclusion of additional in-depth questions to explore an emerging or new issue.
- Solicit ideas from the governing body/Tribal Council and Policy Council about the data analysis process. Do they have particular questions they would like the data analysis to address? Do they have suggestions about the best ways to format the data, such as in graphs, tables, or maps? As the data analysis gets under way, continue to solicit their suggestions.
- Include a strategy to update the governing body/Tribal Council, Policy Council, and other key players about the progress and findings emerging from the data analysis. Ensure the results are useful and presented in a format that can be understood by a layperson. In particular, ask if the visual presentations, such as tables and graphs, are effective and comprehensible.
- Identify tools that support data analysis.

66

It will help enormously if team members can devote time to data analysis as data begins to come in, rather than only after all the data has been collected.

◀ Tell Me More!

The Dual Language Learners
Program Assessment
(DLLPA) helps programs
assess their systems and
services to ensure the full
and effective participation of
children who are DLLs and
their families. The DLLPA
also supports fully integrated
culturally and linguistically
responsive practices.

Moving to action too soon will prevent you from examining an issue from multiple angles, thoughtfully reflecting on emerging findings, and obtaining feedback from others.

Tell Me More!

For an overview of some of the most commonly used data analysis procedures, see Appendix B–2: <u>Data</u> <u>Analysis Techniques</u>.

Select Data Analysis Strategies and Procedures

How do you decide which data analysis procedures to use? The wording of the questions you asked and the actual data collected will influence your choice of analytical procedures to use and the results that will follow. Because most community assessments gather both quantitative and qualitative data, programs need to use a variety of analytical procedures that match the data collected. One community assessment consultant stated,

Only using statistics to get a sense of what's going on in a service area is like looking through a dirty window. You have to go outside to really get the clearest view of what's happening in the neighborhood. You have to walk around and talk to people.

Many techniques and procedures for data analysis exist. Decisions about which to use at what times depends on the data collected and the type of insights you wish to gain from its analysis. Appendix B has several resources regarding data analysis, including information about:

- Data analysis techniques
- Displaying the data
- Attributes of good data display
- Annotated data bibliography
- Glossary of data analysis terms and concepts

Interpret the Data

It is important to have a process that allows for ongoing and indepth analysis of questions. The interpretation of the data relies on a full understanding of the processes, procedures, and actions involved as well as the analysis of the data. Decision-making is enhanced by having quality data, conducting a thorough analysis, and allowing adequate time for interpretation. Moving to action too soon will prevent you from examining an issue from multiple angles, thoughtfully reflecting on emerging findings, and obtaining feedback from others.

Make Decisions

The HSPPS state that the information gathered in the community assessment must guide a number of decisions in order to design a program that meets community needs and builds upon its strengths and resources (45 CFR §1302.11(b)). Specifically, data analysis must inform decisions regarding:

- Identifying children from diverse economic backgrounds that would be supported by other funding, including private pay in addition to the program's eligible funded enrollment (45 CFR §1302.11(b)(3))
- Establishing ongoing collaborative relationships and partnerships with community organizations to facilitate access to community services that are responsive to children's and families' needs, family partnership goals, and community needs and resources (45 CFR §1302.53(a)(1))
- Establishing goals and measurable objectives, including strategic long-term goals (45 CFR §1302.102(a)(1))
- Choosing a program option and developing a program calendar (45 CFR §1302.20(a)(1-2))
- Establishing, modifying, and revising selection criteria (45 CFR §1302.14(a)(1))
- Designing and implementing program-wide coordinated approaches that ensure the full and effective participation of children who are dual language learners, children with disabilities, and their families (45 CFR §1302.101(b)(2-3))
- Identifying community nutrition issues that may impact child health status (45 CFR §1302.42(b)(4))
- Determining whether to reserve enrollment slots for children experiencing homelessness or children in foster care (45 CFR §1302.15(c))
- Petitioning for a waiver to allow eligibility to be determined using a different method or alternative criteria based upon community assessment and other data sources (45 CFR §1302.12(a)(3))

Your community assessment data, when examined with internal data from ongoing monitoring and self-assessment, can guide other decisions such as facility and transportation needs.

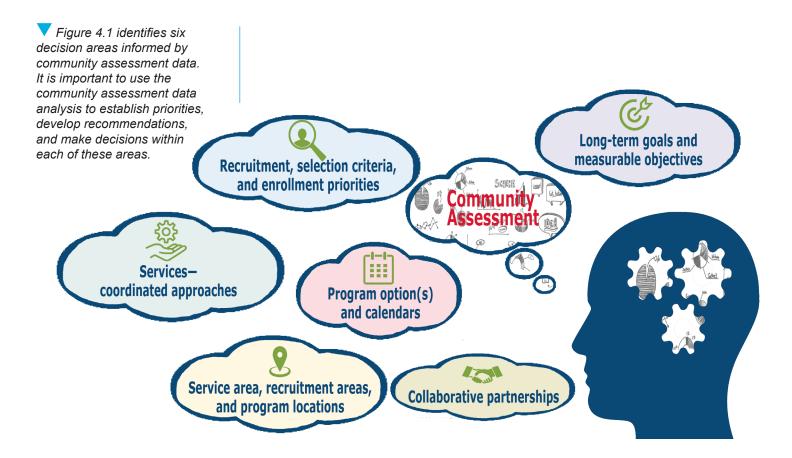
◀ Tell Me More!

See Appendix D–6 for a Glossary of Data Analysis Terms and Concepts.

◀ Tell Me More!

Topic 4 in Foundations for Excellence: A Guide for Five-Year Planning and Continuous Improvement, 2nd Edition offers four case studies that model how data from community assessments can drive program goals, objectives, and action plans.

47



Tell Me More!



For a tool to help program staff coordinate their efforts as they gather information, see Appendix A-1: Community Assessment Matrix.

Long-Term Goals and Measurable Objectives

HSPPS 45 CFR §1302.102(a)(1-4) requires Head Start programs, in collaboration with the governing body/Tribal Council and Policy Council, to establish goals and measurable objectives that include:

- Strategic long-term goals for ensuring programs are responsive to community needs identified in the community assessment
- Goals for the provision of educational, health, nutritional, and family and community engagement program services to further promote the school readiness of enrolled children
- School readiness goals aligned with the <u>Head Start Early</u> Learning Outcomes Framework: Ages Birth to Five (ELOF); state and tribal early learning standards, as appropriate; and the requirements and expectations of schools Head Start children will attend
- Effective health and safety practices to ensure children are safe at all times

Community assessment findings related to immediate child, family, and community needs will be used by the Head Start agency to develop program goals and objectives. Keep in mind that program goals are broad statements that move the program forward in its mission and demonstrate the agency's commitment to continuous quality improvement and the establishment of strong management, fiscal, and service delivery systems. Program goals are paired with objectives, which also identify resources needed to carry out the objectives. When its objectives are Specific, Measurable, Attainable, Realistic, and Timely (SMART), the program can effectively assess its progress toward achieving planned changes within the specified timeline.

Program Options and Calendar

Head Start programs must choose to operate one or more of the following program options: center-based, home-based, family child care, or an approved locally-designed variation. In order to operate a locally-designed program option, a program must request and be approved for a waiver (45 CFR §1302.24)). The program options chosen must be based on the needs of children and families, as supported by data identified in your community assessment (45 CFR §1302.20(a)(1)).

As you review program options, you need to consider the following data:

- · What families say they want or need
- Availability of child development, child care centers, and family child care programs in your service area and the number of Head Start children who use them (or who are on their waiting lists)
- Typical work, school, and training schedules of parents with eligible children
- Estimates of population growth for Head Start-eligible families

As required in 45 CFR §1302.20(a)(2), Head Start programs must consider the results of the annual community assessment in choosing a program option and developing a program calendar. Specifically, programs must determine whether child and family needs would be better served by:

- Converting existing slots to full school day or full-working day slots
- 2. Extending the program year
- 3. Converting existing Head Start slots to Early Head Start slots

In addition, programs must seek other ways to promote continuity of care and services and identify alternative revenue sources to support full-working-day services. If no additional funding is available, program resources may be used.

How did previous community assessment impact your program's options and calendar? What additional changes do you anticipate with your next community assessment and what data will help you affirm or refute this expectation?

How a Community Assessment Informed Program Planning

Learn how a health services need identified through a community assessment informed program planning and promoted regular attendance.

All

Characteristic[†]

ages

Total

Children

Age<18

Adults

Age 18+

0-4



Collect Data

The Healthy Beginnings Head Start/Early Head Start Program operates four centers for infants, toddlers, and preschool children whose families live in two urban communities. In preparation for their five-year application, they implemented a comprehensive community assessment. During the community assessment, a subcommittee lead by the health manager:





Aggregate and Analyze



Use and Share Data

Through this assessment, the health manager learned local health care providers were seeing an increase in the number of children with asthma. This was consistent with the health data she had collected on children with special health care needs enrolled in the program during the last four years. The number of children who received medical treatment for asthma was also trending up.

In addition, a multi-year comparison of the grantee's PIR revealed that the percentage of children with asthma in their program was higher than the national percentage. One challenge she identified was the lack of a local asthma organization families could attend; the closest one was an hour and a half away.

Data collection established additional findings.

- After analyzing attendance data, the subcommittee noted that 90 percent of children with asthma were frequently absent. They were in the group of children identified as being at risk of missing 10 percent of program days.
- After talking with teachers, the subcommittee learned the teachers felt comfortable implementing individual healthcare plans, but were not confident about identifying triggers in their classrooms that might aggravate a child's asthma.
- After meeting with families, the subcommittee discovered many families did not fully understand asthma and wanted more information about their child's health condition. Several families with limited English proficiency said they would like information in their home language.

The community assessment subcommittee shared their findings with the HSAC and offered some recommendations. The committee, in turn, suggested several strategies which included connecting the program to a local business that had previously funded community health initiatives. Following up on these strategies, Healthy Beginnings developed a comprehensive approach to asthma management that maximized learning and promoted regular attendance. This included:

- Developing an asthma policy that included staff training on asthma, how to implement an Asthma-Friendly Child Care Checklist in all classrooms, and how to complete Child Enrollment/Attendance/Symptom Records for children with asthma
- Implementing a two-year local health initiative with the ABC Healthy Living Company to establish an asthma education home visiting program for families with children with asthma
- Working with the local hospital and the regional chapter of the Asthma and Allergy Foundation of America to establish an asthma education support group for program families and other members of the community

To learn more about this case study and how this community assessment informed program planning see Foundations for Excellence: A Guide for Five-Year Planning and Continuous Improvement, 2nd Edition.

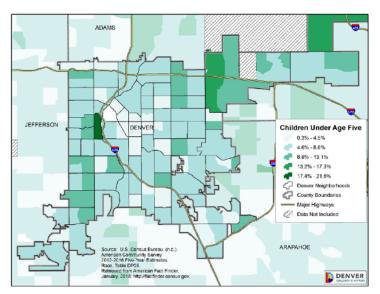
66

Your community assessment will provide detailed information about the location of eligible families, including populations that may be underserved.

Identifying historical and geographic trends is fundamental to program planning. This data on children under age 5 can inform where services are most needed and may suggest future need.

Figure 22: Children under Age Five 46,000 45,000 45,355 45,041 43,825 43,104 42,000 41,000 2013 2014 2015 2016 2017

Figure 23: Children under Age Five



Source: Denver Great Kids Head Start Community Assessment 2018, page 18.

Service Areas, Recruitment Areas, and Program Locations

In the grant application, each program must propose a service area and define that area by county or sub-county, such as a municipality, town, census tract, or jurisdiction of a federally-recognized Indian reservation (45 CFR §1302.11(a)(1). The community assessment is a valuable tool for helping programs identify their service area and any need for changes to the service area. If a program decides to change its service area after the grant has been approved, the program must submit a new service area proposal to the Administration for Children and Families (ACF) for approval. Service areas can be vast. It is helpful to use the community assessment to identify areas with the greatest need for service, even if your program is not currently serving children in those areas. Focus your recruitment efforts there.

Your community assessment will provide detailed information about the location of eligible families, including populations that may be underserved. You will have current information about attendance and waiting lists at Head Start locations, as well as data regarding other child development programs in the community. If waiting lists are small or attendance is poor at some sites, you may need to reconsider the locations.

The chosen recruitment area should include as many eligible children as possible. The concentration of families and the availability and accessibility of facilities are additional factors to consider when making this recommendation. Include maps in your report that show the current service and recruitment areas, as well as maps of proposed changes.

Decisions about center locations can be difficult to make. Your considerations include staffing patterns, budget considerations, the availability of sites, and their accessibility to families. Sometimes, programs need to make difficult recommendations based on changing patterns of residence or employment. Your data analysis may indicate your program should consider closing a center or relocating services closer to where families live and work. On the other hand, your data analysis may indicate that more eligible families are arriving in the service area. If findings result in the need for expansion of services, be creative in seeking solutions, such as partnering with community-based programs or seeking funding from other sources if Head Start funding is not available.

Recruitment, Selection Criteria, and Enrollment Priorities

According to the HSPPS, each year, programs must establish selection criteria based on community assessment data that affect how participant selection is prioritized. Factors to be considered when establishing selection criteria include (45 CFR §1302.14(a)(1)):

- Community needs identified in the community assessment
- Family income
- Whether the child is experiencing homelessness or is in foster care
- · The child's age
- Child's eligibility for special education, early intervention services, or related services, as determined under the Individuals with Disabilities Education Act (IDEA) (20 U.S.C. 1400, et seq.)
- Other relevant family or child risk factors

The community assessment is designed, in part, to identify which children and their families are most in need of Head Start services. As a result, your program may need to revise its recruitment and selection criteria to better reach these populations. Likewise, changes in enrollment may require relocating existing centers or redesigning program options.

As population shifts or changes in population needs begin to emerge within communities, the Head Start program should reflect that change in its recruitment and selection priorities. There are several factors identified in the HSPPS regarding the establishment of recruitment and selection criteria based on the community assessment. A program must take into consideration any significant changes including increased availability of publicly funded pre-kindergarten (including how it meets the needs of the parents and children served, and whether it is offered for a full school day), rates of family and child homelessness, and to community demographics and resources. A program must also consider whether the characteristics of the community allow it to include children from diverse economic backgrounds who would be supported by other funding sources, including private pay, in addition to the program's eligible funded enrollment (45 CFR §1302.11(b)(3)).

If the community assessment finds need, the HSPPS do allow for a program to reserve one or more enrollment slots when a vacancy occurs for pregnant women and children experiencing homelessness and children in foster care (45 CFR §1302.15(c)). It is understood that children in these situations could benefit greatly from the comprehensive services offered by Head Start. ■

NEW DIRECTOR TIP

<u>b</u>

Know Your Community

Your community assessment can help you better understand the language and literacy needs in your community so that you can be more effective in your recruitment strategies. It can also help you identify key recruitment sites and organizations across the service area.

How does your program identify and recruit families with the greatest need? What additional data might help you further focus your efforts?

Services and Coordinated Approaches

The community assessment enables programs to make informed decisions about service delivery. It amplifies the voices of families in the community. It also provides specific data to help programs understand demographic changes, such as new or underserved populations in the service area, and identifies ways in which programs might address newly identified needs. Community assessment data can inform the development and implementation of the program's coordinated approach to service delivery for children who are DLLs, children with disabilities, and their families (45 CFR §1302.101(b)(2 and 3). The community assessment helps programs consider how to use resources to advance cultural competence, foster equity, and reduce disparities. Using a strengths-based approach, the community assessment can help mobilize community resources and partnerships. You should use the community assessment to gauge the specific types of services and resources needed.

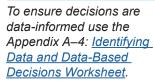
Through the community assessment, a program can determine the skills and competencies needed in the existing workforce, as well as gaps in professional development. When making decisions based on the community assessment, a review of staffing and workforce issues should be included. Does your staff have the knowledge and skills required to implement the services? Do they have the support and resources they need? What professional development needs might arise? How are they connected to the community? Are they culturally and linguistically responsive to children and families in the community? Community assessment data can be instrumental in designing and implementing a coordinated approach to training and professional development that effectively supports the delivery of high-quality services (45 CFR §1302.101(b)(1).

Collaborative Partnerships

As noted throughout this guide, all programs must establish community relationships and partnerships with local organizations to facilitate access to services that are responsive to children and families (45 CFR §1302.53(a)). The community assessment findings will help programs make informed decisions about whether and with whom to establish agreements, procedures, and contracts. Based on community assessment data, discussions with potential partners can focus on where services might best be delivered and how to coordinate those services to meet the unique needs of eligible children and families.

Programs are also required to promote the coordination of systems of comprehensive early childhood services to low-income families (45 CFR §1302.53(b)). Using the community assessment data, programs can determine appropriate partners for service provision, information-sharing, and ongoing communication.

Tell Me More!



Establish Priorities and Recommendations

You will need to prioritize your decisions and recommendations based on the community assessment data. This is especially true if your list of recommendations is lengthy or costly. Provide your rationale for prioritizing one recommendation over another. Some reasons you might give include:

- It can be implemented more easily.
- It addresses a greater need.
- It responds to a trend that, in the next few years, will impact the program. By putting the recommendation into place now, your program will be prepared.
- It involves working with a community partner and the time is right for you to collaborate due to leadership, funding, or shared mission. By partnering now, you can maximize your resources and offer improved service delivery to families and children.

Identifying Trends

Trend data gathered through the community assessment can be particularly valuable in helping you frame and prioritize recommendations. Your report needs to refer to trends when they are relevant. Typically, such trends are revealed in interviews or survey questions that ask respondents to reflect on changes over time, such as, "What changes have you noticed over the last three to five years?" You might ask mental health providers or food banks if they have observed population shifts or changes in their clients' needs. These kinds of questions look at the big picture, and give you a sense of what trends might affect your Head Start program in the future. For example, discussions with local school officials may indicate that a state-funded preschool program is going to expand in the next few years and offer preschool services to all low-income 4-year-olds. As a result, your program may decide to coordinate with the state programs to provide a broader range of services and options to families or to prioritize 3-year-olds for upcoming enrollment opportunities.

Census and PIR data spanning a period of time can also point to demographic and family changes. Estimates of eligible populations are another source of trend data and can help you forecast future program services. ■

You will need to prioritize your decisions and recommendations based on the community assessment data.

How does your program decide how the findings will be prioritized?

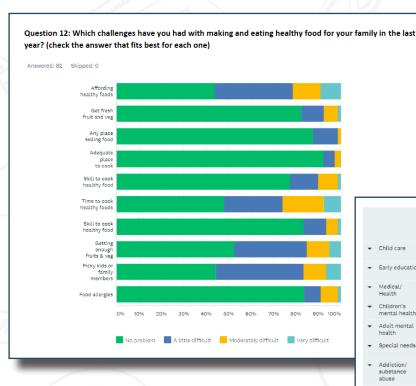


You have analyzed the data, drawn meaning from the results, and established priorities and recommendations based on the community assessment findings. Step 5, Communicate and Incorporate, will lead you to the finish line and beyond, as you prepare the community assessment report and embed its findings into your ongoing program planning.

A Closer Look

Telling Your Story with Data

Effective visualization helps users analyze and reason about data and evidence. It makes complex data more accessible, understandable, and usable. It engages the reader, supports multiple learning styles, and reveals trends at a glance. Consider these graphics from real Head Start community assessment reports.

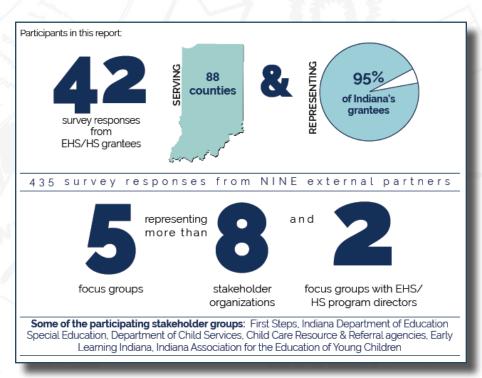


Either or Both?

These two charts share the same data. The colorful bar graph quickly exposes key trends and offers food for thought. The chart of numerical data lets you dig into the specifics. Together they can drive research and inform decision-making.

*	COULD NOT ACCESS * SERVICE	DIFFICULT TO ACCESS NEEDED ▼ SERVICE	OK TO ACCESS NEEDED SERVICE	EASY TO ACCESS NEEDED SERVICE	DO NOT NEED THIS TYPE OF SERVICE	TOTAL
▼ Child care	6% 5	7% 6	19 % 15	26% 21	42% 34	81
▼ Early education	4% 3	5% 4	25% 20	43% 34	24% 19	80
→ Medical/ Health	0% O	6% 5	21% 16	32% 25	41% 32	78
 Children's mental health 	196 1	13% 10	14% 11	26 % 20	46% 36	78
 Adult mental health 	4% 3	12% 9	12% 9	13% 10	59% 44	75
▼ Special needs	196 7	9% 7	13% 10	18% 14	59 % 46	78
 Addiction/ substance abuse 	1 %	5% 4	6 % 5	9% 7	78% 62	79
▼ Domestic violence	196 1	4% 3	8 % 6	996 7	78% 60	77
▼ Food/ nutrition	0%	8% 6	17% 13	29% 23	4 6 % 36	78
 → Housing assistance 	3% 2	8% 6	13% 10	18% 14	59% 47	79
→ Transportation	5% 4	8% 6	15 %	16 %	56% 44	79
 Affordable phone/internet 	3% 2	13% 10	14% 11	14% 11	57% 45	79
▼ Financial assistance	4% 3	14% 11	17% 13	16% 12	49% 37	76

Source: Explorers Academy, Head Start, Inc Five-Year Community Assessment, February 2018, page 78.



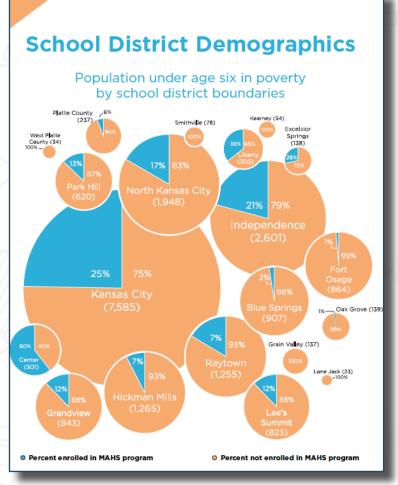
The Power of Big Numbers

Community assessment reports commonly list their research methodologies and participants. This display reveals what advertisers have long known, big numbers grab the reader's attention. You looked here first didn't you? Used wisely, prominent numbers are "brain candy."

Source: 2018 Indiana Early Head Start and Head Start Needs Assessment Report., page 5.



Smart infographics balance data and visualization. This graphic shows the percentage of children enrolled in programs in relation to the total number of children under the age of 6 living in poverty. At a glance you can see which communities are served and where there may be gaps in service.



Source: MARC (Mid-America Regional Council) 2017–2018 Mid-America Head Start Community Assessment, page 7.