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Connecting Program Evaluation Strategies with the Program Life Cycle: Implications for Family Development Programs

Family professionals and family program staff need to consider the importance of program evaluation in Korea since an increasing number of Healthy Family Support Centers are providing diverse intervention and education programs. The purpose of this research paper is to (a) introduce a program evaluation model that includes the program life cycle; (b) help family professionals and family program staff understand the link between program implementation and evaluation processes; and (c) facilitate discussions in terms of program evaluation of Healthy Family Support Centers and evaluation roles of different levels of Healthy Family Support Centers including the headquarters, regional, and local centers. Understanding the program life cycle and relevant evaluation processes will help family professionals and family program staff be more strategic in answering critical questions about a program's effectiveness. The benefits of program evaluation and its implications are discussed.

There has been increasing interest in evaluation research in the United States and around the world over the last three decades (Hewitt *et al.*, 2010; Patton, 2008). The US government and many funding agencies have emphasized the importance of assessing

effectiveness and establishing accountability for human service programs (Kyler *et al.*, 2005). The call for prevention and intervention programs to conduct more rigorous evaluations has not only resulted in better evidence of program effectiveness, but also increased documentation of both the strengths (best practices) and weaknesses of programs.

Family researchers and family program staff also need to consider the importance of program evaluation in Korea. More than a hundred Healthy Family Support Centers across the country were organized to address key issues of Korean families such as the increasing divorce rate and decreasing fertility rate by offering preventive services in 2010 (Healthy Family Support Center, 2010). The number of Healthy Family Support Centers has continuously increased, and they are now providing numerous prevention and education programs that correspond to the various needs of different families including programs that support family life education, family counseling, and diverse families. As more centers provide diverse prevention and education programs, more rigorous program evaluations should be conducted to verify program effectiveness and to provide better services to communities.

As an informative research paper, the purpose of this paper is to (a) introduce a program evaluation model that includes the program life cycle; (b) help family professionals and family program staff understand the link between program implementation and evaluation processes; and (c) facilitate discussions

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PROGRAM EVALUATION

Evaluation is an inevitable process that considers whether program implementation and processes are conducted appropriately and whether the intended/unintended program outcomes and impacts are achieved (Small, Cooney & O'Connor, 2009). Program evaluation is defined as "the systematic collection of information about the activities, characteristics, and results of programs to make judgments about the program, improve or further develop program effectiveness, inform decisions about future programming, and/or increase understanding" (Patton, 2008, p. 39). Thus, program evaluation is an integral process that helps program staff identify areas for improvement, understand which program components work and for whom, and garner support for their programs through defensible evidence of effectiveness.

One way to identify appropriate evaluation strategies is to answer the question: How will the findings be used? Evaluation findings can be used in three ways: (a) help with judgment, (b) improve facilitation, and (c) generate knowledge (Patton, 2008). Judgment-oriented evaluation aims to determine general program effectiveness or the worth or value of a program through such strategies including performance assessments, summative evaluations, quality control and compliance reports, or comparative ratings of programs. Unlike a judgment-oriented evaluation, an improvement-oriented evaluation intends to use evaluation outcomes for program improvement. Improvement-oriented evaluation typically includes formative evaluations, quality improvement, responsive evaluations, or learning

organization approaches. Judgment-oriented and improvement-oriented approaches use program evaluations in different ways. For example, formative evaluations, used in the improvement-oriented approach, emphasize how to create better programs; however, summative evaluations, used in a judgment-oriented approach, determine the overall effectiveness of a program and influence judgments regarding whether the program should continue.

A knowledge-oriented evaluation approach involves evaluations that aim to contribute to knowledge enhancement (Patton, 2008). Knowledge from these evaluations can be used to elaborate program models, test theories, determine measurements, or provide policy implications. In this approach, evaluation findings are used conceptually rather than for instrumental purposes as is typical in both judgment-oriented and improvement-oriented evaluations (Leviton & Hughes, 1981; as cited in Patton, 2008). Since these three evaluation approaches using judgment-oriented, improvement-oriented, and knowledge-oriented evaluations have different research foci, it is often difficult to achieve all three purposes from one evaluation study. Thus, it is important to identify the purpose of an evaluation and prioritize the strategies to be employed as well as the intended use of the findings (Patton, 2008).

Integrating the intended use of evaluation findings with important program evaluation strategies requires a thoughtful, reflective approach. One way to approach a "goodness-of-fit" between program information needs and appropriate evaluation strategies is to understand the program life cycle. In other words, where is the program in its development?

PROGRAM LIFE CYCLE

A life cycle metaphor describing the evolving processes of a program, similar to the human development process from birth to death, has shown to be useful for the conceptualization, development, implementation, and evaluation of a program (Kane & Trochim, 2007). A program life cycle illustrates the distinguishable evaluation stages in the process of carrying out a program (Mayeske, 1994).

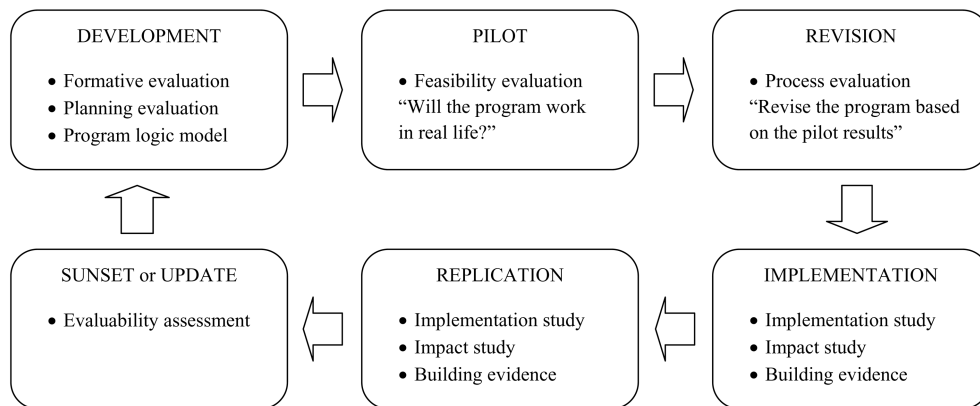


Figure 1. *Program Life Cycle Model* (Marczak & Son, 2010)

Figure 1 presents one such program life cycle model created by the authors of this paper. The model consists of six stages: (1) the idea/conceptual/development stage; (2) the pilot stage; (3) revision of the program based on results from the pilot stage; (4) full implementation; (5) replication of the program; and (6) the sunset stage or update of the program.

Program evaluation often distinguishes between process and outcome evaluations (Kane & Trochim, 2007). While both types of evaluations may occur at every stage, a process evaluation, which addresses the program implementation phase from conceptualizing a program to the immediate program outputs, is highlighted in the following program stages: (1) the idea/conceptual/development stage; (2) the pilot stage; and (3) revision of the program based on results from the pilot stage. Outcome evaluation deals with program outcomes and impacts and is highlighted during the program stages which include the next two stages (4) full implementation and (5) replication of the program. A combined process and outcome evaluation will finally inform staff of what to do in the final stage (6) whether to move to a sunset stage or update the program. These process and outcome evaluations are a continuous process instead of separate processes. Details about these six stages and possible evaluation questions are outlined in the next section.

Stage 1: Idea/conceptual/development stage

The program staff conducts formative or planning

evaluations and creates a program logic model in the idea/conceptual/development stage. Formative/planning evaluation processes force program teams to answer critical questions including the following:

- What do we know about the problem or the issue? Who does it most affect? How is the problem experienced in real life settings?
- Who/what should be the program's target audience to most effectively solve the problem?
- What is the program/intervention that will maximize improved conditions for the participants/community?
- What are the specific program activities?
- What are the program objectives and anticipated outcomes?
- What is the theory of change that links the program intervention and program outcomes?
- What is the readiness factor in terms of getting the program off the ground?
- Who are the key stakeholders who may be interested in the program and results?

Important evaluation strategies for this stage may include the development of a logic model, conducting a thorough review of the literature or formative research (if the literature does not exist or is not adequate) and/or conducting a needs assessment. A development of a program logic model forces program staff to agree on the program as well as to be explicit about the program's resources, activities, and intended benefits. While a logic model plays a key role at any time in the program life cycle, creating a logic model in this stage is especially

critical since it provides guidance to all program staff in terms of what activities to pursue as well as what outcomes should be measured (McLaughlin & Jordan, 2004). More explanations about logic models are discussed later in this paper.

Both formative research and needs assessment can be conducted in this stage (Small, Cooney & O'Connor, 2009). These evaluation strategies are typically used to identify how the problems/issues are experienced by potential participants in their daily lives, and to better understand the context that may affect what program activities will be accepted. They also help identify individual or community assets/barriers that may either promote or hinder making meaningful improvements throughout the program.

Stage 2: Pilot Stage

A feasibility evaluation asks the question, "Will the program work in real life?" In the pilot stage, feasibility studies will provide important data "to improve implementation, solve unanticipated problems, and make sure that participants are progressing toward desired outcomes" (Patton, 2008, p. 118). Specific types of questions asked through a feasibility study include the following:

- Will the program be accepted by key stakeholders? (Will funders take a chance on funding it? Is it an important issue to address? Will key partners buy-in to the process? Is there community interest in solving the issue?)
- Will the target audience come? Will they stay? (Recruitment and retention/attrition questions)
- Do the program education/intervention materials, tools, and activities work in real life? (The program activities are linked to participant learning.)
- Are participant reactions positive? (Participant satisfaction, enjoyment, and approval)
- Can it achieve the intended effects? (Does the program help participants make positive steps toward intended outcomes? Do participants learn knowledge and skills? Did they change their practices?)

Stage 3: Revision stage

The program is revised based on results from the

pilot stage. This is a formative evaluation procedure since the results from the pilot stage are reflected in the revised program to help improve the programs. The revision stage focuses on the process evaluation based on the following questions:

- What worked and what didn't work? What program processes and activities were most critical in terms of improving participant outcomes? Who made improvements and who didn't?
- What improvements need to be made to the program or to the program logic model? What improvements are absolutely necessary to enhance effectiveness and which ones are nice but not necessary?
- What improvements are possible and what are not possible given program resources and community realities?
- What are the processes needed to make revisions?
- How well did the final product address improvement needs resulting from the pilot?

Stage 4: Full Implementation stage

At this stage, implementation and impact studies are conducted to build evidence of the program's effectiveness. Critical evaluation questions at this stage include the following:

- Was the program implemented with fidelity? With quality?
- Were there site or group differences in terms of implementation?
- What dosage, intensity, and duration of participation documentation exist and did these make a difference in terms of the program's effect?
- Were there program processes or major events in the community that could potentially have made a difference in terms of the program's effect?

In order to build evidence of the program's effectiveness, the following questions are typically asked:

- What evidence do you need to defend your process/program? Does it need to meet scientific evidence (experimental design, quasi-experimental design, comparison groups, etc.)?

- What is the quality of the impact evaluation design? Will it give you the information you need to make meaning about your program's effects?
- What contextual information do you need from participants that could mediate/moderate the relationship between program participation and program effects or change the magnitude of the program's effects?
- For whom did it work and under what conditions?

Stage 5: Replication stage

Like the implementation stage, the replication stage also carries out an implementation and impact study to (a) further build evidence to ensure program effectiveness, and (b) identify whether the program effects can be transported with fidelity to other like communities. Relevant evaluation questions include:

- Will the program processes, implementation, and effects withstand replication?
- For whom did it work and under what conditions?
- What program processes and activities were transportable to other communities and which were not?
- What were the environmental/community contexts that enhanced/detracted from the program's effects?

Stage 6: Sunset or update the program stage

Families, communities and societies are constantly changing. Therefore, one cannot assume that a program developed decades ago remains relevant today. At this stage, an evaluability assessment may help program staff make a key decision whether to sunset or update the program. An evaluability assessment has been shown to have a positive side-effect of organizational development (Smith, 1989; Smith, 2005), so the process often clarifies program realities and simultaneously reveals improvements that must be made to strengthen it to obtain successful results. Typically, an evaluability assessment does not produce an evaluation plan. Rather, it clarifies the program theory or logic, provides valuable data to make improvements, or helps staff

make decisions about whether or not to continue. These critical evaluation questions should be answered in the sunset stage or be used to update the program:

- Does the articulated program theory still hold given the speed of change?
- Is there still integrity? Is the research base undergirding the program still relevant? Where are the gaps?
- Who is using it? With what target audiences? Are they showing effect?
- Is the key issue still a concern to stakeholders? Is the issue still relevant?
- What decision should be made in terms of sunsetting the program or updating it? What evidence was used to make the decision?

Identifying where a specific program is in terms of a program life cycle will provide critical insight into the type of questions that should be answered through program evaluation. In turn, answering these evaluation questions through use of rigorous, systematic data collection methods would help program staff improve program processes and build strong evidence for program effectiveness.

PROGRAM LOGIC MODEL

As alluded to earlier in the paper, a program logic model is an important program and evaluation component that becomes a key feature in every stage of the program life cycle, and thus deserves closer attention. The logic model systemically portrays the relationships among the resource investments, activities, and outcomes of the program (Weiss, 1995; W. F. Kellogg Foundation, 2004). In addition, a logic model serves as a useful tool to describe the theory of change since that helps explain the underlying assumptions of how the program works to solve issues (McLaughlin & Jordan, 2004). Thus, using the logic model assists program staff to design, plan, implement, manage, assess, and communicate about a program more effectively both internally and externally (Taylor-Powell & Henert, 2008).

The logic model can improve the utility of an evaluation by using it for management purposes

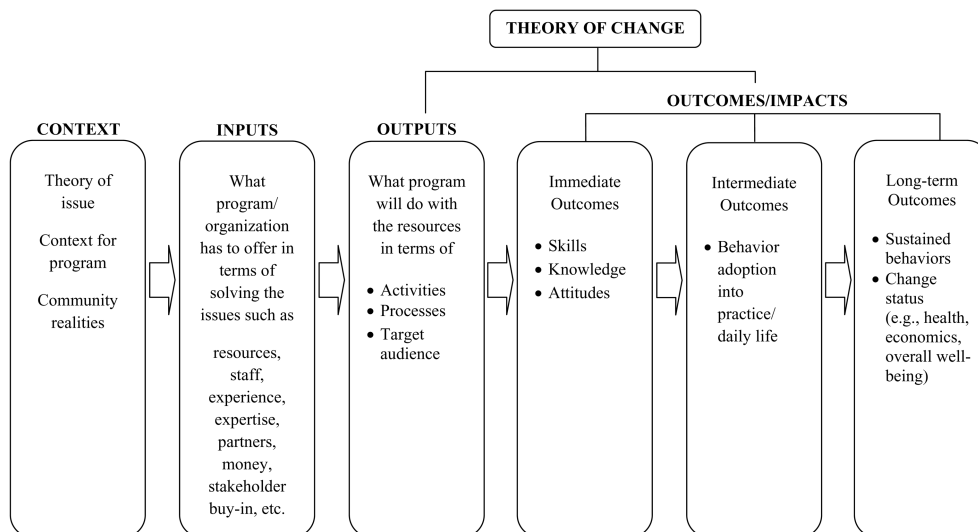


Figure 2. Program Logic Model (Adapted from United Way of America, 1996)

(McLaughlin & Jordan, 2004) since a good evaluation is achieved when clear thinking and responsible program management is supported (W. F. Kellogg Foundation, 2004). In addition, the theory of change helps program staff focus their evaluation efforts and resources on key aspects of the program (Weiss, 1995). The basic assumption is that if the proper resources and activities are delivered to the right target people, intended outcomes can be achieved (Rogers, Petroschino, Huebner & Hacs, 2000; as cited in McLaughlin & Jordan, 2004, p. 11).

Figure 2 represents a typical program logic model as adapted by the authors from the United Way of America (1996). As Figure 2 shows, the program logic model consists of contexts, inputs, outputs, and outcomes/impacts. Contexts should be considered in evaluations since each evaluation context is different (Patton, 2008). Identifying contextual aspects including the theory of the issue, the context of the program, and the community realities would help organizations and program staff plan, implement, and evaluate a program properly under a certain environment. Inputs are resources that a program/organization has to offer in terms of solving the issues including staff, experience, expertise, partners, money, and stakeholder buy-in. Outputs indicate what the program will do with the resources. Activities, processes, and target audiences

are included in outputs. When program staff correctly identify the contexts and inputs surrounding a program, they can control the output levels.

Outcomes are results or changes in program participants including intended/unintended and positive/negative outcomes (Taylor-Powell & Henert, 2008). It is often useful for program staff to identify levels of outcomes, including those that participants should gain immediately from the program and those that will result from using what they learned in their daily lives. Levels of outcomes can include the following: (a) Immediate outcomes include skills, knowledge, and attitude changes gained by participants through their participation in the program; (b) Intermediate outcomes represent positive behavior changes or adoption of what they learned in their daily lives; and (c) Long-term outcomes/impacts include sustained behavior changes which, in turn, bring betterment in status in areas of health, economics, and overall well-being. While outcomes and impacts are often used synonymously, impacts are typically defined as “the social, economic, civic, and/or environmental consequences of the program” experienced over time (Taylor-Powell & Henert, 2008, p. 4). Understanding the different levels of outcomes is important since all of the desired outcomes of a program cannot occur at the same

time (United Way of America, 1996). A subsequent outcome can be achieved based on a previous outcome or a series of changes, or outcomes could help achieve the ultimate outcome that a program hopes to accomplish. Therefore, distinguished statements regarding immediate, intermediate, and long-term outcomes help program staff anticipate achievable outcomes and evaluate more appropriate program outcomes over time.

This logic model is built into the program life cycle to make it more rigorous and to help organize and systematize it at any stage. For instance, in the development stage, the logic model can help explain the concepts or ideas of a program and establish appropriate, intended outcomes based on the given contexts and inputs of the program. During the pilot stage, the logic model provides important information for further development of the program in terms of whether the proposed program can be implemented properly depending upon the pilot results. In addition, program staff can figure out what kinds of measurements they need to accurately evaluate the different levels of outcomes in the implementation and replication stages.

IMPLEMENTING PROGRAM EVALUATION IN HEALTHY FAMILY SUPPORT CENTERS

In recent years, scholars have called for more evaluation studies of Healthy Family Support Centers' prevention and education programs. For example, there is little program evaluation research (Song & Jeong, 2008) compared to program development research on Healthy Family Support Centers (Jeong *et al.*, 2009; Park & Kim, 2006; Song, 2005). Moreover, these evaluation studies have only examined education programs and provided only an accounting of education program topics, number of programs run by each center, and compliance reports (Jeong *et al.*, 2007; Song & Jeong, 2008). They have typically not assessed the impacts of the programs. Understanding the program life cycle and relevant evaluation processes including the program logic model is important to increasing rigorous program evaluation studies in Korea.

The Healthy Family Support Center headquarters has an overall responsibility of ensuring that local Healthy Family Support Centers operate their organizations well and that their programs are properly implemented and monitored. To meet this goal, the Healthy Family Support Center headquarters established an evaluation team to assess local Healthy Family Support Centers every year, but beginning in 2011, they will be assessed only every three years (Ministry of Health & Welfare, 2008). These evaluations from the Healthy Family Support Center headquarters are conducted at the center level to supervise all centers' overall operations and projects (Song & Jeong, 2008), but the evaluations are not conducted at the program level to identify each program's effectiveness. According to the Healthy Family Support Center's operation guidelines, local centers have to conduct program evaluations after the completion of each program through a satisfaction survey given to all program participants (Ministry of Health & Welfare, 2008). Program evaluation, however, should go beyond conducting a satisfaction survey to evaluate program effectiveness.

Evaluation of Healthy Family Support Center programs and education would benefit from development of program logic models as well as from identification of where programs are in terms of the program life cycle. The Family Support Center headquarters has developed several family-based program manuals including program goals, expected outcomes, curriculum, and a program implementation manual to help program staff of local Healthy Family Support Centers. Figure 3 presents an example of a program logic model created based on Song and Yoon's (2006) education program manual for fathers.

The program logical model would help family program staff focus their evaluation efforts. Depending on where they are in their program's life cycle, family program staff could modify the suggested program regarding program goals and anticipated outcomes based on the local centers' situations including resources, community realities, or community networks. The program logic model would also help program staff specify their anticipated outcomes of the programs over time for immediate, intermediate, and long-term outcomes since some of the program

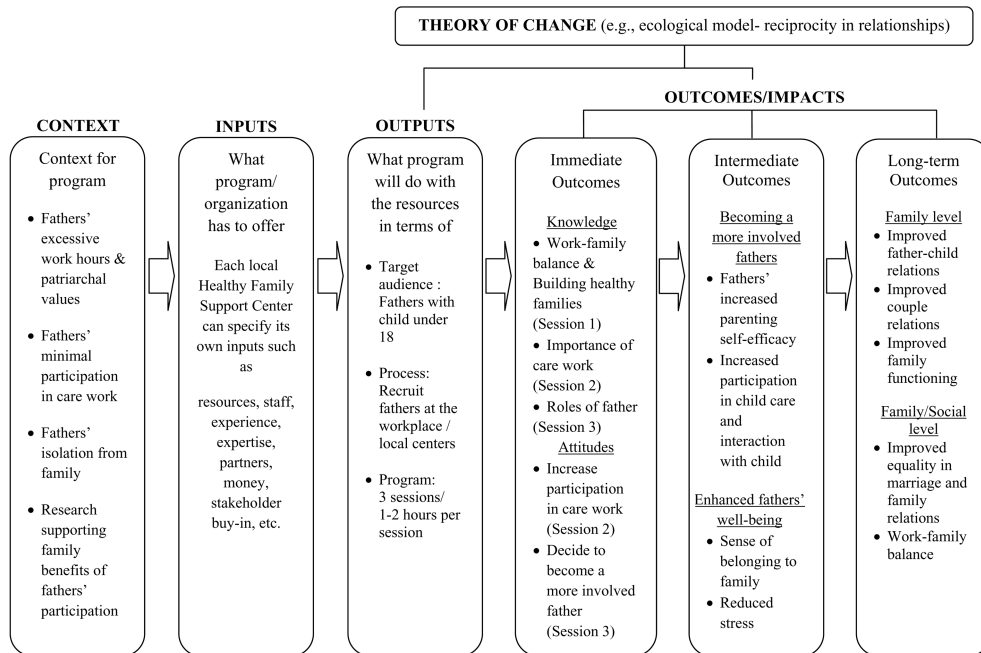


Figure 3. Program Logic Model of Education Program for Fathers

manuals do not distinguish them (Healthy Family Support Center, 2010).

CONCLUSIONS AND IMPLICATIONS

Evaluations have become a more important research area as more funders require evidence of program effectiveness and accountability of programs in the United States. Likewise, it is time for family professionals to consider program evaluation and program evaluation models in Korea. As Healthy Family Support Centers provide more family education and intervention programs, the need for program evaluations should increase. This research paper introduced program evaluation and program evaluation models to help family professionals and family program staff in Korea understand the need for program evaluation. This research paper would also help increase family professionals' and family program staff's interest in program evaluation.

Program evaluation provides opportunities to improve family education and prevention programs and services so they can become better suited to meet diverse needs of various families and

communities. By showing evidence of program effectiveness, these programs are able to provide a stronger rationale to attract current or future funders and program participants. When Healthy Family Support Centers and their programs show evidence of program effectiveness and accountability, they could influence family policy in Korea. That is, more rigorous evaluation research could help shape the development of family policy.

Program evaluation models also benefit human service agencies and program staff in many ways including helping family professionals and program staff understand the program evaluation process. As program staff becomes more familiar with the evaluation process and impact outcomes, evaluations will be the most beneficial (Small, Cooney & O'Connor, 2009). Program evaluation models will provide a balanced perspective on not only the big picture of the program but also its components (W. F. Kellogg Foundation, 2004). In addition, program staff can minimize errors if they follow the evaluation steps and questions as suggested from the program life cycle and program logic model. The evaluation process might also influence program staff's work attitudes since they are more likely to

pay attention to their work when it is evaluated (Patton, 2010). Better attitudes could then be positive unintended outcomes of evaluations.

Finally, program evaluation research facilitates current discussion to avoid potential overlapping efforts between the Healthy Family Support Center headquarters and the regional Healthy Family Support Centers in Korea. There has been great discussion about whether the regional Healthy Family Support Centers that serve the entire province should establish their own evaluation teams because the Healthy Family Support Center headquarters has already established and conducted evaluations for local centers (Song & Rah, 2009). Using program evaluation models would provide strong arguments for this discussion since the proposed program logic model would provide contextual knowledge reflecting community realities including community partnerships and resources. It also facilitates further discussion about whether family education and intervention programs offered by local Healthy Family Support Centers need standardized evaluations or localized evaluations. These evaluation studies and the current discussion could help establish different identities and roles of the three tiers-headquarters, regional centers, and local centers- of the Healthy Family Support Centers.

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