



Goals Summary Report



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I. INTRODUCTION

Practitioners, policymakers, and researchers are continually exploring and evaluating ways to support low-income families in increasing their economic independence. Despite progress in efforts to improve employment outcomes among low-income adults, economic independence remains an elusive goal for many families. In the field of human services, program administrators and policymakers focused on helping low-income adults obtain and maintain employment have grown interested in how they can draw on findings from psychology, neuroscience, and behavioral science to help place more families on the path to economic independence.

The fields of psychology, neuroscience, and behavioral science suggest new options for developing and studying interventions to increase employment among low-income adults. An emerging area of attention is self-regulation, which is the ability to control thoughts, actions, and emotions (Blair and Raver 2012; Murray et al. 2015). A large body of research demonstrates the importance of early childhood experiences, caregiver skills and behavior, and other environmental influences on children's development and use of self-regulation and establishes that self-regulation is necessary for both goal setting and goal pursuit. Emerging research suggests that self-regulation continues to develop in adulthood but that adults may have difficulty in using their self-regulation skills when under stress. This research has generated particular interest in designing new interventions to strengthen employment program participants' self-regulation, help participants identify personally meaningful goals related to economic independence, and pursue and attain those goals more effectively.

The Office of Planning, Research, and Evaluation (OPRE) within the U.S. Department of Health and Human Services (DHHS), Administration for Children and Families (ACF) has invested in learning more about the role that strategies focused on enhancing self-regulation and goal attainment may play in assisting low-income adults to become self-sufficient. Many programs funded by ACF that support low-income adults could benefit from recommendations that include self-regulation and goal attainment skill development.

In 2014, OPRE awarded a contract to Mathematica Policy Research to conduct the Goal-Oriented Adult Learning in Self-Sufficiency (GOALS) project in order to explore how emerging insights from psychology, neuroscience, and behavioral science can inform employment programs for adults. This final report summarizes the major tasks conducted under GOALS and the resulting products. The report has two objectives: (1) to describe the motivation behind each project task, how each task answered key research questions guiding the project, and how later tasks were informed by and built on earlier ones; and (2) to highlight key findings from each task. In Table I.1, we list the research questions addressed by the GOALS project, along with the five key project tasks that were intended to respond to the questions. In Chapter II, we describe each task and provide links to associated study products for more details. In Chapter III, we discuss implications of the GOALS work for policy and programs and identify potential next steps for the field.

Table I.1. GOALS research questions and project activities

Research question	Literature synthesis	Site visits to existing programs	Conceptual framework development	Special topics paper on measurement	Quality improvement and evaluability assessment in emerging programs
How does existing research describe psychological processes associated with goal-directed behavior?					
- How does existing research differentiate between related constructs?	X		X		
- Which formulation is best to apply to employment programs?					
What does existing research say about improving goal-directed behavior in adults?					
- Are findings about psychological processes in children applicable to adults?	X		X		
- What do we know about environmental circumstances as related to psychological processes that support goal-directed activities?					
What are we learning from existing programs that are guided by psychology-informed frameworks?					
- Do any existing programs and/or components target low-income adults to increase employment outcomes?		X	X		
- What are the major features or components of these programs?					
Have existing programs using psychology-informed frameworks undergone evaluation?					
- If so, what is the state of the evidence?		X	X	X	
- Are there programs using these frameworks to target other subpopulations and, if so, have these programs undergone evaluation?					
What are the options for strengthening and measuring goal-directed behaviors in adults and for testing interventions?					
- What are the major challenges in testing?				X	X
- To what extent can current laboratory measures be translated into practice, such as employment programs?					

Throughout the project, consultations with experts guided the data collection, analysis, and development of study products. Three formal in-person meetings with experts supplemented OPRE's overall direction for the project. The first took place in February 2015. It brought Temporary Assistance for Needy Families (TANF) administrators and their employment service partners from eight states and the District of Columbia together with national experts, researchers, and OPRE staff to learn about executive function skills (a subset of self-regulation skills that enable cognitive control) and to generate ideas about how programs can use insights into these skills to craft more effective programs.¹ The second meeting took place in April 2015. It was designed to solicit advice from a panel of experts on how to maximize the value of specific GOALS project activities given available resources and how information from the project could be used to guide policy and practice. The third meeting took place in January 2016 and included the expert panelists as well as representatives of research organizations, foundations, and OPRE and other DHHS staff. Its purpose was to gather feedback on draft GOALS products and to discuss the application of lessons from the GOALS project to programs. In Table I.2, we identify the experts and organizations that contributed to the GOALS project.

Table I.2. Experts and organizations contributing to the GOALS project

Experts	Research organizations	Foundations
Elizabeth Babcock, president and chief executive officer Economic Mobility Pathways (EMPath)	Abt Associates	Annie E. Casey
Clancy Blair, professor of cognitive psychology New York University	Center on Budget and Policy Priorities	Joyce
Marilyn Fox, professor of management University of Nebraska Cooperative Extension	Duke University	Kellogg
Dick Guare, psychologist Seacoast Mental Health Center for Learning & Attention Disorders	Harvard Center on the Developing Child	
Crystal Hall, assistant professor of public affairs University of Washington	MDRC	
Philip Hong, professor, School of Social Work Loyola University Chicago	Prosperity Agenda	
Gabrielle Oettingen, professor of psychology New York University	SRI International	
Megan Smith, director New Haven MOMS Partnership	University of North Carolina	
Phillip Zelazo, professor of psychology University of Minnesota	Urban Institute	

¹ The states were Colorado, Michigan, Minnesota, Montana, Oregon, Pennsylvania, Rhode Island, and Washington.

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II. GOALS PROJECT TASKS AND PRODUCTS

The GOALS project consisted of five substantive tasks intended to answer the research questions identified in Chapter I. Collectively, however, findings from the GOALS project were also intended to provide ACF with a guidepost for future research in this emerging area of study and to propel innovation in the field of employment programming for low-income adults. The project tasks, described in this chapter, include:

- Task 1: Literature synthesis
- Task 2: Site visits to existing programs
- Task 3: Conceptual framework
- Task 4: Special topics paper on measurement
- Task 5: Quality improvement and evaluability assessment in emerging programs

A. Task 1: Literature synthesis

The first activity was a literature synthesis, which was foundational to the rest of the project. It described the self-regulation skills that may be most relevant for attaining employment-related goals and discussed environmental influences that can support or inhibit optimal use of these skills. The synthesis informed Task 2 by directing our search for existing interventions that address aspects of self-regulation and goal attainment that are theorized to lead to better outcomes for adults. As part of the literature synthesis, we developed a preliminary model depicting the role of self-regulation in goal attainment, which then provided the basis for the development of the conceptual framework in Task 3. In addition, the synthesis was central to Task 4 by helping us start to identify ways to measure self-regulation and goal attainment and change in these outcomes.

To conduct the literature synthesis, we searched peer-reviewed databases for sources that addressed how self-regulation is connected to goal attainment, the empirical and theoretical support for this relationship, and how programs have been or could be adapted to strengthen the skills necessary to achieve goals. We searched the following databases: Academic Search Premier, Education Resources Information Center, Google Scholar, Healthstar, MEDLINE, and PsycINFO. We also searched key websites, such as the website for Harvard University's Center on the Developing Child (HUCDC), and research clearinghouses, such as the Self-Sufficiency Research Clearinghouse. We examined journal articles along with grey literature, such as project reports and white papers. With some exceptions for material that was particularly germane, we limited our search to documents from the United States produced in the last 15 years. We also drew on other recent literature reviews that had already addressed self-regulation and goal attainment related to employment or other associated topics (Baumeister et al. 1994; Carver and Scheier 2001; Dawson and Guare 2009; Vohs and Baumeister 2011; Locke and Latham 2013; Goldstein and Naglieri 2014; Pavetti 2014; Blair and Raver 2015; Murray et al. 2015; Shechtman et al. 2016).

The resulting report targeted researchers, policymakers, and practitioners interested in the role that self-regulation may play in the ability of people to obtain and maintain employment. Major findings from the literature synthesis include the following:

- **Specific self-regulation skills interact collectively to support goal achievement.** Self-regulation helps people set and achieve goals. However, there is limited evidence explicitly linking self-regulation skills, goal attainment, and employment-related outcomes. These relations are largely theoretical rather than empirical.
- **Self-regulation includes cognitive skills, emotional skills, and personality-related factors.** The cognitive skills of executive function, selective attention, and metacognition work together to regulate and control actions and to help people focus and reflect on their own abilities and progress toward goals (Moskowitz 2002; Zelazo and Muller 2002; Dawson and Guare 2016). Emotion is closely related to cognition, with emotion both guiding and being guided by thoughts, knowledge, and perceptions of the world. Two emotional skills—emotion understanding and emotion regulation—are important for self-regulation. Understanding personal emotions and the emotions of others allows people to interpret behaviors and to direct emotional energy toward action (Oettingen and Gollwitzer 2001). Emotion regulation helps people make emotions manageable or useful and is essential for successful interactions with peers and coworkers (Seo et al. 2004; Creed et al. 2009). Finally, personality-related factors such as motivation, grit, and self-efficacy may be components of self-regulation or may moderate the relations among self-regulation factors and goal achievement. For example, personality may influence how quickly or slowly our self-regulation skills deteriorate in the face of stress and how adaptable self-regulation skills are in different situations (Baumeister et al. 2006; Hoyle 2006).
- **Self-regulation strengths and challenges vary across individuals, over time, and across settings.** Environmental experiences can shape the development of self-regulation skills in early childhood and can affect people’s ability to use these skills in adulthood. Psychologists have long argued that people’s capacity or “bandwidth” for using their cognitive skills is limited (Muraven and Baumeister 2000). By placing high demands on self-regulation, poverty uses or “taxes” some of that bandwidth, rendering self-regulation skills less effective. In addition, poverty may lead people to focus intensively on their most pressing sources of financial stress and short-term needs at the expense of future needs (Mullainathan and Shafir 2013).
- **Self-regulation and goal attainment are promising frameworks for programs, but we have much to learn.** Potentially effective interventions exist for strengthening self-regulation skills and goal attainment, but because only a few employment programs have implemented such interventions, we still have much to learn about whether and how they contribute to outcomes related to economic independence. Advancing our knowledge may require learning from programs in other fields with more experience in implementing similar interventions such as parenting, youth development, money management, substance abuse treatment and prevention, and mental health.
- **Measuring outcomes and impacts on self-regulation and goal attainment in the context of employment programs is important but challenging.** Though measurement tools exist, they often assess discrete skills without context or obvious real-world application or were designed for administration in a laboratory or clinical setting by psychology professionals.

Identifying a common set of appropriate, existing measures or developing new ones will likely require a collaborative effort between subject matter experts and practitioners. Before testing an intervention's outcomes and impacts, however, qualitative studies can provide valuable lessons on the efficacy of implementation in the context of employment programs and identify ways to strengthen interventions in preparation for rigorous evaluation.

The citation for the literature synthesis is below. The synthesis is available at <https://www.acf.hhs.gov/opre/resource/self-regulation-goal-attainment-a-new-perspective-employment-programs>.

Cavadel, Elizabeth W., Jacqueline F. Kauff, Mary Anne Anderson, Sheena McConnell, and Michelle Derr. "Self-Regulation and Goal Attainment: A New Perspective for Employment Programs." OPRE Report #2017-12. Washington, DC: Office of Planning, Research, and Evaluation, Administration for Children and Families, U.S. Department of Health and Human Services, 2016.

B. Task 2: Site visits to existing programs

Site visits offered an opportunity to observe how some of the theoretical linkages established in the literature synthesis operate in practice. The objective of Task 2 was to explore how programs for low-income people supported participants' self-regulation and goal attainment skills and to identify lessons from their experiences for application in ACF programs. We used several methods to identify programs that offered different types of interventions aimed at improving self-regulation and/or goal attainment in order to promote better employment-related outcomes. First, we sought nominations from a broad range of informants, including:

- **Researchers at Mathematica.** Mathematica's staff members include experts in programs in the following areas: employment and workforce development, healthy marriage, parenting and responsible fatherhood, disability, at-risk youth, and incarceration and reentry. We asked a subset of these experts to consider projects they have learned about through their work on systematic evidence reviews in the areas of employment and training, home visiting, fatherhood, and teen pregnancy prevention.
- **The GOALS expert panelists.** One of our panelists, Dr. Elizabeth Babcock, president and CEO of EMPATH, provided a list of organizations that are participating in a community of practice to develop and implement interventions similar to EMPATH's Mobility Mentoring program. Mobility Mentoring is a service model in which coaches use a variety of tools and strategies to support participants through goal setting and goal pursuit. We solicited other ideas from other panelists through email.
- **The ACF Executive Functioning Technical Workgroup and other ACF staff.** The workgroup aims to clarify the potential research, policy, and practice questions around interventions that include executive function skill building and to explore how best to advance knowledge and practice in this area. The GOALS project officers also consulted their colleagues in OPRE and ACF.

Second, we scanned relevant publications and Internet sources, such as Aspen Institute's two-generation promising programs page and programs for youth included in Public Profit's

Strategies to Promote Non-Cognitive Skills compendium.² Third, we scanned publications by the Behavioral Interventions to Advance Self-Sufficiency project, funded by OPRE, for any interventions and programs that may include techniques to modify participants' goal-related behavior. Finally, we sought information about programs through other projects that Mathematica is conducting for OPRE, such as the Advancing Welfare and Family Self-Sufficiency Research Project, the Job Search Assistance Evaluation, and the Exploration of Two-Generation Approaches to Improving Self-Sufficiency.

We identified 35 programs implementing interventions focused on self-regulation and goal achievement. In consultation with OPRE, we selected 12 programs with which we conducted telephone interviews to gather additional data about their interventions and program context. We ultimately selected 5 to visit, prioritizing programs based on the following criteria:

- **Evidence-based or -informed program approach.** The program's design was based on or informed by evidence about what is effective in improving self-regulation skills and/or goal attainment.
- **Target population.** The program served a low-income population relevant to ACF programs.
- **Program goal.** The program focused on increased employment as a major outcome.
- **Program maturity and size.** The program was fully implemented and had served a substantial number of participants to date, thereby ensuring that the program had sufficient experience to yield lessons.
- **Program outcomes.** The program appeared promising based on available outcome or impact data.

Each of the programs visited implemented strategies that aimed both to strengthen participants' self-regulation skills and create a program environment that helps participants use their skills. The intervention components implemented to strengthen self-regulation skills were all evidence-based; that is, they had undergone rigorous testing in circumstances other than employment programs for low-income adults and had been shown to improve self-regulation skills. The approaches designed to help participants use their skills enjoy support in the research literature (Babcock 2014), but they do not have the same base of rigorous evidence as do the interventions designed to improve self-regulation skills. Many employment programs for low-income adults apply these approaches as standard practice based on common wisdom about how best to support participants. The programs we visited, however, drew intentionally on self-regulation research to ease the demand on participants' self-regulation skills. In Table II.1, we list the programs we visited and the interventions they implemented. Detailed descriptions of the programs and interventions appear in the GOALS product cited at the end of this section.

The product of the site visits was a brief targeted to practitioners that focuses on considerations for programs interested in implementing interventions aimed at improving self-regulation skills and goal attainment. It includes profiles of each program visited and offers

² Available at <http://ascend.aspeninstitute.org> and <https://www.publicprofit.net/Strategies-To-Promote-Non-Cognitive-Skills>.

lessons based on implementation successes and challenges as well as next steps other programs could take when considering implementing these strategies. Key findings include the following:

- **Staff training and hiring were key to implementation success.** Across the five programs visited, frontline staff received intensive training in both implementation and the science behind how self-regulation influences goal achievement. Hiring staff with similar socioeconomic backgrounds or from the same neighborhoods as program participants also helped create a program environment that maximized participants' ability to apply their self-regulation skills.
- **Existing curricula and program approaches may need to be adapted.** Interventions that programs borrowed from other contexts needed adaptation before they were appropriate for low-income participants of programs seeking to improve employment outcomes, and adaptation took time.
- **Increased program engagement may be the most immediate outcome of implementation.** Programs found that participants expressed an increased desire to participate and engage with self-regulation or goal-oriented programming compared to traditional programming. Staff suggested that these interventions may be more motivational and engaging than typical program offerings. The relationships they may foster between participants can also combat social isolation and promote self-efficacy and motivation.
- **Service delivery is resource-intensive.** Participation in most of the programs lasted several years. Interventions were often designed to be high-intensity and required substantial staff and financial resources.
- **Some programs found it helpful to reinforce skills taught in classroom or coaching sessions in life outside the program.** Individualized support can help participants effectively apply self-regulation techniques in daily life. Scaffolding is one way in which programs tried to help participants, with mentors slowly withdrawing support as participants grew more adept at practicing skills on their own.
- **None of the programs had undergone rigorous evaluation at the time of our visits.** However, most of the programs were either in the process of or interested in undergoing evaluations of effectiveness. Programs have conducted little data collection to date on self-regulation or goal-related measures, in part because they have not identified relevant measures.

Table II.1. Program approaches to improving and/or supporting the use of self-regulation skills

	Target population	Evidence-based interventions to improve self-regulation				Intentional approaches to creating environments that support use of self-regulation skills			
		Cognitive behavioral therapy (CBT)	Mindfulness	Motivational interviewing	Mental contrasting with implementation intentions (MCII)	Fostering positive relationships	Reducing logistical challenges	Creating a welcoming environment	Providing clear information
EMPath	Residents of public and subsidized housing in Greater Boston, Massachusetts			X		X	X	X	X
MOMS Partnership	Low-income female caregivers in New Haven, Connecticut	X	X	X		X	X		
Northside Achievement Zone (NAZ)	Families with children in North Minneapolis, Minnesota	X ^a	X	X		X			
Roca	At-risk youth and young adults in Massachusetts	X	X	X		X			
Transforming Impossible into Possible (TIP)	Participants in employment programs for low-income adults		X		X ^b	X			

^aNAZ does not offer CBT in full but rather a curriculum that includes cognitive restructuring, a psychotherapeutic process of learning to identify and dispute irrational or maladaptive thoughts that is a core component of CBT (Hope et al. 2010).

^bTIP does not offer traditional MCII but incorporates mental contrasting and a form of implementation intentions, two of the key aspects of the MCII intervention.

The citation for the exploratory site visits brief is below. The brief is available at <https://www.acf.hhs.gov/opre/resource/using-psychology-informed-strategies-to-promote-self-sufficiency-a-review-of-innovative-programs>.

Anderson, Mary Anne, Elizabeth Brown, Elizabeth W. Cavadel, Michelle Derr, and Jacqueline F. Kauff. "Using Psychology-Informed Strategies to Promote Self-Sufficiency: A Review of Innovative Programs." OPRE Report #2018-41. Washington, DC: Office of Planning, Research, and Evaluation, Administration for Children and Families, U.S. Department of Health and Human Services, 2018.

C. Task 3: Conceptual framework

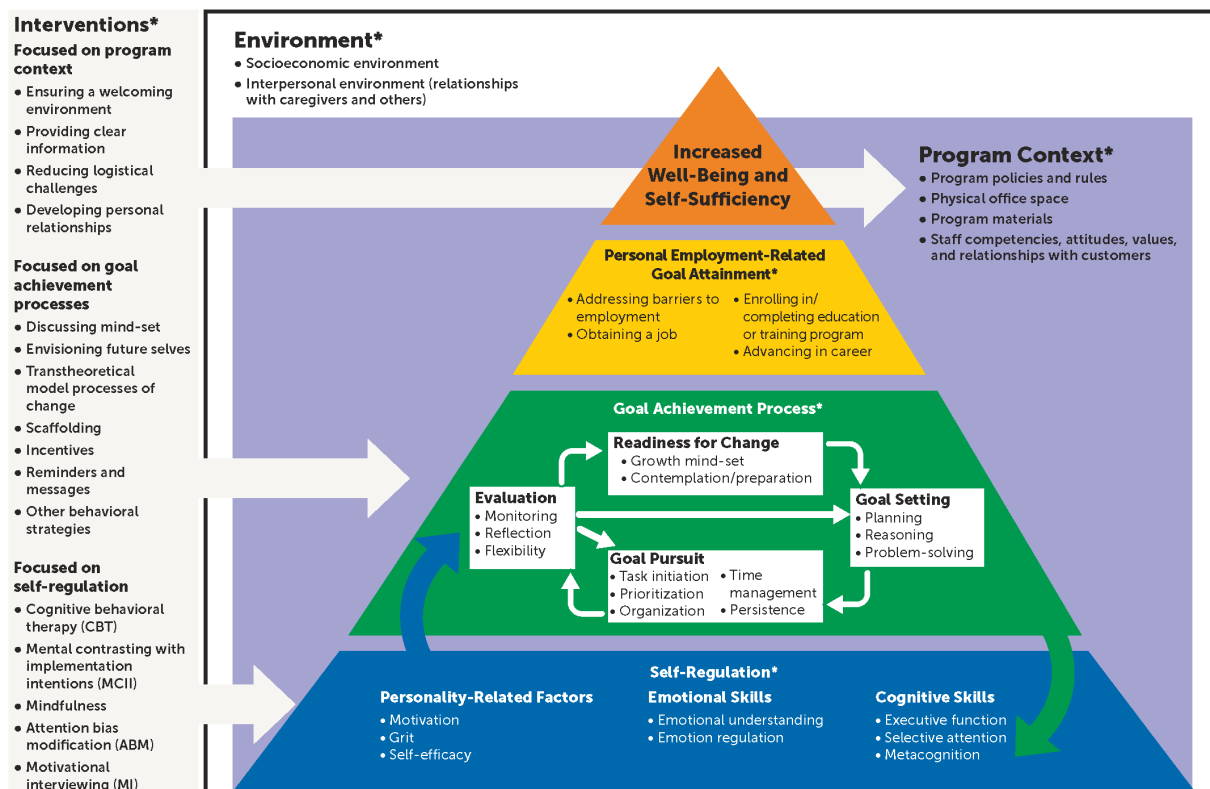
After establishing theoretical and empirical relations among self-regulation, goal attainment, and economic independence in the literature synthesis and then observing the application of those relations in practice during the site visits, we developed a conceptual framework to illustrate the theoretical, empirical, and applied linkages. In addition to depicting the potential pathways of influence among self-regulation, goal attainment, and economic independence, the conceptual framework begins to shed light on the skills and outcomes that may be meaningful to measure in evaluations of programs implementing strategies focused on self-regulation and goal achievement. We present the conceptual framework in Figure II.1. In addition to the visual, the GOALS team produced a written report to accompany the framework. The written report and visual framework are designed to be useful to practitioners, funders, and policymakers alike. Major points illuminated by the visual framework and associated report include the following:

- **The framework illustrates that the environment in which people live and work affects their use of self-regulation skills.** The environment, which includes aspects of the program context, can make it more or less difficult for people to use their self-regulation skills and to set and pursue goals. To illustrate this concept, a box representing program context surrounds the pyramid containing self-regulation, the goal achievement process, personal goal attainment, and increased well-being and self-sufficiency.³ Program context includes program policies and rules; physical office space; program materials; and staff competencies, attitudes, values, and relationships with customers. An outermost box for environment surrounds both the pyramid and the program context box. The environment includes the socioeconomic context and a person's interpersonal environment. It is the outermost layer because it can influence all of the skills, behaviors, outcomes, and contexts within it.
- **Self-regulation skills are needed for goal achievement, and engaging in the goal achievement process can enhance self-regulation skills.** The relationship between self-regulation skills and goal achievement is reciprocal. Self-regulation skills are needed for engaging in goal setting, goal pursuit, and evaluating progress toward goal achievement. Strengthening and using self-regulation skills can, in theory, lead to greater success in achieving a mindset that is ready for goal achievement and in conducting the activities involved in setting and pursuing goals, as reflected by the arrow leading from self-regulation into the pyramid's section for the goal achievement process. At the same time, setting and

³ In the conceptual framework, "self-sufficiency" is interchangeable with "economic independence."

pursuing goals is theorized to improve underlying self-regulation skills, as shown by the arrow pointing from the goal achievement process back to self-regulation. Interventions may be aimed at strengthening self-regulation skills to affect goal achievement and interventions that involve practicing goal setting, and pursuit may bolster a person's self-regulation skills.

Figure II.1. GOALS conceptual framework



- **Successfully navigating the goal achievement process supports the attainment of personal goals.** In the framework, self-regulation and the goal achievement process support the next step in the pyramid: personal employment-related goal attainment. In the context of employment programs, achievement of goals is individualized and could be short-term—such as planning a career, addressing barriers to employment (such as physical or mental health problems or child care or transportation challenges), enrolling in or completing an education or training program, obtaining a job, or advancing in a career.
- **Achieving personal employment-related goals leads to increased well-being and self-sufficiency.** The top of the pyramid depicts the overall longer-term goal of increased well-being and self-sufficiency. Achievement of short-term employment goals is expected to lead eventually to longer-term outcomes, including increased employment stability and growth and self-sufficiency.
- **Interventions can target (1) self-regulation skills, (2) the goal achievement process, or (3) the program context.** This is indicated by the three arrows originating from the interventions box and leading to each of these components. Interventions may target any

combination of these three areas to trigger a process that will eventually lead to positive short-term and long-term outcomes in employment and self-sufficiency.

The citation for the conceptual framework paper is below. The paper is available at <https://www.acf.hhs.gov/opre/resource/improving-outcomes-among-employment-program-participants-through-goal-attainment-a-conceptual-framework>.

Anderson, Mary Anne, Jacqueline F. Kauff, and Elizabeth W. Cavadel. "Improving Outcomes among Employment Program Participants through Goal Attainment: A Conceptual Framework." OPRE Report #2017-90. Washington, DC: Office of Planning, Research, and Evaluation, Administration for Children and Families, U.S. Department of Health and Human Services, 2017.

D. Task 4: Special topics paper on measurement

The literature synthesis conducted under Task 1 revealed the importance of measuring the outcomes and impacts on skills and behaviors of interventions targeting self-regulation and goal attainment. Yet, in large part, the existing programs we visited under Task 2 were not conducting such measurement, though they were measuring participant outcomes such as obtaining employment. Focusing on measurement issues offers the opportunity to explore how programs are working, to understand participants' strengths and challenges, to identify how to adapt programs to better meet participant needs, and to help elucidate some of the theoretical linkages among self-regulation, goal achievement, and economic independence outcomes. Finding appropriate measures and the resources needed to implement them, however, can pose a challenge. The conceptual framework suggested several constructs that programs could measure, depending on their logic models. We developed the special topics paper under Task 4 to advance the discussion of measurement by providing guidance to programs on how they can measure self-regulation and goal-related skills to assess the outcomes and effectiveness of new interventions.

In addition to summarizing the conceptual framework for context, the special topics paper answers three main questions for practitioners considering measurement of self-regulation and goal achievement: (1) Why should employment programs measure goal-related skills, behaviors, mindsets, and outcomes? (2) What should programs measure, and how and when should programs collect data? (3) How can programs prepare for measurement, and where can they obtain additional information? Key findings include the following:

- **Measuring goal-related skills, behaviors, mindsets, and outcomes can provide critical information for programs.** In particular, measurement can indicate if an intervention is working as intended, reveal how or why a program activity is working, show who might be most likely to benefit from the intervention, guide program improvements, and help programs meet performance targets and external requirements tied to program funding.
- **Programs have three main ways to collect data on goal-related skills, behaviors, mindsets, and outcomes; each involves advantages and disadvantages.** For employment programs, the most accessible options for data collection include (1) participant self-report, in which participants provide data by responding to a questionnaire; (2) observer report, in which another person (for example, a program staff member or an employer) records data

about the participant, typically by using a checklist or other rating system; or (3) administrative processes, in which data are collected as part of typical program activities (such as an intake interview) or existing data are used in a new way.

- **Some existing measurement tools may be applicable to low-income adults participating in employment programs.** Examples of tools to measure self-regulation include the Behavior Rating Inventory of Executive Function—Adult Version (BRIEF-A); the Difficulties in Emotion Regulation Scale (DERS); and the Grit Scale. Goal attainment and goal-related behaviors may be measured by the Lam Assessment on Stages of Employment Readiness (LASER); Employment Hope Scale; and Goal Attainment Scaling (GAS). Information about and links to these tools appears in the special topics paper, along with references and other sources with more detail. Tools vary in terms of the constructs measured, collection method, format, cost, time to administer, and other considerations.
- **Programs should measure changes in self-regulation skills and goal-related behaviors over time.** Measurement should generally begin with baseline data collection in order to facilitate pre- and post-program comparisons—that is, comparisons of participants’ skills, behaviors, or mindsets before and after they receive the intervention. Program leaders should articulate their expectations for how long after an intervention’s implementation it is reasonable to see the desired changes or outcomes—in some cases, it may be unclear when to expect a change. Repeating measurement over time can help programs ascertain how long and how intense an intervention needs to be before certain outcomes become evident.
- **Programs should have a plan in place for using the data to ensure that their measurement efforts are worthwhile.** To prepare for measurement, programs should facilitate staff buy-in, delineate responsibilities (for instance, who will collect and analyze the data), and consider the audiences for measurement results.

The citation for the special topics paper on measurement is below. The paper is available at <https://www.acf.hhs.gov/opre/resource/new-perspectives-on-practice-a-guide-to-measuring-self-regulation-and-goal-related-outcomes-in-employment-programs>.

Cavadel, Elizabeth W., Jacqueline F. Kauff, Ann Person, and Talia Kahn-Kravis. “New Perspectives on Practice: A Guide to Measuring Self-Regulation and Goal-Related Outcomes in Employment Programs.” OPRE Report #2018-37. Washington, DC: Office of Planning, Research, and Evaluation, Administration for Children and Families, U.S. Department of Health and Human Services, 2018.

E. Task 5: Quality improvement and evaluability assessment in emerging programs

TANF is one of the key programs under ACF’s authority. All of the programs we identified in Task 2 aimed to improve self-regulation and/or goal attainment as a means of improving employment outcomes, but none was implemented in a TANF program context. Given federal laws and regulations governing work participation requirements and budget pressures, TANF programs may face unique opportunities and challenges in implementing similar interventions. In Task 5 of the GOALS project, we began working with TANF programs that were implementing new interventions focused on self-regulation and goal attainment to help them refine and strengthen the interventions, which were designed to be integrated into the existing TANF policy

environment. Task 5 allowed us to take the lessons learned from earlier tasks in the GOALS project and apply them in a TANF context. The new interventions were grounded in research evidence on self-regulation and goal attainment and included the following:

- **Wish, Outcome, Obstacle, Plan (WOOP)**, an evidence-based strategy for helping people set and work toward goals using the principles of mental contrasting and implementation intentions. Mental contrasting is a process in which people consider all the reasons why their current situation does not match their desired future and why they have not yet achieved their goal (that is, the obstacles preventing them from achieving the goal). An implementation intention takes the form of an if/then statement that links a specific obstacle an individual may encounter during the pursuit of a goal and the planned response to that obstacle—for instance, “if X occurs, then I will do Y” (Oettingen 2015). Individuals may be guided through the WOOP process by watching/listening to a three- to six-minute video or audio recording that walks them through the steps in the process (see www.woopmylife.org) or by following a worksheet. In addition, people trained to use WOOP for themselves can lead people through the WOOP process in a group setting or individually. TANF programs in three sites implemented WOOP: (1) Larimer County’s Workforce Center (LCWC) in Colorado; (2) Linn County’s self-sufficiency offices in Oregon; and (3) Jewish Employment and Vocational Services (JEVS) in Philadelphia, Pennsylvania.
- **My Journey to Success (MJTS)**, a web-based, interactive case management and coaching platform to help TANF clients engage in goal setting and pursuit. MJTS allows participants to choose “pathways,” or topic areas (for instance, housing or child care), that align with their goals. Within each pathway, program staff work with participants to decide on appropriate “action steps”—pre-established common tasks listed in MJTS—to undertake to meet their goals (for example, filling out a housing application or searching for child care providers). MJTS guides participants through the required tasks by providing on-screen resources and informational material. LCWC implemented MJTS.
- **Goal4 It!™**, a practice model that helps participants strengthen and build core skills, identify ways to reduce external stressors that may interfere with goal achievement, and engage in meaningful dialogue about goals with program staff. The model involves four phases, each with associated activities and tools applied in the context of a coaching relationship. As they progress through each phase, participants identify goals, establish plans and take action toward achieving them, and review (and, if necessary, revise) their efforts. Project 500, a two-generation program administered by the San Francisco Human Services Agency for families eligible for TANF, implemented Goal4 It!™.

We conducted quality improvement activities at the program sites under the rubric of Mathematica’s Learn, Innovate, Improve (LI²) process. In each site, we conducted a “road test,” which is part of the third stage of the LI² process.⁴ Road tests are small pilots of selected program changes conducted in contained practice settings. They allow programs to learn about and hone changes before scaling them up. For each road test, we engaged in two to three “learning cycles,” during which several direct service staff each implemented an intervention

⁴ More information about LI² is available at https://www.acf.hhs.gov/sites/default/files/opre/li2_brief_final_b508.pdf.

with 5 to 10 program participants for a six-week period. During the learning cycle, we collected detailed information from program administrators, supervisors, direct service staff, and program participants on their experiences with the intervention and analyzed data to pinpoint what changes seemed to be most promising and for whom and to recommend targeted enhancements.

The LI² process is intended to build sustainable program changes gradually that, over time, may undergo evaluation with the use of increasingly rigorous methods. Ideally, after a road test to strengthen an intervention's implementation, programs would consider how to incorporate small-scale experiments during scale-up, potentially generating more reliable and robust evidence about the effectiveness of a given strategy on key outcomes of interest. To assess readiness and opportunities for such experimentation in the TANF program sites in Task 5, evaluation experts at Mathematica conducted site visits to each program, during which they interviewed program administrators and staff. In lieu of an in-person visit to Linn County's self-sufficiency offices, staff conducted a virtual site visit through a series of telephone interviews. These Mathematica staff were knowledgeable in self-regulation and goal attainment interventions but were not involved in quality improvement activities.

At the end of the GOALS project, each program was still honing its intervention in response to road test findings and was positioned to benefit from additional road tests. The Task 5 site visits revealed that, even though rigorous evaluation might be possible in some of the programs at this juncture, allowing programs more time to focus on quality implementation could maximize the value of investment in additional studies. Nonetheless, the sites' experiences offered several overarching lessons on how to adapt, implement, and scale up self-regulation and goal attainment interventions in a TANF program context. We documented these lessons in a brief for practitioners. Lessons included the following:

- Science-informed, goal-oriented strategies can require time and effort to integrate into the service environment. Shifting from an approach focused on compliance with work requirements to an approach focused on participants' personally meaningful goals requires staff to change their own mindsets and behaviors.
- Strong "champions" at all levels of the organization can be critical to the success of goal-oriented strategies. Given the shift in mindset required to adopt goal-oriented interventions such as WOOP, MJTS, or Goal4 It!TM, staff who promoted the strategies and coached their peers played a key role in implementation.
- The purpose of and rationale behind the goal-oriented tools and processes should be made clear for staff. A sharp focus on the evidence driving the interventions during the initial training sessions and early implementation helped staff understand more easily the rationale behind the new strategies and the importance of adhering faithfully to the new processes.
- More specific and tailored guidance is needed on how to use goal-oriented interventions with participants in crisis. Staff required more training to understand how each intervention can help participants tailor their goals to address and avert future crises or to identify and plan small steps to deal with a current crisis, with an eye toward promoting empowerment and progress.

Our quality improvement activities also contributed to a special topics paper for practitioners that outlined three general principles for helping TANF programs use self-regulation and goal achievement strategies to improve outcomes for participants:

1. Reduce sources of stress among program participants by
 - Providing services in locations that are convenient to participants
 - Streamlining business processes, forms, and reporting activities
 - Holding participants accountable for requirements that reflect their current abilities and circumstances, adjusting the requirements as their situations improve
 - Using technology to increase staff and participant interactions and to improve efficiency
2. Strengthen participants' core skills by
 - Adopting a habit-forming goal achievement process with participants that includes (1) setting a meaningful goal, (2) creating a detailed plan with manageable steps, (3) taking action to accomplish each step, and (4) reviewing/revising the goal and the plan based on the outcome
 - Incorporating skill-building activities during any frequent, regular interactions between program staff and participants as well as during peer-to-peer exchanges; skill building may be incorporated into program orientation sessions, job search assistance workshops, and peer-to-peer support groups, among other activities
 - Using work preparation activities such as job search and job-readiness workshops, job skills training, and work experience placements to allow participants to practice building self-regulation skills in environments that resemble workplaces
3. Support responsive relationships by
 - Creating more meaningful exchanges between program staff and program participants by emphasizing meaningful goals rather than a participant's barriers
 - Holding more frequent and targeted interactions between program staff and participants so that they can track progress on near-term goals and address obstacles in a timely manner

The citations for the brief and special topics paper are below. They are available at <https://www.acf.hhs.gov/opre/resource/improving-employment-outcomes-using-innovative-goal-oriented-strategies-in-tanf-programs> and <https://www.acf.hhs.gov/opre/resource/using-the-science-about-self-regulation-to-improve-economic-outcomes-for-tanf-families>.

Derr, Michelle, Jonathan McCay, Jacqueline F. Kauff. "Improving Employment Outcomes: Using Innovative Goal-Oriented Strategies in TANF Programs." OPRE Report #2019-40. Washington, DC: Office of Planning, Research, and Evaluation, Administration for Children and Families, U.S. Department of Health and Human Services, 2019.

Derr, Michelle, Jonathan McCay, Ann Person, Mary Anne Anderson. “Using the Science about Self-Regulation to Improve Economic Outcomes for TANF Families.” OPRE Report #2018-88. Washington, DC: Office of Planning, Research and Evaluation, Administration for Children and Families, U.S. Department of Health and Human Services, 2018.

III. NEXT STEPS FOR THE FIELD

One of the key findings from the GOALS project is that programs seeking to help adults achieve economic self-sufficiency may be able to integrate a set of lessons from psychology, neuroscience, and behavioral science into their interventions. Research suggests the existence of potentially effective strategies for strengthening self-regulation skills and goal achievement among low-income adults in employment programs. Yet, given that only a few programs for low-income adults have attempted to implement these strategies to improve participants' employment outcomes, we still have much to learn about which strategies could most effectively and efficiently be integrated into such programs and how best to do so. And, to date, no employment programs explicitly addressing self-regulation and goal achievement have undergone rigorous testing. We have yet to identify the essential components of a successful employment program that integrates self-regulation-informed research into its program practices or the required intensity and dosage of services, required staff qualifications and experiences, and costs of the intervention.

Nonetheless, practitioners, funders, and policymakers can use the findings and products of the GOALS project to increase their knowledge about whether and how strategies focused on self-regulation and goal achievement may improve employment program participants' skills, behaviors, and progress toward economic independence. Practitioners can reflect on how they might modify their existing and developing employment programs to incorporate new research-based strategies. Funders can support programs that have developed or hope to develop strategies focused on self-regulation and goal achievement. Policymakers can consider ways to encourage the development or adoption of these strategies and associated interventions and seek to test new program models. At this juncture, the most valuable way to advance knowledge is to apply lessons learned to date in the field. Employment programs might consider the following next steps:

- **Articulate a theory of change.** An important precursor to implementing a new intervention is to define what the program expects to occur as a result of the intervention and why. Programs seeking to implement interventions focused on self-regulation and goal achievement can define program expectations by answering a few basic questions, which the conceptual framework can help them articulate: What are the program's ultimate objectives related to participants' employment and economic independence? What is the program trying to accomplish with respect to participants' self-regulation or goal-related skills, and why might the program expect changes in participants' use of these skills to influence the program's ultimate objectives? How does the program plan to realize its expectations—that is, what services, activities, or resources will the program use to accomplish what it intends with respect to participants' self-regulation and goal-related skills? How and for whom does the program expect the intervention to work? By clearly identifying what a program is trying to change and for whom, a program will be in a better position to understand if the intervention is working as intended once implemented.
- **Experiment with variations on strategies.** In the absence of data on the effectiveness of the strategies identified in the GOALS project for low-income employment program participants, it is unclear how to implement the strategies in ways that maximize the likelihood of success. To learn what approaches might work best within a specific program

context, programs might implement variations of an intervention and gather feedback from participants and staff about the benefits and challenges of each. For instance, a program might deliver an intervention in a group setting with some participants and in individual sessions with others to determine which approach is more feasible and poised to yield the desired outcomes in view of the program's structure and resources, staff competencies, and participant population.

- **Engage in a systematic, analytic process such as a road test to hone interventions before scaling them up.** Performing a rigorous evaluation before an intervention is refined and well implemented can be premature. For instance, through the LI² road test, we learned that to work as intended, WOOP must be implemented in a quiet, private space that is free from interruption. Had WOOP been tested in a chaotic home or program office environment, it may have shown no impacts, leading us to conclude that WOOP is ineffective when results from a more appropriately implemented intervention would have indicated otherwise. In addition, providing constructive feedback to staff during a road test promotes a deeper level of staff engagement with an intervention, reinforcing any needed behavior changes.
- **Clearly document interventions.** Lack of documentation may make it difficult to train staff members to implement a new model as intended and to assess the extent to which they are implementing it as intended. An absence of documentation also presents a challenge for other programs that intend to replicate proven interventions. Clearly specifying the processes and procedures involved in implementing a specific intervention can help organizations determine if their own staff or others are implementing program models appropriately and, if not, what changes are required.
- **Collect outcome data.** Data are needed to assess the outcomes and effectiveness of program strategies. To assess effectiveness, programs need (1) baseline data—that is, data collected before participants first receive program services—on participant characteristics and the outcomes of interest and (2) follow-up data—that is, data collected after the program delivers services—on the outcomes of interest. Experimental evaluation consisting of a comparison of outcomes between randomly assigned treatment and control groups provides the most rigorous evidence of effectiveness. Organizations implementing new strategies, however, could benefit from collecting outcome data outside the context of an experiment in order to gain insight into whether the intervention may be helping participants advance toward and achieve intended outcomes. Comparisons of outcomes among participants with different baseline characteristics may provide insight into implementation challenges for certain types of participants. By following the guidelines on measurement of self-regulation and goal achievement offered through the GOALS project, employment service providers can pave the way for broader application of such measurement in the human services field. Gaining experiences with measures of self-regulation and goal achievement that have been used successfully in rigorous studies in other settings and with different populations can validate their use in employment program settings while promoting an understanding of self-regulation and goal-related interventions for participants in these programs.

Employers can also use the findings and products of the GOALS project to increase the likelihood of their employees' success on the job. Research suggests that employers are increasingly seeking employees with strong self-regulation skills and that employers can play a

role in fostering these skills in low-income adults in the labor market (Goleman 1995; Caudron 1999; Pfeffer and Veiga 1999; Bartlett and Ghoshal 2002; Halfhill and Nielsen 2007; Guthridge et al. 2008; Derr and Holcomb 2010; Mitchell et al. 2010; Hagen and Wilkie 2011; Robles 2012; Guerra et al. 2014; Ricker 2014; Adhvaryu 2016; Ritter et al. 2018). To supplement the core GOALS project activities, Mathematica prepared a brief that summarizes this research, describes opportunities employers can pursue to strengthen their workforce, and illustrates how employer investments in this area can have profitable returns (Kauff, 2019).⁵

⁵ Available at <https://www.acf.hhs.gov/opre/resource/supporting-employees-and-maximizing-profit-the-case-for-workforce-development-focused-on-self-regulation>.

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