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Supported Employment Demonstration: Final Process Analysis Report (Deliverable 7.5c)

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Executive Summary

E.1 Introduction

This report presents findings from the process evaluation based on data collected over four years of the Supported Employment Demonstration (SED) implementation. The overall objectives of the process evaluation were to assess whether sites implemented the demonstration as intended; identify challenges in providing services to the previously unstudied population served by this intervention; enhance evaluators' ability to interpret the demonstration's outcomes; and make recommendations for future services and demonstrations targeting individuals similar to those served by the SED.

The SED is a randomized controlled trial (RCT) of a suite of interventions intended to improve employment outcomes for people whom the Social Security Administration (SSA) denied disability benefits for a claim made based on an alleged mental impairment. Employment is the primary outcome of interest for the SED intervention, with improved clinical recovery and reduced demand for disability benefits as secondary outcomes.

The interventions included a multicomponent package of Individual Placement and Support (IPS) supported employment (SE) and integrated behavioral health services, as well as additional funds to cover co-pays and deductibles for medical treatment, work-related expenses, and short-term financial assistance to resolve financial crises. The hypothesis of the SED is that early intervention with evidence-based SE and clinical services would improve recovery, thereby increasing employment.

The SED compares outcomes in each of three experimental arms with approximately 1,000 individuals randomly assigned per arm, all of whom received denials from SSA on an initial disability benefits application. Thirty sites around the United States implemented the demonstration. The Basic-Service treatment arm received IPS SE services, integrated behavioral health services, and financial supports intended to remove barriers to employment. Full-Service treatment-arm participants received the same services as Basic-Service participants, but also received clinical services from a Nurse Care Coordinator (NCC). The SED compares both intervention arms to the Usual Services (control) arm of the SED. Participants randomized to the Usual Services arm received an information packet listing services available in their communities.

We have organized the report and this executive summary to answers the following four research questions:

1. How did sites implement the demonstration, and what was the level of fidelity to the design?
2. What services did sites provide; which services did participants and staff consider useful; and which services, if any, did they consider not useful?
3. What programmatic disincentives create barriers for denied applicants with mental illness to return to work?
4. What specific programmatic changes may SSA make to support the efforts of people with mental illness in their attempts to sustain competitive employment?

E1.1 Data Sources

This report relies on multiple sources of data collected during SED implementation. SED service providers completed the Monthly Service Use Checklist to record the services delivered to participants including IPS SE, care management, and outreach services. Providers also recorded participant employment. We report on aggregated usage of services throughout the demonstration to inform the uptake and usefulness of services. Fidelity measures of IPS SE and NCC services supported the conclusion that sites' fidelity to the intended design of the SED was good. We also collected extensive in-depth interview data from SED service providers and ethnographic, observational, focus group, and in-depth interview data from participants in all three study arms to shed light on study activities that would otherwise remain in the "black box" to researchers.

We relied on mixed methods, incorporating qualitative and quantitative data analyses techniques. Methods are detailed fully in Appendix C.

E1.2 Demonstration Implementation and Fidelity

To answer the question, "How did sites implement the demonstration, and what was the level of fidelity to the design?" we assessed fidelity of IPS SE services and NCC services using the standard 25-item IPS Fidelity Scale, and an 18-item NCC Fidelity Scale, respectively, for services delivered in years 0-2. To assess the quality of services delivered remotely after March 2020, we conducted qualitative reviews of fidelity. In-depth interviews with SED service providers throughout all four years of the study helped us understand how service providers implemented the SED and the unique challenges to service delivery posed by pandemic-mitigation measures necessitating the delivery of services remotely.

SED service provider teams were multidisciplinary. Under the supervision of a team lead, IPS specialists, care managers, and nurses (the latter only on Full-Service teams) worked together on behalf of participants. Pre-pandemic, team members' offices or work spaces were co-located to facilitate good communication. Beginning around mid-March 2020, teams transitioned to off-site, remote work, keeping in contact with each other through digital means, including phone calls, emails, and texts. Throughout all four years, team members worked closely together, sometimes taking on tasks outside of their roles on the team (for example, a team lead might have conducted outreach and engagement on behalf of participants who were difficult to engage in services). Fluidity in roles on the teams appeared to enhance quality service delivery: meeting the unanticipated needs and challenges posed by this unique population of participants on a timely basis; preventing burnout among team members by sharing responsibilities for managing crises; and covering the team's responsibilities adequately when there was turnover in staff.

Based on assessments of fidelity conducted during the first two years of the demonstration at each of the 30 sites, we conclude that implementation of IPS SE services was good overall. Sites succeeded in providing high-quality evidence-based services in compliance with the core principles of competitive employment, zero exclusion, service integration, respecting worker preferences, rapid job search, systematic job development, time-unlimited supports, and benefits planning.

Because IPS SE services were designed for in-person delivery, their effectiveness when delivered remotely is unknown. While the implementation team worked closely with sites to deliver the best services possible under pandemic-related lockdowns and social-distancing mandates, the evidence base for IPS services delivered remotely is lacking. Providers noted several challenges to remote

IPS service delivery, including participants not having adequate computer and communications technology for remote job development as well as difficulties contacting hiring managers.

Throughout all four years of the demonstration, there were several challenges related to implementing the NCC role properly. More than half of sites suffered from turnover in the NCC role. Some sites had NCC vacancies for up to 24 months during the four years of the demonstration. Approximately one-quarter of sites reported that their part-time NCCs did not have sufficient time to fulfill all duties as required by the study. Team leads, who were not nurses themselves, reported difficulty supervising the nurses on their teams. During in-depth interviews, NCCs exhibited confusion about their responsibilities; some had erroneous understanding of their duties. Furthermore, NCCs had difficulty engaging prescribers external to their organization for medication management, a key service per the design of the study.

E1.3 Perspectives on SED Services Provided

To answer the question, “What services did sites provide; what services did participants and staff consider useful; and what services, if any, did they consider not useful?” we rely on two kinds of sources. We examine service uptake to understand what services participants used across the study enrollment period. We also describe providers’ and participants’ assessment of the appropriateness and usefulness of the services as designed.

SED providers consistently remarked that participants were not ready to engage IPS SE services at enrollment. According to providers, many participants began IPS services with many competing priorities, including needs for shelter and other basic necessities, and the need to manage untreated and undertreated physical and mental illnesses. These participants frequently prioritized meeting these needs over participating in a rapid job search.

Care management was a crucial service for remedying participants’ immediate needs. Care managers provided referrals and coordination across all basic areas of need. Slightly less than half of all participants received assistance with housing; more than half received help with medical care; and more than 60 percent received help managing symptoms of physical and/or mental illnesses. Other types of assistance included dental care, optometry, food, clothing, legal help, childcare, and transportation. Because the SED study design did not anticipate the range, seriousness, and complexity of the physical illnesses with which participants presented, the design did not require that care managers (and other non-nursing staff) have training to address participants’ medical needs. Particularly when serving Basic-Service participants (who did not have access to a licensed nurse), care managers were at times unsure how to proceed to assist participants with health needs.

Problem-solving therapy (PST) was an evidence-based psychosocial intervention service provided by care managers. It was a relatively under-utilized service; only 39 percent of participants ever engaged in PST. Care managers reported that participants lacked interest in the service.

The importance of, and frequency with which, providers delivered outreach and engagement services were unanticipated by the study design. IPS specialists, care managers, NCCs, and sometimes, team leads provided these services. Outreach and engagement involved attempting to contact the participant by phone, sometimes multiple times, over the course of a month. It also included more vigorous attempts to reach participants, including visiting their last known addresses, and calling family members, friends, and other contacts (with prior permission) to locate the participant. Each month, SED service providers made outreach attempts to an average of 36 percent of the participants on their caseloads.

Full-Service participants and Full-Service providers perceived the addition of the NCC to the team as very valuable. They indicated that NCCs helped some participants improve health behaviors, especially behaviors related to compliance with treatment for chronic physical impairments.

Medication management support (MMS) services were less useful than anticipated. The SED assessed the value added by the NCC to the Full-Service team over the outcomes for participants in Basic-Service. The NCC had been a key component of the multi-element intervention in the Mental Health Treatment Study, and SSA wanted to know if that element would be an integral component in the effectiveness of the Full-Service intervention. The SED study design assesses whether SED participants who were on a Full-Service team and were expected to have received MMS services in addition to IPS and behavioral health services experience better outcomes than those who received IPS and behavioral health services alone, or care as usual (per the Usual Services arm). However, more than 55 percent of Full-Service participants did not require their NCC to liaise with a prescriber. This failure is in largest part due either to a lack of perceived need for psychiatric medication, or to Full-Service participants' refusal of evaluations for medication.

E1.4 Barriers to Service Engagement and Employment

The question "What programmatic disincentives create barriers for denied applicants with mental illness to return to work?" suggests that serious mental illness was the main factor impeding denied applicants' employment. While participants exhibited symptoms of mental illness, on average they experienced symptoms of personality disorders, posttraumatic stress disorder (PTSD), anxiety disorders, and various depressive disorders more frequently than symptoms of schizophrenia, severe bipolar disorder, or severe major depression. In addition to mental health problems, participants experienced serious physical impairments. Other barriers to achieving employment goals included housing instability, food insecurity, lack of reliable transportation, substance use, criminal justice involvement, and under-treatment and lack of treatment for physical and mental impairments.

The major programmatic disincentive to employment for participants was the continued interest by many of them to qualify for disability benefits and the necessity to demonstrate to SSA that they were unable to engage in substantial gainful activity in order to qualify. Participants described that they worried that if they should return to work, they may not qualify for disability benefits upon appeal or re-application. Participants who had retained the services of a lawyer sometimes told interviewers that their lawyer told them not to work while their case was pending.

Participants' priorities to meet unmet basic needs for housing, medical care, food, income, and transportation before meeting employment goals were not the only challenge to IPS SE service engagement. SED providers remarked that many participants had never engaged in community mental health or social services before SED enrollment. According to providers, "treatment-naïve" participants required a period of orientation and socialization to the role of client. Some participants did not want to receive services at a community mental health center (CMHC) despite expressing an interest in employment.

E1.5 Payments for Employment-Related Necessities

The SED required all demonstration sites to provide services to meet the work-related needs of treatment-arm participants. Sites had access to limited funds to assist participants with paying for healthcare but also work-related expenses, and fines and fees that inhibited employment. The intention of reimbursement funds was to help participants with challenges SED service provider teams deemed immediate barriers to participants' employment goals. These included a variety of participants' financial obligations, keeping stable housing, and affording work-related expenses. Funding for health-, dental-, and job-related services and items was useful for helping participants overcome barriers. In addition, needy participants working toward employment received financial assistance intended to stabilize their living situation or provide access to transportation.

E1.6 SED Service Delivery Termination and Transitions

SED service providers reported no major challenges transitioning participants to appropriate services at the end of the study, when requested by participants. Some participants sought, and enrolled in, further employment and care management services; however, participants who had not engaged during the SED were less likely to want to continue services after the study period. The eligibility requirements of CMHCs sometimes precluded referrals for participants who were not Medicaid recipients, or for those who did not have a qualifying medical diagnosis of mental illness.

E1.7 Implications for Outcomes

There are several implications of the process evaluation for expected outcomes. Some implications include the following:

1. Because we observed good implementation of the intervention in most sites, we expect that there will be outcome differences between the treatment arms and the Usual Services (control) arm. In-depth interviews with service providers and participants suggested that implementation was good; fidelity scores and related observations over the course of the demonstration confirmed good implementation of the IPS and NCC models.

2. Because SED participants began to receive IPS SE services at an earlier point in behavioral health service involvement than most clients or study subjects recruited for IPS SE services, they experienced engagement challenges more similar to first-time CMHC clients than to established CMHC clients. This may mean that the effects of the intervention might be delayed and increase as the demonstration effects evolve. Furthermore, assessing outcomes across all participants using the intent-to-treat principle may underestimate the magnitude of treatment effect among those participants who adhered to treatment.

3. While the NCC was an important component of Full-Service treatment, NCCs' reported successes are unlikely to impact aggregated employment or health outcomes significantly for the Full-Service treatment arm, because only a minority of participants received NCC services beyond medication evaluation. As noted, above, while we expect to find differences in outcomes between the two types of treatment-arm participants and those in the Usual Services arm of the trial, we would not expect to find differences between the Basic-Service participants and those in the Full-Service arm.

4. Pandemic-mitigation measures, instituted around mid-March 2020 (24 months to 28 months after participant enrollment), made it difficult to adhere to the IPS SE model specifying in-person delivery of services. These changes in service delivery may impact study outcomes.

5. Shifts in the number and kinds of jobs available in local job markets, the number and quality of contact with hiring managers, and other pandemic-related changes to the U.S. economy influenced employment options for participants. However, the direction of the net effect is unclear.

E1.8 Recommendations

This section of the report addresses the following question: “What specific programmatic changes may SSA make to support the efforts of people with mental illness in their attempt to sustain competitive employment?” We make the following recommendations based on process evaluation findings:

1. Tailor support services to fit the needs of the population of denied applicants with alleged mental illnesses.
    a. Incorporate services to treat the most frequently experienced mental disorders of participants, including personality disorders, PTSD, and other anxiety-related disorders.
    b. Include case management services to address participants’ physical impairments, diseases, and pain. Future programs might consider including medical social workers on treatment teams to assist participants with their physical impairments.
    c. Facilitate access to funds and services for addressing housing instability, lack of access to healthcare, transportation, and other barriers related to poverty.
2. Include outreach and engagement services in the package of SED services.
3. Many participants began services with little experience of community mental health services and ambivalence about receiving services. These participants were a challenge to engage. SED providers adjusted to their needs quickly and delivered substantial outreach services. However, explicitly preparing providers to deliver these services will empower them and alleviate pressure on treatment teams to deliver bona fide IPS SE services to participants who do not take up offered services initially.
4. Increase the flexibility of staff members on well-integrated, multidisciplinary service delivery teams. The SED’s multidisciplinary teams were uniquely suited to a flexible approach to service delivery. As such, they were able to meet a variety of participants’ unanticipated needs.
5. Provide increased resources and services to assist denied applicants with meeting unmet needs and consider increasing assistance for placing needy participants in affordable housing. The SED provided funds to help engaged participants to meet urgent needs for housing, utilities, legal assistance, childcare, medical care, and transportation. These payments helped stabilize participants, allowing them to work toward employment goals. Finding stable housing for some participants remained a substantial challenge in some participants’ communities.

1. Introduction

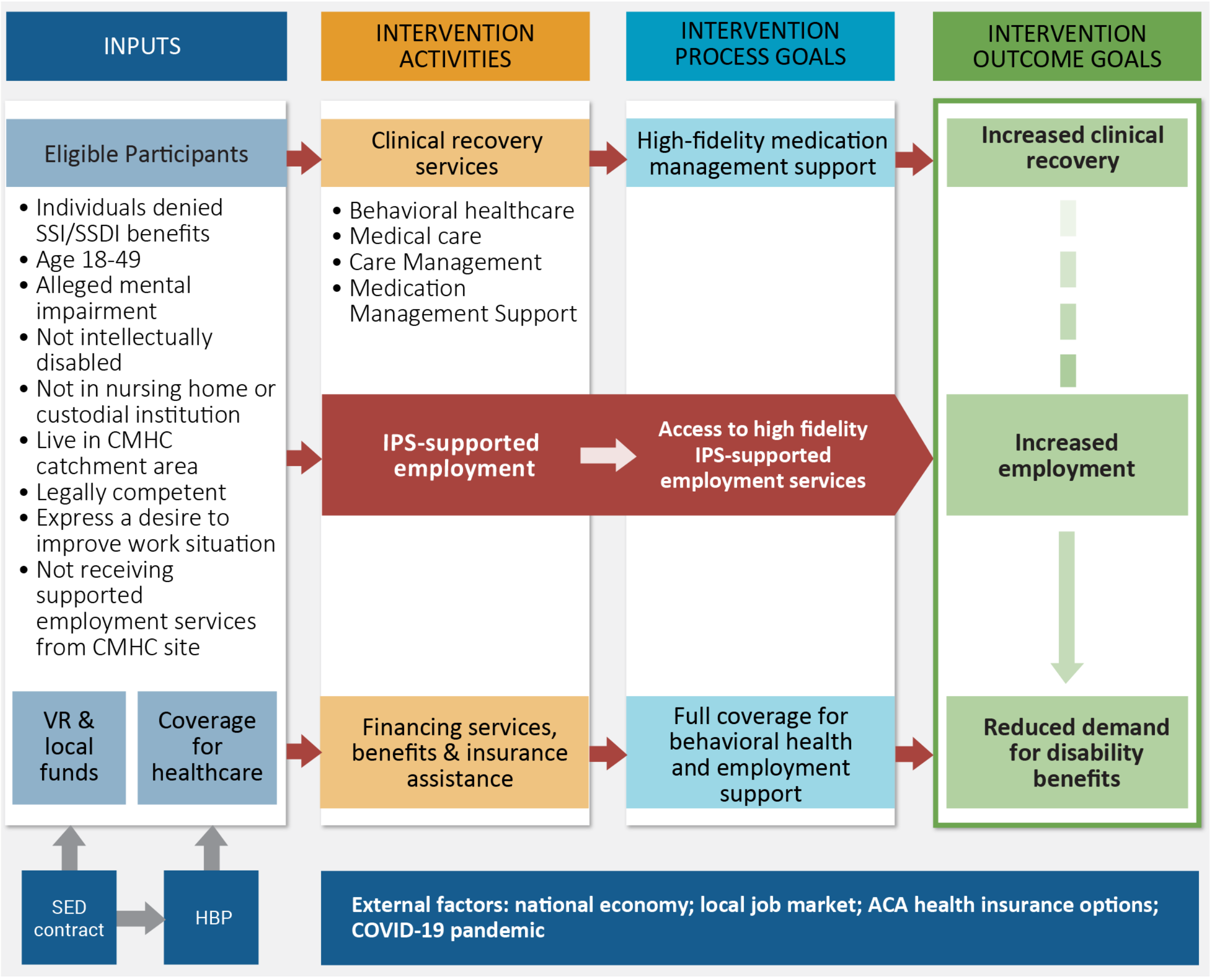
The Supported Employment Demonstration (SED) provided an experimental test of two interventions intended to improve various outcomes for individuals who the Social Security Administration (SSA) denied disability benefits on initial determination after evaluation for a mental impairment. Employment is the primary outcome of interest for the SED interventions, with improved clinical recovery and reduced demand for disability benefits as secondary outcomes of interest. The interventions included evidence-based supported employment (SE) and integrated behavioral health services, as well as additional funds to cover co-pays or deductibles associated with medical treatment, work-related expenses, and short-term financial assistance intended to help resolve financial crises that create barriers to employment.

The theory of the SED is that early intervention with evidence-based clinical and rehabilitative activities, if provided early after the point of disability onset but before SSA determines an individual as eligible for benefits, will improve clinical recovery and increase employment. The key anticipated result is that participant will not get on the SSA disability rolls or will have delayed need for benefits. Exhibit 1-1 depicts this theory in more detail as a logic model for the SED. Substantial evidence suggests that the Individual Placement and Support (IPS) model of SE integrated with behavioral health services improve employment and clinical recovery outcomes (Bond, Drake & Becker, 2012; Brinchmann et al., 2019; Frederick & VanderWeele, 2019; Kinoshita et al., 2013; Marshall et al., 2014; Metcalfe, Drake & Bond, 2018; Modini et al., 2016; Suijkerbuijk et al., 2017). Research has demonstrated these improvements with individuals who are already on disability in multiple clinical trials and in the SSA Mental Health Treatment Study (MHTS) (Drake et al., 2016). The SED tested whether improved outcomes are achievable with individuals at an earlier stage in their history of disablement and in the process of SSA's benefits evaluation process.

The SED compared outcomes in each of three experimental arms with approximately 1,000 individuals per arm, all of whom received denials from SSA on their initial disability benefits application. Implementation of the demonstration occurred in 30 selected sites nationwide. Participants randomly assigned to each of the two intervention arms received IPS SE, integrated behavioral health services, and financial supports for approved services and expenses. In addition to these services, characterized as the Basic-Service array of services, individuals in the Full-Service arm also received the services of a Nurse Care Coordinator (NCC). A multi-component Full-Service included a team lead, at least one IPS specialist, a care manager, an NCC, and access to a medication prescriber. The team providing Basic-Service treatment replicated the Full-Service team with one critical exception—the team lacked an NCC. Hence, the SED presented an opportunity to assess the effectiveness of the enhancement of the NCC in Full-Service, over and above the effects of Basic-Service alone. We compare both intervention arms to the counterfactual condition of the Usual Services (control) arm of the SED in which individuals randomized to this arm received an information packet listing services available in their communities. Participants in each of the three conditions who lacked health insurance received access to needed healthcare and help finding health insurance. We referred uninsured participants to federally qualified health centers or study-approved public clinics that offer medical services free of charge or on a sliding scale. The study paid for healthcare expenses for these uninsured participants until they could enroll in an insurance plan through their state's Health Exchange (Marketplace) during the Affordable Care Act (ACA) Open Enrollment Period.

The evaluation of the SED has four main components—the Participation Analysis, the Process Evaluation, the Impact Evaluation, and the Benefit-Cost Analysis—with an emphasis on the process and impact evaluations. The logic model presented in Exhibit 1-1 illustrates the elements of these two critical evaluation components.

Exhibit 1-1. Supported employment demonstration logic model



This final report presents findings from the process evaluation based on data collected over the four years of demonstration implementation. It focuses on intervention activities and the intervention process goals, as outlined in the logic model, focusing on the implementation of treatment services and their fidelity to the service models. This report also focuses on the experiences of the clinicians, service providers, and administrators involved in the implementation of the SED. In addition, treatment participants provided opinions on their experiences for this report. The overall objective of the process evaluation is to assess whether Westat and the sites implemented the SED as intended and to identify lessons learned from the processes associated with implementation. The analyses in this report enhance the evaluators' ability to interpret the findings of the impact evaluation.

The process evaluation intends to assist SSA in answering four key research questions:

1. How did sites implement the demonstration, and what was the level of fidelity to the design?
2. What services did sites provide; which services did participants and staff consider useful; and which services, if any, did they consider not useful?
3. What programmatic disincentives create barriers for denied applicants with mental illness to return to work?
4. What specific programmatic changes may SSA make to support the efforts of people with mental illness in their attempts to sustain competitive employment?

Among other elements of the evaluation, the process evaluation assesses the fidelity of the SED services to the intended model for IPS and other related services. Throughout the study, fidelity reviewers performed yearly fidelity assessments for Years 1-3. No fidelity assessment took place for Year 4[1] due to the pandemic. Assessments identified aspects of the SED program operations that required additional technical assistance. The process evaluation also includes descriptions of the experiences of SED participants, from their recruitment and enrollment to their engagement (or disengagement), with services in the Demonstration. Finally, it discusses implications for expanding SED-type services in other communities or implementing some of its features through changes in policy.

This final report begins with a description of data sources, including in-person site visits, Monthly Service Use Checklists, and fidelity assessments. Chapter 3 describes how sites implemented the services comprising Basic- and Full-Service treatments, reports on demonstration fidelity to IPS and to medication management support (MMS) services, and presents staff turnover as an implementation barrier. This chapter answers the first question above: "How did sites implement the demonstration, and what was the level of fidelity to the design?" We conclude this chapter describing how the pandemic, beginning in 2020, affected service delivery and fidelity to the design of the study. In answer to the second question above, "What services did sites provide; which services did participants and staff consider useful; and which services, if any, did they consider not useful?", Chapter 4 provides descriptive statistics for participants' service usage and reports the perspectives of participants and providers on the relative usefulness of SED services for assisting participants with employment and health needs. Chapter 5 addresses the question of what barriers, including programmatic disincentives, existed for SED participants as they sought employment. Chapter 6 describes a crucial component of the SED—payments for necessary goods and services that allowed participants to overcome barriers to employment. Chapter 7 describes termination of the SED demonstration and related activities to transition participants to appropriate services. In Chapter 8, we discuss the implications of process evaluation findings for expected outcomes. Chapter 9 makes recommendations for how SSA may assist denied applicants with alleged mental illness sustain competitive employment based on findings of the process evaluation.

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[1] Note that while the study provided three years of services to each participant, due to rolling enrollment during the first year, the demonstration lasted four years.

2. Data Sources

This Process Evaluation Report relies on multiple sources of data collected routinely during SED implementation. These sources included the Monthly Service Use Checklist completed by SED service providers on behalf of every treatment-arm participant and fidelity measures of IPS SE MMS services. Qualitative data collection included key informant interviews with site staff, person-centered interviews with participants, focus groups with participants, extended ethnographies with select participants, and observations of service delivery. We conducted both on-site and remote interviews and observations with demonstration site staff and participants in all three study arms. Remote interviews became a necessity following lockdowns due to the pandemic.

Implementation of the SED began in December 2017 upon enrollment of our first SED participants. Enrollment of the full complement of study participants ended in March 2019. Given the 3-year participation period for the last study participant, SED implementation ended 3 years later in March 2022.[2]

The process evaluation, which addresses the four research questions outlined in the previous introductory chapter, has three key cross-cutting aims. One aim was to understand as much as we could about SED implementation at the demonstration sites. In doing so, we gathered input from site staff explaining how they implemented the SED, their perceptions of the characteristics and needs of SED participants, and how they adjusted their services to fit participants' unique characteristics and needs over the time of study participation. A second aim was to understand the lives and motivations of study participants. We wanted to hear from participants about their lives at present, how they came to apply for disability benefits, why they decided to join the study, their expectations for the study, how they perceived the study as they engaged with services over time, and what their experiences were up to the time of the interviews. Due to lockdowns and COVID-19 mitigation efforts in 2020 and 2021, the process evaluation questions included probes to elicit discussion of changes due to the pandemic. Finally, study documentation of reimbursements for a wide range of medical and pertinent living expenses aided evaluators' understanding of the types of barriers faced by participants in the two treatment groups as they attempted to return to work.

A third aim of the process evaluation was to understand SED staff and participant perceptions of the environmental factors that form the context for the services provided or received. Among the topics of interest were perceptions of state and local policies (e.g., availability of and access to healthcare), types of employment locally available, community supports, and barriers toward assistance and work. This contextual information also helped the evaluation team to understand what might account for any observed site-level differences in outcomes.

The process evaluation also includes an assessment of two complementary aspects of implementation that reflect internal validity. One is a formal (independent) assessment of whether treatment providers delivered services as planned (referred to as *fidelity assessments*). The second aspect concerned the extent to which treatment group participants engaged with the services available to them. We developed a Monthly Service Use Checklist to collect quantitative data related to monthly service engagement, in addition to collecting qualitative data through the process and fidelity assessments. Analysis of the checklist data provides a description of the services provided

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[2] We collected data each demonstration year, beginning in the early summer months and ending by the fall. The exception was the final year of data collection, which ended in June 2021.

to and received by participants in the treatment groups. SED team members used the checklist to document services rendered to each study participant in the Full-Service and Basic-Service treatment groups at the end of each month. Please see Appendix A for the Monthly Service Use Checklist. The following sections provide a brief overview of each data source, the types of data collected, and the schedule for data collection.

2.1 Monthly Service Use Checklist

The implementation team developed the Monthly Service Use Checklist to monitor engagement in SED services provided to study participants. The primary intent was to obtain a measure of face-to-face encounters in each month of study participation and the nature of those encounters. Team leads completed a checklist monthly for each participant with input from team members. Team leads entered the data directly into the study's electronic management information system (MIS). The MIS provided automated lists of participants with upcoming checklist completion due dates to facilitate timely completion based on participant enrollment dates.

The checklist (appearing in Appendix A) provided information on monthly participant engagement in seven areas: (1) circumstances that precluded face-to-face meetings with demonstration site staff, (2) number of face-to-face meetings with the IPS specialist and types of IPS services received, (3) number of opportunities to receive problem-solving therapy (PST), (4) number of face-to-face meetings with the care manager and types of services received, (5) MMS services received and specialty referrals, (6) employment status and job development activities, and (7) school and vocational training.

During the pandemic, SED staff members provided much service delivery remotely, rather than during face-to-face encounters. The implementation team added additional questions to capture whether participants became ill with COVID-19 and how the pandemic influenced their health and employment. Initially, site staff expressed confusion on how to complete engagement survey items during work-at-home mandates with some sites including counts for video conferencing, others including any encounter, and many including neither in their participant counts since most contact was by phone. The implementation team communicated to team leads that when pandemic-mitigation efforts were in place, staff members should complete the Monthly Service Use Checklist as if they had met with the participant face-to-face but indicate in the notes that they delivered services remotely.

2.2 Fidelity Assessment

The fidelity assessment was an independent component within the process evaluation to measure how closely SED teams followed the IPS and MMS models. Understanding fidelity is critical to communications about the extent of treatment implementation and to future replicability. Previous IPS research demonstrates that implementations that adhere closely to the evidence-based model are more effective than those that have low fidelity. The more that demonstration sites provide services in accordance with the model, the greater the likelihood of observing positive outcomes.

The key aims of the fidelity assessment were to: (1) rate each site using the standard 25-item IPS Fidelity Scale (Becker, et al., 2015); and (2) score an 18-item NCC Fidelity Scale and 16-item MMS Fidelity Scale for each site. Year 3 fidelity assessments captured pre-pandemic service delivery, and Year 4 fidelity assessments elicited narrative pertaining to implementation of the fidelity components to understand how the pandemic influenced service delivery. Qualitative data came from: (1) SED and agency staff, (2) study participants, (3) observations of service delivery activities (SED team meetings and job development meetings), and (4) participant records (chart reviews).

Each fidelity assessment of the 30 demonstration sites in Years 1-3 included two reviewers over a 2-day period. In Year 3, teams of two reviewers conducted interviews and observations remotely over a period of a work week. Each team included experienced IPS fidelity reviewers from across the country. Two leads, each with over 15 years of experience in IPS, conducted training each year to orient fidelity reviewers to the SED study, oversaw the site visit scheduling process, led orientation calls with sites and fidelity reviewers, and answered fidelity reviewers' technical questions, as needed.

In Year 1, there were a total of 12 consultant reviewers and the 2 leads, while in Years 2 and 3, teams drew upon 15 consultant reviewers and the 2 leads. In Year 4, the 2 leads (Tina Marshall and Lou Kurtz) conducted in-depth interviews with staff members on the SED service provision teams. Over four years, a total of 22 reviewers conducted SED fidelity reviews. The reviewers were a diverse group: 6 men and 16 women; 5 appeared to be over 50 years of age and 17 appeared to be between the ages of 21-50. Both fidelity leads, one female and one male, were over 45 years old. In terms of race, among the 22 reviewers, 20 were White, 1 was Hispanic, and 1 was Asian.

2.3 Interviews and Observations

Each process evaluation visit to the 30 demonstration sites in Years 1 and 2 involved two evaluators over a 4-day period. Each team included a senior evaluator and a research assistant. Senior evaluators were interviewers with knowledge of community mental health centers (CMHCs) and qualitative methods. Research assistants were Westat employees with interests in qualitative research and in-depth interviewing. Exhibit 2-1 outlines the person-centered recruitment process for Year 1. In Year 3, teams conducted interviews and observations remotely over a period of a work week. In Year 4, the three senior evaluators (Jocelyn Marrow, Tamara Daley, and Howard Goldman) conducted in-depth interviews with all staff members. For interviewing participants and nonparticipants associated with each site in Year 4, at least one former visitor to the site during Years 1-3 conducted the in-depth interviews. Over four years, a total of 25 process evaluators worked on the project as interviewers. Twenty visitors were women and five were men. Nineteen process evaluators appeared to be between the ages of 21-50 years during the first year of data collection (18-50 was the age range of SED participants). Six process evaluators were over 50 years of age. Senior process evaluators were generally over 30 years old, and most junior process evaluators were in their twenties. Among the 25 process evaluators, 17 were White, five were Black, two were Hispanic, two were Asian, and one was mixed race. Over the course of 120 separate process evaluation "visits" (including remote visits), 72 percent of teams included at least one minority process evaluator.

Qualitative process evaluation data comes from a combination of five sources and methods; including (1) key informant interviews with SED staff; (2) focus groups with treatment-arm participants; (3) person-centered interviews with SED participants from all three study arms and nonparticipants (see Exhibit 2-1); (4) observations of service delivery activities (site staff engaging with study participants); and (5) extended ethnographies. The extended ethnographies were added to data collections in the second year of site visits. Following the Year 1 interviews, Westat believed that extended ethnographies depicting "a day in the life" of participants would provide a richer and more complete understanding of their lives. Thus, in Year 2, extended ethnographic observations of SED participants in everyday contexts took place at half of the 30 sites. Together, these five sources of information became the basis for the qualitative study of the SED.

Exhibit 2-1. Person-centered interviewee recruitment process for Year 1

1. Sort potential interviewees by group: Full-Service, Basic-Service, Usual Services, or non-enrollees.
2. Create a spreadsheet with the random assignment number, name, and contact information of each group of enrollees and non-enrollees.
3. Run a “services received by study” report to assess the engagement status of Full- and Basic-Service enrollees.
4. Randomize the order for beginning to call individuals using an online random sequence generator.
5. Call the first individual on the randomized list to see if they are willing to participate in an interview. Try several times before leaving a message. Leave a message with a call back number.
6. If the individual declines, or does not make contact after a reasonable period of time, proceed to call the next enrollee on the list.
7. Repeat steps 5 and 6 until reaching an individual in the appropriate category who agrees to participate.
8. Send the appropriate follow-up letter.

Due to pandemic, two evaluators conducted Year 3 and 4 data collection remotely using Federal Risk and Authorization Management Program (FedRAMP) Zoom. Year 3 included: (1) key informant interviews with SED staff, (2) person-centered interviews with SED participants (all three arms) and with some individuals who had declined to participate in the SED, and (3) observations of team meetings. In addition to the person-centered interviews, Year 4 data collection included an interview with the SED team lead and a focus group of SED staff. Westat recorded all interviews with permission from staff and participants. In nearly all cases, staff and participants gave permission to audio-record the proceedings. Study participants received a $40 honorarium for their participation in these activities. Since staff interviews took place in the course of their workday, members of staff did not receive an honorarium.

Appendix C includes details, including the numbers of staff and participants interviewed for the qualitative analysis, the process of selecting interviewees, and the rationale for different methods (focus groups vs. individual interviews). As shown in Table C-1, “Number of SED staff interviewed by staff role”, there were 654 key informant interviews with SED staff for the process evaluation over the four years. Participants and nonparticipants who provided in-depth interviews (n=310), attended a focus group (n=92), and/or allowed process evaluators to observe them (n=80) matched the demographic profile of all eligible study participants (n=2,944), with the exception of study participants who described themselves as Hispanic or of “two or more races.” That is, Hispanic participants and participants of two or more races were underrepresented among process evaluation interviewees and focus group participants. Table C-5, “Unique interviewees (incl. focus group participants) ethnicity, race, gender, and age” presents details about the demographics of participants involved in interviews, focus groups, and observations. Female participants were slightly overrepresented in process evaluation data collection activities, but the difference was not significant at the $p<0.05$ level.

3. Demonstration Implementation and Fidelity

Summary of Findings

- Multidisciplinary teams of service providers appeared to facilitate the delivery of high-quality SED services that responded flexibly to the unanticipated needs and challenges posed by this unique population.
- On average, IPS SE service implementation fidelity ratings were good for the years they were measurable (2018-2020).
- Service providers worked closely with the implementation team to continue to deliver high-quality IPS SE services remotely beginning in March 2020.
- There were challenges to implementing the NCC role as intended, including NCC turnover, insufficient hours dedicated to the role, NCCs' confusion regarding duties, and difficulties liaising with prescribers external to the team's organization.

This chapter addresses the following question from SSA's Statement of Work (SS00-16-60014, p. 4): "How did sites implement the demonstration, and what was the level of fidelity to the design?" Fidelity assessment using the standard 25-item Fidelity Scale of the IPS SE services delivered at all 30 sites over the first three demonstration years indicated that, overall, IPS SE services were implemented as intended by the study design; fidelity ratings were good, on average. Fidelity reviewers also used an 18-items NCC Fidelity scale to measure NCC services delivered in 2018 and 2019. Subsequently, fidelity reviewers assessed compliance with the SED study design qualitatively. In-depth interviews with SED service providers throughout all four years of the study helped us understand how service providers implemented the SED and the unique challenges to service delivery posed by pandemic-mitigation measures necessitating the delivery of services remotely.

Teams of SED service providers were multidisciplinary. IPS specialists, care managers, and (on Full-Service teams) nurses worked together under the supervision of a team lead on behalf of participants. Pre-pandemic, team members' offices or work spaces were co-located in most sites to facilitate good communication. Beginning around mid-March 2020, teams transitioned to off-site, remote work, keeping in contact with each other through digital means, including phone calls, emails, and texts. Throughout all four years, team members worked closely together, sometimes taking on tasks outside of their roles on the team (e.g., a team lead might have conducted outreach and engagement on behalf of participants who were difficult to engage in services). Fluidity in roles on the teams appeared to enhance quality service delivery: meeting the unanticipated needs and challenges posed by this unique population of participants on a timely basis; preventing burnout among team members by sharing responsibilities for managing crises; and covering the team's responsibilities adequately when there was staff turnover.

Because IPS SE services were designed for in-person delivery, their effectiveness when provided remotely is unknown, although there is some emerging evidence from recent studies that the effectiveness of IPS SE services delivered remotely under pandemic-mitigation measures remains good (Drake, Sederer, Becker & Bond, 2021). The implementation team worked closely with sites to deliver the best services possible under pandemic-related lockdowns and social-distancing mandates. Providers noted several challenges to remote IPS service delivery, including the lack of adequate technology possessed by participants for remote job development as well as difficulties contacting hiring managers.

Throughout all four years of the demonstration, there were several challenges related to implementing the NCC role properly. More than half of sites suffered from turnover in the NCC role. Seven sites experienced NCC vacancies from 1 month to up to 24 months during the four years of the demonstration. Approximately one-quarter of sites reported that their part-time NCCs did not have sufficient time to fulfill all duties as required by the study. Team leads, who were not nurses themselves, reported difficulty supervising the nurses on their teams. During in-depth interviews, NCCs exhibited confusion about their responsibilities; some had erroneous understanding of their duties. Furthermore, NCCs had difficulty engaging prescribers external to their organization for medication management, a key service according to the design of the study.

3.1 SED Service Provider Team Composition

Each year, evaluators collected information about SED teams such as staff experience levels, training, and turnover. Evaluators also collected data on team organization and functioning. The following sections describe staffing at the 30 demonstration sites, including SED team composition and the responsibilities of team members; communication and collaboration among team members; overlap of staff roles on teams; and staff turnover. For information about time allocation among SED team members, please see Appendix B.

SED service provider teams were multidisciplinary. Under the supervision of a team lead, IPS specialists, case managers, and nurses worked together to serve participants. Basic-Service teams included a team lead, at least one IPS specialist, and at least one care manager. Service provider staffing for the Full-Service teams was the same as for the Basic-Service team, with the addition of at least one NCC.

While good communication and collaboration among IPS SE team members is central to the IPS model, most CMHCs organize (non-SED) IPS SE teams homogenously with regard to discipline: team leads' direct reports are only IPS specialists. IPS specialists are "attached" to mental health treatment teams in which they advocate for the employment-related goals of their teams' clients (Swanson & Becker, 2013: 168-75; 203-204).

The unique multidisciplinary organization of SED teams facilitated communication across provider disciplines. SED teams demonstrated especially close collaboration among team members. In fact, while remaining well within team members' respective scope of practice, team member responsibilities sometimes overlapped. We hypothesize that the practice of team members' assuming the responsibilities of their teammates facilitated timely and sensitive responsiveness to participants' unique needs. We suggest that if SSA were to scale up IPS SE for all applicants with mental impairments that service providers' roles be similarly flexible.

A description of the intended role of each SED team member follows below.

- The **team lead** provided weekly supervision to SED team members, including reviewing participant cases, identifying new employment support strategies, and field mentoring for job development; led SED team meetings; communicated with mental health treatment team members; and reviewed outcomes and set goals to improve team performance. In Year 1, sites scored an average of 3.7 out of 5 related to the team lead fulfilling all the required roles of the SED supervisor. Sites that had low overall fidelity scores in Year 1 struggled with team supervision. Over the course of the study, team leads strengthened in their role as supervisors, as seen with increasing fidelity scores (average of 4 in Year 2 and 4.2 in Year 3).

- The **IPS specialist** provided employment services, including engagement, assessment, job development, job placement, job coaching, and follow-along supports.

- The **care manager** coordinated behavioral health and other services such as housing, legal assistance, and financial management; provided counseling to support participant well-being and employment such as PST; and supported the SED team with services such as helping participants obtain work clothing, linking participants to prescribers, and helping participants obtain financial assistance for medication co-pays. Care managers located financial help outside of the SED in addition to supporting requests for reimbursements from SED.

- The **NCC** provided Full-Service participants with clinical assessments to monitor medications, vitals, side effects, and avoidable prescribing practices; worked with participants to set medication goals; administered depression, anxiety, trauma, substance use, or attention deficit hyperactivity disorder (ADHD) scales; exchanged clinical information and rating scales with psychiatric medication prescribers; and liaised with primary and specialty care providers.

3.2 Team Collaboration and Communication

SED providers met weekly for Basic-Service and Full-Service team meetings. Evaluators reported from observations of team meetings that SED teams reviewed participants' status, coordinated care, and shared strategies to help participants meet their goals. Fidelity ratings demonstrated strong communication and coordination in Year 1 (average of 4.4 of 5) with ratings steadily increasing over time (Year 2 average=4.6; Year 3 average=4.7). Sites with preexisting IPS programs held weekly meetings for IPS specialist agency wide to share job leads, employment strategies, provide coverage for each other's caseloads, gain additional training on IPS, and receive group supervision. Those sites that did not offer IPS outside of the SED provided similar meetings weekly or bimonthly for IPS specialists and the team lead. Fidelity ratings showed that communication and collaboration through vocational unit meetings strengthened over the years, with average ratings increasing from 4.1 in Year 1 to 4.7 in Year 3.

Three-quarters of the sites (n=23; 77%) provided behavioral health services on site. The remaining sites had formal or informal relationships with partner agencies to provide behavioral healthcare (including psychotherapy using various modalities) and treatment for substance use, when needed. For the purpose of fidelity, sites received credit for communicating with the mental health treatment team if there was a care manager on the SED team. However, fidelity reviewers noted that at some sites the SED team was not as integrated with the agency mental health treatment team as required by the IPS SE model. The strength of the communications with external partner agencies also varied. That is, some partner agencies regularly exchanged information with the sites; others partner agencies did not.

In Year 4, due to COVID-19, sites were required to move to remote service delivery due to stay-at-home orders. When fidelity reviewers asked SED teams how the pandemic affected team communication and collaboration, most reported that they quickly transitioned to remote platforms and maintained team structure and communications, including weekly SED team meetings and vocational unit meetings. Team members from at least one-third of the sites (n=10; 33%) reported that they had phone, email, videoconferencing, or instant messaging daily with several, if not all, team members. Three sites increased meeting frequency (daily or biweekly) due to the pandemic. However, SED team members in one-fifth of the sites (n=6; 20%) reported less frequent communication due to the pandemic.

Two-thirds of the sites were able to make a seamless transition to remote work using electronic health records systems. Staff members at one-third of the sites (n=10; 33%) received agency-issued laptops; staff at another nine sites (30%) were also provided with agency-issued phones, and three sites provided compensation for personal phone use or Wi-Fi.

Another change during the pandemic was the nature of supervision. Team leads described frequent check-ins with staff and providing more emotional support to team members. While most sites (70-77%) were able to maintain the elements of high-fidelity supervision, more than half of the sites (n=16; 53%) indicated that field mentoring was suspended due to the pandemic, with several sites sharing that they found virtual field mentoring ineffective or uncomfortable for employers. Approximately one-third of team leads (n=9; 30%) continued some form of field mentoring for job development either virtually (by joining three-way calls or Zoom sessions) or by providing a limited amount of in-person employer contacts.

3.3 Staff Member Disciplines and Overlap of Duties

The evidence base for IPS SE services is predicated on IPS specialists providing only employment services. To maintain high fidelity, team members delivering SE should not provide case management or other services to clients. Despite a thorough understanding of this principle of IPS on teams at all the sites, the duties of SED providers with different roles sometimes overlapped. All members of SED teams conducted outreach and engagement to participants who wavered in their commitment to the SED to encourage them to make use of available services. Further, sites reported that care managers or NCCs would encourage employment and using employment services with participants who were not keeping appointments with their IPS specialists. All providers, including IPS specialists, assisted participants with obtaining basic necessities, including transportation, food, clothing, and shelter. Staff members sometimes reached out to participants on behalf of another provider with a different role when the participant had reached an impasse with a given provider to explore whether a fresh perspective could resolve the problem. In addition, staff members took turns interfacing with participants whom the team experienced as hostile, critical, or threatening.

Despite verbal reports of IPS specialists whose duties included outreach and engagement, referrals, and some care management, sites scored high (4.4/4.5/4.5 Years 1-3) on the Supported Employment Fidelity Scale item “employment services staff.” This may be because IPS specialists interpreted the delivery of other services as preparatory for employment (and thus, part of their responsibilities). For example, an IPS specialist might conduct outreach to a participant’s home with the goal of encouraging them to engage with services. As another example, some IPS specialists assisted participants with transportation to work sites.

During the pandemic, roles among team members appeared to become even more flexible than before. In Year 4, especially early in the pandemic, almost half of the sites (n=14; 47%) reported to fidelity reviewers that IPS specialists provided services in addition to SE such as assisting with general outreach, COVID-19 education, medication refills, housing, unemployment relief, and food delivery. One-fifth of the sites (n=6; 20%) indicated that IPS specialists were assisting with care management duties on an ongoing basis during the pandemic. In most cases, this was due to turnover in care manager positions. Eleven sites (37%) had turnover in the care manager position with a gap in the team for two months or more. Three sites did not refill the position but instead the team lead took on care manager duties. In the final months of the demonstration, IPS specialists at three sites reported spending 30 percent time or more transitioning participants out of the study.

Throughout all four years of the demonstration, care managers interviewed reported that they provided some level of care coordination to participants who received psychiatric services, including making appointment reminders and facilitating participants' medication refills. In Year 4, three-quarters (n=23; 77%) of the sites' care managers reported referring or coordinating primary or other medical specialty care or preparing participants for upcoming appointments. For example, a care manager stated that she did "many of the same things that the NCC did"; while another care manager at a different site reported that she attempted to reach out to external prescribers to communicate information similar to that communicated by the NCC, she did not "have the time to do the follow-up that the NCC did for the Full-Service participants." We discuss this overlap of duties in more detail in the section on nurse care coordination and in the section on termination and transitions off of the study.

The overlap of tasks performed by team members of the SED teams constituted occasional overlapping of provider roles, increasing during pandemic mitigation in the final two years of the study. All team members conducted substantial outreach and engagement to disengaged participants; care managers and NCCs coordinated medical care for participants; and IPS specialists and NCCs assisted care managers with meeting participants' basic needs for shelter, food, and clothing. Team members took turns dealing with hostile, threatening, or otherwise challenging participants who were most likely to "burn out" providers.

The phenomenon of role overlap on SED teams may be a response to the unique characteristics of SED participants in comparison to "usual" IPS SE clients seen at the sites. As discussed in further detail in subsequent chapters, SED teams reported that a substantial number of participants began to receive services during crises due to housing instability, unmanaged health conditions, lack of access to basic necessities, justice involvement, and violence, among other challenging circumstances. Some participants were unfamiliar with, or resistant to, receiving services. Participants who experienced crises frequently wanted help addressing those issues before they could dedicate time and energy to meeting their employment goals. The challenging circumstances in which participants received services meant that that all staff members, despite their discipline, assisted with meeting basic needs and resolving the crises. Furthermore, all staff members shouldered responsibility for conducting outreach to reluctant participants and encouraging engagement.

SED team members reported to the process evaluators that assuming overlapping roles allowed them to buffer some of the potential for burnout. Participants' difficulties, especially related to service disengagement, housing instability, substance abuse, and challenging behaviors, were tough to remediate. By sharing responsibilities for meeting participants' needs, individual SED staff members avoided becoming overwhelmed. In the process of sharing responsibilities, providers gathered multiple perspectives on intractable difficulties for later brainstorming effective solutions. In addition, staff members reported that at times SED participants preferred to work with certain members of the team than others. To respect these preferences and improve participant engagement, staff members felt that some blurring of roles was beneficial and permissible.

3.4 Staff Member Turnover

Staff turnover is a problem in community mental health and vocational service settings nationwide (Ross, Choy-Brown, Hu, Varas & Stanhope, 2022), and SED teams were not immune to it. Across all years, there was staff turnover at every site. On average, sites staffed six SED service providers (including team leads, IPS specialists, care managers, and NCCs) with a range of four providers at a half site, to a full site that averaged 13 providers, each on a part-time basis. The range of staff separations varied from 3 to 18 in the period from December 2017 to November 2021; the average number of separations was 7—an average turnover rate of 125 percent.

Turnover is a barrier to implementing evidence-based practices and may increase burnout among staff members who must assume caring for additional clients, at least until replacements are hired. Turnover among staff members also disrupts provider-client alliances (*Ibid.*). Process evaluators heard from several participants and staff members that participants would sometimes avoid new providers hired after their former provider left because they dreaded having to explain their circumstances and preferences again.

Team Lead Turnover. The team lead was the most stable position, with more than half of sites (n=17; 57%) having no change in team lead staffing across all years. Table 3-1 provides an overview of team lead turnover during the study.

Table 3-1. Number of sites with team lead[a] turnover by year

	From Y1 to Y2	From Y2 to Y3	From Y3 to Y4	End of Y4
# of sites with no turnover	24	24	29	28
# of sites with 1 turnover	5	6	1	2
# of sites with 2 turnovers	1	0	0	0
# of sites with full turnover of team lead positions	4	4	0	2

[a] Staff may have been part-time or full-time.

Team leads said they were the most affected by turnover in other positions on the team. Most team leads reported filling in for IPS specialists or care managers when team members left. At one site, the team lead also served as the care manager across all four years; at another site, the care manager received a promotion to team lead in Year 4 and subsequently fulfilled both positions.

NCC Turnover. Almost half of the sites (n=14; 47%) maintained the same NCC across all years. In any one year, almost three-quarters or more of sites experienced stable staffing (no turnover) for the NCC. Of the 16 sites that experienced turnover during the study, 13 sites (43%) had one NCC turnover, two sites had two NCCs turnovers, and one site had three NCCs turnovers. From Year 2 to Year 3, more than one-quarter of the sites (n=8; 27%) experienced total turnover in the position. Table 3-2 lists the NCC turnover by year.

Table 3-2. Number of sites with NCC[a] turnover by year

	From Y1 to Y2	From Y2 to Y3	From Y3 to Y4	End of Y4
# of sites with no turnover	24	22	28	27
# of sites with one turnover	6	8	2	2
# of sites with full turnover of NCC positions	4	8	1	0

[a] Staff members may have been part-time or full-time.

Finding qualified nurses to serve as NCCs was sometimes a challenge due to nursing shortages and highly competitive pay for nurses in some parts of the country. At times, sites experienced at least one month in which the role of NCC was unfilled, with a range of 1-24 months. Table 3-3 shows the full range of months of vacancy across these seven sites.

Table 3-3. Number of months of NCC vacancy during all demonstration years

# months of vacancy	0	1	2	3	5	6	24	Total
# of sites	23	1	2	1	1	1	1	30

IPS Specialist Turnover. The largest amount of turnover was in IPS SE staff positions. All sites experienced turnover among the IPS specialists at some point during SED implementation, as shown in Table 3-4. Between Years 1 and 2, almost one-quarter of the sites (n=7; 23%) experienced a total turnover with their IPS staff. Across the years, approximately half of the sites (between 43 and 63% percent; n=18 Year 2, n=19 Year 3, n=13 Year 4) experienced some turnover. One-third of the sites (n=10; 33%) lost staff during Year 4, with two sites losing all their SED IPS specialists.

Table 3-4. Number of sites with IPS specialist[c] turnover by year

	From Y1 to Y2	From Y2 to Y3	From Y3 to Y4	End of Y4
# of sites with no turnover	12	11	17	20
# of sites with 1 turnover	13	11	10	4
# of sites with 2 turnovers	4	7	2	2
# of sites with 3 turnovers	1	1	1	4[a]
# of sites with full turnover of IPS specialist positions	7	3	3	2[b]

[a] One site lost four IPS specialists.

[b] By the end of the study, two sites operated without an IPS specialist.

[c] Staff members may have been part-time or full-time.

Care Manager Turnover. One-fifth of the sites (n=6; 20%) had no change in care manager staffing across all years. While two-thirds of the sites experienced no turnover in Year 2, almost one-third (n=9; 30%) experienced full turnover in the care manager position. Between 20 and 40 percent of the sites across years experienced turnover in this position (see Table 3-5).

Table 3-5. Number of sites with care manager[a] turnover by year

	From Y1 to Y2[b]	From Y2 to Y3	From Y3 to Y4	End of Y4
# of sites with no turnover	20	18	24	27[c]
# of sites with 1 turnover	8	9	6	3
# of sites with 2 turnovers	2	3	0	0
# of sites with full turnover of care manager positions	9	4	1	0

[a] Staff members may have been part-time or full-time.

[b] One site had no care manager in Y1.

[c] At one site, the care manager became the team lead/care manager in the end of Y4.

3.5 IPS Supported Employment Services

SSA's intent in running the SED Demonstration was to discover if offering people who whose impairments were not severe enough to meet disability income eligibility criteria could benefit occupationally from a multicomponent intervention that offered employment and wraparound services. Over 23 randomized controlled trials support the effectiveness of IPS, an evidence-based intervention for people with serious mental illness who desire to work (Drake et al., 2016). Over the past two decades, practitioners and researchers have refined the infrastructure, implementation, procedures, and funding requirements to sustain quality IPS services in agencies with integrated mental healthcare. The most recent manual used by IPS trainees, *IPS Supported Employment: A Practical Guide* (Swanson & Becker, 2013) provides practical advice to service providers to implement high-fidelity IPS. Drake, Bond & Becker (2012) describe the core principles of IPS as:

1. **Competitive Employment.** Service providers view competitive employment (as opposed to employment set aside for people with disabilities) as the goal for clients who want to work.
2. **Zero Exclusion.** CMHCs exclude no clients from IPS because of symptoms, substance use, justice system involvement, job readiness, etc.
3. **Integrated Services.** IPS services integrate with mental health services.
4. **Worker Preferences.** Clients' preferences guide services provided, not clinical judgment.
5. **Benefits Planning.** Employment specialists help clients obtain information about how their earnings may impact their government benefits.
6. **Rapid Job Search.** The job search process is rapid; clients do not need lengthy assessments or training.
7. **Systematic Job Development.** Employment specialists develop relationships with potential employers on behalf of people on their caseload and potential people on their caseload.
8. **Time-Unlimited Support.** Support while employed ("follow-along supports") continue for as long as the client wants and needs.

During the most stringent lockdowns and shelter-in-place orders near the start of the pandemic, providers delivered IPS SE services, along with other SED services, remotely. Because the evidence base for remote delivery of IPS SE services is only emerging, it is unknown how effective the services are when not delivered face to face. While the implementation team worked closely with sites to deliver the best remote services possible under pandemic conditions, the evidence base for IPS SE depends on at least 65 percent face-to-face service delivery (Becker, Swanson, Reese, Bond, & McLean, 2015). Therefore, it is possible that SED outcomes related to participant employment may be less positive than they would be had the sites been able to continue to deliver services in person.

3.6 Fidelity to IPS Evidence-Based Model

The IPS fidelity assessment is one component of the SED process evaluation intended to assess whether sites are implementing the IPS model as intended. Understanding fidelity to the IPS model is critical to assessing implementation and to future replicability. Previous research on IPS demonstrates that implementations that adhere closely to the evidence-based model are more effective than those that have low fidelity. To the extent that demonstration sites met fidelity expectations, we can be confident that sites delivered IPS to participants as designed. Over the first three years of service delivery, fidelity assessments revealed that sites delivered services with good compliance to the IPS model.

Fidelity reviewers were able to measure fidelity using the standard 25-item IPS Fidelity Scale (*ibid.*) in demonstration years 1-3. However, pandemic-related lockdowns and mitigation measures affected the ability to conduct fidelity reviews using the Fidelity Scale. While reviewers were able to provide ratings on some items of the Fidelity Scale, we could not remotely rate many items and could not rate some aspects of remote service provision. Therefore, instead of providing fidelity ratings for Year 4, this report uses some fidelity criteria to provide a qualitative assessment of how closely service delivery cleaved to the model during the pandemic.

For Demonstration Years 1, 2, and 3, fidelity reviewers evaluated IPS implementation employing the standard 25-item IPS Fidelity Scale (Becker et al., 2015). Reviewers rated each item on a 5-point behaviorally anchored dimension, ranging from 1, representing lack of adherence, to 5, indicating close adherence to the model. Total scores (the sum of item scores) range from 25 to 125. Exhibit 3-1 provides four levels of fidelity for total scores.

Exhibit 3-1. IPS ratings
125-115 = Exemplary Fidelity
114-100 = Good Fidelity
99-74 = Fair Fidelity
73 and below = Not IPS

For the Year 1 baseline fidelity rating,

- 10 percent (n=3) scored as “exemplary fidelity” with an average of 116;
- 27 percent (n=8) scored as “good fidelity” with an average of 106;
- 57 percent of sites (n=17) scored as “fair fidelity” with an average of 90 on the IPS Fidelity Scale; and
- Two sites received a score of 73 or less, indicating “Not IPS.”

In Year 2,

- 10 percent of sites (n=3) scored as “exemplary fidelity” with an average of 116;
- 50 percent of sites (n=15) scored as “good fidelity” with an average of 106;
- 40 percent of sites (n=12) scored as “fair fidelity” with an average of 90; and
- There were no sites rated as “Not IPS.”

In Year 3,

- 17 percent of sites (n=5) scored as “exemplary fidelity” with an average of 117.4;
- 50 percent of sites (n=15) scored as “good fidelity” with an average of 105.6;
- 27 percent of sites (n=8) scored as “fair fidelity” with an average of 94.4;
- One site rated as “Not IPS;” and
- One site did not receive a rating due to staff turnover.

Overall, fidelity to IPS SE at the sites increased over the course of the study (see Exhibit 3-2 for average IPS fidelity ratings each year).

Exhibit 3-2. Total average IPS fidelity ratings by year

	Year 1	Year 2	Year 3
Total average fidelity rating	96	100	103
Number (%) of sites with exemplary ratings	3 (10%)	3 (10%)	5 (17%)
Number (%) of sites with good ratings	8 (27%)	15 (50%)	15 (50%)
Number (%) of sites with fair rating	17 (57%)	12 (40%)	8 (27%)
Number (%) of sites rated Not IPS Supported Employment	2 (7%)	0 (0%)	1 (3%)

On average, sites scored in the range of “fair” fidelity in the first year but increased to “good” fidelity by the second year. Similarly, assessment of services during the third year revealed, on average, “good” fidelity. Averaged across all three years (a total of 89[3] fidelity rating), the IPS component of the demonstration achieved “good” fidelity.

IPS SE services were designed for in-person service delivery, and the impact of remote delivery on outcomes is uncertain. However, emerging evidence from recent studies shows that the effectiveness of IPS SE services delivered remotely under pandemic-mitigation measures remains good (Drake et al., 2021b). While the implementation team worked closely with sites to deliver the best services possible under pandemic-related lockdowns and social-distancing mandates, the evidence base that IPS is effective when delivered remotely is lacking. Therefore, it is possible that

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[3] In the third year, one site could not be rated because all members of the staff turned over shortly before the fidelity review.

SED outcomes may be less positive than they would be had the sites been able to continue to deliver services face to face through the final year of the demonstration.

The IPS SE model requires IPS specialists to conduct an initial vocational assessment detailing participants' preferences and strengths and continually update it as the participant gains work experiences and skills. This assessment should guide an individualized job search, the central component of the fourth principle above, "Clients' preferences guide what services are provided, not clinical judgment."

Supported Employment Fidelity Scale Item

Ongoing Work-based Vocational Assessment. Initial vocational assessment occurs over 2-3 sessions and is updated with information from work experiences in competitive jobs. A vocational profile form that includes information about preferences, experiences, skills, current adjustment, strengths, personal contacts, and so forth, is updated with each new job experience. It aims at problem-solving using environmental assessments and consideration of reasonable accommodations. Sources of information include the client, treatment team, clinical records, and, with the client's permission, family members and previous employers (Swanson & Becker, 2013:209-10).

Average fidelity ratings for one of the core elements of the IPS model—ongoing work-based vocational assessment—did not change within sites substantially over the study. In the final year of assessment, high-fidelity sites successfully assessed participants' needs and interests and matched jobs, and sites with fair fidelity continued to struggle, especially with conducting ongoing work-based assessment, which remained at an overall average of 3.6 in Year 3 (Year 1=3.6; Year 2=3.4, with 5 the best possible score, and 1 the lowest possible score).

3.7 Pandemic-Related Changes to IPS SE Service Delivery

Beginning March 15, 2020, states and counties across the country began shutting down in-person operations to prevent the spread of COVID-19. Mitigation efforts included closing school facilities, bars, restaurants, and non-essential businesses that entailed in-person contact. To the extent possible, most government, nonprofit, and private businesses began transacting remotely. Clinics and social service organizations, including CMHCs, adjusted their workflow so that much service delivery became remote, and, if in-office appointments were necessary, providers took multiple precautions so that they could see patients safely. Mitigation efforts used during in-person contacts included wearing masks and "social distancing"—meeting in-person at a distance of at least six feet apart, in a well-ventilated space, preferably outdoors.

Of the four years of SED demonstration operations, SED direct service staff members provided almost a full two years of service delivery with more-and-less stringent COVID-mitigation strategies in place. From mid-July to late September 2021, during which time evaluators conducted the final round of remote site visits, most locations in the country still had attenuated mitigation protocols in place, with mask-wearing, social distancing, and virtual contacts whenever possible.

Pandemic-related Changes to Participants' Employment Options. There was consensus among SED service providers that the pandemic slowed progress toward participants' employment, but that they were eventually able to help participants find a job. According to SED IPS specialists, while some types of job opportunities became scarce during the initial six months to one year of the pandemic, other opportunities became more plentiful. Because of high customer demand, grocery stores began hiring more workers, and some participants who had been part-time grocery workers had the opportunity to become full-time. Stores also needed additional workers who would come for late shifts to clean when the store was not open. The pandemic created new types of jobs, such as contact tracers, and "screeners" who take the temperature of people entering buildings. Other job opportunities that continued or expanded included warehouse work, construction, delivery, and remote work.

However, during the first eight to nine months, in which many states were in "lockdowns," there were hiring freezes and layoffs in some "non-essential" service sectors due to temporary closures and downsizing. This made it more difficult to find some types of jobs for participants who wanted them. Clerical, reception, and administrative positions were scarcer, as were housekeeping and janitorial work in schools and businesses that became remote.

Remote work was especially appealing for many participants who had mobility impairments or anxiety. SED service providers reported that some participants who had trouble finding and sustaining employment before the pandemic found new remote opportunities due to pandemic-related shifts in the job market. Some of these participants had been searching for remote work before the pandemic without success.

Remote work presented some new challenges for some employed participants. Participants who had poor connectivity due to their home's rural location or lived in an environment with no privacy and many interruptions struggled with the shift to remote employment. An IPS specialist described a participant whose call center work shifted from in-office to remote during the pandemic. Her three children, one of whom was on the autism spectrum, lived at home with her. She quickly fell behind on her work due to the distractions in her home environment. Because she had fallen behind, her boss asked her to retake the training required for the job, which she could not complete due to her children. She decided to postpone work until she could return to the office.

As states and localities moved into reopening phases, job opportunities in general became more plentiful. Because many people did not want to go back to work during the early reopening phases, there was a greater quantity of available jobs for those who were looking for in-person work. SED staff said that because of the shortage of workers, many employers offered signing bonuses of higher wages in low-quality jobs such as fast food. As a team lead explained, "There's not a restaurant in this town that's not hiring for something. I'm talking about the nicest sit-down restaurant to every McDonald's. McDonald's is literally offering sign-on bonuses because they don't have enough people." An IPS specialist at another site explained that after the initial job losses people on her caseload experienced, they were able to help them return to work: "Pretty much all my clients who were working before and lost their jobs due to the pandemic are working again." At yet another site, an IPS specialist explained that 12 participants at her site lost work, but they had all successfully found new work after the initial lockdowns.

Remote Job Development. The number and quality of contacts with hiring managers suffered with remote job development**.** The IPS SE model requires IPS specialists to use the "Three Cups of Tea" (Scannevin, 2017) model to build relationships with employers through multiple, face-to-face visits where they learn about employer needs, convey what the IPS SE program offers, and describe client strengths. The first cup involves the IPS specialist introducing themselves to the business's gatekeepers, identifying a hiring manager, and requesting to schedule a second meeting with the manager. During the "second cup," the IPS specialists gathers more information about the nature of the work, job duties, the interpersonal environment, and what the hiring manager might expect or want in an employee. At the "third cup" the IPS specialist might describe (briefly, and with the client's permission) a client who might be a good match for the business and ask whether the manager might meet with the client.

In the first two years of the demonstration, in compliance with the evidence-based model, most job development occurred in-person at the place of business. During site visits, process evaluators sometimes had the opportunity to accompany IPS specialists as they conducted job development.

Fidelity assessment of IPS service delivery was strong for the periods of assessment (before March 2020). In Year 1, sites struggled to reach the number of required contacts with employers, rating an average of 2.8 for this fidelity item. There was some indication through interviews and documentation review that staffing issues (i.e., understaffing or turnover) may have contributed to employment specialists' inability to conduct sufficient job development. The quality of job development increased by Year 2 and remained strong across the three years (averages of 3.8, 3.9, and 3.9), and the frequency of employer contact also improved (3.3 in 2019 and 3.2 in 2020) from 2.8 in 2018.

In the first eight months of the pandemic, more than one-quarter of sites (n=8; 27%) reported to fidelity reviewers that job development stopped (ranging from 1 month to 8 months). Sites stopped job development due to business closures, employers who did not answer the phone, and staff transitioning to remote work.

Almost one-third of the sites (n=9; 30%) reported that phone and email job development was unsuccessful (i.e., IPS specialists did not receive responses). IPS specialists across all sites reported that they found it difficult to reach hiring managers on "cold calls" conducted by phone and email. Even when they had success making contact, they lost the personal touch that came from face-to-face interaction and struggled to build rapport with hiring managers.

Of the eight sites (27%) that reported some success with phone and email job development, IPS specialists reported that to make 3-6 "good" contacts required numerous outreaches; one site reported calling 100 businesses to get 4-6 contacts per week. Job development for remote office work was especially difficult; staff members found it nearly impossible to identify and get into contact with the hiring managers for these positions.

IPS specialists in five sites reported that they attempted to use videoconferencing (Zoom) with employers; two of these five indicated that employers were too busy to Zoom, and the remaining three were able to videoconference with some employers. A few sites tried to hold virtual job fairs, which they appraised as not as effective as in-person job fairs. IPS specialists in five sites reported attending virtual job fairs where they were able to virtually meet and speak with employers. A few IPS specialists conducted "job development" by searching online job websites such as Monster, Indeed, Snag-A-Job, LinkedIn, and Craigslist.

One-fifth of the sites (n=6; 20%) conducted some face-to-face job development during the pandemic. IPS specialists in three of the six sites reported that they conducted the in-person job development because phone and email outreaches were not working. Two IPS specialists indicated that they completed in-person job development "on personal time." One of the six sites indicated that they tried to conduct face-to-face job development, but employers restricted on-site visits.

Despite difficulties developing jobs at previously unfamiliar businesses, a couple of sites reported getting more responses than before the pandemic from hiring managers with whom they had established relationships. Employers welcomed the opportunity to vent about how lockdowns and mitigation efforts were affecting their businesses, and so they engaged more readily with the IPS specialists. IPS specialists found that communicating with responsive businesses by phone was a boon insofar as it saved time that they would have spent driving around the community.

Participants' Job Applications and Interviews. Participants' employment applications and interviews became more challenging during the pandemic**.** IPS specialists in at least 24 sites (80%) stated that the application process shifted from in-person and paper job applications to online applications. Several IPS specialists reported that participants had limited computer access, internet connectivity, and/or limited computer skills. Among those participants who did have reliable internet access, IPS specialists found that prepping for interviews and helping participants with applications became more difficult remotely. Service providers assisted participants in completing online applications through screen sharing or over the telephone. IPS specialists also helped participants set up emails, prepare for Zoom interviews, or conduct three-way calls with employers. Three sites indicated that their IPS specialists accompanied participants in visiting potential job sites or to job interviews.

Follow-along Supports. Follow-along support included new duties because of pandemic-related furloughs and layoffs**.** A variety of activities to help participants succeed in their job once they find employment comprises what the IPS community refers to as "follow-along supports." According to the model, once a client has a job, the IPS specialist should continue to meet with them at least once per month, adjusting the frequency depending on the client's needs and choices (Drake et al., 2012; IPSWorks.org). Support for employment might include everything from working alongside the client to help them learn their job duties, to mediating at workplaces on behalf of clients, to serving as a sounding board for workplace issues (Swanson & Becker, 2013).

Before the pandemic, a recurring theme of the process evaluation interviews was the difficulty of convincing participants to keep meeting with their IPS specialist once they had a job. IPS specialists urged participants to make and keep appointments with them and to allow them (and their colleagues) to help them manage any issues at the workplace before they might become bigger problems. For example, an IPS specialist said she gives the following advice: "Don't wait until it's too late and your job is gone." Fidelity scores in Years 1 and 2 reflect this struggle to provide follow-along supports. By Year 2, only two sites achieved the top fidelity rating for having frequent, time-unlimited supports. Fidelity reviewers reported that supports were inconsistent, with most sites lacking formal plans (n=18; 60%) to provide supports based on an assessment of participants' needs and preferences. In Year 2, at almost one-quarter of the sites (n=7; 23%), IPS specialists provided only phone check-in calls once a participant was working. In Year 3, fidelity ratings increased with sites making improvements in these areas.

The onset of pandemic-related lockdowns and shelter-in-place orders resulted in widespread instability in participants' employment. Participants experienced layoffs and furloughs. Almost one-quarter of participants (n=317; 24%) surveyed during the pandemic reported that they were unable to work because their employer closed or lost business. More than one-quarter (n=342; 26%) reported reductions in the work hours during the pandemic. SED service providers provided support during this uniquely challenging time of uncertainty. The nature of follow-along support during the pandemic required unprecedented duties: "Some folks were furloughed so we had to explain the difference between being furloughed and being terminated. Other folks were terminated, and we'd help them get on unemployment."

Staff members reported that participants who lost jobs in the early stages of the pandemic were most often working in industries such as retail, food service, and hospitality, in settings including casinos, gyms, airlines, sports stadiums, hotels, museums, and retailers. SED service providers reported that some participants took the loss of their jobs hard. For example, an IPS specialist described one participant who had not "been engaging with me through the pandemic. I do know that he is quite upset and depressed from not being able to do those [jobs] anymore." Process evaluators heard of participants who had lost their new jobs right before starting. An IPS specialist described a particularly unlucky participant who

> *…relocated to [a city a few hours away], showed up on his first day and there was nobody there. He couldn't get his phone call answered, and he didn't know, "Okay, what's going on? What's going on?" Basically, the company sent everybody home and somebody forgot to communicate with him. So he got back into his U-Haul and came back to [his home city]. He felt very uncomfortable, understandably.*

Furloughed participants sometimes needed help coping with the uncertainty of cut hours and threats of layoffs. While the furloughs were temporary, workers often had no idea when (or if) they would be able to return. The precariousness of these situations caused a lot of stress and anxiety. For example, an IPS specialist described a participant who was working for the airline industry: "Their work was really insecure for a while. They were finally furloughed in September [2020], but they were constantly being threatened, and their hours were cut, but they were still on call. They had invested a lot to get that job—weeks of training and all of that."

SED service providers reported that some furloughed participants were able to return to work eventually. After the initial months of the pandemic, some retail and manufacturing businesses began to reopen, and participants were able to return to work in those industries. Reportedly, some participants who experienced furlough simply sought out opportunities elsewhere.

Pandemic-related changes to providing follow-along supports had both beneficial and detrimental effects. Service providers reported that it was sometimes easier to get in contact with employed participants for a short check-in by phone than it was to convince them to make time for an in-person meeting. In Year 4, 13 sites (43%) reported that follow-along supports were limited to phone, email, or text check-ins. Additionally, about one-quarter of the sites (n=7; 23%) reported that some participants disengaged after obtaining jobs during the final year of fidelity assessment.

During the pandemic, a challenge to providing high-quality support was the inability to connect face-to-face with employers when problems arose. Four sites reported that before the pandemic, they had been providing support at participants' work sites. However, during the pandemic, staff members could no longer enter the job site, and trying to speak with employers over the phone without previously established rapport was difficult. In contrast, four sites were able to provide work site support as needed (with permission from the agency and employers). Four other sites indicated that there was no change during the pandemic because they had never visited work sites to provide follow-along supports.

Four sites reported to fidelity reviewers that they had routinely transported participants to and from work and were unable to do so during the pandemic. One site reported that they continued to transport clients with special permission from the agency.

At all sites, SED team members delivered services remotely through most, if not all, of the final two years of enrollment. Before the pandemic, most SED team members either shared common office space or occupied offices near one another. After March 15, 2020, SED providers conducted most, if not all, of their work remotely while sheltering in place at their homes. Due to ongoing high infection and hospitalization rates even after localities lifted the initial shelter-in-place orders, most sites continued to advise or require service providers to work remotely if possible.

As a result, SED team members shifted to delivering services remotely—over the telephone; through Zoom, Skype, or another video conferencing platform; and through texts (with explicit permission from the participant). Written forms that staff members previously asked participants to sign in person required posting to the participant after March 15, 2020. Once the participant read and signed the forms, they needed to mail them back to the provider's office.

Technological Challenges. The centerpiece of the multicomponent intervention delivered by the SED was IPS employment services, an evidence-based treatment that helps people with serious and persistent mental illness to find and keep a job. IPS specialists are supposed to deliver services in the community; in fact, for compliance with the IPS SE model, they should conduct at least 65 percent of service provision outside of their offices in the community (Swanson & Becker, 2013:215). However, during the pandemic, SED providers, including IPS specialists, care managers, and NCCs, adjusted their modes of service delivery to remote to comply with COVID-mitigation efforts. Staff members remarked that there were several negative consequences of relying on phones, computers, and internet connects to meet with participants. In the final year of data collection, staff members at more than 80 percent of sites reported that they had difficulties getting in touch with participants due to technological challenges. Many participants did not have access to a computer; some did not have a smartphone. Some participants had a computer, but had patchy, or slow, internet service. There were participants who did not have internet service; at least one site said that they had spent considerable time figuring out how to leverage existing resources to provide devices and connectivity for participants. In some rural areas where participants lived, cell phone service reception was poor or nonexistent. Other participants were unfamiliar and uncomfortable with video conferencing. Low-income participants who lived in states that provided inexpensive prepaid cellphones as a benefit found that the minutes on the phones were not sufficient for social service appointments.

Some sites found the documentation requirements of their state vocational rehabilitation ("voc rehab") departments problematic during the pandemic. Participants who did not have access to a computer or smartphone could not sign documents electronically, and mailing forms to the participant to sign and send back could take a week or more. As a service provider explained, "'snail mail'—there's a good reason to say that. It's very slow; it's very cumbersome. It slows down, when you get somebody pumped up and excited, you want to go with it, but you can't because you're waiting on [voc rehab], and [voc rehab] is waiting for that signature."

Privacy Challenges. Privacy concerns and distraction were also problems for participants who met remotely with SED service providers. Staff members reported that participants sometimes had no choice but to have their kids in the room with them while meeting via phone or computer with their providers. Participants who lived in transitional housing, nursing homes, or other group settings sometimes did not have private space for a confidential virtual meeting.

Rapport Challenges. Service providers reported that not being able to meet in person with participants sometimes led to difficulty forming and maintaining therapeutic rapport; as a team lead explained, "Having that face-to-face personal connection creates a better relationship and better rapport." The staff turnover that plagued SED sites increased the difficulty of engaging meaningfully with participants during the pandemic. Some staff members believed that it was considerably more difficult for new staff—who could not meet participants on their caseload in person—to develop a good personal connection with them. Participants' discomfort with appointments via phone or video conference sometime manifest in abrupt conversations. As another team lead reported, "Some of our male participants… were like, 'Hi, yep, I'm doing fine. I'll talk to you next week. Goodbye.' It was a challenge to get them to talk more." Other participants sometimes experienced distraction due to their children running around and yelling in the background, or by their television, or the games on their phone, and lost focus on discussion with their providers.

Challenges with Outreach to Participants. Pre-pandemic, SED service providers used assertive outreach strategies to attempt to engage participants. Frequently, staff would go to a disengaged participant's last known address and knock on their door. However, due to mitigation measures early in the pandemic, staff members were now limited to phone calls, emails, texts, and snail mail, which, in the words of an IPS specialist, are "pretty easy for them to avoid."

Challenges Specific to Employment Service Delivery. The process of assisting participants as they prepared job application materials became lengthier and more cumbersome during the pandemic. Pre-pandemic, IPS specialists reported sitting with participants as they searched job listings, created resumes, wrote cover letters, or filled out online job applications on a computer in the library or in the provider's office.

Despite these challenges, many sites were creative about continuing to engage participants and assist them in moving forward with their employment and health-related goals. IPS specialists taught participants how to share their screens via Microsoft Teams, so that they could coach participants through online job applications. Other IPS specialists conducted three-way calls to introduce participants to hiring managers with whom had cultivated multiple job development contacts. Staff across all sites engaged participants via email more than they had before the pandemic. Care managers sent participants lists of food pantries and other resources via email. In some cases, SED staff said that they engaged participants over email who had been disengaged previously. After several months of the pandemic, some sites commandeered their facilities' vans. A staff member explained, "The employment specialist can be driving, and the client can be in the third row in the back. Everybody wears masks; we're practicing social seat distancing."

Vocational Rehabilitation (VR). Support from VR decreased during the pandemic. In Year 1, more than half of the sites had less than 20 percent of engaged clients involved with VR. Most sites had established relationships with VR but reported not exercising the relationship for SED participants for one or more of the following reasons: VR did not support IPS; IPS services were duplicative of the VR job placement services; VR interfered with rapid job search; or VR would not work with SED participants due to capacity issues. In Years 2 and 3, VR involvement remained minimal. Sites reported that they did not pursue VR services for some SED participants since funding for SED was sufficient to cover program costs, so they did not need VR services and funding. Some sites with IPS programs indicated that they held the SED program as separate due to the different funding streams, and while clients from their IPS programs continued to work with VR, few SED participants received VR services.

Supported Employment Fidelity Scale Item

Collaboration Between Employment Specialists and VR Counselors. The employment specialists and VR counselors have frequent contact for the purpose of discussing shared clients and identifying potential referrals (Swanson & Becker, 2013:203-4).

Sites that had VR involvement showed increased involvement in Years 2 and 3. For example in Year 2, 13 sites reported an increase in the number of participants with VR involvement (mean average of 15 additional participants being served, median=9). Site relationships with VR remained stable throughout the study (average fidelity rating of 3.5 in all three years).

Overall, the pandemic brought new issues for some states with VR offices closing or transitioning to remote services. Almost half of the sites (n=13; 43%) met remotely with representatives from VR. Some sites indicated that VR required written documentation and client signatures, which were difficult to obtain during the pandemic. One reported losing billing because they were unable to get participants' cases officially opened with VR before they obtained jobs. Two sites reported that VR had a waitlist, three sites reported eligibility criteria such as requiring a primary diagnosis of mental illness, and three sites reported that participants were not interested in completing the VR application and process when supports were available through the SED. Consequently, two-thirds of sites (n=20; 67%) had 10 or fewer participants involved in VR services during the pandemic.

Work Incentives Planning. The quality and quantity of work incentive planning delivered to participants remained unclear throughout the study**.** The IPS SE model requires that SED teams provide counseling to clients on how income from employment may affect *all types* of benefits including SSA benefits, medical benefits, medication subsidies, housing subsidies, food stamps, etc. While "formal" benefits planning from a Certified Work Incentives Counselor (CWIC) is required for participants with SSA benefits, to comply with the IPS model, participants with other benefits should also receive counseling from an SED team member.

Supported Employment Fidelity Scale Item

Work Incentives Planning. All clients are offered assistance in obtaining comprehensive, individualized work incentives planning before starting a new job and assistance accessing work incentives planning thereafter when making decisions about changes in work hours and pay. Work incentives planning includes SSA benefits, medical benefits, medication subsidies, housing subsidies, food stamps, spouse and dependent children benefits, past job retirement benefits, and any other sources of income. Clients are provided information and assistance about reporting earnings to SSA, housing programs, VA programs, etc., depending on the person's benefits.

Over the course of the study, fidelity raters found it difficult to assess the level of benefits counseling. Fidelity raters usually seek to understand if agencies have CWICs accessible to IPS clients and review formal benefits planning worksheets. However, because the SED enrolled participants were denied Supplemental Security Income/Social Security Disability Insurance (SSI/SSDI) benefits, it was not necessary that CWICs complete formal planning worksheets. Without that standard documentation available, it was harder to understand the level of counseling that the team was providing.

Sites also reported that a substantial number of participants received other benefits, including Supplemental Nutrition Assistance Program (SNAP), Women, Infants and Children (WIC), housing subsidies, and medication subsidies. Some participants received unemployment benefits during the pandemic. Quarterly interviews revealed that only a small number of participants (6%; n=84) received any pay from employers for hours that they were unable to work due to the pandemic.

Reportedly, some participants received unemployment benefits, which helped ease financial difficulties after a job loss. Care managers and IPS specialists helped and encouraged participants with unemployment applications and reported difficulty and delays with timely receipt of funds. SED team members reported that unemployment insurance helped participants meet their basic needs after layoffs, but some participants experienced difficulties and delays in receiving their unemployment insurance.

While it was difficult to assess the level and quality of the counseling provided to participants receiving other benefits, in general, care managers indicated that they were the team member who helped participants obtain other benefits and reminded them to connect with case workers to report earnings as needed. Some sites indicated that they used benefits counseling as an engagement strategy to "sell" participants on the idea that working may be beneficial for them. Other sites limited discussions with SED participants about benefits indicating that participants "were guarded with their benefits," "didn't want to mess up their benefits," or simply refused to discuss it. Some team members stated that participants were disengaged from the study because they were pursuing appeals with SSA and their lawyers had advised them not to discuss it.

Sites reported that COVID-19 impacted benefits planning by making it more difficult to collect documentation needed to complete formal benefits planning worksheets. While less benefits planning may have been available to participants during the pandemic, team members reported that other benefits were more available, and benefits were less likely to be "cut off."

3.8 Nurse Care Coordination Services

The SED randomized participants into one of three study conditions at each of the 30 sites. Only participants randomized to the Full-Service condition received the services of an NCC. The primary purpose of the Full-Service treatment arm of the study was to examine whether SED participants who received medication management and support services in addition to IPS and behavioral health services experience better outcomes than those receiving IPS and behavioral health services alone, or care as usual (the Usual Services study arm).

Per the study design, NCCs were to meet with each Full-Service participant within 30 days of enrollment and conduct assessments, the results of which they recorded in the MMS report. The assessment included the following:

- A list of participant's medications,
- Adherence and side effects,
- Screener (depression, anxiety, PTSD, ADHD, substance use) results, and
- Vital signs.

The NCC gathered consent from the participant to contact their prescribers and send results of the screeners. Thereafter, the NCC was to meet with the participant at least once every 90 days over the course of their SED participation. One week before each appointment with a psychiatric medication prescriber, the NCC was to meet with the participant to complete the MMS report, which the NCC subsequently sent to the prescriber. Then the NCC asked the prescriber to fill out a report after the appointment describing changes in medication, dosages, or other treatments.

Sites reported challenges implementing the NCC role as intended by the design of the SED. The consequence of numerous challenges was that quality and quantity of NCC and MMS delivered to Full-Service participants may have varied widely from site to site. Challenges included insufficient NCC hours dedicated to SED; lack of clarity about the NCC role; difficulties providing adequate supervision for NCCs; and challenges providing MMS to participants with external prescribers. Inconsistent implementations of MMS and the NCC within and across sites are likely to contribute to inadequate tests of the NCC and MMS models.

Based on descriptions of NCCs' work with participants provided to process evaluators, we hypothesize that NCCs may have been effective with helping some participants improve health behaviors, especially behaviors related to compliance with treatment for chronic physical impairments. This was not an NCC function intended by the study design. However, team leads described NCCs as dogged in the persistence with which they pursued a handful of Full-Service participants on their caseloads who were non-adherent to treatment for chronic physical impairments. That said, we do not expect that NCCs' reported success with assisting some Full-Service participants with obtaining (and adhering to) necessary healthcare will significantly impact employment outcomes or even health outcomes across the Full-Service treatment arm. Process evaluators only began to hear reports of NCCs' success in helping a handful of non-adherent participants at some sites access and comply with healthcare in the final year of the study, suggesting that actual health improvements will lag. Further, the actual numbers of Full-Service participants helped in this way may be small due to the exceptional amount of time and effort reportedly needed to bring about these changes. In fact, it is possible there may be an initial uptick of healthcare expenses for Full-Service participants in comparison to Basic-Service and Usual Services participants.

3.9 Nurse Care Coordinator Service Implementation

As part of the SED, the NCC received training on a protocol addressing MMS as well as general healthcare support. This Westat-provided training included a comprehensive review of evidence-based standards for psychiatric medication management.

For NCCs who joined the study after the in-person training, the study implementation team provided video of the training. At all times during the demonstration, NCCs could consult with experienced consultants on the implementation team if they had questions, needed information about the study protocols and procedures, or wanted to review evidence-based guidelines. Basic-Service support staff received no training in these areas as part of the study and followed no study-approved systematic protocol.

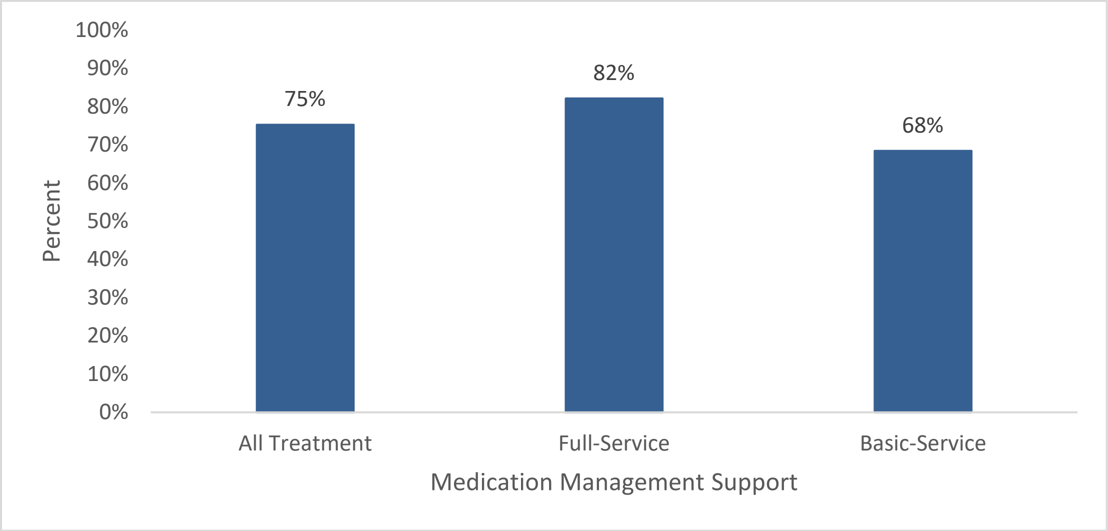
As part of the fidelity assessment, fidelity reviewers reviewed charts and interviewed SED team members to identify the presence of specific components of MMS, including the following: whether the NCC or other agency staff conducted initial comprehensive clinical assessments, engaged participants in quarterly MMS assessments, coordinated and exchanged information with psychiatric medication prescribers, coordinated with primary care and other medical providers, reviewed participants' medication treatment to promote best practices, and documented information related to avoidable practices, such as prescribing antipsychotics for insomnia. Fidelity reviewers also examined the use of MMS services by Basic-Service participants and whether the Full-Service participants received a different package of services than Basic-Service participants.

Fidelity results indicated that 85 percent (Year 1) and 78 percent (Year 2) of the Full-Service participants whose charts the fidelity reviewers examined received at least an initial comprehensive clinical assessment. Comprehensive clinical assessments conducted by the NCC as part of MMS included the following: a psychiatric history, a medical history, vital signs, medications with doses, and at least one completed self-report scale (for depression, PTSD, substance use, etc.).

Of the charts of Full-Service participants who completed initial comprehensive clinical assessments, 63 percent in Year 1, and 57 percent in Year 2 authorized the NCC to communicate with their prescribers. Among those Full-Service participants who authorized communications, 84 percent (n=107) in Year 1 and 85 percent (n=72) in Year 2 showed evidence that the NCC reached out to their medication prescriber or prescribers. For 75 percent, the NCC sent a report to the prescriber detailing diagnoses, current medications, and any clinical findings (n=96 in Year 1; n=64 in Year 2).

Exhibit 3-3 shows the percent of Full-Service and Basic-Service participants with at least one NCC contact for provision of at least one MMS service during the study. More than 8 in 10 Full-Service participants received some component of MMS, most often a comprehensive clinical assessment. However, SED service providers reported that 68 percent of Basic-Service participants received some form of MMS during the study from a provider other than an SED team member.

Exhibit 3-3. Percent of participants who received at least one component of MMS



Data from the fidelity and process assessments from Years 1 and 2 show that more than half of the sites (n=18; 60%) had no component of MMS in place for Basic-Service participants. One-fifth of the sites (n=6; 20%) provided at least some MMS to all clients, and an additional one-fifth (n=6; 20%) provided some elements of MMS. Chart review showed that SED team members at approximately half of sites (n=11 in Year 1; n=16 in Year 2) were in contact with a small number of Basic-Service participants' prescribers and exchanged clinical information. For example, care managers sometimes accompanied participants to appointments or engaged in sharing information with prescribers of psychiatric medications. However, in general, care managers provided referrals, warm handoffs, and care coordination and did not provide MMS.

Some evidence suggests that the extent of MMS provided to Basic-Service participants may have increased over time. In Year 4, team members at one-third of sites (n=9; 30%) reported providing MMS to Basic-Service participants, including routine clinical team meetings with internal and partner clinics, psychiatrists joining SED team meetings, or MMS provided as a standard of care to all participants at the site. An additional one-third (n=9; 30%) of sites provided some level of MMS such as communicating with internal prescribers on medication compliance or monitoring side effects. In at least three of those sites, the care manager reported that they were a "de facto nurse," or that they "modeled" what they did after the NCC role. SED team members reported that it was valuable to have the NCC on the team and they felt that all participants could benefit from MMS services.

3.10 Challenges Implementing the NCC Role

Despite team leads' overwhelmingly positive opinions about the contributions NCCs made to participants' health, sites reported challenges implementing the NCC role as intended by the design of the SED. The consequence of numerous challenges was that quality and quantity of NCC and MMS delivered to Full-Service participants may have varied widely from site to site. Challenges with the NCC role included the following:

- Insufficient hours allocated to SED work,
- Lack of clarity about the role of the NCC,
- Difficulty providing adequate supervision for the NCC on the SED team, and
- Difficulty communicating with prescribers external to the site.

Some NCCs did not have sufficient hours allocated to their SED work to complete all tasks expected of them; approximately one-quarter of the sites (n=7; 23%) reported that their part-time NCCs were unable to fulfill all duties as intended by the study. Team leads at some sites said there were difficulties understanding how the nurse would contribute to the SED team before the demonstration began, and so the agency miscalculated the number of hours necessary to implement the role properly. Several sites initially hired NCCs part-time for as little as 8 hours per week. Time allocation for the NCCs varied widely across the sites with one-third of the sites providing only a 0.15-0.40 full-time equivalent (FTE) for the NCC.

Some NCCs seemed unclear about their role. Westat held a training for the NCCs before enrollment of participants began, which attendees reportedly found useful as orientation to their responsibilities on the study, especially for providing MMS. However, due to turnover, some NCCs started work on the SED after the training. NCCs hired once the demonstration was underway could watch video trainings, but some reported that they did not find this sufficient. In interviews with process and fidelity reviewers, some NCCs reported feeling "lost" within the role or otherwise uncertain about their duties. When asked to describe their responsibilities, more than a few NCCs could not adequately describe MMS even with some prompting on the part of the interviewer. For example, in response to a question about the MMS she provides, an NCC said that her role was to remind participants to comply with their doctors' recommendations (that is, take the medication as prescribed). At another site, an NCC explained that "medication management" meant that she helped participants sort pills into pillboxes for the week. Unsurprisingly, other SED team members also expressed confusion about the NCC's role on the team. At least at one site, interviewers learned that the NCC had not met with every active Full-Service participant; the IPS specialists referred Full-Service participants to the NCC when they identified a need for nursing services.

Team leads reported difficulties supervising NCCs' work on the SED team. While the demonstration's implementation team provided initial training for NCCs on their duties, team leads did not receive training on the NCC role and were not able to provide clinical supervision because they were not nurses. Some sites were able to engage clinical supervisors within their agencies to provide supervision, but this was not ideal because supervisors external to SED did not have firsthand understanding of the study requirements.

NCCs had difficulty engaging external prescribers for medication management. Some participants' psychiatric medication prescribers were employees of the SED site (or the agency to which the site belonged—that is—"internal"); but other participants utilized prescribers external to the host organization. NCCs and other SED staff members reported that internal providers were nearly always responsive to NCCs' requests to share information. Multidisciplinary collaboration was usually already part of these sites' workflow, in which prescribers had regular meetings with other members of clients' treatment teams. It was not difficult for NCCs at these sites to work with internal prescribers to meet SED requirements for medication management. In fact, at sites with electronic medical records, NCCs had full access to internal prescribers' records, obviating the need for prescribers to create documentation specific for the SED.

Participants were free to select prescribers who did not have affiliation with the SED site. Some participants had preexisting relationships with external prescribers that they wanted to maintain. Other participants received SED services at sites that did not include prescribers, necessitating outside referrals for psychiatric care. Some sites with prescribers on staff had extensive waitlists for psychiatric consultations and could not accommodate new patients. Still other participants did not want to see prescribers at the SED site and requested referrals to external prescribers.

NCCs and team leads reported variation in how responsive external providers were in communicating and collaborating with the NCC. After receiving the participant's consent, the first communication between the NCC and a prescriber is usually a letter the NCC sends to the prescriber introducing the project and their role in it. After making the initial contact, the NCC tried to meet with the prescriber in person, or by phone, text, or fax. Some prescribers were reportedly very enthusiastic about the value added by the NCC to their patient's treatment. For example, one prescriber requested that the NCC fax the MMS report on the morning that the prescriber would see the participant. This report, completed by the NCC and sent to the prescriber, lists current and past medication trials side effects, psychological screen results, vital signs, and any lab results, and was no more than 7 days old when sent. Another external prescriber of a participant at a different site reportedly "loved" getting the report because it "saved them time"—providing corroborating clinical data on the participant. In a few cases, external prescribers relied on the NCC to solve a problem they were having with the participant. For example, after one participant missed appointments with her external prescriber for 3 months, the prescriber asked the NCC to encourage the participant to make and attend an appointment. In this case, the NCC discussed the issue with the participant, who resumed her regular appointments with the prescriber.

However, NCCs and team leads reported that many external prescribers were unresponsive to NCC communication. Altogether, 73 percent of sites (n=22) described difficulties communicating with external providers to the fidelity reviewers. At one-third of the sites (n=9), NCCs said that many external prescribers did not respond to phone calls, texts, or other communications. Few external prescribers were willing to fill out the Prescriber Report form, a signed document from the prescriber listing any medication adjustments made during the consultation with the participant. NCCs and team leads believed that, in general, nonresponsive prescribers did not have objections to communicating with the NCC. Rather, they felt that prescribers did not have enough time for the NCC and SED-related tasks.

In Years 1 and 2, NCCs described several strategies for reaching external providers. One strategy, described by NCCs at 11 (37%) of sites, was attending the first available appointment with the participant. This practice provided a good opportunity to introduce the SED project and the NCC role to the prescriber. These NCCs found that a face-to-face meeting with the prescriber made a difference to ensuring future communications: "If they [prescribers] see a face, they're like, 'They actually need this.' Versus a fax. It just gets pushed aside into another pile of stuff that they need to do in the office." Other NCCs said that nurses sometimes serve as gatekeepers to the physicians at primary care offices, and, in these offices, NCCs found it useful to get to know the nurses and persuade them of the importance of communication with the physician. However, NCCs were unable to apply this strategy when working with private psychiatrists without nurses on staff.

The pandemic increased the challenges related to providing MMS to Full-Service participants. During the pandemic, most sites provided services by phone and video conferencing. Only four sites (13%) returned to in-person service delivery either for part of the year or for some participants. NCCs reported to process evaluators that they continued to provide injections to participants who were receiving them. Some participants had urgent needs to have vitals recorded; in those cases, the NCC would see the participant in person. However, for Full-Service participants who did not have an urgent health problem or need an injection, not being able to meet in person made conducting a complete clinical assessment covering the five components of the MMS model—psychiatric history, medical history, medication list, vital signs, and self-report symptom scales—difficult. Only five sites (17%) reported that they conducted a clinical assessment that covered these five components after March 2020. Even so, NCCs at all sites continued to provide partial clinical assessments including reviewing symptoms and medications.

NCCs at 14 sites (47%) reported that they could not use the self-report symptom scales during the pandemic; several NCCs in this group indicated they did not believe they could administer the scale by phone. NCCs at 12 sites (40%) completed the scales by phone. NCCs at three sites reported that they mailed or emailed the scales to participants.

No NCC was able to take the vitals of every active Full-Service participant during the pandemic. At five sites, NCCs reported receiving some information on vital signs for participants who received clinical services in person at the agency.

4. Perspectives on SED Services Provided

Summary of Findings

This chapter answers the Statement of Work (SOW) question "What services did sites provide; what services did participants and staff consider useful; and which services, if any, did they consider not useful?"

- Providers discovered that a sizable group of participants needed assistance with meeting unmet needs for shelter, medical care, transportation, and other necessities before they would engage with IPS SE services; care management services were crucial for helping participants with unmet basic needs.
- Outreach services to engage participants in SE and other services were also important.
- Participants and service providers valued the addition of the NCC to the Full-Service team but not for the reasons intended by the study design. They described NCCs' value as related to their abilities to coordinate care for physical impairments.
- MMS services were under-utilized, as was PST.

This chapter addresses the following question from SSA's Statement of Work (SS00-16-60014, p. 4): "What services did sites provide; what services did participants and staff consider useful; and which services, if any, did they consider not useful?" To address this question, we report on the usage of services by participants, including IPS SE and care management services. We also examine providers' and participants' assessment of the appropriateness and usefulness of the services offered.

SED providers consistently remarked that participants were not ready to engage IPS SE services at enrollment. According to providers, many participants began IPS services with many competing priorities, including needs for shelter and other basic necessities, and the need to manage untreated and undertreated physical and mental illnesses. These participants frequently prioritized meeting these needs over participating in a rapid job search.

Care management was a crucial service for remedying participants' immediate needs. Care managers provided referrals and coordination across all basic areas of need. Slightly less than half of all participants received assistance with housing; more than half received help with medical care, and more than 60 percent received help managing symptoms of physical and/or mental illnesses. Other types of assistance included dental care, optometry, food, clothing, legal help, childcare, and transportation. Because the SED study design did not anticipate the range, seriousness, and complexity of the physical illnesses with which participants presented, the design did not require that care managers (and other non-nursing staff) have training to address participants' medical needs. Particularly when serving Basic-Service participants (who did not have access to a licensed nurse), care managers were at times unsure how to assist participants with health needs.

PST was an evidence-based psychosocial intervention service provided by care managers. It was a relatively under-utilized service; only 39 percent of participants ever engaged in a single session of PST. Care managers reported that participants lacked interest in the service.

The importance of, and frequency with which, providers delivered outreach and engagement services were unanticipated by the study design. IPS specialists, care managers, NCCs, and sometimes, team leads provided these services. Outreach and engagement involved attempting to contact the participant by phone, sometimes multiple times, over the course of a month. It also included more vigorous attempts to reach participants, including visiting their last known addresses, and calling family members, friends, and other contacts (with prior permission) to locate the participant. Monthly, IPS SE service providers made outreach attempts to an average of 36 percent of the participants on their caseloads over 36 months of enrollment. In the first year, the average rate was 31 percent; between 13 and 24 months after enrollment, an average of 38 percent of participants received outreach services each month, and by the final year of participant enrollment, the average percent of participants who required outreach services was 40.

MMS services were less useful than anticipated. The SED included the NCC service to the study design to assess whether SED participants who received evidence-based MMS services in addition to IPS and behavioral health services experience better outcomes than who received IPS and behavioral health services alone, or care as usual (per the Usual Services study arm). However, more than 55 percent of Full-Service participants did not require their NCC to liaise with a prescriber. This failure is in largest part due to a lack of perceived need for psychiatric medication, or Full-Service participants' refusal of evaluations for medication.

Full-Service participants and Full-Service providers perceived the addition of the NCC to the team as very valuable but not for the reasons intended by the study design. Participants and SED providers indicated that NCCs helped some participants improve health behaviors, especially behaviors related to compliance with treatment for chronic physical impairments.

4.1 Combined Service Usage

Team leads tracked face-to-face contacts with study participants each month using the Monthly Service Use Checklist. (See Appendix A for a blank Monthly Service Use Checklist.) Working with team members, the team lead noted any reason why an enrollee was prevented from participating in face-to-face services, whether the enrollee had a meeting (on- or off-site), the number of meetings, and the nature of each meeting as these pertain to employment, medical, or other social support services. During the pandemic, staff members who met remotely with participants checked the option indicating they met with the participant in person and then wrote in the comments that the visit had been remote. The checklist data presented here concern general engagement in services over the 36 months of the study by the 1,963 participants in the Full-Service (n=976) and Basic-Service (n=987) treatment arms. These data do not include the 35 enrollees found to be on disability benefits at the beginning of the SED. Overall visits to care managers and employment specialists were about equal between the two treatment arms, so Full-Service participants who used the NCC received more services than Basic-Service participants, altogether.

General engagement data for service usage appears in Exhibit 4-1 below. The graph details the percentage of Full-Service and Basic-Service treatment-arm participants who received at least one SED service in the month. Service usage includes any of the following: meeting with an IPS specialist, any IPS service received, PST received, any care management service received, MMS services received (provided by the NCC for Full-Service participants, or by a provider not on the SED team for Basic-Service participants), or specialty referral. Overall, the patterns are similar with little variation between the two treatment groups with respect to IPS or care management services. In the initial months following enrollment, approximately 60 to 70 percent of study participants utilized services. That percentage slowly declined over the course of the study; approximately 40 to 50% of participants used services toward the end of their participation in the study.

Exhibit 4-1. **Any service use per month of study over 36 months [Note: "months" below refer to the month since enrollment. For each participant, the first month is their first month of participation following enrollment.]**

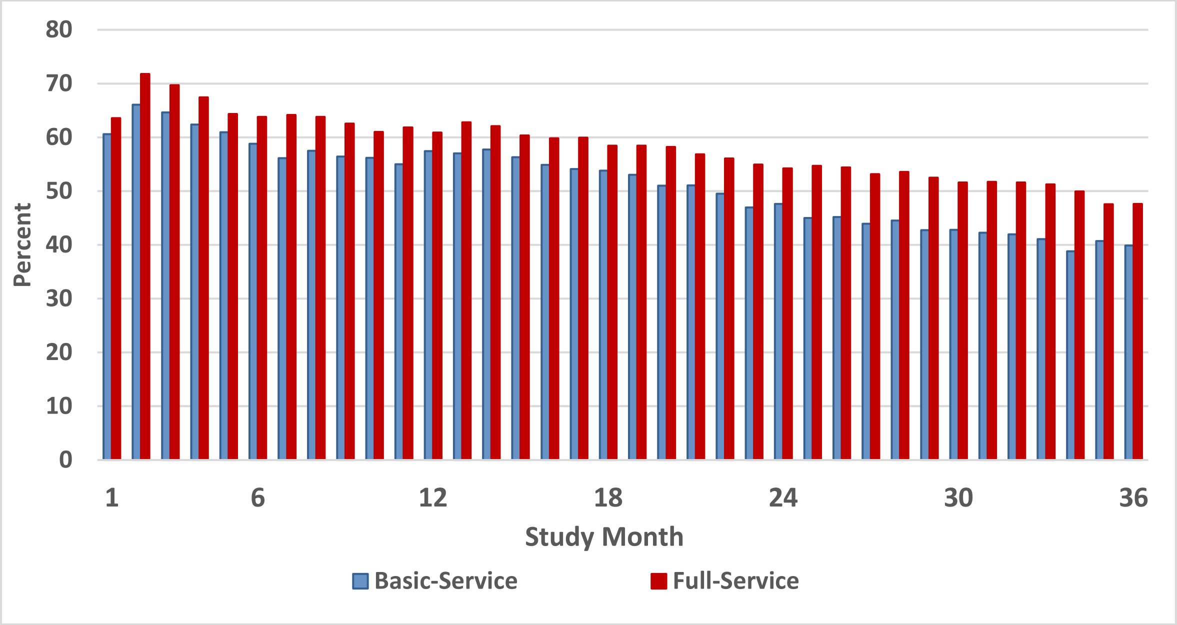
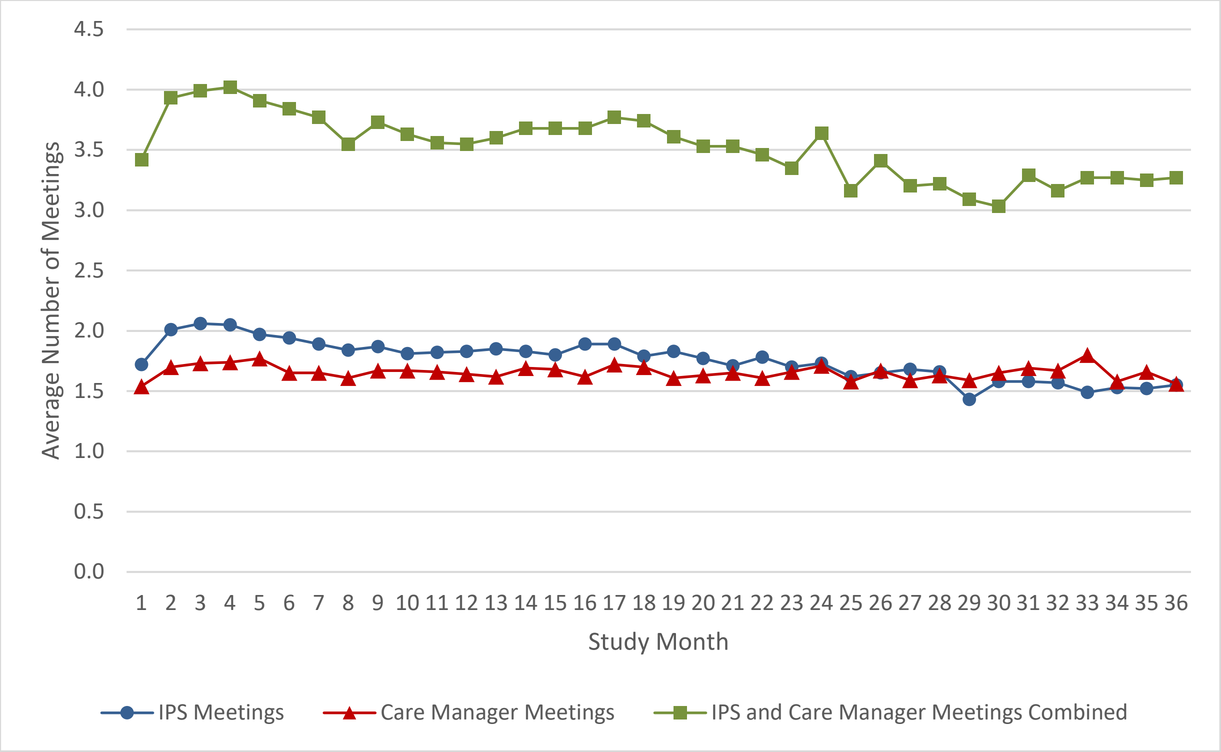


Exhibit 4-2 plots the monthly average number of services received. Services include any of the following: meeting with an IPS specialist, any IPS service received, PST received, care management, and MMS services. For participants with at least one contact with the demonstration site in a given month, the average number of contacts ranged from 3.0 to 4.0 contacts per month with either the IPS specialist or the care manager. The average number of contacts with the IPS specialist ranged from 1.4 to 2.1 contacts per month. The number of meetings with the care manager ranged from 1.5 to 1.8 per month.

Treatment-arm participants were most likely to engage in the second month of enrollment than in the first month. In the second month, more than half of all treatment-arm enrollees (55%) had contact with their IPS specialist and about 40 percent of participants met with their care manager. In the first four months after enrollment, 76% of participants met with an IPS specialist at least once.

Over the course of the study, the percentage of treatment-arm participants who had at least one monthly meeting with their IPS specialist dwindled. After one year of enrollment, about 30 percent of participants had at least one monthly meeting, and by the 24-month mark, only about 15 percent of treatment-arm participants attended a monthly meeting. This does not necessarily indicate an increasing lack of interest in employment; it is possible that by 12 or 24 months, many participants required less intensive employment services than initially because they were successfully holding down a job. Although there is wide variation in the length of engagement within and between real-world and research studies of IPS SE, in general, most clients transition off IPS specialists' caseloads by 9 to 12 months (Drake, 2022, personal communication). The employment outcomes of the SED should assist in accurately interpreting the reasons for a drop-off in service usage over the course of 3 years of services.

Exhibit 4-2. Average number of contacts per month for participants with at least one contact in the specific month (no-contact enrollees removed from each monthly analysis)



However, throughout the course of the study, when participants used SED services, they used them intensively. In any month, participants who met with an SED service provider met between three and four times with their IPS specialist and/or their care manager.

Service Utilization by Year of Enrollment. Service utilization among SED participants was highest in the first year of study enrollment and declined in each subsequent year. Table 4-1 summarizes the average number of IPS specialist meetings, care manager meetings, and MMS meetings by year of enrollment. Both Full-Service and Basic-Service participants attended an average of nine IPS meetings in the first year of study enrollment; the average number of IPS meetings declined to five in Year 2 and less than two in Year 3. The average number of care manager meetings in Year 1 was around six, compared to three and less than two in Years 2 and 3. Finally, the average number of MMS meetings was slightly lower in Years 2 and 3 compared to Year 1.

Table 4-1. Average IPS specialist meetings, care manager meetings, and MMS meetings by year of enrollment

	Full-Service			Basic-Service		
	Year 1	Year 2	Year 3	Year 1	Year 2	Year 3
Average IPS Specialist meetings	9.18	5.15	1.84	8.89	5.29	1.50
Average Care Manager meetings	6.06	3.78	1.81	5.79	4.30	1.38
Average MMS meetings	2.25	1.60	1.59	1.32	1.22	1.00

4.2 Participant Engagement During the Pandemic

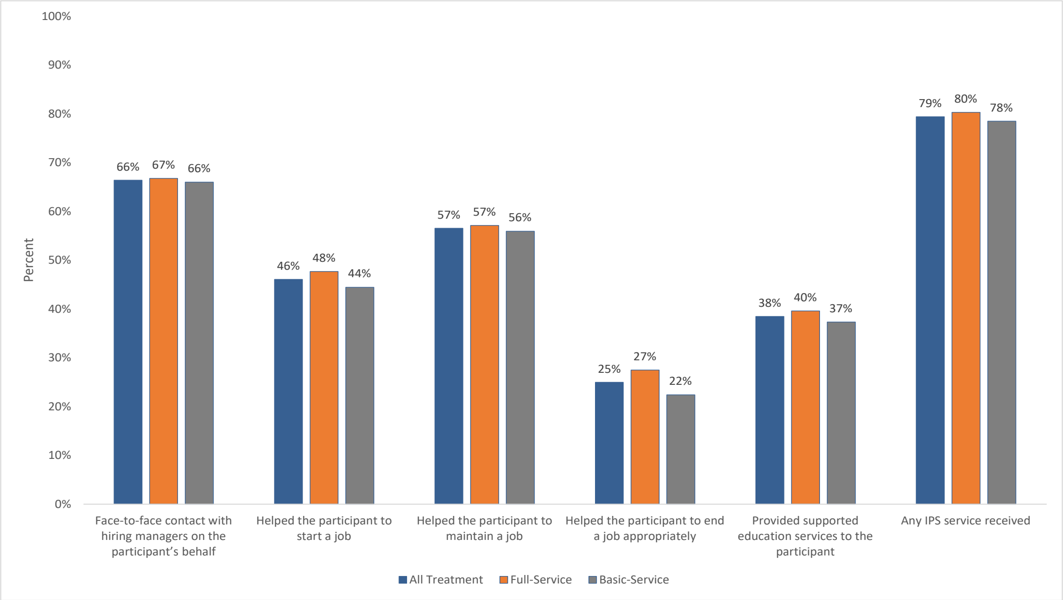
The pandemic influenced engagement in both positive and negative ways. In the first 3 or 4 months of 2020, SED service providers felt that participants were easier to engage, at least for brief check-ins. Providers surmised that participants were stuck at home with little to do, and therefore, were more available to speak with them. Participants were hungry for any information that SED staff members could provide about avoiding coronavirus infection. Providers reported that some participants were lonelier and/or more anxious than usual and, therefore, welcomed more contact. However, participants sometimes had little privacy in their living spaces in which to discuss private information or to focus on employment goals or therapy without interruption. Staff members discovered that many participants had difficulty accessing reliable remote communication technologies, which made regular, lengthy appointments with those participants challenging.

As part of the fidelity evaluation, reviewers asked sites how engagement with services changed during the pandemic. Six sites (20%) did not share information on engagement during the pandemic. Of these six, three sites explained that engagement issues were an ongoing challenge throughout the study with no specific examples relevant to the pandemic. The remaining three discussed engagement strategies used during the pandemic instead of directly responding to the question. In 16 of the 24 sites that discussed engagement challenges during the pandemic (67%), team members reported that usage either stayed the same or increased at the beginning of the pandemic with more participants picking up the phone for general information and resources. Three sites reported the balance of service usage changed during the pandemic; participants needed more case management services and therapy and fewer employment services. One-fifth of the sites (n=6) reported that engagement was higher for the Full-Service participants than for the Basic-Service participants because Full-Service participants engaged with the NCC for COVID-19–related information. More than one-quarter of the sites (n=8; 27%) reported that engagement dropped off during the pandemic, with six of those sites indicating that turnover influenced engagement because new staff never met participants in person. However, one site said that an IPS specialist who started during the pandemic was able to increase engagement.

4.3 IPS Supported Employment Service Usage Rates

The Monthly Service Use Checklist (Appendix A) identifies five key services that signify positive movement toward getting a job. Sites' team leads completed this checklist monthly for each treatment-arm participant enrolled at their site. Services they recorded on the checklist included (1) face-to-face contact with a hiring manager on behalf of a participant; helping participants (2) start a job, (3) maintain a job, (4) or end a job (appropriately); and (5) provide supported education to a participant. Exhibit 4-3 shows the percentage of participants who received these services from an IPS specialist during the study. Looking at the three bars for each service, it is apparent that there is little difference between the Full-Service and Basic-Service participants on the types of services received from their IPS specialist. The percentages receiving help to start or end a job are only slightly higher for Full-Service participants and nearly identical for any IPS service received. Overall, nearly 4 in 5 participants received at least one IPS service. Among the five key services monitored, face-to-face contacts with hiring managers on a specific participant's behalf was the service provided most frequently. Sixty-seven percent of Full-Service participants and 66 percent of Basic-Service participants utilized this service. A little over half of all participants received help to maintain a job, while more than 4 in 10 participants had help to start a job. IPS specialists assisted about one-quarter of participants to end a job appropriately. Almost 40 percent of participants received some sort of supported education services (see Exhibit 4-3).

Exhibit 4-3. Percent of participants receiving IPS services in Full-Service and Basic-Service groups



4.4 Perceptions of IPS SE Services

Nearly all SED staff demonstrated a keen awareness of the principles of IPS and gave examples of how they implemented them with SED participants. As part of the evaluation, we asked staff how they implemented IPS services, the challenges they—along with their teams—faced, and how they overcame these challenges. For a lengthier description of the early implementation of IPS services as part of the SED, please see *The Interim Process Analysis Report* dated August 7, 2020. The discussion below focuses on specific aspects of pandemic-era IPS service delivery and themes.

Perceived Readiness for IPS Services. In most contexts, IPS service users receive case management services before beginning IPS services (Drake et al., 2012: 48-54; Swanson & Becker, 2013). "Typical" IPS clients are at a point in the process of recovery where they have "move[d] beyond preoccupation with illness, become hopeful about the future, and pursue their own journeys and goals" (Drake et al., 2012:6, following Deegan, 1988). That is, IPS service users are at a point in their recovery where they are comfortable managing their distress and can cope with their symptoms. Furthermore, they are getting most of their basic needs for shelter, food, and basic medical care met.

The problem for many SED participants and their service providers in the early months of enrollment was that, even when participants were interested in employment, their stated priority was to focus on coping with crises dominating their lives; many participants were worried about surviving, not recovering and thriving. During the first two years of the study, staff members frequently remarked to process evaluators that SED participants were dissimilar from the type of clients typically served in IPS programs. They were dissimilar in several ways. Many of the SED participants did not have severe mental impairments, such as schizophrenia, that were common in some community mental health centers (CMHCs). For those centers that served a broader group of service users, SED participants might have had the same conditions, but they were at a crisis stage, which was uncommon for service users entering IPS SE. Providers noted that many participants frequently appraised themselves as facing crises such as unmet needs for food, shelter, clothing, medical care, and other basics. Further, some experienced escalating interpersonal conflict with family and others, and sometimes, threats of violence. Referring to participants' priority to work on managing crises and meeting basic needs, one SED IPS specialist bluntly explained, "Stuff gets out of order: we're not going to work on a vocational profile if you don't know where you are going to stay." In general, honoring participants' choices sometimes meant deferring employment to focus on addressing basic needs and crises.

Follow-along Supports. Follow-along support included new duties because of pandemic-related furloughs and layoffs**.** What the IPS community refers to "follow-along supports" comprises a variety of activities to help participants succeed in their job once they find employment. According to the model, once a client has a job, the IPS specialist should continue to meet with them at least once per month, adjusting the frequency depending on the client's needs and choices (Drake et al., 2012; IPSWorks.org). Support for employment might include everything from working alongside the client to help them learn their job duties, to mediating at workplaces on behalf of clients, to serving as a sounding board for workplace problems (Swanson & Becker, 2013).

Before the pandemic, a recurring theme of the process evaluation interviews was the difficulty of convincing participants to keep meeting with their IPS specialist once they had a job. IPS specialists urged participants to make and keep appointments with them and to allow them (and their colleagues) to help them manage any issues at the workplace before they might become bigger problems. For example, an IPS specialist said she gives the following advice: "Don't wait until it's too late and your job is gone." Fidelity scores in Years 1 and 2 reflect this struggle to provide follow-along supports. By Year 2, only two sites achieved the top fidelity rating for having frequent, time-unlimited supports. Fidelity reviewers reported that supports were inconsistent, with most sites lacking formal plans (n=18; 60%) to provide support based on an assessment of participants' needs and preferences. In Year 2, at almost one-quarter of the sites (n=7; 23%), IPS specialists provided only phone check-in calls once a participant was working. In Year 3, fidelity ratings increased with sites making improvements in these areas.

Providers' Perspectives on the Influence of the Pandemic on Employment Outcomes. In general, SED service providers were unsure whether the pandemic would have any major effect on the overall number of participants who obtained employment. A few SED service providers told process evaluators that participants who held ambivalent attitudes toward work before the pandemic were using the pandemic as "just another reason I can't work." Similarly, participants engaged with employment services before the pandemic either continued to work or eventually returned to work after pandemic-related setbacks. Service providers noted that some participants' unemployment benefits were more generous than their previous wages, which may have discouraged some laid-off participants from returning to work until after termination of their unemployment insurance. On the other hand, SED service providers reported a few participants who used the generous unemployment to advance their employment. For example, an IPS specialist described a participant who had her own daycare business:

> *I encouraged her to apply for pandemic unemployment and she didn't want to do it. I said, "This is exactly what it's for—to help you through this transition period".... She did apply and she was approved. She was really grateful; she was able to buy a washer, a dryer, and a new refrigerator for the daycare.*

"Survival Jobs" Versus Careers. Early in the study, process evaluators learned that IPS team members made a distinction between "survival jobs" (low-quality jobs) and jobs that are part of a career trajectory. Survival jobs are inevitably entry-level, poorly paid, and rarely the first step on a career trajectory—they tend to be "dead end." As one IPS specialist put it, a survival job is "something to earn a paycheck in order to eat…. That's not a career you're necessarily looking to build." IPS specialists sometimes helped participants take survival jobs, such as working in a fast-food restaurant if the participant needed immediate income, or if the participant had no work experience. Staff reported that participants took jobs they did not want when they were desperate for income. Staff viewed these "survival" jobs as stop gaps until the participant could find work in the career path of interest to them.

Pre-pandemic (for the first two years of the demonstration) some IPS teams told process evaluators that all the employment opportunities that seemed available in their communities seemed to be survival jobs. In one rural area of the Southeast, the poorest participants among all participants at a site were the most likely to live in the most rural areas without access to transportation. The IPS team at the site despaired of placing one participant who lived "literally in the middle of chicken farms" with no transportation; the nearest commercial area—with only fast-food and other survival jobs available—was a 20-minute drive by car.

Due to changes in the job market during the first 18 months of the pandemic, staff members perceived placement in "survival jobs" as increased. IPS specialists at almost one-quarter of the sites (n=7, 23%) reported to fidelity reviewers that they experienced a shift away from focusing on building careers for participants and an increase in helping participants obtain "survival jobs." Twelve sites (40%) reported that participants were still able to pursue jobs that met their originally stated interests and they were able to tailor the search to their preferences. Some sites said that participants' interests changed in response to the pandemic and the limited types of jobs available.

COVID-19 Concerns. Concerns about COVID-19 infection were a barrier to employment. Nearly one-third of sites (n=9; 30%) reported during fidelity assessment interviews that participants were not engaged in the job search during the pandemic. In their quarterly interviews, over one-third of participants (n=452; 35%) said the pandemic prevented them from looking for work because they did not want to work in public due to safety concerns. Process evaluation interviews detail SED providers' perspectives on how COVID-19 influenced participants' employment goals.

During the pandemic, participants' fear of contracting COVID-19 was a barrier to employment. Across sites, staff members estimated that anywhere from 15 percent to 60 percent of participants were hesitant to work due to fear of infection. IPS specialists problem-solved with participants about how they might lower their risk: "We try to talk with them about what that will look like for them [i.e., working during the pandemic], how they could put safety precautions in place, talk with those employers. But that's one of the biggest challenges now: the fear."

Many participants across sites had chronic, physical health conditions that put them at risk of severe illness if they were to contract the virus. For example, enrolled participants lived with kidney disease, asthma, chronic obstructive pulmonary disease (COPD), Crohn's disease, heart disease, diabetes, obesity, and/or were immunocompromised. In reference to a participant on their caseload, an IPS specialist explained

> *She's got serious Crohn's. Her doctor said, before the pandemic, she didn't really need to be around anyone because of the meds she was on. If she ever got sick, she would just die…. I think she knows in theory she could work, but*

> *that's [her disease] contributed a lot to her desire not to… out of legitimate concern for her health.*

Other participants were hesitant to work outside of their home due to fear of infecting other members of their household, especially participants who lived with elderly parents, young children, and immunocompromised family members. For example, one participant who had a baby a few months before the onset of the pandemic told her SED service providers that she did not feel comfortable returning to her job, fearing she could bring the virus home to her newborn. Other participants expressed concern about children with asthma.

According to staff across sites, some participants decided to resign from jobs because they were afraid of the health consequences of contracting COVID-19. Reportedly, one participant quit her job after a COVID-19 outbreak at her workplace. Another participant who worked part-time resigned after her employer reduced her weekly hours from 20 to 8; she did not think that it was worth the risk of infection to work for so few hours.

While participants were often the ones to describe fear of infection as a reason to avoid employment in certain settings, staff members sometimes felt that some participants did not fully understand their health risks. This sometimes put staff members in an awkward position because their role in caring for the participant's physical safety was in direct conflict with their role helping participants find the employment that accorded with their values and choices. An IPS specialist explained:

> *[A participant] was refusing to apply anywhere that would make her wear a mask and she also had lung problems. I don't think she has diabetes, but she is obese…. I had some ethical quandaries about looking specifically for work that could potentially kill her.*

After the first months of the pandemic, SED service providers said they saw a shift toward returning to employment or seeking employment. The initial "shutdown" phase of the pandemic caused a lot of uncertainty, and many participants who did not have employment postponed their job search. Once some businesses reopened with mitigation protocols in place, some of these participants were more receptive to employment. As an IPS specialist said:

> *I think people shifted towards wanting to go back to work where stuff's opened up and they've realized they can go out and still be safe. Yeah, I'd say their views have definitely changed. I think it was really the first three or four months when nothing was open and masks weren't readily available. I think people just wanted to step back during that time.*

4.5 NCC Service Usage Rates

Exhibit 3-3 shows the percentage of Full-Service and Basic-Service participants with at least one NCC contact for provision of at least one MMS service during the study. More than 8 in 10 Full-Service participants received some component of MMS, most often a comprehensive clinical assessment. However, SED service providers reported that 68 percent of Basic-Service participants received similar services during the study.

4.6 Perceptions and Uptake of NCC Services

Almost all SED staff members and Full-Service participants interviewed by process evaluators said they felt the NCC was a valuable addition to the SED team. In fact, due to their perceived usefulness, team leads at two sites successfully advocated for including providers with some comparable duties to the NCCs on teams serving their non-SED clients. However, when asked how the NCC benefited Full-Service participants, no SED team lead (or Full-Service participant) described the importance of psychiatric MMS. Instead, the value added by the NCC was in using their authority as medical professionals to advocate assertively for participants managing their various health conditions. NCCs coordinated primary and specialty medical care with mental healthcare for Full-Service participants with medical needs, and provided education to participants on health- and illness-related topics, including on COVID-19 mitigation strategies, symptoms, and vaccination.

NCCs' persistent efforts to coordinate healthcare appeared to affect Full-Service participants' health behaviors positively. Above all, team leads described NCCs whom team leads thought were successful in meeting participants' medical needs as "persistent." NCCs described this way would make appointments for participants with primary care providers, psychiatrists, and specialty medical services; make sure participants received their prescriptions; and call participants multiple times to remind them of their appointments. Before the pandemic, these NCCs drove participants to their appointments, attended doctors' appointments, and advocated on behalf of participants with physicians.

For example, a team lead described the NCC at her site as trying "to get as much taken care of medically as possible as they [participants] will let her." As a result, the team lead said that she noticed that the Full-Service participants were more likely to have consistently attended appointments for medical care. In contrast, she explained that when she reviewed the charts of Basic-Service participants: "I can look and I can't even see the last time they've seen a doctor. On top of that, we don't know—is them not getting medical help they need affect[ing] them wanting to work? How they can work? If they can work? Because we don't have that information from a nurse care coordinator."

When asked by the process evaluator about why the NCC at their site was successful, another team lead gave a few examples of how their NCC kept after Full-Service participants:

> *Sometimes with certain clients that had ongoing health things like super-high blood pressure… just kind of checking in with them and reminding them that it is something significant…. There's a woman that had to have different outpatient surgical procedures, so [the NCC] accompanied her to make sure she got into the appointment and then did follow up: "Okay, are you doing the follow-up protocol [and] the discharge protocol?" Another person who hasn't engaged in looking for work but she's had… a chronic physical condition…. At the start of the study, she was very resistant to working with the team…. [The NCC] was able to work very consistently [and the participant became] more independent in talking with [the NCC] and discussing her physical issues and concerns.*

At another site, the team lead described the NCC on her team as doing "whatever it took for them to get to those necessary appointments to get their needs met." This NCC called primary care providers and specialists to make appointments on behalf of Full-Service participants, drove them to appointments, and attended appointments with them. According to the team lead, this painstaking outreach to, and follow-up with, Full-Service participants resulted in “a huge different between Full-Service and Basic-Service as far as getting those needs met.”

NCCs advocated on behalf of Full-Service participants with their physicians. An activity many NCCs undertook on behalf of Full-Service participants was advocating for participants with their prescribers. This frequently involved the NCC attending psychiatrist and primary care appointments with participants. As described above, one advantage of the NCC’s attendance at prescriber appointments was to facilitate communication between the prescriber and the NCC. NCCs found it simpler to accompany the participant to appointments to explain the SED, the NCC role, and the information they needed from the external prescriber, rather than trying to contact the prescriber before or after appointments. Other benefits to NCCs’ participation in prescriber appointments include helping participants gather and process information about their health conditions and treatments; redirecting physicians to consider participants’ requests; and providing information about the participant that led to better treatment.

NCCs and other SED staff explained that NCCs assisted participants with gathering information and understanding the information provided by prescribers. The presence of the NCC empowered the participant to ask the prescriber questions that they would not have asked without the NCC’s presence. NCCs described going over with participants what they wanted to know from their prescriber before the appointment, and then prompting participants to air their concerns. For example, an NCC said that during an appointment she reminded a participant who was concerned about rectal bleeding to ask his doctor about it. Staff reported that participants valued the NCC’s presence at appointments because the NCC could remind the participant what the doctor told them and explain it to them.

Several NCCs reported using their authority as medical professionals to advocate for the participant. For example, when the participant with rectal bleeding did bring his concern to the doctor, the doctor replied, “Well that’s not what we’re here for today; we’re here for your back.” At this point, the NCC intervened to insist politely, “Well, that may be, but I have to respectfully tell you that this is happening right now, and I think it needs to be looked at, whether it’s on the schedule or not.” The doctor listened and did a workup on the participant’s rectal bleeding.

Another participant at a different site had resorted to heroin for back pain. The participant had been getting steroid shots in his back; however, until the NCC met with the provider at the participant’s appointment and said that the steroid treatment wasn’t “working out,” the doctor had not grasped the severity of the participant’s pain. Subsequently, the doctor referred the participant to an orthopedic surgeon.

Pandemic-mitigation measures interfered with NCCs’ advocacy with physicians on behalf of Full-Service participants. COVID-19 mitigation measures attenuated the advocacy that NCCs performed at Full-Service participants’ appointments with physicians. Many previously in-person appointments for medical care became virtual, and if an in-person appointment with the physician was necessary, the NCC could not attend as an advocate due to concerns about infection. Some, but not all, physicians were amenable to the NCC joining their virtual appointments with participants. Even when the physician allowed the NCC to join the telehealth appointment, sometimes the technology was not sufficient for a clear call and the NCC had to drop off.

Some NCCs still tried to advocate for participants on their caseloads by preparing participants for their appointments and then debriefing afterward. NCCs reported that they called participants before and after their appointments; at least one NCC said she met participants in the parking lot before and after medical appointments. Before the appointment, NCCs would remind participants of relevant health concerns they had discussed with the NCC and suggest ways they might bring up these concerns with the physician. After the appointment, the NCC would ask to debrief, including medication changes and other treatments prescribed, whether the participant was confused about anything, and whether the participant forgot to ask about something. However, without the face-to-face contact with prescribers that had been possible when the NCC attended participants' appointments, it remained difficult to elicit any information in any form from the prescriber.

At the onset of the pandemic, NCCs' duties as health educators expanded to include COVID-19–related education. As described in the *Interim Process Evaluation Report*, NCCs regularly provided health and psychoeducation to Full-Service participants in Years 1 and 2. NCCs reported instructing participants on smoking cessation, weight loss, and nutrition, in addition to information about the illnesses with which Full-Service participants presented. One NCC even went to the grocery store with a participant and then helped him cook a healthy meal.

At the onset of the pandemic, NCCs began providing education about coronavirus symptoms, mitigation strategies, and, later, the vaccine. For example, an NCC explained to process evaluators that participants needed information about the virus:

> *I have the same spiel about COVID. With all my patients, they called and asked me, "What do we do? How do we protect ourselves? I can't find hand sanitizer—what can I do?" It's things like that, helping participants and also giving them a spiel on handwashing safety, social distancing. It was a very big thing for me throughout COVID—making sure participants are safe.*

Participants who were isolated or lived alone also warranted more contact. Staff members, including the NCC, found it helpful to check in with participants who had mental health problems and little social support to assuage exacerbations of anxiety and depression.

Some NCCs used the pretext of providing COVID-19–related information to connect with participants they had not heard from in a while:

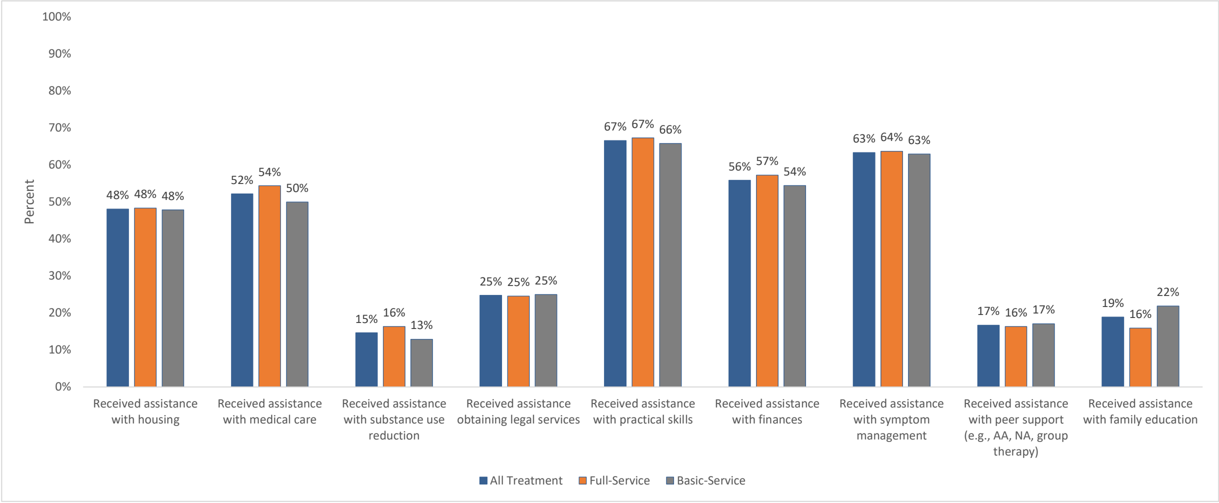
> *When the COVID virus started, it was really easy to call people and say, "Hey how are you doing with the virus? Are you having any problems? Do you need anything? Are you masking and social distancing?" So that was a good opportunity to just call people and check on them.*

NCCs included questions about COVID-19 symptoms in their quarterly assessments. Others asked participants if they needed masks and hand sanitizer, then dropped those items off at their homes if they requested them. One site asked the NCC to speak to the entire group of service providers about COVID-19 early in the pandemic.

4.7 Care Management Service Usage Rates

As mentioned, participants had access to a wide variety of social services, typically through their care manager. These services included (1) housing, (2) medical care, (3) substance use reduction, (4) legal, (5) financial, (6) symptom management, (7) family education, (8) peer support, and (9) practical skills training. Exhibit 4-4 displays the percentage of each treatment group engaging in key care manager services. Again, as with IPS services, both Full-Service and Basic-Service enrollees received similar services, with Full-Service participants receiving a slightly higher amount of assistance with medical care and Basic-Service participants receiving slightly more assistance with family education. Approximately two-thirds of participants received practical skills training and symptom management, and more than half received assistance with finances and medical care.

Exhibit 4-4. Percentage of participants receiving care management services for Full-Service and Basic-Service groups



4.8 Perceptions and Uptake of Care Management Services

Care managers worked with both Full-Service and Basic-Service treatment teams to help coordinate healthcare and other practical needs of participants. In the SED, there were two major tasks of the care manager: delivering case management and conducting PST with participants. Across sites, care managers differed in their levels of education and training. Some sites designated staff with training and licensure to conduct psychotherapy as SED care managers. At other sites, however, care management was entry-level work for employees without clinical training. The latter group of care managers without experience conducting psychotherapy learned PST while they served SED participants. One SED site split the duties of care management and psychotherapy between two team members at some point during the demonstration: one served as a therapist to all SED participants, and the other team member provided case management services.

Many SED participants had made applications for disability income in an attempt to fulfill basic needs. Insofar as the work of care managers was to connect participants to resources to meet their needs, care management services were a crucial component of SED service delivery.

There were challenges to the care management of SED participants. Among the most intractable problems participants experienced were homelessness and housing instability. Because of shortages of affordable housing in most parts of the United States, and inadequate local and federal government resources to address homelessness and housing instability, finding stable housing for participants remained challenging throughout the study. Further, when serving Basic-Service participants, care managers were sometimes unsure how to assist with managing the complex, chronic physical illnesses and impairments that Basic-Service participants presented. Finally, the skill and education levels of care managers across the study sites varied considerably. Some care managers were seasoned psychotherapists; others had no clinical experience before they began serving SED participants.

The importance of care management services to SED participants has implications for scaling-up similar services to provide to SSA applicants more broadly. To be more effective with making referrals, care managers serving SSA applicants would benefit from specific training in managing complex, chronic physical illnesses and impairments, as well as mental health impairments. Care managers who serve SSA applicants might be instructed in evidence-based outreach and engagement techniques for reaching underserved and treatment-naïve individuals. Further, any future program should consider providing specialized resources and services to address participants' housing instability.

Assistance with Meeting Basic Needs. Care managers were instrumental in helping participants meet basic needs for shelter, housing, and food. SED teams reported that many participants entered the study in crisis and needed immediate referrals to help meet their basic needs for housing, food, or substance use treatment. Care managers provided referrals and coordination across all the basic areas of need, including providing housing assistance to participants who had been recently evicted, lived in a shelter, lived with family in abusive relationships, etc. Other types of referrals included dental care, optometry, food, clothing, legal help, childcare, transportation, and public assistance. Many SED teams described relying on community resources to help participants pay for necessary services and goods before requesting reimbursement from Westat in the interest of sustaining participants' connection with the community resource after the SED is complete.

Once the pandemic began and participants experienced job loss and furloughs, care managers helped participants apply for COVID-19–related unemployment benefits. As before, they continued to help participants apply for SNAP benefits and rental assistance when needed. Care managers at several sites described picking up and transporting boxes of food and personal hygiene products to participants at high risk of severe illness from COVID-19. Care managers also worked with pharmacies to pick up and deliver medication.

Referrals for Primary and Specialty Care. Care managers (and NCCs) established necessary medical and mental health appointments for un- and underserved participants. A large part of the work of care managers was referring participants to appropriate and affordable health and social services. Care managers expected to make referrals for mental health and substance use treatment; however, they were not prepared for the number of complex physical health challenges necessitating referrals to specialty medical services. Care managers at a couple of sites reported that more training on managing the complex medical and behavioral health needs of Basic-Service participants would have been helpful. They expressed feeling unprepared to assist Basic-Service participants with their medical needs.

SED providers described a large group of participants as lacking "rootedness in the mental health system" or being "unconnected from services," in contrast to typical clients at their sites. That is, many SED participants began to receive IPS and other SED services without any previous engagement with mental health or social services. Because SED participants were not well-connected with services, many needed immediate referrals for mental health, primary and specialty medical care, and wraparound services. SED staff who worked at their site before beginning SED found new challenges in connecting SED participants with services. In contrast to clients at their sites, who were usually “aware of their options and services a little bit more,” SED enrollees needed immediate referrals and “a lot of education” about mental health and mental health services.

A roadblock at some sites was finding resources for participants who did not have a documented psychiatric disorder, as participants without a diagnosis were not eligible for many of the usual referrals requiring a psychiatric disorder leveraged most frequently by clinic staff. After a psychiatric assessment, some participants did qualify for service earmarked for those with serious mental illnesses; however, other participants failed to receive a diagnosis that would make them eligible. At some sites, this meant that the latter group of participants could not access psychiatric and psychotherapeutic services outside the SED umbrella. SED staff at these sites felt that these circumstances interfered with good implementation of IPS: “One of the beautiful parts about IPS and why it works is because it is integrated with behavioral health treatment. We’re removing that half (for participants without serious mental illness), which is really half of the supports that the clients have in place.” Sites that regularly relied on states’ VR services to provide funding tasked their SED care managers with opening cases for participants with VR, if the participant qualified for those services with an appropriate mental health disorder.

Problem-Solving Therapy (PST). Care managers reported that participants better tolerated PST during the pandemic than during the first 2 years of the SED. Some care managers who had little or no training in psychotherapy seemed to have difficulty with the expectation that they conduct PST with participants. More than a few care managers confided that they felt intimidated by the training requirements and disheartened when they heard negative feedback about their efforts to master it. Other care managers reported that participants lacked interest in it and were difficult to engage. Psychotherapeutically sophisticated therapist-care managers sometimes told process evaluators that they preferred other modalities—such as solutions-focused therapy or a “strengths-based approach” to helping participant solve problems, and so they did not use PST outside of completing the training requirements. (However, process evaluators were happy to hear from at least one inexperienced care manager who enjoyed conducting PST, reported success helping participants using the modality, and, in fact, returned to school to study psychotherapy at the end of the SED.)

However, during the pandemic, care managers’ use of PST reportedly increased. A care manager who had previously been unsuccessful with convincing participants to engage with PST mused that participants became more receptive to it because they had more time on their hands, as they could not go out. Another care manager reported that the pandemic presented clearly -delineated solve-able problems—for example, how to get errands done with no public transportation. A care manager explained,

> *Maybe I do a lot more problem-solving therapy now because they [participants] can’t rely on transportation…so they are having to figure out, “Okay, this is on me. How am I getting groceries? My friends, my girl who normally takes me out is not able to anymore because of COVID-19. How do I do this? What does this look like?”*

While care managers did not report to process evaluators that they felt more comfortable and more skilled with using PST, it is plausible that by the third year of the study, their confidence and facility with the modality increased.

5. Barriers to Service Engagement and Employment

Summary of Findings

- While participants did exhibit signs of mental illnesses, including symptoms of personality disorders, PTSD, anxiety disorders, and depressive disorders, they were less likely to experience symptoms of schizophrenia, severe bipolar disorder, or severe major depression.
- Participants' mental illnesses were not the sole factors impeding their employment.
- Physical impairments were barriers to employment and to supported employment service usage.
- Participants prioritized meeting basic needs for housing, medical care, cash, food, and transportation before meeting employment goals.
- The need to orient and socialize "treatment naïve" participants, who might have been visiting a social service agency or CMHC for the first time, preceded delivering support for rapid job searches.

This chapter addresses the following question from SSA's Statement of Work (SS00-16-60014, p. 4): "What programmatic disincentives create barriers for denied applicants with mental illness to return to work?" The question suggests that serious mental illness was the main factor impeding denied applicants' employment. While participants did exhibit symptoms of mental illness, on average, they experienced symptoms of personality disorders, PTSD, anxiety disorders, and various depressive disorders more frequently than symptoms of schizophrenia, severe bipolar disorder, or severe major depression. Further, providers remarked that many participants' mental health problems appeared secondary to physical illnesses. Plausibly, factors that contributed to participants mental health problems included social marginalization and lack of access to economic resources.

In addition to mental health problems, participants experienced serious physical impairments. Other barriers to achieving employment goals included inadequate treatment of physical and mental impairments, housing instability, food insecurity, lack of reliable transportation, substance use, and criminal justice involvement. This chapter embeds discussion of programmatic disincentives to work in a larger inquiry into the multiple personal, socio-economic, and environmental barriers participants faced engaging with SED services and gaining employment.

The major SSA programmatic disincentive to employment for participants was the necessity to demonstrate to SSA that they were unable to engage in substantial gainful activity (SGA). Participants described that they worried that if they should return to work, they may not qualify for disability benefits upon appeal or re-application. Sometimes participants who had retained a lawyer to assist with their disability income application told interviewers that their lawyer told them not to work while their case was pending.

Participants' priorities to meet unmet basic needs for housing, medical care, food, income, and transportation before meeting employment goals were not the only challenge to IPS SE service engagement. SED providers remarked that many participants had never engaged in community mental health or social services before SED enrollment. According to providers, "treatment-naïve" participants required a period of orientation and socialization to the role of service recipient. Some participants did not want to receive services at a CMHC despite expressing an interest in employment.

SED participants were far from a homogenous group of individuals in the early stages of serious mental illness. Indeed, SED providers did identify a small group participants who had experienced a mental health crisis in the recent past that threatened their employment. As SSA and the research team developed resources for the SED for participants in the early stages of mental illness, SED providers found these participants' treatment needs relatively straightforward. However, other participants' needs and challenges were more difficult to resolve. According to SED providers, some participants did not identify as individuals with mental health problems. Other participants had serious physical impairments, including some who were in the terminal stages of a physical illness. Other participants had serious issues with substance use. Overall, SED providers reported that the largest share of participants were individuals experiencing untreated and undertreated chronic mental and/or physical impairments of lengthy duration. Participants whose illnesses were untreated and undertreated rarely possessed any documentation that might have comprised a credible application for SSA disability income. That may be one of the reasons why SSA had denied their recent application.

According to providers, SED participants frequently arrived in crisis to their initial appointments. Crises followed lengthy periods of poverty and manifested as homelessness, housing instability, food insecurity, transportation barriers, violent crime victimization, and untreated and undertreated physical and mental illness and substance use problems. Providers reported that many challenges they faced delivering IPS SE services were due to the varied and multiple unaddressed basic needs with which participants entered the study. In open-ended in-depth interviews, 64% of staff members spontaneously described SED participants at baseline as having fewer basic needs met than their organizations' typical clientele.

However, from the perspectives of IPS SE providers, the most vexing challenges to adequately serve SED participants were related to engaging them in services. These challenges are likely artifacts of the study due to the following reasons: participants could not passively withdraw from the study by no-showing for appointments; and participants had no previous working alliances with any provider at the CMHC before beginning to receive IPS SE services. This contrasts with "typical" CMHC clients, who rarely receive a referral to IPS SE until they have established a working alliance with another mental health provider, usually a case manager, therapist, or psychiatrist at the same CMHC (Drake et al., 2012). Further, a typical CMHC will discharge a client from IPS SE services if they repeatedly no-show for appointments, avoid staff calls, or otherwise indicate that they are passively withdrawing from the service.

Understanding how participants' life circumstances, health problems, and the context in which they entered into IPS SE services are important for at least two reasons. First, that participants' challenges and needs were somewhat unanticipated by SED providers and the research design team has implications for outcomes. Participants' outstanding basic needs, under-treated health conditions, and difficulties with engagement slowed their progress toward their employment goals. Furthermore, that participants' immediate needs for housing stability, basic healthcare, and other necessities are among the most intractable (and, arguably, inappropriate) problems for mental healthcare workers in the United States to address (Drake & Bond, 2021) meant that stabilizing some of the most impoverished participants was exceedingly difficult.

Second, there are implications for how to design a scaled-up program that would provide employment and wraparound services to future applicants denied benefits. Because so many demonstration participants' most pressing problems were meeting everyday needs, a scaled-up program should consider how to address the resource deficits among denied applicants. Obtaining basic primary medical care for newly denied applicants (and subsequently helping participants find appropriate specialty care recommended by the primary care physician) should be another objective of a scaled-up program. Further, it might help providers to feel less pressure to deliver bona fide IPS SE services if a future program allowed providers to deliver outreach and engagement services to participants resistant or highly ambivalent about services.

5.1 Service Engagement Challenges

In regard to challenges around engaging in services, SED participants seemed more like first-time CMHC clients than clients receiving IPS services for the first time. A likely explanation for at least some problems engaging participants in services was participants' lack of understanding of how CMHCs operate, what their providers would expect of them as clients, and what they could expect of the CMHC. Further, some participants held unrealistic expectations of how they would benefit from SED services. Finally, other participants were simply too impaired to engage with SED services in the outpatient CMHC setting.

Staff interviews throughout the 4 years of the demonstration highlighted that the biggest challenge working with SED participants was difficulty engaging them in services and, once engaged, maintaining their involvement. Staff felt that the extent to which they needed to work to keep participants involved was unprecedented in their experience. Eventually, according to team leads, ongoing difficulties maintaining engagement led to burnout among service providers. In Years 3 and 4, process evaluators heard this theme repeatedly during in-depth interviews.

In all 4 years of interviews with SED service providers, participants' lack of engagement with services was the top-of-mind. When staff mentioned issues with participant engagement, they meant that they struggled to locate participants and to meet with them, either in person or by phone. During in-depth interviews, staff members described a small portion of their SED caseloads as individuals they had never succeeded in locating. Over the course of the study, reports of service use on the Monthly Service Use Checklists (which recorded face-to-face meetings between an SED service provider and a participant) dwindled from about 50 percent in the first months of enrollment to 15 percent by 24 months. This means that during the first months of enrollment, about 50 percent of treatment-arm participants met with an SED team member at least one time in the month, and toward the end of participation, only about 15 percent were meeting with an SED team member at least once per month.

SED participants' engagement challenges were more similar to that of first-time CMHC clients than to that of first-time IPS service recipients. Throughout process evaluation data collection with SED service providers, evaluators repeatedly heard that the participants recruited for the SED demonstration were markedly different than the clients they were used to serving in their IPS SE programs. As discussed in the rest of this chapter, there is more than one way participants differed from usual CMHC clients referred to an IPS SE program. However, arguably, the most important difference between the majority of SED participants and the "typical" client is that many who enrolled in SED were treatment-naïve. SED providers reported that the majority of participants had never been clients of community mental health service or social service agencies previously. In contrast, the individuals who usually enroll in IPS SE services are almost always referred by a CMHC service provider (Swanson & Becker, 2013:8), and usually one with whom they have had an acquaintance of several weeks, if not several months or years.

It is also important to note that the context of the SED as a research study was different than the ordinary clinical contexts in which IPS specialists usually receive referrals and discharge cases. CMHC and other social service organizations providing IPS services generally have a high demand for IPS services and, therefore, prioritize work with clients who feel ready to start the job search process. Clients who enroll in IPS services and miss appointments, avoid staff calls, or otherwise fail to use the service are discharged after 30 to 90 days (depending on the organization's policies) to make available the opportunity for other clients to use the service. In contrast, SED participants needed to disenroll formally from the study for the site to discharge them from services. Passive withdrawal, such as failing to respond to calls and not showing for appointments, did not lead to discharge. Instead, SED staff found themselves in the position of continuing to try to persuade "unengaged" participants (who would have been discharged if they were the organization's clients) to meet with them.

Therefore, we suggest that the single-most important reason why staff found engaging participants with services challenging is an artifact of the study. Veteran team leads and IPS specialists tended to compare SED participants' engagement to that of their IPS SE clients. However, because SED participants were new CMHC clients, a more appropriate comparator would be other new CMHC clients—people seeking services at a CMHC for the first time, including those who no-show for their first (and only) appointments. Researchers estimate that rate of no-shows on first appointments at CMHCs are around 50 percent (Sparks, Daniels & Johnson, 2013; Williams, Latta & Conversano, 2008; Willston, Block-Lerner, Wolanin, & Gadner, 2014). It is this population of individuals who are likely the most similar to SED participants in their rate of engagement in mental health services.

SED service providers described many participants as unfamiliar with the client role at community mental health/social service agencies. Another consequence of participants' treatment-naïveté was their failure to grasp their role as a client of the SED service provision team. As noted, SED participants' entry into the SED and IPS services was markedly different from the entry of most sites' usual clientele into IPS services. Generally, individuals referred for IPS have behavioral health supports and they receive the referral to IPS from a behavioral healthcare worker. They already know what to expect when they visit a CMHC or social service agency, because that was their referral source. In contrast, in the words of an administrator, "with SED… we're identifying folks who haven't sought our services." While SED participants may be interested in employment, as they indicated during recruitment, they may not have fully grasped what is involved in receiving employment services at a CMHC or other social service agency. Further, it's also possible that an individual may want a job but not want to become a client in a social service organization.

While recruiters thoroughly described the services offered as part of SED, an eligible individual with no experiences with social service agencies is unlikely to have fully grasped the responsibilities and entitlements that are part of being a client (Alcabes & Jones, 1985). Staff reported that many participants entered the study "unsure of what they signed up for," unfamiliar with expectations, and uncertain whether they wanted to work with the SED team. A site administrator explained that new participants with no experience with social services have trouble understanding how to interact with the professionals who are helping them. This administrator explained that at the beginning of enrollment, participants, "are still getting accustomed, to this point, to being involved in services.... They kind of get confused about our role: 'We're not your friend, but we're a professional, so we care.'"

Socializing SED participants into the client role and explaining the service delivery process were strategies to keep participants engaging in the early months of enrollment. For example, a team lead explained:

> *We've gotten really good at describing the program, letting them know what they signed up for at the outset, because what we learned is that if you don't*

> *do that really well… their expectations are different and usually they'll end up being frustrated and drop out, or be really upset that things aren't moving the way they thought they would [and] just stop returning calls. Like, "This isn't what I thought it would be."*

An administrator at a different site concurred that socialization was the first stage of engaging with participants with no social service experience, "We're trying to work with them… to get them to understand: do they need to be here? We're trying to identify what their mental illness is, if they have one, [and to] also change their thought processes."

Other participants did not identify as someone with a mental health problem and were unconvinced that enrollment at a CMHC would meet their needs. Staff members reported that participants may have felt stigmatized by being identified as a client of a mental health center. Other participants reportedly denied any mental health issue, saying that their disability was the result of a physical illness or impairment.

Some SED staff described participants who expected to get payments for receiving services. Other participants seemed to expect that the site would dole out cash to them. While staff sometimes interpreted these requests for payment as the participant trying to "take advantage" of the site, it also revealed the extent to which SED participants misunderstood what they could expect as a social service client.

Participants' unrealistic expectations of services and providers were a barrier to engagement. Typical clients beginning IPS have been involved in behavioral health and social services long enough that they have a realistic idea of what to expect before they meet their IPS specialist. In contrast, some SED participants began uninitiated into the client role in social services agencies. Their lack of familiarity with social services led some participants to set expectations too high for their work with SED, causing disappointment and frustration. Other participants—some with no social service experience, and others with bad experiences—expected very little.

Service providers reported that participants sometimes had unrealistically high expectations of the SED. Staff described some participants as disengaging from services in frustration when they did not see results quickly. A care manager explained, "I feel like a lot of our clients want instant results. For instance, they want housing now; they want benefits now… it's hard for them to realize that it's a process. I feel like they get a little frustrated with me." A team lead at a different site said he explained to treatment-naïve participants:

> *We're going to help you look [for employment], and we will go and talk to employers and try to seek connections, and we'll utilize any that we already have. But it doesn't mean that tomorrow I'm going to set you up with a manager just because you want a job. It doesn't happen that fast. A fast placement usually means a fast termination.*

Participants who had very low expectations of services did not see much advantage in engaging with them. According to SED staff members, participants had low expectations for a number of reasons, including previous negative social service experiences; difficulty establishing trust; or feelings of hopelessness about their health issues and employability.

It is important to remember that SED participants' previous encounters with so-called "street-level bureaucrats," such as police, teachers, and social workers (Hopper, 2006; Lipsky, 1980) may have been negative, humiliating, and sometimes punitive. Further, negative attitudes toward service providers are not only individual; participants generally resided in communities where it is commonsense to avoid such encounters. According to baseline survey data, more than 53 percent of SED participants experienced arrest and booking for a crime at some point in their lives. While we do not have data on the number of participants who have had their parental rights terminated, process evaluators learned that it was not a rare event among SED participants.

All SED participants recently received a denial from SSA, which many participants experienced as invalidating of their struggles with health problems and poverty. One care manager explained that some participants struggle with services because they are conditioned by their past experiences seeking help from organizations:

> *They've been denied disability and apparently, they thought it was a sure thing: "I've got this disability; I've got this diagnosis, I'm going to get my disability." They were counting on that. It didn't come through.... They've reached out to food banks in the community; they have their lights cut off in the past; and they've had their water cut off in the past. They just couldn't get the help they needed. I think they feel that the world is against them.*

Lacking trust in any service providers, these participants are wary of anyone who purports to offer them anything. Another staff member, a team lead, articulated their perspective this way: "They're used to being on their own a lot. They're not used to trusting people. 'Are you really here to help me?' They really don't understand that side of the world."

Another team lead explained:

> *I think, a lot of times they're waiting for us to—I guess—quit on them. And I've seen social services, and we're just... we're not very nice sometimes. And people get so frustrated. I know I get frustrated calling [for services] as a clinician, and then, I'm speaking their speak. I couldn't imagine being... just a layperson calling. You [would be] like, 'Forget it. I'll just starve.'*

This team lead acknowledged how difficult it is to find resources for people in need. He found himself becoming upset and frustrated when he asked for something on behalf of a client and received a refusal. He empathized with how much more infuriating it must be to be asking on your own behalf from a position of dire need.

In response to the question of why participants did not use the services to which they had been referred, SED staff members often spoke of participants lacking self-confidence, lacking motivation, and feeling hopeless about their employment prospects. These three characteristics—lack of confidence, lack of motivation, and feeling hopeless—tend to co-occur. That is, staff perceived participants who lacked self-confidence as also usually unmotivated and hopeless. An IPS specialist put it succinctly, "Some [participants] lack a lot of motivation, which I see as a lack of confidence. They've already decided in their head that it's not going to work, so they don't bother to try."

Many participants who lacked the confidence to seek employment had previous experiences of failure. For example, process evaluators interviewed a participant who made a suicidal gesture at her place of work in response to bullying. She worried that no one would hire her because of her behavior at her previous workplace and had been too ashamed to pursue employment for 4 years. However, when she secured a job she likes in her field of expertise, she attributed that success to her IPS specialist's encouragement and matter-of-fact assumption that she would find another job. Several IPS specialists concurred that they served as a "cheerleader" for participants lacking self-confidence.

Participants with major health-related impairments were difficult to accommodate with SED services in the CMHC setting. Providers reported that some participants were simply too sick to attend appointments. These participants were in the terminal stage of an illness, in too much physical pain, too psychotic to communicate adequately, or too depressed to get out of bed for appointments. Providers estimated that at least 50% of participants on their caseloads had substance use problems (Smith, Bury, Hendrick, Morse & Drake, in press). Some participants who used substances spent most of their time either high or sick with withdrawal, according to staff. Homeless, transient, and very impoverished participants were difficult to locate, and, at times, could not be reached by phone. Incarceration kept some participants from engaging; others entered locked detox programs. Participants also missed appointments because of difficulties accessing childcare and transportation.

Core SED services included IPS SE and care management. Full-Service participants received medication management and nursing services from an NCC in addition to the core SED services of IPS SE and care management. Overall service usage declined throughout the entire study, with the percentage being quite low in the final 2 years when service delivery largely shifted to remote modes.

Pandemic-related measures that prevented in-person operations from taking place introduced challenges related to technology, privacy, and rapport, along with challenges with engaging participants and delivering quality services. These challenges may account for some of the drop-off in service usage by participants, which may ultimately affect outcomes negatively. However, it is important to note that SED providers reported that some participants re-engaged, or engaged more intensively, during the pandemic. Therefore, any inference that the pandemic-related service delivery challenges caused a drop in service usage should be made cautiously.

The SED will examine outcomes for all participants regardless of the extent to which they used the services as intended, according to the intent-to-treat principle. Even so, it is important to consider the extent to which treatment-arm participants adhered to the treatment protocol, so that it is possible to assess whether SED outcomes might underestimate the magnitude of the treatment effect for fully adherent participants (McCoy, 2017).

5.2 Unmet Needs

Basic Needs

SED staff reported that many of the challenges they faced delivering services—and IPS Services in particular—were due to the varied and multiple unaddressed basic needs with which participants entered the study. Many staff members made the point that while typical clients at their organization experienced similar hardships in their lives as did SED participants, typical clients' referral sources usually addressed outstanding needs prior to engagement with employment services. Providers reported that some SED participants entered the study with housing instability, difficulty accessing reliable transportation, and untreated physical health, mental health, and substance use problems. Staff described a sizable group of participants as prioritizing meeting their immediate needs, as opposed to searching for employment: "The SED population… there's a lot of just basic needs that are not being met right now. Although we do have folks that are very interested in working, they're also worried about, 'How do I eat today? Where am I going to sleep tonight?' and are really consumed with those challenges." The majority of staff members—64 percent—described SED participants as having fewer basic needs met (for example, for food, shelter, clothing, transportation) in comparison to the "typical" client of their organization.[4]

Approximately 5 percent of participants in all treatment arms (Full-Service, Basic-Service, Usual Services) described themselves as "homeless or in a homeless shelter, hotel, motel, or correctional facility" on the baseline survey. However, SED staff observed that many more SED participants were coping with housing instability. At one site, a staff member explained that among the individuals in their caseload, "I think we only have one or two who are truly identifying themselves as homeless, but it seems like most of them are either on the verge of that, or really, like, couch-surfing. They really don't have a place to call home and don't have a reliable way of taking care of themselves." An administrator of a site with a large program serving homeless clients explained that SED participants "are on the fringes of going… into the undertows of homelessness…. There's a level of acuity there that needs to be addressed, and if not, then we'll eventually see them" among the homeless clientele.

Untreated and Undertreated Health Problems

SED participants reported that untreated and undertreated mental and/or physical health problems restricted their capacity to work. Service providers reported that some participants with ongoing health problems felt that they needed to treat their illnesses and/or impairments before they would consider engaging seriously with employment services. Addressing physical health impairments was an unanticipated and unfamiliar challenge for IPS SE teams.

Medical Needs. Across sites, SED staff said that physical health issues "end up taking precedence" over employment or mental health concerns for many participants. For example, one IPS specialist acknowledged that managing back, hip, and knee pain were difficult for participants. She lamented how she struggled to deliver employment services because participants, "Won't pursue work, or some of them won't even talk about work until something is done about their back or their hip or knee."

In baseline surveys, participants reported an average of three physical conditions. Sixty-five percent of participants reported back pain and 49 percent indicated they were obese. One in three (33%) reported hypertension or a lung condition (asthma, emphysema, chronic bronchitis, or lung disease). Participants endorsed physical health–related quality of life on the SF-12 that was more than one standard deviation below the national norm.

Indeed, many participants viewed addressing physical problems as necessary before they could realistically hold a job. For example, a participant explained: "I have to focus on my health. I can't focus on other things. I have to put my health first and then I can find a job." In focus groups and interviews, participants were more likely to highlight their physical health problems and pain than

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[4] These data come from in-depth interviews of staff members who either responded to a question about differences between SED participants and their sites' typical clients, or spontaneously discussed the differences. Not all staff members addressed differences between SED participants and typical clients, and not all staff who described differences referred to the extent to which each group had their basic needs met. Other important topics staff described included differences in the types and degree of impairments, engagement, commitment to work, and access to support and benefits.

their mental health problems. Another participant asked rhetorically, "How am I going to try to do employment if I'm having a struggle just to make it to go to the bathroom?'"

Managing pain was overwhelming for many participants. Some who were in physical pain described challenges in finding jobs for which they don't have to remain for long in one position—standing or sitting. As one participant noted, "I can't have a job where I'm standing because of my back. And I can't have a job where I'm sitting all day because of my back." In some cases, participants had pain so debilitating that they could not even leave their homes, as described by one IPS specialist:

> *We have a lot of clients that were either in car accidents or had various head trauma where they deal with consistent chronic pain. I mean, I have one guy that spends 90 percent of his life either in his bed or in the recliner right next to his bed from a car accident, the pain is so severe. I think that's probably been one of the biggest challenges, the chronic pain piece.*

Addressing the substantial physical impairments of participants was a new challenge for teams. For example, a team lead noted an increased emphasis on medical care coordination for participants, noting that the physical health needs were "a little bit out of our area of expertise. We're learning things. We're trying to coordinate people with specialists and physicians. So that's been a little bit different." Some staff sought and received specialized training on topics such as fibromyalgia and chronic pain because they had no experience working with these conditions before the SED. In contrast to mental health problems, SED staff reported that participants exhibit greater prevalence and severity of physical impairments than typical clients using services at their site. Phrases used by staff to describe this comparison included: SED participants having "more serious" medical issues of "greater severity," "more physical limitations," "significant physical disabilities," "medical problems to a higher degree," "bigger physical health barriers to stability," and "multiple health issues."

Although sites' usual clientele also present with physical limitations, staff explained that physical health issues stabilize prior to their engagement with the site and definitely before engaging in employment services. Physical health conditions were not the reasons they sought services at the site. In contrast, SED participants often displayed multiple unaddressed physical health issues at intake, especially among those participants who entered the study without having health insurance.

IPS specialists learned to tailor employment services for people with physical health impairments. They searched for jobs that did not require the participant to stand all day. They worked with participants and employers to secure employer accommodations for physical limitations. They sought reimbursements from Westat for items to mitigate pain while working, such as supportive shoes, cushioned mats on which to stand, back and knee braces, walkers, compression socks, canes, and hot/cold pads, among others. They requested assistive technology from their local Departments of Vocational Rehabilitation. For a participant with severe intestinal issues who was afraid to leave the house and the convenience of his bathroom, IPS specialists focused their search on work-from-home positions. Care managers searched for specialty doctors to address SED participants' various medical needs.

For some participants, both the participant and the SED team agreed that employment was not an appropriate goal for the participant until the participant's health status changed. There were examples at nearly every site. For example, the need for an immediate heart transplant superseded the employment search for one participant. Another participant at a different site had not been able to eat for several years and required intravenous feeding for 12 hours per day. A third participant had a rare form of cancer with no known cure, although she expected to receive palliative surgeries to alleviate pain when it becomes too much to bear. Process evaluators accompanied the IPS specialist on a visit to this participant's home; there was no talk of employment. Instead, the IPS specialist provided support, reminded the participant about upcoming doctors' appointments, and made suggestions for how the participant could seek payment for some outstanding bills. These are only a few examples of many participants for whom staff and the participant themselves concluded employment was not a realistic option.

SED service providers did not report many major changes in participants' physical health conditions as a result of the pandemic; however, they stated that some participants were avoiding meeting with providers regarding physical health issues unless absolutely necessary. They believed that participants were more willing to meet with mental healthcare providers during the pandemic, and these appointments were generally easier to conduct via telehealth.

Mental Health Needs. While staff felt that they spent more efforts on helping SED participants meet basic needs and manage physical impairments, they also felt that the mental health problems of participants were different than those of their sites' usual clientele. Staff members repeatedly observed that participants exhibited symptoms of anxiety (including PTSD), depression, and personality disorders, rather than symptoms of psychosis. At almost every site, staff echoed a team member's summary that "pretty much everybody is anxiety and depression," when asked to describe the common mental health concerns of participants. For example, a care manager explained the difference between SED participants and the typical clients of her organization, saying that SED participants:

> *Don't have a level of symptoms that would traditionally meet the level of needs that we can help with. A lot of my normal case load… come in through Access or the intake process, have a higher level of acuity, higher level of needs as far as mental health treatment.*

An NCC described the range of mental health concerns of the SED participants she treated in comparison to the typical clients of her organization, who were mostly individuals with psychotic disorders:

> *There's some bipolar [among SED participants] but usually not with psychotic features, so that's different in that the level of acuity is lower and yet it's still causing significant issues in terms of their day-to-day life. They're able to perform ADLs [activities of daily living]; this is not true of all of our clients here. A lot of our people here are… learning how to do laundry, how to cook, how to shop, how to shower. These folks are not like that.*

Eighty-one percent of participants endorsed symptoms consistent with one or more mental health conditions; 10 percent reported only mental health symptoms and no physical symptoms on the baseline survey (see Table 5-1). Participants' self-reported mental health quality of life on the SF-12 Mental Composite Score on the baseline survey was more than 1.5 standard deviations below the mean. About 45 percent of participants reported symptoms on the Composite International Diagnostic Interview (CIDI) that may indicate PTSD. Forty-four percent of participants endorsed symptoms suggesting Antisocial Personality Disorder, while 40 percent endorsed symptoms indicating Borderline Personality Disorder. In total, 64 percent reported symptoms indicative of any personality disorder from Cluster A, B, and C. Thirty percent reported symptoms of depression.

Table 5-1. Percent of participants endorsing mental and physical symptoms, baseline[a] (N=1876)

Mental health only[b,c]	Physical health only	Both mental and physical health
9.8%	7.6%	81.1%

[a] 1.5 Percent of participants endorsed no symptoms at baseline. Data include only participants who completed both the CIDI and the baseline interview.

[b] Data do not represent diagnosed conditions but rather those who met criteria indicating the possible presence of a mental health condition.

[c] **Source:** Composite International Diagnostic Interview (CIDI).

Participants' mental health conditions posed substantial barriers to work. Anxiety and depression were debilitating for many SED participants and not only caused problems on the job but also made it difficult to search for jobs. An IPS specialist explained:

> *One of my clients, she's just super anxious and gets so afraid of even applying to work that she'll kind of miss meetings. She just won't apply to jobs. Just kind of psyches herself out. Just has a hard time with utilizing coping strategies. So it's just really working with her on managing her anxiety symptoms.*

Descriptions of anxiety and how it affected participants' employment were common in focus group discussions. Some participants felt that anxiety affected their cognition to the point that they were ineffective workers. For example, one participant explained:

> *My main problem is that since 2006 I've been suffering from anxiety, and the anxiety really doesn't let me do much in terms of work. Because as soon as my brain starts to feel a little tired, I start feeling it. I just feel the need to repeat things, stop doing whatever I'm doing, things like that. That's why I haven't been looking for a job because I'm not really sure I'm going to be able to keep it or do one hundred percent of the work because of the anxiety.*

A participant at another site indicated that her difficulty completing work tasks was severe enough that it led to termination:

> *I'll start doing something and not even five minutes later, I'm off doing something else. I cannot finish the one task that I'm supposed to do. I can get a job with no problem, but when you have depression and anxiety and stress and everything else and PTSD and stuff like that, it's hard to keep a job.*

Many participants reported anxiety about leaving the house. For example, one participant who had made some progress in overcoming her dread of stepping outside explained:

> *The biggest thing right now is my anxiety. For the longest time, I couldn't even leave the house. It was just stressful. We got symptoms that just were beyond control… I don't know if a job will hurt or help that, I'm willing to try and hope that everything will work out, but we'll see.*

Staff and participants described some of the latter's PTSD symptoms as the result of sexual, physical, or emotional childhood trauma. A care manager at an urban site told us that participants' PTSD was a result of "cumulative life trauma, the chronic poverty, housing issues, stuff like that." Participants' descriptions accorded with these observations, for example, a female participant who linked her challenges in dealing with authority figures at work to her PTSD, which stemmed from childhood abuse:

> *I been going to therapy for two and a half years. So, I'm learning about me. I have a problem dealing with higher authority. I was abused as a child. I don't wanna go there, but a lot of stuff reminds me. Like if a person yells at me, that will take me back to that ten-year-old or eight-year-old girl.*

Another participant who identified as having PTSD as a result of childhood experiences described how this affected him in the work environment:

> *Large crowds, being around loud noises like working in a restaurant, the banging of the pots and pans makes me jump and it makes me turn around. If I turn around too fast, I'll lose my footing and I could fall, I could hurt myself. A lot of it has to do... a lot of my symptoms have to do with my childhood, the way I grew up, living in bad neighborhoods, hearing gunshots every night, living in and out of vehicles, living in and out of national parks as a child, growing up that way.*

A sizable group of participants had mental health problems that were undiagnosed before intake. Other participants said that they did not have a mental health problem and would not complete a diagnostic intake.

The Influence of the Pandemic on Mental Health Problems

Many SED providers reported increases in anxiety, depression, paranoia, and panic attacks, resulting in higher needs for behavioral health treatment among participants. A typical description of how the pandemic affected mental health was the following:

> *I think it's just isolation. It's not good for people's mental health. Self-isolating can be hard, and then I think that there were a lot of people that got laid off and were worried about having to navigate unemployment, that kind of thing. Lots of stress and then fear and worry of catching COVID and all of that.*

Some participants were extremely fearful of leaving their home. Others sunk into depression after experiencing a job loss. At least one participant, struck with fear that a co-worker had exposed him to the virus, began experiencing panic attacks at work.

In addition to an increase in mental health needs, staff saw an increase in need for general emotional support. Some participants just wanted someone to talk to after experiencing isolation and uneasiness during the pandemic. Staff saw an increase in engagement from some participants who were disengaged before the pandemic. Because participants were home, they were more likely to answer the phone. Staff took advantage of this opportunity and, in some cases, strengthened relationships with participants by providing "that extra support and encouragement."

Substance Use and Relapse During the Pandemic

Staff reported an increase in substance use and relapse during the pandemic. This resulted in an increase in needs for assistance with medical referrals, housing, criminal justice intervention, and basic needs such as food and clothing. According to one staff member, “It doesn’t really matter if you’re on the substance use team at [the site] or not; every case manager has folks that struggle.” Participants are often reluctant to share details about substance use with staff; therefore, staff-provided counts of substance use among participants may be underestimates. Staff sometimes have unconfirmed suspicions that a participant has relapsed due to their behaviors:

> *I have one participant, he hasn’t openly told us that he uses it, but he has a history of it. And, sometimes you can tell that he disappears for a while, and doesn’t communicate with us. And, that’s when I feel like my brain goes to like, he’s probably using.*

Before the pandemic, staff could stop by an unresponsive participant’s home to check in; losing this engagement tool made it more difficult for staff to track down participants who were not answering calls and may have relapsed. The pandemic has also made substance use treatment more difficult. Some participants who had benefited from Alcoholics Anonymous (AA), women’s groups, or other recovery programs no longer had these sources of support, because they halted in-person meetings during the pandemic.

5.3 Other Barriers to Employment

In addition to physical and mental health impairments, many participants experienced numerous other barriers to employment. Throughout this report, we mention many of these barriers in the context of discussing how staff and participants worked to overcome them. Here, we elaborate on some of the barriers, including lack of transportation, criminal justice system involvement, and housing instability.

Transportation

SED staff and participants described a lack of reliable transportation as a barrier to seeking and maintaining employment. Transportation was inevitably the first barrier when we asked staff to discuss what challenges prevented participant engagement with services and participant employment. Staff were able to overcome transportation problems by conducting appointments with participants at their homes or other community locations convenient for the participant. Some SED team members provided transportation to and from the workplace to participants on a limited basis, but all acknowledged this was not a long-term solution.

Surprisingly, just under 80 percent of participants reported they had “access to reliable transportation when needed” on the baseline survey. However, since approximately the same percentage did not have a job at baseline, it is quite likely that when answering the question most participants were not thinking about how they would get to and from a place of employment, or even how they would get to the demonstration site.

Difficulties accessing transportation were most prominent in rural and mixed rural/urban areas. Most sites provided participants with monthly bus passes to facilitate participants’ job search-related activities. Other sites provide passes or tokens for single or round-trip rides. In rural and mixed rural/urban areas, however, bus service was sometimes not reliable, and the transit system was not extensive. For example, one mixed rural/urban site reported that the bus runs only from 8:00 am to 4:30 pm, which eliminated accepting work on evening shifts and also 9-to-5 jobs. Sometimes the bus system in the catchment area only ran every hour, necessitating the participant arrive at their job or appointment extremely early. On the return trip, they do not have the flexibility to stay a little later to assist their boss or coworkers without missing their ride home.

Transportation for participants living in rural areas is a serious barrier to job searches and job interviews, and, in some cases, maintaining employment. At one mixed rural/urban site, some of the lowest income enrollees without transportation literally lived "in the middle of a chicken field," and would need to drive 20 minutes just to reach small towns with only low paying jobs, such as work in retail or fast food. These participants are unlikely to earn enough at these jobs to afford to purchase a vehicle, or to pay a transportation service consistently. Some townships near rural areas where participants lived have low-cost ride-sharing services for residents with disabilities, but these services are generally in very high demand and restricted in how they may be used. (That is, they may prioritize transportation to medically necessary appointments over transportation related to employment.)

Some participants did not have a driver's license, access to a car, or the money to buy gas. Other participants did not drive or use public transportation due to PTSD or anxiety.

Sites reported increased transportation challenges associated with pandemic-mitigation efforts. Some transportation services previously available to participants to commute to and from work were restricted to medically necessary appointments due to social-distancing requirements, leaving the SED team to brainstorm how to find transportation to work for some participants. Sites kept bus passes at the office, and participants were unable to access them during the shutdown. Further, public transportation cut services: an IPS specialist explained, "…not only have they dropped the amount of routes and buses that they're running, but they're also not running on the weekends… especially for retail and restaurant, that's prime time to work, and now they don't have a physical way to get there."

In addition, before the pandemic, some care managers transported participants to health appointments, job interviews, and food pantries. During the height of the pandemic, most sites were no longer able to provide transportation, but some care managers would pick up food from food pantries and drop boxes off at the participants' homes. The inability to provide transportation did hinder some of the services care managers could provide to their participants. Sites also looked for ways to get bus passes to participants during this time. Some sites could provide transportation by using the agency's van and having the participant sit in the back to maintain adequate physical distancing. As precautions lifted, some sites began allowing vaccinated care managers to provide transportation again.

Criminal Justice System Involvement

Involvement with the criminal justice system is another barrier to employment. At baseline, 13 percent of participants reported that they experienced arrest and booking in the past year, whereas 53 percent experienced arrest and booking at least once in their lifetime. Crimes ranged from misdemeanors to felonies, from disorderly conduct or theft to domestic violence or murder. All sites reported at least a few participants whose criminal records made employment more challenging. Some participants with criminal records reported that they had nearly given up on looking for a job, since employers have turned them down repeatedly because of their records.

Other participants mentioned pending trials or sentencing dates that made job development difficult.

Some IPS specialists with participants who had criminal records worked with them to expunge their records when it was possible. IPS specialists also look for “felony-friendly,” or “background-friendly,” jobs that do not require a background check for employment, or that will hire someone with a record. One team discussed searching among small businesses for jobs for a participant with a criminal background, because, in their experience, they are less likely than large business or franchises to conduct a background check.

However, felony- or background-friendly jobs are usually entry-level jobs, which is a problem for participants with higher education and skills who are interested in intermediate and senior positions. Staff reported that these participants sometimes “aimed low” and chose to apply for jobs where they knew they would not be asked about a criminal record because they were uncertain or uncomfortable talking about their criminal record with employers. Participants with criminal backgrounds considered warehouse jobs and jobs in the food industry as those that would not ask about a criminal background. However, these types of jobs were problematic for participants with physical limitations.

An option for participants with criminal backgrounds who wanted jobs that would include a background check was to explain to the employer their criminal background. Staff worked with participants to develop a sincere narrative they would share with employers during interviews to explain their crime and how they have changed since then. IPS specialists then role-played interviews in which the participant would explain their background so that the participant would feel confident about broaching the subject of their criminal justice involvement with employers.

Housing Instability

A major challenge at nearly every site is that a sizable group of participants did not have stable housing at the time of enrollment. Site teams reported that at intake some participants lived in vehicles, “couch-surfed” among relatives and friends, or others lived in tents. Housing instability is a catch-22 for employment. Staff reported that participants with inadequate housing usually wanted to address their housing before focusing on employment. However, it was sometimes difficult to qualify for, and maintain housing, without employment. For participants who did not want to work toward employment before they found adequate housing, this usually meant a very long delay before beginning IPS services in earnest, as finding appropriate housing was the most difficult barrier to overcome.

A major challenge was a lack of affordable housing in certain locales. In particular, a strengthening economy drove up housing prices, while waitlists for Section 8 housing closed, or waitlists were 5 years or longer. While some participants relocated to outlying areas where rents are cheaper (and public transportation is sparse) others became homeless or at risk of homelessness.

Care managers and other SED staff described referring participants to external or internal providers who specialize in providing housing assistance. Sites that referred participants to specialized housing assistance felt that they benefited from assistance navigating the cumbersome and confusing process of applying for housing. They also felt that the professional connections housing assistance staff have allowed them to advocate effectively on behalf of participants. A care manager described a participant who needed housing for a family of eight. The care manager explained that there was no way her skills were up to the challenge of finding housing for this family. However, the specialized service professionals were able to locate subsidized housing for the entire family.

Housing continued to be a high priority for SED participants during the pandemic, and care managers worked to help participants meet this need. Early in the pandemic, some sites experienced an easing of worry about unstable housing, as eviction moratoriums and emergency rent assistance provided some temporary relief. Care managers helped participants complete applications to receive funds, such as through the Coronavirus Aid, Relief, and Economic Security Act (CARES Act),[5] to keep their housing.

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[5] Congress passed, and President Trump signed into law the Coronavirus Aid, Relief, and Economic Security Act (CARES) in 2020 in response to economic difficulties in the wake of the pandemic. The CARES Act included cash payments to individuals, and an increase in unemployment benefits, among other things. It also included a 120-day moratorium on eviction filing for rentals.

6. Payments for Employment-Related Necessities

Summary

- The SED required all demonstration sites to provide study participants in the treatment-arms with a wide range of services intended to meet individual work-related needs. For example, about 20 percent of study participants did not have health insurance at the time of enrollment into the study.
- Participants had significant challenges meeting with their financial obligations and keeping stable housing that affected their ability to focus on getting or keeping a job.
- Funding for basic necessities, as well as health-, dental-, and job-related services and items, was critical for helping participants overcome barriers.
- Otherwise unmet needs for temporary rent payments, auto repairs, parking tickets, and legal fees may negatively affect participant's employment. Payment for these nonclinical supports, along with uninsured claims and clinical services, constituted a significant component of the overall reimbursements in this study.

Each year, the federal government allocates funds in various health and social welfare programs to support social services for vulnerable children, adults, and families, including healthcare, rental assistance, food, and employment. Eligibility for all such programs rely on federal rules related to individual or family income and/or assets. States then have broad discretion to administer the programs and determine how to distribute funds. However, these programs have eligibility requirements, including participation in other programs, and there are often waiting lists due to service needs exceeding funding allotment. For example, one site reported that their state's Division of Vocational Rehabilitation requires the use of specific retailers, vendors, and vouchers for work-related needs. Services most frequently accessed include vocational rehabilitation, rental and utility assistance, and healthcare.

The SED required all demonstration sites to provide study participants in the treatment-arms with a wide range of services intended to meet individual work-related needs. In their effort to foster employment, demonstration sites needed to provide access to needed behavioral health (and medications) and care management services, including wraparound services when needed, such as access to housing, legal aid, or financial services. The intention of these funds was to help participants with challenges deemed by the treatment team to impose an immediate barrier to working. All resources and funds aim toward fulfilling the goal of returning to work.

6.1 Scope of Coverage

For services or items to be eligible for payment or reimbursement, the participant's treatment plan must have clearly stated the need for the service item. Eligible services and items included the following:

- **Clinical and Other Behavioral Health Services.** These services include psychotherapy, individual, or family counseling, physical healthcare, psychiatric consultation, physical therapy, and occupational therapy.

- **Behavioral Health-Related Medication Expense.** Coverage includes deductibles, co-pays, and full cost of prescription drugs for the treatment of mental health symptoms, if not covered by the participant's health insurance.

- **Individual and Work-Related Expenses.** These consist of items or services directly related to taking a specific job and are typically associated with IPS service delivery. Examples include business-appropriate attire, certifications, licensures, and transportation costs for interviews. In special situations, it would also include dentures or other dental services that may alleviate a barrier to entering a job.

- **Nonclinical Support Services.** These consist of other items needed to help participants overcome barriers impeding their return to work. Typically associated with care management, these include services and expenses for temporary, short-term, or emergency assistance to address housing, legal, or transportation barriers. The reimbursement must enable the participant to overcome the barrier completely and not represent an ongoing need.

Health Care Access

Approximately 80 percent of study participants had health insurance at the time of enrollment into the study. Across all three study arms, Westat helped the 20 percent of participants who were uninsured obtain insurance through the ACA. The study provided an Uninsured Handbook to those who are not eligible for any health insurance. The handbook contained information on public health clinics (free and sliding scale) in or near the catchment area of the demonstration site. Clinics listed in the handbook provided preventive care and general medical services to uninsured individuals. The study reimbursed the cost for services at these clinics until the participant could obtain health insurance during annual open enrollment for the ACA.

External Providers

Participants had the right to choose their own providers. Treatment teams might have encouraged participants to consider changing from an external provider to a site provider to facilitate better integration of care; however, the participant ultimately made the decision. Treatment services provided by external parties were eligible for reimbursement. The participant's treatment plan must have clearly documented the need for the service, and the treatment team must have approved the external provider. All participants must have received IPS SE and care management services directly from the study site. In rare cases, when health insurance covered a service but the external (preferred) provider did not accept the insurance, the study would not pay for the service. An example is when an external provider did not accept Medicaid, the study would not be obligated to pay. The participant would have to use their health insurance to cover the service first before receiving a reimbursement for portions of the expense not covered. Appendix D reviews the reimbursement process.

6.2 Service Provider Perceptions of Reimbursement Process and Outcomes

During process evaluation interviews, we asked site staff and participants about their experiences with the reimbursement process. Themes emerged around several topics, including the claims submission process; site utilization of financial assistance, benefits, and pitfalls of providing financial assistance to participants; and the impact of COVID 19 on claims requests.

Documenting Need for Financial Assistance. SED teams needed sufficient documentation for approval of participants' reimbursement claims. Site staff frequently described team meetings as convenient forums for discussion about participants' reimbursement requests. Careful deliberations about reimbursements before submitting requests minimizes the likelihood of denial and, therefore, manages participant-staff relationships. Staff also described efforts to manage expectations and educate participants on what were "appropriate requests," the length of time it takes to process reimbursement requests, and the necessity of submitting claims for prior authorization rather than post-service requests.

Many staff members understood Westat to be the funding "source of last resort," and described seeking out other community programs for assistance. For example, staff across various sites explained that they pursued funding from the local Department of Vocational Rehabilitation for work clothes and education funding before seeking assistance from the study for similar expenses.

A few sites reported initial challenges with reimbursement. For example, one site reported rapid approval of some items and services while others took longer because they required additional documentation and needed to undergo supervisor review. Another site reported payment challenges due to site staff needing to accompany participants when making purchases using their debit card; they reported that a site-designated credit card would have facilitated the reimbursement process. A third site reported initial confusion regarding items and services covered, and another site commented on a lack of reimbursement guidance at the start of the study. However, over the course of the study, most sites reported becoming more proficient with documenting requests.

In addition to learning how to select reasonable requests and frame convincing arguments to ensure a streamlined approval, staff described several improvements implemented by Westat over the course of the study that have facilitated the reimbursement process. For example, staff appreciated having direct access to the reimbursement planners who were able to facilitate expedited review in the case of emergency situations.

Utilization of Financial Assistances Through SED. Some sites under-utilized the financial assistance available through SED**.** One site reported that for the first year of the study, staff was unaware of how to utilize study funds, so they did not submit any participant requests for reimbursement. A participant at another site reported that he had saved over several months to pay for a necessary employment-based certification to obtain his current job because he was unaware the study could have assisted him. At a third site, very few participants accessed financial reimbursement through Westat; site staff were unaware of how to complete the claims submission process, and participants did not appear to know the funding was an option.

Financial Assistance to Remove Employment Barriers. One-time financial assistance available through the SED was instrumental in removing employment barriers for participants. Besides expressing generally positive impressions about the reimbursement process and improvements the study has implemented over time, many staff said reimbursements provided critically important services and benefits to study participants that far outweighed the amount of work involved in submitting requests. SED staff and participants frequently described receiving approval for expenses related to interview- and job-appropriate attire, transportation, housing and utilities, medical and behavioral health, past due loans and fines, training and education, and communication and technology. Participants were very appreciative of the care they received, and they expressed that the support they received was significant in improving their lives and making them ready for employment. For example, a participant explained, "the most important part [of the reimbursement] was the jumpstart to getting my degree; and you definitely helped me do that. As far as I'm concerned, right now everything else is small and an extra added benefit to what you already helped me with.” Similarly, a team lead commented, “So there was a lot that Westat was extremely generous with, that there is no way, you know, unless a pot of gold got dropped somewhere that we would have been able to help the participants overcome.”

Sites sought reimbursement based on gaps in service and program availability in their local area. One site reported that the study funded transportation, laptops to search for employment, housing, interview attire, surgery, and dental work because there were no other resources in the community that would have paid for these items. Another site used reimbursement for participant medication co-pays, dental bills, and glasses and another reported receiving assistance with rent and auto repairs. Other sites described how various items and services have removed barriers to employment for participants with whom they worked.

Interview and Job Items

A site reported that two participants obtained employment after receiving funding for a haircut, professional attire, and bus passes to attend interviews. A participant with “chronic foot issues” was able to work thanks to two pairs of orthopedic shoes funded by another site. A third site worked with an immunocompromised participant who eventually obtained hospital-based employment on a COVID patient unit; the study funded personal protective equipment (PPE) for her until the hospital could provide it to her. A participant at another site was a veteran and was able to use military funding and discounts to pay for equipment needed to start a taxidermy business; Westat funded the instant tanner equipment required.

Statement from a Study Participant

“The most important part [of the reimbursement] was the jumpstart to getting my degree; and you definitely helped me do that. As far as I’m concerned right now, everything else is small and an extra added benefit to what you already helped me with.”

Education

Some participants received funding to prepare them for careers. A site reported that the study funded phlebotomy coursework for a participant who subsequently obtained employment in this field. Another site reported receipt of funding for a commercial driver’s license (CDL) training course for a participant so he would be eligible for a promotion.

Outstanding Debts

Several participants incurred debts prior to study participation that prevented them from accessing employment. One site worked with a participant who was able to secure employment in his field after receipt of funding for a portion of the back dues owed to a local union. At another site, the study paid legal bills affecting a participant’s credit history and blocking employment.

Medical and Dental Care

Many participants had health issues they needed to address to seek employment. One site received funding for several participants to cover significant medical problems, including eye surgery, oral surgery, hip and knee surgery, and treatment for bladder cancer. Another accessed funding for new glasses for a participant who obtained home-based employment that required him to work in front of a computer. A participant at a third site required two leg surgeries to return to work that insurance did not cover so the study paid for them. A participant at another site received funding for surgery to repair a torn meniscus so she could return to work.

Lack of access to dental insurance presented a significant barrier to employment for several participants across sites. Many participants had teeth in poor condition that made it difficult to obtain employment in the customer service industry; in those cases, Westat allocated funding for dentures. One participant, after obtaining full-time employment, wanted to pursue a management position. However, her teeth were in very poor condition, which presented a challenge to promotion. The study paid for removal of all teeth and placement of dentures; after receiving her dentures, the participant commented, "… I have dreams. I have dreams when I see myself in the mirror, and I smile, and I have teeth."

Transportation

Access to personal and public transportation were barriers for participants. The study funded a scooter for one participant who lived in a rural area and could not obtain a driver's license for health-related reasons to travel to and from work. However, during the pandemic, someone stole his scooter, and he had been furloughed so he could not afford to buy a new one. The study paid for a second scooter, which the participant was able to use upon returning to work. A participant at another site needed to visit a methadone clinic an hour from his work daily to receive his medication; the study funded the first 6 months of gas to cover his trips until he had sufficient funds saved. A participant at another site was unable to take the bus to work so the study funded his driver's test so he could get his license.

Housing and Utilities

Several sites reported receiving funding for housing and utilities. A participant at one site was unable to move into a new apartment due to an unpaid gas bill so reimbursement funds covered the bill. Another site had multiple homeless participants who received funding for housing so they could shower and get prepared for job interviews.

While funding for necessities, health-, dental-, and job-related services and goods was tremendously useful to help participants overcome barriers, SED service providers thought the funding came with some risks. One site reported working with participants who requested rental assistance but had no desire to work. Other sites reported that some participants only remained engaged while they received needed financial assistance and then disengaged when they no longer needed the items or services. For example, a site reported that one participant received funding for auto repairs and another for hearing aids; both disengaged shortly after receipt of the funding.

Still other sites felt pressured to continue to assist participants in seeking employment despite their lack of interest. One site reported discomfort at being the "gatekeeper" of funding requests because the decision to request reimbursement could be validating for the participant, but the decision not to make the request could lead to further animosity and disengagement. When staff denied reimbursement requests, participants threatened to contact the SED Help Desk to file a complaint. One site reported that the study funded auto repairs for a participant who needed to take leave for a work-related injury; however, when she was eligible to return to work, she chose not to return, but requested funding for additional auto repairs. The team lead at the site told the participant that they would not submit a request to Westat for further repairs until she obtained employment. Another site reported working with a participant who frequently requested funding for items that he could pay for using other sources.

Multiple sites reported participant misuse of funds. For example, one site reported that a participant received reimbursement after submitting documentation, including order forms and receipts, but then canceled the order and used the money to purchase other items. Study leadership discussed this incident with the SED team's leadership and decided that, while the participant could continue to receive other SED services, they would not fund any more reimbursement requests for this participant.

Funding Requests During the COVID-19 Pandemic

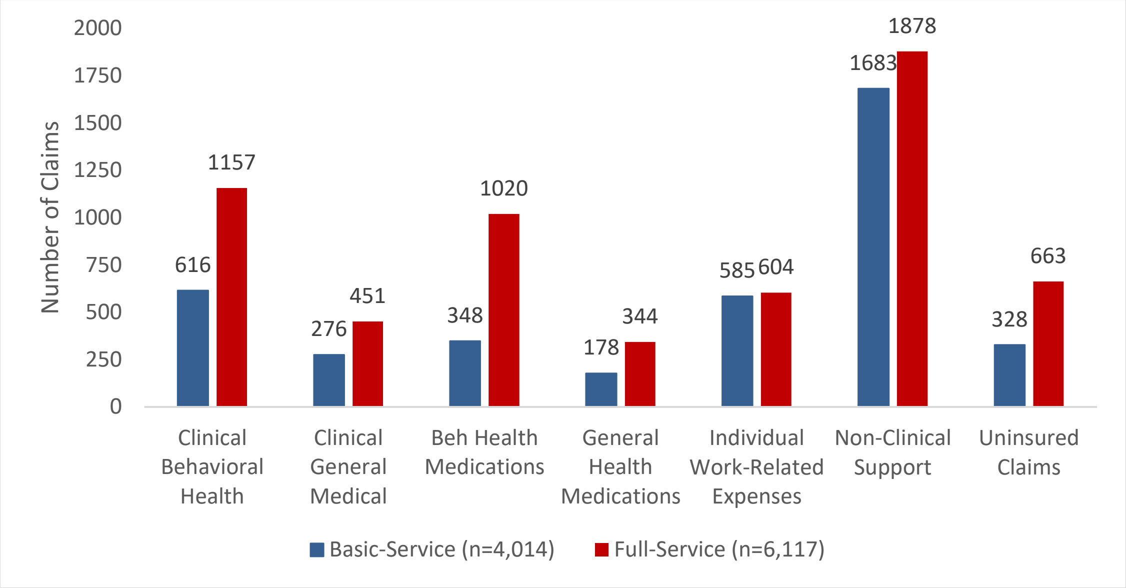
Several sites reported an increase in participant requests for funding during the pandemic, resulting in increases in claims submissions. Four sites described an increase in requests for assistance with utilities and rent. Another reported that participants engaged because they really needed the help. However, two more sites expressed that—as had been the case before the pandemic—some participants disengaged once they received the needed funding.

6.3 Number and Types of Claims Processed

The Westat team processed a total of 10,021 claims between December 2017 and June 2022. Roughly, this translates to 239 claims per month: 144 for the Full-Service group and 94 for the Basic-Service group. As sites enrolled more participants and as participants actively started working toward employment goals, the number of claims per month increased. The number of claims per month was 419 for the Full-Service arm and 256 for the Basic-Service arm. Full-Service claims were more numerous than Basic-Service requests, possibly because the Full-Service treatment arm provided additional health-related services through the NCC.

Exhibit 6-1 shows the number of claims by type of treatment service. Claim requests for nonclinical support is highest among all types in both treatment arms. In the Full-Service treatment arm, the second highest type of payment was for clinical behavioral health services, followed by behavioral health medications. For the Basic-Service treatment arm, the second highest payment was for clinical behavioral health services followed by individual work-related expenses. Not unexpectedly, there were more payment requests for general medical services, medications, and uninsured claims among Full-Service participants than the participants in the Basic-Service treatment arm.

Exhibit 6-1. Number of claims processed by service types, December 2017 to June 2022



Total Amount Paid

The total amount of claims paid during the 54 months between December 2017 and June 2022 was $2,846,107. Almost half of the disbursements went to nonclinical support services, at 49 percent of the total (see Exhibit 6-2). Clinical behavioral health services were about 15 percent of total payments, followed by clinical general medical services and individual work-related expenses at 10 percent each. Payments for medications were 4 percent (3% for behavioral health and 1% for general medical medications).

Exhibit 6-2. Distribution of total payments processed by service types, December 2017 to June 2022

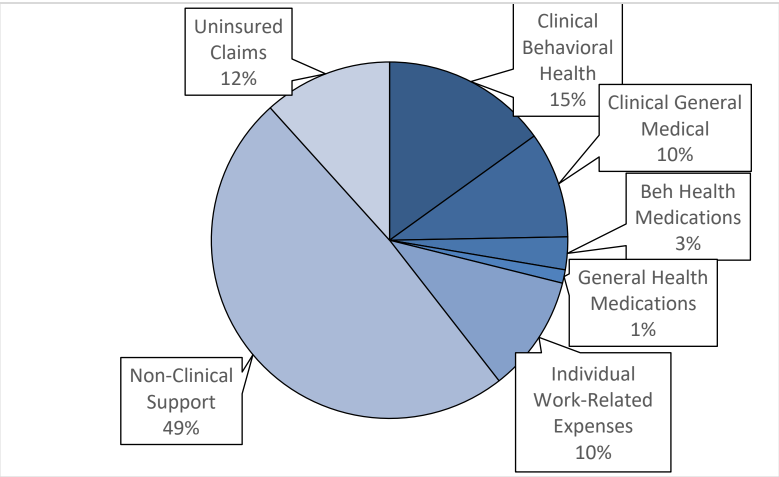


Table 6-1 shows total payments by service types for each treatment group. Nonclinical support expenses were the highest percentage in both groups: 53 percent in Basic-Service, and 45 percent in the Full-Service treatment arm. Following were payments for individual work-related expenses: 12 percent in Basic-Service and clinical behavioral health at 17 percent for the Full-Service group. It is not surprising that reimbursements for clinical services and medications were higher among the Full-Service than Basic-Service treatment arm.

Table 6-1. Distribution of total reimbursements processed by service types and treatment groups, December 2017 to June 2022

	Basic-Service		Full-Service	
	Amount ($)	Percent	Amount ($)	Percent
Nonclinical support	699,769	52.74	690,694	45.46
Clinical behavioral health	157,088	11.84	271,613	17.88
Individual work-related expenses	161,972	12.21	139,534	9.18
Uninsured claims	140,271	10.57	191,958	12.63
Clinical general medical	122,723	9.25	151,528	9.97
Behavioral health medications	29,393	2.22	54,982	3.62
General health medications	15,537	1.17	19,045	1.25
Total	**1,326,753**		**1,519,354**	

Table 6-2 shows total reimbursements by subcategory for the nonclinical support category by treatment group. Over half of reimbursements for both groups were for housing, at 53 percent, followed by auto repair, at 23 percent. Other nonclinical support requests were 24 percent of the total for both treatment arms, with most funding covering tickets (6%) and legal fees (4%).

Table 6-2. Distribution of nonclinical support reimbursements processed by subcategory and treatment groups, December 2017 to June 2022

	Basic-Service		Full-Service	
	Amount ($)	Percent	Amount ($)	Percent
Housing (mortgage/rent/shelter/security deposits)	371,348	53.07	366,711	53.09
Vehicle repair	162,849	23.27	156,015	22.59
Tickets/fees to reinstate driver's license	41,082	5.87	31,930	4.62
Legal fees	29,067	4.15	23,961	3.47
Laptop (non-business)	13,076	1.87	11,943	1.73
Personal items (non-technology)	10,719	1.53	16,027	2.32
Other	10,694	1.53	15,163	2.20
Mileage, gas, parking	10,149	1.45	17,561	2.54
Home items (e.g., bedding, lights)	9,473	1.35	12,090	1.75
Cab/Uber/Lyft	8,528	1.22	6,998	1.01
Public transportation	7,778	1.11	7,098	1.03
Childcare	6,224	0.89	3,172	0.46
Personal items (technology)	5,344	0.76	4,578	0.66
Storage fees	3,895	0.56	3,506	0.51

Table 6-2. Distribution of nonclinical support reimbursements processed by subcategory and treatment groups, December 2017 to June 2022 (continued)

	Basic-Service		Full-Service	
	Amount ($)	Percent	Amount ($)	Percent
Membership fees (e.g., anger management, gym)	3,027	0.43	4,254	0.62
Health insurance premiums	2,879	0.41	110	0.02
Driving lessons/license test	2,551	0.36	2,623	0.38
State ID/Birth Certificate/other legal certificates	864	0.12	4,050	0.59
Clinic fees	223	0.03	2,904	0.42
Total	**699,769**		**690,694**	

Next, we examined average monthly reimbursements per participant among those who received any payments by type of service for both treatment groups. Table 6-3 presents the mean reimbursements for each service with a 90 percent confidence interval. We see that uninsured claims reimbursement requests on average had the highest monthly amount per participant receiving payment. Average payment for nonclinical support services and clinical behavioral health expenses were second and third highest, respectively. We see that once a claim is generated, there was no statistically significant difference between the treatment arms for a given service type.

Table 6-3. Distribution of average payments per participant among those receiving reimbursements by service types and treatment groups, December 2017 to June 2022

	Basic-Service			Full-Service		
	n	Mean ($)	90% CI ($)	n	Mean ($)	90% CI ($)
Nonclinical support	362	1,933	1,661-2,205	389	1,776	1,568-1,983
Individual work-related expenses	246	658	521-795	283	493	399-587
Clinical behavioral health	110	1,428	1,143-1,713	166	1,636	1,375-1,897
Clinical general medical	106	1,158	807-1,509	173	876	667-1,084
Uninsured claims	69	2,033	1,184-2,882	89	2,157	1,596-2,717
Behavioral health medications	67	439	221-657	126	436	312-561
General health medications	46	338	190-485	78	244	169-320

We then examined average monthly reimbursements per participant among those who received payments for nonclinical support reimbursements by type of service for both treatment groups. Table 6-4 presents the mean reimbursements for each type of support with 90 percent confidence interval. We see that housing requests on average had the highest monthly amount per participant receiving payment. Average payment for vehicle repair and legal fees were second and third highest, respectively.

Table 6-4. Distribution of average payments per participant among those receiving reimbursements for nonclinical support reimbursements by subcategory and treatment groups, December 2017 to June 2022

	Basic-Service			Full-Service		
	n	Mean ($)	90% CI ($)	n	Mean ($)	90% CI ($)
Housing (mortgage/rent/shelter/security deposits)	208	1,785	1,529-2,042	227	1,615	1,401-1,830
Vehicle repair	101	1,612	1,356-1,868	126	1,238	1,033-1,444
Public transportation	85	92	77-106	77	92	77-107
Mileage, gas, parking	72	141	110-172	106	166	131-200
Personal items (non-technology)	56	191	143-240	63	254	145-364
Tickets/fees to reinstate driver's license	46	893	537-1,249	43	743	743-532
Cab/Uber/Lyft	41	208	139-277	33	212	116-308
Other	37	289	175-403	38	399	137-661
Laptop (non-business)	35	374	284-463	25	478	321-634
Home items (e.g., bedding, lights)	25	379	223-535	24	504	258-750
Personal items (technology)	24	223	134-311	20	229	108-350
Legal fees	22	1,321	864-1,778	27	887	446-1,329
State ID/Birth Certificate/other legal certificates	19	45	23-68	26	156	0-324
Membership fees (e.g., anger management, gym)	15	202	140-264	11	387	44-729
Driving lessons/license test	11	232	0-479	11	238	155-322
Storage fees	10	389	167-611	10	351	160-543
Childcare	7	889	392-1,387	7	453	70-836
Health insurance premiums	3	960	0-2,242	1	110	–
Banking-related fees	0	–	–	1	323	–

The Westat team processed a total of 10,021 reimbursement claims totaling $2,846,107 during the 54 months between December 2017 and June 2022. These disbursements directly supported study participants working toward employment or to overcome challenges to finding and maintaining employment. Treatment sites also received additional funding from the study to form IPS teams and provide employment services. The findings to date indicate that the participants have complex challenges requiring additional wraparound services and supports in addition to the employment services they received from the sites.

It is important to note that Westat formed a dedicated team and created a very structured process for claim reimbursements. The study would not have reimbursed these traditional (e.g., medications) and nontraditional supports (e.g., rent support) in a timely fashion if there was not a very effective and accountable reimbursement system in place. As in any study, as we experienced unexpected situations, we revised and improved the review and approval system, as needed. Such examples include elevating a request to a higher level of review when a claim is not clear in terms of its relation to employment goals. We also needed similar additional reviews for behavioral health service requests that did not have an evidence base. Having a strong review process helped to resolve issues quickly and helped us provide a satisfactory response to the sites and participants.

It was evident from the reimbursement analyses and qualitative interviews that study participants had significant challenges in keeping up with their financial obligations and keeping stable housing that may affect their ability to focus on both getting and keeping a job. Temporary rent payments, auto repairs, parking tickets, and legal fees may negatively affect participants’ employment. These nonclinical supports, along with uninsured claims and clinical services, constituted a significant component of the overall reimbursements in this study.

7. SED Service Delivery Termination and Transitions

Summary of Findings

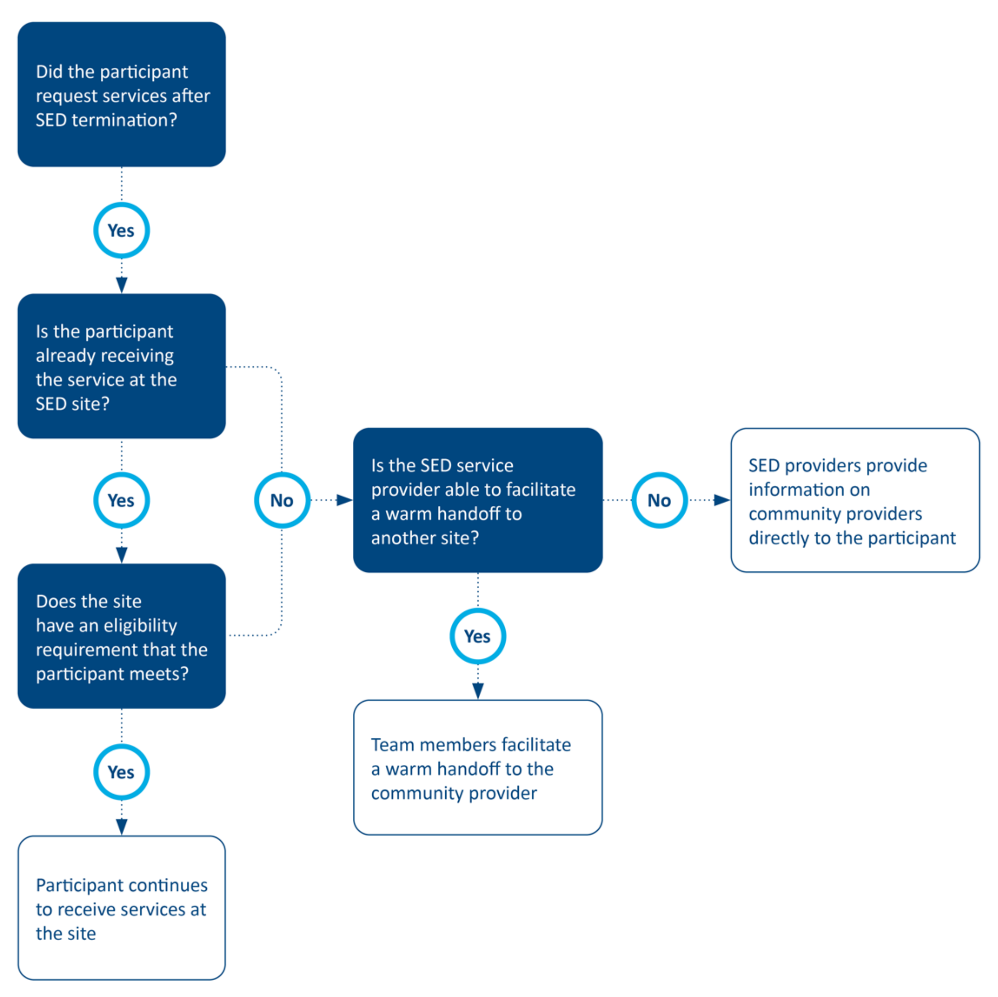
- SED teams planned a transition process for all participants at the end of the study, and teams did not encounter major challenges in transition.
- While some participants opted to enroll in services like those provided by the SED, team members reported that those who were less engaged in the SED preferred not to continue receiving services from the site.
- Most participants who received psychiatric services during the SED—whether at the site or not—were able to continue to see their prescribers and therapists.
- When participants could not continue to receive care at the SED site but were interested in receiving services after the end of the SED, SED providers referred participants to other community programs.

SED teams reported that the transition process went smoothly for almost all participants (see Exhibit 7-1); teams did not encounter major challenges. Many sites held transition meetings apart from their regular team meetings to discuss transition strategies for participants before reaching out to them about the end of SED service provisions. Once they formed a plan, team members started the transition process well in advance of the last day in the study—at least 3 months, but for some participants as many as 6 months—in advance. Sites typically mailed letters explaining the upcoming end date of an individual's study participation, but some participants reported that they received a phone call and no letter. SED team members attempted to schedule a meeting with the participant during which they explained the participant's options and connected them to services based on interest and need.

Sites differed according to the discipline of the SED team member who handled the transition process. Team leads and care managers frequently transitioned participants, especially those who were inactive or those who had begun their enrollment period late. At some sites, the staff member who had built the most rapport with the participant handled the participant's termination and transition. A few sites opted to have the NCC take the lead on transitioning Full-Service participants off the study. One site explained that this was because the NCC handled Full-Service participants' medical needs and, therefore, had the best understanding of the types of services and referrals the participants would need going forward.

Staff members at a few sites said that when they began the termination and transition process, some participants who had not been actively using services seemed to realize that their time was running out and requested help. Team members tried to accommodate these participants with the understanding that the period of assistance would be limited to the time remaining in their 3-year period of enrollment. Some participants who engaged in those last weeks and months were successful and reached some of their goals. For example, an NCC reported, "I have this client—who literally—we haven't spoken to for three years—and then all of a sudden, in her last month, she's like, 'I want a job.' … she [is now] so engaged. And now she's in our regular program." Other times, staff members were not able to accommodate participants' last-minute requests.

Exhibit 7-1. Service transition processes for SED participants



Continuing Services After the SED. SED providers reported that most participants did not want to continue with employment and behavioral health services after the end of the study. While some participants opted to enroll in services like those provided by the SED, team members reported that most preferred not to continue. SED team members reported that some participants chose not to seek additional services at the end of the study period because they had never felt convinced that they needed, or could benefit from, behavioral health services. SED team members said that this group of participants were individuals who never fully engaged with SED services. Some of these participants believed that they did not need mental health services, regardless of whether SED service providers thought they would benefit from such services. Others did not engage with services at all during the 3-year enrollment period and did not have any interest in starting. Some sites did not attempt to schedule a transition meeting with participants who had been inactive, as they did not have any services to continue.

For some participants, opting not to enroll in services at the end of SED seemed like a sign of success. Speaking about such successful participants, an IPS specialist explained: “It’s more bittersweet because you’re excited that they feel they’re at the point now where they don’t need you. They’re okay moving forward and they’re confident that they can do it independently.” Some participants chose not to continue with services because they had found employment with which they were satisfied. About these employed participants, a care manager explained, “I think overall people who have been employed full-time don’t need as much of a high level of care, I guess. I’m sure they would like to continue having some help, but they seem to be okay with transitioning.”

Referrals. Sites made referrals for participants who wanted them; some participants were able to continue services at the SED site, but others were not. At many sites, participants who wanted to continue to receive services after the SED study period ended were able to enroll in similar programs at the host agency. At some sites, the SED team members now work in other programs, or no longer had work there, so participants who wanted services received referrals to new providers. Most participants who received psychiatric services during the SED—whether at the site or not—were able to continue to see their prescribers and therapists.

However, many of the sites had specific requirements for service eligibility. For example, an agency may provide IPS SE services only to clients who receive mental health services at the same site, or only to clients who have a mental health diagnosis. Because some sites bill Medicaid for services, they needed a diagnosis for every client to provide medically necessary services. For some participants, needing a diagnosis to receive IPS services was a barrier, because they did not wish to complete a diagnostic intake and/or receive mental health services.

Participants who made too much money to qualify for Medicaid sometimes could not take advantage of referrals due to high out-of-pocket fees. A team lead explained, “They tend to fall off of services, not because they wouldn’t benefit from them, but because they can’t afford it. There’s no funding stream for it at that point.” At some sites, SED providers told process evaluators that there was a lack of affordable mental healthcare in their area and that waitlists for low-fee services for people without Medicaid were quite long.

When participants could not continue to receive care at the SED site but were interested in receiving services after the end of the SED, SED providers referred participants to other community programs. As much as possible, team members facilitated a warm handoff to ensure a smooth transition. However, sometimes SED staff members could not facilitate a referral directly. Other times, participants were not ready to commit to beginning work with new providers. In those cases, SED providers provided information on community resources that the participant could contact when they wanted.

8. Implications of Process Evaluation Findings for Outcomes

Implementation as intended of the SED services on both Basic- and Full-Service teams with fidelity to the IPS SE model suggests that participants in both of those treatment arms will have better employment outcomes than those in Usual Services (control). Fidelity measures of the first 2 years of service delivery indicated that IPS SE fidelity across all 30 sites was “good” on average. In-depth interviews with participants, providers, and reporting from the implementation team further bolster the findings of IPS SE fidelity measures. While it was not possible to assess fidelity formally for the final year of service delivery because the scale relies on measuring in-person service delivery, SED sites worked closely with the implementation team to continue to deliver high-quality services to SED participants remotely. As such, we expect that employment outcomes will be better for the treatment arms than for the Usual Services (control) arm of the SED.

Some delays in implementation over time, with fidelity increasing from year to year, and initial challenges in recruiting active participation in services all suggest that there may be delays in achieving employment and health outcomes. Service providers noted that participants began to receive services at an earlier point in their treatment than most clients who receive IPS SE services. Participants began services in crisis; many felt they needed to stabilize before they could begin to work toward employment goals. Stabilization included receiving treatment for previously untreated and undertreated physical and mental impairments, and obtaining access to safe housing, reliable transportation, and other necessities.

It is also notable that fidelity improved over time. At the 6-month mark (YR1) the average fidelity rating was “fair,” but by the following year (YR2), the rating had improved to “good.” The increase in fidelity is likely due to the technical assistance efforts of the SED implementation team and skill development among SED team members.

Limitations in the implementation of the NCC role across the sites suggest that outcomes are unlikely to be different for participants on Basic-Service teams when compared with Full-Service teams. While SED team leads and other service providers sometimes spoke in glowing terms about the successes achieved by NCCs in their work with participants, NCC efforts on behalf of a few participants per site may not be quantitatively significant. NCCs frequently seemed to spend the most time and effort with those Full-Service participants whose physical and mental illnesses were among the most complex, serious, and under-treated. The beneficiaries of NCCs’ intensive efforts were usually only a few, or at most, a handful, of participants at the sites. This is not because NCCs chose to work with some participants over others but rather because these individuals were among those Full-Service participants who needed, and were interested in receiving, this sort of intensive help.

Furthermore, not all NCCs were able to dedicate time to this sort of intensive work. Time dedicated to NCC work varied widely across sites, with some teams’ NCC dedicated to as little as 0.15 to 0.4 FTE. In addition to differences across sites in the quantity of NCC and medication-related services available to Full-Service participants, the quality of NCC services delivered may have varied widely across sites. Challenges to consistency across sites included insufficient hours allocated to SED work by site administrators, as well as turnover among NCCs, lack of clarity about the role for NCCs hired to replace the original employee, and difficulties providing adequate supervision to NCCs.

SED team leads, other SED service providers, and participants assessed the NCC as a valuable addition to the team but more for support for participants with chronic physical problems than for evaluation and support for psychiatric medications. This is a different emphasis for the NCC than expected by the original study design. NCCs' role providing medication evaluation and support was less central to the Full-Service team's service delivery than anticipated by the study design. Many participants did not use psychiatric medications and did not want and/or need them. Among participants who did take psychiatric medications, some received them from a prescriber not affiliated with the SED site, with whom NCCs had mixed success implementing all aspects of medication evaluation and support. Evaluation was much more commonly delivered than support, which was not requested or even indicated in many instances.

Plausibly, some team leads believed NCCs' most important successes were in helping Full-Service participants improve their health-related behaviors through dogged persistence. In addition to NCCs providing mental and physical health-related education to Full-Service participants, NCCs helped Full-Service participants access needed health services; repeatedly reminded of and encouraged participants to attend appointments; advocated for participants with their primary care, specialty, and mental health providers; discussed and explained physician recommendations to participants; and repeatedly followed up with participants to remind and encourage them to adhere to treatment. Before mid-March 2020, NCCs transported participants to and from provider appointments.

Challenges related to engaging participants in SED services have implications for health and employment outcomes. The SED outcomes analysis will examine outcomes for all eligible participants regardless of the extent to which they used the services as intended (that is, according to the intention-to-treat principle). Unlike research subjects in most previous studies of IPS SE, SED participants were not recruited from CMHCs (see Drake, 2012:48-55 for a review). Instead, SED participants were recruited by Westat representatives from SSA's rosters of denied disability income applicants who alleged mental health impairments. Unlike subjects enrolled in most other studies of IPS, SED participants had no preexisting alliance with providers at the site where they were to begin to receive services; many participants had never been a client of a social service agency before and had little idea what to expect; and some did not think they had a mental health problem. As such, at enrollment, they were more like first-time clients at CMHCs than clients referred to IPS services. Further, despite careful consent procedures that ensured that participants understood that their enrollment (or refusal to enroll) would have no bearing on any future appeals or re-applications to SSA for disability income, participants may not have believed the recruiters and may have felt compelled to enroll despite having no interest in receiving employment services. Because SED participants had many more of these "perceptual barriers" to engagement (Hamovitch, Acri & Gopalan, 2019) than traditional IPS research subjects recruited from CMHCs, SED outcomes may underestimate the magnitude of the treatment effect among those SED participants who adhered to treatment if compared to studies in which research subjects were recruited from CMHCs.

The pandemic altered service delivery from primarily in person to remote. It is unclear what impact remote service delivery has on the effectiveness of IPS SE services. During the final 2 years of the demonstration, all 30 sites shifted to remote—rather than in-person—service delivery because pandemic-related mandates prevented in-person appointments from taking place. Remote IPS SE service delivery does not have an evidence base; all previous studies of IPS SE outcomes involved in-person delivery of services. While the implementation team worked closely with sites to deliver the best remote services possible under pandemic conditions, the impact of shifting services to a remote mode of delivery on the effectiveness of IPS is unknown. It is possible that SED outcomes related to participant employment may be less positive than they would be had the sites been able to continue to deliver services face to face.

SED staff members described remote IPS SE service delivery as introducing new challenges to participant engagement related to accessing and using remote technology; maintaining privacy; and developing rapport. These additional challenges may account for some of the drop-off in service usage[6] seen across the 36 months of participation, which may ultimately affect outcomes negatively. However, it is important to note that SED providers reported that participants did not uniformly disengage due to the pandemic and related mitigation mandates. Instead, the pandemic seemed to influence engagement positively for some participants who re-engaged with their providers after a period of inactivity, or who became more committed to working toward their goals. Therefore, any inference that pandemic-related service delivery challenges caused a drop in service usage should be made cautiously, if at all.

SED service providers identified other challenges affecting the implementation of IPS SE services caused by the pandemic. It is unclear the impact these will have on study outcomes. These challenges included the following:

- A temporary decrease in participant employment (and available jobs) at the beginning of the pandemic across sites, and a shift in the types of employment available. In general, providers were unsure whether the pandemic would have any major effect on the overall number of participants who obtained employment. Some participants who had employment at non-essential businesses, including retail, food service, and hospitality, lost jobs. Participants whose unemployment benefits under the CARES Act bill were higher than their previous wages were reluctant to search for employment that would provide an income less than their unemployment benefits. Participants feared infection, and possible death or long-term debility, should they take employment interfacing with the public.

- Local job markets altered in response to the pandemic. The pandemic may have slowed participant progress to employment, but service providers felt that they were eventually able to find suitable jobs for participants who wanted them. While non-essential businesses had reduced employment opportunities, demand for workers grew in other businesses and industries, including at grocery stores and warehouses, and in construction, healthcare, and delivery services. More full-time work in these industries became available because many people were hesitant to take jobs that put them into contact with the public, increasing their exposure to infection. The pandemic also created new jobs, such as contact tracer and “screeners” who measured the temperature of people entering buildings.

- The number and quality of contacts of IPS specialists with hiring managers suffered with remote job development. Hiring managers were less likely to respond to overtures from IPS specialists by phone than in person. IPS specialists felt that it was more difficult to build relationships with hiring managers remotely even when they received a response to their cold call.

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[6] Please see Section 5.1 for a full discussion of rates of engagement. During the second month of enrollment, 55 percent of treatment-arm participants attended an appointment with an IPS specialist. After 1 year, 30 percent of participants met with their IPS specialists, and by the 2-year mark, only 15 percent did.

- Changes in local job markets meant that participants were more likely to receive assistance with obtaining a low-quality job than employment in a chosen career in 2020. SED staff at almost one-quarter of sites (n=7; 23%) said they shifted focus from helping participants build careers that interested them toward helping participants meet immediate needs for income through “survival jobs”—poorly paid work with no benefits and little potential for advancement. Only 40 percent of sites said that they were able to maintain a focus on placing participants in work tailored to participants’ skills and interests.

9. Recommendations

This report of the process evaluation describes how research sites implemented the SED from the beginning of implementation in late 2017 until June 2021. It is important to emphasize that SED is the first demonstration targeting a unique population of individuals who made an unsuccessful application for disability income based on alleged mental health impairments. Not much was known about this population prior to SED because most previous research studies examined current or previous SSDI/SSI recipients, not denied applicants.

This report focused on the following:

1. Characteristics of the population of participants who alleged a mental health condition on a failed application for disability benefits;

2. Contextual, environmental, participant-, and site-related factor that posed challenges to service delivery, including the nationwide shelter-in-place orders and other pandemic-mitigation efforts beginning mid-March 2020; and

3. Modifications of service delivery to respond to these challenges.

It is critical to emphasize that the Westat implementation team, along with site administrators, and site providers, showed creativity and admirable perseverance when responding to the challenges arising from the unanticipated complex and difficult circumstances of participants. They also showed ingenuity and resilience in modifying service delivery protocols during pandemic-related mitigation efforts in the final 2 years of the study.

This final chapter addresses the following question from SSA's Statement of Work (SS00-16-60014, p. 4): "What specific programmatic changes may SSA make to support the efforts of people with mental illness in their attempts to sustain competitive employment?" We make specific recommendations for programs that SSA may make to support employment for denied applicants alleging a mental health impairment.

Tailor Support Services to Fit the Needs of the Population of Denied Applicants with Alleged Mental Health Disorders. Some contextual and individual characteristics of SED participants were unanticipated by the study design. SSA and the Westat study team hypothesized that providing a package of evidence-based services to individuals who did not (yet) meet SSA's disability income determination criteria would help these individuals stabilize or reduce their mental health impairment and facilitate joining (or returning to) the workforce. This hypothesis contained assumptions about the population that proved incorrect for many participants: that participants identified as individuals with mental health problems, that they were in the early stages of serious mental illness, that they would be open to receiving treatment as clients of CMHCs, and that they had attempted a course of treatment for their impairments that had been unsuccessful, or at best, partially successful. While participants were far from a homogenous group of individuals, the following were true:

- On average, participants' mental health symptoms were less likely to indicate they were in the early stages of serious mental illness and more indicative of long-standing personality disorders, depression, and anxiety-related disorders, especially PTSD (Borger, Marrow, Drake & Taylor, 2021).

- SED service providers learned that many participants' primary complaints were not mental health–related, but included physical impairments, diseases, and pain. Participants did not always identify as individuals with mental health impairments.

- SED service providers found that many participants' existing health conditions were un- or under-treated.

- SED service providers discovered that many participants were treatment-naïve and unconnected from services at enrollment. Receiving services at a CMHC was a new experience for them; they did not know what was expected of them as clients and what they could expect from their providers.

- According to providers, many participants began the study in crises related to poverty: homelessness or housing instability; difficulties meeting needs for food, clothing, and transportation; or coping with untreated and undertreated chronic physical conditions and mental health problems.

Include Outreach and Engagement Services in the Package of Available Services. Outreach and engagement services, as well as care management services, responded to participants' unique needs, circumstances, and characteristics. Unanticipated participant characteristics and contextual factors resulted in modifications of what services SED providers delivered and how they delivered services. Because a sizable group of participants were treatment-naïve, SED providers had to be explicit about what they could do for participants and what the limits were. Participants sometimes responded with frustration to what they perceived as a slow pace toward meeting their needs and employment goals. Other participants had low expectations conditioned by previous negative social service experiences and did not see any advantage to participating. These wary participants were a challenge to engage at the outset, necessitating lengthy periods of outreach and engagement during which SED providers made sometimes heroic efforts to connect with them. It is important to recognize that some proportion of claimants do not qualify for SSA disability benefits because they lack a record of a severe impairment, which would be true for individuals who had not participated in treatment or receipt of services. This suggests that any future services for claimants denied disability benefits should include substantial outreach and special efforts to bring service-naïve individuals into care.

Care management was crucial to stabilizing participants in crises and providing them with resources sufficient to attenuate their hardships so that they could focus on long-term solutions to their health and economic challenges. Participants' neediness was underestimated before the study. As a result, SED teams found that many (if not all) team members—not just the care manager—had to work to resolve these crises by accessing resources on behalf of participants. SED teams, often staffed by employees with no previous experiences with complex medical problems, found themselves coordinating care and identifying resources for participants with multiple chronic physical health issues. Despite strenuous efforts, some of participants' challenges, especially those related to homelessness and housing instability, proved intractable due to shortages of affordable housing and lack of resources at the local and national levels for providing decent housing for people in need.

Increase the Flexibility of Staff Members on Well-integrated, Multidisciplinary Service Delivery Teams. SED team organization was uniquely suited to a flexible approach to service delivery. SED teams were organized with a team lead supervising the work of IPS specialists, care managers, and the NCC (for Full-Service teams only) united in the common goal of helping participants achieve their employment goals. IPS SE teams at CMHCs are not ordinarily multidisciplinary. Instead, IPS specialists are generally supervised by an IPS SE team lead, and the IPS specialists "attach" to other clinical teams within the organizations to cover employment services for clients served by the clinical team. The multidisciplinary team organization of the SED facilitated especially close collaboration among team members. In fact, while remaining well within team members' respective scope of practice, team member responsibilities sometimes overlapped. For example, care managers but also NCCs, and IPS specialists (to a lesser extent) worked with participants to find suitable housing and address participants' other needs. They helped participants address unsafe interpersonal relationships and assisted with barriers to employment related to criminal justice involvement. The practice of team members' assuming the responsibilities of their teammates facilitated timely and sensitive responsiveness to participants' unanticipated (and urgent) needs.

Because some participants were not yet interested in, or ambivalent about, receiving services, SED providers adopted the strategy of tasking the resistant participants' preferred provider with delivering services across all roles. In practice, this meant that the care manager sometimes discussed employment opportunities, or the IPS specialist helped the participant transition out of the study. Participants who did not want to work toward employment met with their IPS specialists to discuss and problem-solve their obstacles to employment, which included housing instability, domestic violence, and health problems, among other barriers. At the beginning of pandemic-related lockdowns and shelter-in-place orders, IPS specialists and care managers assisted participants in submitting unemployment insurance applications when they lost jobs due to the closure of non-essential businesses. Fluidity among staff members' roles also buffered against burnout as staff could take turns assisting participants who were particularly taxing due to participant psychopathology or dire circumstances. Future SE programs for applicants to SSA alleging a mental health impairment might benefit from multidisciplinary teams with similarly flexible roles.

Provide Increased Resources and SERVICES to Assist Applicants with Meeting Unmet Needs, particularly for housing. Participants' unmet basic needs at enrollment have negative implications for employment and health outcomes measured at 36 months after beginning service receipt. Participants' outstanding basic needs and untreated and undertreated health conditions slowed their progress toward employment goals. Providers reported that many participants who entered the study experiencing crises related to poor health and poverty were not motivated to work toward employment goals until these issues were better resolved. Further, these problems are among the most intractable (and arguably, inappropriate) for mental health service providers to address (Drake & Bond, 2021); stabilizing some of the most impoverished participants was exceedingly difficult with the limited resources available to CMHCs.

The SED provided funds in the form of reimbursements to help engaged participants meet urgent needs for housing, utilities, legal assistance, childcare, and transportation in the short-term. The total amount of reimbursements claimed for necessities was approximately $2.8 million. (Chapter 6 provides detailed description breakdowns of reimbursement expenses.) The study permitted these expenditures if they fulfilled these needs and furthered employment goals. Reimbursements for nonclinical support (e.g., pharmacy, co-pays, out-of-pocket medical expenses) accounted for just less than half (49%) of all funds dispersed. Reimbursements for all out-of-pocket medication expenses comprised only 4 percent of the total, and reimbursements for out-of-pocket healthcare provider expenses comprised 25 percent. The need for funding to meet basic needs was far greater than all out-of-pocket healthcare expenses.

Providers' perceptions that participants were hindered by unmet basic needs has implications for scaling-up programs to provide employment and wraparound services to future denied applicants. Because so many participants communicated to providers that their most pressing problems were meeting everyday needs, future programming should consider how to better address the resource deficits among denied applicants. Obtaining primary medical care for newly denied applicants, and subsequently helping participants identify and pay for appropriate specialty care, should be an objective of any future program. Also important is identifying appropriate resources for providing safe and stable housing for participants experiencing homelessness and housing instability. The reimbursement service provided as part of the SED appeared effective in helping participants meet their needs.

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Appendix A

Monthly Service Use Checklist

Appendix A
Monthly Service Use Checklist

Instructions: Treatment teams should complete this form to document individual participant's service use during the previous month, from {INSERT START DATE} to {INSERT END DATE}. The team should rate services during weekly team meetings.

Sometimes there are circumstances that prevent an individual from participating in the study. Please answer the following three questions to determine whether the checklist should be completed for the period {INSERT START DATE} to {INSERT END DATE}.

Pre-Checklist Questions:

P1. Did hospitalization prevent the individual from participating in the study for this entire period?
- ☐ Yes (DO NOT RESPOND TO THIS CHECKLIST)
- ☐ No (GO TO P2)

P2. Did incarceration prevent the individual from participating in the study for this entire period?
- ☐ Yes (DO NOT RESPOND TO THIS CHECKLIST)
- ☐ No (GO TO P3)

P3. Was there another reason that prevented participation in the study during this entire period? ***Note that if "the individual is employed" or "the individual is not engaged", these are not considered circumstances that prevent study participation.***
- ☐ Yes (GO TO P3a)
- ☐ No (GO TO IPS SERVICES Q1)

P3a. Please specify the reason that prevented this individual from study participation.
____ (DO NOT RESPOND TO THIS CHECKLIST)

Supported
Employment
Demonstration

Participant Study ID: ______________________
Participation Study Month (1-36): ______________________
Team Member Completing Checklist: ______________________
Date Checklist Completed: ______________________

IPS Services

	Yes	No
1. Did the IPS specialist have a face-to-face (in-person) contact with the participant?		
1a. If yes, what is the approximate number of face-to-face (in-person) contacts? ______________________		
1b. If no, were there community outreach attempts?		
2. Did the IPS specialist have a face-to-face (in-person) contact with hiring managers on the participant's behalf?		
2a. If yes, what is the approximate number of face-to-face (in-person) contacts? ______________________		
3. Did the IPS specialist help the participant to start a job this month?		
4. Did the IPS specialist help the participant to maintain a job?		
5. Did the IPS specialist help the participant to end a job appropriately this month?		
6. Did the IPS specialist provide supported education services to the participant?		

Problem Solving Therapy

	Yes	No
7. Did the participant receive PST?		
7a. If yes, what is the approximate number of meetings?______		

Care Manager Assistance (Formerly Called Case Manager)

	Yes	No
8. Did the care manager have a face-to-face (in-person) contact with the participant?		
8a. If yes, what is the approximate number of face-to-face (in-person) contacts? ______________________		
8b. What services were provided? Check all that apply. ☐ Outreach for engagement ☐ Assistance with housing ☐ Assistance with medical care ☐ Assistance with substance use reduction ☐ Assistance obtaining legal services ☐ Assistance with practical skills ☐ Assistance with finances ☐ Assistance with symptom management ☐ Assistance with peer support (e.g., AA, NA, group therapy) ☐ Assistance with family education		

Participant Study ID: ______________________________
Participation Study Month (1-36): ______________________
Team Member Completing Checklist: _____________________
Date Checklist Completed: __________________________

Medication Management Support

	Yes	No
9. a. Is the participant receiving medication management from an *onsite* prescriber?		
b. If no to 9a, is the participant receiving medication management from an *offsite* prescriber?		
10. If yes to *either* 9a or 9b:		
10a. What was the approximate number of meetings? _________		
10b. Is there a prescriber's note in the participant's chart related to their meeting(s) this month?		
10c. Did the prescriber coordinate with the treatment team?		

Specialty Referral

	Yes	No
11. Did the participant receive specialty behavioral health services?		
11a. If yes, describe: ____		
11b. Was the participant referred for specialty behavioral health services this month?		

Participant Employment Status

	Yes	No
12. Has the participant been employed for at least 1 day in the past 30 days?		
13. Has the participant had any contact with the team (IPS specialist, care manager, NCC, Team Leader), including by text, phone, or in person, in the past 30 days?		
13a. If no, what is the main reason that there has been no contact with the participant? ☐ missing/inaccurate contact info ☐ no response to outreach ☐ Other: ______________________________		
14. In the past 30 days, has the participant participated in any of the job development activities listed below (14a)?		
14a. If yes, what job development activities? Check all that apply. ☐ Job Shadowing ☐ Applying for job(s) ☐ Job Interview(s) ☐ Informational Interview(s) ☐ Mock Interview(s) ☐ Face-to-face follow-up with employer re: job application status		
14b. If no, what is the main reason? ☐ Lack of interest/ambivalence ☐ Difficult to reach ☐ Employed ☐ Other: ________________ ☐ New enrollee (past 30 days) ☐ Physical comorbidities		

Supported
Employment
Demonstration

Participant Study ID: ____________________
Participation Study Month (1-36): ____________________
Team Member Completing Checklist: ____________________
Date Checklist Completed: ____________________

School/Vocational Training Participation

	Yes	No
15. Has the participant been engaged in school or a vocational training program for at least 1 day in the past 30 days?		
15a. If Yes, what type of education or training? (check all that apply) ☐ GED ☐ Certificate Program ☐ College		
15b. If Yes, how did the participant pay for this education or training? (check all that apply) ☐ State VR ☐ the study/Westat ☐ Other:____________________		
15c. If Yes, what was the status of this education or training during the past 30 days? (check all that apply) ☐ In school/training now ☐ graduated or completed ☐ dropped out		

Comments (Use the Comments section to include information about virtual meetings that took place with this participant this month.)

Appendix B

Staff Time Allocation

Appendix B
Staff Time Allocation

SED team members varied across sites in how much time they dedicate to SED services versus other services or activities at the site. Prior to process evaluations, team leads completed a roster listing each team member and various characteristics of the staff, including the amount of time they allocated to the SED.

Overall, the amount of time team members spent on SED increased from Year 1 to Year 2, largely due to the rolling enrollment as sites achieved their targets. Similarly, the slight drop-off in time allocation in Year 4 is the result of participants transitioning out of the study. See Table B-1 for more detail.

Table B-1. Average time allocation to SED by staff member position and year

	Year 1	Year 2	Year 3	Year 4
Team Lead	55%	62%	68%	64%
IPS Specialist	81%	80%	77%	66%
Care Manager	60%	71%	77%	76%
NCC	64%	72%	67%	63%

Team Leads. Most sites had one team lead position. More than half of the 20 full sites (n=11; 55%) had team leads who were fully committed to SED. As shown in Table B-1, team leads' time allocation to the SED steadily increased in Years 1-3 with only a slight drop-off in Year 4, reportedly due to the transition of participants out of the study.

IPS Specialists. While the number of staff in the IPS specialist position grew slightly from Years 1-3 (from an average of 2.1 to 2.9 to 2.7), the time allocated to SED decreased slightly in the same period (from 81% to 80% to 77%). Time allocated to the study dropped to 66 percent in Year 4, reportedly due to the transition of participants out of the study.

Care Managers. In Year 1, almost three-quarters of the sites (73%; n=22) had one care manager position. In contrast, 40 percent and 53 percent of sites in Years 2 and 3, respectively (n=12 in Year 2; n=16 in Year 3), reported having one care manager position. More than half of all sites (n=16; 53%) had care managers who were allocated 100 percent to SED. Time allocation to the care manager position(s) increased over the study from 60 percent in Year 1 to 77 percent in Year 3 and remained high at 76 percent in Year 4.

NCCs. Generally, sites had one nurse for this position. However, the time that sites allocated to the study for this position varied widely, with one-third of the sites (n=10; 33%) allocating the NCC to 15-40 percent time and a similar number of sites (n=12 in Year 3 and n=9 in Year 4) having the NCC position 100 percent allocated to the study.

Appendix C

Details of Data Sources and Methods

Appendix C
Details of Data Sources and Methods

The following information provides details about the data sources and methods used to collect information for the Process Evaluation.

Key Informant Interviews. In Years 1-4, we interviewed between three and six SED staff, including IPS specialists, NCCs, team leads, care managers, and site administrators. Evaluators selected appropriate staff for interviews with the assistance of the SED team lead. Evaluators recommended that team leads select staff who had the largest time committed to SED from among SED service providers. For example, if a site had four SED care managers, whose FTE ranged from 5 to 22 percent, evaluators suggested scheduling the care managers with 22 percent commitment to SED. Evaluators interviewed staff individually, or together with other SED staff at the same site. Table C-1 shows the number of interviewees by staff role for Years 1-4. In total, there were 654 key informant interviews with SED staff for the process evaluation over the 4 years.

Table C-1. Number of SED staff interviewed by staff role

Staff role	Year 1	Year 2	Year 3	Year 4
Administrator/Site Director	31	0	1	1
Team Lead	35	32	34	33
IPS Specialist	55	31	65	55
Care Manager	36	28	42	44
NCC	31	29	32	31
Other	3	5	0	0
Total	**191**	**125**	**174**	**164**

Focus Groups. During Year 1, we held two participant focus groups at each site—one for Basic-Service participants and one for Full-Service participants. The focus groups enabled evaluators to speak with up to 10 participants from each treatment group about their employment history and goals for the future, physical and mental health, disability applications, and SED service usage and experiences. Across a total of 60 focus groups, attendance ranged from one to seven participants, with an average of three SED participants per group. Table C-2 provides the number of focus group participants.

The team purposely selected focus group participants from among those Basic- and Full-Service participants who were not participating in a person-centered interview. For more details on the sampling, see Exhibit C-1. Evaluators stopped soliciting potential focus group participants once 10 participants agreed to be in each group. In practice, evaluators frequently called every treatment-arm participant at the site and left messages when possible. In more than a few cases, participants who had not agreed to attend the focus group because they had never answered the phone or returned a phone call showed up for the focus group based on messages left by an evaluator.

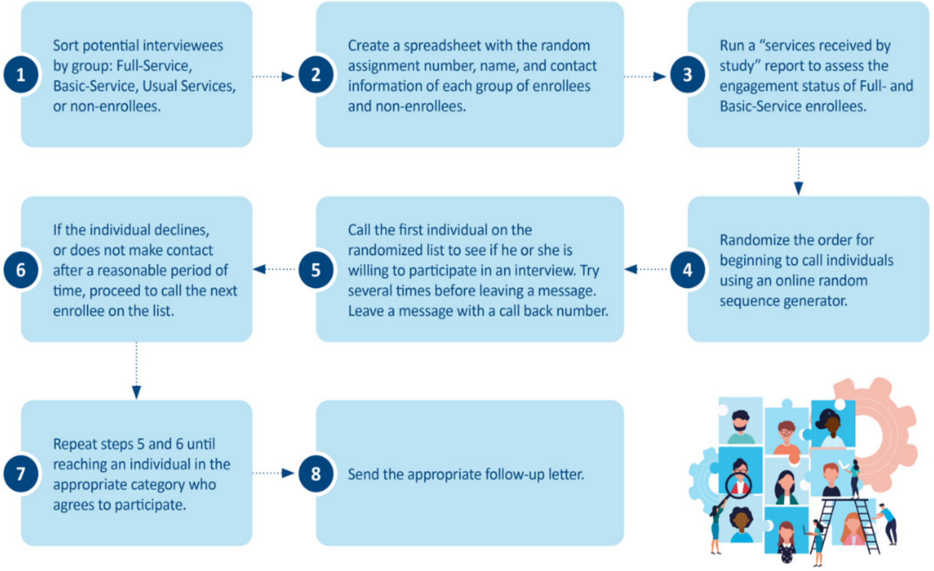
Table C-2. Number of Full- and Basic-Service focus group participants

Type of group	Number
Full-Service participants	89
Basic-Service participants	93
Total	**182**

Person-Centered Interviews. Evaluators scheduled six person-centered interviews, each designed to last about 1 hour. These interviews aimed to learn about participants' (and nonparticipants') employment history, mental and physical health, applications for disability income, SED service usage and experiences (if applicable), and their goals for the future. Years 3 and 4 also included COVID-19–specific questions and other questions related to transitioning out of the SED study.

In Year 1, we randomly selected interviewees according to the steps shown in Exhibit C-1. The goal was to interview one Basic-Service participant, one Full-Service participant, one Usual Services (control group) participant, two individuals who chose not to enroll in the study, and one participant in Basic-Service or Full-Service who appeared unengaged with services per their Monthly Service Use Checklist data. When a participant scheduled early in the week and subsequently did not show up for the interview, evaluators attempted to schedule another participant from the same category as a replacement. However, in some cases, it was not possible to schedule a replacement interviewee in the remaining available time.

Exhibit C-1. Person-centered interviewee recruitment process for Year 1



1. Sort potential interviewees by group: Full-Service, Basic-Service, Usual Services, or non-enrollees.
2. Create a spreadsheet with the random assignment number, name, and contact information of each group of enrollees and non-enrollees.
3. Run a "services received by study" report to assess the engagement status of Full- and Basic-Service enrollees.
4. Randomize the order for beginning to call individuals using an online random sequence generator.
5. Call the first individual on the randomized list to see if he or she is willing to participate in an interview. Try several times before leaving a message. Leave a message with a call back number.
6. If the individual declines, or does not make contact after a reasonable period of time, proceed to call the next enrollee on the list.
7. Repeat steps 5 and 6 until reaching an individual in the appropriate category who agrees to participate.
8. Send the appropriate follow-up letter.

In Years 1 and 2, evaluators spoke with at least one interviewee at each site in natural settings that the interviewees chose, such as interviewee homes, the demonstration site, or somewhere in the community, such as a public library or coffee shop. In Years 3 and 4, evaluators interviewed participants and nonparticipants by phone or FedRAMP Zoom.

We aimed to interview as many of the same individuals as possible in Years 2-4 from the previous year's assessment. In Year 2, evaluators were not able to reach all former interviewees, but no interviewee reached from Year 1 declined a second interview. Those whom we did not reach in Year 2 fell into the following categories: relocated; did not answer or respond although staff believed they still live in the area; or could not be located (including by site staff). For each Year 1 interviewee not located, evaluators replaced the participant with an individual who participated in a focus group during Year 1, drawn from the same treatment group. As in Year 1, we made efforts to reschedule or identify a new interviewee if a cancelation occurred during the week of the process evaluation. In total, evaluators conducted 654 interviews with study participants for the process evaluation over the 4 years. Table C-3 shows the number of participants interviewed in Years 1-4.

Table C-3. Numbers of person-centered interviews by year

Person-centered interviewee type	Year 1	Year 2	Year 3	Year 4	Total
Participant (Full-Service)	42	61	90	55	**248**
Participant (Basic-Service)	45	58	50	69	**222**
Participant (Usual Services)	30	35	66	53	**184**
Total	**117**	**154**	**206**	**177**	**654**

Due to COVID-19, evaluators conducted participant interviews by phone or FedRAMP Zoom in Years 3 and 4. Despite significant flexibility regarding scheduling interviews, we were only able to reach 50 percent (n=59) of the original 116 participants interviewed in Years 1 and 2. In Year 4, we were able to reach 33 percent (n=39) of the participants who had been interviewed in Years 1, 2, and 3. Table C-4 describes the number of participants whom we interviewed 1, 2, 3, and 4 times. (Note that some interviews were nonconsecutive. For example, we may have reached a Year 1 interviewee in Year 3, even though we had failed to reach them in Year 2.)

Table C-4. Extent of longitudinal data on unique individual participants

Participant assignment	Number of participants by number of times interviewed				
	Once	Twice	Three times	Four times	Total
Full-Service	39	29	31	14	**113**
Basic-Service	26	35	37	14	**112**
Usual Services	32	31	11	11	**85**
Total unique participants	**97**	**95**	**79**	**39**	**310**

Of the 310 participants interviewed, approximately one-third (n=100; 32%) were White, non-Hispanic/Latina females; 20 percent were Black females (n=62); and 20 percent were White, non-Hispanic/Latino males. Table C-5 provides participant demographics.

Table C-5. Unique interviewees (including focus group participants) ethnicity, race, gender, and age

Race and ethnicity (%)	Participants (n=401)	Participant observations (n=80)	All study participants (n=2,944)
White, non-Hispanic	53	46	48
Black, non-Hispanic	31	34	28
Hispanic	7	9	12
Two or more races, non-Hispanic	6	6	8
Other	2	5	2
Missing	1	0	1
Significant difference from all?	***Yes****	***No***	
Gender (%)			
Male	39	39	43
Female	61	61	56
Significant difference from all?	***No***	***No***	
Age (mean at baseline)			
Mean	37	38	36
Significant difference from all?	***No***	***No***	

* Significant difference at the $p<0.05$ level. Hispanic and participants of two or more races were underrepresented among unique interviewees.

Extended Ethnography. We introduced the Day-in-the-Life activity in Year 2. This activity was presented as an opportunity to experience a "day in their life" or to "walk in their shoes" for an afternoon. Evaluators discussed within the SED team which participants would feel the most comfortable with this activity, which involved spending an additional 2 to 3 hours together after the person-centered interview. Evaluators encouraged participants to engage in whatever activity they might usually do during that time, and invited participants for a meal or coffee. Most typically, the extended ethnography involved spending time at the participants' home or a restaurant. Examples of specific additional activities included going to a shopping mall; touring places of significance in the participant's life; watching the participant pack for a trip; watching TV; picking up the participant's grandchild from the bus; running errands; going for a hike with the participant and their dog; and accompanying a participant while she made food deliveries as an employee. This extended interaction gave evaluators a more in-depth snapshot of the lives of SED participants and the opportunity to learn more about their personal stories and the barriers to employment they face. We conducted the extended ethnography activity at 16 of the 30 sites in Year 2.

Observation of Service Delivery. Process evaluations included observations of staff at work with each other and with participants. We observed SED team meetings for the Full-Service and Basic-Service teams. These observations gave evaluators insight on how the teams functioned and worked together to address participant needs, as well as their direct interactions with participants. In Year 1, when possible, evaluators also observed staff meetings with participants where they discussed employment, health, or resource needs, or accompanied staff and a participant on a job exploration activity. Evaluators sometimes accompanied IPS specialists as they conducted job development activities. In Year 2, evaluators arranged to shadow one of the SED team members (care manager, IPS specialist, or NCCs) across a 3-hour period. The objective of these activities was to see staff interact with participants in a natural setting, ideally in the community, to record what staff typically do with participants. Sites selected whichever staff was most likely to be working with participants on the day of the process evaluation. This activity also allowed evaluators to meet additional participants. In Year 3, observations were limited to observing SED team meetings either by video conference or conference calls due to COVID-19. See Table C-6 for types and numbers of ethnographic observations.

Table C-6. Number of ethnographic observations by type of service delivery and year

Type of observation	Year 1	Year 2	Year 3
Basic-Service team meeting	25	26	28
Full-Service team meeting	26	26	28
Combined team meeting	2	3	2
Job development	9	7	
IPS specialist–participant meeting	19	31	
Care manager–participant meeting	6	7	
NCC–participant meeting	3	4	
Multiple staff–participant meeting	5	5	
Other	10	1	
Total	**105**	**110**	**58**

Fidelity Assessments

In Years 1-3, reviewers also collected documents listed in Exhibit C-2 for review a part of the fidelity assessment. Reviewers conducted fidelity assessments within the same time period as the process evaluations with a separate team of experienced consultants who reviewed findings from the process evaluations as a part of the documentation review.

Exhibit C-2. Document review process

- Intake, assessment, and treatment plan forms
- Job development logs for previous 6 months
- Supervision notes/field mentoring logs
- Agency and IPS SE program brochures and website
- Agency quality assurance plan with IPS SE goals
- Examples of clients' back-to-work success stories shared through agency newsletters, website, staff meeting notes, etc.
- IPS SE steering committee or advisory board meeting notes
- Activity logs or calendars to track IPS specialists' time in the community

Key Informant Interviews. In Years 1-3, reviewers interviewed between 9 and 13 SED and agency staff, including team lead(s), 1 to 2 IPS specialists, 1 to 2 care managers, the NCC, VR counselor, medication prescriber, benefits counselor, and 3 members of the agency's leadership (e.g., CEO, quality assurance specialist, clinical director). Reviewers interviewed staff with the same role together and interviewed the agency leadership as a focus group. Interviews were conducted in person at the site in Years 1 and 2 and remotely via FedRAMP Zoom in Year 3. In total, reviewers conducted between 810 and 1,170 key informant interviews with SED and agency staff for the fidelity assessments over the 3 years.

In Year 4, reviewers interviewed the team lead, 1 to 2 IPS specialists, 1 to 2 care managers, and the NCC using FedRAMP Zoom. Fidelity reviewers reviewed the information from the process evaluation in advance and tailored questions to understand how COVID-19 altered service delivery. In total, reviewers completed between 120 and 180 key informant interviews.

Participant Focus Groups and Interviews. In Years 1-2, reviewers interviewed participants at each site as in-person focus groups. Due to COVID-19, reviewers interviewed participants individually by phone or FedRAMP Zoom in Year 3. Participants received a $40 honorarium for participation in individual interviews or focus groups. In total, 400 individuals participated in focus groups or interviews for the fidelity assessments over the 3 years (see Table C-7).

Table C-7. Number of participants attending focus groups or interviews by year

	Year 1	Year 2	Year 3	Total
Full-Service participants	67	86	57	**210**
Basic-Service participants	53	78	59	**190**
Total	**120**	**164**	**116**	**400**

Observation of Service Delivery. In Years 1 and 2, reviewers observed in-person Basic-Service and Full-Service team meetings, IPS unit meetings, and IPS specialists conducting job development. Reviewers completed approximately 300 observations in Years 1 and 2. During the pandemic, observations of job development meetings were replaced with employer interviews conducted remotely in Year 3 with 45 employers interviewed across 26 sites.

Participant Record (Chart) Review. In Year 1, reviewers reviewed 14 charts at each site (or a total of 420 charts) for the IPS and MMS fidelity reviews. Due to time constraints, the number of charts was reduced in Years 2 and 3 to 10 charts per site (5 Basic-Service and 5 Full-Service) or 300 charts per year. Reviewers conducted Year 3 chart review remotely with sites providing access to electronic records, uploading records onto the MIS, or screen sharing. Over the 3 years, reviewers reviewed 1,020 records as a part of the fidelity assessments.

Appendix D

Reimbursement Process

Appendix D
Reimbursement Process

Demonstration site staff are responsible for treating and communicating with treatment participants. When the treatment team identifies a participant need that requires expenses not covered by the participant's health insurance or the normal study capitation payments, the site must submit a reimbursement request through the study Management Information System (MIS) to cover the cost. Reimbursement planners at Westat receive and review all submitted reimbursement requests for the following services or items:

Westat requires preauthorization for payments to outside vendors for the following types of services/items:

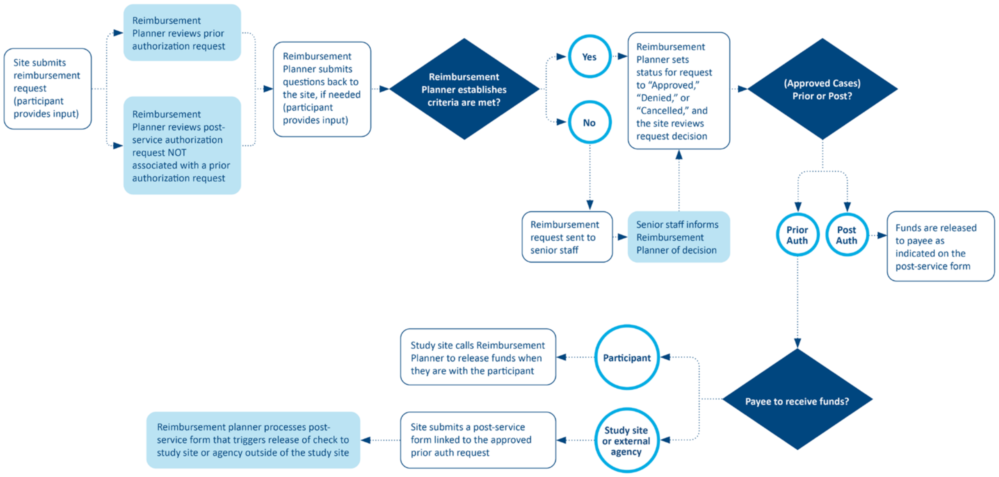
- **Off-site behavioral health services** (evaluations, therapy, medication management)
- **Medical and dental services** (e.g., co-pays, physical and occupational therapy, routine medical and dental care, vision care)
- **Medications for chronic** (e.g., diabetes, cardiovascular disease) **and acute conditions** (sinus infection, abscess)
- **Individual work-related expenses** (e.g., interview/professional attire, coursework for certification or licensure, work equipment or supplies, transportation costs for interviews or work)
- **Nonclinical support services** (e.g., housing, utilities, legal needs, childcare, auto repairs/payments, transportation)

Westat reimbursement planners evaluate each request against a set of preestablished criteria associated with affirmative answers to each of the following questions:

1. Does the participant currently engage with the site?
2. Has the team lead approved the request?
3. Is the cost or duration of services reasonable?
4. Did the site seek funding from other local resources? If so, which ones?

If the request meets the established criteria (yes to all questions), the site receives approval to proceed. If not, the planner sends the request to a senior advisor for review. The review process takes time as senior medical or IPS/vocational advisors weigh in as to the appropriateness of the request. Sometimes the advisors along with TA/QA Implementation staff spoke with the site team to better understand the rationale for the service or item or discuss alternative solutions. With input from senior advisors, the reimbursement planner sets the status of the request to “Approved”, “Denied”[7], or “Canceled”. Exhibit D-1 shows the reimbursement request process relationship between Westat, site staff, and participants.

Exhibit D-1. Reimbursement process map



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[7] Sites have the opportunity to appeal denied reimbursement requests. If they do, Westat assigns an independent medical or vocational advisor to review the request.