Journal of Rural Mental Health

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Online First Publication, April 25, 2022. http://dx.doi.org/10.1037/rmh0000210

CITATION
Smith Ramey, J., Volk, F., & Milacci, F. (2022, April 25). Addressing Rural Health Disparities: Adoption of Illness Management and Recovery (IMR) in Central Virginia. *Journal of Rural Mental Health*. Advance online publication. http://dx.doi.org/10.1037/rmh0000210

AMERICAN PSYCHOLOGICAL ASSOCIATION

Journal of Rural Mental Health

© 2022 American Psychological Association
ISSN: 1935-942X

https://doi.org/10.1037/rmh0000210

PROGRAM DESCRIPTION

Addressing Rural Health Disparities: Adoption of Illness Management and Recovery (IMR) in Central Virginia

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Individuals with mental health disorders living in rural localities experience challenges, such as mental health stigma, which may prevent them from accessing needed care. Driven by a community needs assessment and stakeholder feedback, a behavioral healthcare agency in Central Virginia adopted the evidence-based Illness Management and Recovery (IMR) model to treat adults with serious mental illness in two rural counties. IMR is a manualized treatment focused on teaching clients symptom management strategies while emphasizing client's strengths and empowering client's choice of individualized treatment goals to support improved functioning and reduced psychiatric hospitalizations. Inherent tensions experienced by the behavioral healthcare agency in adopting IMR included stigma versus psychoeducation, adoption resistance versus stakeholder buy-in, and stagnation versus sustainability. Lessons learned for other rural localities considering the adoption of IMR involve matching clinician characteristics with IMR service delivery, understanding implementation as a phased approach, developing stakeholder engagement strategies, and offering robust staff training to ensure model fidelity.

Public Health Significance Statement
This program description article presents the adoption of an evidence-based model, Illness Management and Recovery (IMR), in rural Central Virginia. Additionally, inherent tensions and lessons learned are offered for other rural localities considering implementation of IMR to provide treatment for individuals with a serious mental illness (SMI).

Keywords: rural, mental health, illness management and recovery, substance use

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Bolin et al. (2015) found that rural health priorities have remained constant during the past decade, with access to care cited as the top identified rural health priority. Mental health and substance use disorders (SUDs) rounded out the top five priorities, including nutrition and diabetes. However, mental health services for rural residents are insufficient to meet the demands in terms of an array of services necessary to address the diverse mental health needs and the overall number of providers positioned to serve those communities (Coughlin et al., 2019). To address these priorities in two rural counties in Virginia, Amherst County and Bedford County, a behavioral healthcare agency developed the Rural Collaborative (please refer to Smith Ramey & Randall, 2020, for details on this

This work was supported by Health Resources Services Administration funding (1 D04RH40258-01-00). The authors have no known conflict of interest to disclose.

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collaboration) to Implement Illness Management and Recovery (RCIIMR; Mueser et al., 2006; Whitley et al., 2009).

The agency adopted the evidence-based Illness Management and Recovery (IMR) model (Gingerich & Mueser, 2011) to treat adults with serious mental illness (SMI) or with an SMI and SUD. This project addresses two broad population health goals: To increase the years of life and the quality of those life years (i.e., a personal sense of physical and mental health and the ability to react to factors in the physical and social environments), and to reduce the disparities in health outcomes among adults with an SMI or with an SMI and SUD. In addition, the project aims to enhance the delivery of health services in rural Central Virginia by expanding service capacity through the delivery of evidence-based mental health and substance use treatment.

Identification of Community Needs

According to the Bedford Community Health Needs Assessment (2018), 10% (10.2%) of survey respondents reported more than 2 weeks of physically unhealthy days, whereas 14.3% reported more than 2 weeks of mentally unhealthy days in the past month. In addition, Bedford County recorded a higher mortality rate from suicide than the overall state suicide mortality rate (Bedford Community Health Needs Assessment, 2018). The Virginia Department of Health (2018) Opioid Indicators highlighted higher rates of opioid overdoses in Amherst County (24.5 per 10,000 emergency department visits) as compared to the state rate of 23.0 per 10,000 emergency department visits. According to the Robert Wood Johnson Foundation (2020) County Health Rankings, the average number of mentally unhealthy days reported in the past 30 days was 4 for Amherst County, as compared to 3.8 for Virginia. Individuals living in rural communities experience challenges, including mental health stigma, which may prevent them from seeking treatment. Research suggests that rural, low-income individuals highlight fear and shame as barriers to accessing services for mental health problems (Crumb et al., 2019). They described feeling concerned about seeking help and being judged by others. National Institute of Mental Health (NIMH) defines an SMI as a mental, behavioral, or emotional disorder resulting in serious functional impairment, which substantially interferes with or limits one or more major life activities (National Institute of Mental Health, 2020). Multiple studies have shown that individuals with an SMI have a shorter lifespan than the general population. This outcome is mainly attributed to poor access to care and exacerbated by medications that often contribute to increased health risks among individuals with an SMI (De Hert et al., 2011; Parks et al., 2006).

Research also suggests that adults with an SMI or with an SMI and SUD are overrepresented in the criminal justice (CJ) system, with estimates citing up to 16% of the CJ population have an SMI. In addition, these individuals have faced poorer health outcomes and lack access to needed care (Peterson & Heinz, 2016). Surratt et al. (2018) found that rural, opioid-using women released from jail are highly vulnerable to rearrest and lack access to recovery systems for substance use treatment. Innovations to integrate substance use treatment into reentry to improve access are needed as many incarcerated individuals have little access to treatment during their incarceration (Surratt et al., 2018). Binswanger et al. (2012) found that individuals involved with the CJ system are at risk for poor health outcomes. CJ involvement may have direct or indirect effects on health and health care. Racial and ethnic health disparities may be compounded at stages of the CJ system. Furthermore, racial and ethnic minorities are more likely to be involved in the CJ system than Whites (Binswanger et al., 2012). Feedback from the Bedford Juvenile and Domestic Relations Court Presiding Judge R. Louis Harrison underscores a need for a community response targeting rural individuals with mental disorders involved in the CJ system:

> Cases of serious mental illness and/or deep-rooted substance abuse make up a large percentage of our cases. Except for those few who meet the requirements for our family drug court, we have no intensive, coordinated response. Our treatment regimen is often jail. There is a huge need for a better response. It would be a great thing for our community if we could develop a response system that effectively addressed the problems instead of removing these wounded individuals from society.

Bedford County Sheriff Mike Miller further reinforces the local needs in rural Central Virginia:

> As law enforcement professionals, we realize that substance abuse and mental illness often go hand-in-hand,

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as those suffering from mental illness who have little or no access to medical health care often self-medicate to deal with their disability. As law enforcement is often the gatekeeper to the mental health system for those who are either unable or unwilling to seek the mental health services they need, we recognize the need for programs to bridge the gap between the criminal justice system and mental health services, particularly in underserved rural communities.

Based on the community needs assessment data coupled with feedback from key community stakeholders, the behavioral healthcare agency focused its efforts on adopting empirically supported treatment to address rural clients' mental health and substance use needs, including individuals involved in the CJ system. Some of the most challenging clients to serve in these communities are those with chronic mental health diagnoses, including schizophrenia spectrum disorders, bipolar disorder with psychotic features, and major depressive disorder with psychotic features. Due to the nature of these illnesses, access barriers, poor compliance with treatment, and multiple public system involvement, persistent issues exist in achieving successful outcomes. Therefore, IMR was selected due to its extensive research base and successful treatment outcomes for adults with mental disorders compounded by psychotic features (Mueser et al., 2006; Whitley et al., 2009).

IMR

IMR is an evidence-based practice (EBP) designed to provide clients with an SMI or with an SMI and SUD diagnosis, the skills and understanding to cope with symptoms of their mental illness while working toward their goals in their recoveries (Mueser et al., 2006). Studies highlight the effective replicability of IMR across various populations in both rural and urban areas (Gilmer et al., 2017; Whitley et al., 2009). IMR is a curriculum in which a trained mental health clinician uses psychoeducation, behavioral techniques, relapse prevention training, and coping skills training to assist clients with symptom management and goal development (Mueser et al., 2006). IMR clinicians use a combination of motivational, educational, and cognitive–behavioral techniques. The goals of IMR are (a) for clients to learn about mental illnesses and strategies for treatment; (b) understand the illness, including symptoms, possible course, and probable long- and short-term outcomes; (c) medication education, medication adherence, and symptom management; (d) reduce relapse and rehospitalizations by identifying early warning signs and developing a relapse prevention plan; (e) learn to create networks of social support to enhance recovery; and (f) learn coping strategies for persistent symptoms. Research suggests IMR outcomes include: increased social connection with peers; use of coping skills to address warning signs quickly; reduced number of psychiatric hospitalizations; greater insight regarding mental illness, symptom identification, and medication management; and increased social functioning (Egeland et al., 2017; Pratt et al., 2015).

IMR emphasizes recovery by helping clients' work toward personally meaningful goals. IMR includes 10 modules that deliver psychoeducation about mental illness, cognitive–behavioral approaches to medication management, planning for relapse prevention, social skills training to strengthen social support, and coping skills to manage symptoms of mental illness (Mueser et al., 2006; Whitley et al., 2009). IMR can be provided in an individual or group format, and individuals work progressively through the 10 modules. IMR has significantly improved client functioning in various psychosocial domains, including coping with symptoms, basic functioning, and general well-being. Individuals who have completed IMR show greater knowledge and progress toward goals than those who received care as usual (Mueser et al., 2006).

Although IMR is a manualized approach with specific topic-based modules, it is also a flexible model to meet each client's unique needs (Mueser et al., 2006). IMR is a strength-based consumer-centered protocol that engages clients in their own recovery. For example, if a client struggles with substance use, the clinician may use more sessions working on drug and alcohol use and fewer sessions on psychoeducation about mental illness. This flexibility is guided by a shared responsibility between the clients and their clinicians in planning and pursuing goals consistent with clients' self-determination. Benefits to clinicians and organizations for providing IMR include: learning a comprehensive, step-by-step approach to helping people gain skills to manage their mental illness better; gaining skills in using motivational strategies, cognitive–behavioral and educational strategies; and experiencing increased job satisfaction from seeing improved outcomes, such as people reducing relapses and hospitalizations

and making progress in their recovery goals (Whitley et al., 2009).

Inherent Tensions: Challenges and Solutions

Successful adoption of IMR in Amherst and Bedford Counties is contingent on three inherent tensions resulting in challenges and opportunities for the behavioral healthcare agency. Three tensions emerged during the adoption decision process: *Stigma Versus Psychoeducation, Adoption Resistance Versus Stakeholder Buy-In*, and *Stagnation Versus Sustainability*.

Stigma Versus Psychoeducation

Consistent with existing research, stigma was identified as a cultural or ethnic barrier associated with seeking help for mental health or substance use problems. Research suggests that client stigma regarding seeking treatment is more prevalent in rural localities (Crumb et al., 2019). Research indicates that older adults living in isolated rural counties demonstrate higher levels of public and self-stigma and lower levels of psychological openness than older adults in urban areas, even after accounting for education, employment, and income (Stewart et al., 2015). To address stigma, psychoeducation is embedded throughout IMR treatment as IMR focuses on psychoeducation about mental illness. Psychoeducation regarding mental health and substance use disorders is expected to reduce the stigma experienced by adults in rural communities (Crumb et al., 2019).

To further address stigma, the delivery of IMR focuses on being culturally relevant (Gilmer et al., 2017). Being culturally understood and respected is especially important for the engagement of clients and parents/caregivers of ethnic minorities. The role of culture is important to consider in the conceptualization of difficulties. Respect for cultural diversity is a critical dimension in providing quality care. Researchers found that underrepresented racial and ethnicity-focused programs were associated with similar improvements in health outcomes (Gilmer et al., 2017). Main themes from the qualitative analysis in this research included: addressing stigma, building trust, understanding confidentiality, looking for a cure, and moving beyond linguistic competency (Gilmer et al., 2017). These themes are highlighted as a focus of the IMR program's operating practice with the goal of stigma reduction and improved access to care.

Adoption Resistance Versus Stakeholder Buy-In

A study conducted by Gopalan et al. (2021) suggested poor communication and conflict over role expectation were two barriers identified in stakeholder buy-in to evidence-based behavioral health treatment. Akwanalo et al. (2019) found that adoption resistance may also result from too little stakeholder involvement in the referral process. Their research suggests that poor buy-in may be attributed to a lack of ownership on the part of the stakeholder and a lack of consensus on the goals of treatment. Drawing from the research (Provan, 1984; Smith Ramey & Randall, 2020), regular communication with community stakeholders strengthened the stakeholder buy-in of IMR for the behavioral healthcare agency in this project. Monthly collaborative meetings between the behavioral healthcare provider and stakeholders offer an opportunity to highlight shared vision and progress toward community-driven goals. Monthly meetings also support a continuous feedback loop for all partners in order for program goals and objectives to be modified or revised as needs are identified. In addition to the monthly network meetings, the behavioral healthcare agency and the adult probation and parole teams meet every month for a multidisciplinary case staffing of shared clients. These meetings facilitate a collaborative environment of treatment planning and service delivery (Smith Ramey & Randall, 2020).

Stagnation Versus Sustainability

Research highlights several reasons for implementation and sustainability failure: lack of capacity, ineffective coordination and collaboration, and secured sustained resources (Van Dyke & Naoom, 2016). Regarding lack of capacity, one important sustainability strategy is the identification of an in-house trainer. An in-house trainer is advantageous to an organization due to staff attrition and the high cost of sending new staff to training. An in-house trainer addresses both staff attrition and training costs and also ensures a greater likelihood of model fidelity by employing a local subject matter expert (Summerside et al., 2018). Drawing from the research, the behavioral healthcare

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agency identified two in-house trainers to provide ongoing training and support of IMR.

Another sustainability strategy ties into effective coordination and collaboration (i.e., cross-train staff, including probation officers, to understand the unique needs of individuals with an SMI). This strategy highlights the influence of an individual's ecology (e.g., home, neighborhood, community) inasmuch as probation officers and judges become part of the ecology for many adults with an SMI who become involved in multiple community systems. IMR project staff remain in regular phone, face-to-face, and electronic mail contact with stakeholders and referral sources. These relationships keep direct lines of communication open between the treatment program and community agencies, thereby reducing the potential for working at cross purposes with families that have multiple providers. This can result in clients resisting interventions or causing dissent between agencies when multiple agencies serve the same individuals (Ungar et al., 2012). Finally, these meetings and contacts are important because research highlights in order for probation officers to liaise with behavioral health resources, they should have relationships and specific contacts on how to access these resources (Van Deinse et al., 2019). Meetings to train key partners on the IMR model build on shared accountability for outcomes with adults with an SMI or an SMI and SUD. Key stakeholders attended IMR training and participated in monthly IMR consultations as well as monthly collaborative meetings to review progress and barriers toward IMR delivery.

Specific strategies to achieve secured sustained resources of the project include third-party payor reimbursement for IMR therapy and case management. IMR is sustained through third-party payors (e.g., Medicaid) and state and federal funding. Although the primary funding for this 4-year project was obtained from a federal agency, maximizing the effect of the funding and ensuring the sustainability of the treatment model after the 4-year funding window is a primary focus of the local behavioral health organization and the community stakeholders. In addition, advocacy efforts are needed at the state level for an enhanced Medicaid rate for IMR services, as IMR is a well-proven empirically supported treatment. The Department of Behavioral Health and Developmental Services in Virginia began implementing a system redesign in 2019, with a large focus on enhanced reimbursement rates for models with demonstrated outcomes, such as IMR. In line with statewide system redesign, IMR implementation in rural Central Virginia offers an opportunity to sustain and replicate programming in other similar localities.

Potentially Generalizable Lessons Learned

The adoption of IMR in rural Central Virginia offers several lessons learned that other organizations considering using this model might wish to explore. More specifically, lessons learned from the current case for organizational leaders, clinical supervisors, clinicians, funders, and policymakers include taking a phased approach to implementation, ensuring the clinical practice of the model is philosophically consistent with the service providers' treatment approach, investing in staff training, and celebrating successes.

Phased Implementation

The literature identifies some of the challenges in implementing EBPs, including poor collaboration and inconsistent post training consultation. These obstacles impede efforts in many agencies to implement practices with fidelity (Aitken et al., 2011). Research from the National Implementation Review Network (NIRN) suggests that organizations and funders take a staged approach in implementing practices. This approach includes thoughtful assessment and selection of the "what," sufficient time and resources for planning and implementation activities, collaboration of key stakeholders including funders and policymakers, program developers, and implementing organizations, and the use of data to guide decision-making and quality improvement (Metz & Albers, 2014). Some of the strategies to support EBP implementation include: developing EBP champions and mentors, resource allocation (e.g., time, money), and development of a culture of expectations related to EBPs (Aitken et al., 2011). The treatment provider in Central Virginia invested time and resources in seeking community feedback, securing funding for the implementation of IMR, and identifying IMR champions. Drawing from the research (Salyers et al., 2009), other organizations considering adoption of IMR may benefit from engaging in assessment and outreach to community

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stakeholders and identifying appropriate resources (e.g., funding) and human capital (e.g., clinical staff, clinical supervisors) to support the likelihood of successful implementation.

Match Clinician Characteristics With IMR Delivery

The agency's hiring team found that it was critical to identify clinician characteristics to "match" the delivery of IMR. These characteristics included a willingness to provide service delivery in client's homes and the community through individual IMR sessions. Given the access and transportation barriers many rural residents face, IMR clients were not always able or willing to attend office-based sessions. Thus, clinicians needed to deliver services in homes, which may be in areas where homes were dilapidated or located deep into the rural catchment areas where government-maintained roads were not always available. Furthermore, clinicians needed to be flexible and willing to provide holistic care to IMR clients. For example, if a client needed a dentist, the clinician would focus the IMR session on linkage to oral care. Finally, IMR clinicians do not have a fixed mindset that their role is to provide therapy only. Instead, an IMR clinician's goal is to address the client's stated needs through therapeutic and case management interventions. Other organizations considering adopting IMR may benefit from ensuring their IMR clinicians, including master's level therapists and bachelor's level case managers, are flexible and willing to provide services in clients' homes and holistic in their client care.

Invest in Staff Training

Whitley et al. (2009) found that IMR delivered in community-based settings with rural populations is associated with positive outcomes when staff is adequately trained and the organizational leadership embraces innovation. IMR appears to be feasible to implement, with client acceptability, comparable to other EBPs. IMR programs can be implemented with acceptable fidelity, but substantial and comprehensive implementation support and training are required (McGuire et al., 2014).

As part of the implementation of IMR, clinical staff, supervisors, and select community partners received a 3-day training conducted by an IMR subject matter expert. The training consisted of didactic and experiential activities (i.e., lecture, role-play, and small group practice). After completing an 18-hr training, clinicians attended monthly consultation meetings with the IMR consultant. The purpose of the consultation is to ensure that clinicians implement the model with fidelity and receive support and guidance as they expand their skill set in the delivery of IMR. Clinicians audio record IMR sessions for consultant review and feedback, as work sample review is another mechanism to ensure the treatment is provided with model adherence (Borders, 2014). In addition, clinical staff receive weekly individual supervision with an agency IMR-trained supervisor. During supervision, IMR cases are reviewed to address client progress, client needs, and barrier reduction strategies. Regular and consistent supervision is associated with increased clinician efficacy in delivering community-based services (Lawson & Foster, 2005). Other organizations considering adopting IMR may benefit from developing a comprehensive training approach, including initial and ongoing training, to support model adherence.

Celebrate Every Success

As the literature frames implementation as a staged approach (Metz & Albers, 2014), immediate and tangible outcomes may not occur at the onset of program development. To ensure clinical staff, supervisors, and community collaborators stay engaged and maintain positive momentum, celebrating even small successes in implementation was critical. For example, during monthly IMR consultation, clinical outcomes are highlighted to praise and reinforce IMR clinicians' efforts. Another strategy to highlight success occurs in monthly collaborative meetings with community stakeholders. Acknowledgment of community partners' efforts in a public forum keeps partnerships strong and flourishing. An additional strategy is offering lunch and learn training opportunities to educate stakeholders and highlight program outcomes (e.g., number of clients enrolled in IMR, number of clients who reduced psychiatric hospitalizations, number of clients who improved medication compliance). Other organizations considering the adoption of IMR may benefit from highlighting progress and small steps toward effective delivery of IMR with clinicians, administrators, and community stakeholders.

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Conclusion

In 2020, a behavioral health agency in Central Virginia adopted IMR resulting from a community need to address rural health disparities in adults with an SMI or with an SMI and SUD. In particular, subpopulations with poorer outcomes (e.g., CJ involved adults with an SMI) were targeted. Some challenges experienced by the agency included client stigma regarding mental health treatment and program sustainability. As a result, the organization invested in matching clinician characteristics with IMR program delivery and supported ongoing staff training and supervision to ensure model fidelity. Through community collaboration, organizational support, and a comprehensive training approach, individuals living in rural Central Virginia increased access to needed care. Future directions for IMR in Central Virginia are to expand the model to other geographical locations, including urban areas, and to advocate for enhanced reimbursement rates to ensure the financial solvency of the IMR program.

References

Aitken, L. M., Hackwood, B., Crouch, S., Clayton, S., West, N., Carney, D., & Jack, L. (2011). Creating an environment to implement and sustain evidence based practice: A developmental process. *Australian Critical Care*, *24*(4), 244–254. https://doi.org/10.1016/j.aucc.2011.01.004

Akwanalo, C., Njuguna, B., Mercer, T., Pastakia, S. D., Mwangi, A., Dick, J., Dickhaus, J., Andesia, J., Bloomfield, G. S., Valente, T., Kibachio, J., Pillsbury, M., Pathak, S., Thakkar, A., Vedanthan, R., Kamano, J., & Naanyu, V. (2019). Strategies for effective stakeholder engagement in strengthening referral networks for management of hypertension across health systems in Kenya. *Global Heart*, *14*(2), 173–179. https://doi.org/10.1016/j.gheart.2019.06.003

Bedford Community Health Needs Assessment. (2018). Retrieved December 4, 2021 from 2018_bedford_chna_final.pdf (centrahealth.com)

Binswanger, I. A., Redmond, N., Steiner, J. F., & Hicks, L. S. (2012). Health disparities and the criminal justice system: An agenda for further research and action. *Journal of Urban Health*, *89*(1), 98–107. https://doi.org/10.1007/s11524-011-9614-1

Bolin, J. N., Bellamy, G. R., Ferdinand, A. O., Vuong, A. M., Kash, B. A., Schulze, A., & Helduser, J. W. (2015). Rural healthy people 2020: New decade, same challenges. *The Journal of Rural Health*, *31*(3), 326–333. https://doi.org/10.1111/jrh.12116

Borders, L. D. (2014). Best practices in clinical supervision: Another step in delineating effective supervision practice. *American Journal of Psychotherapy*, *68*(2), 151–162. https://doi.org/10.1176/appi.psychotherapy.2014.68.2.151

Coughlin, S. S., Clary, C., Johnson, J. A., Berman, A., Heboyan, V., Benevides, T., Moore, J., & George, V. (2019). Continuing challenges in rural health in the United States. *Journal of Environment and Health Sciences*, *5*(2), 90–92.

Crumb, L., Haskins, N., & Brown, S. (2019). Integrating social justice advocacy into mental health counseling in rural, impoverished American communities. *The Professional Counselor*, *9*(1), 20–34. https://doi.org/10.15241/lc.9.1.20

De Hert, M., Correll, C. U., Bobes, J., Cetkovich-Bakmas, M., Cohen, D., Asai, I., Detraux, J., Gautam, S., Möller, H. J., Ndetei, D. M., Newcomer, J. W., Uwakwe, R., & Leucht, S. (2011). Physical illness in patients with severe mental disorders. I. Prevalence, impact of medications and disparities in health care. *World Psychiatry*, *10*(1), 52–77. https://doi.org/10.1002/j.2051-5545.2011.tb00014.x

Egeland, K. M., Ruud, T., Ogden, T., Färdig, R., Lindstrøm, J. C., & Heiervang, K. S. (2017). How to implement Illness Management and Recovery (IMR) in mental health service settings: Evaluation of the implementation strategy. *International Journal of Mental Health Systems*, *11*(1), Article 13. https://doi.org/10.1186/s13033-017-0120-z

Gilmer, T., Henwood, B., McGovern, N., Hurst, S., Burgdorf, J., & Innes-Gomberg, D. (2017). Health outcomes and costs associated with the provision of culturally competent services for underrepresented ethnic populations with severe mental illness. *Administration and Policy in Mental Health*, *44*(5), 782–791. https://doi.org/10.1007/s10488-016-0786-6

Gingerich, S., & Mueser, K. T. (2011). *Illness management and recovery: Personalized skills and strategies for those with mental illness* (3rd ed.). Hazelden.

Gopalan, G., Kerns, S. E. U., Horen, M. J., & Lowe, J. (2021). Partnering for success: Factors impacting implementation of a cross-systems collaborative model between behavioral health and child welfare. *Administration and Policy in Mental Health*, *48*, 839–856. https://doi.org/10.1007/s10488-021-01135-5

Lawson, G., & Foster, V. A. (2005). Developmental characteristics of home-based counselors: A key to serving at-risk families. *The Family Journal*, *13*(2), 153–161. https://doi.org/10.1177/1066480704273070

McGuire, A. B., Kukla, M., Green, A., Gilbride, D., Mueser, K. T., & Salyers, M. P. (2014). Illness management and recovery: A review of the literature. *Psychiatric Services*, *65*(2), 171–179. https://doi.org/10.1176/appi.ps.201200274

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Metz, A., & Albers, B. (2014). What does it take? How federal initiatives can support the implementation of evidence-based programs to improve outcomes for adolescents. *The Journal of Adolescent Health*, *54*(Suppl), S92–S96. https://doi.org/10.1016/j.jadohealth.2013.11.025

Mueser, K. T., Meyer, P. S., Penn, D. L., Clancy, R., Clancy, D. M., & Salyers, M. P. (2006). The illness management and recovery program: Rationale, development, and preliminary findings. *Schizophrenia Bulletin*, *32*(Suppl. 1), S32–S43. https://doi.org/10.1093/schbul/sbl022

National Institute of Mental Health. (2020). *Mental health information*. NIMH: Mental Illness (nih.gov)

Parks, J., Svendsen, D., Singer, P., Foti, M. E., & Mauer, B. (2006). *Morbidity and mortality in people with serious mental illness*. Alexandria, VA: National Association of State Mental Health Program Directors (NASMHPD) Medical Directors Council, *25*(4), 1–87.

Peterson, J., & Heinz, K. (2016). Understanding offenders with serious mental illness in the criminal justice system. *Mitchell Hamline Law Review*, *42*, 537.

Pratt, S. I., Naslund, J. A., Wolfe, R. S., Santos, M., & Bartels, S. J. (2015). Automated telehealth for managing psychiatric instability in people with serious mental illness. *Journal of Mental Health*, *24*(5), 261–265. https://doi.org/10.3109/09638237.2014.928403

Provan, K. G. (1984). Interorganizational cooperation and decision making autonomy in a consortium multihospital system. *Academy of Management Review*, *9*(3), 494–504. https://doi.org/10.5465/amr.1984.4279689

Robert Wood Johnson Foundation. (2020). *2020 county health rankings key findings report*. County Health Rankings & Roadmaps.

Salyers, M. P., Rollins, A. L., McGuire, A. B., & Gearhart, T. (2009). Barriers and facilitators in implementing illness management and recovery for consumers with severe mental illness: Trainee perspectives. *Administration and Policy in Mental Health*, *36*(2), 102–111. https://doi.org/10.1007/s10488-008-0200-0

Smith Ramey, J., & Randall, J. (2020). A multiple agencies and counties partnership: Improving parental substance use and services delivery outcomes through a network development and collaboration. *Journal of Rural and Community Development*, *15*(3), 79–91.

Stewart, H., Jameson, J. P., & Curtin, L. (2015). The relationship between stigma and self-reported willingness to use mental health services among rural and urban older adults. *Psychological Services*, *12*(2), 141–148. https://doi.org/10.1037/a0038651

Summerside, N., Abu-Rish Blakeney, E., Brashers, V., Dyer, C., Hall, L. W., Owen, J. A., Ottis, E., Odegard, P., Haizlip, J., Liner, D., & Zierler, B. K. (2018). Early outcomes from a national train-the-trainer interprofessional team development program. *Journal of Interprofessional Care*, 1–4. Advance online publication. https://doi.org/10.1080/13561820.2018.1538115

Surratt, H. L., Staton, M., Leukefeld, C. G., Oser, C. B., & Webster, J. M. (2018). Patterns of buprenorphine use and risk for re-arrest among highly vulnerable opioid-involved women released from jails in rural Appalachia. *Journal of Addictive Diseases*, *37*(1–2), 1–4. https://doi.org/10.1080/10550887.2018.1531738

Ungar, M., Liebenberg, L., Landry, N., & Ikeda, J. (2012). Caregivers, young people with complex needs, and multiple service providers: A study of triangulated relationships. *Family Process*, *51*(2), 193–206. https://doi.org/10.1111/j.1545-5300.2012.01395.x

Van Deinse, T. B., Bunger, A., Burgin, S., Wilson, A. B., & Cuddeback, G. S. (2019). Using the consolidated framework for implementation research to examine implementation determinants of specialty mental health probation. *Health & Justice*, *7*(1), Article 17. https://doi.org/10.1186/s40352-019-0098-5

Van Dyke, M. K., & Naoom, S. F. (2016). The critical role of state agencies in the age of evidence-based approaches: The challenge of new expectations. *Journal of Evidence-Informed Social Work*, *13*(1), 45–58. https://doi.org/10.1080/15433714.2014.942021

Virginia Department of Health. (2018). *Overdose deaths. Overdose deaths–Opioid data* (virginia.gov)

Whitley, R., Gingerich, S., Lutz, W. J., & Mueser, K. T. (2009). Implementing the illness management and recovery program in community mental health settings: Facilitators and barriers. *Psychiatric Services*, *60*(2), 202–209. https://doi.org/10.1176/ps.2009.60.2.202

Received January 2, 2022
Revision received March 19, 2022
Accepted March 27, 2022 ■