How Social Relationships Influence Substance Use Disorder Recovery: A Collaborative Narrative Study

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ABSTRACT: Individuals with a substance use disorder (SUD) often have fewer social support network resources than those without SUDs. This qualitative study examined the role of social relationships in achieving and maintaining stable recovery after many years of SUD. Semi-structured interviews were conducted with 18 participants, each of whom had been diagnosed with a SUD and each of whom had been abstinent for at least 5 years. A resource group of peer consultants in long-term recovery from SUDs contributed to the study planning, preparation, and initial analyses. The relationship that most participants described as helpful for initiating abstinence was recognition by a peer or a caring relationship with a service provider or sibling. These findings suggest that, to reach and maintain abstinence, it is important to maintain positive relationships and to engage self-agency to protect oneself from the influences of negative relationships. Substance use disorder service providers should increase the extent to which they involve the social networks of clients when designing new treatment approaches. Service providers should also focus more on individualizing services to meet their clients on a personal level, without neglecting professionalism or treatment strategies.

KEYWORDS: substance use disorder, client experiences, social relationships, recovery capital, collaborative research, narrative approach

Introduction

Substance use disorders (SUDs) negatively affect individual social functioning and create additional burdens for society. In spite of a well-known tendency to consider SUD recovery an individual concern, several studies have evidenced that these processes do not occur in a vacuum.[1–10] On one hand, those with a SUD often lack many of the same social supports that those without SUDs have,[1] experience isolation and domestic violence,[2] and experience marital problems—especially when alcohol is the substance of choice.[3,4] On the other hand, supportive relationships with caring family, partners, and friends—including individuals who do not use substances themselves—have proven to be helpful in abstaining and maintaining sobriety.[5,6] This suggests that the ability to change unhealthy behaviors, such as substance use, is implicated in both social context and personal characteristics and resources. Despite increasing attention to the recovery narratives of people with SUDs, understanding of how social relationships might impede or facilitate SUD recovery is insufficient. Hence, this article explores the question of how social relationships influence SUD recovery.

Background

Previous qualitative studies have shed light on different aspects of social relationships that are important for SUD recovery. For example, several studies have shown that most individuals with a SUD need a change to their social network to initiate and maintain abstinence from substance use.[7–11] Furthermore, research suggests that social support can be even more powerful for maintaining sobriety when combined with practical support.[12,13] This indicates that mutual activity directed toward a shared goal can catalyze the attainment of stable recovery. However, recent studies further emphasize that the nature and quality of the social network is fundamental for positive behavior change and that social relationships in treatment settings can both encourage and inhibit recovery.[14,15] One recent US study found a link between lower drug use and better family relationships among individuals who suffered from mood and anxiety disorders; conversely, those who had better friendships had a higher likelihood of drug use.[16] In addition, women with a SUD tend to have larger social networks compared with men.[17,18] Yet, the extent to which this can be attributed to sex differences with respect to preferred substances, modes of use, and/or socialization is unclear.

The Recovery Capital (RC) construct was developed as a theoretical model for better understanding and analyzing how social relationships contribute to SUD recovery.[19,20] As with internationally recognized socialization theory, the RC model was influenced by the writings on social capital by noted sociologists Pierre Bourdieu[21] and Robert Putnam.[22] William Cloud and Robert Granfield further developed the model through a range of qualitative studies with individuals in recovery from SUD, with or without formal treatment. As later described by Cloud and Granfield, and as resembles the work of Bourdieu, RC comprises various factors that influence possibilities for improving social position and sense of identity. The components of the RC construct consist of social capital (relationships such as family, friends, and broader social networks), physical capital (income, savings, and investment property), human capital (education, knowledge, skills, hopes, aspirations, health, and heredity), and cultural capital (values, beliefs, and attitudes linked to social conformity).[23] Thus, the RC construct established the theoretical framework for this study.

Relative to SUD onset and relapse, stable recovery is the least studied phenomenon in substance use research. In particular, there have been few studies on how persons with SUD experience abstaining from substances and how their RC contributes to their journeys toward stable recovery. The aim of this exploratory study was to examine the role of social relationships in reaching and maintaining stable recovery after many years of SUD.

Methods

This study was initiated in August 2015. It was approved by the Regional Committee for Medical and Health Research Ethics, South-East Region, Norway (REK-no. 2014/1936). All survey participants provided written, informed consent and were informed that they could withdraw from the study at any stage. To ensure anonymity, no names are used when describing and quoting participants, and no identifiable participant information is included.

To generate knowledge about the subjective meaning of the participants' life experiences, we designed the study as descriptive and exploratory, using individual semi-structured interviews. A phenomenological narrative approach was engaged to analyze the transcribed interviews, which enabled an in-depth exploration of lived experience. The details of the research design, context, recruitment, sample, and data collection have been previously described, in a report on service users' reasons for abstaining from substance use.[9]

A collaborative research design

There is growing recognition that service users may consider medical and psychological studies of SUD treatment and recovery to poorly reflect their priorities, attitudes, and experiences, and to be potentially disempowering.[24,25] Having people with firsthand experience of the condition under investigation, and/or

its treatments, can increase the quality, relevance, and utility of the study findings.[26] Thus, the first author established a resource group of 4 peer consultants, who had themselves all achieved long-term SUD recovery. The resource group contributed to the project by reviewing the study aim and research questions, by assisting with the preparation of the thematic interview guide, and by meeting together with the first author on 8 different occasions to discuss the interviews and establish the initial set of themes. One of the peer consultants (MB) also contributed to the subsequent stages of narrative analysis and as a co-author. We will elaborate on the ways in which this collaborative process of analysis unfolded and the role of MB in coming sections.

Context. Participants in this qualitative study were recruited from a longitudinal cohort study—the Comorbidity Study: Substance Dependence and Co-occurrent Mental and Somatic Disorders (COMORB study). The longitudinal COMORB study includes 2 cohorts from Norway concerning mental[27,28] and somatic[29] comorbidity, respectively. The 2 cohorts are (1) an 18-year follow-up of the Dual Diagnosis Study on psychiatric comorbidity in a heterogeneous sample of patients with SUD and (2) a 20-year follow-up of a study on opioid maintenance treatment (OMT), for which somatic morbidity among dependent opioid users was assessed before, during, and after OMT. These 2 cohorts were merged for joint data collection in 2015 (N = 148). This study recruited participants from the 2016 joint cohort.

Recruitment and sample

The inclusion criterion was stable recovery for at least 5 years. Stable recovery was defined as abstinence from problematic substance use. The exclusion criterion was less than 5 years of stable recovery. We used a purposeful, criterion-based sampling procedure[30] to recruit a heterogeneous sample with respect to sex, substance type, and treatment approach, from which we could obtain both diverse and information-rich data of relevance to the study aim.

Of the N = 148 in the 2 cohorts of the COMORB study, 35 met the inclusion criteria for this study, among whom 18 were recruited. Thus, the final sample consisted of 10 men and 8 women who were between 35 and 68 years (mean: 54 years). The participants reported an active period of problematic substance use from 13 to 36 years (mean: 21 years), followed by an abstinence period of 5 to 18 years (mean: 12 years). Six participants had mainly used heroin, 5 had mainly used alcohol, 5 had a history of mixed use of several substances, 1 had used only amphetamines, and 1 had used only cannabis. Eight participants were completely abstinent at the time of the interview, while 10 reported unproblematic alcohol use. Most participants had been diagnosed with comorbid major depression and/or anxiety disorder.

Concerning their treatment experiences, all participants who had used heroin had received OMT, and all but one had started methadone while attending institutional treatment. Those who

Table 1. Thematic interview guide.

The thematic interview guide begins with a focusing question that, depending on the participants' responses, is followed by relevant probing questions. The interviews will therefore develop into conversations around specific themes. The purpose is to create an arena in which the participants freely express their experiences and self-awareness concerning their use of and abstinence from psychoactive substances.
Focusing question: "What has been most important for your recovery?"
Themes and probing questions:
1. What were your reasons for quitting substance use?
   Probing question: What was the influence of your partner, family, friends, and living situation?
2. What were your own efforts when managing to quit substance use?
   Probing question: What was the influence of your old and new social network?
3. What were your own efforts when managing to stay abstinent over time?
   Probing question: To what extent have your efforts involved other individuals or groups?
4. How has treatment contributed to your recovery?
   Probing question: To what extent has treatment involved feedback from others, peers as role models, or relationships with treatment providers?
5. How have your own rational choices been important for your recovery?
   Probing question: How have your choices been influenced by important social arenas and belonging?
6. How do you experience long-term abstinence from substance use?
   Probing question: How has your life evolved? What are your experiences of sociability and loneliness?

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had been dependent on alcohol or who had used a mixture of substances had received long-term SUD treatment in institutions that based their treatment on either a 12-step approach or the Therapeutic Community model. All but two of the participants had received long-term institutional SUD treatment and reported having had 3 to 8 institutional stays altogether. Two of the participants had only been admitted to detoxification units or had received other kinds of short-term SUD treatment and/or had attended self-help groups such as Alcoholics Anonymous (AA) or Narcotics Anonymous (NA).

Data collection. Collecting qualitative data from a sample of individuals with long-term SUD and diverse treatment experiences followed by stable abstinence and recovery can contribute to a greater understanding of how contextual and interpersonal factors influence SUD recovery. Thus, an interview guide comprising issues relevant to the study aim was developed (Table 1). HP conducted a face-to-face interview, lasting approximately 1 hour, with each of the 18 participants in their homes. Each participant was asked to consider his or her experiences with abstaining from severe substance use, including both decisions and reasons for abstaining or moderation, and strategies and requirements for remaining abstinent. The intention was to let the participants reflect freely on their experiences and to ask clarifying questions without making interpretations.[31] The interviews were recorded digitally, and verbatim transcripts were made of each interview before performing the next interview.

Narrative analysis. Collaboration with the resource group of peer consultants played an important role in preparing and planning the study, and during the initial data analysis. Collaboration with one of the peer consultants (MB) was instrumental during the subsequent narrative analysis.

The first 4 meetings with the resource group (August 2015-February 2016) involved establishing agreement about the study documents and reviewing the overall study purpose, research questions, inclusion criteria, and interview guide. The

subsequent 4 meetings (March-September 2016) involved group discussions concerning the interview content and initial thematic development. These meetings took place among the first author (HP) and the resource group of peer consultants. References to "we" in this section, thus, refer to HP and the peer consultants. In addition, the fourth author (SB) read the transcribed interviews and gave written comments without attending the meetings.

After each set of 4 to 5 interviews had been conducted and transcribed, the peer consultants received one transcript each for individual reading, as preparation for the group discussion. The researcher also read and reflected on each of the transcripts prior to the meetings. The researcher did so in a manner informed by phenomenological psychology,[32] which entailed an open-minded reading and bracketing of the researcher's preconceptions, so as to focus on the meaning conveyed by the participants. During the group discussions, each peer consultant read aloud a summary of the allocated interview and identified 4 to 8 themes. At the end of this presentation, the rest of the group commented on the identified themes. Finally, when all 4 to 5 interviews had been presented and commented on, we discussed which themes could be considered representative of these 4 to 5 interviews, limiting ourselves to 6 main themes. This procedure was repeated 4 times. In the final 4 meetings with the resource group, we merged the findings that had emerged during the first 4 meetings into a set of main themes that encompassed all 18 interview transcripts. We then agreed on one overarching theme concerning social relationships that promoted recovery. Subsequently, a total of 80 meaning units from the transcripts, consisting of sentences or paragraphs related to the main theme, were identified and translated from Norwegian to English by HP.

The next step was to move from the meaning units concerning social relationships by using empathic bridges to create narratives.[33,34] Empathic bridges transfer data between researchers and participants, and between the narratives of the participants and the readers. Thus, first-person language was used early in the analysis, to prevent objectification. It was

important to the narrative construction to maintain a focus on the basic narrative elements of *metaphor, plot, character*, and *point of view*[35] while summarizing the participant's story within the first-person language. As previously mentioned, one of the peer consultants from the resource group continued to contribute to this study, both analytically and as a co-author (MB). All of the transcribed interviews were re-read by both MB and HP independently. This part of the analysis involved looking into themes within each interview that contained references to supportive relationships. Then, MB and HP came together to discuss the findings and reach a consensus about which of the interviews had the most mentioning of supportive relationships. Three interviews stood out as containing several and diverse descriptions of supportive relationships, and were thus chosen to form the basis for 3 narratives. Then, 2 narratives were constructed by HP and one by MB, using a cut and paste method to insert relevant meaning units from the other interviews into a narrative summary written in the language of each participant. The narratives were then reviewed by JO and LD and returned to HP for completion.

The last step in the narrative analysis was to examine closely the main narratives, searching for themes that constituted similarities and differences across each. This last step was an iterative process of reading and commenting undertaken by MB, who had SUD recovery experience but limited research methodology training, and 3 of the other authors (LD, JO, and HP), who had extensive qualitative research experience but no SUD experience. This method of developing consensus among the researchers and a peer consultant with different backgrounds contributed to safeguarding the trustworthiness of the findings.[36]

Results

The following first-person narratives capture how 3 of the 18 participants described the ways in which different aspects of social relationships influenced their lives. These interviewees were selected because they offered the greatest detail about the roles of positive social relationships in their recoveries. Each of the 18 interview transcripts contained expressions about how connecting to people (and sometimes pets) close to them was important for initiating and maintaining abstinence; most, but not all, of these expressions are represented in the following narratives.

Narrative 1: putting things straight with myself and those around me

One man (aged 56 years) had been divorced for many years from his wife, who did not have any substance use problems. At the time of the interview, he was living on his own. He had 3 adult children and had worked in banking but was now retired. He had suffered alcohol problems for 30 years and had maintained abstinence for the last 12 years. He underwent several stays in institutional treatment facilities and had attended AA throughout the tenure of his abstinence. He explained as follows:

I recall being discharged from my first institutional treatment. I was abstinent, but not sober, and my surroundings were just as before. My emotions and my way of thinking were totally chaotic. The worst part was that I had nobody I could talk to concerning my problems. I had a family, but they were not alcoholics, and they really didn't understand what was going on.

After trying different kinds of treatment and listening to good advisers, my general practitioner told me that he could recommend a special institutional treatment for me. But first, he said, I'd have to attend five AA meetings. So I did. And then I came to this place where the treatment was based on the Minnesota model. Every Monday, I attended AA meetings. I got a peer sponsor who had 22 years of sobriety. At first, I didn't believe him and thought he seemed like a less intelligent man. But after a while, I said to myself, "If this guy could do it, I can too." So, after a while, I understood that he was exactly what I needed. I started working the 12 steps and did services during the AA meetings. Before, life without alcohol was unimaginable. There was a gap that had to be filled, and I filled it with AA meetings and working the steps. I admit I have very little respect for ways of treatment other than the Minnesota model.

Beginning to take care of my relationships with other people again was hard, but still, very important. In my work with the steps, I made a list of the people I wronged during my drinking career. The list was long, but I did it. And most of the people that I've talked to, to get some closure and maybe forgiveness, forgave me. I was living with a woman for seven years, and although we are now parted, we still have a good relationship. I never would have managed that without my sobriety. A lasting consequence of my old life is that I don't have any contact with my children. The children's mom and I still have a difficult relationship. The children didn't want to see me, even if I invited them over and over again, and it was destroying me. Finally, I told them that I wouldn't invite them anymore but that my door would always stay open for them. It was a hard decision to make, but by doing so, I regained some self-respect.

When I was drinking, everybody was an idiot who interfered with my life. Now I understand and appreciate that I've had a particularly concerned and caring sister. She both helped and challenged me. But I didn't understand that way back then. To experience a good life, you need to have someone next to you and to have a positive relationship with someone. Most of my buddies when I drank drew me in the wrong direction. I needed an environment change. But now, my new relationships don't include lies or cheating. I have a more positive life now. I'm quite proud of myself. Of course, people helped me, but most of the job I did myself.

Narrative 2: becoming responsible through limit-setting practices

One woman (aged 61 years) had been divorced for many years from a man who also had alcohol problems. She lived alone, but 1 of her 2 daughters lived nearby. Her alcohol problems had lasted 25 years, and she had been abstinent for the past 18 years. She had received institutional SUD treatment once. She explained as follows:

Eventually, I became afraid of meeting people in public spaces. I had to get high to have the courage to talk to people. When I went to work in the pub, I made sure to have a couple of drinks before I

opened the bar. In that field of work, you can easily help yourself to alcohol without anybody paying any attention. I recall thinking I had to do something with my bad habits before I became like the worn-out alcoholics sojourning on the streets.

None of my former friends really believed that I would manage to quit drinking, and nobody in my family or my social circle had any expectations on my behalf. I had received more harassment and beatings than food and love from my relationships. But I managed to live through it in a way. From early childhood, I was told I was worthless, that I didn't know or couldn't do anything. I was sort of a scapegoat in the family. Although I experienced much negative feedback from my mother, she was actually a very capable woman, because she had to take care of six kids and an alcoholic husband.

The obvious choice for me to address my alcohol problems was to consider going to Alcoholics Anonymous. But during my first meeting, I met a man who started talking to me about my father in very positive terms. My relationship with my father was really bad. He never stood up for me. Thus, meeting this man brought up bad emotions and was really the reason I didn't keep going to AA meetings. On the other hand, the long-term institutional treatment I received afterwards became crucial for me to quit. I had a unique relationship with one of the therapists that was helpful. She went through fire and water for me and even kept contacting me several years afterwards. It was my older sister who drove me to the institution. She was the kind of person who would be really harsh and punitive toward me if I resumed drinking after being discharged from the institution. Her attitude was helpful, but at the same time, it also reminded me of my upbringing as a powerless little sister. I was very sensitive toward people who wanted to control me. If, for instance, my own daughter had demanded that I should enter treatment, I probably wouldn't have complied.

Now I realize that it's important to say "no" concerning matters I don't approve of. If people around me get insulted by this, I couldn't care less, because it is when you start to put your foot down and speak out that you get to know who your friends are. It was obvious that a lot of my former friends didn't swallow my success when I managed to quit drinking. I have been rather tough toward some of them. But I felt I had to, because I had to preserve my self-esteem. Along the same line, I have become very strict about whom I invite to my house. I admit nobody who brings alcohol with them. That is an absolute measure for me to handle social relationships and to practice sobriety. In my own mind, I feel quite successful that I have the courage to hold on to my principles.

Narrative 3: experiencing a strong sense of duty

Another man (aged 40 years) cohabited with a woman who had no substance use problems. He had no children and had never held regular work. He had been using substances for 18 years before abstaining, and had undergone short-term SUD treatment twice. He explained as follows:

> It's very complicated how we humans are put together and which incidents become crucial to our lives. What was most significant to me was the sudden death of my younger brother. He died of an overdose at age 24, 10 years ago. I found him. His body was still warm, so I tried to resuscitate him and stayed with him until the ambulance arrived. Thereafter I don't know, but I kind of made a promise to him that I would pull myself together.

I believe my upbringing was of great importance to the trouble I experienced later in life. My mother was very short-tempered, yelled at me for no reason, and didn't praise or comfort me. Eventually, I gave up on trying to satisfy her. My dad never took part in my upbringing. His main contribution was to evict me from home at age 16. Such disturbances during my early adolescent years were not a good foundation for a stable life. The outset of my drinking was during 6th grade, followed by 20 years of substance abuse. I have been into everything.

To me, physical training became important in order to abstain from substance use. Even if I am usually motivated for the training, it has been important to have a physically active cohabitant who encourages me. Commitments to my dog function as a motivator as well. He has joined me on most of my journey, and the camaraderie with him has been important. Even on the days I was lacking energy and motivation, I had to take him out. Otherwise my bad conscience would have made it even worse. Physical training became a means to alleviate the bad conscience I suffered during all those years after my brother died. The training in itself doesn't actually give me more energy or better functioning, but it prevents me from going back into using substances, which I strongly believe my younger brother would have appreciated.

I have lost contact with most of those I kept company with during my years using substances, but I have not actively dissociated myself from that milieu. Most of my former buddies are in normal work and enjoying stable family lives now. I still see them now and then, but those with family and kids become very occupied. Circumstances change when you grow older. But I had to cut out the connection with those I had kept in touch with because I was just dealing with them; contacts with these people were based on drugs only.

After experiencing five years of abstinence, I still don't feel very well most of the time. I still suffer from obsessive thoughts and depression. But I have established a new identity. Toward people I know, I can be totally open about my former life of substance abuse, even if I don't see the need for sharing my problems with others on a daily basis. Some years have passed, and I don't find it helpful to talk about my former life to anyone. In the small community where I live, I don't want to expose my former life too much. I feel I ought to establish some new starting points with those I socialize with. I have a new identity, and I don't need to disclose everything about my old identity, because people are curious, and if you are too open-hearted about a criminal or drug background, you can be judged and stigmatized. In some arenas and in getting new acquaintances, it is best not to have too much negative publicity to begin with.

Discussion

These findings suggest that the relationships most helpful for initiating abstinence involved recognition by a peer or a caring relationship with a service provider or sibling. Furthermore, to reach or maintain abstinence, it is crucial to maintain positive relationships and to engage self-agency to protect oneself from being influenced by negative relationships. These positive relationships involved connecting to others without feeling shame or guilt, having supportive people close, and being cautious regarding with whom to share substance use experiences. One important aspect of our findings is the fact that maintaining

positive intimate relationships seems to be crucial for reaching long-term abstinence or stable recovery from substance use.

All of the participants in our study had received some form of treatment, but they found social relationships outside of treatment just as helpful in their successful recovery from SUD. The participants whose perspectives are represented in narratives 1 and 2 benefited, in particular, from the recognition of peers or supervisors. This recognition seems to involve being seen as a person with strengths and weaknesses, aside from having a SUD. Those who attended 12-step programs emphasized the role of a peer sponsor, which is one of the cornerstones in the 12-step program philosophy,[37,38] as a crucial factor for initiating abstinence. However, this kind of recognition has also been shown to be helpful outside of self-help groups; eg, a caring relationship with a service provider seems to be helpful both for adhering to SUD treatment and for promoting successful treatment outcomes.[39,40] Furthermore, studies examining service users' experiences underscore the importance of a positive relationship with a service provider to benefit from SUD treatment and to prevent dropout.[41–43] The latter qualitative studies included individuals in SUD treatment and individuals who had completed treatment and achieved periods of recovery, albeit briefer periods of recovery than those of our sample. Regardless, our study findings confirm the above-cited studies. According to the RC model, both recognition and maintenance of intimacy are essential to overcoming SUDs.[10] As pointed out by Giddens,[44] intimacy involves the awareness and availability of each partner's characteristics, as opposed to losing one's identity in the amalgamation of the relationship. Considering our findings, service providers' abilities to establish close relationships with their clients, without neglecting their professionalism, seem to be paramount to initiating abstinence.

Furthermore, these narratives indicate that a caring relationship with a sibling influenced our participants' decisions to stop using substances. All 3 narratives attest to the significance of this, but particularly narrative 3, in which the participant describes his commitment to a deceased younger brother as having had a marked influence. Other qualitative studies have also generated insight into the positive impacts of close relatives or friends on motivating clients to quit substance use,[9,45] but researchers have yet to lend specific attention to the particular role of siblings in promoting abstinence. One explanation could be that individuals with long-term SUD seem to have experienced troubled upbringings based on adverse relationships with their parents. Consistently, relationships with current or former partners can be experienced as fragile and less binding than biological family ties.[46] Therefore, maintaining positive relationships with siblings can be less challenging yet still safeguard important bonds with family. This corresponds to the RC model's component of social capital, which is understood as all resources possessed by an individual or group relating to a stable network of more or less established connections of shared acknowledgment.[23] Our study participants gained such recognition through expectations and obligations from a close family member, which contributed to terminating their substance use. In contrast, those lacking such social networks are less able to terminate their substance use.[1]

According to our findings, a change of scenery is important for both initiating and maintaining abstinence. This is underscored in narrative 2, in which the participant developed strategies for preventing visitors from bringing alcohol into her home and reacted harshly toward former friends who did not respect her new life of sobriety. In narrative 3, the participant linked his abstinent life without his former buddies to a way of creating a new identity for himself. Previous studies have reported similar findings concerning the avoidance of certain people and places.[7,11,47] Although the samples in these studies consisted of clients with considerably shorter periods of abstinence than our sample, they underscore the importance of establishing new acquaintances and avoiding their former milieu, as part of reaching stable recovery. According to the cultural capital construct embedded in the RC model, it is often harder to create new systems of meaning that keep sobriety or unproblematic substance use in the forefront than to do any other step in the recovery process.[23] Consistent with this, the narratives indicate that the participants employed limit-setting practices when deciding with whom to remain close and who to cut out of their lives. This is illustrated well in narratives 1 and 2, while narrative 3 shows the significance of being careful of whom to inform about one's former life of substance use. Thus, being an active agent in one's life and practicing limit-setting is facilitated after a period of abstinence. Nevertheless, recent research indicates that being strong-willed alone does not necessarily contribute to improved SUD recovery; rather, it depends on environmental and relational factors.[48]

Most research on SUD recovery has investigated the effect of a therapeutic intervention or abstinence initiation. Fewer studies have examined the influences on long-term recovery, as we did. The RC framework is well suited for explaining how social relationships influence stable recovery from SUD. For example, a cross-sectional study conducted in New York among 315 individuals who had used a mixture of substances and achieved recovery durations ranging from 8 months to 10 years supports the RC construct. This study showed that those with increased RC were more likely to remain in recovery, lead a better quality of life, and experience less stress.[49]

Finally, examining our data through narrative analysis enables us to conceptualize research data as personal matters rather than as abstract concepts. Focusing on participants' subjective experiences or personal stories makes it clear that those participating in research interviews are people with struggles, hopes, and dreams. A person is an entity greater than an individual with a SUD. When the purpose of research is to influence and promote change, it can be effective to touch the reader emotionally.[50] However, by going in depth into personal stories, we lose a broad perspective and, therefore, reduce the transferability of our

findings. Another limitation was that the participants of our study retrospectively recalled their experiences, which is problematic given the fallibility of memory. However, we explored these experiences directly through the participants' narratives and collaborated with a team of former substance users, thus enabling us to focus deeply on the meaning of the participants' experiences with recovery. Furthermore, we enhanced internal data validity and achieved a broad interpretation of the findings by collaborating with persons with firsthand SUD experience while preparing the study, analyzing the data, and writing up the findings.

Conclusions

Our findings generally support the basic elements of the RC construct proposed by Cloud and Granfield,[23,51] particularly concerning the factors related to social capital and, to a lesser degree, cultural capital. Compared with previous research on factors important for SUD recovery,[37–43] our findings support the importance of recognition by peers or service providers, and attest to the value of social environment changes.[7,11,47] The importance of the sibling relationship to SUD recovery has not been described previously, although the role of a close family member has been mentioned in other studies in the contexts of both mental illness and SUD.[9,45]

SUD treatment providers should involve clients' networks to a greater extent when designing new treatment approaches. They should invite significant others, family, and friends of the client to treatment programs, in the interest of promoting and prolonging positive relationships relevant to establishing sobriety. Furthermore, SUD treatment should provide more individualized services that meet the clients on a personal level and place greater emphasis on the clients' needs and aspirations rather than presenting what the treatment program can offer. Services should employ more collaborative, partnership-based models of care and develop client-directed recovery plans. As an increasing amount of recovery research shows,[52–54] the antidote to SUD not only is sobriety but also involves positive and caring connections with others. Strengthening bonds with the social world can weaken bonds with substance use.

Acknowledgements

Author Contributions

HP collaborated with the resource group to prepare the study and write the interview guide, conducted the interviews, and collaborated with SB and the resource group on initial data analysis. HP, MB, JO, and LD conducted subsequent data analysis. HP had the primary role in drafting the manuscript, with input from MB, LD, JO, AL, IS, and SB. All authors read and approved the final manuscript. Anne Landheim, Ivar Skeie, Stian Biong, Morten Brodahl, Jeppe Oute, and Larry Davidson contributed equally to this work.

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