Helping Behavior among People Who Use Drugs: Altruism and Mutual Aid in a Harm
Reduction Program

Geoff J. Bathje¹, Daniel Pillersdorf², Laura Kacere³ and Dan Bigg⁴

Adler University, Department of Counselor Education and Counseling¹

University of Windsor, Department of Psychology²

Private Practice³

Chicago Recovery Alliance⁴

Author Note

Correspondence concerning this article should be addressed to Geoff J. Bathje,
Adler University, Department of Counselor Education and Counseling, 17 N. Dearborn
St., Chicago, IL, 60602. Contact: 312-662-4302; gbathje@adler.edu or
gbathje@gmail.com.

Abstract

People who use drugs, and particularly people experiencing addiction, are rarely afforded the opportunity to have their voices heard when it comes to drug treatment or drug policy, or even when attempting to define themselves and their life experiences. Of course, there is much more to a person than one area of their behavior. The current study seeks to capture and understand the lived experiences of people who use drugs, with a focus on their relationships and helping behavior. We interviewed 32 participants in a harm reduction program seeking to provide understanding beyond stigmatizing and criminalizing drug narratives, by exploring their motivation and context for helping behaviors. Grounded theory methodology was used to understand the patterns of helping behavior, along with the contexts in which help is or is not given. We particularly focus on participants' distribution of syringes and carrying medicine to reverse overdose (naloxone). Participants shared stories of altruism and mutual aid, along with barriers and disincentives to helping others. We situate these behaviors within contrasting environments of a free harm reduction program and the competitive market system of U.S. society. Implications for practice and public policy are discussed.

Dedication

We would like to acknowledge Dan Bigg, co-founder and director of the Chicago Recovery Alliance (CRA), who passed away on August, 21, 2018. Dan was one of the leaders of the harm reduction movement, in many respects, but particularly with regard to pioneering community-based overdose prevention using naloxone. Dan saved countless lives through his work and he inspired many others to replicate CRA's approach. Dan led by example, modeling nonjudgment, fearlessness, humility, and generosity, and always encouraging "Any Positive Change". We were privileged to have his input in designing and conducting this research project with CRA's participants, to whom Dan dedicated his life's work.

Keywords: harm reduction, diffusion of benefits, addiction, overdose, drug use

People who use drugs (PWUDs), and particularly those who become addicted to them, are among the most stigmatized and mistreated members of U.S. society (Janulis, 2010; Luoma, O'Hair, Kohlenberg, Hayes, & Fletcher, 2010). Due to such strong negative social attitudes toward drugs and people who use them, many drug-related harms are not simply a natural consequence of drugs themselves, but instead have multiple causal factors. Socioeconomic factors, cultural beliefs, and drug-related laws and enforcement seem to greatly impact drug-related harms. One example of the results of these cultural and contextual factors can be found in the global statistics on overdose. The U.S. accounts for 27% of the world's drug-related deaths, but only 4% of the world's population, which suggests that factors particular to American culture, institutions, and drug policies are impacting the local risks of drug use (UNODC, 2017). We will touch on some of these factors in this introduction.

Before going further, we would like to make explicit some choices related to language and terminology in this article. We chose to use the person-first term "people who use drugs" rather than the more specific "people who inject opiates" because most people who use drugs use multiple drugs in multiple ways, although we note that our population's primary drug was heroin and preferred route of administration was primarily injection. We avoid stigmatizing labels, such as "addict" or "drug user", except where quoted from our participants. Additionally, the terminology of "new/sterile" and "used" was chosen instead of "clean" or "dirty" to describe drug use equipment to avoid reinforcing moral judgment and stigma directed towards PWUD's.

Drug-Related Harms

PWUD's are exposed to a number of potential harms, some of which are commonly accepted as a consequence of drug use, but all of which can be impacted, for better or worse, by a number of macrosystemic factors. The National Institute on Drug Abuse (2018) provisionally reported that 72,306 deaths occurred due to drug overdose in 2017, of which more than 49,068 involved an opiate. According to the Centre for Disease Control and Prevention (2017), from

2010 to 2016, the rate of heroin-related overdose deaths escalated by a factor of five, such that more than 15,469 individuals died due to overdose in 2016. While prescription opiates have been increasingly restricted, the prevalence of heroin use has more than doubled nationally since 2007, with the sharpest increases in suburban areas, and among women and White/European American people (Szabo, 2015). In addition, those who share syringes or inject drugs without sterile injection equipment, which is increasingly likely where syringes are treated as illegal drug paraphernalia, are at an increased risk for serious infections and contracting HIV or Hepatitis C (HCV). Arrest and incarceration are also substantial harms to individuals, their families, and their communities, which have consequences far beyond the period of incarceration in terms of things like employment opportunities, housing discrimination, loss of parental rights, and loss of certain civil rights (e.g. voting).

Barriers to Harm Reduction

Funding for treatment of substance use disorders (and mental health) treatment in the US decreased during and following the recession of 2008, in an environment of austerity (Schaper, 2015). Substance use treatment fell from 2% of total health expenditures in 1986 to 1% in 2009 (SAMHSA, 2013). This was particularly concerning, as substance use treatment services rely much more heavily on public funding than health services overall, at 69% vs. 49% of US publically funded health care in 2009 (SAMHSA, 2013). In addition to capacity limitations, the great majority of drug treatment programs are abstinence focused rather than harm reduction focused, which may not be appealing to the 80% of people with addictions who are in the pre-contemplation or contemplation stages of change, and by definition, not yet sufficiently motivated toward sobriety (Miller, Forcehimes, & Zweben, 2011). As such, treatment can be a form of harm reduction, but is not automatically so. Alternatively, a popular definition of harm reduction is “any positive change, as defined by the individual” (Chicago Recovery Alliance, as cited in Denning & Little, 2011).

Beyond substance use treatment programs, only a small percentage of federal, state, or local substance abuse funding is directed toward harm reduction efforts. Public opinions such as stigmatizing beliefs and authoritarian attitudes toward PWUD's sometimes stand in the way of implementing or funding harm reduction, though there is evidence that these beliefs tend to improve as people become more familiar with harm reduction (Bathje, Pillersdorf, & Du Bois, in press). For example, the legality of laypersons possessing naloxone has expanded in recent years. As of 2016, 41 states have a Naloxone Access law in effect compared to only 6 states in 2010 (Davis, 2016). Various laws and policies interfere with or prohibit needle exchange, and laws vary by jurisdiction. Though the federal US ban on funding for needle exchange programs ended in December 2015, funds still cannot be spent on syringes. As of 2016, only 23 of 50 states allowed people to legally carry syringes without prescription, while 3 other states allowed the possession of a limited number of syringes if obtained from a pharmacy (Burris, 2016). Despite barriers to funding and various legal barriers to program implementation, the North American Syringe Exchange Network (NASEN, 2018) reports that in 2015 there were 228 syringe exchange programs operating in 35 US states, the District of Columbia, Puerto Rico, and the Indian Nations, with many more "underground" exchanges operating illegally. Syringe exchanges often also provide comprehensive harm reduction services, such as safe smoking or snorting supplies, testing for HIV and/or Hepatitis C, condoms, and other materials, resources, and information. Finally, there have been increased efforts by PWUD's and their allies in harm reduction to establish the U.S.'s first safe consumption spaces (SCSs), where drugs would be consumed legally under supervision, despite prohibitive federal laws (León, Cardoso, Mackin, Bock, & Gaeta, 2017).

Harm Reduction as a Resistance Movement

While a comprehensive history of harm reduction is beyond the scope of this paper, we would be remiss in failing to attribute harm reduction primarily to PWUDs. In the words of an activist and former heroin user, "We aren't asking for a seat at the harm reduction table. We're

reminding you that it's our table.” (Abert, 2016). Before “harm reduction” became a buzzword, PWUDs partnered with other activists and other organized initiatives to combat the spread of HIV/AIDS in the United States by 1981 (Des Jarlais, 2017). Not only did PWUDs begin to distribute syringes, dispose of used syringes, address the HIV/AIDS crisis in the 1980s, and advocate for the availability of naloxone for overdose reversal, but they tended to be centered around a political critique of the war on drugs and economic inequality, both of which were viewed as central causes of the social, legal, and physical harms suffered by PWUDs (Roe, 2005). PWUDs have sometimes made efforts to organize into formal networks or “drug user unions” for the sake of reducing drug related harms, challenging criminalizing drug policies, advocating for resources, and countering stigma (San Francisco Drug Users Union, 2018). However, as research examining the effectiveness of needle exchange programs (NEPs) in the reduction of HIV transmission mounted (Des Guardino et al. 2010; NCAIDS, 1991) and the number of exchange programs grew (CDC, 1998), medical professionals were deemed to be the harm reduction experts (Roe, 2005). The political and social causes initially pursued were often superseded by professionalized harm reduction, which tended to accept that drug use can never be eliminated and that harms related to health and crime should be the focus of minimization (Reporter, 2003). As a result of the shift away from harm reduction as a social and political movement, toward a campaign that concentrated on individual harms and societal costs, professionalized harm reduction has sometimes lost sight of the perspective that drug use is often an attempt to cope with the psychological and material harms that stem from racial and economic inequality, and that much of the harm of drug use is created by stigmatization, criminalization, and the resulting unregulated black markets (Roe, 2005). Of course, there has always been resistance to the more narrow and depoliticized forms of harm reduction among PWUD's, and even among many professionals in harm reduction (Dechman, 2015).

Secondary Exchange/Diffusion of Benefits

PWUDs may distribute injection equipment and other materials and resources within their communities or networks, typically referred to as “diffusion of benefits” or “secondary exchange”. Herein, we use the term “diffusion of benefits” as it is broader than “secondary exchange”, which tends to refer specifically to the distribution of syringes. We define diffusion of benefits to refer to the extension of any service of a harm reduction program, by its participants, to nonparticipants of the program, such as distribution of condoms, information about HIV and Hepatitis C testing, and sharing of information related to social services. In addition to the provision of unused syringes to other PWUDs to prevent reuse (Bryant and Hopwood, 2009), Dechman (2015) outlines a number of other informal health-related helping behaviors, including the promotion of using sterile equipment, serving as first-responders to overdose, and first aid administration, providing emotional support to others, or encouraging those who wish to reduce their drug consumption.

Brothers (2016) observed that the motivation for distributing syringes is often assumed to be either altruism or monetary gain (by selling them). In a qualitative study, she identified three patterns of helping behavior, which were summarized as informal health care workers (who help with things like better injection practices or finding a vein), merchants (those who sell syringes), and samaritans (those who give syringes away altruistically). Other research has shown that the diffusion of benefits is often embedded in social networks, which provide natural opportunities for peer education and the sharing of information and resources (Murphy, Kelley, & Lune, 2004; Snead et al., 2003). Indeed, diffusion of benefits is associated with decreased sharing of used needles, a greater likelihood of seeking drug treatment, and facilitation of HIV risk education (Huo, Bailey, Hershow & Oulette, 2005). It also allows providers to expand the reach of harm reduction programs to a larger geographical area, is cost-effective, reduces law enforcement impediments, and allows services to reach individuals that might otherwise be inaccessible (Green et al., 2010; Lorvick et al., 2006; Anderson et al., 2003). For example, in Oakland, California, knowledge of the “Wound and Abscess Clinic” was primarily publicized by PWUDs

through word of mouth, which led to the treatment of over 173 individuals in 2002 (Grau, Arevalo, Catchpool & Heimer, 2002). Additionally, in interviewing 1543 PWUDs, Heimer, Grau, Curtin, Khoshnood and Singer (2007) found that “customers” of syringe exchange programs were more likely to have been tested for HIV (96.1%) than were “noncustomers” (91.8%).

Rationale for the Study

The current study seeks to provide a more complete view of PWUDs by focusing on behaviors that are not typically a focus of popular discourse or research; namely, pro-social, altruistic, and communal behavior. Stigmatizing narratives and criminalizing policies can impede service delivery and result in state-sanctioned oppression and discrimination (e.g. mass incarceration and disqualification from social services), through one-dimensional portrayals of people who use banned substances. By interviewing “helpers” who both utilize and extend the reach of harm reduction programs, we seek to add context to discussion of substance use and persons who use substances. This seems to be a vital area for research, as it appears that a substantial number of the people helped by harm reduction programs do not have personal contact with the program, but instead access materials, information, and resources through diffusion of benefits. By focusing on the communal, altruistic, and pro-social beliefs and behaviors of persons who use substances, along with the things that support or impede those behaviors, we can more fully consider their humanity, foster their well-being, and identify ways to include them as facilitators of harm reduction.

The current study focused on participants of a comprehensive harm reduction program in Chicago, IL (Chicago Recovery Alliance) that seeks to both prevent medical harm and address harm at the sociopolitical level. This is achieved by offering a range of services to reduce individual harm and improve public health (e.g. naloxone distribution, syringe and injection supply access, condoms, vein care, hepatitis A and B vaccination, hepatitis C and HIV testing, etc.), while also advocating for public policy changes, challenging stigma, distributing resources (e.g. food, clothing, counseling/linkage services), and maintaining an organizational and decision

making structure that is guided by its participants (e.g. including participants as board members, holding focus groups to make decisions, etc.).

Method

Procedure

Prior to conducting interviews, each of the researchers spent several hours at multiple data collection locations to acclimate to the program, services offered, and the social context of harm reduction services. The research team also engaged in discussion about harm reduction and explored their feelings and beliefs about substance use to minimize the risk that judgments or biases would be introduced to the participants. The study was approved by both the harm reduction organization and the first author's university.

Semi-structured interviews were conducted at harm reduction outreach sites in five neighborhoods in Chicago, IL. All participants in the program are asked how many people they are picking up safer use supplies for, and whether they would like to take naloxone for overdose reversal. Participants were invited to be interviewed for our study after responding affirmatively to an outreach worker that they were picking up syringes for at least one person other than themselves, and/or were picking up naloxone (which one can only administer to others). We refer to these individuals as "helpers", as they are engaging in harm reduction that benefits others. After agreeing to be interviewed, participants were brought to a private area of the outreach site and informed consent protocol was undertaken. If they consented to be interviewed and audio recorded, the interviewer proceeded with the interview. The interviews were subsequently transcribed and participants were provided a \$10 cash incentive for their participation. All interviews were conducted by the first author and two Master's level graduate students on his research team.

Participants

Participants ranged from 26 to 60 years of age, with an average age of 41.1 years ($SD = 10.6$). Fourteen participants identified as White/Caucasian (43.75%), 12 participants identified as

Latina/o (37.50%), four participants identified as black/African American (12.5%), one identified as Middle Eastern (3.13%), and one identified as Native American (3.13%). Participants self-reported their gender as 21 males (65.6%) and 11 females (34.4%). Across several years of program data, the average participant in the program picks up injection supplies for 2.1 additional people, while participants in our study, who were selected because they help other people, reported picking up supplies for an average of 3.8 other people (2.16 men and 1.66 women).

Though our focus was not on the employment, socioeconomic status (SES), housing status, or citizenship status of participants, some participants volunteered this information. It was clear that our sample was largely low SES, with significant histories of homelessness or unstable housing. However, it was also clear that many participants were employed and stably housed. They reported a range of educational experiences, from dropping out of high school to completing college. Some participants were born outside of the United States or in U.S. territories (Puerto Rico).

Data Analysis

Interviews were transcribed verbatim. Interview data was analyzed using Atlas.ti software and grounded theory methodology (Glaser & Strauss, 1967). This methodology involves allowing themes to be generated from the gathered data rather than searching for themes and patterns constructed *a priori* by the researcher. We used a theoretical sampling procedure (Glaser, 1978) which allows questions and interview material to be reflected upon, revised, and checked against the developing grounded theory. The process of collecting and analyzing data was ongoing and simultaneous.

In line with the constant comparative method (Glaser, 1978), open coding was first used to identify common themes and concepts. Following the thematic organization of the data using concise codes, interviews were re-examined to search for content that was characteristic of the determined categorical themes. Subsequently, axial coding was employed in order to better understand the relationship between categories formed during the open coding procedure. In this

coding phase, our primary categories were related to several of their comprising subcategories. These relationships were subsequently verified through further examination of interviews. Following Corbin and Strauss's (1990) coding paradigm, the phenomenon of diffusion of benefits was explored in ways that considered various influences on helpers. These forces (subcategories) included the conditions that engender diffusion of benefits, the context in which diffusion of benefits occurs, how diffusion of benefits is carried out, and the consequences of diffusion of benefits. Data were then selectively coded, whereby relationships between major and minor categories were verified and used to form a descriptive sequence of the secondary exchange phenomenon. Transcripts were read again and data were coded that related to the core category (Corbin & Strauss, 1990), engendering additional themes. To ensure that valid data was collected, interviewers would convene after each day of interviews to challenge ideas, revise or add questions, and discuss theoretically interesting observations.

Results

Initial Coding. Four themes were identified during the initial coding phase: a) Marginalization/Separation (from other people, social institutions, etc.) b) Diffusion of Benefits (sharing resources or information with others) c) Motivation to Help (reasons for helping others) and d) Relationships (relationship to the person being helped). Several subthemes were identified within each of the major themes and these were also coded (see Table 1).

Table 1

Themes and Subthemes from Initial Coding

Theme	Subtheme
Marginalization/Separation	<i>Criminalization/policing</i> <i>Negative experiences with mainstream systems (e.g. healthcare)</i> <i>Stigmatization</i> <i>Withdrawing oneself/avoiding others</i> <i>Lack of help</i>
Diffusion of Benefits	<i>Administering/distributing naloxone</i>

- Distributing syringes, injection supplies, and condoms*
 - Publicizing services*
 - Sharing health information*
 - Providing emotional support*
 - Sharing material resources (e.g. food)*
 - Motivation to Help
 - Empowerment/control/resistance*
 - Sense of community/communality*
 - Altruism/sense of responsibility*
 - Personal relationships*
 - Sense of identity/social role*
 - Personal gain*
 - Witnessing negative events*
 - Relationships
 - Family/friends/partners*
 - Peer acquaintances*
 - Helping strangers*
 - Transactional/financial*
-

Selective Coding. During initial coding, the need for more of a central focus on diffusion of benefits within different types of relationships and **the context of** relational interactions was evident. Selective coding focused on the nature of the relationship where helping occurred, and where helping was expected but did not occur. Three major themes were developed within the context of relationships: egoism, altruism, and cooperation/mutual aid. Egoism can be broadly defined as motivation to increase one's own welfare, such as Ayn Rand's (1988) statement that, "Man – every man – is an end in himself, not the means to the end of others. He must exist for his own sake, neither sacrificing himself to others nor sacrificing others to himself. The pursuit of his own rational self-interest and of his own happiness is the highest moral purpose of his life." Altruism can be broadly defined as the principle or practice of disinterested and selfless concern for the well-being of others, and includes various types of altruism, such as reciprocal, cost-benefit, and empathy-based. It has been defined as "a behavior which is costly to the actor and beneficial to the recipient." (West, Griffin & Gardner, 2007). We define Cooperation/Mutual Aid

as sharing and cooperation that arises within the context of relationships and independent of markets (i.e. sharing with one's family or social group). These relationships can be real or perceived (e.g. a friend or someone with a shared identity, such as a fellow "drug user"), but are often at odds with selfishness (Boyd & Richerson, 2009).

Themes and Participant Quotes. Within the three themes of egoism, altruism, and cooperation/mutual aid, participants reported a range of experiences, and often provided some sense of the context of their experiences as well. All participant names are pseudonyms.

Altruism. Prominent observations were a moral/ethical responsibility to help others due to ability or values, occupying a social role related to helping others, and having empathy for others (especially those in similar situations). Moral/ethical responsibility was evident in some quotes: "My father, he was an addict and he always told me about helping other people. No matter what they're on, what they want to do." ("Ramon", 35-year-old Puerto Rican male).

Participants regularly reported helping strangers or people they barely knew in a variety of ways:

I got a girl to go to treatment one time, that was the only thing, good thing. I told her she was going to die. She was eighteen, eighteen and out here, and I said you are going to die, and if you don't die, you are going to have a miserable life. ("Mary", 38-year-old White female)

In some cases, individuals took significant personal risks to help others and remain consistent to their sense of moral/ethical responsibility:

I didn't want to leave the guy [during an overdose] though because I didn't know what was gonna happen. I'm like, I'd rather go to jail for possession or possessing a needle or something like that than him dying and me leaving him and having that on my conscience, knowing I could've done something. ("Manny", 33-year-old Latino male).

Some reported a sense of responsibility to help those with relatively less privilege than themselves:

Not a lot of people that do this can even afford a car, and get around, you know. I am lucky that I'm privileged. So that's why. I tell them, 'Hey I'm going to go to an exchange, I'll meet you guys', you know? ("Ahmed", 40-year-old Middle Eastern male). Finally, helping others seemed provide opportunity for self-esteem or self-worth:

I know at the end of the day if I help somebody live, you know, I know there's a mother that won't be crying for her son, you know, because he died. Somebody saved his life even though she don't know that happened. ("Rahul", 39-year-old Latino male).

Egoism. While many altruistic encounters were described, some participants also reported selfish or egoist interactions. Primary observations related to egoism included reports of others putting one's own interest first, dependence on the participant, and inability to help. Participants discussed helping without being helped in return: "Like if you help them that's cool, you know, but when it's time for them to help you, it's hard for them to do it, you know?" ("Juan", 39-year-old Puerto Rican male). Some discussed seeing others sell harm reduction supplies they acquired for free, though they often cited a context for the behavior (e.g. being desperate for money):

Sometimes a lot of people, if I got money they say, 'Give me a dollar [for a syringe]' A dollar! Some people are assholes. They'll come here and get them for free and then go out there and sell them. A lot of people are desperate, you know? ("Manny", 33-year-old Latino male).

A few also gave examples of theft, such as, "The other dope fiends want to just rip them off and ditch them. That scares me man. Like, wow, I'm getting high with these scumbags." ("Jason", 39-year-old Caucasian male).

Some participants believed that stigmatization, exclusion, and criminalization acted to reinforce egoism and isolation. Central to this view was the idea that the prohibition of drug meant that people withdrew to use and thus became very solitary and disconnected. Once participant stated:

The thing is, it's like the whole taboo thing about it is people keep more and more to themselves. People enclose themselves in smaller and smaller boxes and that's why people end up using alone and dying. They end up sectioning themselves off from everyone else who doesn't accept them. You know, everything just gets smaller and smaller and smaller and you're by yourself. People go off into the woods, or by the tracks, or into buildings. ("Justin", 28-year-old Caucasian male).

Cooperation/Mutual Aid. Primary observations related to this theme included a desire to protect the well-being of significant others and mutual aid among friends, family, and community. Mutual aid can be differentiated from altruism, as mutual aid involves real or perceived relationships, such as a sense of connection to members of a shared identity group or reference group. One man discussed mutual support in stating, "I want my friends to be healthy and make sure they stay clean with what they doing, right?" ("James", 54-year-old African-American male). This theme also included solidarity with others who shared a reference group, such as "sex workers" or "drug users":

I hand out condoms like candy, I mean if anyone needs one. A lot of us girls, we know each other. If somebody needs a brand new needle, it's like the same thing with condoms, we just hand it out to each other, help each other out. ("Mary", 38-year-old Caucasian female).

Others cited mutual aid within the context of supportive relationships or sense of connection among people who use drugs:

You don't know where to go, what to do. We [cousins and friends] help each other, you know, and one day when I need the help they might help me. And one day they need me, I may be there. We take turns picking up clean needles. ("Ramon", 35-year-old Puerto Rican male).

Support did not always involve material resources, particularly given the limited resources of many of our participants, but could also include emotional support among neighbors:

I'll just try to teach the importance of life to people. I see a lot of people who have HIV for this reason or that reason and I'll hug them...you feel me? So just stuff like that to try to speak life into people, tell them to keep smiling. There's a lot of people who are downtrodden in this neighborhood. ("Jocelyn", 34-year-old African American female)

Others identified their role as a leader or helper among PWUDs or among people engaging in sex work, which seemed to provide an opportunity for identity.

I feel like a mother figure to them. And it's like, you know, how I meet them, where I used to hang out. If I'm walking around the neighborhood, and I walk to them and I'll ask them, are you out here soliciting? And they are real scared and think I am a cop, and I go 'I'm not a cop, I get high'. And I'll show them my [injection] marks and then they open up to me. I'm like, 'Okay, I'm going to give you my number, and I want you to call me if you need any clean needles or condoms, you know, whatever you need, to make sure you got clean stuff to work with, don't use other people's needles, and please, if you can, do not get into other people's cars'. ("Grace", 52-year-old Caucasian female).

This leader position could also take the form of expertise in harm reduction practices.

"I'm one of the old timers out there. I've been shooting dope for 39 years, so people take advice from me. I help them out. I make sure they don't do too much. I make sure I have narkan on hand. Some people fix at my house, not everybody." ("Gary", 55-year-old Caucasian male).

Some cited specific ideologies or political philosophies for their mutual aid, along with a feeling of solidarity. One man said, "You know, I mean, ideally speaking you know, the closest Marxism's ever come in praxis is the drug community." ("Jay", 26-year-old Caucasian male).

Some participants were able to further elaborate a sociopolitical critique in explaining their feelings of solidarity and motivation to help others:

I've been an advocate, a political activist for maybe 16-17 years. I was hip to who gets hurt in this game, and I figured, what the fuck, I'm out here doing nothing, you know, but

being unemployed and living on the street. You know this society has a tendency to tell a homeless person in so many ways, over and over again, how useless they are, how they don't count, how they are non-existent, and it's a way to exist...it's a way to exist and do something positive for people. I'm picking up Naloxone just in case. There isn't anyone I am thinking about though at this time. I am extremely concerned about HIV infections, Hepatitis B, Hepatitis C. I am have been extremely worried about these infections in the population, and the fact that the poorest people, the people with the least contact with medical care get sick, and it made me feel that if there was any chance I could keep someone from contracting any of these illnesses by merely giving them a clean needle, then god damn, I was going to go ahead and do it. ("Sandra", 54-year-old Caucasian female).

Criminalization can act as a disincentive to connecting with others by making it risky to help others, though many took substantial person risks anyway. This theme was revealed by responses such as:

One time, well, I was coming from picking up and one of my friends was with another friend and he had passed out and turned purple, and I actually had the narcan with me. And I went and shot him up, but it wasn't working so we ended up calling the ambulance. The ambulance came, but the cops came as well, and the cops wanted to lock us up because I guess we were in the drug area. It was kind of crazy because I'm out here trying to help him out and they want to lock me up. ("Jesus", 37-year-old Latino male).

In some cases, the role of helper was known to others, which could lead others to rely on a person as an alternative to seeking help from mainstream healthcare resources:

There was a crazy thing that happened once. We had to use [naloxone] on a friend that overdosed at our house once. And while we were taking care of him, some other people pulled up in front of our house with their friend that was overdosing. They didn't want the cops to get involved so they just brought him to us, because they know we have

naloxone. I was worried the neighbors would see what was going on and call the cops and they'd find two people overdosing. That was a crazy situation. We gave them the naloxone and they both came back. ("Trisha", 31-year-old Caucasian female).

Discussion

Our study shows that people who use drugs and have few resources are motivated to engage in altruism and mutual aid. While this may contradict stigmatizing narratives about PWUD's, it is consistent with research on lower income individuals. Experimental research has shown that those with fewer resources are more generous than those with more resources (Miller, Kahle & Hastings, 2015). Furthermore, opportunities for altruism and participation in the community are beneficial to one's psychological well-being (Schwartz, Meisenhelder, Ma & Reed, 2003), including well-being of PWUDs. One of the more insidious aspects of economic inequality is the unequal opportunity to engage in altruism due to having fewer resources to share. Harm reduction programs can provide valuable opportunities for PWUDs to engage in altruism and participate in community, although public policy, and social, cultural, institutional, and economic factors may limit their opportunities to do so.

The responses of our participants cite numerous examples of altruism, egoism, and support/mutual aid occurring within particular contexts and circumstances. The anthropologist David Graeber (2007) hypothesizes that neither egoism nor altruism are inherent to human nature, but that both arise within the context of market economies. It is the unequal distribution of resources within certain socioeconomic systems that produces egoism, which then leads to moral calls for altruism as a response. Incidentally, Graeber points out that the world's major religions tended to arise (and emphasize charity while decrying greed) shortly following the emergence of money, markets, and resulting inequality.

Within Graeber's (2007) framework, egoism and altruism intersect with a larger continuum of cooperation and competition for scarce resources. However, it is worth noting that resources can appear scarce, with individuals responding accordingly, when they are actually

abundant but unequally distributed, as under modern capitalism in the United States. From an evolutionary perspective, cooperative behavior, rather than competition, was the hallmark of human evolution and our species' ability to disperse around the globe (Nowak, 2012). With this framework, we situate American society and the socioeconomic context of competitive capitalism and unequal distribution of resources on the right side of Figure 1. The left side reflects the context of a harm reduction program, where participants can obtain free access to as many harm reduction supplies as they need for themselves and others.

Figure 1. Systemic Context of Helping Behavior

Of course, the participants in our study exist in both of these systems simultaneously, so multiple aspects of the communal/egoism-altruism continuum can be observed in their experiences and behaviors (e.g. mutual aid and lack of reciprocity, free distribution of syringes, syringes being sold, etc.). Criminalization, exclusion, and stigma are part of the background context for PWUD's, though they can simultaneously marginalize individuals and result in sense of shared identity and community amongst PWUDs. This sense of community provides a context within which PWUDs can help each other, develop solidarity, reduce harm, and survive.

We propose that intentionally designing harm reduction programs to take advantage of this prosocial emphasis and supporting diffusion of benefits can not only expand the reach and impact of the program, but may also improve the well-being of participants and provide opportunity for development of a positive social identity (which incidentally may also make recovery more appealing). For these reasons, we propose that public policy and agency policies should encourage, rather than interfere with opportunities to participate in community and help other PWUD's. This can be achieved by enacting laws and policies that encourage participation in harm reduction programs and diffusion of benefits (e.g. allowing participants to carry an unlimited number of syringes, allowing laypersons to carry and use Naloxone, eliminating drug paraphernalia penalties, etc.), provide safe havens from stigma and criminalization (e.g. safe consumption spaces/safe injection facilities) and explicitly encourage inclusion and helping behavior amongst PWUDs (e.g. asking participants in harm reduction programs if they would like to take extra syringes or naloxone to protect others, including persons who use substances in harm reduction/addiction treatment program development, etc.). By doing so, we can both increase the occurrence of prosocial behaviors, challenge stigmatization by acknowledging that helping behavior already occurs regularly amongst PWUDs, and expand the reach of harm reduction programs to protect the health of PWUDs. We feel this is particularly urgent in the midst of increasing Hepatitis C infection and an overdose epidemic (a term we prefer to "opioid epidemic", which may lead one to focus primarily on reducing drug availability and neglect that harm can be reduced even in the presence of opioids).

There are several potential limitations to the generalizability of our study. The study was conducted in the United States, and was local to Chicago, IL. Further research outside of large cities and outside of the United States, particularly in countries with better regulated markets and broader social services, could inform and extend our model. Laws also vary from state-to-state within the U.S. Diffusion of benefits is impeded by restrictive policies in many states, thus restricting opportunities for altruism and/or participation. Our study focused on a well-established

harm reduction program that primarily serves persons who inject heroin. Harm reduction services are not as widespread for people who use other substances or other routes of administration, and fewer resources would likely impact relationships due to fewer opportunities for altruism and mutual aid.

In conclusion, our study provides a focus on helping behaviors among PWUD's, which can be used to counterbalance criminalizing and stigmatizing depictions. Our study also reinforces the concepts of harm reduction and diffusion of benefits, while providing a conceptual framework for understanding factors that support and inhibit mutual aid and altruism among people who use drugs. Crucially, these prosocial behaviors can be influenced by the policies of programs/agencies and broader public policy related to drug laws. We hope that treatment providers, social service administrators, activists, public health workers, and policy makers will take note and promote policies that support the full humanity of people who use drugs and their essential role in reducing harm.

References

- Abert, C. (2016, November). *Lessons learned from Austin, Indiana*. Panel at the 11th Annual Harm Reduction Conference, San Diego, CA.
- Anderson, R., Clancy, L., Flynn, N., Kral, A., & Bluthenthal, R. (2003). Delivering syringe exchange services through “satellite exchangers”: The Sacramento Area Needle Exchange, USA. *International Journal of Drug Policy*, 14(5-6), 461-463.
doi:10.1016/S0955-3959(03)00146-4
- Bathje, G., Pillersdorf, D., & Du Bois, S. (in press). Attitudes toward harm reduction and the stigmatization of people who use drugs. *Journal of Stigma and Health*.
- Boyd, R., & Richerson, P. (2009). Culture and the evolution of human cooperation. *Philosophical Transactions of the Royal Society B: Biological Sciences*, 364(1533), 3281-3288.
doi:10.1098/rstb.2009.0134
- Brothers, S. (2016). Merchants, samaritans, and public health workers: Secondary syringe exchanger discursive practices. *International Journal of Drug Policy*, 37, 1-8.
doi:10.1016/j.drugpo.2016.06.004
- Bryant, J., & Hopwood, M. (2009). Secondary exchange of sterile injecting equipment in a high distribution environment: A mixed method analysis in south east Sydney, Australia. *International Journal of Drug Policy*, 20(4), 324-328.
doi:10.1016/j.drugpo.2008.06.006
- Burris, S. (2016). Syringe possession laws map. *LawAtlas*. Retrieved from:
<http://lawatlas.org/query?dataset=paraphernalia-laws>
- Centers for Disease Control and Prevention. (1998). Update: syringe exchange programs—United States, 1997. *Morbidity and Mortality Weekly Report*; 47:652.
- Corbin, J., & Strauss, A. (1990). Grounded theory research: Procedures, canons, and evaluative criteria. *Qualitative Sociology*, 13(1), 3-21. doi: 10.1007/BF00988593

- Davis, C. (2016). Naloxone overdose prevention laws map. *LawAtlas*. Retrieved from:
<http://lawatlas.org/query?dataset=laws-regulating-administration-of-naloxone>
- Dechman, M., K. (2015). Peer helpers' struggles to care for "others" who inject drugs. *International Journal of Drug Policy*, 26(5), 492-500. doi:10.1016/j.drugpo.2014.12.010
- Des Jarlais, D. (2017). Harm reduction in the USA: The research perspective and an archive to David Purchase. *Harm Reduction Journal*, 14(1). doi:10.1186/s12954-017-0178-6
- Denning, P. & Little, J. (2011). *Practicing harm reduction psychotherapy: An alternative approach to addictions (2nd Ed.)*. New York, NY: Guilford Press.
- Glaser, B., Strauss, A. The Discovery of grounded theory: Strategies for qualitative research. Chicago, IL: Adeline Publication Co. 1967.
- Glaser, B. (1978). *Theoretical sensitivity: Advances in the methodology of grounded theory*. Mill Valley, CA: The Sociology Press.
- Graeber, D. (2007). Army of altruists: On the alienated right to do good. *Harper's Magazine*, 31-38.
- Grau, L., Arevalo, S., Catchpool, C., & Heimer, R. (2002). Expanding harm reduction services through a wound and abscess clinic. *American Journal of Public Health*, 92(12), 1915-1917. doi:10.2105/AJPH.92.12.1915
- Green, T. C., Bluthenthal, R. N., Singer, M., Beletsky, L., Grau, L. E., Marshall, P., & Heimer, R. (2010). Prevalence and predictors of transitions to and away from syringe exchange use over time in 3 US cities with varied syringe dispensing policies. *Drug and Alcohol Dependence*, 111(1-2), 74-81. doi:10.1016/j.drugalcdep.2010.03.022
- Guardino, V., Des Jarlais, D., Arasteh, K., Johnston, R., Purchase, D., & Solberg A. (2010). Syringe exchange programs – United States, 2008. *Morbidity and Mortality Weekly Report*. 59 (45), 1488-1491.
- Heimer, R., Grau, L., Curtin, E., Khoshnood, K., & Singer, M. (2007). Assessment of HIV testing of urban injection drug users: Implications for expansion of HIV testing and prevention

- efforts. *American Journal of Public Health*, 97(1), 110-116.
doi:10.2105/AJPH.2005.078105
- Huo, D., Bailey, S., Hershow, R., & Ouellet, L. (2005). Drug use and HIV risk practices of secondary and primary needle exchange users. *AIDS Education and Prevention*, 17(2), 170-184. doi:10.1521/aeap.17.3.170.62900
- Janulis, P. (2010). Understanding addiction stigma: Examining desired social distance toward addicted individuals. *Theses and Dissertations*. Paper 16. Retrieved from:
<http://via.library.depaul.edu/etd/16>
- León, C., Cardoso, L., Mackin, S., Bock, B. & Gaeta, J.M. (2017) The willingness of people who inject drugs in Boston to use a supervised injection facility, *Substance Abuse*, 39(1), 95-101, DOI: 10.1080/08897077.2017.1365804
- Lorvick, J., Bluthenthal, R. N., Scott, A., Gilbert, M. L., Riehman, K. S., Anderson, R. L., . . . Kral, A. H. (2006). Secondary syringe exchange among users of 23 California syringe exchange programs. *Substance Use & Misuse*, 41(6-7), 865-882.
doi:10.1080/10826080600669041
- Luoma, J. B., Ohair, A. K., Kohlenberg, B. S., Hayes, S. C., & Fletcher, L. (2010). The development and psychometric properties of a new measure of perceived stigma toward substance users. *Substance Use & Misuse*, 45(1-2), 47-57.
doi:10.3109/10826080902864712
- Miller, W.R., Forcehimes, A.A., & Zweben, A. (2011). *Treating addiction: A guide for professionals*. New York, NY: Guilford Press.
- Miller, J.G., Kahle, S., & Hastings, P. D. (2015). Roots and benefits of costly giving: Children who are more altruistic have greater autonomic flexibility and less family wealth. *Psychological Science*, 26(7), 1038-1045. doi:10.1177/0956797615578476
- Murphy, S., Kelley, M. S., & Lune, H. (2004). The health benefits of secondary syringe exchange. *Journal of Drug Issues*, 34(2), 245-268. doi:10.1177/002204260403400201

- National Commission on Acquired Immune Deficiency Syndrome. (1991). In: National Commission on AIDS, editor. *The twin epidemics of substance use and HIV*. Washington DC: National Commission on Acquired Immune Deficiency Syndrome.
- National Institute on Drug Abuse. U.S. Department of Health and Human Services, (2018). *Overdose death rates*. Retrieved from: <https://www.drugabuse.gov/related-topics/trends-statistics/overdose-death-rates>
- North American Syringe Exchange Network. (2018). NASEN: North American syringe exchange network. Retrieved from <https://nasen.org>
- Nowak, M.A. (2012). Why we help: The evolution of cooperation. *Scientific American*, 307, 34 - 39. doi: 10.1038/scientificamerican0712-34
- Rand, A. (1988). *The Ayn Rand Lexicon: Objectivism from A to Z*. New York, New York: Penguin Group.
- Reporter, S. (2003) Just say maybe. *The Economist*, 366, pp. 72–73.^[11]_{SEP}]
- Roe, G. (2005). Harm reduction as paradigm: Is better than bad good enough? The origins of harm reduction. *Critical Public Health*, 15(3), 243–250.
<https://doi.org/10.1080/09581590500372188>
- Substance Abuse and Mental Health Services Administration. (2013). *National expenditures for mental health and services and substance abuse treatment, 1986-2009*. HHS Publication No. SMA-13-4740. Rockville, MD: Substance Abuse and Mental Health Services Health Administration.
- San Francisco Drug Users Union (2018, January 25). *Statement of purpose and organizing principles*. Retrieved from: <http://www.sfdrugusersunion.com/#!/purpose-&-principles>
- Schaper, D. (2015, August 8). Heroin crisis ups demand for treatment as program funding is cut. *National Public Radio*. Retrieved from:
<http://www.npr.org/2015/08/18/432683627/heroin-crisis-ups-demand-for-treatment-as-program-funding-is-cut>

- Schwartz, C., Meisenhelder, J. B., Ma, Y., & Reed, G. (2003). Altruistic social interest behaviors are associated with better mental health. *Psychosomatic Medicine*, 65(5), 778-785.
doi:10.1097/01.psy.0000079378.39062.d4
- Snead, J., Downing, M., Lorvick, J., Garcia, B., Thawley, R., Kegeles, S., & Edlin, B. (2003). Secondary syringe exchange among injection drug users. *Journal of Urban Health*, 80(2), 330-348. doi:10.1093/jurban/jtg035
- Szabo, L. (2015, July 7). Heroin use surges, addicting more women and middle-class. *USA Today*. Retrieved from: <http://www.usatoday.com/story/news/2015/07/07/heroin-use-spikes/29788031/>
- United Nations Office on Drugs and Crime. (2017). World Drug Report 2017. Retrieved from <http://www.unodc.org/wdr2017/en/maps-and-graphs.html>
- West, S. A., Griffin, A. S., & Gardner, A. (2007). Social semantics: Altruism, cooperation, mutualism, strong reciprocity and group selection. *Journal of Evolutionary Biology*, 20(2), 415-432. doi:10.1111/j.1420-9101.2006.01258.x