

A Qualitative Study of the Experience of Immediate Antiretroviral Therapy Among Urban Persons With Newly Diagnosed Human Immunodeficiency Virus

Katerina A. Christopoulos,¹ Xavier A. Erguera,¹ Lyndon VanderZanden,² Chadwick Campbell,¹ Maya Green,² Manami Diaz Tsuzuki,¹ John Schneider,^{2,3} Susa Coffey,¹ Oliver Bacon,^{1,4} Monica Gandhi,¹ and Kimberly A. Koester¹

¹University of California, San Francisco, San Francisco, California, USA, ²Howard Brown Health, Chicago, Illinois, USA, ³University of Chicago, Chicago, Illinois, USA, and ⁴San Francisco Department of Public Health, San Francisco, California, USA

Background. Guidelines recommend immediate antiretroviral therapy (ART) at or shortly after human immunodeficiency virus (HIV) diagnosis, yet little is known about how people living with HIV (PLWH) experience this treatment strategy, including racial/ethnic minorities, cisgender/transgender women, and those with housing instability.

Methods. To assess the acceptability of immediate ART offer among urban PLWH, understand how this approach affects the lived experience of HIV diagnosis, and explore reasons for declining immediate ART, we conducted a cross-sectional qualitative study using semi-structured interviews with individuals who had been offered immediate ART after HIV diagnosis at a safety-net HIV clinic in San Francisco and a federally qualified health center in Chicago. Interviews were analyzed using thematic analysis.

Results. Among 40 participants with age range 19–52 years, 27% of whom were cisgender/transgender women or gender-queer, 85% racial/ethnic minority, and 45% homeless/unstably housed, we identified 3 major themes: (1) Individuals experienced immediate ART encounters as supportive; (2) individuals viewed immediate ART as sensible; and (3) immediate ART offered emotional relief by offsetting fears of death and providing agency over one's health. Reasons for declining immediate ART ranged from simply needing a few more days to complex interactions of logistical and psychosocial barriers.

Conclusions. Immediate ART was highly acceptable to urban persons with newly diagnosed HIV infection. Immediate ART was viewed as a natural next step after HIV diagnosis and provided a sense of control over one's health, mitigating anxiety over a decline in physical health. As such, immediate ART somewhat eased but in no way obviated the psychosocial challenges of HIV diagnosis.

Keywords. early ART; HIV testing; linkage to care; immediate ART; RAPID ART; retention in care.

The individual- and population-level benefits of early antiretroviral therapy (ART) initiation for people living with human immunodeficiency virus (PLWH) have become increasingly clear. Early ART results in improved immune functioning and decreased mortality [1–3]. Strong evidence supports the finding that sustained viral suppression does not lead to sexual transmission—that is, Undetectable = Untransmittable (U = U) [4, 5]. However, the steps between human immunodeficiency virus (HIV) diagnosis and ART initiation (eg, confirmatory testing, determining insurance coverage, and

drawing staging laboratory tests) often function as an obstacle course for patients [6, 7].

Providing immediate ART as close as possible to HIV diagnosis, ideally on the same day, holds potential to reduce barriers to linkage, provide psychosocial support, improve ART uptake, and promote viral suppression. In 2013, San Francisco General Hospital's Ward 86 became the first HIV clinic in the United States to pilot this approach, called "RAPID." This model was associated with shorter time to linkage to care, ART initiation, and viral suppression [8], findings replicated in other observational cohorts in the United States (US) [9–11], as well as high rates of viral suppression out to 1 year [12, 13]. At the same time, randomized trials from resource-limited settings demonstrated care retention, viral suppression, and mortality benefits with rapid ART [14–17]. In 2017, the World Health Organization recommended be ART offered at or shortly after HIV diagnosis [18], and in December 2019, the US Department of Health and Human Services treatment guidelines followed suit [19].

Despite this evidence, penetration of immediate ART into clinical practice is not universal. A key knowledge gap is how persons with newly diagnosed HIV experience this condensing of care steps. Some HIV experts have wondered whether

Received 14 April 2021; editorial decision 8 September 2021; accepted 15 September 2021.

Correspondence: Katerina A. Christopoulos, MD, MPH, Division of HIV, Infectious Disease, and Global Medicine, Zuckerberg San Francisco General Hospital, University of California San Francisco, 995 Potrero Ave, Fourth Floor, San Francisco, CA 94110, USA (katerina.christopoulos@ucsf.edu).

Open Forum Infectious Diseases® 2021

© The Author(s) 2021. Published by Oxford University Press on behalf of Infectious Diseases Society of America. This is an Open Access article distributed under the terms of the Creative Commons Attribution-NonCommercial-NoDerivs licence (<https://creativecommons.org/licenses/by-nc-nd/4.0/>), which permits non-commercial reproduction and distribution of the work, in any medium, provided the original work is not altered or transformed in any way, and that the work is properly cited. For commercial re-use, please contact journals.permissions@oup.com <https://doi.org/10.1093/ofid/ofab469>

immediate ART facilitates patient empowerment or whether forgoing models of ART initiation based on “readiness” [20, 21] does patients a disservice [22]. Others have questioned whether the benefits of immediate ART are experienced similarly across gender, sexual, and racial/ethnic identities [23]. However, literature to date is limited. One analysis of the experience of being offered same-day ART by a research study in which nearly all participants were gay men found high levels of acceptability [24]. Data are lacking from diverse populations offered immediate ART in the context of routine care. As such, the objectives of this study were to assess the acceptability of offering immediate ART in clinics that serve low-income urban populations, understand how this approach affects the lived experience of HIV diagnosis, and explore reasons for declining immediate ART.

METHODS

Study Design

This study consisted of one-time, semi-structured in-depth interviews. Our approach was informed by phenomenology, a qualitative data collection and analysis method that seeks to describe a phenomenon by focusing on how individuals experience it [25–27]. Procedurally, this approach involves studying a group of participants and using their individual experiences to develop themes to describe common or shared experiences. As our study sought to explore experiences of immediate ART, phenomenology allowed an exploration of immediate ART as patients “live it rather than as we conceptualize it” [26].

Participants and Setting

Given its pioneering role, we began the study at Ward 86, an academic safety-net HIV clinic. However, because the patient population consisted of those who had agreed to be linked

to the clinic for consideration of ART, we had difficulty recruiting individuals who declined immediate ART. To better access these patients as well as to increase the transferability of our findings, we partnered with a large federally qualified health center in Chicago. Howard Brown Health offers both HIV testing and HIV care and implemented an immediate ART program modeled on the Ward 86 approach in January 2018 (Table 1). In both sites, patients meet with a multidisciplinary team (registered nurse, medical assistant, or health educator; prescribing provider; social worker) that emphasizes a patient-centered approach to care, conducts psychosocial screenings, and provides substance use, housing, and on-site behavioral health referrals as necessary. Eligibility criteria for participation in an interview were (1) new HIV diagnosis with either an immediate ART encounter within 14 days of results notification or offered immediate ART but declined linkage to care; (2) at least 90 days out from HIV diagnosis, and; (3) English or Spanish speaking. We purposively sampled on a range of demographic and clinical characteristics (eg, age, gender identity, history of preexposure prophylaxis [PrEP] use) with an eye toward maximum variation.

Patient Consent Statement

The study team obtained written informed consent from participants. The University of California, San Francisco institutional review board approved this study.

Data Collection

Two authors (X. A. E., K. K.) conducted in-person interviews from May 2018 to January 2019 in San Francisco and on 2 trips to Chicago in April and August 2019. Given the challenge of reaching saturation on the experiences of those who declined immediate ART, X. A. E. also performed 3 Howard Brown

Table 1. Characteristics of Study Clinics

Clinic	Ward 86	Howard Brown Health
Location	Urban (San Francisco)	Urban (Chicago)
Type of clinic	Hospital-based academic safety-net HIV clinic	FQHC
Number of sites	1 site	10 sites
Number of PLWH served	~2000	~5000
HIV testing site	No ^a	Yes
Linkage to care team	Yes	Yes
Presumptive RWHP eligibility	Yes	Yes
Presumptive Medicaid eligibility	Yes	No
On-site pharmacy	No	Yes, at 5 sites
ART starter packs	Yes	No
State-level context		
Medicaid expansion	Yes	Yes
RWHP part B supplemental allocated to ADAP	Yes	No
Proportion of ADAP budget from state	0%	22%

Abbreviations: ART, antiretroviral therapy; FQHC, Federally Qualified Health Center; HIV, human immunodeficiency virus; PLWH, people living with human immunodeficiency virus; RWHP, Ryan White HIV/AIDS Program.

^aWard 86 provides regular HIV testing to patients enrolled in its preexposure prophylaxis program.

Health interviews by phone in March–April 2020. The interview guide covered prediagnosis HIV attitudes; the HIV diagnosis and linkage to care experience; the ART offer; taking ART and its impact on living with HIV; subsequent HIV care engagement, and reflections on the immediate ART encounter. The guide was based on prior guides the first author used to explore the experience of HIV diagnosis via routine testing in the emergency department [7, 28], the steps of the HIV care cascade, and the literature on immediate ART initiation (see [Supplementary Table 1](#) for core questions).

After obtaining consent, audio-recorded one-on-one interviews lasting 60–90 minutes took place in private rooms either in research space near the clinic (San Francisco), in the clinic itself (a North Side and a South Side location in Chicago), or over the phone. Participants completed a brief sociodemographic survey and descriptive clinical variables were abstracted from the medical record. Participants received a \$50 cash reimbursement. Interviewers wrote detailed field notes that provided a synopsis of the content of the interview and noted contextual factors not captured on the audio recording. The interviewers piloted the guide with 2–3 patients, revised it for flow and yield, and revised it again before the Chicago interviews based on analysis to date. Interviews were professionally transcribed and 2 Spanish transcripts were translated into English.

Data Analysis

We employed a systematic method of thematic analysis, in which a theme describes an aspect of the structure of the lived experience. We followed a 6-stage process of immersion, understanding, abstraction, synthesis and theme development, illustration of phenomena, and integration/critique [29]. Three analysts (K. A. C., K. A. K., X. A. E.) read the data as they were transcribed along with the corresponding field note and held regular debriefing meetings (*immersion*). Interview guide topics and impressions of the data generated from independent reading and team discussion were used to develop a codebook. The codebook consisted of a priori as well as inductive codes. Two coders (X. A. E. and K. A. K.) independently coded the first 6 transcripts to ensure consistency in application of codes (*understanding*); differences were resolved through discussion at team meetings, after which a primary coder (X. A. E.) coded the remainder of the data in Dedoose, version 8.0.35 (Sociocultural Research Consultants) with secondary review by the second coder (K. A. K.). Toward the end of data collection in San Francisco, the 3 analysts read aloud coded excerpts related to HIV attitudes, HIV diagnosis and linkage, and ART for a subset of participants, grouping those with less common demographic profiles, for example, women, heterosexual men, and anyone who delayed ART (*abstraction*). Code summaries across the full dataset identified preliminary themes, which were presented at the 2020 International AIDS Conference [30].

A fourth analyst (C. C.) then tabled the interviews across codes, and 3 team members (K. A. K., K. A. C., C. C.) discussed each case as a whole vis a vis the emerging themes (*illustration of phenomena*). We also carefully examined “negative” cases to build credibility in our interpretations. The experiences of subgroups of interest—that is, those who delayed same-day start, women, young adults ≤ 25 years, and those with a history of PrEP use—were also reviewed. Themes and subthemes were considered in light of literature on ART initiation and presented to providers and staff involved in immediate ART programs at both sites for feedback (*integration/critique*). Additional details of data collection and analysis are reported using the Consolidated Criteria for Reporting Qualitative Health Research ([Supplementary Materials](#)) [31].

RESULTS

Study Population

The 40 participants (20 at each site) had a median age of 27 (range, 19–52) years; 27% were cisgender/transgender women or gender-queer, 35% Black, 38% Latinx, and 25% heterosexual-identified. Levels of psychosocial vulnerability at the time of HIV diagnosis were high ([Table 2](#)). An immediate ART encounter occurred on the day of results notification for 45%, of whom all but 2 participants initiated ART the same day. For the remaining 55% who had an immediate ART visit 1–14 days after results notification, all but 5 participants initiated same-day ART at that encounter. For the sample overall, 90% initiated ART within 7 days; there was only one case of significant delay (~2 months). Median time since HIV diagnosis at the interview was 342 days, and all but 2 patients had achieved viral suppression.

The Immediate ART Experience

We identified 3 high-level themes and 2 subthemes as outlined below.

The Support of the Immediate ART Encounter Is About More Than Just ART

Nearly all participants described feeling supported by providers and that this support extended beyond HIV diagnosis to address other important needs (eg, substance use, mental health, and housing).

They actually took the time to get to know all aspects of my life and they were like, “Is there anything else like we could help you with? We have all these resources. If you’re looking for housing, if you’re looking for, you know, ways to get services and all that, we have all that.” (26, Latino gay man, San Francisco)

Indeed, the time and energy put into these encounters conveyed a sense of importance to participants and created a key context for the ART offer—that ART was a priority.

Table 2. Characteristics of Individuals Offered Immediate Antiretroviral Therapy (N = 40)

Characteristic	No. (%)
Time diagnosed with HIV at interview, d, median (IQR)	342 (215–583)
Age, y, median (minimum, maximum)	27 (19–52)
Gender	
Cisgender male	29 (73)
Cisgender female	7 (17)
Transgender female	3 (7)
Gender-queer	1 (3)
Race/ethnicity	
White	6 (15)
Black	14 (35)
Latinx	15 (38)
Mixed race/other	5 (12)
Heterosexual	10 (25)
History of HIV PrEP	7 (17)
Acute HIV	7 (17)
CD4 count at diagnosis, cells/ μ L, median (IQR)	477 (331–691)
Viral suppression ever ^a	38 (95)
Housing status at diagnosis	
Own/rent	22 (55)
Unstably housed	14 (35)
Experiencing homelessness	4 (10)
Psychiatric diagnosis ^b	20 (50)
History of incarceration	9 (23)
Regular methamphetamine or other injection drug use	7 (17)
Time to immediate ART visit	
Day of results notification	18 (45)
Within 7 d of results notification	36 (90)
Time to from results notification to immediate ART visit, d, median (IQR)	2 (0–4)
Timing of ART initiation	
Same day as immediate ART visit	33 (83)
Within 7 days of immediate ART visit	37 (93)
Time from results notification to ART initiation, d, median (IQR)	3 (0–8)

Data are presented as No. (%) unless otherwise indicated. Age, gender, race/ethnicity, sexual orientation, housing status, psychiatric diagnosis, incarceration history, and any methamphetamine use/other injection drug use obtained via participant self-report; all other variables were obtained from medical record review.

Abbreviations: ART, antiretroviral therapy; HIV, human immunodeficiency virus; IQR, interquartile range; PrEP, preexposure prophylaxis.

^aAny viral suppression between date of HIV diagnosis and date of interview.

^bIncludes depression, anxiety, bipolar disorder, psychosis, personality disorder.

That sense of urgency told me, okay, this needs to be handled now. (39, multiracial gay man, San Francisco)

At the same time, participants were very clear that they did not experience pressure to start ART, despite manifesting a range of responses to the HIV diagnosis (eg, resignation, devastation, or emotional compartmentalization).

He basically told me that it was my choice, but they can get me on treatment immediately, today. (26, Black gay man, Chicago)

Only one participant expressed dissatisfaction with the offer of immediate treatment. This participant, who was seeking

testing so he could take his relationship with a female partner to a more serious level, reported being in shock at his diagnosis. He stated that what felt like an emphasis on moving forward cut off his processing of the moment, though he could acknowledge why that might be helpful.

To hear that people are being normal and people are just living regular lives and you'll be fine and you'll be able to live a full life. You know? It's not like it was before. And it's kind of like you're putting lipstick on a pig... I know what it sounds like when they want to dismiss the emotional and focus on the recovery. But I can maybe understand that. (39, Black bisexual man, Chicago)

Unlike others in our dataset, this participant felt like he was hearing a “script” that didn’t resonate with his emotional state, which had more to do with anticipated rejection by his partner than his own health. Yet when the interviewer asked what could have been done differently, he responded, “Probably nothing. You know what I mean? If we’re being honest, probably nothing would have helped.” This patient started ART 1 week later and his case is discussed in more detail below.

The Choice to Start ART Is Not a Choice

Participants described immediate ART as a logical next step after HIV diagnosis.

It was almost logical to the point where it didn't even really seem like a decision. It was more just the obvious course of action. (21, white bisexual woman, San Francisco)

Although immediate ART was presented to participants as a choice, most did not view it as such.

It wasn't a decision to make. It was almost a given. In my mind it was a positive diagnosis. HIV, antiviral meds, they go hand in hand. There wasn't no separating them. (21, multiracial, gender-queer, Chicago)

When the interviewer asked participants to consider the idea of starting ART after HIV care had been established, noting that it had previously been the practice for many years, participants were baffled. As one patient (19, Black gay man, Chicago) stated, “If I’m a-take it either way, why start later if I can start today?” And upon hearing that one of the reasons for our research was that some HIV professionals had expressed concerns about patient readiness for immediate ART at the time of diagnosis as well as patients feeling coerced to start ART, participants were incredulous. “It’s disrespectful. It’s really saying, ‘We don’t know if you can handle your own health results or your treatment’” (46, white pansexual man, San Francisco). Another participant simply stated about

immediate ART, “I see it as a human right” (27, Latino gay man, San Francisco).

Immediate ART Offers Emotional Relief by Offsetting Fears of Death and Providing Agency Over One’s Health

Participants said immediate ART was grounding during a time of intense emotional turmoil because it could prevent deleterious health consequences.

After he told me that I was positive, it felt like I wanted to just throw up my guts or my head was going to explode. It just felt like I was on the floor. I knew I was there, but it had felt like I had broken into pieces and I was under the table. Then he started explaining that it was not a death sentence and that this was the medication and you can start today. After I took it, I just felt like I was slowly picking up little pieces of me off the floor. Like “Okay, I didn’t pick all of them up. This is going to take some time, but I know I’m going to be able to do it.” (30, Black heterosexual woman, Chicago)

Indeed, several participants described it as a “relief” to start ART.

Subtheme 1: Agency Over One’s Health. One subtheme was that participants viewed immediate ART as taking charge of one’s health in a life-affirming fashion.

I could proactively do something to better myself and to help myself, as opposed to just sit there and brood over it. (37, Black heterosexual man, San Francisco)

I took control of my health. Took control of how I’m determining my future. (41, Black heterosexual woman, Chicago)

However, for most participants, this sense of agency was not synonymous with feeling empowered. Rather, immediate ART was perceived as a way to preserve well-being.

I felt like if I didn’t take the pill right then and there ... I couldn’t do anything at all. I couldn’t go to work. I couldn’t do what I did on a regular basis. So I felt like if I took the pill, I would be okay. (21, Black heterosexual woman, San Francisco)

Subtheme 2: An Undetectable Viral Load Means Taking Care of One’s Health. A key aspect of the immediate ART encounter was hearing providers introduce a trajectory with a clear end goal: achieving an undetectable viral load. As such, another subtheme was that taking action to achieve an undetectable viral load was equated with taking care of one’s health, which was comforting.

I walked out of there with a treatment plan vs me going home, freaking out, continuing to worry about what my

health would be, what that means. I think that’s what really gave me the courage to go home and tell my family. (26, Black gay man, Chicago)

While immediate ART facilitated disclosure for this participant, very few attributed the ability to disclose one’s status to the immediate ART experience. And although the concept of U = U appeared in the rationale for ART start, participants did not generally acknowledge it as a driver of uptake. Rather, they were highly motivated to preserve their individual health and saw U = U as an ancillary but important benefit; as this participant said, “It gives me peace of mind knowing I’m not spreading this virus.” It is important to note that for most participants, anxiety about social and sexual relationships persisted.

It’s hard when you put a social impact to it, because on the other side, I feel pretty safe. I don’t feel depressed. At first I thought that it wasn’t affecting me and then I realized it kind of is in the sexual experience. I haven’t had sex with anyone since I was diagnosed. (24, Latino gay man, Chicago)

For many participants, an undetectable viral load meant maintaining an internal sense of normalcy.

To me, it’s just like living like I don’t have HIV. It’s like living normally. I’m living normally, even though I do have it. (33, Native American gay man, San Francisco)

Reasons for Declining Immediate ART

For those who declined immediate ART, experiences varied. It is important to note that several participants delayed *linkage to care* because they questioned the accuracy of the positive test result. Repeat testing was necessary to help them to accept the diagnosis and establish HIV care but, once linked, these individuals embraced the idea of immediate ART.

Several participants reported being receptive to immediate ART in that they were willing to accept a prescription or a starter pack, but held off on starting ART to work through initial hesitations. Only one participant described delaying because of fear of side effects (in her case, nightmares). Another participant took the first pill, but then paused, as he was unemployed and concerned about co-pays. Yet he described ART as a “light” in a dark period, and said that the immediate ART encounter was crucial in laying the groundwork for his subsequent treatment.

If I didn’t take the medication today, when was I going to get it? I know if I went home and didn’t have anything, I was not going to come back. I felt like a parent in the moment. Like I was parenting myself. You know, parents do what they feel is best for their kids, especially when it comes to their health. I may not have wanted medication, but I knew that taking the medication was going to help me out. (19, Black gay man, Chicago)

Likewise, the one participant who significantly delayed ART (~2 months) also experienced the immediate ART encounter in a positive way. His diagnosis story was unusual in that he was tested during a hospitalization but did not receive the result until the public health department notified him several months later and navigated him to care. About his linkage to care experience, he had “nothing but good things to say—really it was incredible” but he “had all these excuses” about starting ART. He cited barriers that were logistical (the pharmacy gave him one of 2 medications), structural (homelessness,) and clinical (prioritizing treatment of multiple sexually transmitted diseases). But he also acknowledged that he did not start immediately because it was his “last opportunity to not have to be tied down to medication on a daily basis.” Eventually, he was “ready to get healthier,” and like others, described starting ART as a “relief.”

The experience of grappling with a new identity as a PLWH who must take medication every day was at the crux of the experience of the negative case described earlier.

I'm part of this community now. And they're hounding me (laughs). You know? It's kind of like “Hey, come on over here.” It's whether you like it or not you got it. So come take care of it. Even though you can never take care of it. (39, Black bisexual man, Chicago)

When his female partner did not reject him as he expected, he was able to think more clearly about how he could live with HIV. Despite his negative feelings about the tone of the ART offer, he began ART the next week. The support of a loved one is also what enabled another participant who delayed ART to start:

My roommate gave me a hug and said, “It's okay. You just have to take a pill.” (52, white gay man, Chicago)

DISCUSSION

Immediate ART was highly acceptable to a diverse sample of urban persons with newly diagnosed HIV in 2 US clinics, concordant with prior findings from an acute HIV research network that offered same-day ART [24]. Immediate ART was viewed as a natural step after HIV diagnosis and gave individuals a sense of control over their health, helping to mitigate anxiety around a potential decline in physical health. However, it is important to note that immediate ART did not erase the pain and suffering that typically accompany an HIV diagnosis, particularly related to social and sexual relationships.

Participants emphasized that they did not feel forced to initiate ART. They described simple and compelling messaging from providers that with treatment HIV was not a death sentence and that ART could enable them to lead normal lives. While some participants understood before their own diagnosis that HIV was a manageable chronic illness, hearing from providers that modern-day ART could prevent illness and death

was a powerful message. Despite a range of reactions to HIV diagnosis, this message quickly translated into opting for immediate start. In addition, by outlining next steps and the goal of an undetectable viral load, the immediate ART encounter helped build a mental model that enabled participants to start down a clearly marked path without hesitation. It is noteworthy that only one participant used the language of being “ready” to start ART [21, 32]; most participants could not fathom a rationale for postponing the offer of immediate ART.

While immediate ART facilitated movement through the HIV care cascade [33] in an unconflicted fashion for most individuals in our dataset, there were some who delayed ART initiation. Some were receptive to the idea of immediate ART but just needed a little more time. Interestingly, one of the oft-cited barriers to ART initiation, fear of side effects and/or toxicities, [34] caused only one participant to delay initiation, and in general people did not voice concern about side effects in their recollection of starting ART. However, other known barriers to ART initiation figured prominently in several cases of delay, namely, not wanting to take a daily pill and struggling to integrate a new identity as a PLWH [35, 36]. Nevertheless, nearly all participants who delayed starting ART viewed the immediate ART encounter as a positive experience. Given the well-documented importance of a supportive linkage to care experience in progression through the HIV care cascade, [7, 35], this finding speaks to the downstream beneficial effects of the immediate ART encounter: it may ultimately facilitate ART uptake even if initiation is delayed. Importantly, no participant reported harmful effects of the immediate ART encounter. The individuals with more complicated delay stories were of older age, concordant with research showing that older adults may have a more difficult time with HIV diagnosis and ART initiation [36], perhaps because of memories of more toxic, less efficacious ART or a greater awareness of HIV as a stigmatized condition. Otherwise we noted no differences with regard to accepting immediate ART across gender identity, sexual orientation, and history of PrEP use.

We propose 4 patient-centered recommendations, all of which entail the recognition that barriers to and facilitators of ART initiation will be weighted differently for different people. First, psychosocial barriers to ART initiation may be obscured or exacerbated by logistical or structural barriers, which can appear more prominent. Careful attention to an individual's psychosocial state in the weeks and months after diagnosis remains as necessary as ever. Second, programs must attend to the potential roles of internalized and anticipated HIV stigma, which not surprisingly are formidable drivers of decreased receptivity to immediate ART. In a third and related point, tailoring of the immediate ART approach may be necessary for subpopulations that may not align neatly with demographic subgroups. For example, those with no personal experience with PLWH or those

who fear rejection by loved ones but need their support to start ART may require additional counseling and support. Finally, sensitivity to an individual's unique circumstances means that not every person may initiate immediate ART.

Limitations of our study were that we were unable to recruit those who declined rapid linkage to care or refused ART altogether. We also interviewed at sites in large metropolitan areas that strive to provide culturally competent care, especially to LGBTQ (lesbian, gay, bisexual, transgender, queer) patients; perspectives from other types of clinical settings or in different geographic areas may be different, especially locations with different structural (eg, Medicaid expansion, presumptive Ryan White HIV/AIDS Program eligibility) and social (eg, rural neighborhood, transportation, poverty) determinants of health outcomes. Additional research, particularly in the southern US, is of crucial importance. Nevertheless, given the rigor of our data collection and analysis, we believe that our findings would be transferable to similar urban contexts. We interviewed most participants approximately 1 year after HIV diagnosis; reflections on the immediate ART experience after longer-term follow-up will be necessary. In addition, it is possible that perspectives on the immediate ART experience would be different had interviews occurred closer to the time of diagnosis. Finally, our data highlight that psychosocial factors (eg, stigma, sexual and social relationships) are important and complex elements in the immediate ART experience and merit a deeper exploration that is beyond the scope of this analysis.

In summary, our study found high levels of acceptability around the practice of immediate ART initiation, which somewhat eased but in no way obviated the profound psychosocial challenges of HIV diagnosis.

Supplementary Data

Supplementary materials are available at *Open Forum Infectious Diseases* online. Consisting of data provided by the authors to benefit the reader, the posted materials are not copyedited and are the sole responsibility of the authors, so questions or comments should be addressed to the corresponding author.

Notes

Author contributions. K. A. C., O. B., and K. A. K. contributed substantially to the design of the work. X. A. E., L. V., M. G., J. S., S. C., M. G., and K. A. K. contributed to data acquisition. K. A. C., X. A. E., C. C., and K. A. K. analyzed the data. K. A. C. drafted the manuscript. All authors revised the manuscript for important intellectual content and approved the final version.

Acknowledgments. The authors thank Lizzy Lynch, Sandra Torres, and Clarissa Ospina-Norvell of the Ward 86 RAPID team for assistance with patient recruitment.

Disclaimer. The funder had no role in the design, conduct, or reporting of the study.

Financial support. This study was supported by an investigator-initiated research grant from Gilead Sciences.

Potential conflicts of interest. K. A. C. and K. A. K. have served as medical advisory board members to Gilead Sciences. All other authors report no potential conflicts of interest.

All authors have submitted the ICMJE Form for Disclosure of Potential Conflicts of Interest. Conflicts that the editors consider relevant to the content of the manuscript have been disclosed.

References

- Lundgren JD, Babiker AG, Gordin F, et al; INSIGHT START Study Group. Initiation of antiretroviral therapy in early asymptomatic HIV infection. *N Engl J Med* **2015**; 373:795–807.
- Danel C, Moh R, Gabillard D, et al; TEMPRANO ANRS 12136 Study Group. A trial of early antiretrovirals and isoniazid preventive therapy in Africa. *N Engl J Med* **2015**; 373:808–22.
- Kelley CF, Kitchen CM, Hunt PW, et al. Incomplete peripheral CD4+ cell count restoration in HIV-infected patients receiving long-term antiretroviral treatment. *Clin Infect Dis* **2009**; 48:787–94.
- LeMessurier J, Traversy G, Varsaneux O, et al. Risk of sexual transmission of human immunodeficiency virus with antiretroviral therapy, suppressed viral load and condom use: a systematic review. *CMAJ* **2018**; 190:E1350–60.
- Rodger AJ, Cambiano V, Bruun T, et al; PARTNER Study Group. Risk of HIV transmission through condomless sex in serodifferent gay couples with the HIV-positive partner taking suppressive antiretroviral therapy (PARTNER): final results of a multicentre, prospective, observational study. *Lancet* **2019**; 393:2428–38.
- Christopoulos KA, Havlir DV. Overcoming the human immunodeficiency virus obstacle course. *JAMA Intern Med* **2013**; 173:1344–5.
- Christopoulos KA, Massey AD, Lopez AM, et al. “Taking a half day at a time:” patient perspectives and the HIV engagement in care continuum. *AIDS Patient Care STDS* **2013**; 27:223–30.
- Pilcher CD, Ospina-Norvell C, Dasgupta A, et al. The effect of same-day observed initiation of antiretroviral therapy on HIV viral load and treatment outcomes in a US public health setting. *J Acquir Immune Defic Syndr* **2017**; 74:44–51.
- Colasanti J, Sumitani J, Mehta CC, et al. Implementation of a rapid entry program decreases time to viral suppression among vulnerable persons living with HIV in the southern United States. *Open Forum Infect Dis* **2018**; 5:ofy104.
- Halperin J, Butler I, Conner K, et al. Linkage and antiretroviral therapy within 72 hours at a federally qualified health center in New Orleans. *AIDS Patient Care STDS* **2018**; 32:39–41.
- Rodriguez AE, Wawrzyniak AJ, Tookes HE, et al. Implementation of an immediate HIV treatment initiation program in a public/academic medical center in the U.S. South: the Miami test and treat rapid response program. *AIDS Behav* **2019**; 23:287–95.
- Coffey S, Bacchetti P, Sachdev D, et al. RAPID antiretroviral therapy: high virologic suppression rates with immediate antiretroviral therapy initiation in a vulnerable urban clinic population. *AIDS* **2019**; 33:825–32.
- Bacon O, Chin J, Cohen SE, et al. Decreased time from human immunodeficiency virus diagnosis to care, antiretroviral therapy initiation, and virologic suppression during the citywide RAPID initiative in San Francisco. *Clin Infect Dis* **2020**; 73:e122–8.
- Amaniyre G, Semitala FC, Namusobya J, et al. Effects of a multicomponent intervention to streamline initiation of antiretroviral therapy in Africa: a stepped-wedge cluster-randomised trial. *Lancet HIV* **2016**; 3:e539–48.
- Rosen S, Maskew M, Fox MP, et al. Initiating antiretroviral therapy for HIV at a patient's first clinic visit: the RapIT randomized controlled trial. *PLoS Med* **2016**; 13:e1002015.
- Koenig SP, Dorvil N, Dévieux JG, et al. Same-day HIV testing with initiation of antiretroviral therapy versus standard care for persons living with HIV: a randomized unblinded trial. *PLoS Med* **2017**; 14:e1002357.
- Labhardt ND, Ringera I, Lejone TI, et al. Effect of offering same-day ART vs usual health facility referral during home-based HIV testing on linkage to care and viral suppression among adults with HIV in Lesotho: the CASCADE Randomized Clinical Trial. *JAMA* **2018**; 319:1103–12.
- World Health Organization. Guidelines for Managing Advanced HIV Disease and Rapid Initiation of Antiretroviral Therapy, July 2017. Geneva, Switzerland: WHO; **2017**.
- Panel on Antiretroviral Guidelines for Adults and Adolescents, Department of Health and Human Services. Guidelines for the use of antiretroviral agents in adults and adolescents with HIV. <https://clinicalinfo.hiv.gov/sites/default/files/guidelines/documents/AdultandAdolescentGL.pdf>. Accessed 4 October 2021.
- Gebrekristos HT, Mlisana KP, Karim QA. Patients' readiness to start highly active antiretroviral treatment for HIV. *BMJ* **2005**; 331:772–5.
- Grimes RM, Grimes DE. Readiness: the state of the science (or the lack thereof). *Curr HIV/AIDS Rep* **2010**; 7:245–52.
- Boyd MA, Boffito M, Castagna A, Estrada V. Rapid initiation of antiretroviral therapy at HIV diagnosis: definition, process, knowledge gaps. *HIV Med* **2019**; 20(Suppl 1):3–11.

23. Mgbako O, Sobieszczyk ME, Olender S, et al. Immediate antiretroviral therapy: the need for a health equity approach. *Int J Environ Res Public Health*. **2020**; 17:7345.
24. Amico KR, Miller J, Schairer C, et al. I wanted it as soon as possible: a qualitative exploration of reactions to access to same-day ART start among participants in San Diego's ART-NET project. *AIDS Care* **2020**; 32:1191–7.
25. Van Manen M. *Researching Lived Experience*. Albany, NY: State University of New York Press; **1990**.
26. Rodriguez A, Smith J. Phenomenology as a healthcare research method. *Evid Based Nurs* **2018**; 21:96–8.
27. Neubauer BE, Witkop CT, Varpio L. How phenomenology can help us learn from the experiences of others. *Perspect Med Educ* **2019**; 8:90–7.
28. Christopoulos KA, Massey AD, Lopez AM, et al. Patient perspectives on the experience of being newly diagnosed with HIV in the emergency department/urgent care clinic of a public hospital. *PLoS One* **2013**; 8:e74199.
29. Ajjawi R, Higgs J. Using hermeneutic phenomenology to investigate how experienced practitioners learn to communicate clinical reasoning. *Qual Rep* **2007**; 12:612–38.
30. Christopoulos KA, Erguera XA, VanderZanden L, et al. Why start later if I can start today?" Patient perspectives on the experiences of RAPID same-day linkage and antiretroviral therapy after HIV diagnosis [poster PEB 0809]. In: 23rd International AIDS Conference (AIDS 2020), San Francisco CA, 6–10 July 2020.
31. Tong A, Sainsbury P, Craig J. Consolidated criteria for reporting qualitative research (COREQ): a 32-item checklist for interviews and focus groups. *Int J Qual Health Care* **2007**; 19:349–57.
32. Christopoulos KA, Olender S, Lopez AM, et al. Retained in HIV care but not on antiretroviral treatment: a qualitative patient-provider dyadic study. *PLoS Med* **2015**; 12:e1001863.
33. Gardner EM, McLees MP, Steiner JF, et al. The spectrum of engagement in HIV care and its relevance to test-and-treat strategies for prevention of HIV infection. *Clin Infect Dis* **2011**; 52:793–800.
34. Cooper V, Buick D, Horne R, et al. Perceptions of HAART among gay men who declined a treatment offer: preliminary results from an interview-based study. *AIDS Care* **2002**; 14:319–28.
35. Bruton J, Rai T, Day S, Ward H. Patient perspectives on the HIV continuum of care in London: a qualitative study of people diagnosed between 1986 and 2014. *BMJ Open* **2018**; 8:e020208.
36. Flowers P, Davis MM, Larkin M, et al. Understanding the impact of HIV diagnosis amongst gay men in Scotland: an interpretative phenomenological analysis. *Psychol Health* **2011**; 26:1378–91.