

Assessing Uptake of Directly Observed Therapy (mDOT) in a Revised Care Coordination Program

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- Improved adherence and treatment outcomes among people with HIV (PWH) who use Directly Observed Therapy (DOT) for HIV medication
 - Proven increase in adherence and a decrease in viral load following DOT among youth and individuals with a history of substance use
- Scarcity of data on characteristics of PWH who use DOT in large-scale programs
 - Modified DOT (mDOT) used in New York City RWPA programs

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Arnsten JH, Litwin AH, Berg KM; Effect of Directly Observed Therapy for Highly Active Antiretroviral Therapy on Virologic, Immunologic, and Adherence Outcomes: a Meta-analysis and Systematic Review. *J Acquir Immune Defic Syndr.* 2011 Jan 1;56(1):e33-4. doi: 10.1097/QAI.0b013e3181fcbcb4.

RWPA Care Coordination Program Models

- Original model (2009-2018)

- Case finding
- Service plans
- Case conferences
- Health education
- mDOT (face to face)
- Enrollment in intensive track required for mDOT eligibility

- Revised model (2018-Present)

- Case finding
- Service plans
- Case conferences
- Health education
- mDOT (face to face and videoconferencing)
- Enrollment in intensive track not required for mDOT eligibility
- Initiation of immediate anti-retroviral therapy (iART)
- Self-management assessments

- Analyzed cross-sectional data on 4,284 PWH served in the original program from August 2016 to February 2018 and 1,906 served in the revised program from August 2018 to February 2020
- Used univariate and multi-variable logistic regression to assess the association between program type and mDOT

Clients Using mDOT Services in the Original and Revised Models

Characteristics	% Using DOT under Original Model 407 (9%)	% Using DOT under Revised Model 333 (17%)
Black	9%	17%
Latinx	10%	19%
Women	11%	20%
Men	9%	16%
Transgender	8%	18%
0-29 years old	8%	19%
30-39 years old	8%	15%
40-49 years old	9%	18%
50-59 years old	10%	18%
60+ years old	11%	19%
MSM transmission category	6%	14%
IDU transmission category	11%	20%
MSM-IDU transmission category	8%	16%
Heterosexual transmission category	10%	21%
Perinatal transmission category	19%	31%
Substance use at enrollment	16%	23%
Unstable housing at enrollment	13%	16%

Crude and Adjusted Odds Ratios for Overall mDOT Use

- Clients in the revised program had twice the odds of receiving mDOT compared to clients in the original model

Program	Model 1-Crude OR (95% CI)	Model 1-Crude p-value	Model 2-Adjusted* aOR (95 % CI)	Model 2-Adjusted p-value
Original Program	Ref	--	Ref	--
Revised Program	2.02 (1.73-2.36)	<.0001	1.91 (1.62-2.25)	<.0001

*Adjusted for age, sex, race, transmission category, housing status, and substance use status

Takeaways

- Increases in mDOT use were high among Black clients, Latinx clients, and transgender clients, priority populations who experience barriers to achieving viral suppression
- Findings underscore the importance of maintaining flexibility and a client-centered approach in the provision of mDOT services, to facilitate uptake among those who may benefit from this form of adherence support

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