Changes in HIV Providers' Management of Depression after Integration of Treatment Support into Clinical Care

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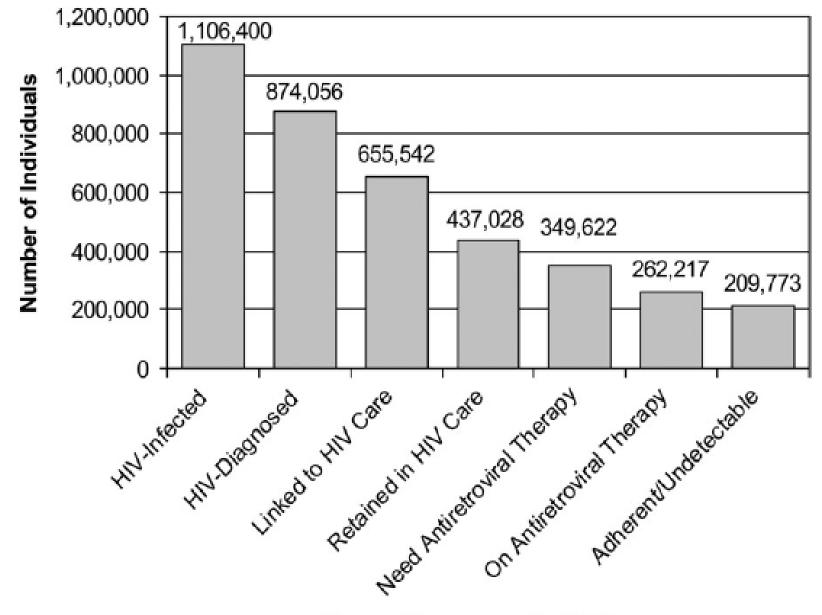
Thank you to...

- Abstract lead author Kiana Bess
- SLAM DUNC Study Team:
 - Duke: Julie Adams; Jordan Akerley; Kiana Bess; Jacob Kirkorowics; Kathryn Schley; Nathan Thielman; Quinn Williams; Abigail Zeveloff
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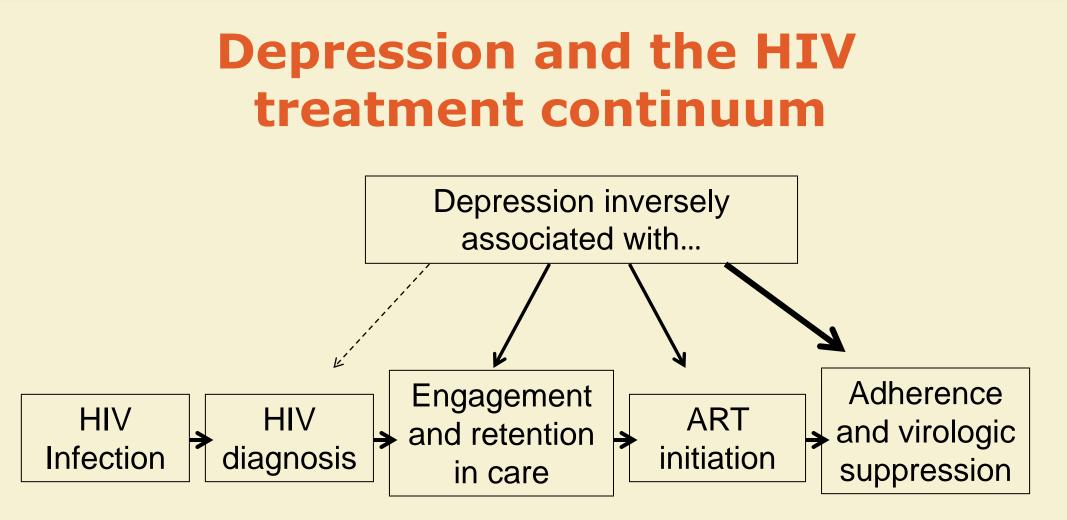


The "HIV Treatment Cascade"



Stage of Engagment in HIV Care

Gardner et al. CID 2011;52:793-800.



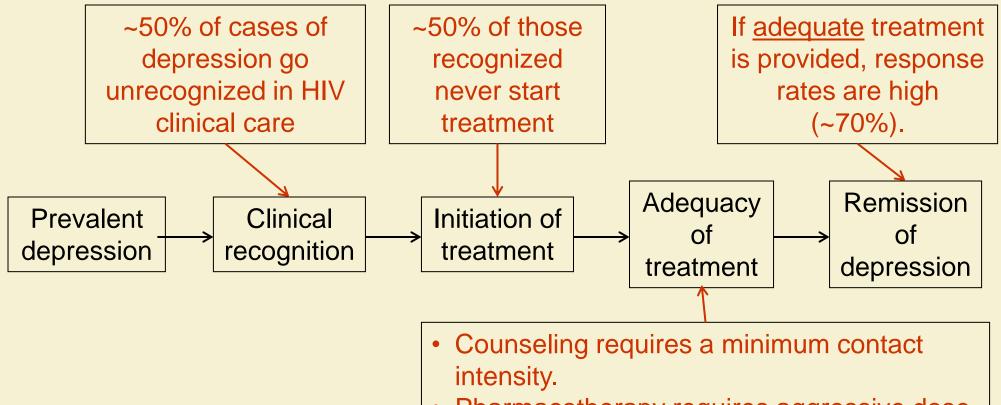
Some evidence that depression <u>treatment</u> can <u>improve</u> ARV adherence and HIV clinical outcomes.

Pence et al. AIDS 2012;26(5):656-8





The depression treatment continuum



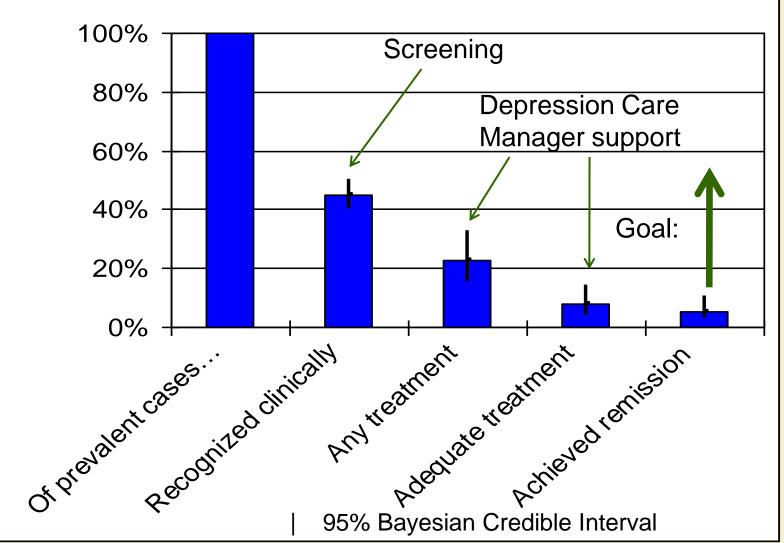
- Pharmacotherapy requires aggressive dose adjustment based on response.
- Perhaps one-third of those being treated are receiving adequate treatment.

Pence et al. AIDS 2012;26(5):656-8





The "Depression Treatment Cascade" for HIV Patients



Pence et al. AIDS 2012;26(5):656-8





SLAM DUNC Study

- Strategies to Link Antidepressant and Antiretroviral Management at Duke, UAB, and UNC
- NIMH-funded R01, 2009-2014
- Randomized controlled trial to test the effect of depression treatment on ARV adherence
- Sites: HIV clinics at 3 academic medical centers

Pence et al. Contemporary Clinical Trials 2012; 33(4):828-38



SLAM DUNC Study

- Population: HIV clinic attendees with current major depression
- Intervention: Measurement-Based Care depression treatment
 - Depression Care Managers provide decision support to HIV providers for antidepressant prescription and management
- Comparison: Usual care
- Outcome: ARV adherence

Pence et al. Contemporary Clinical Trials 2012; 33(4):828-38





Aim of this presentation

Does Depression Care Manager's provision of decision support for <u>intervention-arm study</u> <u>participants</u> change HIV providers' depression management practices for <u>all</u> <u>patients</u>?





Methods

- Semi-structured in-person interviews with HIV providers
 - Before study launch
 - One year after study launch
- Topics
 - Perception of prevalence of depression and depression treatment in caseload
 - Confidence treating depression
 - Specific depression treatment practices





Methods

- 9 "best-practices" principles of depression treatment defined from national guidelines
 - American Psychiatric Association* (for all patients)
 - NY State Dept of Health** (for HIV patients)
- Providers' self-reported practices compared to bestpractices principles and assigned a numeric score reflecting quality relative to each principle
- Summary best-practices score created using factor analysis from item-specific scores

* American Psychiatric Association. *Practice Guideline for the Treatment of Patients With Major Depressive Disorder, Third Ed.* Washington, DC: American Psychiatric Association Press; 2010. ** New York State Department of Health. *Depression and mania in patients with HIV/AIDS*. New York: New York State Department of Health, 2010.





Best-Practices Principles

Routine screening with standardized measure Screening Assess need for treatment based on severity Base treatment choice on history and severity Initiation Adjust antidepressant starting dose for ARV interaction Follow-up new antidepressant prescription in 4 weeks Assess effectiveness with standardized symptom severity 6. measure Increase dose based on symptom severity and drug Management tolerability

- 8. Utilize full FDA dosing range
- 9. Switch antidepressants based on formal assessment of response, tolerability, and adequacy of trial





Participants (n=41* with baseline and 1-year follow-up interviews)

Baseline Characteristic	N (%) or Median (IQR)
Clinical training	
MD-Attending	21 (51%)
MD-Fellow	13 (32%)
Nurse Practitioner	3 (7%)
Physician Assistant	4 (10%)
Clinical effort	30% (20-50%)
% clinical effort on HIV care	80% (60-95%)
Years providing HIV care	9 (3-20)
<5 years providing HIV care	15 (37%)
Very or extremely confident	
Prescribing an initial antidepressant	25 (63%)
Switching or augmenting antidepressants	5 (13%)
Depression treatment is part of role	29 (71%)

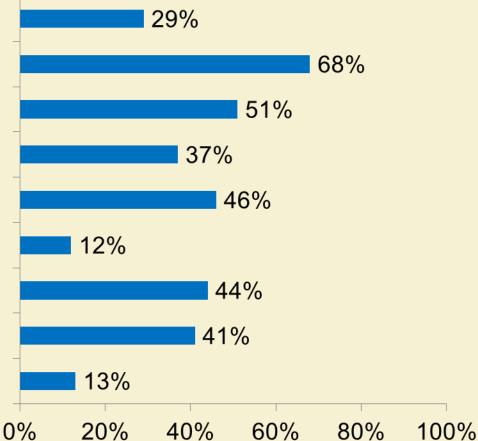
* All providers were interviewed at baseline (n=48). At one year, 3 MD-fellows had left; 41 of 45 remaining providers completed the one-year interview.





Baseline indicators of depression treatment quality

Assesses all patients for depression Bases need for treatment on severity Bases type of tx on history / presentation Adjusts AD dose for ART interactions Follow-up within 4 weeks Assesses effectiveness systematically Increases dose based on symptoms Doses AD up to full FDA range Adequate trial before switching AD



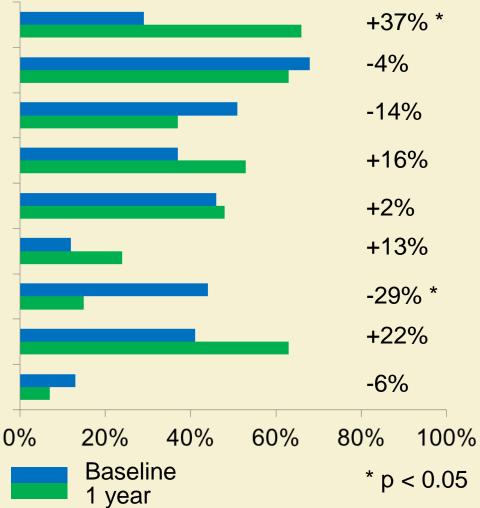
Bess et al. IAPAC 2011 abstract # 70029.





Change in self-reported depression treatment practices after 1 year

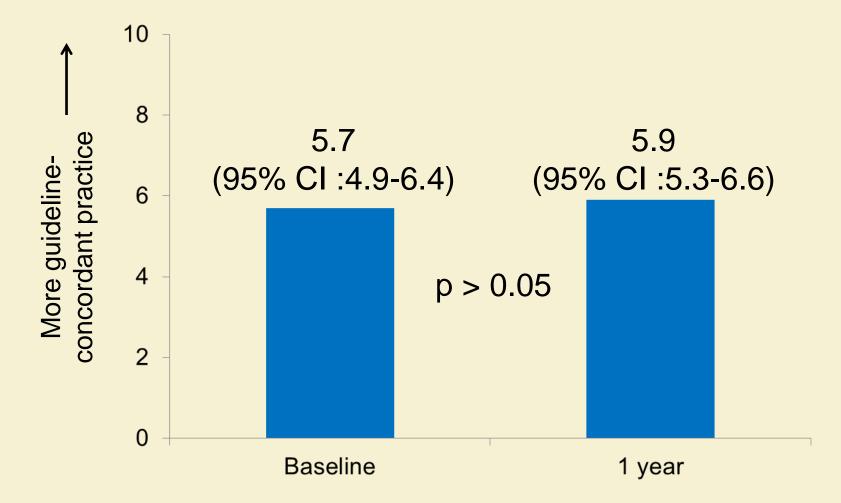
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Depression treatment best-practices summary score







"How has your depression treatment practice changed in the past year?"

- Open-ended question
- Most common response: Provision of routine screening has raised awareness of depression
 - and likelihood of discussing depression during clinical encounter
- Next most common response: Practice has not changed
- Rare responses: Concrete practice changes
 - Follow up sooner after starting AD (n=1)
 - More likely to increase AD dose (n=3)
 - More likely to change AD (n=1)





"How has your depression treatment practice changed in the past year?"

- "[I am] more comfortable addressing [depression] and providing treatment with the care manager."
- "I didn't feel it was my role at all ... as a physician assistant [and] in Infectious Diseases ... I didn't feel that the physicians really thought it was much within their scope either ... but now there is more support, I have learned more about the drugs, [and] I'm feeling more able."
- "I haven't changed my practice, other than that I listen to you guys."





Interpretation

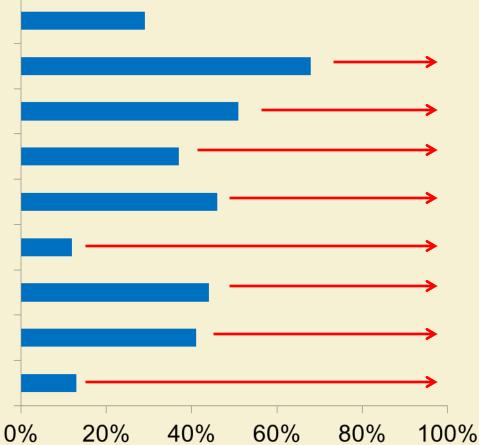
- Providers have responded very positively to the provision of routine depression screening in clinic
- After 1 year of Depression Care Manager decision support for <u>intervention patients</u>, providers report relatively little change in practices related to the initiation or management of antidepressant treatment in <u>all patients</u> (without DCM support)
- In contrast, adherence to guidelines in <u>intervention</u> <u>patients</u> with direct DCM support is very high





Role of Depression Care Manager

Assesses all patients for depression Bases need for treatment on severity Bases type of tx on history / presentation Adjusts AD dose for ART interactions Follow-up within 4 weeks Assesses effectiveness systematically Increases dose based on symptoms Doses AD up to full FDA range Adequate trial before switching AD







Interpretation

- Presence of study has raised awareness but has not changed ongoing depression management practices
- Supports need for measurement-based depression treatment decision support for all patients
- No evidence of contamination (decision support around best-practices depression treatment appears not to have generalized beyond intervention patients





Limitations

- Self-reported practices
- Providers may have "learned the right answer" after 1 year without having changed practice
- Caution should be used in interpreting numeric scores derived from qualitative data
- Sites are academic medical centers with researchoriented clinicians – practices may differ elsewhere





Strengths

- Response rate: >90% of HIV providers at 2 large academic medical centers
- Detailed qualitative assessment of provider practices
- Very little published data on depression treatment practices of HIV providers





Is this a fair expectation of HIV providers?

- High burden and negative consequences of depression
- Rise of "medical home" model of care
- Availability of evidence-based decision support models (Measurement-Based Care)

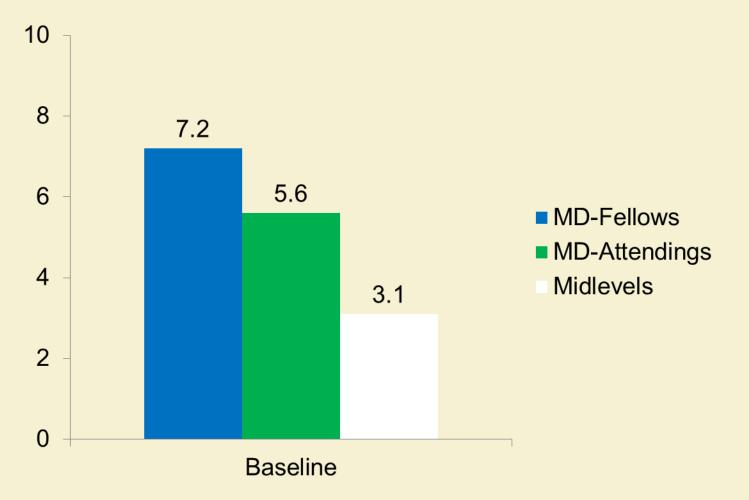








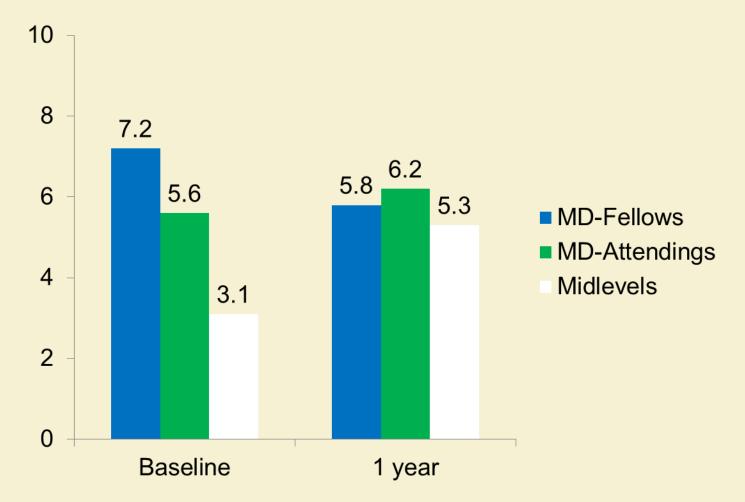
Depression treatment summary score, by clinical training







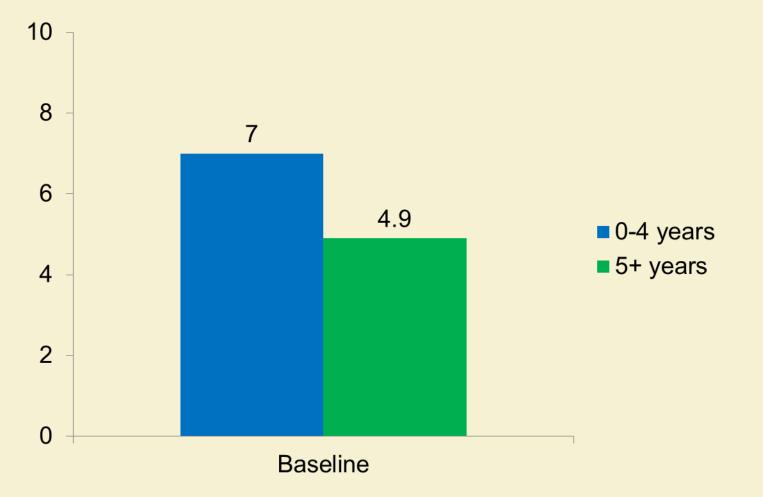
Depression treatment summary score, by clinical training







Depression treatment summary score, by years of clinical experience







Depression treatment summary score, by years of clinical experience

