

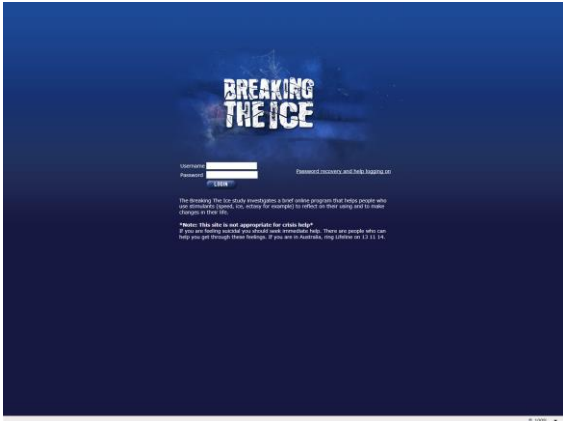
Engagement and Retention of Illicit Drug Users in eHealth Interventions

Dr Robert Tait

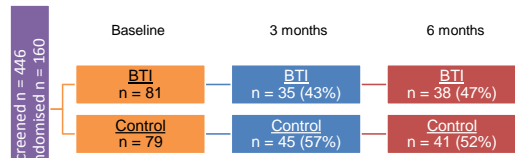
National Drug Research Institute
robert.tait@curtin.edu.au

Outline

- 'Breaking the ice'
- Rapid review – attrition & engagement
- Conclusions



Study design



Design: RCT Intervention versus wait list control
Target: users of amphetamine type stimulants (ATS)
Program: three modules, fully automated and self-guided

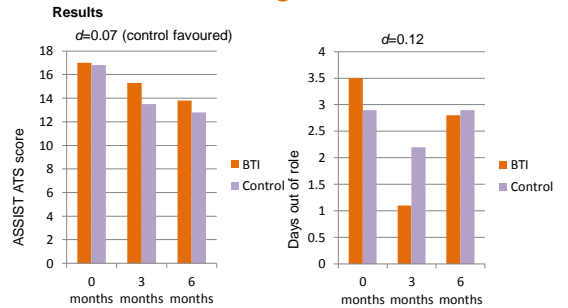
Study cohort

Baseline	Control (79)	Intervention (81)	
Sex male	n (%)	57 (72) ^a	64 (79)
Age	mean (SD)	22.5 (7.1)	22.2 (5.5)
SDS	mean (SD) [threshold > 5]	3.8 (3.3) [42%]	3.7 (3.5) [30%]
ATS Fq last 3 months	1-2 n (%)	27 (34)	20 (25)
	monthly n (%)	18 (23)	33 (41)
	weekly n (%)	23 (29)	21 (26)
	daily / almost daily n (%)	11 (14)	7 (9)
ASSIST ATS score	mean (SD)	16.8 (11.1)	17.0 (10.1)

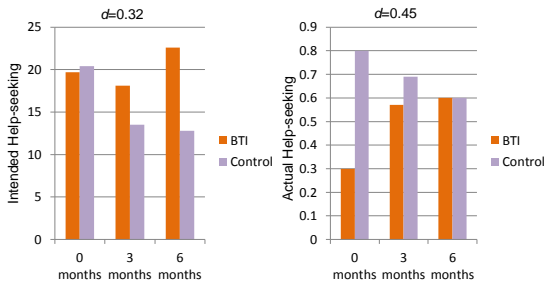
JOURNAL OF MEDICAL INTERNET RESEARCH
Original Paper
Six-Month Outcomes of a Web-Based Intervention for Users of Amphetamine-Type Stimulants: Randomized Controlled Trial

Robert J Tait¹, PhD; PhD Rebecca McKee¹; PhD Frances Kerr-Lindsay¹; PhD Heather Curran-Walker¹; PhD Sarah-Anne Rossiter¹; BAppSc Kylie Bennett¹; BSc BA Elizabeth Wilson¹; PhD Kathleen M Curran¹

Breaking the ice



Breaking the ice



Limitations

- Loss to follow-up**
 - intervention = 53%
 - Control = 48%
- Engagement**
 - < 1 module = 37%
 - 1 module = 7%
 - 2 modules = 7%
 - 3 modules = 48%
- 'Exposure'** (completing ≥ 1 module by 6 months) v **ITT**
 - Intended help-seeking RR = 3.13 v 2.16
 - Actual help-seeking RR = 1.31 v 1.17
 - Days out of role RR = 0.46 v 0.50

The Law of Attrition?

Panic disorder: 12 / 1161 (1%) completed 12 week program (Farvolden 2005)
 Depression: 97 / 19607 (0.5%) completed 5 modules (Christensen 2004)

Rapid Review

- Post Moore et al 2011 "Computer based interventions for drug use disorders: A systematic review"
- (Medline RCT search syntax) + (online or computer, or internet) + (cannabis or cocaine or amphetamines or heroin)
- Medline n = 23 & Google Scholar n = 8 (1st 100 results)
- 15 papers 13 studies for detailed review

Study	Drug	Follow-up	Retained	Engagement
Campbell 2014	Substance abuse	6 months	91%	75%
Chaple 2014	Substance abuse	-	-	83% > 1 mod.
Christensen 2014	Opioid	3 month	80%	-
Fang 2013	Substance abuse	24 months	89%	96%
King 2014	Substance abuse	3 months	44%	≈ 58%
Marsch 2014	Opioid	12 months	39%	≈ 22%
Ondersma 2014	Substance abuse	6 month	73%	100%*
Palfai 2014	Cannabis	6 months	75%	100%*
Rooke 2013	Cannabis	3 months	54%	83% > 1 mod.
Rooke 2014	Cannabis	3 months	54%	83% > 1 mod.
Schaub 2012	Cocaine	6 months	7%	≈ 22%
Sinadinovic 2012	Substance abuse	6 months	47%	-
Sinadinovic 2014	Substance abuse	12 months	32%	-
Tait 2015	Amphetamines	6 months	47%	63% > 1 mod.
Tossmann 2011	Cannabis	3 months	17%	60%

Study	Drug	Follow-up	Retained	Engagement
Campbell 2014	Substance abuse	6 months	91%/89%	75%
Chaple 2014	Substance abuse	-	-	83% > 1 mod.
Christensen 2014	Opioid	3 month	80%/64%	-
Fang 2013	Substance abuse	24 months	89%/83%	96%
King 2014	Substance abuse	3 months	44%	≈ 58%
Marsch 2014	Opioid	12 months	39%	≈ 22%
Ondersma 2014	Substance abuse	6 month	73%	100%*
Palfai 2014	Cannabis	6 months	75%	100%*
Rooke 2013	Cannabis	3 months	54%/52%	83% > 1 mod.
Rooke 2014	Cannabis	3 months	54%	83% > 1 mod.
Schaub 2012	Cocaine	6 months	7%	≈ 22%
Sinadinovic 2012	Substance abuse	6 months	47%	-
Sinadinovic 2014	Substance abuse	12 months	32%	-
Tait 2015	Amphetamines	6 months	47%	63% > 1 mod.
Tossmann 2011	Cannabis	3 months	17%	60%

Key studies

Campbell: 12 weeks f-2-f
 + 62 e-health modules (community reinforcement approach)
 + contingency management (x US\$277)
 78% of modules done at clinic

Christensen: 12 weeks buprenorphine (dose 3 days / week)
 + f-2-f + 69 e-health modules (community reinforcement approach)
 + contingency management (x US\$730)
 100% of modules done at clinic

Fang: prevention Asian American mother / adolescent daughter dyads
 9 sessions (family interaction theory), fully automated

Rooke: 6 modules (CBT/MI) fully automated: text or video, auto support emails

E-health and behaviour change

- An adjunct to clinical services ('clinician extender')
- Contingency management – real world applicability?
- Engage significant other

Engagement – Delphic exercise (Garnett 2015 JMIR)

- Ease of use
- Design
- Feedback

ndri.curtin.edu.au

NDRI
National Drug Research Institute

