



Psychedelics in the treatment of addiction

Dr. med. Michael KOSLOWSKI Psychiatry Department, Charité University Medicine Berlin Iméra Fellow 2022/23





Psychedelic-assisted psychotherapy and EPIsoDE trial in Germany

More clinical trials to come

17 trials **PSYCHEDELICS TAKE FLIGHT** Over the past decade, there has been an increase in clinical trials testing psilocybin, MDMA and LSD for use in psychiatric conditions, including depression, drug dependency and anorexia nervosa. Psilocybin MDMA LSD 🔳 = 1 trial 2010 2011 2012 2013 2014 2015 2016 2017 2018 2019 2020 2021 onature Iméra Institute for Advanced Study

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What are psychedelics?



Psilocybin

Ayahuasca/

DMT+MAOI

ÇH₃

CH₃

Mescalin

H₃C

H₂C

H₂C

LSD-25



Psilocybin occupancy of brain serotonin 2A receptors correlates with psilocin levels and subjective experience: a [11C]Cimbi-36 PET study in humans

M.K. Madsen¹, D. Burmester¹, D.S. Stenbæk¹, S. Kristiansen¹, A. Dyssegaard¹, S. Lehel², K. Linnet ³, S.S. Johansen ⁴, C. Svarer ¹, B. Ozenne ¹, D. Erritzøe ⁵, P.M. Fisher ¹ ^A, G.M. Knudsen ¹









biochemical commonality: 5HT-2A receptor agonism

P.363

Design and "Setting" of contemporary psychedelic therapy trials

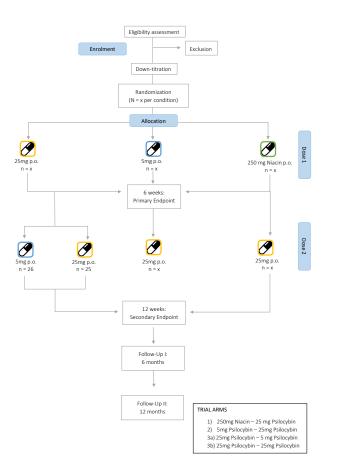




- 3 phases: preparation, dosing session, integration
- high dose: 20-30 mg psilocybin
- Single or repeated dose
- sleep mask, selected emotionally evocative music, introspection
- therapist dyad (female and male)
- priority: safety
- Eclectic, rather supportive psychotherapy with elements from CBT, psychodynamic and mindfulness therapiy

EPIsoDE trial design









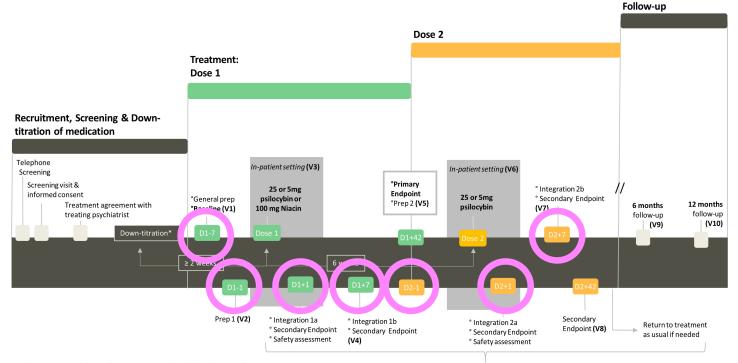




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7 x 120 min. psychotherapy sessions

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*Down-titration of the antidepressant medication will be done according to an individualized down-titration schedule, under close supervision of the treating psychiatrist or out-patient clinic of the trial centre

Ongoing support from study team if required

Metaanalysis psychedelics and depression



Psychedelic therapy for depressive symptoms: A systematic review and meta-analysis Kwonmok Ko^{&,*}, Emma I. Kopra⁺, Anthony J. Cleare^{+K,ker}, James J. Rucker^{+K,ker}

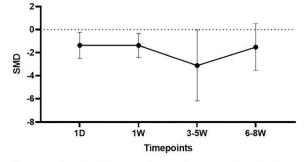


Fig. 3. Overall standardised mean differences between experimental and control at each time point of depressive score.

Standardised Mean Difference between control and experimental at Day 1

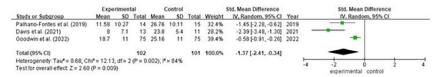
| | Exp | eriment | tal | C | ontrol | | | Std. Mean Difference | | Std. Mean Difference |
|----------------------------------|-----------|---------|---------|---------|--------|-------|--------|----------------------|------|----------------------|
| Study or Subgroup | Mean | SD | Total | Mean | \$0 | Total | Weight | IV, Random, 95% CI | Year | IV, Random, 95% CI |
| Grob et al. (2011) | 11.37 | 3.6 | 6 | 13.15 | 3.6 | 6 | 23.0% | -0.46 [-1.61, 0.70] | 2011 | |
| Ross et al. (2016) | 4.21 | 1.91 | 15 | 12.07 | 1.84 | 14 | 21.2% | -4.07 [-5.41, -2.73] | 2016 | |
| Palhano-Fontes et al. (2019) | 12.65 | 10.27 | 14 | 21.49 | 10.9 | 15 | 26.5% | -0.81 [-1.57, -0.05] | 2019 | |
| 300dwin et al. (2022) | 16.84 | 11 | 75 | 23.41 | 11 | 75 | 29.3% | -0.59 [-0.92, -0.27] | 2022 | * |
| Total (95% CI) | | | 110 | | | 110 | 100.0% | -1.36 [-2.50, -0.22] | | • |
| Heterogeneity: Tau* = 1.13; Ch | | | (P < 0. | 0001);1 | = 88ª | \$6 | | | | -4 -2 0 2 4 |
| Fest for overall effect Z = 2.33 | (P = 0.02 | 0 | | | | | | | | experimental control |

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Standardised Mean Difference between control and experimental at week 1



Standardised Mean Difference between control and experimental at weeks 3-5

| | | | | | | | | | | | 1 | | |
|---------------------------|-------|--------|--------|----------|------|------------|--------|----------------------|------|----------|----------------|---------|---|
| Study or Subgroup | Mean | 50 | Total | Mean | 50 | Total | Weight | IV, Random, 95% CI | | IV, Rano | <u> 20m, 9</u> | 1579 CI | |
| Griffiths et al. (2016) | 6.65 | 1.04 | 26 | 14.8 | 1.45 | 25 | 32.3% | -6.38 [-7.78, -4.98] | 2016 | | 1 | | |
| Davis et al. (2021) | 8.5 | 5.7 | 13 | 23.5 | 6 | 11 | 33.2% | -2.48 [-3.59, -1.37] | 2021 | | | | |
| Goodwin et al. (2022) | 19.9 | 11 | 75 | 27.3 | 11 | 75 | 34.5% | -0.67 [-1.00, -0.34] | 2022 | | • | | |
| Total (95% CI) | | | 114 | | | 111 | 100.0% | -3.12 [-6.19, -0.04] | | | - | | |
| Heterogeneity: Tau* = 7.0 | 9 Ch? | = 67.0 | 7. df= | 2 (P < 0 | 0000 | 1); i? = 1 | 97% | | | | + | + | + |

Standardised Mean Difference between control and experimental at weeks 6-8

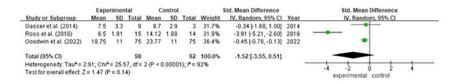


Fig. 2. Standardised mean differences between experimental and control at day 1, week 1, weeks 3-5, and weeks 6-8.

Safety and adverse events

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Review

Adverse events in clinical treatments with serotonergic psychedelics and MDMA: A mixed-methods systematic review

Joost J Breeksema^{1,2,3}, Bouwe W Kuin¹, Jeanine Kamphuis¹, Wim van den Brink⁴, Eric Vermetten², and Robert A Schoevers¹



1-18 © The Author(s) 2022 © OS Article reuse guidelines: sagepub.com/journals-permissions DOI: 10.1177/02698811221116926 journals.sagepub.com/home/jop ©SAGE

- N=598 (44 articles)
- "...treatments seemed to be overall well tolerated. Nausea, headaches, and anxiety were commonly reported acute AEs across diagnoses and compounds. Late AEs included headaches (psilocybin)..."
- "Qualitative studies suggested that psychologically challenging experiences may also be therapeutically beneficial."



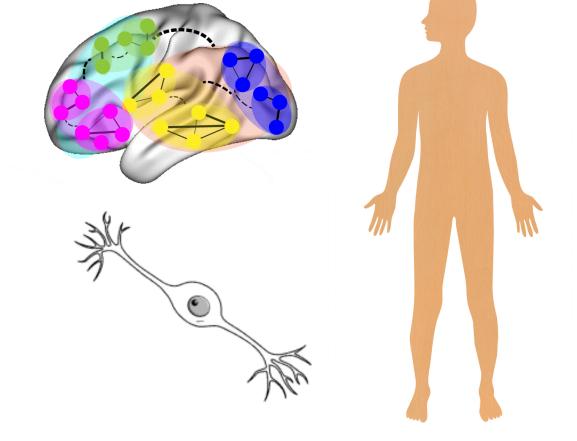
Mechanisms of action

Mechanisms of action: a complex interplay



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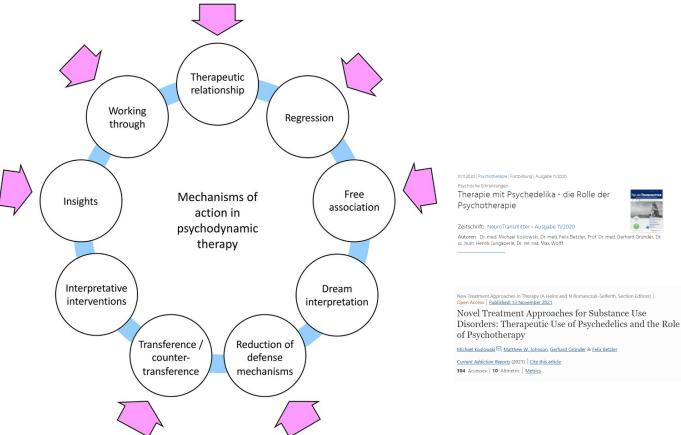


Psychodynamic approach





- Enhancement of psychoanalysis with several low/moderate dose psychedelic sessions
- > 700 publications 1953-1968
- > 6000 patients treated
- 2/3 of the patients improved
- no controlled trials



Cognitive behavioural model

<form><form><form>

• reinforced exposure to internal events: painful emotions,memories,cognitions which are usually avoided

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- "shaping" of acute experience, favoring acceptance and reducing avoidance (of negative emotions)
- revision of deeply rooted, rigid, dysfunctional cognitions about the self (worthlessness etc.)

Plans for further trials in Charité Berlin

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- Clinical trial with alcohol use disorder planned
- Participation in industry trials with shortlasting psychedelics: DMT, 5-MeO-DMT
- Negotiations with German authorities about cost-effectiveness and modalities for approval and reimbursement
- Survey studies on aspects of psychedelic therapy, harm reduction and recreational use
- Collaborations with research groups in France

Psychedelic research and therapy in France - where do we stand?

- Symposia at psychiatry conferences
- Reviews and conceptual publications
- Animal studies on mechanisms of action (M. Nassila)
- Multiple clinical trials planned: services A.
 Benyamina, L. Mallet, R. Gaillard, Pitié-Salpetriere; Nimes, Montpellier etc.
- 2022: Section "Medecine psychedelique" AFPBN
- Societé Psychedelique francaise (SPF)
- First clinical trial starting in Sep 2023 (Paris)
- Workshop March 2023 at Iméra Marseille
 - Exchange on study protocols
 - French-German collaborations
 - therapist training in French language





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Thérapies psychédéliques : la France et le spectre du champignon maléfique

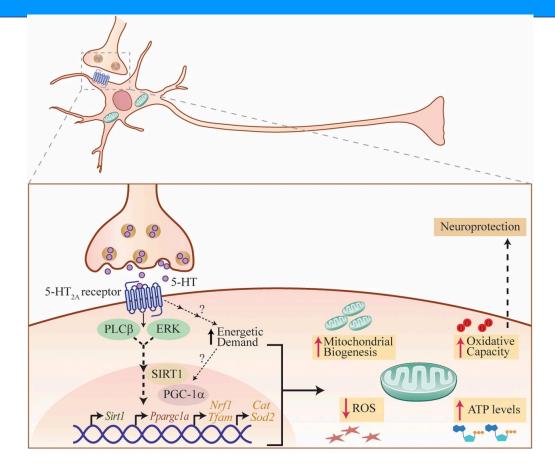
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« Les thérapeutes ne pourront pas donner la main aux patients, comme ils le font aux Etats-Unis, les flics débarqueraient aussitôt ! », Luc Mallet, chercheur en neurosciences

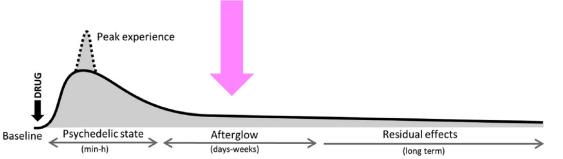
Neuron level: Stimulation of the serotonin 2A receptor





Fanibunda, et al. 2019

Neuron level: enhanced neuroplasticity





Calvin Ly, Alexandra C, Greb Kassandra M. Ori-McKenney

Article

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Ly et al. demonstrate that psyched compounds such as LSD, DMT, and DO increase dendritic arbor complexity promote dendritic spine growth, and stimulate synapse formation. These cellular effects are similar to those produced by the fast-acting ntidepressant ketamine and highlight the potential of psychedelics for treating depression and related disorders

- subacute effects for 2 to 4 weeks after the psychedelic experience, with increased openness, well-being and cognitive flexibility
- Neuroplasticity: induction of dendritic spine growth, synapse formation
- "psychoplastic window" during which psychotherapeutic interventions are more effective
- Other possible biological mechanisms: intracellular cascades (BDNF, mTOR), epigenetic changes, antioxidant and immunological effects etc.

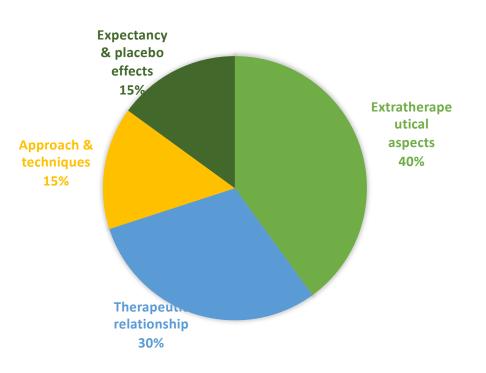
Enhanced common factors of psychotherapy

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| Review | 🖗 Thieme | to updates | transcultural |
|---|--------------------------|---|--|
| | | Review Article | psychiatry |
| Psychedelics and Psychotherapy | | Psychedelics, placebo effects, and set and | Transcultural Psychiatry 0(8) 1–13 (2) The Asther(s) 2821 Article rease addelines |
| Authors Sandeep Nayak, Matthew W. Johnson | | setting: Insights from common factors theory of psychotherapy | sugepub.com/journals.permissions DOI: 10.1177/134344132993844 journals.sugepub.com/home/tps @SAGE |
| | | Natalie Gukasyan® and Sandeep M. Nayak | |
| Transcultural Psychiatry Volume 59, Issue 5, October 2022, Pages 571-578 | (\$)SAGE | | |
| © The Author(s) 2022, Article Reuse Guidelines https://doi.org/10.1177/13634615221131465 | journals | | |
| Editorial | | | |
| Culture, context, and ethics in | L | | |
| hallucinogens: Psychedelics a | s active super-placebos? | | |
| David Dupuis ¹ and Samuel Veissière ² | | | |

Psychedelics seem to enhance several **common factors** of effectiveness in psychotherapy :

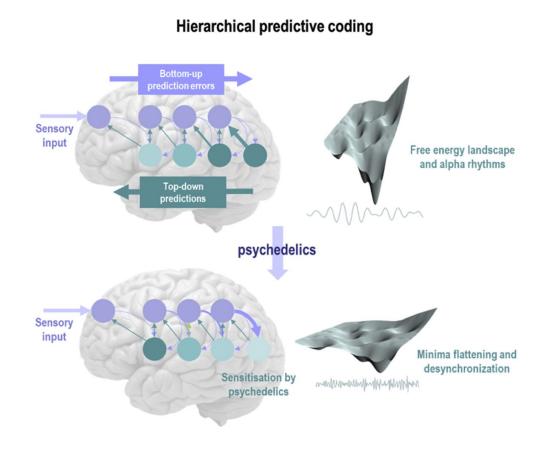
- Patient-therapist Relationship
- working alliance
- Expectancy ("super-placebos" ?)
- Problem actualisation
- Motivation for change



Asay, T. P., & Lambert, M. J. (1999)

Network: disruption of predictive processing



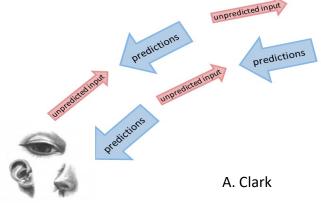


- REBUS model (Carhart-Harris 2019) based on the predictive processing account (Clark 2013)
- Psychedelics reduce activity in cortical networks by agonism at 5HT-2A receptors
- decreased precision weighting in higher-level beliefs, about objects, time & space
- increase in "raw" information: perceptions, emotions, avoided/rejected content
- "ego dissolution", disruption of narrative selfmodel
- increased global connectivity (e.g. synesthesia)

Network level: disruption of higher level predictions







- The hollow mask illusion: Based on a deeply rooted, unconscious belief, overriding contradictory perception: *"faces are always looking at me"*
- **Predective processing (PP)** model: We are constantly constructing and predicting a simplified, generative model of the world (C. Letheby)
- "perception is a controlled hallucination" (A. Seth)
- Our self is a "virtual avatar" (T. Metzinger)
- Modern version of **Kant's** epistemology: the real world can never be percieved as such
- **REBUS** (Relaxed Beliefs Under pSychedelics) account applies the PP model to the psychedelic brain state



Psychedelics in the treatment of substance use disorders

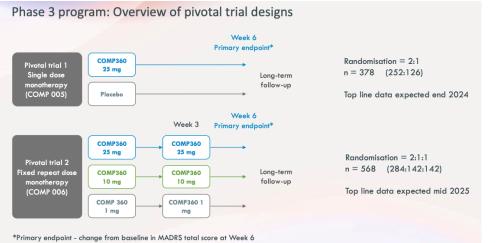


Ongoing and planned trials in Germany

Psilocybin and TRD: COMPASS TRD Phase III

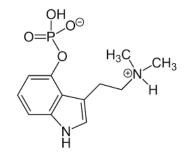


COMPASS development programmes



The participant population (TRD definition and core inclusion/exclusion criteria) remains unchanged compared to Phase 2b

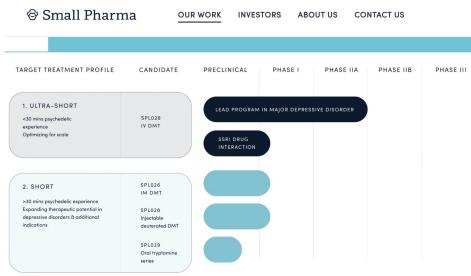
- Psilocybin single dose 25 mg
- Repeates dose 25 mg and 10 mg
- primary outcome parameter: MADRS (week 6)
- Start in 2023
- Multicenter study, with centers in Berlin, Paris and other cities



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N,N-DMT and MDD: Small Pharma Phase IIb



- Intravenous N,N-DMT (SPL026)
- Major depression (MDD)
- Psychological support
- Planned start in 2023
- Multiple sites (global), centers in Germany

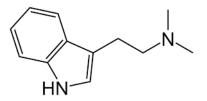
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• Phase IIa press release 01/2023: promising results



- The highlights from the study are:
 - **Primary endpoint** met with a statistically significant -7.4 point difference in MADRS between SPL026 (21.5mg) and placebo at two-weeks following a single dose with supportive therapy (p=0.02)
 - Fast antidepressant effect with a statistically significant difference in MADRS of -10.8 versus placebo (p=0.002)
 - Durable antidepressant effect with a 57% remission rate at 12-weeks following single dose of SPL026 with supportive therapy
 - Favourable safety and tolerability profile demonstrated with no drug-related serious adverse events reported. All adverse
 - events related to treatment were considered mild or moderate
 - No apparent differences identified in antidepressant effect between a one and two dose regimen of SPL026

5-MeO-DMT and TRD: BeckleyPsytech Phase IIb

| ♥Beckley♥Psytech | About F | Research | News | Impact | Team | Careers | | Contact |
|--|-----------------------------------|---------------------------|--------------|----------|---------------|----------|---------|-------------|
| | Psy | rchedelics | Interver | ntions v | Clinical tria | ls | | |
| Compounds | Indications | Discovery | Pre-clinical | Phase 1 | Phase 2a | Phase 2b | Phase 3 | |
| 5-MeO-DMT BPL-003 | Treatment Resistant Depression | H2 22 Read-or | ut | | H2 23 Read-c | but | | |
| | Alcohol Use Disorder | | | | H1 23 Read-o | ut | | |
| Psilocin ELE-101 | Depression | Phase 1 initiati H2 22 | on | ····· | | | | |
| New Chemical Entity Discovery | Undisclosed | | | | | | | |
| TRD - (Treatment Resist AUD - (Alcohol Use Disc | | I | I | I | | Ongoing | Startin | l g Soon |

• Intranasal synthetic 5-MeO-DMT (BPL-003)

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- Treatment-resistant depression (TRD)
- Randomized, blinded dose-finding study
- 3 doses: high, moderate, sub-perceptual
- primary outcome parameter: MADRS
- Psychological support
- Planned start in 2023
- 40 investigator sites in 7 different countries, centers in Germany



The Role of Psychotherapy in psychedelic therapy & the EPIsoDE trial

Which psychotherapy is applied in current trials?

Systematized Review of Psychotherapeutic Components of Psilocybin-Assisted Psychotherapy

David M. Horton, M.S., Blaise Morrison, Ph.D., Judy Schmidt, Ed.D.

TABLE 3. Structure and psychotherapy content of psilocybin sessions

| | | Pretre | atment | | Treatn | nent | | Posttrea | tment |
|--|-----------------------|--------------------|--|-----------------------|--------------------|----------------------------|----------|--------------------|-----------------------------------|
| Study | Sessions ^b | Hours ^c | Therapy content | Sessions ^d | Hours ^e | Therapy content | Sessions | Hours ⁹ | Therapy content |
| Anderson et al., 2020 (9), group 1 | 5 | 7.5 | Modified SEGT | 1 | 8 | Nondirective supportive | 5 | 8 | Modified SEG |
| Anderson et al., 2020 (9), group 2 | 5 | 7.5 | Modified SEGT | 1 | 8 | Nondirective supportive | 7 | 11 | Modified SEG |
| Bogenschutz et al., 2015 (10) | 4 | | MET | 2 | 8 | Nondirective supportive | 6 | | MET |
| Carhart-Harris et al., 2016 (3) | 1 | 4 | | 2 | 6 | Nondirective supportive | 6 | | Integrative |
| Davis et al., 2021 (11) | 2 | 6 | Supportive therapy | 2 | 7 | Nondirective | 5 | 11 | Integrative |
| Griffiths et al., 2016 (12) | 2 | 8 | Therapeutic relationship | 2 | 8 | Nondirective supportive | 4 | 4 | Support available as needed |
| Griffiths et al., 2018 (13), group 1 | 4 | 5 | Therapeutic relationship, group sessions | 2 | 7 | Nondirective supportive | 1 | 1 | Journaling, group sessions |
| Griffiths et al., 2018 (13), groups 2 and 3 | 5 | 10 | Therapeutic relationship, group sessions | 2 | 7 | Nondirective supportive | 18 | 22 | Journaling, group sessions |
| Grob et al., 2011 (14) | 3 | | Supportive, existential | 2 | 6 | Nondirective supportive | 3 | | Integrative, existential |
| Johnson et al., 2014 (15) | 4 | 6 | CBT | 2 | 8 | Nondirective supportive | 12 | 9.5 | CBT |
| Moreno et al., 2006 (16) | 1 | | Therapeutic relationship | 4 | 8 | Nondirective supportive | | | |
| Nicholas et al., 2018 (17) | 4 | 6 | Supportive | 3 | 8 | Nondirective supportive | 4 | 6 | Integrative |
| Ross et al., 2016 (4) | 3 | 6 | Eclectic | 2 | 8 | Nondirective supportive | 3 | 6 | Eclectic |

- **Commonalities:** 3-phase model; supportive setting in substance use session, with introspection and music.
- **Basics:** non-judgmental listening, empathic support and a strong therapeutic relationship
- **Psychotherapy methods:** MET, CBT, existential psychotherapy, SEGT*, psychodynamic therapy.
- Psychotherapeutic techniques: guided imagery, openended narrative writing, supportive touch, reality orientation, empathic support, nonjudgmental listening

*Supportive-Expressive Group Therapy

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Patient statements: typical experiences

"Excursions into grief, loneliness and rage, abandonment. Once I went into the anger it went 'pouf' and evaporated. I got the lesson that you need to go into the scary basement, once you get into it, there is no scary basement to go into [anymore]."

"[I] became myself at age 7, after my [grandparent] had died. I totally was back there, so vivid, so real, I had the emotions that I would have felt at the time: fearful, why did this happen, the naivety, the shock and confusion. I was getting overly upset and my parents were saying `boys don't cry.`"

Watts et al 2017

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¹Center for Cognitive Sciences, University of Minnesota, Minneapolis, MN, United States Department of Philosophy, University of Minnesota, Minneapolis, MN, United States Minnesota Center for Philosophy of Science, University of Minnesota, Minneapolis, MN, United States

| Entropy, Free Energy, and Symbolization: Free Association at the Intersection of Psychoanalysis and Neuroscience |
|---|
| Thomas Rabeyron ^{1,2+} and Claudie Massicotte ³ |
| 1 Interpsy, Université de Lorraine, Nancy, France, ² University of Edinburgh, Edinburgh, United Kingdom, ³ Young Harris |

| • | Phenomenological similarities to dreams : Access to |
|---|--|
| | unconscious processes |

shift from rational logical thinking (psychoanalytic: ٠ secondary process, "I") to associative thinking (primary process, "It")

Tamara Fischmann^{2,3}

- confrontation with repressed fear of death (existential ٠ psychotherapy)
- intensified symbol formation ٠
- correction of early dysfunctional object relations •
- Disruption and change of implicit relational models •



ACT: a promising therapeutic framework for psychedelic therapy

"I'm never gonna make it." presence (mindfulness) Moment présent passé / futur Valeurs Valeurs Acceptation Evitement Expérientiel peu claires Rigidité Flexibilité psychologique psychologique Fusion Défusion Action Inaction Engagée "I'm depressed." "I think I'm depressed." Soi comme Soi comme contenu contexte "I'm worthless" "I observe my thoughts"

ACT = Acceptance and Commitment Therapy

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Psychedelic integration: Review

Frontiers | Frontiers in Psychology

Check for updates

OPEN ACCESS

practice

Geoff J. Bathje12*, Eric Majeski1 and Mesphina Kudowor1 Department of Counseling and Integrated Programs, Adler University, Chicago, IL, United States Sana Healing Collective, Chicago, IL, United States

Psychedelic integration: An analysis of the concept and its



FIGURE 1

Synthesized model of integration: The hexagon reflects six interconnected domains of existence, with the more personal ones toward the center. The outer ring reflects continuums on which integration activities can be placed. The goal is a balance of integration activities addressing all domains of living.

TABLE 1 Comparison of integration models with resulting synthesized model of integration.

| Model (Author) | Domains | | | | | | | | | |
|---|---|------------------------------|---------------------------------------|----------------------|-------------------------|----------------------|--|--|--|--|
| Synthesized Model of Integration | Mind/emotional/ contemplative | Bodily/somatic | Spiritual/existential/ ritual | Lifestyle/ action | Relational/ communal | Natural world | | | | |
| Visionary Plant Medicine Integration (Coder, 2017) | Inner listening, reflection, creative | Physical care, time/space | Spiritual practice, meaning making | Cultivating virtues | Turning outward | Nature and grounding | | | | |
| Holistic Model for a Balanced Life (Bourzat and Hunter, 2019) | Mind | Body | Spiritual | Sharing | Community | Nature | | | | |
| Realms of Integration (Buller and Moore, 2019) | Mental/Intellect | Mind-body, surroundings | Spiritual | Lifestyle/career | Relationships | | | | | |
| SAFETY (Westrum and Dufrechou, 2019) | Psychological (Transpersonal) | Somatic | Spiritual/existential/ritual | | Social/Communal | | | | | |
| Nature Contact (Gandy et al., 2020) | Psychological (Nature-based) | Affective | Mystical/Awe | | | Nature relatedness | | | | |
| Psychedelic Harm Reduction and Integration (Gorman et al., 2021) | Psychological (Transtheoretical) | Somatic | Spiritual/mystical | Harm reduction | | | | | | |
| Psychedelic Inclusive Model of the Psyche (Ortigo, 2021) | Psychological (Jungian, Transpersonal) | Body | Spiritual/mystical | Behavior | | | | | | |
| Psycho-Spiritual Integration Process (Cohen, 2017) | Psychological (Jungian) | Somatic | Psychospiritual | | | | | | | |
| Acceptance and Commitment Therapy (Sloshower et al., 2020) | Psychological (ACT) | | | Behavior change | | | | | | |
| Psychological Flexibility Model (Watts and Luoma, 2020) | Psychological (ACT) | | | Behavior change | | | | | | |

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Integration groups in the EPIsoDE trial





Adaa.org

- Problem: Only 4 x 120 min. integration sessions part of the protocol
- Many patients still in ongoing psychotherapeutic process at the end of the trial

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- Therapists often lack knowledge about psychedelic therapy effects
- sometimes therapy cannot start right away after the trial
- **Consequence:** creation of post-study integration groups
- monthly meetings, 6-12 participants, guided by 2 therapists/psychiatrists
- ZI Mannheim: 6 x 90 min. online + 1 x presence
- Charité Berlin: 2 groups (online, presence), each 6 x 90 min.
- Similar concept, partly manualized
- Centered around the psychedelic experience, and what it means to the person, the course of depression, relationships

Yale Depression therapy manual based on ACT



https://psyarxiv.com/u6v9y/

YALE MANUAL FOR

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PSILOCYBIN-ASSISTED THERAPY

OF DEPRESSION



<u>Authors</u> Jeffrey Guss, MD Robert Krause, DNP APRN-BC Jordan Sloshower, MD, MSc

Therapy Manual of the EPIsoDE trial



Therapist Manual for Psilocybin-Assisted Therapy of Treatment-Resistant Major Depression

Developed for the EPIsoDE Trial Efficacy and Safety of Psilocybin in Treatment-Resistant Major Depression

1

Stand 25.03.2021

Autoren (alphabetische Reihenfolge): Scharif Bahri Dr. med. Felix Betzler Dipl.-Psych. Manuela Brand Dr. rer. nat. Ricarda Evens Prof. Dr. med. Gerhard Gründer Dr. med. Andrea Jungaberle Dr. med. Michael Koslowski Dr. med. Michael Koslowski Dr. med. Tomislav Majic M. Sc. Lea Mertens Prof. Dr. med. Andreas Ströhle Dr. rer. nat. Max Wolff • Therapy manual developed on the basis of existing manuals (NYU, Usona, MAPS, etc.)

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- 3-phase model:
 - **1. Preparation:** information, therapeutic relationship, detailed history of depression, biography; breathing exercise; formation of an "intention" for the session
 - 2. Dosing: support, check-ins, safety, debriefing
 - **3. Integration:** relationship between psychedelic experience and depression/current conflicts/dysfunctional interactions, depressive beliefs, application of insights to daily life, etc.
- Behavioral and psychodynamic elements
- Standardization
- Integration group 6 months after trial (online & presence)

Therapy Manual: Preparatory sessions

Iméra Institute for Advanced Study Aix+Marseille Université

7.2 General Prep

The General Prep session should have an approximate duration of 100 minutes. Whenever required, therapists may suggest a short break. The following should be covered in this session (see General Prep Checklist; Appendix A):

- Introduce yourselves and give an overview of preparatory sessions (~10 min)
- Discuss topics relevant to the patient's depression (~30-45 min)
- Discuss previous treatments (~10 min)
- Discuss the patient's expectations and hopes regarding treatment with psilocybin (~10-25 min)
- Discuss agreements necessary for study participation (~5 min)
- Hand over patient information on dosing sessions (~10 min)
- Clarify organizational issues (~5 min)
- Close the session (~5 min)

Documents needed for this session:

- General Prep Checklist (Appendix A)
- Print-out of Scheduling Form (Appendix C)
- Session Summary Form (Appendix D)
- Handout Patient Information on Dosing Sessions (Appendix G)
- Biographical Questionnaire (prepared by the <u>patient</u>; Appendix X)

Sample statement:

« Our first preparatory session today is about us getting to know you further and you getting to know both of us even better as well. Above all, we want to learn more about your life and your depression. At the end we will discuss some organizational things. In the second preparatory session next week, we will go over typical experiences that are common in dosing sessions and discuss possible ways to deal with challenging or difficult experiences. We will also go over the schedule for the day of the substance session and answer any questions you may have. If you are bringing a support person next week, we would like to meet her or him at the end of the session. »

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7.3 Prep 1/Prep 2: Before the First/Second Dosing Session

The Prep 1 and Prep 2 sessions should have an approximate duration of 100 minutes. Whenever required, therapists may suggest a short break. The Prep 2 session held before the second dosing session should be very similar to the Prep 1 session held before the first dosing session. Therapists should keep in mind that the patient may have received either nicotinamide or low-dose psilocybin during their first dosing session. It is therefore important to repeat the education on possible effects of psilocybin and how to handle challenging experiences with the patient. The following should be covered in Prep 1 and Prep 2 sessions (see Prep 1 and 2 Checklist; Appendix E):

- Ask for open questions from the previous session and give an overview of the session structure (~5 min)
- Guided mindfulness exercise (see Appendix F) (~10 min)
- Discuss common experiences in dosing sessions (~10 min)
- Discuss potential for challenging experiences and how to handle them (~20 min)
- Introduce physical space, music, and eyeshades (~5 min)
- Set an intention for the dosing session (~10 min)
- Discuss dosing day structure, instructions, and recommendations (~20 min)
- Meet the support person (if applicable; ~10 min)
- Clarify organizational issues (~5 min)
- Close the session (~5 min)

Documents needed for this session:

- Print-out of Scheduling Form (Appendix C)
- Session Summary Form (Appendix D)
- Prep 1 and 2 Checklist (Appendix E)
- Instructions for Mindfulness Exercise (Appendix F)
- Handout Patient Information on Dosing Sessions (Appendix G)

Sample statements:

"Leaning into" the experience:

"A very important technique in dealing with challenging experiences is to consciously go even further into the experience.

Whenever you experience something that scares you, try to lean into it. This going into the experience makes the experience much more bearable than if you try to escape the experience somehow.

If you encounter something you are afraid of, try to be curious and open anyway. Don't run away from it, but go to it. Ask, "What are you doing here? What can I learn from you?"

If you feel like you're melting, dissolving, or exploding, don't fight it, let it happen. Melt, dissolve, explode! We will always be with you and keep you safe."

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8.4.3.2 Guidelines for Handling Psychological Distress

During preparatory sessions, therapists have discussed with the patient potential challenging experiences and techniques for handling them (Section 7.3.4). At the beginning of dosing sessions (Section 8.4.2), therapists will encourage patients to respond to overwhelming challenges by reaching out to therapists. Nevertheless, therapists should remain alert and aware for signs of agitation, anxiety, and continued psychological distress, as verbal or gestural communication on the part of the patient may be hindered due to the effects of the study medication.

Interventions for handling psychological distress can be broadly distinguished with respect to the following characteristics:

- Engagement versus disengagement from the process that is experienced as distressful
- Promoting self-efficacy versus supporting the patient

As a general rule, self-efficacy and engagement interventions should be preferred over support and disengagement interventions whenever possible (talking through before talking down). Support and disengagement interventions should be used sparingly, and only when deemed absolutely necessary due to the severity of distress experienced by the patient. The Accordingly, the list below can be read as a gradient from "earlier" (first choice) to "later" (last resort) interventions:

- Promoting self-efficacy for engagement (e.g., "You can do it"; "Would you like to try and go deeper?"; "Do you notice any changes when you pay close attention?")
- Supporting engagement (e.g., "We are with you while you go through this"; "Should I hold your hand?"; "We will go through this together")
- 3) **Promoting self-efficacy for disengagement** (e.g., "Follow your breath [...] observe the sensation of breathing in and out")
- Supporting disengagement (e.g., "I will now mute the music for a while"; "Would you like a glass of water?")

Sample statements (short, simple):

Therapeutic touch:

"If you like, I will hold your hand." "Do you want to take my hand?"

Guiding attention to the music:

"Follow the music."

"Let the music carry you."

Going back to the intention:

"Go back to your intention."

Guided breathing exercises:

"Breathe into the feeling."

"Let the breath flow ... Observe how the

breath flows in and out... Just observe."

Rescue medication:

"We have now weighed things up together and think the time has come to make things a little easier for you with a medicine. If you take this tablet, you will feel better quickly."

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9.2 Integration 1a and 2a Sessions - One Day after Dosing Sessions

9.2.1 Session Structure

The Integration 1a and 2a sessions will be held on the day following dosing <u>sessions</u>, and will take place in the dosing session room whenever possible. Whenever possible, both therapists should be present during these sessions. These sessions should have a duration between 60 and 120 minutes. Whenever required, therapists may suggest a short break. The following should be covered in the Integration 1a and 2a sessions (see Integration 1a and 2a Checklist; Appendix O):

- Give an overview of the session structure (~5 min)
- Obtain a comprehensive overview of the patient's experience (~15-35 min)
- Help the patient relate their experience to their larger personal context (e.g. biography, everyday life, relationships) (~15-35 min)
- Encourage the patient to think about how to integrate gained insights and perspective shifts into everyday life (~15-35 min)
- Clarify organizational issues (~5 min)
- Close the session (~5 min)

Documents needed for this session:

- Print-out of Scheduling Form (Appendix C)
- Session Summary Form (Appendix D)
- Integration 1a and 2a Checklist (Appendix O)

Sample statements:

Resuming the experience:

"Please describe your experience in as much detail as possible."

Challenging experiences:

"Did you experience certain feelings, thoughts or sensations as difficult or challenging during the session? Can you describe these experiences for us? What do you think about them now, as we sit here together?"

Relate to depression and life situation:

"What does your experience yesterday have to do with you as a person, with your life, or with your relationships?"

"Hat diese Erfahrung einen Einfluss darauf, wie Sie Ihre Depression sehen?"