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2 **Vegetative value: promissory horizons of therapeutic** 3 **innovation in the global circulation of ayahuasca**

4 **Emilia Sanabria**¹ 

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7 **Abstract** Ayahuasca is a herbal brew that is widespread in indigenous Upper
8 Amazon and has undergone global expansion in the last decade. As it is taken up
9 in an ever-growing range of ritual or experimental practices questions of authority,
10 authenticity, propriety or safety become acute. This case allows us to interrogate
11 contemporary processes of value-making as radically different and highly stratified
12 values encounter each other, on the brink of a possible pharmaceuticalization of aya-
13 huasca. I argue that ayahuasca is not fully captured by the value logics of capital and
14 examine the ways in which its promissory dimensions, global circulation and entry
15 into practices of biomedical evidence-making position it in an ambiguous space that
16 is nevertheless not entirely outside the logics of capital. The circuits of ayahuas-
17 ca's valorization reveal a complex coproduction of value that makes strategic use of
18 various scales, sites and situations. The article examines the promissory horizon of
19 extra-pharmacological value identified as key to understanding the efficacy of psy-
20 chedelic substances such as ayahuasca. It then attends to the extraction of value from
21 plants before closing with a reflexion on the politics of inclusion in the discussions
22 that frame ayahuasca's value globally.

23 **Keywords** Ayahuasca · Value · Brazil · Mental health · Evidence · RCT ·
24 Pharmaceuticalization

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26 This article examines the multiple, contested values of the herbal brew ayahuasca
27 as it travels out of Amazonia, and is taken up in Christian and psychospiritual
28 urban ritual formations around the world or evaluated within clinical trials. Aya-
29 huasca is a psychoactive herbal brew originating in the Upper Amazon region
30 where it is used in shamanic settings (Dobkin de Rios 1984; Labate and Cavnar
31 2014). It is generally composed of two native Amazonian plants: the *Banisteriopsis*
32 *caapi* vine and the leaves of the *Psychotria viridis* shrub. The brew has
33 many names but is known internationally under the Quechua name “ayahuasca”.
34 Ayahuasca has gained unprecedented visibility internationally as it has shown
35 astonishing promise in the treatment of depression (Palhano-Fontes et al. 2019;
36 Sanches et al. 2016) and addiction (Loizaga-Velder and Verres 2014; Thomas
37 et al. 2013; Liester and Prickett 2012; Talin and Sanabria 2017). From a bio-
38 medical perspective, ayahuasca functions as a classic psychedelic or hallucinogen
39 and its efficacy, like that of psilocybin (the active ingredient in so-called ‘magic’
40 mushrooms), LSD or MDMA is understood as deriving from a common pharmaco-
41 logical serotonergic activation of 5-HT_{2A} receptor agonism (dos Santos et al.
42 2016; Schindler et al. 2018; Inserra 2018; dos Santos, Bouso, and Hallak 2020).

43 Given that ayahuasca does not have a clear pharmaceutical market value (yet),
44 this paper deals with the promissory horizon of value it holds among the champi-
45 ons of the so-called psychedelic medicine renaissance (Inserra 2018; dos Santos
46 et al. 2020; Jiménez-Garrido et al. 2020; Sessa 2012; Szabo 2015; Carhart-Harris
47 et al. 2014), and with the value it holds among healers I have been working with
48 who use ayahuasca in ritual settings. The value I explore is still in the process of
49 being negotiated, through clinical trials or through debates over the proper use
50 of ayahuasca, its patrimonialization or the recognition of Indigenous value gen-
51 eration and adequate compensation. The trajectory of valuation I am underscor-
52 ing here overlaps with and eludes classic pharmaceutical processes of valuation
53 of the kinds analysed by anthropologists of the pharmaceutical industry (Petryna
54 et al. 2006; Peterson 2014; Dumit 2012; Sunder Rajan 2005, 2017; Gaudillière
55 and Hess 2013). In this article, I mobilize the notion of the promissory to point to
56 the way the ethical horizon of alleviating global mental health suffering is tightly
57 coupled to capitalized versions of the promissory (Martin et al. 2008; Haase et al.
58 2015), such as is made evident in venture capitalist investor psychedelic events
59 that advise on the market promises of these medicines as they are made into
60 treatments.

61 I situate ayahuasca within the complex and contested trajectories of psyche-
62 delic medicine and its emergent capitalization, while drawing on ethnographic
63 fieldwork with urban ayahuasca practitioners and ritual participants in Brazil. The
64 materials gathered in this article are part of a broader research project on aya-
65 huasca healing and evaluations of therapeutic efficacy titled “Healing Encoun-
66 ters: reinventing an indigenous medicine in the clinic and beyond”. This article
67 homes in on divergent assessments of value that come to be negotiated in the
68 spaces of encounter where a highly disparate set of actors (indigenous experts

69 and song denoiders, psychiatrists, pharmacologists, transpersonal therapists,
70 anthropologists and ethnobotanists, venture capitalists, ayahuasca Church ‘Mas-
71 ters,’ psychonauts, wellness industry developers, Silicon Valley cryptochain app
72 developers, lawyers, etc.) come together. While the article is deeply informed by
73 the research conducted in more classic ethnographic field sites (participant obser-
74 vation of healing ceremonies and practices in Amazonia and urban Latin Amer-
75 ican centres, indigenous and non-indigenous practitioner and patient life histo-
76 ries and interviews, etc.), its focus here is on the way global ayahuasca events
77 bring together stakeholders in large-scale international gatherings under a model
78 of bringing together a plurality of perspectives on ayahuasca’s value. To do this,
79 I draw on data collected during the three World Ayahuasca conferences (Ibiza
80 2014; Rio Branco 2016; Girona 2019¹), during multiple Psychedelic Conferences
81 (such as Breaking Convention in London, Beyond Psychedelics in Prague, the
82 International Conference of Psychedelic Research in Amsterdam, the Multidisci-
83 plinary Association for Psychedelic Science in Oakland), as well as during psy-
84 chedelic webinars and investor or ‘cryptodelic’ online events. I and members of
85 my team participated as speakers in many of these events, and were members
86 of the Indigenous delegation of the 3rd World Ayahuasca conference where we
87 served as translators for two Huni Kuin Indigenous collaborators. The rationale
88 for approaching such spaces as ethnographic sites in their own right (Boyer 2008;
89 Marcus 2013; Holmes and Marcus 2008; Assis and Rodrigues 2018) is that they
90 afford a unique vantage point into the disputes that are at stake around ayahuas-
91 ca’s valorization on the international stage as such events attempt to build in sym-
92 metry between ‘stakeholders’.

93 Building on the insights afforded in these interstitial spaces, I argue that aya-
94 huasca is not fully captured by the value logics of capital (Gaudillière & Sunder
95 Rajan, this volume) and examine the ways in which its promissory dimensions,
96 global circulation and entry into practices of biomedical evidence-making position
97 it in an ambiguous space. Ayahuasca—currently (and it will be interesting to see
98 how this reads in a decade)—is neither captured by the logics of capital, nor entirely
99 outside it. In this sense, ayahuasca’s value is appropriable by capital yet its current
100 value is as not-yet-capital. A central question is whether it will simply be engulfed
101 within the political economy of health configured by what Gaudillière and Sunder
102 Rajan (this issue) identify as a triple processes of capitalization, pharmaceuticaliza-
103 tion and globalization or whether advocacy for ayahuasca’s therapeutic value can
104 contribute to challenging this capitalization of health.

105 In what follows, I briefly provide some background on ayahuasca’s twentieth
106 and early twenty-first century history to set the scene before focussing three aspects
107 of ayahuasca’s contemporary valuation: firstly, the negotiation of its clinical value
108 in ways that recognize the extra-pharmacological value that has been identified as
109 key to understanding the efficacy of psychedelic substances; secondly, the stakes of

1FL01 ¹ The conference brought together some 600 indigenous leaders, ritual specialists, anthropologists, his-
1FL02 torians, psychologists, legal scholars, clinicians, artists and enthusiasts gathered in the Amazonian city of
1FL03 Rio Branco, Brazil in October 2016.

110 extracting pharmaceutical value from plants; and finally, the points of inclusion in
111 discussions that frame ayahuasca's value globally, bringing together highly diver-
112 gent world-making practices. I conclude that the circuits of ayahuasca's valoriza-
113 tion reveal a complex coproduction (Jasanoff 2004) of value that cuts across and
114 makes strategic use of various scales, sites and situations (in which the internet and
115 international conferences play key roles). Drawing on Fortun's (2001) critique of the
116 stakeholder model of consensus building derived from her analysis of the aftermath
117 of the Bhopal Disaster' management of diversity, the final section returns to the dis-
118 tinction between 'the plural' and 'the multiple' to argue that processes of valuation
119 need to enable conflicting views of the world (or of ayahuasca, as the case may be)
120 to be held and heard.

121 Value, re-made

122 Addressing the psychedelic liberty summit² in May 2020 via Zoom, Indigenous
123 activist and scholar Daiara Tukano of the Tukano Yé'pá Mahsã Nation of the Alto
124 Rio Negro (Brazilian Amazon) gave a powerful presentation on Indigenous con-
125 cerns with the globalization of ayahuasca. She explained that, for her people, Caapi
126 (the Indigenous term that would enter into the linnean taxonomical nomenclature
127 for the vine *Banisteriopsis caapi*) is "the fountain of all other knowledge. It is not
128 just a medicine". Daiara Tukano emphasized in deeply moving terms that the life
129 of human and non-human people is intrinsically tied to this sacred plant. Access-
130 ing this vital knowledge requires entering into a relationship of apprenticeship with
131 one who guards the knowledge, and undergoing a process of deep transformation
132 through isolation, study, *dieta* (strict ritual food and behavioural proscriptions).
133 Reminding participants in this international psychedelic gathering that her grand-
134 parents and parents had undergone forced placement in boarding schools under the
135 military dictatorship and saw their culture be prohibited, going on to play key lead-
136 ership roles in the Brazilian Indigenous movement she noted that they saw the fact
137 that, today, there are more white people than Indigenous people drinking ayahuasca
138 as "a very strange thing".

139 To summarize all too succinctly the complex history that led to this situation,
140 we can point to the fact that in the early twentieth century, along the rubber-tapping
141 frontiers of Peru, Brazil and Colombia, ayahuasca shamanic practices syncretized
142 with Christian and Afro-Brazilian religious practices and ideas, giving rise, in Bra-
143 zil to several religions each with their specific cult and doctrine and, in Peru, to the
144 tradition of *vegetalismo*, ritual ayahuasca practices that blend Indigenous and Chris-
145 tian ontologies (Dawson 2013; Labate and MacRae 2010; Taussig 1987; Labate and
146 Cavnar 2014; Fotiou 2018; Bustos 2008). This first moment of ayahuasca's "inter-
147 nationalization" (Labate and Jungaberle 2011) gave way from the 1980s onwards
148 to a boom in "commercially adapted indigenous rituals in ecotourism lodges in the

² Conference program and recordings available at <https://chacrana.net/psychedelic-liberty-summit/>
2FL01 (accessed 8th July 2020)
2FL02

149 Amazon to weekend workshops at yoga academies around the world (Sneparu
150 2017) with ayahuasca irremediably entering into the “global marketplace of New
151 Age spiritualism” with its attendant sanitization of Amazonian shamanism and
152 “bureaucratization of enchantment” (xviii). Weekly ayahuasca rituals now take place
153 in over forty countries including Australia, New Zealand, South Africa, Israel, India,
154 Japan, Russia and twenty-two European countries (Labate and Loures de Assis
155 2017). These may be led by Indigenous or non-Indigenous Latin American ritual
156 practitioners who travel out of Latin America or by Europeans and North American
157 healers who have received training of various length and seriousness in Latin Amer-
158 ican ayahuasca traditions or via a spate of dubious commercial training operations.
159 Access to the resource has become a critical issue in many places (Suárez Álvarez
160 2019), while in others, communities have organized to cultivate the plants.³

161 In the discussions in which I partake there is much debate around the difference
162 between synthetic psychedelic compounds and a plant medicine like ayahuasca, or
163 between traditionally produced ayahuasca (which is harvested from the forest, and
164 prepared by the person who administers it) and the mass produced ayahuasca that
165 is made from cultivated plants, shredded mechanically and cooked on gas stoves, to
166 be shipped out to groups. Often, the ritual preparation of the brew, known in Brazil
167 as *feitio*, is itself a ritual of core importance during which the congregation comes
168 together to brew with a particular intent or ‘energy’. These differentiations highlight
169 divergent forms of valorization. The onus on the end-product (of value) effaces the
170 worlds through which a medicine like ayahuasca works. This capture of ayahuasca
171 by the logic of pharmaceutical value implies the severing of the medicine from its
172 medium (Laplante 2015a, b) or ecology of use, undoing what Mesturini (Mesturini
173 Cappo 2018) calls an “entangled” ayahuasca, that is “a relational space where the
174 power of the plants, of the spirits, and of the ayahuasquera, as well as the influence
175 of colonial invasion, Western thought, foreigners’ needs, local resistance, and local
176 collaboration with global issues become inextricable”.

177 Before turning, in the following section, to the construction of pharmaceutical
178 value for ayahuasca, it is useful to briefly examine how healing practices in non-
179 clinical urban spaces construct efficacy and the value logics they sustain. I do so
180 through two sets of examples, which have in common the particularity of being ori-
181 ented (Ahmed 2006) towards a temporal horizon of amelioration, set in the future.
182 The first concerns the growing popularity of practices of ‘microdosing’, which
183 involve using sub-perceptible doses of psychedelics (including but not limited to
184 ayahuasca) for therapeutic and self-enhancement purposes. The second concerns
185 discussions among neotraditional ayahuasca circles about what healing is and how it
186 is brought about.

187 The phenomenon of ‘microdosing’ with psychedelics has garnered widespread
188 interest globally, as a kind of panacea for depression, anxiety, addiction or to boost
189 creativity, mood and performance. A recent satirical piece published in *The Onion*

3FL01 ³ For reasons of space, and in consideration of ethical questions regarding the uncertain legal status of
3FL02 these market operations, I do not engage an analysis of how the markets for plant materials themselves
3FL03 engage or disrupt the value logics of capital

190 sets the tone. It features a mock interview with a disheartened Peruvian shaman tired
191 of the constant stream of Silicon Valley executives and Bay Area venture capitalists
192 hoping to gain a deeper insight into their corporate strategies.⁴

193 Speaking to reporters, the practitioner of ancient South American religious
194 rituals involving the hallucinogenic ayahuasca plant explained that, while he
195 was ordinarily happy to share his culture's spiritual wisdom with others, the
196 constant stream of wealthy Silicon Valley executives seeking transcendental
197 enlightenment had become an increasingly loathsome and disheartening part
198 of his occupation. (Onion 2016).

199 Accounts of microdosing now circulate widely online, and in business and entre-
200 preneurial press, fuelled by mythic accounts of how Steve Jobs' computing success
201 or Mullis' Nobel prize were the results of insights afforded to them by psychedelics
202 (Doyle 2002). Streams of articles in news magazines have been published explor-
203 ing "Silicon Valley's Best-Kept Productivity Secret: psychedelics". Here, "creativ-
204 ity" has distinctively neoliberal undertones, rhyming closely with innovation (of the
205 entrepreneurial kind):

206 Take 'Charlie,' a highly successful entrepreneur. Every month, he ingests
207 MDMA, psilocybin, ayahuasca, or LSD, depending on what he is trying to
208 accomplish. For Charlie, psychedelics work quickly and perform a function
209 crucial for any entrepreneur: getting the mind into what he calls 'a state where
210 it's naturally creative all the time. (Will Yakowicz, Oct 16, 2016 Inc).

211 A Brazilian plant medicine Instagram account I follow recently began promoting
212 "MicroAya" as "Ayahuasca in homeopathic microdose to clear your vision, lift con-
213 fusion, relax, combat stress, anxiety, depression, free yourself from fear and help
214 make the right decisions". The ad was shared widely in my WhatsApp groups, with
215 one person commenting "the perfect antidote for Covid related anxiety".

216 Among the Brazilian urban formations I have been conducted ethnographic
217 research with, the creative value of ayahuasca is seldom couched in such individ-
218 ualized terms as it is in Silicon Valley inflected enhancement logics. The creative
219 potential and value of ayahuasca is usually geared towards building a shared ethos.
220 Growing numbers of urban Brazilians are ritually 'consecrating' ayahuasca in struc-
221 tured ritual ceremonies that take place on a regular basis. A recent estimate held that
222 there are roughly 600,000 users in Brazil who consecrate ayahuasca in a huge array
223 of ritual formations, ranging from groups of twenty or less to over one hundred peo-
224 ple (Tofoli 2019). Participants generally maintain strong bonds outside ritual time,
225 at times living together or forming virtual communities in online spaces, such as
226 dedicated WhatsApp groups or private Facebook pages where scientific and press
227 articles on psychedelics, ecology and spirituality widely circulate. Almost all the
228 ritual leaders I interviewed explain that the ceremonies are themselves designed
229 under the influence of ayahuasca. Messages for sessions may be channelled under
230 the effects of the brew. The knowledge or 'message' imparted to ritual participants

4FL01 ⁴ <http://www.theonion.com/article/ayahuasca-shaman-dreading-another-week-guiding-tec-52941>
4FL02 (accessed 6th April 2017).

231 by ayahuasca is itself highly prized and valued. Here the promissory and creative
232 values attributed to the brew are open-ended and iterative, although they are also
233 somewhat temporally orientated towards a horizon in the future. This was particu-
234 larly evident in the story recounted to me by Larissa. She has a history of sexual
235 abuse and, when she was fourteen years old, her mother suffered an untimely heart
236 attack and died. Her broken heart became the locus of her pain and she began suffer-
237 ing from panic attack. She learned to quell her terrified heart with alcohol and other
238 sedatives to dissociate. Several years before our encounter, she discovered ayahuasca
239 and began a healing journey with the brew in an ecumenical congregation working
240 with Spiritist and Afro-Brazilian *linhas* (traditions). She explained that in a recent
241 *trabalho* (work) she had done a *limpeza* (cleansing) expunging layer upon layer of
242 her fear. As she cleansed, she understood the nature of this fear and the effect it con-
243 tinued to have over her, beginning as energy but materializing in the body. With sup-
244 port from those holding the ritual space she was able to relax, and, on one occasion,
245 felt “hummingbirds of light” hovering around her heart, “their little beaks weaving,
246 removing, re-doing, cleaning and placing good things” into her heart. When they
247 were finished, she explained, they sealed her heart and flew over to work on the next
248 person. Since this experience she has the conviction that she cured herself of “the
249 future [heart] attack my fear was programming me to have”.

250 A recurrent trope in my interviews with participants and ritual healers is that it
251 is not the ayahuasca that cures. Ayahuasca’s value is often presented as ‘showing’
252 people the consequences of their actions, communicating information about one’s
253 predicament or providing a vision of healing that gets to the source of disease rather
254 than simply addressing symptoms. In this sense—and despite its potent pharmaco-
255 logical action—it is not generally understood to work as a drug (in the magic bul-
256 let sense of the word) but rather to facilitate or initiate a process of healing. I am
257 often told that it is this very peculiar and unique modality of healing that is *valuable*,
258 indeed indispensable, in the present day and age, a framing that often explicitly sets
259 it apart from biomedical or ‘Western’ health practices.

260 As ayahuasca is taken up in an ever-growing range of new ritual, recreative or
261 experimental practices questions of authority, authenticity, propriety or safety
262 become ever more acute. How is the contingent, fragile yet potent efficacy of aya-
263 huasca’s wildness being enfolded into instituted legal and scientific forms? How is
264 the Other of science made recognizable within its frame and what is at stake for both
265 science and its other in this process (Farquhar and Lai 2014; Laplante 2015a, b)?
266 What *neo-ayahuasca*s will ensue from this process of instituting and reformulating
267 (Gaudilliere 2014; Gaudillière and Pordié 2014)? At stake, is the capacity of aya-
268 huasca’s (like other traditional remedies brought into the purview of biomedicine)
269 wildness to survive.

270 In the following sections, I show that while neotraditional urban practitioners and
271 many psychedelic clinical researchers tend to agree upon the fact that ayahuasca
272 healing cannot be reduced to the substance’s action, creating pharmaceutical value is
273 contingent on linking a molecule to a narrowly defined and standardized disease cat-
274 egory through clinical trial labour. There is thus an inherent tension as the recogni-
275 tion of this medicine’s efficacy requires translation through the apparatus of clinical
276 evidence. The case of ayahuasca allows us to interrogate contemporary notions of

277 value, precisely because it provides a window into a process where radically different
278 co-existing and stratified values encounter each other, on the brink of a possible
279 pharmaceuticalization of ayahuasca.

280 **Extra-pharmacological value**

281 Psychedelic-assisted clinicians who are attempting to validate these interventions
282 through innovative clinical trials often express how challenging it is to capture the
283 unique efficacy of these interventions with randomized controlled trials. Speaking to
284 a “psychedelic opportunity” investor summit in June 2020, the CEO of a prominent
285 psychedelic start-up unambiguously stated that overcoming this challenge is the
286 only way forward: “The way to scale psychedelic medicines is through the FDA and
287 the FDA *values* data”, he noted. This posits clinical trials as critical technologies of
288 value creation.

289 Like all drugs, psychedelics need to pass through the different stages of drug
290 regulation prior to authorization. Currently, the most advanced studies are entering
291 Phase 3. Based on the highly promising results in Phase 2, the FDA granted Break-
292 through Therapy Designation to MDMA for the treatment of PTSD in multi-site ran-
293 domized, double-blind, placebo-controlled, clinical trials.⁵ Organizations involved
294 in the promotion of these trials have developed astute social media strategies to give
295 visibility to early studies and open the barriers to funding for larger clinical trials
296 that can push the evidentiary regimes further up the evidence pyramid. Currently, all
297 such funding is arising from venture capitalist investment. In this peculiar economy,
298 scientific publications take on a promissory function drawing online traction and
299 activating linkages between scientific journals, media sources (given that ‘stigma’
300 among the public is seen as a major obstacle), investor news sites and non-profit
301 advocacy organizations. The traffic thus produced can be thought of as modes of
302 producing value (both ‘impact’, connectivity and ‘likeability’); where visibility is
303 of critical strategic value. An example of how this promissory dimension of psyche-
304 delic medicine operates is the designation by Inverse magazine of the Beckley Foun-
305 dation & Imperial College psychedelic neuroimaging study “Experiment of the Year
306 2016”. This study was selected because it had the potential to “fundamentally alter
307 the future of research into the function of the human brain” (Basu 2016).⁶ Legal
308 firms advising on assets and investor news sites specialized in guiding psychedelic
309 investments mushroomed in 2020. An early projection estimated the magic mush-
310 room industry alone at US\$7 billion by 2027.⁷

5FL01 ⁵ Further details available here: <https://maps.org/research/mdma/ptsd/phase3> (accessed 8th July 2020).

6FL01 ⁶ The study is a neuropharmacological experiment into changes in the brain blood flow, electrical activity
6FL02 and network communication patterns of research subjects under the influence of the psychedelic com-
6FL03 pound LSD. It revealed, experimentally, a series of patterns in subjects’ brain structure that account for
6FL04 the therapeutic potential of psychedelic compounds which are understood to trigger hyper-emotional and
6FL05 imaginative states conducive to a “re-setting”.

7FL01 ⁷ Source: <https://investingnews.com/daily/life-science-investing/psychedelics-investing/ways-to-inves>
7FL02 [t-in-psychedelics/](https://www.fool.com/investing/2020/02/29/forget-cannabis-psych) other examples: <https://www.fool.com/investing/2020/02/29/forget-cannabis-psych>
7FL03 [edelic medicine is the better way](https://www.fool.com/investing/2020/02/29/forget-cannabis-psych) (both accessed 8th July 2020).

311 AS I TRACK THE WORK OF CLINICIANS, drug reform activists or non-profits invested
312 in psychedelic medicine, I note the affect of hope, promise of alleviation of mental
313 health suffering, and a collective denouncing of the inefficacy—if lucrateness—of
314 hegemonic BigPharma approaches to mental health. There is a critique of magic
315 bullet psychopharmaceutical approaches for depression, addiction and anxiety
316 which are pathologies for which psychedelics are explicitly pitched as alternatives.
317 The therapeutic model at work here is orthogonal to classic psychotropic medication
318 use in psychiatry. Unlike psychiatric meds which are used chronically and unsuper-
319 vised, psychedelic-assisted therapies involve the intake of only 1–5 doses which are
320 always supervised by a psychiatrist. These ‘dosing’ sessions are preceded and fol-
321 lowed up by psychotherapeutic sessions that enable the material brought up in the
322 dosing session to be ‘integrated’. It is the unique combination of the substance and
323 this context—which to some extent mimics the traditional ritual context—which is
324 understood by advocates of this method to be such a powerful modality. This is to
325 say that the effects of psychedelic medicines are dependent on the social dynam-
326 ics and subjective intentions that play out during the dosing session. Speaking at
327 an international psychedelic event in 2016, Jeff Guss, who is involved in NYU’s
328 Psychedelic Therapy Training program, speaks of this approach as being more than
329 simply ‘additive,’ it involves a co-creation between the medicine, the patient and the
330 therapist; radically reconfiguring the nature of the therapeutic alliance. Psychedelic
331 effects, perhaps more than any other pharmacologically active substance produce
332 highly variable effects, according to the ritual, recreational, experimental, labora-
333 tory (or other) contexts in which they are experienced. The rituals accompanying the
334 use of these substances are basic to their effects, and shaped by what many refer to
335 as ‘set’ (subjective expectations of users) and ‘setting’ (social and physical environ-
336 ment) of the drug experience (Leary and Metzner 1967). As some ritual leaders have
337 explained to me, there is at times no relation between the dose drunk or the potency
338 of a specific batch of the brew and the effects that are experienced. Sometimes the
339 same batch is served on different occasions but the effects are evaluated as having
340 been different. There are multiple reasons for this. The first is that the energy *baxada*
341 (drawn down) in the *salão* (collective ritual space) is understood to *potencializar*
342 (make more potent) the effect of the brew. The collective effect is adduced to indi-
343 vidual effects, such that if everyone in the *salão* is *passando mal* (having a bad time)
344 or in a particularly elevated mood, these energies are understood to spread among
345 other participants.

346 The model of health care delivery proposed is diametrically at odds with that
347 of producing surplus health (Dumit 2012). Rather than generating a steady market
348 growth for the drugs by rendering people dependent on their continued consump-
349 tion for symptom management, psychedelic-assisted therapy purports to heal that is
350 to use the substances for a limited period in view of no longer relying on drugs for
351 wellbeing. Discussions with people invested in this work point to the fact that this

352 could threaten BigPharma corporate interests, nor were psychedelic treatments ever
353 do attain proper validation, the suggestion is that they could take traumatized, anx-
354 ious, depressed or addicted persons off their chronic psychopharmaceutical regimens.
355 Therein lies a very peculiar aspect of the value of these treatments. It is a value that
356 provides what Kaushik Sunder Rajan (2017) suggests may be “an alternative norma-
357 tive framework to capital”. Nevertheless, as Sunder Rajan astutely notes, corpora-
358 tions readily enfold such forms of value in their own value-generating enterprises.
359 They are never, as such “entirely outside the fold of capital but are always appropri-
360 able by it. And even as value logics of capital appropriate the ethical, the ethical
361 is often appropriate to capital in that it does not trouble or destabilize it” (Sunder
362 Rajan 2017). Similarly, Gaudillière (2014) notes that value is not an ontological cat-
363 egory, “but the outcome of market-oriented processes. Value remains the promise of
364 value and is ultimately of little value if these processes do not end with the making
365 and sale of goods”.

366 In his Keynote address to the Interdisciplinary Conference on Psychedelic
367 Research held in Amsterdam in June 2016, George Goldsmiths, Director of COM-
368 PASS, a psychedelic start-up noted “governments can no longer afford the health
369 innovations driven by BigPharma. Meeting the health needs of the twenty-first cen-
370 tury requires alternative approaches”. In a context of booming mental health prob-
371 lems (such as anxiety, depression, addiction), “psychedelic-assisted therapies show
372 huge potential”. Echoing this, just a few months earlier at the Breaking Convention
373 conference on “Psychedelic Consciousness”, in London a prominent British psy-
374 chiatrist expounded the value of (currently illegal) psychedelic compounds for the
375 treatment of some of psychiatry’s most intractable problems. “We have incontro-
376 vertible evidence that it works, hard facts”, he told the audience. “Why can’t some-
377 one just go down to the Amazon jungle, brew up something that looks, tastes and
378 smells as putrid as Ayahuasca and dish it out in a proper double blind randomized
379 controlled trial?” this psychiatrist lamented. Until then all we will have on this sub-
380 stance is individual case reports. This—in the world of medical policy-making that
381 this psychiatrist operates in—is at the wrong end of the pyramid of evidence in med-
382 icine, as far removed from the systematic review of available RCTs that one could
383 be. Just over one year later, I find myself in the Amazonian town of Rio Branco, at
384 the World Ayahuasca Conference listening to Draulio Araujo presenting the prelimi-
385 nary results of what is almost certainly the first double-blind randomized controlled
386 study of ayahuasca: a trial that sought to examine ayahuasca’s effect on depression.
387 The study was performed on 70 treatment-resistant patients who had never taken
388 ayahuasca before. The most staggering finding reported was that patients scores on
389 the various scales used to measure depression improved immediately (versus after
390 15–20 days as with existing treatments). These effects were high in both arms of the
391 trial, revealing a large placebo response (which is generally true in all mental health
392 interventions) but the effects were more durable in time for those in the active arm
393 of the trial (Palhano-Fontes et al. 2019).⁸

⁸ 33% of the patients in placebo arm believed they were in the active arm of the trial, two even vomited
and one had diarrhoea

394 Rupper & Labate (Rupper and Labate 2014) note that ayahuasca is ontologically
395 plural. That is, it may be apprehended ontologically as plant teacher, traditional med-
396 icine, religious sacrament, material commodity, cognitive tool or illicit drug. In the
397 remainder of this section I want to push this point further by arguing that ayahuasca
398 is multiple not plural (Mol 2002) and that this is the result of it being “informed”
399 as Barry (Barry 2005) has argued after Bensaude-Vincent and Stengers (Bensaude-
400 Vincent and Stengers 1992). The integration of ayahuasca into the discursive realm
401 of the so-called psychedelic science renaissance is one mode through which aya-
402 huasca is being *informed*. Barry proposes to read pharmaceutical drugs as *informed*
403 material, that is as relational. He is concerned with showing how chemistry, as a
404 scientific discipline largely defined by its practical applications, does not just reveal
405 and describe pre-existing molecules ‘out there’ nor simply impose form on matter.
406 Through its practices, the structure of (chemical) matter becomes richer in informa-
407 tion (Barry 2005). Indeed the purified molecule in the lab does not have the same
408 properties as the same molecule in the field or body (Barry 2005:57). The transla-
409 tion that chemistry operates between the properties in the lab and in the field is a
410 process of transferring some elements of one into the other. This is, in many ways,
411 the labour of the clinical trial. What travels with the molecule across these topologi-
412 cal ideal spaces is its environment. Thus the material and informational environment
413 of the molecule cannot be thought of as external to the object, Barry notes with
414 Whitehead. This environment becomes constitutive of the molecule itself (2005, pp.
415 58–59). This, he is careful to note, does not make the molecule “fluid” (2005, p. 65)
416 for *something endures* across the sites (see Peterson 2014, pp. 152–153) for a more
417 explicitly political rendering of this discussion. We can use Barry’s insights on the
418 co-constitutive relations between efficacious molecules and their environments, to
419 critically engage with the notion of set and setting dominant in psychedelic science
420 and begin to reflect on the importance of the spaces, temporalities and interpersonal
421 dynamics (between humans and between humans and non-humans) in rendering
422 ayahuasca efficacious.

423 To conclude this section, I return to the question of value as it pertains to the
424 contexts that are being innovated and developed for psychedelic-assisted therapies.
425 Partaking in online events for investors in this field I was struck to discover that an
426 important area of investment opportunity identified for value generation is referred
427 to as physical and human infrastructure. “A lot of the infrastructure that is going to
428 have to be set up is going to have to be novel and there are fantastic opportunities
429 for IP here”, someone who described himself as a “serial entrepreneur” noted in
430 an online event gathering start-up CEOs, clinicians, FDA regulators and lawyers.
431 Imagining the future spaces where psychedelics will be delivered, his co-panellist,
432 a young woman with investments in the cannabis industry noted that “it will have to
433 coexist for a time with existing healthcare structures, but it will outgrow it”. Wrap-
434 ping up the first day of talks, one of the Chairs noted that this industry was no “uni-
435 corn” industry and that psychedelic start-ups are “not commodity businesses but

436 public utility businesses that take a lot of time to return investment . He compared
437 the investment in “infrastructure” for the delivery of these unique substances to
438 Amazon’s unparalleled transformation of the sales industry after nearly two decades
439 of not returning any profit. “Your business may begin looking like a pharma com-
440 pany but it will look very different in 10 years”, he concluded.

441 Addressing this event as a Keynote speaker, Goldsmiths—introduced above—
442 spoke to concerns participants raised concerning price by stating.

443 Bringing a drug to market, typically ... well, the numbers will tell you any-
444 thing if you torture them long enough. But the hundred, two hundred million
445 that is required to bring a medicine to a large population, I think those num-
446 bers are big numbers. But even then, it’s not a factor in determining price. It’s
447 really about *value*. And the value you can create for cost avoidance. And I
448 think this is a huge shift that is going on somewhat reluctantly in the pharma
449 industry—let’s not talk about price but let’s talk about value. Let’s be partners
450 in creating value for patients; partners in creating value for health systems. We
451 at Compass are really committed to that. ... The research we are starting to do
452 with payers, is—you know—when you look at people who really suffer from
453 treatment-resistant depression, they also have a lot of other things... Often
454 metabolic disease, diabetes, a whole host of things. One can see that things are
455 often related to behaviour and self-care ... so you have the ability for people to
456 take better care of themselves and therefore require less cost to health systems.
457 And when I talked about value before. That’s what I mean by value. Can we
458 actually understand deeply the effect this has on people’s lives? And to the cost
459 of care? And how they can be not just mentally but physically healthier. Really
460 looking at that comprehensively. That is what we are doing.

461 This section attempted to map these processes as materializations of an alternative
462 political economy of health (Gaudillière & Sunder Rajan, this volume). It engages
463 with materials that shed light on how existing health market dynamics are being
464 actively contested and reimagined, as actors of the psychedelic medicine renaissance
465 take on the regulatory frameworks of the FDA and EMA in search of “adaptive
466 pathways for flexible drug delivery innovations”, to use emic vocabulary. Given that
467 most of this labour takes place in boardrooms and start-up consultations with law-
468 yers and regulators—far beyond the gaze of the ethnographer—webinars and con-
469 ference spaces offer a privileged site to study the production of value, or at least its
470 public presentation. In this sense, we can think of these sites as spaces where, along-
471 side the clinical trial, ayahuasca becomes ‘informed’ in particular ways. What is
472 becoming increasingly clear is that the “psychedelic revival” (Tehseen ref) is overtly
473 challenging corporatized health care and its ineffective chronic drug regimens in
474 ways which are not free from deep rooted commitments to intellectual property and
475 the patent as a form of value generation and protection.

477 Unlike reformulated Ayurvedic plant remedies, ayahuasca is not (yet) industrialized,
478 mechanized and standardized, although production modalities have deeply shifted to
479 meet the global demand for the brew, and plants are now being farmed rather than
480 harvested wild and ritual hand pounding being replaced by mechanized shredding.
481 An essential aspect of reformulation in India, Gaudillière (2014) explains is that it
482 severs the phytotherapeutic “product” from the clinical context of individualized
483 treatment:

484 both from a sociological point of view (preparations are no longer made by
485 doctors but by persons specializing in medicinal plants and their manipula-
486 tion) and an epistemic point of view (formulations are ready-to-use mixes
487 for specific indications, no longer ad hoc mixes that are part of an individu-
488 alized treatment regimen) (Gaudillière 2014).

489 I draw on this to explore two notions of value that are in tension in the case of
490 ayahuasca’s valuation. Market value, in the reformulation of Ayurveda case,
491 seems to depend on this rupture or extraction of the ‘thing’ from its traditional
492 social and epistemic context of use. Value—in Gaudillière analysis—is produced
493 by this operation which puts the product into motion, inserting it into a global cir-
494 culatory flow from which manufacturers hope to see value produced. This raises
495 a crucial question that commentators on bioprospecting repeatedly return to,
496 namely that while the Convention on Biodiversity’s Nagoya treaty extends rights
497 to benefits on profits made from innovations on the natural resources to tradi-
498 tional communities it concomitantly entrenches the patentability of living materi-
499 als (Foster 2016; Hayden 2003) and “the pharmaceuticalization and inscription
500 into the drug proprietary economy” of traditional herbal medicines (Gaudillière
501 2014). In the case of ayahuasca, the promissory ‘value’ is more epistemic than
502 financial. Indeed the promise such a potential therapeutic innovation holds for
503 many of the actors I am encountering seems to be precisely as a kind of het-
504 erotopic value or Otherwise (Povinelli 2011) to hegemonic market value. In a
505 sense what is at stake in contestations surrounding the calculative, evaluative or
506 monetary logics that are accompanying ayahuasca’s globalization is the potential
507 for the value of ayahuasca’s therapeutic potential to remain an *alternative* while
508 being legally recognized.

509 Laplante (Julie Laplante 2015a, b) refers to the “preclinical [trial] moment”
510 to home in on this crucial step in the development of plant-based indigenous
511 healing practices into RCT-validated medicines. Ayahuasca could be described
512 as being in both a preclinical and—potentially—a pre-proprietary phase. In the
513 current knowledge economy, the two things are intimately tied together. The pro-
514 cess at work with ayahuasca bears both resemblances and divergences from what
515 Gaudillière & Pordié (Gaudillière and Pordié 2014) have called the “reformula-
516 tion regime”. Reformulation consists in reinventing traditional phytotherapeu-
517 tics, adapting plant-based healing practices such as those integral to Ayurvedic
518 medicine to ‘industrial contexts’. In the context of an innovation pipeline dry-up,

519 reformulating traditional herbal remedies seems to offer a potential resource for
520 future pharmaceutical value generation and drug development. Reformulation
521 exploits the properties of mixtures, and brings into question the molecular, chem-
522 istry-based and purity-oriented drug-invention model that dominates in Western
523 industrial pharmacy (Gaudillière 2014). However, unlike the cases of Ayurveda
524 or of traditional Chinese or African herbal remedies that anthropologists have
525 studied (Wahlberg 2014; Hsu and Harris 2010; Gaudillière and Pordié 2014; Lai
526 and Farquhar 2015; Laplante 2015a, b; Langwick 2015), ayahuasca is not part of
527 a broader instituted system of traditional herbal-based medical practice nor is the
528 revitalization of this medicine explicitly part of a state effort to standardize indig-
529 enous medicines, as important components of nation-building strategies as seems
530 to be the case in the African or Asian cases described by these authors. The case
531 of ayahuasca's legitimation takes a different route.

532 Drawing on fieldwork alongside the Shuar in Ecuador, Tym (2020) proposes
533 that industrial capitalist knowledge practices pertaining to plants seek out “isolable,
534 transmissible and commercializable components in the genetic and biochemical mat-
535 ter of nature, which then become privileged elements in the knowledge of and value
536 accorded to nature”. Building on Hayden's work, he shows how plants are screened
537 for single-molecule active ingredients by bioassay machines which “can only scan
538 the botanical samples for pre-specified chemical substances” (pp), effectively reveal-
539 ing that plants are understood primarily as inputs into a system of knowledge that
540 predefines what can be evaluated and thereby valorized. Further, he shows that the
541 framework of IP law is itself founded on the capacity for the plant to be industri-
542 ally produced. The targeted active ingredients that are of interest to industry in plant
543 materials are highly variable in concentration—a fact that is exacerbated in the case
544 of ayahuasca by the fact that it is not a plant but a plant brew—rendering plants
545 somewhat illegible to regulators for whom product standardization is absolutely key.
546 This leads Ikechi Mgbeoji (cited by Tym) to describe the patent system as “speaking
547 a monologue directed towards a narrow epistemological and economic elite”.

548 The tensions that surround the international legal status of ayahuasca point to
549 this very tension between its molecular composition and the whole plant (or whole
550 brew, as it were).⁹ Ayahuasca's legal status has been the object of a great deal of
551 uncertainty, given that it contains a naturally occurring form of dimethyltryptamine
552 (DMT) which is currently listed as a Schedule 1 substance in the 1971 Convention
553 on Psychotropic Substances. This Convention, nevertheless, allows parties to make
554 reservations where wild plants traditionally used for ritual or religious purposes are
555 concerned. The International Narcotics Control Board (INCB) has clearly stated that
556 “ayahuasca and similar ethnobotanicals that contain psychoactive alkaloids included
557 in the 1971 Convention are not under international control” (INCB, cited in (De
558 Loenen et al. 2017). However, in many European countries and in the USA, confu-
559 sion reigns over the difference between the ayahuasca brew which contains naturally

9FL01 ⁹ Helle Kaasik has researched the variability of the chemical composition of different religious groups'
9FL02 ayahuasca brews: <https://www.youtube.com/watch?v=oOhGAW26vT0> (accessed 8th July 2020).

560 occurring DMT, used in traditional and neotraditional ritual contexts, and chemi-
561 cally extracted and purified DMT that is listed as a Schedule 1 substance.

562 These approaches to plant value totally overlook Indigenous and traditional under-
563 standings of medicinal plants (Craig 2012; Hsu 2012). Hayden (2003, p. 39) draws
564 attention to the fact that medicinal plant resources are always already cultured. They
565 have been reproduced and domesticated for millennia by human collectives who have
566 invested labour and knowledge into their care and propagation. Ethnobotanists of low-
567 land South America have shown that even the wildest frontiers of the Amazon have
568 been managed by human groups for thousands of years, and that the biodiversity that
569 thrives there has been produced, maintained and cultured by human groups (Levis et al.
570 2017; Rival 2006). Or, as Hayden (ibid) puts it: “‘wild’ resources (“nature”) are in fact
571 always already-managed ones (“innovation”)”. This renders the Lockean calculus at
572 the basis of IP totally ill-suited to recognizing the collective (human, and according
573 to my informants more-than-human) labour of producing knowledge, innovating and
574 caring for the potential value to come from the intricate socialities constructed with
575 plant and other non-human allies. How would these forms of recognition function in
576 the intensely prolific global landscape of ritual and therapeutic innovation around aya-
577 huasca? If as I have been arguing ayahuasca is not just the brew but the brew and its
578 context (and the plants and the territories which give them their potency) we need to
579 ask what alternative version of innovation can convey this multispecies entanglement?
580 What proprietary legal regimes are required to account for the proliferation of value
581 production currently underway as ayahuasca ritual forms boom and expand.

582 While the cultural appropriation of indigenous spirituality (see Tupper 2009) may
583 involve both indigenous and non-indigenous ritual leaders, an important question in
584 this moment of global expansion for ayahuasca is what IP regime or system of eco-
585 nomic valuation might come to bear on the brew? Will anyone be able to grow *Ban-*
586 *isteriopsis caapi* and produce, process, prescribe and profit from it? How might the
587 Convention for Biodiversity Nagoya Protocol on access and benefit sharing shape
588 the economics of ayahuasca were it to be further developed within a pharmaceu-
589 tical regime of value? Who of the myriad traditional, neotraditional and Christian
590 churches would count as ‘community’ with benefit claiming status? What versions
591 of ayahuasca and its value become authorized in these processes of standardization,
592 legalization and medicalization? A central tension that we have been observing in
593 our work on the HealingEncounters project is between versions of ayahuasca as
594 chemical or plant matter and versions of ayahuasca as a sentient, living being with
595 intelligence. For example, I once asked Ibã Huni Kuin, who is an Indigenous collab-
596 orator (and ethical advisor for the project) what ayahuasca would say if it spoke in a
597 human language, for it is understood among the Huni Kuin that ayahuasca “speaks”.
598 Smiling, Ibã responds (in Portuguese): “Never forget that animals speak my name.
599 Yube Inu (the name Ibã gives the mythic ancestor who is the spirit of ayahuasca and
600 a central figure in Huni Kuin origin myths), I am here studying your language...”
601 Jokingly he adds, speaking from the perspective of Yube Inu “You know what you
602 can do for me? Plant me. To understand. To take the message. Make a good pure
603 brew and you will receive the message. The message from the spirit of the forest
604 who is guiding us”. Movingly, he closed this exchange saying “I want this teaching
605 (of the brew of the Yube Inu spirit) to continue for generations and generations”

606 The divergence in manners of envisaging, comprehending and valuing ayahuasca—
607 as plant material to be extracted and standardized or cosmological source
608 of all other knowledge—are deep and probably unbridgeable. Such tensions were
609 particularly tangible at the World Ayahuasca Conference to which I now turn.

610 **Contested value**

611 In the Brazilian context, ayahuasca's legibility to the state is not primarily mediated
612 through Indigenous organizations, as it is in Peru or Colombia. In Brazil, the
613 Ayahuasca churches (Santo Daime and União do Vegetal in particular) have secured
614 legal exemption for ayahuasca on religious grounds and often liaise with clinical
615 laboratories, supplying the brew that is used in experimentations, for example.

616 In what follows, I explore some of the tensions that this gave rise to in discussions
617 concerning the configuration of the second World Ayahuasca conference, which was
618 held in the ex-rubber-tapping capital Rio Branco, in the Amazonian state of Acre,
619 Brazil. Over one very dense week in October 2016, the conference brought to life in
620 this consequential locality stakes around the global process of ayahuasca's valuation
621 that endure and evolve between conferences through legal decisions, everyday ritual
622 practices, scientific publications and their associated citation practices and through
623 the meticulous labour of international organization active in policy spheres and
624 social media realms to inflect the legal regimes and shape public opinion and knowledge
625 around ayahuasca. I draw on this event to map a series of concerns around
626 ayahuasca's valuation that crystalized in the conference spacetime while spanning
627 well beyond its immediate horizon. My participation and observations of the discussions—
628 both formally structured on the various stages of the event, as a speaker,
629 and around breakfast or diner tables, during visits to historic local ayahuasca centres,
630 etc.—were informed by my ethnographic investments in these questions further
631 afield.

632 The first panel of the Rio Branco World Ayahuasca Conference was held in the
633 main auditorium and was devoted to Indigenous perspectives. However, what might
634 have been seen as a bold move on behalf of the conference organizers—to follow
635 the Inaugural session with presentations by the Governor of the State of Acre and
636 the Rector of the University by a panel of Indigenous representatives—was excoriated
637 by the panellists. One after the other, the indigenous representatives took the
638 stage, at a table exquisitely ornamented with lush tropical flowers, to question what
639 they denounced as an absurd request: to give their perspective on ayahuasca in ten
640 minutes. The conference celebrated the diversity of perspectives on ayahuasca and
641 as such sought to be inclusive of a plurality of approaches. As such, the streams
642 were organized in “indigenous” “scientific” “policy” and “social sciences and psychology”.
643 Such a setup presumes a whole made up of a plurality of perspectives
644 (Strathern 2005). The conference format arises as a space created to bring together a
645 plurality of modes of valuing. Yet what happened directly challenged this. One after
646 the other, each of the indigenous representatives spoke, beginning with a detailed
647 presentation of who they were—in relation to the land and the Elders and the spirits
648 they worked with. Biraci, a Yawanawa chief, took the stage to express that in his

649 culture people speak until the end , until they have said what needs to be said. The
650 sentiment was that it was inappropriate, and indeed offensive, for European enthu-
651 siasts of the kind that visit Indigenous communities as ayahuasca tourists to take on
652 the role of hosting—on occupied Indigenous land—and allocating speaking time in
653 a way that felt to the Indigenous participants invited that their presence was merely
654 decorative. Another spoke against the word ayahuasca, “this word is not ours. In our
655 languages of the Acre region it is called many things: Nixi Pãe, Huni Pãe, Uni Pãe,
656 Shuri, but not ayahuasca”. The next speaker directly evoked the tensions around the
657 patrimonialization process underway for ayahuasca in Brazil, mainly led by the lead-
658 ers of the ayahuasca religions, a process several of the indigenous people I spoke
659 with felt excluded from. He declared: “We have been here for centuries caring for
660 this medicine, long before the state became interested in its patrimonialization, or
661 the White man became interested in profiting from it”. Yet another speaker took the
662 microphone to address the auditorium in his indigenous language for the entire ten
663 minutes, making the limits of the albeit sophisticated simultaneous translation *dis-*
664 *positif* (into English, Spanish and Portuguese) painfully obvious. The discomfort,
665 bordering on irritation, was growing in the auditorium and almost palpable. In the
666 row in front of me, two Brazilian scholars who specialize in the study of ayahuasca
667 religions were getting impatient and commenting to each other: “why don’t they just
668 stop wasting time and get on with what they have to say?” One asked the other.
669 “They have already been given the main auditorium for the whole morning”, the
670 other responded with a raised eyebrow I read as signifying “what more could they
671 want”? Ashinanka leader and Pajé (shaman) Benki was more explicit in situating his
672 response in decolonial terms. He began by reminding the auditorium that the Catho-
673 lic Church had long demonized and violently repressed ayahuasca shamanic prac-
674 tice, a not so subtle message to the representatives of the Ayahuasca churches who
675 were given an equivalent space the next day in the same room. “When we drink aya-
676 huasca we commune with our *antepassados* (ancestors) and they remind us that they
677 were killed by the Brazilians [in reference to non-indigenous people]. Ayahuasca
678 does not show you Mary or Jesus but the *jiboia* (the anaconda, a name commonly
679 given to ayahuasca)” he proclaimed in unambiguously polemical terms. The final
680 panellist, Afonsoinho Manduca Mateus concluded:

681 It is time for there to be another mode of organising this discussion that begins
682 with the recognition of this past. This plenary session is only the beginning; it
683 is not enough. We are still here fighting for our livelihood, for our territories.
684 For this reason we need a completely different mode of organising this discus-
685 sion. But now we have run out of time and it is time for lunch; for those who
686 have food. The rest will remain hungry.¹⁰

10FL01 ¹⁰ These are translations from my hand written notes, not exact transcripts as recording in this vast audi-
10FL02 torium was near impossible.

687 And with that the panel came to a very powerful end.

688 As one of the members of the organizing committee told me in an informal dis-
689 cussion, the accusations were difficult to hear given that the conference had been
690 held in Acre, at the Brazilian, Peruvian and Colombian border specifically to enable
691 a large number of stakeholders and ‘guardians’ of ayahuasca, indigenous and reli-
692 gious to participate. With respect to the Ibiza event which preceded it, and had com-
693 paratively few indigenous representatives, the Rio Branco event was a substantial
694 step forward in including a plurality of perspectives.¹¹ So what are we to make of
695 these tensions? How are we to read the refusal by so many of the indigenous rep-
696 resentatives to engage in the terms laid out by the conference format? In the final
697 section, I would like to read this situation through the lens of the difference between
698 the plural and the multiple (Haraway 1991; Strathern 2005; De la Cadena 2015; Mol
699 2002).

700 The World Ayahuasca Conference’s celebration of diversity places this event
701 within the frame of the plural. As Zhan (2018) notes, the plural is grounded in frag-
702 mentation. Within the frame of the plural, the entities that are brought together pre-
703 exist the relating, as autonomous things, external to each other. Yet as Strathern has
704 forcefully argued, cultures or units are always already “partially connected”: more
705 than one and less than many (a point she draws on Haraway to make, and which
706 Mol draws on to develop her notion of a singular multiplicity). Yet, Biraci, Benki
707 and their companions in the struggle of indigenous self-determination make explic-
708 itly clear is the way in which their predicament is absolutely not external to that of
709 the settlers and foreigners who organized the conference. The request to begin the
710 conversation on the global valuation of ayahuasca with a recognition of this histori-
711 cal fact is—I would like to argue—a request to move from a world of plurality to a
712 world of multiplicity. It implies recognizing that the current arrangement whereby
713 a plural set of stakeholders (indigenous peoples, scientists, churches) is the product
714 of historical, legal and institutional structures which render them as equivalent, and
715 effaces this history.

716 In a discussion of Brazil’s patrimonialization of ayahuasca, anthropologist and
717 president of the Brazilian Institute of National Heritage Antonio Arantes comments
718 that the peculiarity of the Brazilian scenario is that Ayahuasca’s safeguarding is
719 being led by Christian religious groups for religious and not therapeutic processes,
720 whereas in other Latin American countries such as Peru it is associated to indig-
721 enous and therapeutic uses (Labate and Goldstein 2009). To Labate and Goldstein’s
722 question about how a practice can be recognized as heritage in one way in one coun-
723 try and in another way in the next country, Arantes responds “values attributed to
724 practices are always situational” (62). What transpired from the World Ayahuasca
725 Conference is the way in which (religious) ayahuasca practices are being integrated

11FL01 ¹¹ Interestingly, the Third World Ayahuasca Conference was held in Spain and although the conference
11FL02 organizers opened space for an autonomous Indigenous delegation, this had the unwitting effect of posi-
11FL03 tioning Indigenous questions outside the main conference stages. The Indigenous declaration is acces-
11FL04 sible here: [https://www.ayaconference.com/declaration-by-the-indigenous-peoples-and-nations-of-the-](https://www.ayaconference.com/declaration-by-the-indigenous-peoples-and-nations-of-the-amazon-basin/)
11FL05 [amazon-basin/](https://www.ayaconference.com/declaration-by-the-indigenous-peoples-and-nations-of-the-amazon-basin/)

726 into new regional identities, such as an Acrean (from the state of Acre) identity,
727 where the second World Ayahuasca conference was held in an attempt to provin-
728 cialize Euroamerican metropolitanism. The Acrean identity, as it was staked out
729 by Ayahuasca religious groups on one hand and Indigenous groups on the other, is
730 steeped in a deep settler colonial history, the dispossession of Indigenous groups'
731 land, colonized during the rubber boom and for whom the relationship to the colo-
732 nial Brazilian state continues to be incredibly strained, particularly since the election
733 of Jair Bolsonaro.

734 What is fascinating in this case is how a locality (such as the state of Acre, Ama-
735 zonia in Brazil) comes to exemplify a range of things, such as authenticity and the
736 traditional heart of ayahuasca practices, on a global stage (that is, to a community
737 of onlookers who mainly situated in North America and Western Europe) while
738 internally—so to speak—this space is composed of highly stratified and yet partially
739 connected relations that, in this instance, refused the unified inclusive picture that
740 in some regard was expected. This is to say that the value of holding this event in
741 Amazonia under the auspices of this inclusive agenda was highly performative. One
742 of the indigenous representatives I spoke with (who asked to remain anonymous)
743 felt that the organizing committee had little understanding of the local politics of
744 ayahuasca in this region and the historic tensions between the Churches and the
745 indigenous groups, but that this was far from their concerns. The real objective, in
746 his view, was protecting and legitimizing ayahuasca use in Europe and North Amer-
747 ica. What mattered, so to speak, was less how Indigenous people valued this sacred
748 beverage, and more the recreational and self-enhancement value or potential market
749 value white people were carving out for this ancient medicine.

750 **Conclusion**

751 Drawing on de la Cadena's (2015, p. 33) explicitly political retooling of the con-
752 cept of "partial connections" in the context of Latin American cosmopolitics, I sug-
753 gest that the production of a globalized sphere of valuation for ayahuasca—enacted
754 through such psychedelic events, clinical trials, Pubmed publications, social media,
755 drug reform and post-prohibition non-profits, to name but some—needs to attend to
756 the ways in which multiple local values interrupt and reconfigure each other. Fail-
757 ing this, there is a danger that behind the language of inclusion and diversity further
758 appropriations and dispossessions continue to take place.

759 My discussion of the World Ayahuasca Conference reveals the tensions at work
760 between a politics of the plural and a politics of the multiple. The global story I
761 am narrating here is not one of biomedical expansion from centre to periphery nor
762 is this simply a case of legitimating in an international context a local, indigenous
763 herbal remedy. Thinking the question of value alongside the question of the global
764 involves tracking the shifting ways in which value is constituted in relation to the
765 local or the global and examining how the registers of the local or the global func-
766 tion differentially at different moments. What becomes clear in this context is the
767 way in which locality and universality function as guarantors of values in a context
768 of multiple and shifting competing arenas for the realization of values. And here

769 we can see now, in particular where the Ayahuasca conferences are concerned—the
770 choice of locality from which the idealized production of a sense of ‘global’ (as in
771 the ‘World’ Ayahuasca) is anything but neutral.

772 Tracing the fragile, looping trails of co-constituted authority that link ancestral
773 indigenous plant knowledge to those made incandescent under the fMRI scan is
774 a veritable challenge. It raises critical questions for Theory itself, as Zhan (2018)
775 notes. Interrogating STS’s fixation on power and materiality, Zhan asks whether
776 the discipline has ended up “reproducing what we set out to critique by leaving
777 little room for spirits, wonders, gods, the cosmic, and the ineffable?” Drawing on
778 her analysis of classical Chinese medicine entrepreneurs strategies to distinguish
779 themselves from scientized Traditional Chinese Medicine practice, Zhan shows that
780 Weber rested his analysis of the spirit of capitalism on an otherworldly/this-worldly
781 divide predicated on sweeping generalizations about Chinese ‘religion,’

782 the worlding of such theories—or rather, Theory itself—entails the violent
783 unworlding of other ways of thinking, doing, and being which renders them
784 unimaginable, unthinkable, and undoable. The challenge we face, as I see it, is
785 not having to come up with a better or bigger theory, but rather taking the poli-
786 tics of imagination seriously and coming up with—and staying with—alterna-
787 tive accounts of worlds-in-making.

788 The first two sections of this article sought to reveal some of the frictions between
789 different ayahuasca world-making projects (those of the laboratory, and those of the
790 urban practitioners, for example) as the otherworldly/this-worldly divide is widened
791 by the apparatus of the clinical trial which removes spirits and the ineffable from
792 explanatory frameworks.

793 The argument presented here sought to engage with the multiple facets of the
794 promissory horizon that ayahuasca holds for different groups staking out claims
795 about its of value. I have mapped out tensions between fitting ayahuasca into existent
796 modes of (pharmaceutical) valuation on the one hand, and calls to take seriously the
797 ‘politics of imagination’ at stake in keeping alternative modes of world-making and
798 valuation alive, on the other. Building on an analysis of ayahuasca’s partial incorpo-
799 ration into the psychedelic revival (Steinhardt and Noorani 2020) I have proposed to
800 think of ayahuasca as not-yet-capital; that is as both appropriable by and still par-
801 tially outside biocapital. This raises questions concerning the conditions of possi-
802 bility for the persistence of alternative worlds (the Otherwise), for their endurance
803 and survival within curtailing social winds (Povinelli 2011, p. 10). In *Economies of*
804 *Abandonment*, Povinelli explores the grammatical figurations of late liberalism as
805 they in/capacitate alternative social imaginaries that contest the normative world.
806 Her insights are important to the question of ayahuasca’s value in that she shows
807 how late liberalism aggregates social worlds grammatically “through figurations of
808 tense” (past present and future). In the case of ayahuasca’s promissory future, there
809 are at least two ways in which figurations of tense are operating. The first is through
810 a logic of hyperbolic promissory narratives of medical progress and access to bet-
811 ter mental health treatments, where a regime of drugs for life (Dumit 2016) such as
812 methadone substitution or long-term antidepressant use is framed as lucrative but
813 not healthy. The second is through strategic forms of appropriation of tradition and

814 authenticity. But what counts as tradition, in this case, diverges radically. In Brazil,
815 as we have seen, ayahuasca has come to exist as ‘tradition’ in two radically differ-
816 ent subjective formations: as a shamanic, Indigenous practice associated with what
817 Povinelli refers to as genealogical society (indigeneity as defined by a continuity
818 in blood, kinship and culture) and as a Christian religious sacrament upheld by the
819 ‘autological subject’ of the Ayahuasca Churches who make legal claims based on a
820 constitutional right to religious exemption that is organized around a very different
821 neoliberal governance.

822 Returning to the question of plural and the multiple, then, I would like to suggest
823 that a core aspect of ayahuasca’s potency—and thus value—lies in its circulation
824 between ontological registers (biomedical, legal, neotraditional and indigenous).
825 Focussing on the translations operating in and between the various ethnographic
826 sites I have mapped enables us to develop a middle ground from which to observe
827 equivocations (Viveiros de Castro 2004), divergences and exchanges in situations of
828 encounter. The challenge continues to be—as Daiara Tukano and other Indigenous
829 voices powerfully remind us—whether these encounters can transform the West-
830 ern apparatus of knowledge and valuation in such a way that it can recognize aya-
831 huasca not as an object of study but as the instrument and origin of knowledge itself.
832 That is, returning to Zhan’s terms, whether Theory can unworld some of the vio-
833 lence it has perpetuated in rendering other ways of valuing and being in the world
834 unthinkable.

AQ1

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843 **Compliance with ethical standards**

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