

Research article

Exposure and response of private practice psychiatrists in Greece to illicit substance use-related treatment requests: A cross-sectional survey

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ABSTRACT

The use of illicit substances is a major public health problem. While individuals with substance use problems primarily seek treatment in specialized treatment programs, the role, exposure, and response of private practice psychiatrists to requests for substance-related issues remain unclear. This study aims to assess private practice psychiatrists' exposure to and response to treatment requests for substance use-related problems, along with examining the requests' characteristics. A cross-sectional online anonymous survey was administered involving private practice psychiatrists in Greece between January and February 2024. A total of 100 private practice psychiatrists responded to the survey (response rate ~10%; 53.0% male, aged 49.5 (SD=9.3) years, with 13.7 (SD=9.9) years of professional experience, and 59.0% with a private office in the Attica/Athens region. Most participants (84.0%) reported exposure to requests for substance use treatment during the last 12 months, with 69.0% of them (58% of the total) accepting to offer treatment. The most frequently reported categories of substances included cannabis and cocaine/crack. High rates of comorbidity with problematic alcohol use, multiple substance use, and other mental disorders were also reported. Pharmacotherapy and cognitive behavioral therapy were the treatments most commonly used. Factors associated with accepting to offer treatment included past specialized training in addiction ($p<0.001$), past or current employment in treatment facilities ($p=0.002$), self-reported expertise in addictions ($p=0.017$), previous training during specialty in substance use departments ($p=0.001$), and use of motivational interviewing ($p=0.011$). Around 70% of participants who did not accept cases believed patients would be better treated in specialized substance use treatment programs. Among all participants, 63.6% were willing to accept future treatment requests—significantly higher percentage (93.1%) among those who had accepted similar requests before, compared to those who had not (19.2%, $p<0.001$). In conclusion, apart from specialized addiction services, a substantial number of private practice psychiatrists in Greece were also exposed to and accepted treatment requests for illicit substance use-related problems, with most frequently encountering requests related to cannabis and cocaine use. Future research should investigate the characteristics of patients treated for illicit substance use-related issues in private settings and the services provided to them.

KEYWORDS: Private practice psychiatrists, addiction, substance use disorders, treatment requests, perceptions.

Introduction

Illicit substance use disorders (ISUDs) are highly prevalent globally, with recent estimates indicating that 64 million individuals were affected worldwide in 2022, with only one in eleven receiving some form of treatment.¹ In Europe, the most used illicit substances in 2023 were cannabis (22.8 million users), cocaine (2.5 million users), MDMA (2.2 million users), amphetamines and methamphetamines (1.5 million users), and heroin and opioids (860,000 users). In 2022, treatment was provided to at least 92,000 cannabis users, 63,000 opioid users, 29,000 cocaine users, and 10,000 amphetamine users.²

In Greece, it is estimated that about 10,600 individuals use opioids.³ In 2022, approximately 3,500 individuals entered treatment in any one of the 167 specialized treatment/counseling centers operating in the country, with three-fourths of them (77.3%) reporting polydrug use. Opioids (mostly heroin) were the primary drug most frequently mentioned upon entry (46.7%), followed by cannabis (27.8%), cocaine/other stimulants (21.8%), and 'other substances' (3.8%).³ Finally, 34.3% of individuals on substance use-related treatment have also been diagnosed with an additional psychiatric disorder, with an increasing trend over the years.⁴

Despite the high prevalence of ISUDs, relatively few affected individuals seek treatment. Both health care system characteristics and individual factors serve as barriers to enrolling in specialized treatment services.^{5,6} Most studies identify stigma as the primary barrier to treatment, along with long waiting times, denial of the problem, living in rural areas, and lack of awareness of available treatment options.⁶⁻¹⁰ Furthermore, the female population is most affected, as it is often underrepresented in treatment programs.¹ Conversely, comorbid mental illnesses facilitate treatment seeking.¹¹⁻¹³

Specialized addiction treatment centers are well-studied for ISUD treatment. However, the role of private practice psychiatrists, particularly those working in office-based settings, remains under-researched. This is particularly relevant in Greece, where a notable proportion of psychiatrists work independently in private practice, underscoring the need to better understand their involvement in ISUD treatment requests. A previous study found that patients with SUDs and comorbid psychiatric disorders were more likely to seek treatment from psychiatrists than those with either disorder alone, often preferring psychiatrists with expertise in addiction.¹⁴ Another study examined 865 psychiatrists, classifying them into high-SUD providers (>51% cases with SUD) and non-high-SUD providers. High-SUD providers were typically younger and less likely to

practice privately (14.0% vs 55.4%), with mood disorders being the most common comorbidity among patients treated by them.¹⁵ A recent cross-sectional study in India reported that among 998 individuals with SUD, 14.4% initially sought treatment from private practice psychiatrists, 6.0% from private medical practitioners, while most first contacted public-funded addiction treatment services.¹⁶

In Greece, 6.8% of individuals entering public addiction treatment centers reported a health practitioner as their key point of referral.³ To our knowledge, no national studies have examined the exposure and response of private practice psychiatrists in Greece to treatment requests for ISUDs. Hence, the purpose of the present study is to examine the extent to which private practice psychiatrists in Greece encounter and accept treatment requests for illicit substance use-related issues and to investigate their treatment approaches and service characteristics.

Material and Method

Design

The study was an exploratory cross-sectional survey based on the online completion of a self-explanatory, anonymous questionnaire addressed to private practice psychiatrists in Greece in the period January-March 2024.

Participants

The target population consisted of all private practice adult psychiatrists actively practicing psychiatry in Greece. According to the Panhellenic Medical Association (2023), approximately 1800 licensed adult psychiatrists were registered nationwide. In Greece, adult psychiatry and child and adolescent psychiatry are distinct medical specialties with separate training and licensing; thus, this figure does not include child and adolescent psychiatrists. Inclusion criteria were: (a) completion of an adult psychiatry specialty and (b) actively practicing the profession. Exclusion criteria were (a) specialization in child & adolescent psychiatry and (b) being employed exclusively in the public service sector. The study employed a non-probabilistic sampling procedure: first, the survey was mailed to approximately 1500 psychiatrists, members of the Hellenic Psychiatric Association. It should be noted that not all licensed adult psychiatrists in Greece are members of this association, and a small number of child and adolescent psychiatrists may also be included in this figure. Next, the study was shared by the researcher in two Facebook groups of psychiatrists. Finally, personalized invitation emails were sent to 582 private practice psy-

chiatrists with publicly available online email or contact details.

Study setting

Data collection was performed online via the LimeSurvey platform, ensuring anonymity. The study was designed in accordance with the principles of the Helsinki Declaration (2013) and the provisions of Regulation (EU) 2016/679 on the protection of personal data and was ethically approved by the Medical Ethics Committee of the University Mental Health, Neurosciences, & Precision Medicine Research Institute (UMHRI, ΕΠΙΨΥ; Decision no: 2345-13/11/2023).

Measures/Tools

Due to the lack of existing instruments, a structured, self-explanatory questionnaire was developed ab initio and subsequently reviewed by a psychiatrist specializing in the field of addiction to ensure content relevance and clarity. Although a formal pilot study was not conducted due to time constraints, this expert review served to enhance the face validity of the tool.

The questionnaire was designed to take no more than 10 minutes to complete and consisted of 62 items across four sections: (a) sociodemographic and clinical practice characteristics (18 questions), (b) exposure to and acceptance of substance use-treatment requests (4 questions), (c) clinical characteristics and management of accepted cases (30 questions), and (d) psychiatrists' reasoning for case denial and intention for accepting future requests (10 questions). Participants' exposure was assessed across five categories of illicit substances: (a) cannabis/cannabinoids, (b) heroin/other opioids (including non-prescribed use or abuse of opioid substitutes or agonists), (c) cocaine, (d) other stimulants (e.g., methamphetamine, amphetamine), and (e) other illicit substances. The complete English version of the questionnaire used in this survey is openly available in the Open Science Framework at: https://osf.io/kfma9/?view_only=e2d06030a9194c2ea8381c6244ce73ac.

Statistical analysis

Standard descriptive analyses were first conducted for the whole sample as a preliminary. The Pearson chi-square test for independence (with Bonferroni post hoc correction where applicable) or Fisher's exact test was used to investigate significant differences in the ratio of two characteristics expressed with categorical data. The student's t-test for independent samples was conducted to examine whether the mean of a continuous variable differed significantly between the two levels of a categorical variable. A level of $\alpha=0.05$ was used to re-

ject the null hypothesis and determine the presence or absence of statistically significant differences (although differences at $\alpha=0.1$ were also presented as a trend). All analyses were performed in SPSS (IBM Corp. Released 2023. IBM SPSS Statistics for Windows, Version 29.0.2.0 Armonk, NY: IBM Corp).

Results

Participant characteristics

A total of 100 private practice psychiatrists returned a valid questionnaire, 53.0% males with a mean age of 49.5 (SD=9.3) years (age range 30–75). More than half (54.0%) practiced exclusively in the private sector, while the remaining 46.0% were also employed in the public sector. The majority (59.0%) operated their private practices within the Athens/Attica region (table 1).

In their vast majority (83.0%), psychiatrists reported assessing substance use history during initial appointments, while 17.0% identified themselves as specialists in managing substance use cases. Cognitive-behavioral therapy was the most frequently utilized psychotherapeutic intervention, reported by 60.6% of participants (table 2).

Exposure to and acceptance of SUD-related treatment requests

Most of the participants (84.0%) reported encountering at least one ISUD-related treatment request in the past (table 3). Ranked in order, treatment requests most involved cannabis (80.0%), cocaine (64.0%), heroin/other opioids (51.5%), other stimulants (40.0%), and other illicit substances (15.0%) (table 3).

Over half of the total sample (58.0%) accepted at least one treatment request. Acceptance rates were highest for cannabis (52.0% of the total sample) and cocaine (29.0% of the total sample) (table 3).

Prior exposure of psychiatrists to treatment requests for substance use was associated with having trained during their specialty at a substance use treatment unit ($p=0.003$), having received additional specialized training in addiction management beyond their specialty ($p=0.005$), and having current or past employment at a substance use treatment facility (vs never, $p=0.004$) (table 4).

Whether a private practice psychiatrist had previously accepted a treatment request for substance use appeared to be associated with having trained during their specialty at a substance use treatment unit ($p=0.001$), having specialized training in addiction management beyond specialty ($p<0.001$), having current or past employment with a substance use treatment facility (vs never, $p=0.002$), having specialized in SUD

Table 1. General characteristics of private practice psychiatrists (n=100).

	N (%)
Gender	
Male	53.0 (53)
Female	47.0 (47)
Age, years, Mean (SD)	49.5 (9.3)
Age groups	
30–34	3.0 (3)
35–39	11.0 (11)
40–44	14.0 (14)
45–49	25.0 (25)
50–54	23.0 (23)
55–59	11.0 (11)
60+	13.0 (13)
Country of medical degree acquisition	
Greece	83.0 (83)
Other	17.0 (17)
Educational level	
Bachelor's degree only	54.5 (54)
Master's degree	37.4 (37)
Doctoral degree	8.1 (8)
Country of medical specialty training	
Greece	90.9 (90)
Other	9.1 (9)
Training in a substance use treatment unit during a specialty	
Yes	63.6 (63)
No	36.4 (36)
Additional training in substance uses disorders beyond specialty	
Yes	44.4 (44)
No	55.6 (55)
	N (%)
Practice setting	
Exclusively private	54.0 (54)
Private and public/non-governmental organizations	46.0 (46)
Employment or collaboration with substance use treatment facilities	
Yes, currently	9.0 (9)
Yes, in the past	29.0 (29)
No, never	62.0 (62)
Years of practice as a private practice psychiatrist, years, mean (SD)	13.7 (9.9)
Private office location	
Attica (Athens)	59.0 (59)
Central Macedonia (Thessaloniki)	18.0 (18)
Other regions	23.0 (23)
Urbanicity of private office location	
Regional capital, city center	49.5 (49)
Regional capital, neighborhood near city center	18.2 (18)
Regional capital, city suburb	28.3 (28)
Other areas of the region	4.0 (4)

Table 2. Characteristics of the therapeutic/clinical approach of participants in the study (n=100).

	N (%)
Assessment of substance use history	
Yes, always	83.0 (83)
Depending on the clinical presentation	16.0 (16)
No	1.0 (1)
Self-reported specialization in substance uses disorder management	
Yes	17.0 (17)
No	83.0 (83)
Therapeutic approaches beyond pharmacological treatment*	
Cognitive-behavioral therapy	60.6 (57)
Psychodynamic psychotherapy or psychoanalysis	31.9 (30)
Motivational interviewing	30.9 (29)
Systemic therapy	17.0 (16)
Dialectical-behavioral therapy	4.3 (4)
Other therapeutic approaches (e.g., existential, Gestalt, etc)	7.4 (7)

*In general, regardless of the type of case

management ($p=0.017$), and additionally utilizing motivational interviewing ($p=0.011$) (table 4).

Reasons for declining SUD-related treatment requests

Nearly one-third (31.0%) of those who received treatment requests for ISUD declined to accept such cases. The majority cited the belief that these cases require management in specialized settings, with refusal rates ranging from 53.6% for other stimulants to 79.5% for heroin/opioids. Additional reasons for decline included insufficient training, lack of interest, and other factors (figure 1).

Intention to accept future ISUD-related treatment requests

Regardless of the substance involved or their prior experience, approximately two-thirds (63.6%) of the participants responded that they would accept the next ISUD-related treatment request. Cannabis was the most likely substance to be accepted (61.6%), followed by cocaine (31.3%), other substances (24.2%), other stimulants (16.2%), and heroin/opioids (13.4%). Regardless of the substance, psychiatrists who had previously accepted similar cases were significantly more likely (93.1%) to accept subsequent requests, compared to those without prior acceptance (19.2%, $p<0.001$). This difference remained statistically significant across all substance categories except for "other substances", where psychia-

Table 3. Characteristics of (a) exposure to and (b) management of treatment requests related to SUD, by private practice psychiatrists participating in the study, by substance type.

Substance Type	Exposed (for the entire sample, n=100)	Accepted (among those who were exposed)	Accepted (for the entire sample, n=100)
	% (N)	% (N)	% (N)
Any substance*	84.0 (84/100)	69.0 (58/84)	58.0 (58/100)
Cannabis/Cannabinoids	80.0 (80/100)	65.0 (52/80)	52.0 (52/100)
Cocaine/ Crack	64.0 (64/100)	45.3 (29/64)	29.0 (29/100)
Other stimulants	40.0 (40/100)	30.0 (12/40)	12.0 (12/100)
Heroin/Other opioids	51.5 (50/97)	22.0 (11/50)	11.0 (11/100)
Other substances	15.0 (15/100)	66.7 (10/15)	10.0 (10/100)

*Includes any of the categories: "cannabis/cannabinoids", "cocaine/crack", "other stimulants", "heroin/other opioids", or "other substances"

trists without prior experience were more likely (94.2%) to accept the next request compared to those with experience (63.6%, $p < 0.001$, although this finding should be viewed cautiously due to the small number of observations involved (table 5).

Characteristics of the SUD-related treatment cases

Participants were asked to estimate the percentage of ISUD cases that had previously sought treatment at public addiction treatment services. The response «in 0% of cases» was reported by 21.8% of psychiatrists for cannabis, 11.1% for cocaine, 27.3% for 'other stimulants', and 9.1% for heroin/opioids (not shown in Table). The most frequent response, «in 10% of cases,» was reported by 42.3% of psychiatrists for cannabis cases, 29.6% for cocaine, 36.4% for 'other stimulants', while the response «in at least 50% of cases» was reported by 72.7% of psychiatrists regarding heroin/opioids.

Participants were also asked about their treatment approaches for accepted ISUD cases. Pharmacotherapy was reported by 92.3% of the respondents for cannabis cases, 93.1% for cocaine, 91.7% for other stimulants, and 81.8% for heroin/opioids. Among psychosocial interventions, CBT (50% for cannabis, 62.1% for cocaine, 41.7% for other stimulants, 54.5% for heroin/opioids) and motivational interviewing (28.8% for cannabis, 27.6% for cocaine, 27.6% for other stimulants, 27.3% for heroin/opioids) were most frequently reported.

Furthermore, regarding concurrent alcohol abuse in cannabis cases, most psychiatrists (34.6%) reported «in 20% of cases», while 32.7% reported polysubstance use «in at least 50% of cases». For cocaine, 79.3% reported alcohol abuse and polysubstance use in at least 50% of cases. For "other stimulants", 58.3% reported alcohol

abuse and 66.0% polysubstance use «in at least 50% of cases». For heroin/opioids, 36.4% reported alcohol abuse in 20% of cases, while 81.8% noted polysubstance use «in at least 50% of cases.

Furthermore, participants were asked to estimate the comorbidity rate between ISUDs and other mental health disorders in cases accepted. The response «in at least 50% of cases» was reported by 62.7% of the participants for cannabis cases, 69.0% for cocaine, 75% for 'other stimulants', and 36.4% for heroin/opioids cases. Mood disorders were reported by 78.4% of the participants for cannabis cases, 82.8% for cocaine, 50% for 'other stimulants', and 45.5% for heroin/opioids. Personality disorders were reported by 81.8% for heroin/opioids, 69% for cocaine, 52.9% for cannabis, and 50% for other stimulants.

Discussion

Historically, the number of individuals with ISUDs who seek and ultimately receive treatment at addiction treatment centers has been considerably lower compared to the total number affected. While the demand for ISUD treatment at specialized centers in Greece is well-documented, the role of private practice psychiatrists remains underexplored. The primary aim of this study was to investigate the extent to which private practice psychiatrists in Greece encounter and accept treatment requests primarily related to illicit substance use. The findings revealed that, among those who participated in the study, many private practice psychiatrists had encountered such treatment requests, with most reporting accepting them. However, given the exploratory nature of the study and the limited response rate, these findings should be interpreted with caution.

By shedding light on a critical component of the country's ISUD-related treatment landscape, this exploratory study suggests that a part of the treatment demand for ISUD in Greece is channeled towards private practice psychiatrists.

The demographic and geographical distribution of the study sample closely aligns with official national

data, supporting its representativeness. Specifically, 53% of participants were male and 47% female, which is comparable to the 2023 data from the Panhellenic Medical Association, indicating that, out of 1,730 specialized adult psychiatrists, 58.15% were male (n=1,006) and 41.85% female (n=724). Regarding geographic distribution, 59% of the participants in the

Table 4. Results of bivariate analyses examining the relationship between demographic and professional characteristics, as well as therapeutic practices, with (a) exposure to and (b) taking on treatment requests related to substance use among private practice psychiatrists.

Variables	Exposure to treatment requests (for the entire sample, n=100)		p-value	Taking on of treatment requests (among those who were exposed)*		p-value [†]
	Yes (84.0%, n=84)	No (16.0%, n=16)		Yes (69.0%, n=58)	No (31.0%, n=26)	
Gender						
Male	88.7	11.3	0.160	70.2	29.8	0.730
Female	78.3	21.7		66.7	33.3	
Age (years), M (SD)	49.9 (8.6)	47.8 (12.4)	0.407 [‡]	50.3 (8.7)	48.8 (8.4)	0.441 [‡]
Country of medical degree acquisition						
Greece	81.9	18.1	0.294	67.6	32.4	0.766
Outside Greece	94.1	5.9		75.0	25.0	
Educational level						
Bachelor's degree	81.5	18.5	0.306	61.4	38.6	0.110
Master's degree/Doctorate/Postdoctoral	88.9	11.1		77.5	22.5	
Country of medical specialty training						
Greece	85.6	14.4	0.535	70.1	29.9	0.671
Outside Greece	77.8	22.2		57.1	42.9	
	Exposure to treatment requests (for the entire sample, n=100)		p-value	Taking on of treatment requests (among those who were exposed)*		p-value [‡]
	Yes (84.0%, n=84)	No (16.0%, n=16)		Yes (69.0%, n=58)	No (31.0%, n=26)	
Training in a substance use treatment unit during specialty						
Yes	92.1	7.9	0.003	79.3	20.7	0.001
No	69.4	30.6		44.0	56.0	
Additional training in substance uses disorders beyond the specialty						
Yes	95.5	4.5	0.005	90.5	9.5	<0.001
No	74.5	25.5		46.3	53.7	
Practice setting						
Only private	85.2	14.8	0.726	65.2	34.8	0.403
Private and Public/NPO	82.6	17.4		73.7	26.3	
Current/Previous Employment in a substance use treatment facility						
Yes	97.4	2.6	0.004	86.5	13.5	0.002
No	75.8	24.2		55.3	44.7	
Years of practice as a private practice psychiatrist, M (SD)	13.8 (9.4)	13.0 (12.4)	0.763 [‡]	14.3 (9.4)	12.7 (9.5)	0.504 [‡]

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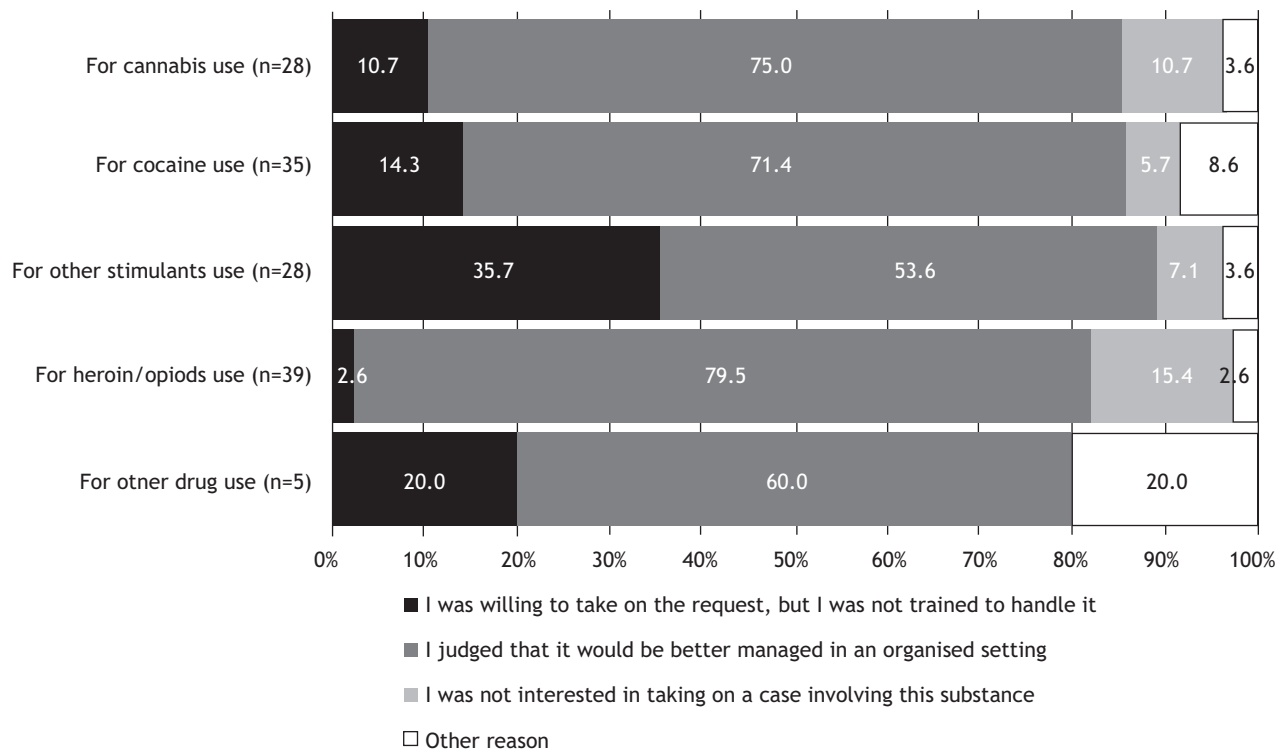


Figure 1. Reasons for declining treatment requests after exposure to them.

Table 5. Results of bivariate analyses examining the relationship between whether a private practice psychiatrist (a) has previously accepted a substance use treatment request and (b) is willing to accept the next similar request, by substance.

	Intention to accept future SUD treatment request	Intention to decline future SUD treatment request	p-value*
Regardless of the substance	(n=63)	(n=36)	
Has previously accepted a case	93.1	6.9	<0.001
Has never accepted a case	19.2	80.8	
Cannabis/ Cannabinoids	(n=61)	(n=38)	
Has previously accepted a case	94.2	5.8	<0.001
Has never accepted a case	25.0	75.0	
Cocaine/ Crack	(n=31)	(n=68)	
Has previously accepted a case	82.8	17.2	<0.001
Has never accepted a case	14.3	85.7	
Other stimulants	(n=16)	(n=83)	
Has previously accepted a case	50.0	50.0	0.005
Has never accepted a case	7.1	92.9	
Heroin/ other opioids	(n=13)	(n=84)	
Has previously accepted a case	90.0	10.0	0.017
Has never accepted a case	20.0	80.0	
Other substances	(n=24)	(n=75)	
Has previously accepted a case	63.6	36.4	<0.001
Has never accepted a case	94.2	5.8	

Note. *Fisher's exact test used unless otherwise specified

current study reported having a private practice in the region of Attica, 18% in Central Macedonia, and 23% in other regions of Greece. These figures are generally aligned with national statistics from 2023, which report that 49% of private practice psychiatrists were based in Athens (Attica), 17% in Central Macedonia, and approximately 33.87% in other regions. Findings showed that 84.0% of private practice psychiatrists who participated in the study encountered an ISUD treatment request in the past 12 months, with 58.0% accepting at least one. These results indicate that, apart from public addiction treatment centers, the affected individuals may seek and potentially receive treatment from private practice psychiatrists. This finding has important clinical implications, as it reveals that private psychiatric practices may serve as an alternative access point for ISUD treatment, particularly for individuals who may not meet admission criteria or prefer not to engage with structured public services. This underscores a need to strengthen addiction-related training for psychiatrists, both by enhancing the addiction curriculum during psychiatry specialty training and by offering targeted educational initiatives, including continuing professional development programs focused on the assessment and management of substance use. Such efforts could better equip office-based psychiatrists to respond appropriately to ISUD requests.

Ranked in order, psychiatrists received treatment requests for cannabis, cocaine, heroin/opioids, other stimulants, and other illicit substances. When comparing these findings with data from the 2022 Annual Drug Report, which estimated approximately 2,000 treatment requests for opioids, 1,000 for cannabis, and 500 for cocaine and stimulants, notable disparities emerge between treatment-seeking behaviors in private and public sectors.⁴ Specifically, opioid users may be more likely to seek treatment in public centers, while those using other substances may prefer private treatment. This likely reflects the lower socioeconomic status of opioid users, limiting access to private treatment, and their probable preference for substitution therapy, which is exclusively provided by public addiction services in Greece.^{3,17} This finding underscores the lack of structured pathways or guidance for ISUD care in private practice settings in Greece. This points to potential areas for policy development, such as the integration of addiction-focused resources or referral networks accessible to private practitioners. These additions would aim to strengthen the capacity of office-based psychiatrists to respond effectively and ethically to ISUD treatment demand.

An association was found between psychiatrists' exposure to treatment requests for illicit substance use

and their specialized training in addiction, experience working in specialized treatment facilities, and training in substance use departments during their specialty, while a trend toward a higher likelihood of encountering such treatment requests was observed among psychiatrists who self-reported specializing in addiction management. These findings align with prior studies that highlight the preference for psychiatrists with addiction expertise among individuals with SUDs.¹⁴

Additionally, an association was found between psychiatrists' acceptance of treatment requests and their specialized training in addiction, experience working in specialized addiction centers, self-reported specialization in addiction, and use of motivational interviewing. Psychiatrists most often accepted treatment requests for cannabis, "other substances" and cocaine use, followed by 'other stimulants', and least for heroin and opioids. This trend could reflect both clinical and contextual factors. For example, given the limited efficacy of pharmacotherapy for cannabis and cocaine use disorders,^{18,19} these cases may be viewed as more appropriate for outpatient, office-based psychosocial interventions, such as those offered in private psychiatric practices, and may motivate private practice psychiatrists to accept these requests.

The study also examined whether previous treatment-seeking behavior in specialized addiction treatment centers among patients who approached private practice psychiatrists was associated with the location of their practice, hypothesizing that psychiatrists outside urban centers would encounter more untreated patients due to accessibility issues.^{8,20,21} However, such an association was not supported, likely because both urban and rural areas in Greece have a sufficient number of public addiction treatment facilities, which may mitigate the impact of geographic location on treatment-seeking behavior.³

One-third of participants declined treatment requests, with most suggesting that these cases would be better managed in a structured setting. This finding is not consistent with previous research findings, which indicated a higher percentage of psychiatrists were not willing to accept such treatment requests.²² A further finding was that psychiatrists who had previously accepted ISUD cases were more likely to accept future cases, particularly those involving the use of cannabis and cocaine. Moreover, a positive association was found between prior acceptance of cases involving substance use by psychiatrists and their intention to accept similar subsequent cases, compared to their peers who had never accepted such cases before. This pattern likely reflects a familiarity or exposure effect, whereby repeated clinical

encounters with specific ISUD presentations enhance psychiatrists' confidence, perceived competence, and willingness to engage in treatment. Given that cannabis and cocaine were the most frequently encountered substances in this study, their higher acceptance rates may stem from increased clinical exposure, particularly in private practice settings where such cases are often managed through psychosocial interventions.

This study also examined the characteristics of accepted cases. Most psychiatrists reported that at least half of heroin/opioid users had previously sought treatment at public addiction centers, while the rate for other illicit substances was about one in ten. This finding reflects the barriers to accessing addiction services, as noted in previous studies.^{6,7,9,10,20,21} For cases involving cocaine and other stimulants, most psychiatrists reported that at least half the cases also abused alcohol. In contrast, for cases involving cannabis, heroin/opioids, about one-fifth of cases displayed alcohol abuse. These findings align with those of previous studies.^{23–27}

Additionally, most psychiatrists reported that around half of cannabis and 'other stimulants' users also abused other illicit substances. Regarding opioid and cocaine users, there was a near consensus among respondents that at least half cases were also abusing other illicit substances. These findings align with previous studies showcasing high levels of polysubstance use among substance users.^{28–34} The comorbidity rate of ISUDs with other mental health disorders was also investigated. Furthermore, most psychiatrists treating patients with cannabis, cocaine, or other stimulant use identified comorbidity, particularly with mood and personality disorders, in at least half of these cases. These findings align with previous research indicating increased treatment-seeking behavior in cases involving comorbidity.^{24,26,27,34–37}

The study also explored whether comorbidities and concurrent alcohol or polysubstance use influenced psychiatrists' willingness to accept similar future treatment requests. These correlations were not supported. However, psychiatrists with more experience treating opioid users with concurrent illicit substance use were more likely to accept future cases, possibly reflecting expertise in addiction management.

Regarding treatment approaches utilized, pharmacotherapy was used by most participants. This may reflect the high prevalence of comorbid mental disorders in those seeking treatment, as noted in prior studies.^{38–40} Among psychotherapeutic interventions, CBT and motivational interviewing were most utilized. The effectiveness of these interventions is supported by prior studies^{18,41–43} while a recent study suggests combining

pharmacotherapy with psychotherapy as the most effective.⁴⁴ This suggests that private practice psychiatrists who are equipped with diverse therapeutic tools may be better positioned to manage ISUDs in complex, comorbid presentations, which are frequently seen in private practice contexts.

Despite the study's low response rate, the findings offer valuable insights derived from psychiatrists with demonstrated interest or clinical exposure to ISUDs. Such participants probably represent the segment of private practice psychiatrists most likely to encounter and manage ISUD cases in real-world settings. Their responses thus provide expert-informed perspectives that enhance the study's relevance, particularly in the absence of prior national data on this topic. While the generalizability of findings is limited, their exploratory value remains substantial, offering initial insights into practice patterns, training needs, and system-level gaps. As such, the study provides foundational knowledge to inform future research, policy, and educational initiatives in office-based ISUD care.

While the study provides novel insights into an underexplored area, its findings should be considered considering several limitations. First, the relatively low response rate and sample size represent a significant limitation that may affect the generalizability of the findings. Such a low level of participation increases the risk that the sample is not representative of the broader population of private practice psychiatrists in Greece, and therefore, caution is warranted when attempting to extrapolate the findings, as estimates derived from this sample may not accurately reflect the attitudes or experiences of the general private psychiatric community. Although we aimed to assess a large sample of private practice psychiatrists and despite our efforts to increase participation, this low participation rate may be explained by specific factors related to the thematic focus of the study. Specifically, the field of addictions constitutes a specialized area within psychiatry, with a limited number of professionals having relevant experience and active involvement. Consequently, there might be a difference in characteristics between participating and non-participating psychiatrists, as those who were more experienced in treating ISUDs were probably more likely to respond. Moreover, the method of approaching participants via email assumes that the survey reaches only psychiatrists who regularly check their emails and are willing to participate, meaning that responses may not be random or fully representative of all psychiatrists in the country. This nonresponse bias could potentially exaggerate the prevalence of ISUD treatment demand in private psychiatric practice. Additionally, as HPA membership is voluntary, not all

private practice psychiatrists in Greece are registered with the association, further limiting the representativeness of the sample. Moreover, the study specifically focused on private practice psychiatrists and treatment requests addressed to them — a topic that may be perceived as private or sensitive — and this may have led some professionals to hesitate to take part due to the nature of their personal clinical practice. A second limitation lies in the inherent constraints of cross-sectional methodology, which allow for the identification of associations but preclude any inference of temporal sequence or causality between variables. Third, recall bias constitutes a notable limitation, as the study's data depended on participants' retrospective self-reporting of their experiences over the past 12 months. Such reliance on memory may have introduced inaccuracies or omissions, potentially affecting the validity and reliability of the reported exposure to and management of ISUD-related treatment requests.

Despite these limitations, the study's originality and the insights it provides help to balance these challenges. This is the first study in Greece to explore this topic,

shedding light on key information about the characteristics and services offered by private practice psychiatrists for ISUDs. For the first time, it was shown that illicit drug users in Greece seek treatment from both public addiction services and private practice psychiatrists. Psychiatrists were more frequently exposed to and accepted cases involving cannabis and cocaine use, while those who declined ISUD treatment requests most often reported that these cases would be better managed in a specialized setting. Future research should further explore the characteristics of patients treated for ISUDs in private settings, as well as the services provided to them, while policy and educational initiatives should be developed to support psychiatrists in private practice in managing such cases effectively.⁴⁵

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Ερευνητική εργασία

Έκθεση και ανταπόκριση των ιδιωτών ψυχιάτρων στην Ελλάδα σε αιτήματα θεραπείας για τη χρήση παράνομων ουσιών: Έρευνα επισκόπησης συγχρονικού τύπου

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ΠΕΡΙΛΗΨΗ

Οι εξαρτήσεις σε παράνομες ουσίες αποτελούν μείζον πρόβλημα της δημόσιας υγείας. Τα άτομα με προβλήματα χρήσης ουσιών αναζητούν θεραπεία κυρίως σε εξειδικευμένες δομές απεξάρτησης, ωστόσο δεν είναι γνωστός ο ρόλος, η έκθεση και η ανταπόκριση των ιδιωτών ψυχιάτρων στην Ελλάδα σε πιθανά αιτήματα θεραπείας για τη χρήση ουσιών. Σκοπός της παρούσας εργασίας είναι η διερεύνηση της έκτασης της έκθεσης και του τρόπου ανταπόκρισης των ιδιωτών ψυχιάτρων σε αιτήματα θεραπείας για τη χρήση ουσιών, καθώς και η μελέτη των χαρακτηριστικών των ασθενών με σχετικά αιτήματα που απευθύνονται σε αυτούς. Πραγματοποιήθηκε συγχρονική μελέτη μέσω ανώνυμου ηλεκτρονικού ερωτηματολογίου, που απεστάλη στις ηλεκτρονικές διευθύνσεις ιδιωτών ψυχιάτρων την περίοδο Ιανουαρίου - Φεβρουαρίου 2024. Συνολικά ανταποκρίθηκαν 100 ιδιώτες ψυχίατροι, η πλειονότητα ήταν άνδρες (53%), με μέσο όρο ηλικίας τα 49,5 έτη (ΤΑ: 9,3) και 13,7 έτη επαγγελματικής εμπειρίας (ΤΑ: 9,9). Η πλειονότητα των συμμετεχόντων (84.0%) είχε εκτεθεί σε αίτημα θεραπείας για χρήση παράνομων ουσιών τους τελευταίους 12 μήνες, ενώ 69,0 % αυτών (58% του συνόλου) ανέλαβαν τέτοιο περιστατικό. Συχνότερα αναλήφθηκαν αιτήματα για κάνναβη και κοκαΐνη/κρακ. Επιπλέον, αναφέρθηκαν υψηλά ποσοστά συννοσηρότητας με άλλες ψυχικές διαταραχές, προβληματική χρήση αλκοόλ και πολλαπλή χρήση ουσιών στα αναληφθέντα περιστατικά. Συχνότερα προτιμήθηκαν η φαρμακοθεραπεία και η γνωσιακή συμπεριφορική θεραπεία ως θεραπευτικές επιλογές. Υψηλότερα ποσοστά ανάληψης είχαν οι ιδιώτες ψυχίατροι με ειδική κατάρτιση σε θέματα εξαρτήσεων ($p<0,001$), με εμπειρία απασχόλησης σε δομή θεραπείας για χρήση ουσιών ($p=0,002$), με αυτοαναφερόμενη εξειδίκευση στη διαχείριση περιστατικών χρήσης ουσιών ($p=0,017$), με άσκηση στον χρόνο ειδικότητας σε τμήμα ουσιοεξαρτήσεων ($p=0,001$) και όσοι εφάρμοζαν κινητοποιητική συνέντευξη ($p=0,011$). Η πλειονότητα των συμμετεχόντων που δεν ανέλαβαν αιτήματα (~70%) έκριναν καταλληλότερη τη διαχείριση σε εξειδικευμένη υπηρεσία. Το 63.6% δήλωσαν ότι θα αναλάμβαναν μελλοντικό αίτημα -με σημαντικά υψηλότερο ποσοστό (93,1%) να αφορά όσους είχαν αναλάβει στο παρελθόν ανάλογο αίτημα, συγκριτικά με όσους δεν είχαν (19,2%, $p<0,001$). Συμπερασματικά, φάνηκε ότι πέραν των εξειδικευμένων δομών, οι ιδιώτες ψυχίατροι στην Ελλάδα, επιπλέον, εκτίθεται και αναλαμβάνουν αιτήματα θεραπείας για τη χρήση ουσιών, με, συχνότερα να αφορούν σε χρήση κάνναβης και κοκαΐνης. Προτείνεται περαιτέρω μελέτη των χαρακτηριστικών των ασθενών με χρήση ουσιών που θεραπεύονται σε ιδιωτικά πλαίσια και των παρεχόμενων υπηρεσιών σε αυτούς.

ΛΕΞΕΙΣ ΕΥΡΕΤΗΡΙΟΥ: Ιδιώτες ψυχίατροι, εξαρτήσεις, διαταραχές χρήσης ουσιών, αιτήματα θεραπείας, αντιλήψεις.