The Nevada Problem Gambling Project: Follow-Up Research

October 19, 2015

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PROJECT ACKNOWLEDGMENTS, APPRECIATION, AND DISCLOSURES

First of all, this research team owes a tremendous debt of gratitude to those who have supported this project through the Nevada Grants Management Unit. These devoted souls include, most prominently: Pat Petrie and Lori Olson, who were always around to answer questions or to help out when participants needed a nudge. Behind them (and us) are the tireless and committed volunteers on the state's Advisory Committee on Problem Gambling. And of course, we are exceedingly grateful for the kind participation of both the clinics and their clientele.

Our intellectual debts are substantial, and allow us to thank an all-star cast of experts: Tim Christenson, formerly of the state of Arizona and the National Association of Problem Gambling Service Providers, Dr. Jeffery Marotta of Problem Gambling Solutions, Dr. Tim Fong and Dr. Brett Abarbanel at the UCLA Medical School Center for Gambling Studies, Dr. Juan Ramirez at the University of Nebraska, Paul Potter at the state of Oregon, and Keith Whyte of the National Council on Problem Gambling. All, remarkably, share some ownership of this important academic and human exercise on measuring problem gambling approaches.

Next we thank our UNLV International Gaming Institute staff – especially Nakia Jackson-Hale, Katherine Jackson, and Patty Rice. Robin Toles deserves special mention, as she and Tom Piechota, VP of Research, have been strong supporters of this work throughout. At the Department of Sociology, Robert Futrell has allowed us use of so many of his resources to help keep this project running smoothly. Finally, the university's Office of Sponsored Programs is a place that brims with all sorts of competence: including the highly able Monica Bolden and David Paul.

And of course, at a more immediate and intimate level, our backbone is our research team. We are indeed a proud "research factory," as one of our astute team members put it, and our weekly meetings over the past two years ensured that research challenges both mild and moderate were attended to immediately. Their co-authorship status on the title page reflects their substantial academic input on all phases of this research.

Disclosures: The UNLV International Gaming Institute serves as a global academic resource for gaming industry stakeholders, and as such engages in research and teaching for industry, government, and non-profit entities. During the three-year course of this project, Dr. Bo Bernhard received funding from the Nevada Department of Health and Human Services, the Nevada Governor's Office of Economic Development, and on research and advising projects for the Japanese Government, the Saipan Government, Bull Venture Gaming, Caesars Entertainment, Wynn Resorts, IGT, MGM Resorts, Paragon Gaming, Techlink Entertainment, Ocho Gaming, and the Las Vegas Sands Corporation. Finally, he has spoken at international conferences sponsored by academic, government, and industry sources, and he has received travel and honoraria for doing soNone of the other study authors have disclosures.

EXECUTIVE SUMMARY

"It just saved my life; in 6 weeks it saved my life. I just can't say enough about it."

"I am very grateful for this program; I hope it stays around for a long time, it saved my life."

"I could not have done it without this program, and I hope that it never stops because there are always going to be people with addictions out there. I could have never been to this point—ever. That program saved my life."

The Nevada Problem Gambling Project's objective is to provide research-based insights on the effectiveness of Nevada's state-funded treatment programs. This research is informed by two primary resources: 1) the peer-reviewed literature on problem gambling treatment evaluation[1], and 2) a specific framework suggested by the leading experts in state-supported problem gambling treatment (including those on Nevada's Advisory Committee on Problem Gambling). Using the Mental Health Statistics Improvement Program (MHSIP) questionnaire, questions about previous and current gambling and other addictive behaviors, and open ended questions, we gathered information on problem gamblers' evaluation of their treatment services, the impact of those services on quality of life and functional well-being, and the relationship between service quality and reductions in gambling behaviors.

Overall, the treatment participants we interviewed provided very positive assessments in an impressive variety of spheres – including access to services, treatment quality and helpfulness, treatment effectiveness, and overall ratings of the quality of service. Over 80% of respondents provided positive ratings for almost every item on the survey. Based on our analysis of both quantitative and qualitative data, we found that respondents were most positive about the cost of treatment services, treatment access, group counseling, the educational information provided, and the bonds they shared with their peers in treatment.

Although participation in treatment appears to help addicts abstain from gambling during their actual time in treatment, just under half of respondents indicated that they had gambled again a year after entering treatment– an unsurprising rate in the addiction field. As gambling scholars move away from pure abstinence models, it is important to understand how gambling treatment can help to reduce levels of gambling and the harms associated with gambling. We found that almost all (92.1%) participants have reduced their levels of gambling since entering treatment.

[1] To see a comprehensive review of the literature on problem gambling treatment evaluation, see Bernhard, Bo J., Shannon Monnat, Sarah A. St. John, and Brett L. L. Abarbanel. 2010. "The Nevada Problem Gambling Project: Follow-Up Research." Available at http://dhhs.nv.gov/Grants/Meeting%20Materials/ACPG/10-14-10%20Meeting/V-b.%20Nevada%20Problem%20Gambling%20Project%20Follow-Up%20Final%20(10.4.10).pdf; and Monnat, Shannon, Bo J. Bernhard, Brett L. L. Abarbanel, Sarah St. John, and Ashlee Kalina. 2014. "Exploring the Relationship between Treatment Satisfaction, Perceived Improvements in Functioning and Well-being and Gambling Harm Reduction among Clients of Pathological Gambling Treatment Programs." Community Mental Health Journal 50(6):688–696.

Ultimately, treatment program participants expressed feelings of self-awareness, acceptance, achievement, and hope after the completion of their treatment. Given these clients' desperate statuses when they arrived at these clinics, these pages reveal dramatic improvements. Participants indicated that these programs helped to increase their confidence, empower them, give them the strength to avoid gambling, and in many cases, saved their lives. These strong outcomes represent a genuine victory for those dedicated to helping problem gamblers turn their lives around in the state of Nevada – and super-emphasize how crucial continued support is for these programs.

INTRODUCTION

The data provided in this report come from confidential follow up interviews of clients who have received treatment or enrolled in one of the five state-funded problem gambling treatment programs. Our methodological processes were approved by UNLV's human subjects committee (protocol 711298). This list details our data collection process:

- All clinics receiving funding from the state were asked to provide contact phone numbers for all clients who completed an intake interview. During the intake interview, clients were informed of this project and asked for their contact information and consent to be contacted for the follow up interview. The individual clinics were responsible for obtaining signatures from all clients indicating that they agreed to participate in confidential follow-up interviews.
- The research assistant then attempted to contact every client a minimum of 4 times to conduct computer-assisted telephone interviews (at varying times of day and weekdays/weekends). If clients did not answer, generic, non-identifying messages were left indicating that they were being contacted for a compensated UNLV study, and that they could contact our office to let us know the best time to contact them.
- All clients who completed interviews were compensated with a $25 gift card to WalMart.
- All participants were read an informed consent statement describing the objectives of this research, informing them of their rights as a participant (including the right to refuse to participate), and detailing the strict confidentiality procedures of the research. Throughout the interview, clients were repeatedly reassured that their names would never be associated with their answers.
- All participants then verbally consented to participate.
- Clients were contacted at three different time points in their recovery process. The initial interview is conducted 30 days after completing an intake at a clinic. The second interview is conducted 90 days after intake, and the final interview is conducted 12 months after intake.

We conducted a total of 286 follow-up interviews with clients of 5 different gambling treatment programs: Bristlecone Family Resources, the Problem Gambling Center in Las Vegas, New Frontier Treatment Center, Reno Problem Gambling Center, and Pathways Counseling Center. The *N*s (completed interviews) associated with the clinics varied widely, with some clinics contributing significantly fewer completed interviews. During site visits at the clinics earlier this year, we discussed some of the inherent difficulties in this research process. Some of the clinics' client bases have higher numbers of clients in the criminal justice system, higher numbers of clients receiving other mental health services, and high numbers of clients who are at high risk and/or homeless. On a related note, our biggest research challenge is locating clients post-treatment; phone numbers are out of service or clients simply do not return calls. When attempting to locate a client without a valid phone number, we seek updated contact information from the clinic where the client received treatment. Predictably, we observe the most success contacting clients for the 30 day interview, followed by the 90 day interview, and the least success at the 12 month interview point.

EVALUATION OF TREATMENT SERVICES

The tables and figures below summarize ratings of items from the Mental Health Statistics Improvement Program (MHSIP), as well as additional questions specific to problem gambling. The first section presents data from all the clinics and is organized by time of interview (30 day, 90 day, 12 month). In the second section, we present clinic by clinic comparisons of the same data. To facilitate interpretation, we have broken the items down into four broad categories: access to treatment services ($\alpha = .906$)[2], treatment quality and helpfulness ($\alpha = .800$), treatment effectiveness ($\alpha = .958$), and overall ratings of treatment services ($\alpha = .853$). During the interviews, participants were asked to rate their level of agreement with various statements on a five-point Likert scale ranging from Strongly Agree (5) to Strongly Disagree (1). Scores closest to 5 indicate the strongest level of agreement.

We also asked participants open-ended questions about the quality of their treatment services. These questions were as follows:

- What was the most helpful part of the program for you?
- What was the least helpful part of the program for you?
- Were there any services that were not provided by the problem gambling treatment program that you would have liked to see provided?
- Finally, we asked participants if they would like to share any additional elements of their "story" with the research team.

We coded answers using inductive category development.[3] Where appropriate, we provide quotations from treatment participants that represent themes common to the perspective of the participants. These quotations elaborate on the quantitative data and provide a human voice to the experiences of those who completed the treatment program[4].

[2] Cronbach's alpha measures the internal consistency of items in a scale. Numbers approaching 1 indicate high internal consistency.

[3] Categories are developed based on frequency and significance, through a continuous process of coding and interpretation.

[4] Some quotations name specific staff at particular problem gambling treatment programs, but the collection of quotations throughout the report represent statements from participants engaging in treatment at all programs.

ACCESS TO TREATMENT SERVICES

The ability to easily access treatment services is arguably one of the most important components of recovery from addiction. If problem gamblers experience cost, transportation, or other access barriers, the likelihood that they will participate in treatment, and thereby recover from their addiction, declines dramatically. Clients expressed tremendous gratitude that services were available to them and expressed that they wished they knew about it sooner.

> *"I'm very grateful that the program is available and that it is nonjudgmental."*
>
> *"I was supposed to pay $10 per meeting, but Rick told me that I didn't need to worry about it because I had a hard time getting that money. I was grateful for that."*
>
> *"I'm amazed and delighted with the fact that these programs are basically free of charge if you can't afford them. Seeing a psychologist is going to cost you an arm and a leg. I would think that it is very underutilized. It is literally a life saver*."

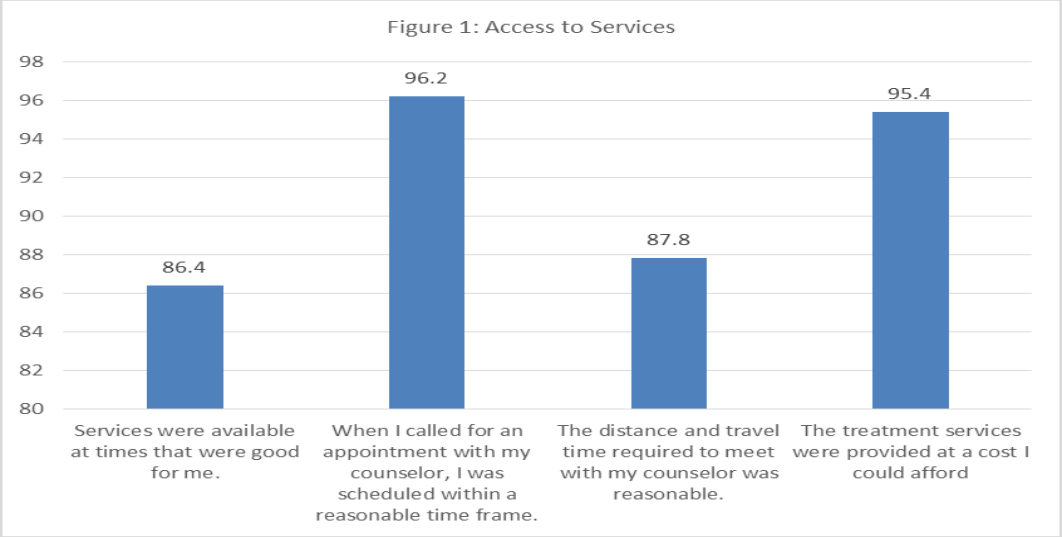
In the interviews, we asked program participants to evaluate five aspects of their access to treatment services. In Table 1 below, we display average scores for these five items. Overall, the mean scores are very high, indicating a strong level of agreement (average scores are above 4 meaning that the overall average is between "agree" and "strongly agree") with each of the positively worded statements. Participants were most positive about being scheduled for an appointment within a reasonable time frame (Item 2) and the affordability of their treatment services (Item 4).

Table 1. Average Ratings of Access to Services

ACCESS TO SERVICES	**Average Scores**
(Cronbach's α = .906)	
1. Services were available at times that were good for me.	4.32
2. When I called for an appointment with my counselor, I was scheduled within a reasonable time frame.	4.61
3. The distance and travel time required to meet with my counselor was reasonable.	4.28
4. The treatment services were provided at a cost I could afford.	4.67

Note: These questions are only asked on the 30 day follow-up questionnaire, as responses are unlikely to change over time. In contrast, evaluation of treatment received and satisfaction with services may change as time passes.

Figure 1 presents the percentage of participants who agreed or strongly agreed with each statement related to access to treatment services. Clients are overwhelmingly positive about their access to treatment services.



TREATMENT QUALITY AND HELPFULNESS

In Table 2, we present average scores by length of time since starting treatment for items related to the quality of treatment and the helpfulness of treatment staff and services. Treatment participants responded most positively to items measuring staff encouragement and group counseling. Overall, participants provided extremely positive feedback about the quality and helpfulness of the services they received. All average scores are over 4, indicating an overall average between strongly agree and agree.

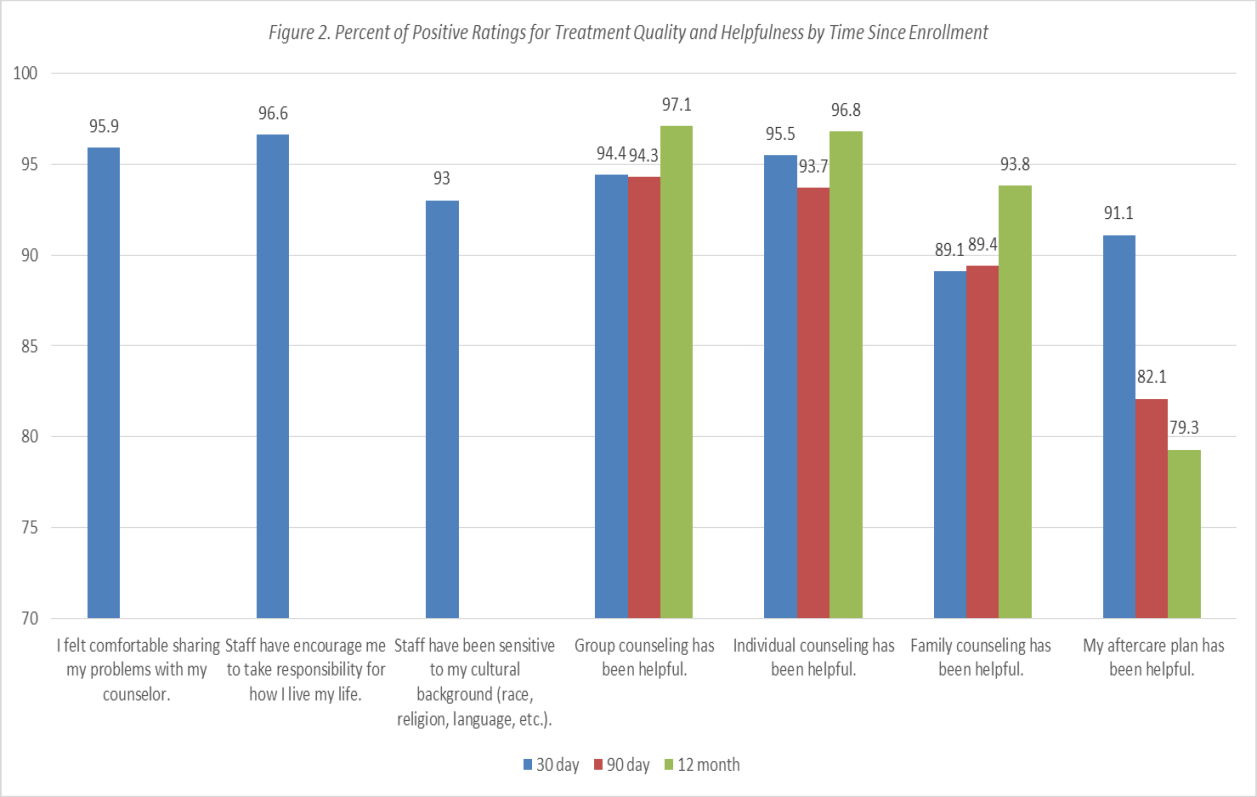
Table 2. Average Ratings of Treatment Quality and Helpfulness

TREATMENT QUALITY and HELPFULNESS	**Average Scores**		
(Cronbach's α = .800)	*30 day*	*90 day*	*12 month*
5. I felt comfortable sharing my problems with my counselor.	4.63	--	--
6. Staff have encouraged me to take responsibility for how I live my life.	4.66	--	--
7. Staff have been sensitive to my cultural background (race, religion, language, etc.).	4.50	--	--
8. Group counseling has been helpful.	4.64	4.64	4.65
9. Individual counseling has been helpful.	4.63	4.62	4.68
10. Family counseling has been helpful.	4.46	4.39	4.38
11. My aftercare plan has been helpful.	4.43	4.22	4.10

Note: None of the differences between the 30 day, 90 day, or 12 month group are statistically significant. Items 5-7 are only asked on the 30 day questionnaire.

Figure 2 below represents the percentage of participants who positively rated the quality and helpfulness of their treatment. Over 90% of participants agreed or strongly agreed that they felt comfortable sharing their problems with their counselor, that staff encouraged them to take responsibility for how they lived their lives, that staff were sensitive to their cultural

backgrounds, and that group and individual counseling services were helpful. Over 80% of participants agreed or strongly agreed that family counseling was helpful. Participants in the 12 month survey reported slightly less satisfaction with aftercare services and slightly more satisfaction with family counseling than the rest of the sample, but these differences are not at a level that is considered to be statistically significant.



Note: None of the differences between the 30 day, 90 day, or 12 month group are statistically significant.

GROUP COUNSELING

The importance of group counseling was expressed most strongly in the answers program participants provided to the open-ended question asking about the most helpful aspect of their treatment services ("What was the most helpful part of the program for you?"). In fact, group counseling was the most praised component of program services among all participants. A small percentage of participants expressed feeling insecure while sharing their personal experiences with the group or not feeling the camaraderie that they had expected with a particular group; however, they were appreciative that the programs have different types of treatment options available and are willing to work with clients to give them the type of help they want and what they think will work best to address their gambling problems.

The comments below reflect the overwhelming satisfaction that clients have with the group therapy format:

"I was lucky that I came in at the right time because I got a really great group and we all feel like family going through this together."

"The group working together as a team was really helpful. You start to trust everyone in the group and feel comfortable."

"The most helpful is being in a group atmosphere and sharing our experiences and giving each other shoulders to lean on, so to speak."

"Hearing other people in the groups speak and knowing I can relate to them made me feel less alone than I was when I got there. That helped out a lot. It helped me realize that I can deal with the addiction a little better."

"They really get you to share. They can empathize too. It's good to know that you aren't alone."

"The group aspect of talking with other addicts was the most beneficial. I figured I was the only one who was doing that bad. I discovered that I wasn't alone. It was easier to deal with my problems when I realized I wasn't so stupid, doing stupid things, but not stupid."

"Having the support of other people in the group was really important. It helped to understand that you are not alone in the problem. At first it's hard to be in the group setting, but it's actually better once you get used to it."

"Everyone goes into it the same way, thinking you are special and that no one can really understand or think like you, but then you get in there and you see that others share this with you and you communicate, and it works."

Being in group therapy gives participants a sense that they are not alone and that their problems are surmountable. Many of them have expressed that, prior to treatment, they felt alone and that no one could understand what they were going through. In group therapy, they are able to see that so many others share their experiences and draw inspiration from those that have been successful in dealing with their gambling problems. They feel a sense of obligation to the group as well, which becomes motivating to them in times of uncertainty because they do not want to let down the group.

THE CLIENT-COUNSELOR RELATIONSHIP

Participants often talked about the quality of the relationships they had with their counselors and other staff at the clinics. They feel welcome, unjudged, supported, and in the hands of experts.

"Diane, I just like her so much. She seemed to really be somebody on my level who I needed to talk to. She made me feel real comfortable. She's easy to talk to, really good. She doesn't appear above you and treats you like an equal. I felt really comfortable because she isn't judgmental, and I knew that there was nothing she hasn't heard before."

"I really like my counselor. I really like dealing with people who really know how I feel. He really knows what he's talking about. He lets you know where you stand with him and he doesn't pull any punches."

*"I clicked with my counselor right away. The woman who answered the initial phone call did a fantastic job pairing me with my counselor. He is really great. I feel that I can be open and honest with him and no bullsh*t."*

"My counselor changed my life. She was so wonderful to me. She helped me see things in a different light and bring spirituality into it which I haven't paid attention to in a long time."

"My counselor Danni believed in me more than I believed in myself at the beginning. She had faith in me and knew I could do it. She drilled it into me that she knew I could do that program; it's one of the big successes in my life. I did that program! I really got through it."

"My counselor, she really understands my problems. I feel like I get all the help I need from her."

"The counselors were all so helpful in the way that they reach out and stay on top of you."

INFORMATION AND EDUCATION

Although we did not ask about the quality of the information presented during the treatment program in the questionnaire, several participants commented on how the information and education they received during their time in treatment was the most helpful part of the program for them. The knowledge they gained about how addictions operate gave these individuals the confidence and empowerment they needed to reduce or quit their gambling. A selection of quotations illustrating this idea is presented below:

"Dr. Hunter was all of our favorites because he made us understand why we did what we did, what happens to the brain and stuff. It was a phenomenal experience. He tells us about the psychology of how the mind works. He explained a lot of the physiological aspects of this disease."

"I learned more about the disease and how it affects the brain. How if even if you make one bet, it is a mistake for you."

"The way the Dr. Hunter structures the program around the science of the brain activity made all the difference for me."

"Coming to the understanding that I have wiring in my brain that I cannot affect. It was key to my understanding of what was going on that I needed to deal with in order to have a full recovery."

TREATMENT EFFECTIVENESS

Participants' ratings of access to and the quality of their treatment services are important indirect indicators of treatment effectiveness, but more direct measures of treatment effectiveness come from participants' self-reports of improvement in daily life functioning. In Table 3 below, we present mean scores for items that evaluate the extent to which treatment services have resulted in measureable improvements in personal, family, financial, professional, and overall well-being. For each of the positively worded statements below, participants were asked whether they had observed improvements in their lives "as a direct result of services [they] received." As with ratings of treatment services, items measuring treatment effectiveness were categorized on a 5 item Likert Scale from Strongly Agree (5) to Strongly Disagree (1), such that higher means represent greater agreement with the statement.

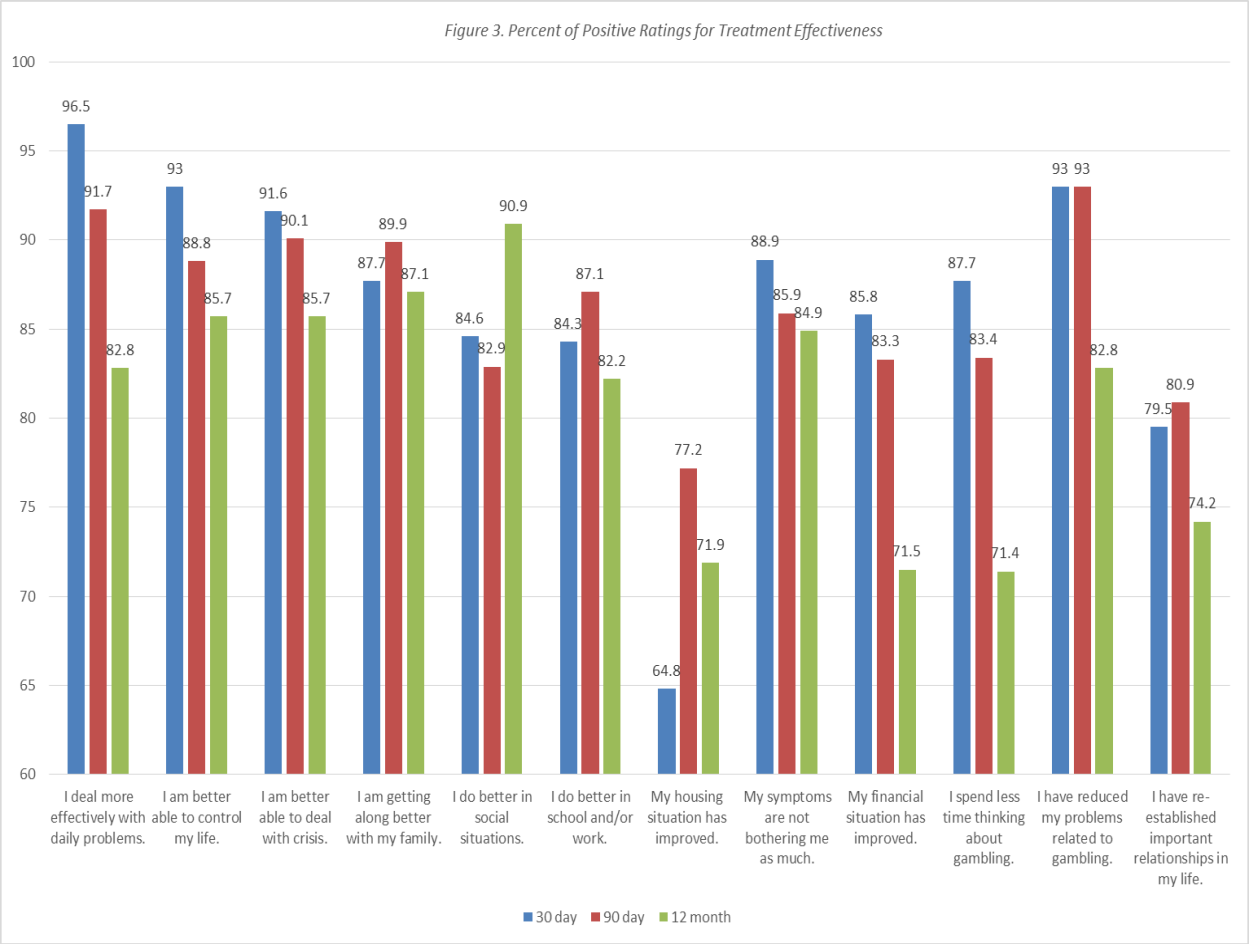
Table 3. Average Ratings of Treatment Effectiveness

TREATMENT EFFECTIVENESS	**Average Scores**		
(Cronbach's α = .929)	*30 day*	*90 day*	*12 month*
12. I deal more effectively with daily problems.	4.56	4.49	4.34
13. I am better able to control my life.	4.46	4.45	4.34
14. I am better able to deal with crisis.	4.46	4.39	4.31
15. I am getting along better with my family.	4.40	4.42	4.26
16. I do better in social situations.	4.23	4.24	4.33
17. I do better in school and/or work.	4.31	4.32	4.29
18. My housing situation has improved.	3.89†	4.21†	4.00†
19. My symptoms are not bothering me as much.	4.39	4.31	4.30
20. My financial situation has improved.	4.17†	4.29†	3.83†
21. I spend less time thinking about gambling.	4.39*	4.25*	3.83*
22. I have reduced my problems related to gambling.	4.46	4.47	4.23
23. I have re-established important relationships in my life.	4.19	4.26	4.17

*Note: *indicates that the differences between the 30 day, 90 day, and 1 year participants were statistically significant at the p<.05 level. † indicates only a slight significance at p<.10 level. All other measures showed no statistically significant difference between differently timed interviews.*

Overall, participants reported improvement in all categories of life functioning. The levels of observed improvement were highest for being able to deal more effectively with daily problems (Item 12), being able to better control one's life (Item 13), being able to better deal with crisis (Item 14), and getting along better with one's family (Item 15). Observed improvement was lowest for participants' housing and financial situations (Items 18 and 20). These two particular items are arguably the most difficult to improve over the course of treatment since they are influenced by external factors beyond the impact of treatment services. However, our data shows that the difference in scores on these two measures are slightly significant between the differently timed interviews, meaning that, over time, housing situations and financial situation improve for participants.

Figure 3 further illustrates the percentage of participants who strongly agreed or agreed with the statements on treatment effectiveness.



Note: None of the differences between the 30 day, 90 day, or 12 month group are statistically significant.

The effectiveness of treatment on reducing gambling behaviors and improving quality of life and well-being was also clear from the responses to the open-ended questions asked of participants.

> *"I'm not gonna be able to tell you that I'll never gamble again, but I use my tools and live one day at a time. I take that toolbox with me everywhere I go."*

> *"I'm just pleased with the whole program. It gave me the proper skills to face it and didn't just throw me out to the world."*

> *"I learned skills, so I know what to do when I want to do some gambling. I go to a ballgame or go to a lot more movies, miniature golf, and bowling. Just finding other things to do to keep me away from gambling."*

> *"In order to be successful, you need to learn the skills and you need to deal with the problem personally, and that's what they teach you there. I'm very grateful for it. My wife is grateful for it."*

"Understanding my disease; because you think you're nuts, but they explain to you exactly what is going on in your brain."

"I am learning about myself and how I'm using gambling as an escape."

"The best part was learning about my addiction; what my addiction actually is, about the chemical process of it, and how it works in my brain, and getting the tools to deal with it."

"I love seeing the families get back together. Seeing people fail and they still come back and do it over and over, so there is always hope. Sometimes you slip and you think you are a failure. You can just keep getting up as long as you have the breath of life in you."

Participants consistently spoke about how treatment helped them to become more self-aware and accept themselves, gave them feelings of hope, and gave them tools that helped them reduce their gambling behaviors.

OVERALL QUALITY

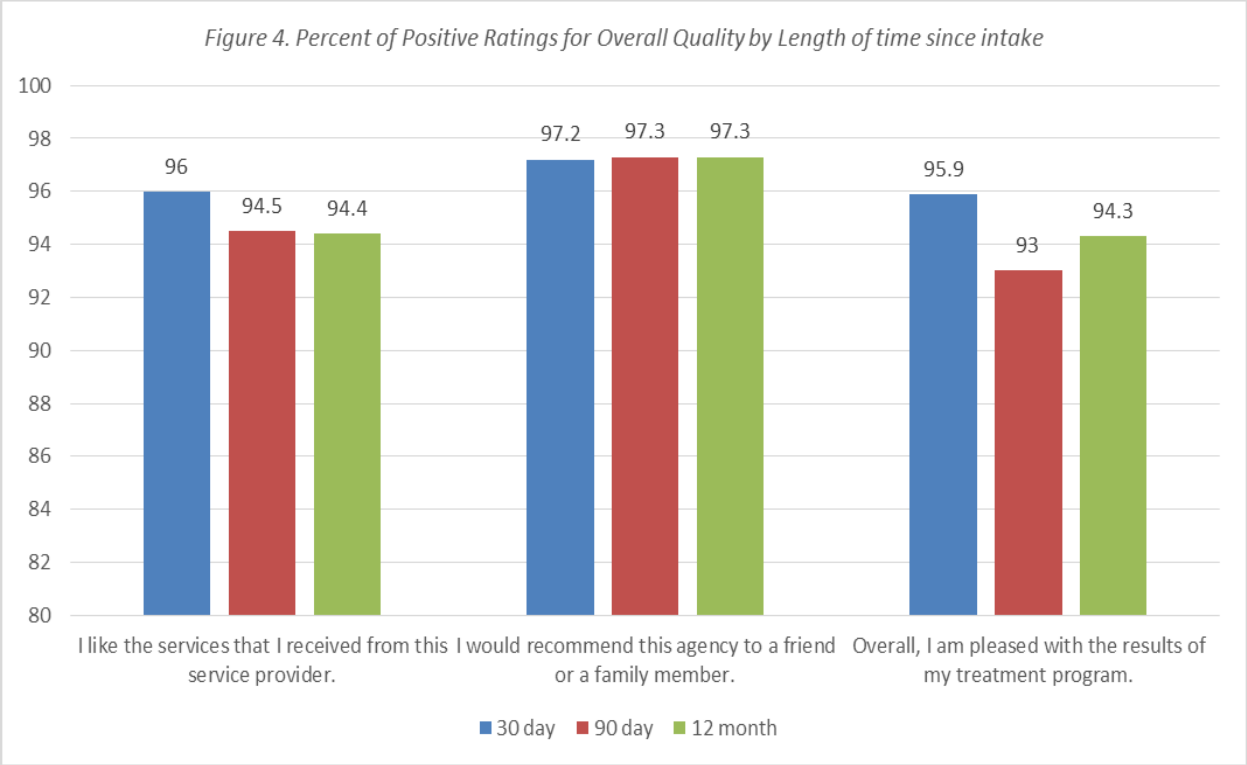
The fourth domain of the treatment evaluation included questions on the overall quality of the treatment. Results in Table 4 suggest that participants are overwhelmingly positive about the overall quality of the program. In fact, the item that asks participants if they would recommend the agency to a friend or a family member was one of the most positively rated items on the questionnaire.

Table 4. Average Ratings Overall Quality Indicators

OVERALL QUALITY	**Average Scores**		
(Cronbach's α = .861)	*30 day*	*90 day*	*12 month*
25. I like the services that I received from this service provider.	4.61	4.64	4.64
26. I would recommend this agency to a friend or a family member.	4.69	4.70	4.78
27. Overall, I am pleased with the results of my treatment program.	4.67	4.64	4.57

Note: None of the differences between the 30 day, 90 day, or 12 month group are statistically significant.

Figure 4 further demonstrates the strong level of agreement with statements asking participants about their overall experiences with the treatment program. Over 90% of participants agreed or strongly agreed that they liked the services they received, that they would recommend the agency to a friend or family member, and overall were pleased with their results.



Note: None of the differences between the 30 day, 90 day, or 12 month group are statistically significant.

When participants were asked about the least helpful components of the treatment program or what they would change about the program, they typically mentioned scheduling conflicts with groups that they wanted to attend, confrontational counselors, and the requirement that they participate in Gamblers Anonymous (GA) meetings. We discuss GA and other clinic-specific comments later in this report.

IMPACT OF SERVICES ON GAMBLING BEHAVIORS AND OTHER ADDICTIONS

We also asked participants a series of questions related to their prior and current gambling behavior and problems with other types of addictions – a challenge with significant ramifications for several of the state's treatment clinics. In addition to basic descriptive statistics in this section, we present Pearson correlation coefficients to demonstrate the extent to which participants' ratings of their treatment services are significantly associated with improvements in gambling behaviors.

GAMBLING BEHAVIORS

The impact of treatment services on gambling behaviors is impressive. Over 90% of all participants had reduced their gambling since the time when they gambled most heavily. Our findings suggest that participating in treatment helps addicts abstain from gambling during their actual time in treatment. Table 5 shows that engagement in gambling increases as time since intake in the program passes. The differences in gambling behaviors between the differently-timed interviews are statistically significant. At the 12 month interview, 17% of participants were not meeting their gambling goals, compared to only 9% at 30 days. Among these individuals, the most common types of gambling included slot machines and video poker.

Table 5: Current Gambling Behaviors

Which of the following statements best characterizes your gambling since enrolling in the program….	**% "Yes"**		
	30 day	*90 day*	*12 month*
28. ...I have not gambled since enrolling into the program.	65.1*	62.0*	47.2*
29. …I had one "slip" where I gambled, then got back on my recovery program.	13.1*	12.7*	19.4*
30. …I've had several "slips" since enrolling in the program and am back on track.	12.6*	9.9*	13.9*
31. … My goal is controlled gambling, and I am gambling and meeting my goal to gamble without problems.	0.6*	4.2*	2.8*
32. …I am not meeting my goal to stop or control my gambling.	8.6*	11.3*	16.7*
33. **Thinking back to the period of time when you gambled most heavily, have you reduced your gambling since this time?**	**92.5**	**91.7**	**90.9**

*Note: *The differences the 30 day, 90 day, or 12 month group are statistically significant at p<.05.*

Participants discussed the possibility of "slips" as part of their recovery process. They were able to use the tools they gained in treatment to help them get back into recovery after a relapse. Even when clients are not meeting their goals, they still reported feeling connected to the treatment program and welcome to come back.

> *"After one of my slips, Denise and Aaron and I decided that residential treatment was the best plan of action for me."*
>
> *"They were just very encouraging. They would always say, 'If you slip, come back, don't disappear.'"*
>
> *"People need to acknowledge gambling, just like drugs and alcohol. It's hard, it's not easy, we slip sometimes."*
>
> *"I really appreciate them being there for me. They are there even when relapses occur. There is constant support and lack of judgement and readiness of the therapist. They are brilliant. They are always there. I always feel that they are a moment away."*
>
> *"Some of the other people that have gone to classes have called me and tried to get me to go back, but I'm just not ready. I relapsed. I gamble every day and I drink too. I'm just not ready. If I get a dime, I gamble it."*

Table 6, on the next page, demonstrates several statistically significant correlations between reduction in gambling behaviors and evaluation of treatment services. The shaded boxes show items that are strongly correlated.

In order to assess reduction in gambling behaviors and harms from gambling, participants were asked the following questions:

- I spend less time thinking about gambling (5 pt Likert Scale)
- I have reduced my problems related to gambling (5 pt Likert Scale)
- Thinking back to the period of time when you gambled most heavily, have you reduced your gambling since this time? (Yes/No)
- Which of the following statements best characterizes your gambling since enrolling in the program? (meeting goals/ not meeting goals)
    - I have not gambled since enrolling into the program.
    - I had one "slip" where I gambled, then got back on my recovery program.
    - I've had several "slips" since enrolling in the program and am back on track.
    - My goal is controlled gambling, and I am gambling and meeting my goal to gamble without problems.
    - I am not meeting my goal to stop or control my gambling.

There is a statistically significant, strong, positive correlation between a reduction in problems related to gambling and evaluation of treatment services—specifically the overall satisfaction with the treatment program, family counseling, aftercare plan, individual counseling, encouragement of staff to take responsibility for their lives, and sensitivity of staff toward cultural issues. Simply put, the more strongly that participants feel they have reduced their problems related to gambling, the more highly they evaluate the services they received.

There is also a statistically significant, strong correlation between spending less time thinking about gambling and positive evaluations of family counseling, aftercare plan, treatment costs, and staff sensitivity toward cultural issues. As participants think less and less about gambling, their evaluation of treatment services increases.

There are several statistically significant correlations between currently meeting gambling goals and positive evaluations of treatment services. Most these correlations are weak; however, there is a strong correlation between currently meeting gambling goals and positively evaluating family counseling. Those who are currently not gambling or controlling their gambling strongly agreed that family counseling was helpful.

Table 6: Correlations between Reduction in Gambling Behaviors and Evaluation of Treatment Services

	I spend less time thinking about gambling	**I have reduced problems related to gambling**	**Reduced gambling since time when gambled most heavily**	**Currently meeting my goals to stop/ control my gambling**
Overall, I am pleased with the results of my treatment program.	.282***	.488***	.034	.392***
I like the services that I received from this service provider.	.236***	.384***	.023	.308***
I would recommend this agency to a friend or a family member.	.208***	.350***	.034	.321***
Family counseling has been helpful.	.407***	.569***	-.146	.568***
My aftercare plan has been helpful.	.419***	.627***	-.076	.298***
Individual counseling has been helpful.	.267***	.450***	-.088	.349***
Group counseling has been helpful.	.259***	.386***	-.050	.311***
I felt comfortable sharing my problems with my counselor.	.287***	.393***	.011	.331***
Staff encouraged me to take responsibility for how I live my life.	.256**	.450***	-.008	.374***
Staff were sensitive to my cultural background (race, religion, language, etc.).	.417***	.404***	.038	.301***
The treatment services were provided at a cost I could afford.	.407***	.123	.160*	.058
Services were available at times that were good for me.	.240***	.203**	.061	.194*
The distance and travel time required to meet with my counselor was reasonable.	.116	.147	.079	.284***
When I called for an appointment with my counselor, I was scheduled within a reasonable time frame.	.327***	.363***	-.057	.234**
I was encouraged to use Gamblers Anonymous or GamAnon on a regular basis.	.236**	.299***	-.041	.114
During my time in treatment, I attended Gamblers Anonymous or GamAnon on a regular basis	.264***	.309***	.073	.298***

Note: Positive correlations indicate that as ratings of services increase, agreement with the statement increases. Shaded cells indicate strong correlation.
****significant correlation at the p<.001 level; **significant correlation at the p<.01 level; *significant correlation at the p<.05 level.*

INVOLVEMENT IN SELF-HELP GROUPS

Several of the treatment programs encourage or require clients to participate in community support groups, such as Gamblers Anonymous (GA). Participants had mixed feelings about the effectiveness of GA. Some feel that GA is a good complement to problem gambling treatment, while others have expressed strong dislike for GA and 12-step programs in general.

Table 7 shows how strongly participants felt they were encouraged to use GA and whether they actually attended GA during their treatment program. Items were categorized on a 5-item Likert Scale from Strongly Agree (5) to Strongly Disagree (1), such that higher means represent greater agreement with the statement. Most participants were encouraged to use GA, although not as many actually attended GA while in treatment.

Table 7: Involvement in community support groups

GAMBLERS ANONYMOUS	**Average Scores**
Cronbach's α = .857	
33. During my treatment program, I *have been encouraged* to use Gamblers Anonymous and/or GamAnon or another community support group on a regular basis.	4.66
34. During my treatment program, I *have attended* Gamblers Anonymous, etc. on a regular basis.	4.28

Note: Items 33-34 are only asked on the 30 day questionnaire.

Table 8 reports current attendance at GA (or other community support groups), as indicated by an affirmative response to items with Yes/No response options. About two-thirds of respondents were currently attending GA at all the differently timed interviews; however, less than 30% of participants found GA to helpful at the 90 day and 12 month interviews. A small percentage of participants attend other types of community support groups besides GA; including other 12-step based programs, like Alcoholics Anonymous or Narcotics Anonymous, church based groups, and Smart Recovery.

Table 8: Current attendance and evaluation of community support groups

GAMBLERS ANONYMOUS	**% "Yes"**		
	30 day	*90 day*	*12 month*
35. Do you currently attend Gamblers Anonymous meetings?	70.1	65.8	72.2
36. Have you found these meetings to be helpful?	75.1	27.4	11.9
37. Do you currently attend any other community peer support meetings?	19.2	12.3	16.7
38. Have you found these other meetings to be helpful?	20.3	20.5	19.4

Note: None of the differences between the 30 day, 90 day, or 12 month group are statistically significant.

The quotations below reflect participants' ambivalent relationship with GA. To summarize, they mostly find GA to provide some value but not nearly at the level of the problem gambling treatment program. Criticisms of GA that arose in these interviews include its spiritual orientation, its relatively unorganized structure, and its unwelcoming cliques.

> *"The only issue I had with the program is its deep tie to Gamblers Anonymous. There are other programs out there that don't rely on GA. The comingling of these two groups is strange to me. There's other stuff that I've heard about that has been shown to be more effective than GA. I understand that GA is the most prevalent and popular around the world, but I don't think it's that great."*

> *"The least helpful thing is going to GA. They suggest going, and they bring it up a lot, but it just doesn't do much for me. I don't feel comfortable. It's very cliquey, it's not as good as IOP or group session. It's not as social."*

> *"GA is good, and it's important, but it doesn't give you what the program does. GA helps you get support, it's essential too. It's a place where you feel safe to talk about anything, and that's important, but IOP helps you understand yourself in a different way that is such an improvement on GA."*

> *"GA--I didn't really like GA, it really would make me angry when people would insist that I share. I mean, like, I just want to sit and listen and learn from people, but inevitably, someone would be really pushy about wanting me to share, and it would make me so angry that it would make me even more reluctant about sharing. So I just didn't really connect with GA."*

> *"I don't do the GA meetings because when they talk I get ideas on how to get money to gamble. That's one things that is not helpful to me. I left there with more of a desire to gamble."*

> *"I was never able to get everything out of the GA meetings until after I completed the program. So now I am attending GA, and getting the most out of it, but on its own, GA just left me confused and annoyed."*

> *"GA is not very welcoming. I feel like an outsider. The people at GA are kinda like inner circle. They kinda know each other, and I didn't know anybody."*

> *"For me personally, I went to GA when I was in my 20s and I fell off the wagon. GA just doesn't work. I've heard a lot people say the same thing. Without the RPG, I wouldn't follow any program, so I'm really grateful for it being there. GA is cliquey, people get in your face, and it's more like a club. I felt pressure."*

> *"There is quite an emphasis on spirituality, which doesn't do anything for me. For the same reason, I don't really like GA, I prefer aftercare and IOP. But when I'm in GA, I try to get my ten minutes of it, and do some sharing and try to focus on the half hour that is productive for me and not on the hour that I'm wasting. You have to be a bit selfish to get something out of GA. I know for sure that GA alone would not have worked for me."*

OTHER ADDICTIONS

We also examined the broader issue of other chemical and/or behavioral addictions by asking participants whether they had problems with other addictions prior to treatment and whether those problems persisted after treatment. The most commonly identified addiction prior to participation in treatment was methamphetamines. Over nineteen percent of participants indicated that they had a problematic methamphetamine addiction prior to attending the treatment program. Alcohol (15%) and nicotine (8.4%) were the other two most commonly cited pre-treatment addictions. Addictions to THC, cocaine, opiates, prescriptions drugs, sports enhancement drugs, shopping, sex, the internet, and food were also minimal, with fewer than 5% of participants reporting pre-treatment addictions to each. After entering treatment, only 2.8% of participants indicated that they continued to have a problem with alcohol addiction. Among the more striking findings was that fewer than 2% of participants reported having a continuing addiction to methamphetamines during their follow-up interviews. Reported problematic addictions to nicotine increased to 10.8% after participants entered treatment for problem gambling. Nicotine use may continue to increase after other problematic addictions due to its negative effects being more long term and perhaps less urgently dealt with by the problem gambler and the clinics. Additionally, due to dire conditions that some problem gamblers find themselves in when seeking treatment, they may not find their smoking habits to have been problematic prior to treatment; thus the initial estimates of 8.4% of nicotine users prior to treatment might be understated.

Results presented in Table 9 suggest that participation in problem gambling treatment appears to help with these broader addictive problems.

Table 9: Percent of Participants Indicating Problems with other Addictions

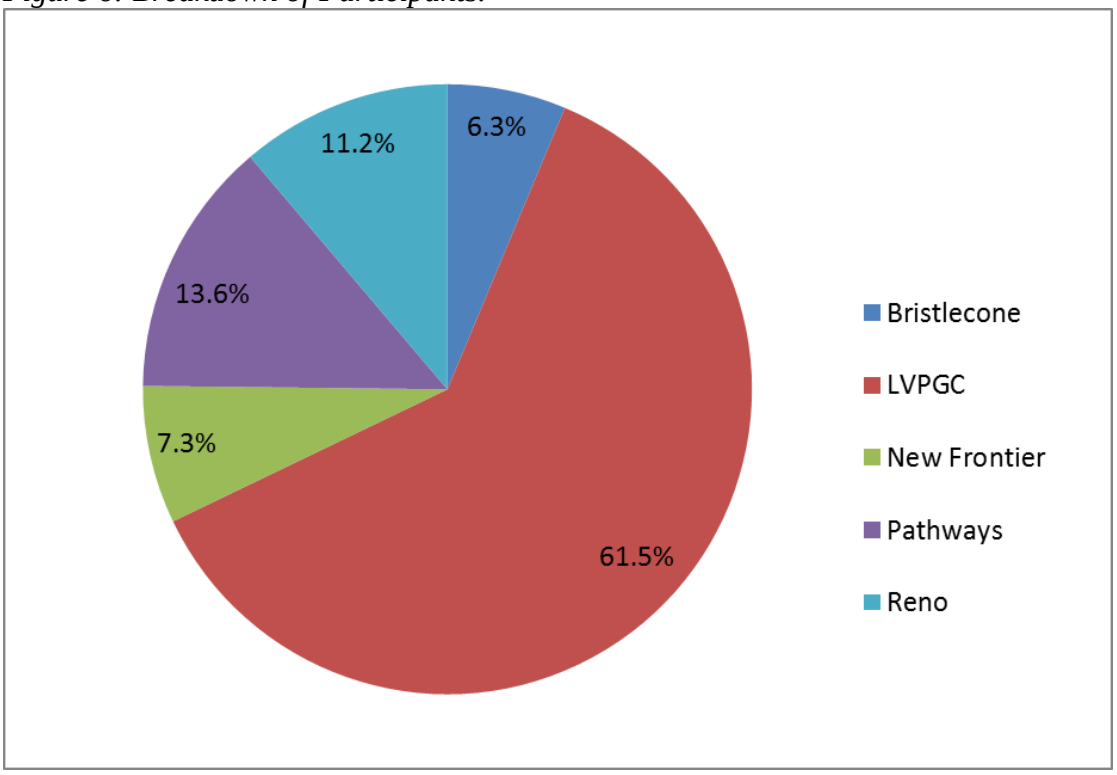
OTHER ADDICTIONS	**% "Yes"**
33. Prior to treatment were there other addictions that were problematic for you?	29.6
34. Are any addictions currently problematic?	15.8

CLINIC-BY-CLINIC COMPARISONS

We interviewed treatment participants from five different state funded programs: Bristlecone Family Resources, the Problem Gambling Center in Las Vegas, New Frontier Treatment Center, Reno Problem Gambling Center, and Pathways Counseling Center. In this section, we present a comparison of evaluation and outcomes results across the five programs. It is important to note that these comparisons are descriptive in nature only, and should not be construed as evidence of the comparative quality or effectiveness of any given program. Geographic location, client demographics, and financial resources vary significantly across these programs. All of these factors should be taken into consideration when comparing results.

Figure 6 presents the breakdown of the sample by clinic. Over half of participants (62%) came from the Problem Gambling Center in Las Vegas; with the remainder attended programs at Bristlecone Family Resources (6.3%), New Frontier (7.3%), Pathways (13.6%), and the Reno Problem Gambling Center (11.2%).

Figure 6: Breakdown of Participants.



In the next several pages, we present the mean participant scores by clinic and indicate where there are statistically significant differences between a specific clinic and the rest of the sample. Consistent with the rest of the report, higher scores indicate more positive ratings. Items that are listed as statistically significant indicate that the differences in scores between clinics are meaningful and account for differences in sample size.

ACCESS TO TREATMENT SERVICES

Figure 7 presents the clinic-by-clinic comparisons for participants' evaluations of access to treatment services. The only statistically significant difference between clinics here is on the measure of being scheduled within a reasonable time frame. Clients from Bristlecone were least positive about their ability to be scheduled on time, an average of 3.91 which falls between "neutral" and "agree."

TREATMENT QUALITY AND HELPFULNESS

Figure 8 presents comparisons for participants' evaluations of items measuring treatment quality and helpfulness. None of the between-clinic comparisons are significant, meaning that clients at all clinics are similarly likely to report satisfaction with quality and helpfulness. The scores are very high on all measures, averaging between agree and strongly agree.

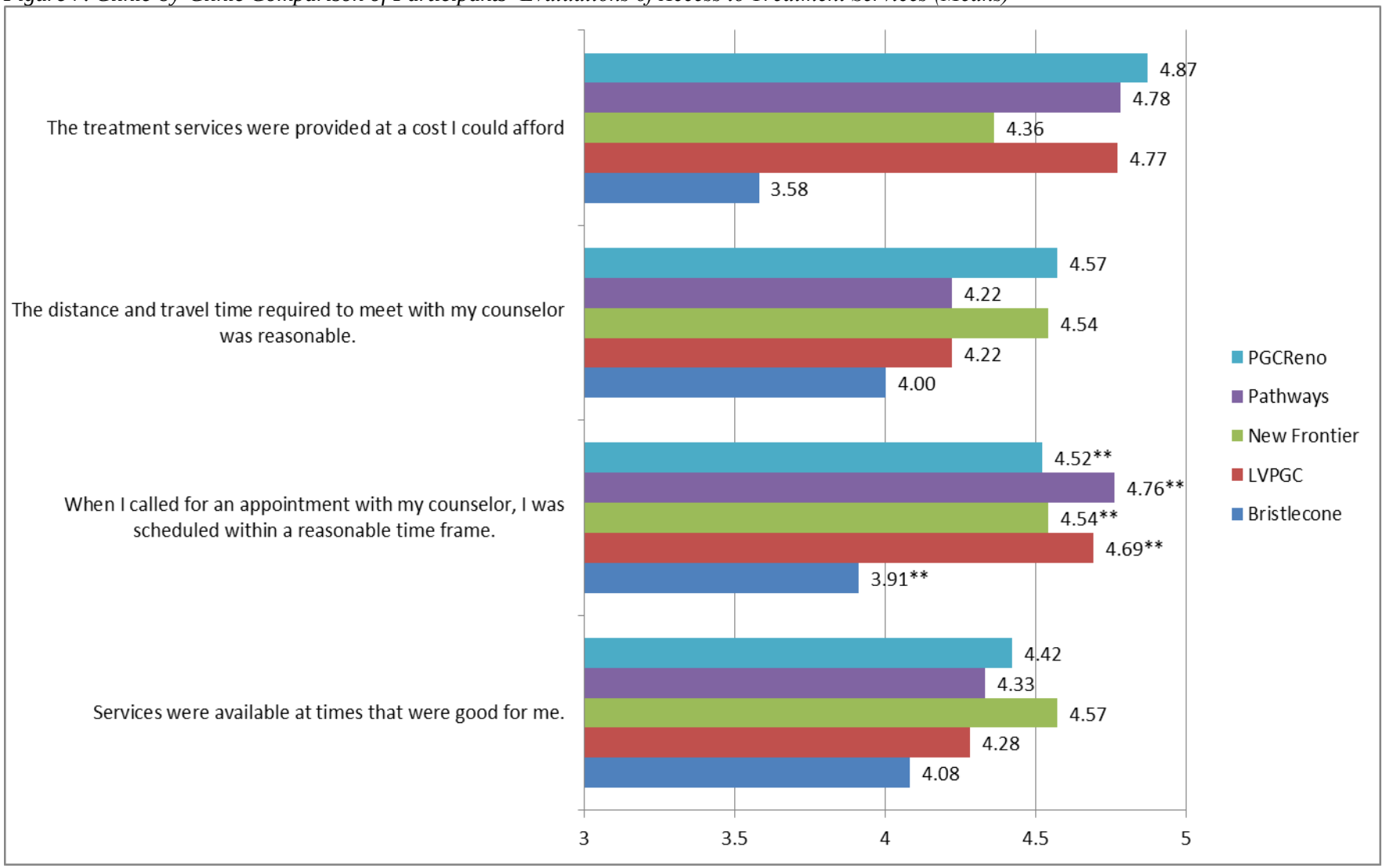
TREATMENT EFFECTIVENESS

Figure 9 presents participants' evaluations of items measuring treatment effectiveness. None of the between-clinic comparisons are significant, meaning that clients at all clinics are similarly likely to report satisfaction with quality and helpfulness. The scores are all very high on all measures, averaging between agree and strongly agree. Overall, clients were least satisfied with the aftercare plans at all clinics. There may be several reasons for lower scores in this area, including relapses and having less contact with the provider after completing treatment.

INVOLVEMENT IN GAMBLERS ANONYMOUS

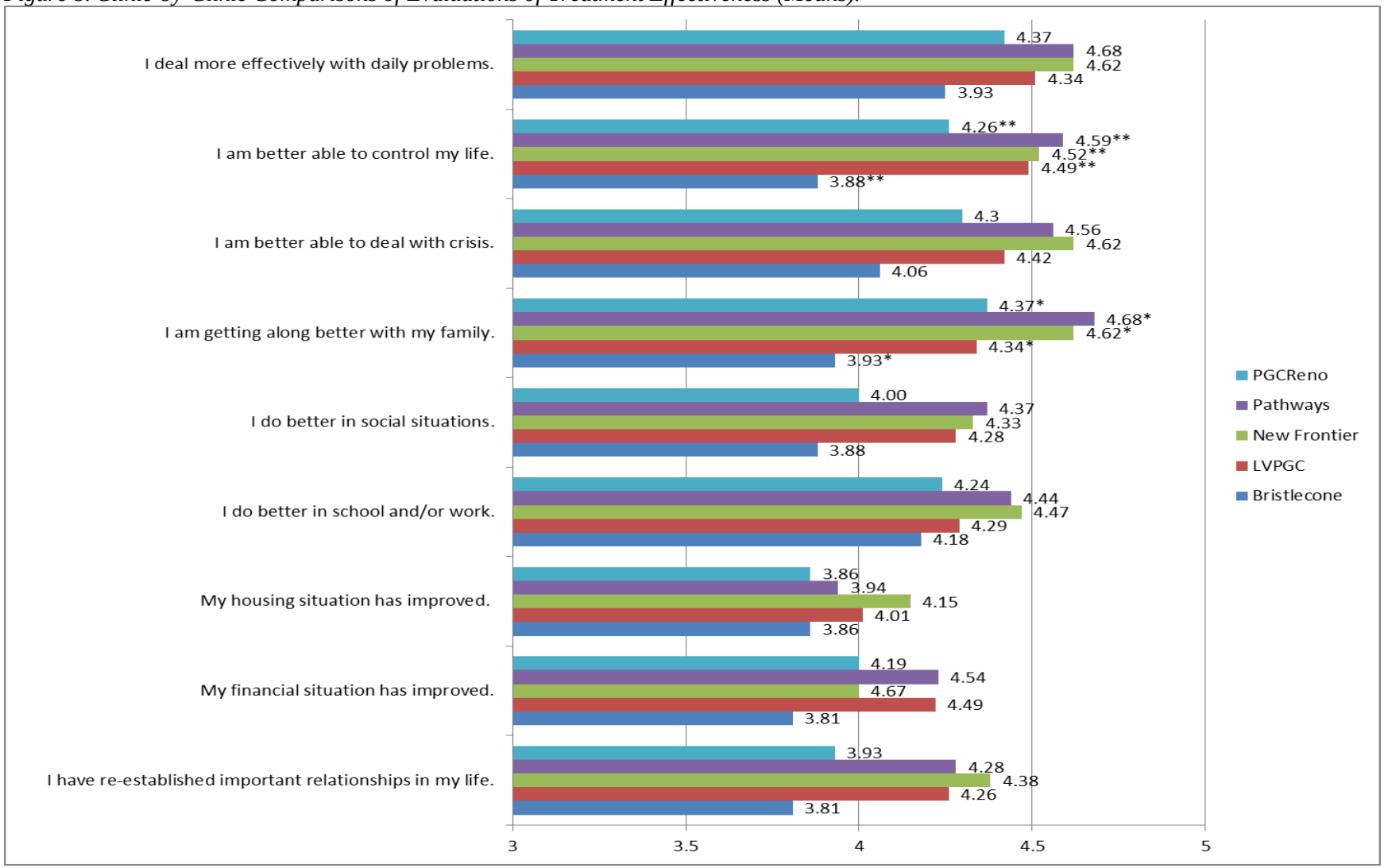
Figure 10 presents clinic-by-clinic comparisons for participants' involvement with Gamblers Anonymous. Both measures, whether they were encouraged to use Gamblers Anonymous during their treatment program and whether they actually participated in Gamblers Anonymous on a regular basis while in treatment, were statistically significant between clinics. Clients from Reno Problem Gambling Center were least likely to be encouraged to use GA and also least likely to use GA.

Figure 7. Clinic-by-Clinic Comparison of Participants' Evaluations of Access to Treatment Services (Means)



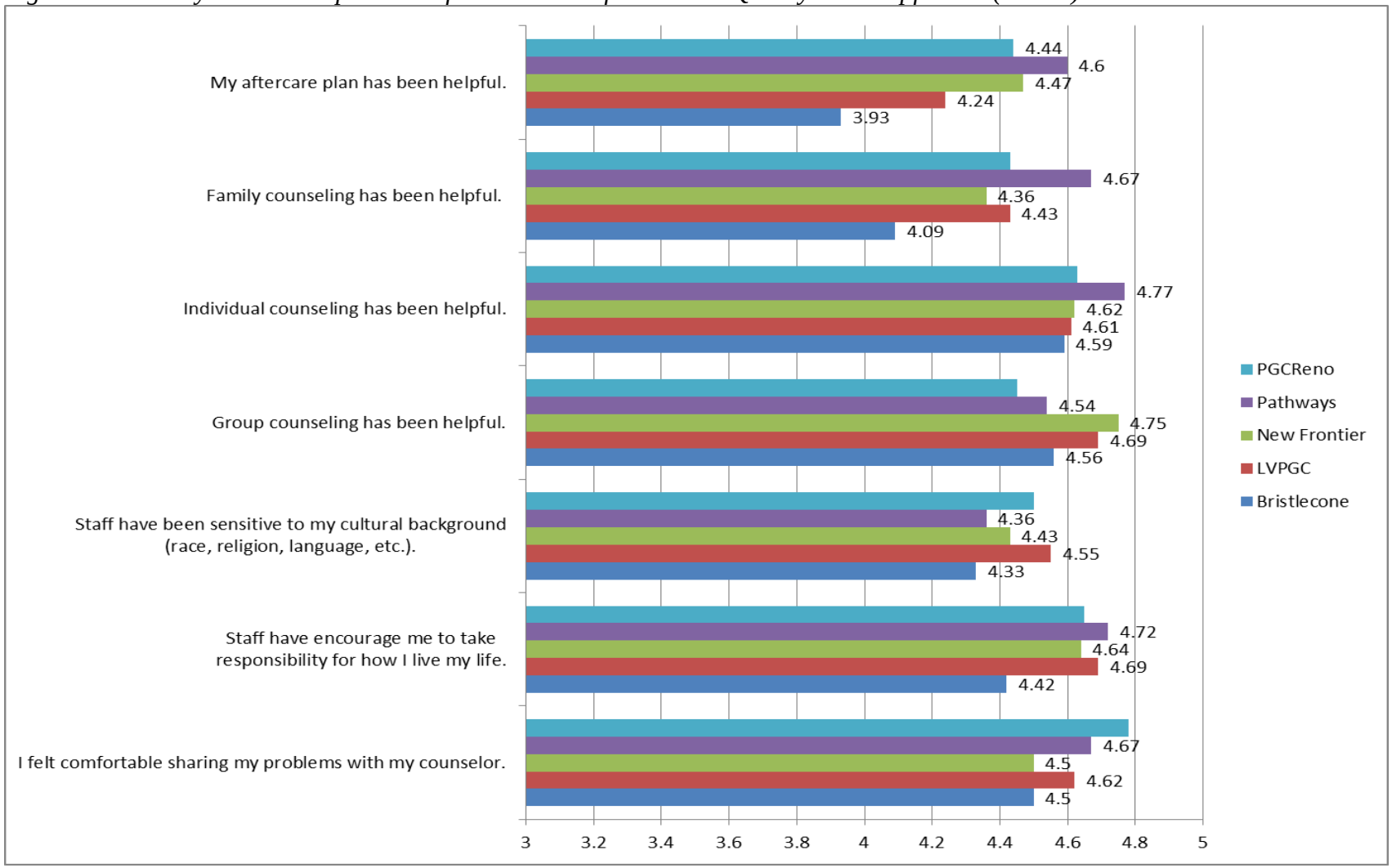
*Note: **Indicates differences between clinics are statistically significant at p<.01 level.*

Figure 8. Clinic-by-Clinic Comparisons of Evaluations of Treatment Effectiveness (Means).



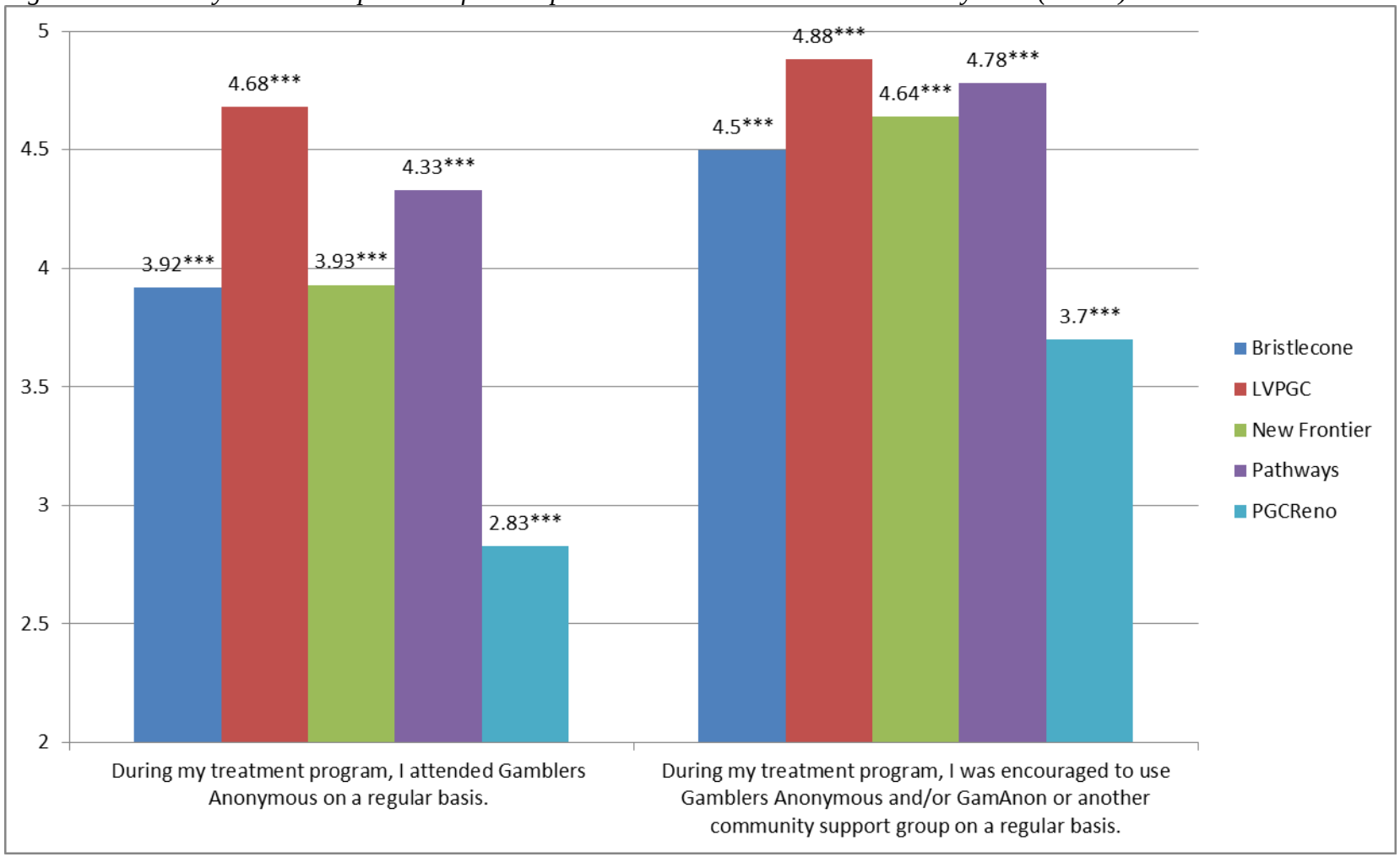
*Note:*Indicates differences between clinics are statistically significant at p<.05 level.*
*Note:**Indicates differences between clinics are statistically significant at p<.01 level.*

Figure 9: Clinic-by-Clinic Comparisons of Evaluations of Treatment Quality and Helpfulness (Means)



Note: None of the differences between clinics were statistically significant.

Figure 10. Clinic-by-Clinic Comparison of Participants' Involvement in Gamblers Anonymous (Means)

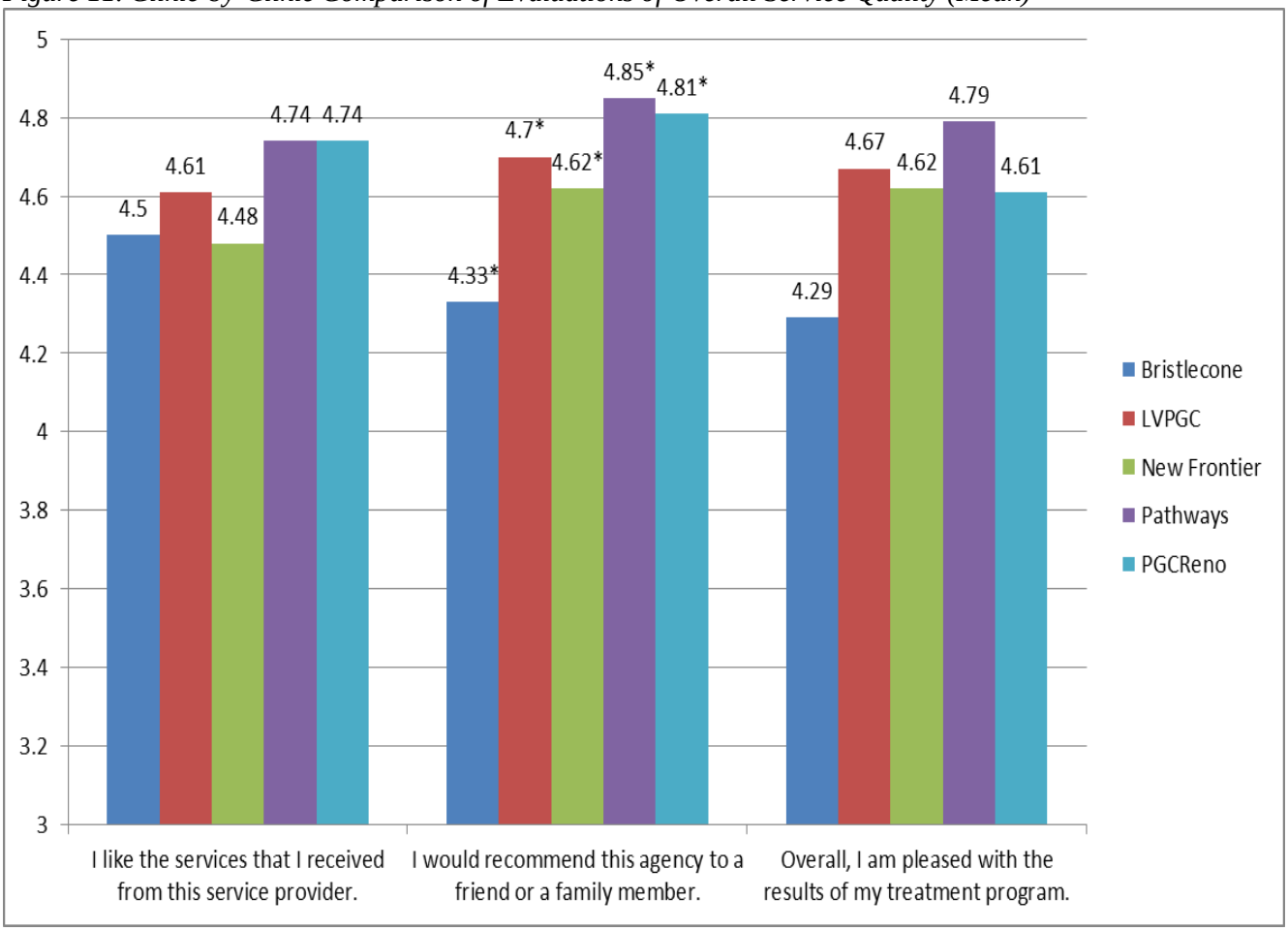


*Note:***Indicates differences between clinics are statistically significant at p<.001 level.*

OVERALL

Figure 11 presents the comparison of mean ratings of items measuring overall service quality. There is a statistically significant difference between clinics in whether clients agree that they would recommend the service provider to a friend or family member. Clients from Pathways Counseling Center were the most enthusiastic about recommending services to their friends. Clients from Bristlecone Family Resources had the lowest average scores on this measure, but it is important to note that the average falls between "agree" and "strongly agree."

Figure 11. Clinic-by-Clinic Comparison of Evaluations of Overall Service Quality (Mean)

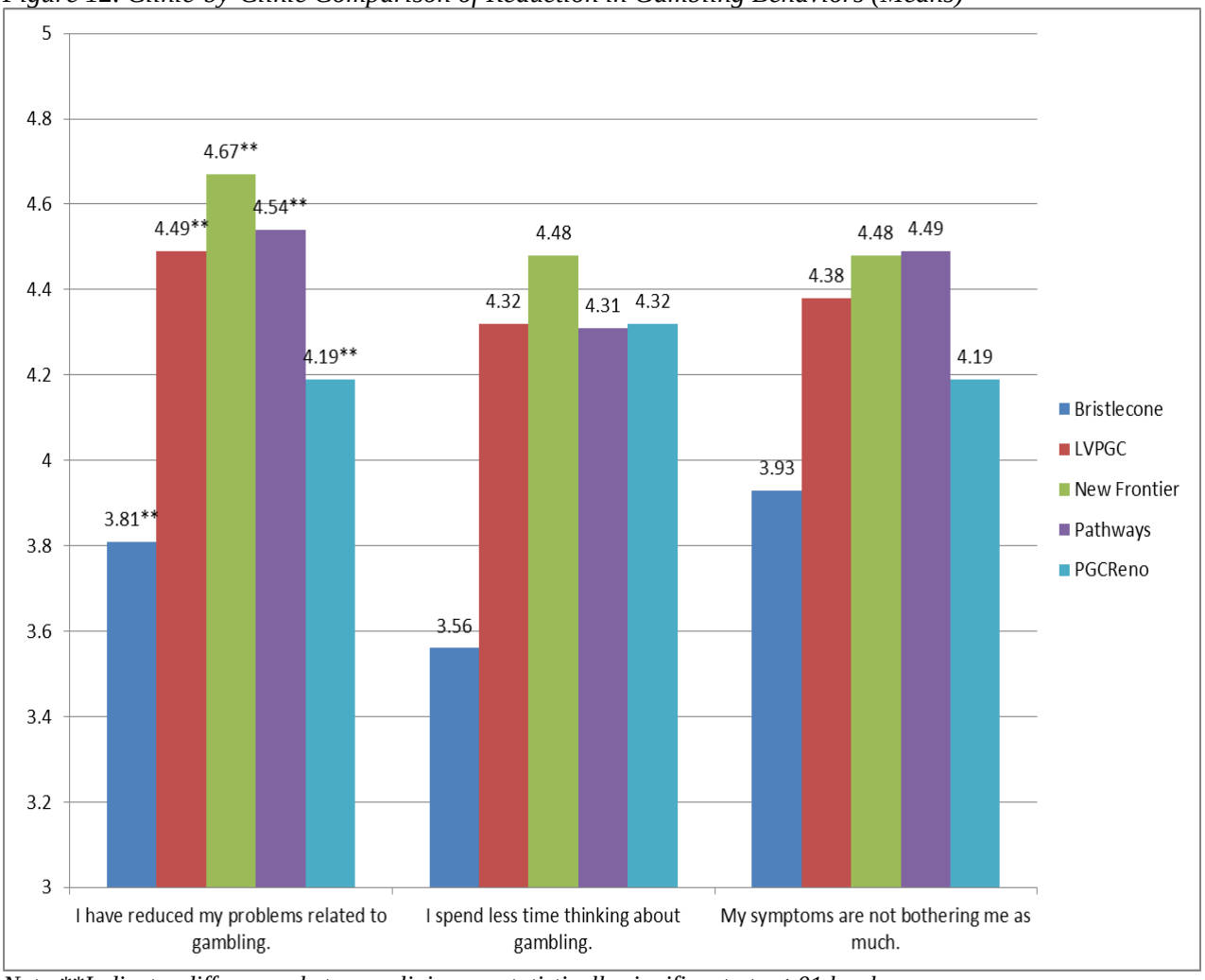


*Note:*Indicates differences between clinics are statistically significant at p<.05 level.*

REDUCTION IN GAMBLING BEHAVIORS

Figure 12 below presents comparisons for mean ratings of items measuring reductions in gambling behaviors. Clients receiving services from New Frontier Treatment Center and Pathways Counseling Center demonstrated the most positive outcomes. New Frontier Treatment Center clients were significantly more likely to agree that they have reduced their problems related to gambling.

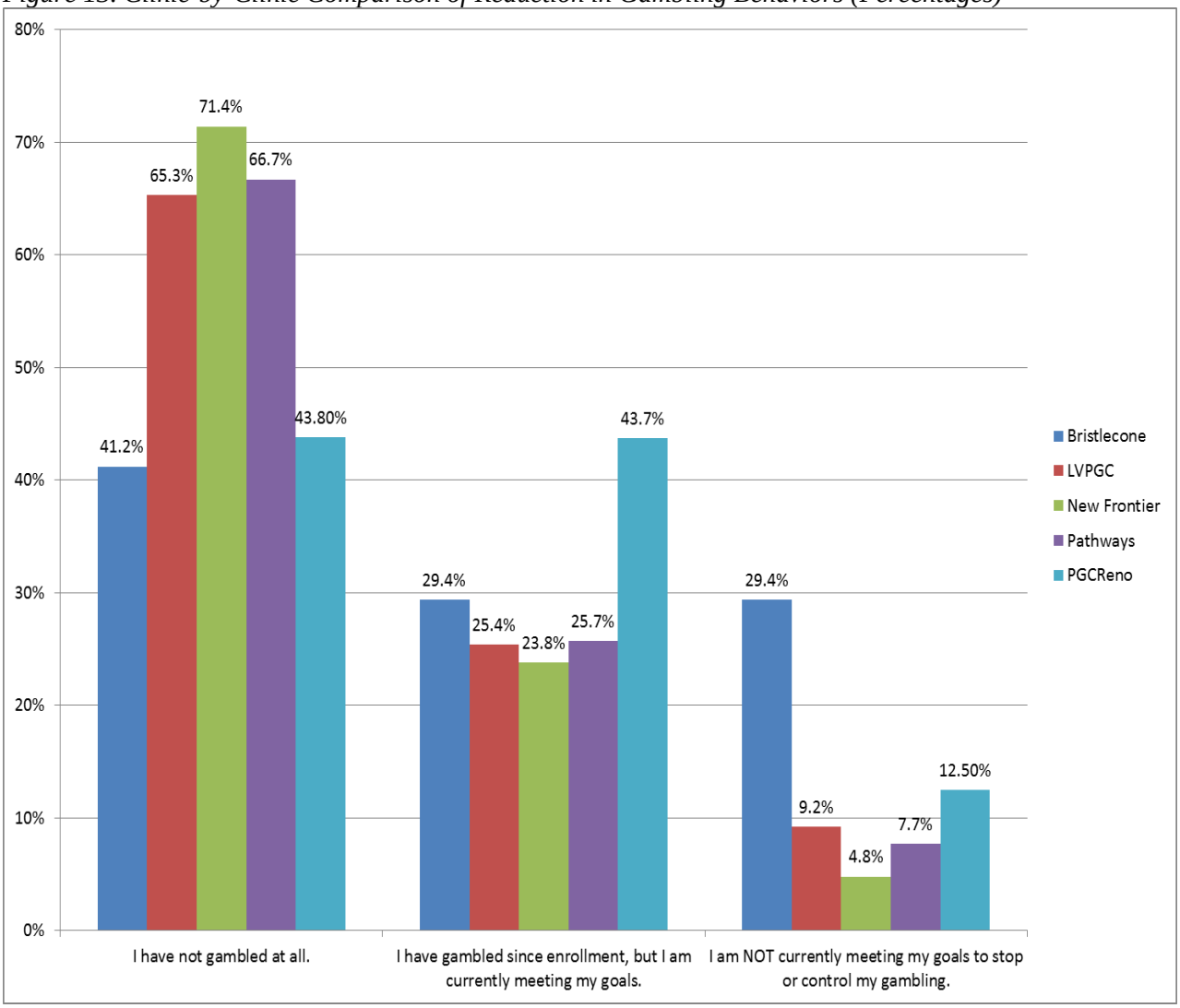
Figure 12. Clinic-by-Clinic Comparison of Reduction in Gambling Behaviors (Means)



*Note:**Indicates differences between clinics are statistically significant at p<.01 level.*

Figure 13 below presents clinic-by-clinic comparisons in reduction in gambling since enrolment in the treatment program. The first measure shows the percentage of clients from each clinic that have not gambled at all since enrolment in the program. The second measure includes clients that answered that they have had "one slip," "several slips," or that their goal is not abstinence but rather controlled gambling and that they are meeting their goals without problems. The third measure shows the percentage of clients from each clinic that report they are not currently meeting their gambling goals. None of the differences in reduction in gambling behaviors were statistically significant between clinics.

Figure 13. Clinic-by-Clinic Comparison of Reduction in Gambling Behaviors (Percentages)



Note: None of the differences between clinics were statistically significant.

CONCLUSION

To summarize, these direct and indirect measures of the evaluation of treatment services and improvements in quality of life and gambling behaviors provide strong evidence that problem gambling treatment works. Through the Mental Health Statistics Improvement Program (MHSIP) survey and additional questions about past and current gambling behaviors, we were able to assess participants' thoughts and feelings about their access to treatment services, the quality and helpfulness of those services, and the effects of services on their daily lives.

Participants were overwhelmingly positive about their treatment services, especially as those services related to their relationships with their counselors and their experiences in group counseling. Almost all participants indicated that they have reduced their gambling since completing treatment or discontinued gambling altogether. These strong outcomes represent a major victory for those dedicated to helping problem gamblers recover from their addiction and improve their overall quality of life. From a policy perspective, this research demonstrates the importance of continued support for these crucial services.