

JAMAICA Child AND Adolescent GAMBLING SURVEY

Submitted: July 2007

Submitted to:

**Rise Life Management Ltd.
87 East Street, Kingston
Jamaica W.I.**

Project Officer:

Richard Henry

Submitted by:

**Hope Enterprises Ltd.
7-7A Tangerine Place, 3rd Floor
Kingston 10, 2007
Jamaica W.I.**

ACKNOWLEDGEMENTS

This survey was funded by the Betting Gaming and Lotteries Commission through Rise Life Managements Services who also offered technical and other assistance. This study would not have been possible without the collaboration of the Ministry of Education and the other non-governmental organizations who so willingly participated. Special thanks to the teachers, care-givers, students and youths who participated in the study.

Table of Contents

| <u>CHAPTER</u> | | <u>Page Number</u> |
|----------------|--|--------------------|
| | EXECUTIVE SUMMARY | 8 |
| I | INTRODUCTION | 12 |
| II | METHODOLOGY | 15 |
| | RESEARCH FINDINGS | |
| III | Gambling Behaviour | 19 |
| | A. Gambling experience with specific games | 22 |
| | B. Frequency with which games played for money | 32 |
| | C. Amount of time spent gambling | 33 |
| | D. Amount of money spent gambling in the last 6 months | 34 |
| | E. Reasons for Gambling | 35 |
| | F. Where gambling takes place | 37 |
| | G. Types of card games played | 38 |
| IV | Awareness of and Attitudes to Gambling | 40 |
| | A. Awareness of gambling | 40 |
| | B. Attitudes to gambling | 44 |
| V | Gambling and it's relation to risk behaviour | 50 |
| VI | Gambling and resiliency factors | 61 |
| | A. External Assets | 63 |
| | B. Internal Assets | 66 |
| | C. Correlates of gambling | 69 |
| VII | Problem gambling | 71 |
| | A. Profile of the problem gambler | 72 |
| | REFERENCES | 87 |
| | APPENDIX 1: Questionnaire | 88 |

Index to tables

| Table # | | Page |
|----------------|---|-------------|
| Table 1. | General Gambling behaviour by gender | 19 |
| Table 2. | General Gambling behaviour by age group | 20 |
| Table 3. | General Gambling behaviour by type of youth | 20 |
| Table 4. | Lifetime incidence of gambling by gender | 24 |
| Table 5. | Incidence of recent gambling by gender | 25 |
| Table 6. | Lifetime incidence of gambling by age group | 27 |
| Table 7. | Incidence of recent gambling by age group | 28 |
| Table 8. | Lifetime incidence of gambling by type of youth | 30 |
| Table 9. | Incidence of recent gambling by type of youth | 31 |
| Table 10. | Frequency of playing in the last 12 months | 32 |
| Table 11. | Amount of time spent gambling | 33 |
| Table 12. | Average amount of money spent in the last 6 months | 34 |
| Table 13. | Reasons for gambling by gender | 35 |
| Table 14. | Reasons for gambling by age group | 36 |
| Table 15. | Reasons for gambling by type of youth | 36 |
| Table 16. | Location of Gambling activities | 37 |
| Table 17. | Who games played with | 38 |
| Table 18. | Type of Card Games played by gender | 38 |
| Table 19. | Type of Card Games played by age | 39 |
| Table 20. | Attitude to gambling by gender | 47 |
| Table 21. | Attitude to gambling by age group | 48 |
| Table 22. | Attitude to gambling by gambling experience | 49 |
| Table 23. | Gambling engagement and its relation to lifetime risk behaviour in males | 50 |
| Table 24. | Gambling engagement and its relation to specific risk behaviour in the past 12 months in males | 51 |
| Table 25. | Gambling engagement and its relation to frequency of specific risk behaviour in the past 12 months in males | 52 |
| Table 26. | Gambling engagement and its relation to depression and suicide ideation in males | 53 |
| Table 27. | Gambling engagement and its relation to sexual risk taking in males | 54 |
| Table 28. | Male youth gambling engagement and family member gambling | 55 |
| Table 29. | Gambling engagement and its relation to lifetime risk behaviour in females | 56 |
| Table 30. | Gambling engagement and its relation to specific risk behaviour in the past 12 months in females | 57 |
| Table 31. | Gambling engagement and its relation to frequency of specific risk behaviour in the past 12 months in females | 58 |
| Table 32. | Gambling engagement and its relation to depression and suicide ideation in females | 59 |
| Table 33. | Gambling engagement and its relation to sexual risk taking in females | 59 |
| Table 34. | Female youth gambling engagement and family member gambling | 60 |
| Table 35. | Correlates of gambling | 70 |
| Table 36. | Gambler Type by Demographics | 72 |
| Table 37. | Attitude to gambling by gambler type | 73 |
| Table 38. | Reasons for gambling by gambler type | 74 |
| Table 39. | Gambler type and impact of a family member gambling | 75 |
| Table 40. | Gambler type and its relation to lifetime risk behaviour | 81 |

| | | |
|-----------|--|----|
| Table 41. | Gambling Type and its relation to specific risk behaviour in the past 12 months | 82 |
| Table 42. | Gambling Type and its relation to frequency of specific risk behaviour in the past 12 months | 83 |
| Table 43. | Gambling Type and its relation to depression and suicide ideation | 84 |
| Table 44. | Gambling Type and its relation to sexual risk taking | 85 |
| Table 45. | Problem Gambling and Correlation Analysis | 86 |

Index to Charts

| Chart # | | Page |
|----------------|---|-------------|
| Chart 1. | General Incidence of playing specific games for money | 21 |
| Chart 2. | Incidence of playing specific games for money by age group | 26 |
| Chart 3. | Incidence of playing specific games for money by Type of youth | 29 |
| Chart 4. | Awareness of top 20 games played for money | 40 |
| Chart 5. | Awareness of specific games by gender | 41 |
| Chart 6. | Awareness of specific games by age group | 42 |
| Chart 7. | Awareness of specific games by type of youth | 43 |
| Chart 8. | Attitudes to gambling | 46 |
| Chart 9. | Total External Asset Score by gambling experience | 63 |
| Chart 10. | External Assets within Environments by Gambling Experience | 64 |
| Chart 11. | Percent scoring high on individual assets by Gambling experience | 65 |
| Chart 12. | External Assets Within School Environment by Gambling Experience | 66 |
| Chart 13. | External Assets Within Home Environment by Gambling Experience | 67 |
| Chart 14. | External Assets Within Community Environment by Gambling Experience | 67 |
| Chart 15. | External Assets Within Peer Environment by Gambling Experience | 68 |
| Chart 16. | Total Internal Assets | 68 |
| Chart 17. | Problem Gambling Profile | 71 |
| Chart 18. | Total External Asset Score by Gambler Type | 76 |
| Chart 19. | Percent scoring high on individual assets by Gambling Type | 76 |
| Chart 20. | External Assets Within Environments by Gambling Type | 77 |
| Chart 21. | External Assets Within School Environment by Gambling Type | 77 |
| Chart 22. | External Assets Within Home Environment by Gambling Type | 78 |
| Chart 23. | External Assets Within Community Environment by Gambling Experience | 78 |
| Chart 24. | External Assets Within Peer Environment by Gambling Experience | 79 |
| Chart 25. | Total Internal Assets | 79 |
| Chart 26. | Individual Internal Asset by Gambler Type | 80 |

EXECUTIVE SUMMARY:

This report summarizes findings of research conducted on behalf of Rise Life Management Limited in an attempt to establish desired baseline measures for incidence, behaviour and relationships as it relates to gambling among adolescents 10-19 years old.

Incidence of gambling:

Gambling, defined here as games played for money, is pervasive in the society and virtually all youth 10-19 years are aware of same.

Of the sample, just over two-thirds (68%) reported having been exposed to such games, a half (52%) actually had the opportunity to play and the majority availed themselves of this opportunity resulting in 45% of the sample having actually gambled at some stage. Having once gambled the majority continue gambling and it was approximately two-thirds (67.1%) of this sub group who were identified as current gamblers, having played a game for money in the last 12 months.

This high awareness and exposure to gambling is not surprising as opportunities to gamble were reported as being at all the central places in his/her life, whether at home, at school or on the street.

Generally, exposure to gambling, opportunities to gamble and lifetime incidence of gambling was significantly higher in males, older youth aged 15-19 years and “at risk” youth.

Attitudes to gambling:

- ✓ Using factor analysis four general views of gambling emerged namely:
 - Gambling is addictive and wrong, highly addictive and destructive, may lead to crime and “war” (street violence including gang war): *A strongly supported view by 60% of the sample*
 - Gambling gives a chance for a better life: *A strong to moderately supported view with 26% and 47% indicating support respectively.*
 - Gambling is fun, exciting and a positive contributor to the country: *A moderately supported view by 56.7% of the sample*
 - Gambling is a loser’s game: *A moderate to poorly supported view with 48% to 43% indicating support respectively*

Interestingly youth do not identify their activities - whether it is the playing of jacks, “elastics”, marbles or bottle stopper football all played for money - as gambling and see their own activities instead as fun, excitement. Hence while the negative view of gambling is the most pervasive one, they do not see this as even remotely relevant to their activities. In fact the main motivator for their involvement was for the excitement and entertainment value of the activities as well as the prospect of winning money. Six in ten youth also found the skill factor of the activities appealing and gambled “because they are good at it”.

Harmless though the players think it is, similar to findings from a study in the United States gambling was found in this study to be associated with antisocial and risk behaviour much of

which are presenting as significant problems in Jamaica. These include aggression, stealing, school truancy and substance use. Girls who gamble were also significantly more likely to report depression and suicide ideation.

More specifically, persons who had played at least one game for money were also more likely to have thoughts of aggression as well as more likely to experience aggression and violence within the last 12 months. Specifically they were more likely to have thought about hurting or killing someone, and to have been involved in a group fight within the last 12 months. Youth who had gambled were also more likely to report aggression, violence and weapon carrying in school in the last 12 months.

These problems worsen as the individual gets more involved in gambling to the point of being classified as a *problem gambler*. Problem gambling was also associated with increased risk behaviors including aggression, violence and theft. Problem gamblers were more likely to report within the last twelve months: having stolen from a friend or family member, having been involved in a group fight, having injured someone seriously as well as deliberately damaged someone's property. The problem gambler was also associated with aggression and violence in school as well as weapon carrying. Specifically, they were more likely to report within the last 12 months at school having been in a physical fight, belonged to a gang, slapped or hit someone and carried a knife or other weapon for protection.

Problem Gambling:

Levels of problem gambling within the sample were calculated using the South Oaks Gambling Screen (SOGS). Using the SOGS classifications a total of 10.7% of the sample were found to be problem gamblers with an additional 9.6% being classified as at-risk of problem gambling. In summary, one (1) out of every five (5) adolescents is either a problem gambler or at-risk of becoming one.

Games which showed the greatest correlation to problem gambling were: coin games, jacks, "elastics", marbles and money/coin and bottle stopper football. Problem gamblers were also found to have begun gambling at an earlier age than other youth. As such it can be argued that these more informal childhood games could function as the gateway games into which youth enter harmlessly into the gambling arena. Where other factors are present youth may then go on to experience gambling problems.

Risk Factors for Gambling:

Risk factors for gambling are those factors which when present increase the likelihood of youth engaging in gambling activities. Using correlation analysis risk factors associated with gambling emerged as: age, gender, presence of a family member who gambles, age of gambling initiation and accepting attitudes towards gambling activities. This profile was more likely to be of a male, age 15-19years, who has a family member who gambles and who himself, perceives gambling as both fun exciting and a positive influence. This perception of gambling as fun, exciting and a positive influence emerged as the strongest risk factor.

Risk Factors for *problem* gambling were similar but with the addition of having a family member who gambles *too much*. Specifically, problem gamblers were significantly more likely

to be males, have begun gambling at an earlier age and have a family member who gambles, as well as a family member who gambles too much. They were also more likely to view gambling as fun, exciting and positive as well as endorse the notion that gambling gives a chance for a better life.

Protective Factors for Gambling:

School connectedness and the presence of the external developmental assets of caring relationships, high expectations and opportunities for meaningful participation, within the school environment emerged as factors which protect against the initiation of gambling in youth. Youth who felt connected to schools and thus existed in a school environment rich in caring relationships, high expectations and opportunities for meaningful participation; were significantly less likely to engage in any gambling activity.

Frequency of gambling:

Games were played for money weekly, from as often as everyday to less often (once or twice a week). Poker, gambling on the internet and coin games were played everyday or almost everyday while Jacks, money football, dominoes and “lastic” were a few of the games played once or twice a week.

Amount of time spent gambling:

Amount of time spent gambling on specific games was heaviest (more than 3 hours) for arcade/video games, Bingo, computer games, cards not including Yu-Gi-Oh and dominoes.

Amount of money spent on average:

Over the last 6 months, 10-19 year old youth spent heaviest at gaming establishments and on horse racing, reporting an average outlay of approximately \$900 respectively. The maximum amount spent at gaming establishments was \$13,400 while a maximum of \$10,000 was spent on horse racing.

Median age first gambled:

Overall, males were significantly more likely to have begun gambling at an earlier age as too were youth in the 10-14yrs age group and those classified as problem gamblers using the South Oaks Gambling Screen.

- Recommendations:

Further work may need to be done to better understand the link between the informal childhood games and problem gambling.

Intervention is needed to begin changing attitudes towards gambling by first enabling youth to accurately recognize playing even games for money as “gambling” rather than reserving this title for the more established and higher stakes games.

Programmes should seek to strengthen the link between youth and school as this proved to be the most significant protective factor.

Intervention should promote other avenues for fun and excitement which could act as alternatives to playing games for money.

I. INTRODUCTION

While gambling in the general population, and in particular the problem of pathological gambling, is a concern, of even greater concern is the impact of gambling on the current generation of youth. The youth today in Jamaica are the first to have been raised in an environment of extensive legalized and government sanctioned gambling.

Studies done in the United States of America have found that correlates of gambling among youth include: poor academic achievement, truancy, being male, regular drug use, delinquency, progression to further problematic gambling behavior and problematic parental gambling.¹

Additionally, other studies have found that teens involved in problem gambling are more likely to be involved in aggressive behavior, stealing, school truancy, drug sales and commercial sex work.²

▪ **Background:**

RISE Life Management, formerly known as Addiction Alert Organization was established in 1989 by the Private Sector Organization of Jamaica (PSOJ) as a contribution to the desired reduction program of the National Council on Drug Abuse. The overall goals of the organization include the implementation of programs which would serve to decrease the use and abuse of addictive substances in the populace and the engagement in other unhealthy behaviors which often result in emotional stress, dysfunctional relationships, low job productivity, injury, illness, crime and premature death.

In the first five months of 2005 RISE Life Management Services 'lifeline' phone services noted a three-fold increase in requests for help for gambling issues when compared to the same period the previous year.

This increase in requests for intervention comes in light of a noted increase in formalized acceptance of gambling practice among the population in the past five years as well as an increase in the number of games of chance and gaming establishments. As a result of these trends the organization was desirous of developing a program to offer both preventive and rehabilitative interventions for persons who may be addicted to or are vulnerable to gambling and its negative outcomes. In order to design appropriate programs, the organization first commissioned a baseline study to explore the prevalence of gambling among youth as well as the characteristics and nature of gambling and the players and the factors which influence this behavior. The following represents the report of the findings of this study into gambling among children and adolescents in Jamaica.

¹ Winters KC et al., Patterns and characteristics of adolescent gambling; *Journal of Gambling Studies* 9:371-386, 1993.

² Griffiths M; *Adolescents Gambling*; London Routledge; 1995.

▪ **Aim and Objectives:**

The project aimed to explore the prevalence of youth gambling in Jamaica and thus establish a baseline measurement for this behavior. The project also aimed to identify both risk and protective factors which influence youth gambling in Jamaica.

In order to achieve the above the project explored the following:

- ✓ Gambling behavior including :
 - Incidence of gambling among youth
 - Types of gambling engaged in
 - Median age first engaged in gambling
 - Frequency of gambling
 - Amount of time spent gambling
 - Amount of money spent on average
 - Reasons for gambling
 - Location of gambling
 - Who gamble with

- ✓ Awareness of and Attitudes to gambling

- ✓ Gambling and its relation to risk behaviors including violence, suicide ideation and attempt, sexual risk behavior and substance use and abuse

- ✓ Gambling and resiliency factors: These factors include internal and external factors which relate to the individual's home, school, community and peer group

- ✓ Problem/pathological gambling:
 - Incidence problem or pathological gambling
 - Risk and protective factors related to problem gambling
 - Risk behaviors related to problem gambling and related behaviors

- **Operational Definitions:**

The study focused on gambling and related behaviors in Jamaican youth. For the purposes of this study gambling was defined as:

-any game of chance for gain including informal like marbles, structured legal as in Gaming and Lottery operations viz. Pick 3, Lotto, etc. and structured illegal as in crown and anchor, drop pan and card games.

In order to provide a comprehensive overview of all youth the project sought to explore gambling behavior in children in school, adolescents in school and children and adolescents out of school.

While the scope of work proposed including persons 6 to 20 in the study it was suggested that incidence of gambling increased with age and thus the project should focus on the group 10-20 years. While not negating the incidence of gambling among persons younger

than 10 a decision was taken that given limited resources of finances and time and the mandate of this project to provide baseline data the project would be best to focus its resources in this age group. This older age group would be better able to express themselves as well as yield more incidences of the desired behavior and thus allow for greater exploration and identification of influencing factors, determining factors as well as relationship with other behaviors and variables.

Beyond providing data on lifetime and current gambling behaviors the project also aimed to gather and measure problem or pathological gambling in Jamaican youth and the behaviors and factors associated with this even higher risk behavior. Problem or pathological gambling was measured using The South Oaks Gambling Screen (SOGS-RA) adopted for adolescents.

II METHODOLOGY

In order to establish the desired baseline measures for incidence, behaviour and relationships as it relates to gambling among adolescents 10-19 years old, a combination of participatory learning and action techniques (PLA) and quantitative methodologies were employed.

The first phase of the project involved the conducting of four focus group discussions in which PLA techniques were used to explore the games and activities engaged in for gain, the type of gain played for as well as attitudes to gambling.

Discussions were held to understand how the target perceives gambling as well as the games played for money. Information from these groups was then used to inform the quantitative phase.

Quantitative methodology on the other hand was used to establish the desired baseline measures for incidence, behavior and relationships with variables. Specifically, a school-based cross-sectional survey was employed for adolescents 10-14 and a household based cross-sectional survey for adolescents 15-19years. Out of school youth such as street children were targeted using purposeful sampling.

Data collection:

Data were collected using a standardized and structured instrument developed in conjunction with the client.

Confidential, face-to-face interviews were conducted by teams of trained interviewers using a structured questionnaire. Each team consisted of interviewers and a supervisor. Interviewers were trained for five days, two days of which was devoted to field practice.

In an effort to preserve confidentiality, anonymity of respondent was the approach used. In this event, no names or addresses of respondents were recorded. Supervisors accompanied the interviewers into the field to allow for the required validation of data as well as on the spot supervision and clarification of problems.

A pre-test was conducted prior to the official start of the project and adjustments made to the instrument accordingly. All instruments used were designed in collaboration with the client.

Sample design for adolescents 15-19years:

The target group 15-19years old was reached via use of the household survey method using a multi-staged stratified random sampling approach with quota controls for age and gender.

Specifically:

1. Jamaica was stratified into 3 regions:
 - (a) Kingston Metropolitan region (KMR) which is defined as KSA and Portmore.
 - (b) Other urban areas (parish capitals and main towns)
 - (c) Rural areas

2. Each region was divided into Count Units (CU) of approximately equal size in terms of households (generally had approximately one household per dwelling unit).
3. A sample of Count Units were selected at random with each CU comprising of its respective electoral districts (ED's).
4. All ED's within selected CUs was identified as too was the size of each ED. The size of an ED is defined and measured by the number of dwelling units within the particular ED.
5. A sample of ED's was then selected from each CU by the method of Probability Proportional to Size (PPS). This methodology ensured that larger ED's had a greater chance of being selected but every household had an equal chance of selection.
6. Within each selected ED, a systematic sample of households was selected.
7. Every person 15-19yrs was interviewed within each selected household.

Sample design for children and adolescents in school:

The sample design undertaken was a stratified random design with quota controls by age. The sample frame used was the most recent *Jamaica School Profiles* from the Ministry of Education and Culture, Planning and Development Division, Statistics Section, Kingston Jamaica, which lists all public and private schools islandwide which are registered with the Ministry of Education. Based on the population composition the sample of students 10-14years was determined and sourced from randomly selected schools.

The Statistical Institute of Jamaica reports that 99% of youth 10-14 years are enrolled in schools islandwide. However based on experience, absenteeism from schools is at a rate of 17%. Therefore over-sampling of 20% was done to make allowance for absenteeism.

The total listing of schools was stratified into three regions:

1. Kingston Metropolitan Region (KMR)- this consists of Kingston (city), St. Andrew and Portmore.
2. Other urban areas - this includes all main towns and parish capitals and Montego Bay
3. Rural areas - all other inhabited areas.

Schools within each region was stratified into three categories representing the recognized education streams in the island. Based on the sample frame each stratum was comprised as follows:

- (a). Stratum I - preparatory schools and primary schools.
- (b). Stratum II - which will consist of all age schools or primary and junior high schools
- (c). Stratum III - which will consist of secondary high schools, new secondary and comprehensive schools, and technical schools

Quota controls by age was undertaken per the island's population distribution. It was estimated also based on previous experience, that each grade would have at least three classes. Two boys and one girl were randomly sampled from each class, yielding a total of 3 students per grade. All grades applicable within a school were done. A sample of students was selected randomly from the school's register list on the day of visit.

Sample design for Out of school Youth:

Out of school youth particularly those classified as ‘street children are unique in their lack of a sampling frame, lack of accurate estimates of their size and overall lack of comprehensive information. Given these considerations, purposeful sampling techniques were used.

The project defined “street children”, as youth living on the street but these proved difficult to identify and so the definition was expanded to include youth who may not live on the street but are school drop-outs and work on the street and would therefore be excluded from surveys conducted in the community and at school. Despite a redefinition, a particular challenge with this target group was identifying youth who are school drop-outs and not merely youth who work on the street. Many street corner sites frequented by youth who wipe windscreens and retail goods were visited. It was discovered on visiting that many of the youth worked at the site but claimed to attend school in the morning and go home at night. Thus the sites detailed below were those identified as containing school drop-outs and those who may live on the streets.

Specifically, this subgroup of at-risk-youth was contacted via institutions offering specific intervention to the target as well as a snowball technique. In this way we identified areas where such youth socialized and interviewed them in this environment as well as asking them to recommend other areas. Some of the sites from which this subgroup was sourced are as follows:

- St Andrew Parish Church Care Centre
- Hagley Park Road and Maxfield Park Road intersection
- National Initiative for Street Children
- Whitfield Town
- Portia Simpson Miller Square
- Devon House
- LEAP Centre

Given the exploratory and baseline nature of this project interviews among this target group were focused on the Kingston Metropolitan Area. Information gathered here can be later used to inform information gathering in other locations.

Survey Limitations:

It is important to note that the study was limited as it relied solely on the self-reports of the target as well as the reliability of recall of past behaviour.

Sample demographics:

A total of 1559 males and 740 females were included in the sample.

Total Sample Gender

| Gender | F | % |
|---------------|----------|----------|
| Male | 1559 | 67.8 |
| Female | 740 | 32.2 |
| Total | 2299 | 100.0 |

Just over a half of adolescents in the sample were 10-14 years old while another 48% were 15-19 years old.

Sample Age

| Age | F | % |
|------------|----------|----------|
| 10-14yrs. | 1195 | 52 |
| 15-19yrs. | 1104 | 48 |
| Total | 2299 | 100.0 |

The sample was also comprised of 96.5% general population versus 3.5% at risk youth.

Sample Classification

| Youth Type | F | % |
|--------------------|----------|----------|
| General population | 2219 | 96.5 |
| At-Risk Youth | 80 | 3.5 |
| Total | 2299 | 100.0 |

At risk-youth were predominately males.

At Risk-Youth Sample Gender

| Gender | F | % |
|---------------|----------|----------|
| Male | 72 | 90 |
| Female | 8 | 10 |
| Total | 80 | 100.0 |

III GAMBLING BEHAVIOUR

Overall just over two-thirds (68%) of youth reported having been exposed to games played for money, a half (52%) had had the opportunity to play and less than a half (44.6%) had actually gambled. Of those who had ever gambled approximately two-thirds (67.1%) were current gamblers; classified as persons who had played a game for money in the last 12 months. (*see Table 1*)

Generally, exposure to gambling, opportunities to gamble and lifetime incidence of gambling was significantly higher in males and older youth aged 15-19yrs. While 7 in 10 males reported exposure to gambling, it was 6 in 10 females who reported the same. Just over a third of females reported having had the opportunity to play while a third (33%) reported having played at least one game for money in their lifetime. In contrast it was more than a half (58%) of males who reported having had the opportunity to gamble and a half (50%) who had actually gambled at least once in their lifetime. Adolescent males were significantly more likely to have initiated gambling at an earlier age than adolescent females. Regardless of gender however a similar two-thirds of those who had gambled were current gamblers, having done so in the last 12 months (*see Table 1*).

Table 1: General gambling behaviour by gender

| | Total (N=2299) % | Male (n=1559) % | Female (n=740) % | Chi square significance |
|---|------------------------|-----------------------|------------------------|----------------------------|
| <i>Aware of at least one game</i> | 99.8 | 99.9 | 99.6 | - |
| <i>(Self-reported)</i> Exposure to games played for money | 68.0 | 71.8 | 60.0 | *** |
| <i>(Self-reported)</i> Had opportunity to play a game for money | 52.0 | 58.3 | 38.8 | *** |
| Ever gambled (played any game for money) | 44.6 | 50.0 | 33.2 | - |
| Current gamblers (played at least one game for money in the last 12 months) (<i>Base=persons who have ever gambled</i>) %;(f) | 67.1; (688) | 67.8; (428) | 65.0 ; (160) | - |
| Mean age of initiation | 12.02yrs. | 11.82yrs. | 12.69yrs. | ** |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Older youth (15-19yrs) were significantly more likely than youth 10-14yrs. to report exposure to gambling, opportunity to play and having gambled at least once in their lifetime. Approximately 8 in 10 persons 15-19yrs (79.3%) reported exposure to gambling compared to 6 in 10 persons (57.5%) 10-14yrs. Additionally while more than a half (59.4%) of older youth reported opportunities to gamble and 51% reported having gambled at least once, it was less than a half (45%) of youth aged 10-14yrs who had ever had the opportunity to gamble and just over a third (38%) who had actually gambled at least once in their lifetime. Younger adolescent were significantly more likely to have initiated gambling at an earlier age than older youth. Rates of recent gambling were similar across age groups with 69% of

youth 15-19yrs reporting having gambled in the last 12 months compared to 64.6% of youth age 10-14yrs. (see Table 2)

Table 2: General gambling behaviour by age

| | Total (N=2298) % | 10-14yrs (n=1194) % | 15-19yrs (n=1104) % | Chi square significance |
|--|------------------------|---------------------------|---------------------------|----------------------------|
| Aware of at least one game | 99.8 | 99.7 | 99.8 | - |
| (Self-reported) Exposure to games played for money | 68.0 | 57.5 | 79.3 | *** |
| (Self-reported) Had opportunity to play a game for money | 52.0 | 45.1 | 59.4 | *** |
| Ever gambled (played any game for money) | 44.6 | 38.1 | 51.5 | - |
| Current gamblers (played at least one game for money in the last 12 months)) (Base=persons who have ever gambled) %;(f) | 67.1; (688) | 64.6; (294) | 69.1; (393) | - |
| Mean age of initiation | 12.02yrs. | 10.31yrs. | 13.36yrs. | *** |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

While not significant, at risk youth (defined as street children and school drop-outs) tended to also report higher exposure to gambling and opportunity to play. These at-risk youth also indicated a higher lifetime incidence of gambling when compared to the general population. At-risk youth were also more likely to report recent gambling with 86% having gambled in the last 12 months compared to 66% of the general population sample. No difference in age of initiation was observed(see Table 3)

Table 3: General gambling behaviour by Type of Youth

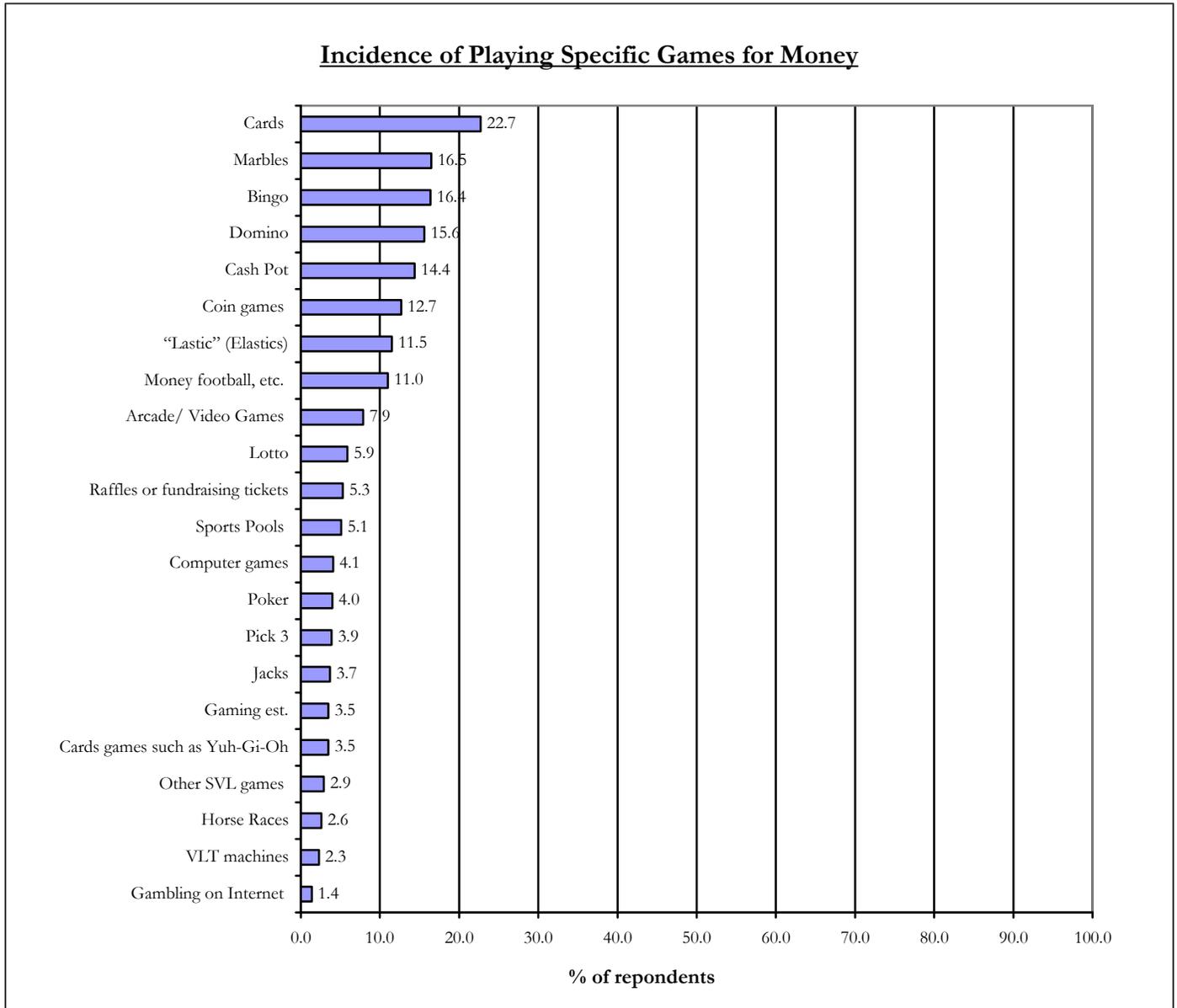
| | Total (N=2299) % | General pop. (n= 2219) % | At risk youth (n= 80) % |
|--|------------------------|-----------------------------------|-------------------------------|
| Aware of at least one game | 99.8 | 99.8 | 100.0 |
| (Self-reported) Exposure to games played for money | 68.0 | 67.6 | 80.0 |
| (Self-reported) Had opportunity to play a game for money | 52.0 | 51.6 | 62.5 |
| Ever gambled (played any game for money) | 44.6 | 43.9 | 62.5 |
| Current gamblers (played at least one game for money in the last 12 months)) (Base=persons who have ever gambled) %;(f) | 67.1; (688) | 66.2; (645) | 86.0; (43) |
| Mean age of initiation | 12.02yrs. | 12.06yrs. | 11.30yrs. |

- No significant differences emerged

While overall awareness of commercial games such as Cash Pot and Pick 3 was high, main games played were combinations of traditional games as well as the more creative childhood games. Overall cards being played for money was the most reported game (22.7%) followed by marbles (16.5%), Bingo (16.4%) and Dominoes (15.6%). Other games played for money

by an estimated 1 in every 10 persons included Cash Pot (14.4%), coin games (12.7%), “lastic” (11.5%) and money football (11.0%). (see Chart 1)

Chart 1



A. GAMBLING EXPERIENCE WITH SPECIFIC GAMES

The data also probed gambling experiences with respect to 22 specific games which were most mentioned in the focus groups conducted in the initial phase of the project. Specifically, the data measured lifetime incidence and portion currently playing these 22 games.

- Experience by gender

Male youth were more likely to have gambled on a larger number of the games being probed when compared to female youth. Specifically, males were more likely to have gambled on 19 of 22 games probed when compared to females. Young males were more likely to report a significantly higher lifetime incidence for 15 of these 22 games. (*see Table 4*)

All in all, males were significantly more likely to have engaged in the following gambling activities when compared to females in the sample:

- ✓ Arcade/video games*
- ✓ Cards not including Yuh-Gi-Oh*
- ✓ Coin games*
- ✓ Dominoes*
- ✓ Marbles*
- ✓ Money football*
- ✓ Sports pools*
- ✓ Lotto*
- ✓ Poker*
- ✓ 'lastic'
- ✓ Gambling houses
- ✓ Video lottery terminals
- ✓ Horse Racing
- ✓ Card games (such as Yuh-Gi-Oh)

*significant at $p=.01$

While not significant, males were also more likely than females to have ever played Jacks and computer games for money and to have engaged in Internet gambling and played Cash Pot. Females were nonetheless significantly more likely than males to have played Other SVL games of chance (not including Cash Pot or Pick 3). (*see Table 4*)

Current incidence, which measures betting in the last 12 months, was measured among the subgroup of respondents who had indicated ever having played games from the list of 22 games probed. Thinking of individual games, at least a half of persons who reported trial of a particular game were also current players of said game; that is they had played that game for money at least once in the last 12 months. Incidence of play within the last 12 months showed no significant differences by gender. (*see Table 5*)

- Experience by age

Older youth were more likely to have gambled on a far greater number of these specific games (*see Chart 2*). Those 15-19 years old were significantly more likely to have played 17 of the 22 games for money when compared to persons 10-14. The latter group were significantly more likely to have played card games including Yuh-Gi-Oh ($p=.025$). (*see Table 6*)

Cards (28%), Cash Pot, Bingo (22% respectively) and dominoes (20%) recorded the highest trial among the older subgroup.

While trial was most evidenced among youth 15-19 years, younger respondents 10-14 years were significantly more likely to be current players (have played the game for money in the last 12 months) of 6 of the 22 games probed (*see Table 7*). More specifically, among respondents 10-14 years old who have ever gambled on a specific game:

- ✓ 91% are currently internet gamblers (vs. 51% of youth 15-19 years, $p=.030$)
- ✓ 70% currently play Jacks for money (vs. 46% of youth 15-19 years, $p=.024$)
- ✓ 54% currently play 'lastic' for money (vs. 36% of youth 15-19 years, $p=.003$)
- ✓ 81% currently play Cash Pot (vs. 63% of youth 15-19 years, $p=.005$)
- ✓ 61% currently play marbles for money (vs. 42% of youth 15-19 years, $p=.000$)
- ✓ 72% currently bet on VLT machines (vs. 38% of youth 15-19 years, $p=.020$)

- Experience (general population vs. at risk youth)

At risk youth were also more likely to have gambled on a far greater number of specific games than youth in the general population (*see Chart 3*). Specifically, at risk youth were significantly more likely to have gambled on 19 of 22 games when compared to the general population ($p<.01$ in all 19 cases). While not significant, they were also more likely to have gambled on the remaining 3 games probed, when compared to the general population. (*see Table 8*)

General population respondents were significantly more likely to be current players of Pick 3 and other SVL games (not including Lotto or Cash Pot) when compared to at risk youth. For the remaining games no significant differences between the two groups, in respect of current play, were observed. (*see Table 9*).

Table 4: Lifetime Incidence of playing specific games for money by gender

| Games ever played for money | <i>% of persons reporting ever having played specific game for money</i> | | | |
|---|--|--------------------------------|----------------------------------|------------------------------------|
| | Total (N=2299) % | Male (n=1559) % | Female (n= 740) % | Chi square significance |
| Cards (not including poker or games such a Yuh-Gi-Oh) or board games at home, friends home or at work | 22.7 | 25.0 | 17.7 | *** |
| Marbles | 16.5 | 21.3 | 6.5 | *** |
| Bingo | 16.4 | 16.2 | 16.8 | - |
| Domino | 15.6 | 18.8 | 8.8 | *** |
| Cash Pot | 14.4 | 15.5 | 12.2 | - |
| Coin games such as heads and tails or ackee and toto/ackee and bobo | 12.7 | 15.1 | 7.7 | *** |
| “Lasticlastic” (Elasticlastics) | 11.5 | 12.8 | 8.6 | * |
| Money football, bottle stopper football and cork football | 11.0 | 15.6 | 1.5 | *** |
| Arcade or Video Games | 7.9 | 10.4 | 2.7 | *** |
| Lotto | 5.9 | 7.1 | 3.4 | ** |
| Raffles or fundraising tickets | 5.3 | 5.3 | 5.3 | - |
| Sports Pools or the outcome of sporting events (through a bookie, charity, with | 5.1 | 6.6 | 2.0 | *** |
| Computer games | 4.1 | 4.4 | 3.4 | - |
| Poker, either at home, friends home, at work or on the Internet | 4.0 | 4.9 | 2.0 | ** |
| Pick 3 | 3.9 | 4.6 | 2.3 | * |
| Jacks | 3.7 | 4.1 | 2.7 | - |
| Gambling at gaming establishments | 3.5 | 4.3 | 1.9 | * |
| Cards games such as Yuh-Gi-Oh | 3.5 | 4.2 | 2.0 | * |
| Other SVL games of chance | 2.9 | .5 | 1.6 | - |
| Horse Races, either live at the track or off track | 2.6 | 3.3 | 1.2 | * |
| Video lottery terminals (VLT machines) | 2.3 | 2.9 | 0.9 | * |
| Gambling on the Internet (not including poker) | 1.4 | 1.6 | 0.4 | - |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Table 5: Incidence of recent gambling: playing specific games for money in the last 12 months by gender

| Games ever played for money | % of persons reporting having played specific game for money in last 12 months ^Δ | | | | | |
|--|---|-----|-------|-----|--------|----|
| | Total | | Male | | Female | |
| | % | f | % | f | % | f |
| Cash Pot: | 67.7% | 224 | 66.4% | 160 | 71.1% | 64 |
| Domino | 64.0% | 229 | 62.8% | 184 | 69.2% | 45 |
| Other SVL games of chance | 63.6% | 42 | 63.0% | 34 | 66.7% | 8 |
| Cards (not including poker or games such as Yuh-Gi-Oh) or board games at home, friends home or at work | 63.5% | 331 | 62.2% | 42 | 67.4% | 89 |
| Money football, bottle stopper football and cork football | 63.4% | 161 | 63.0% | 153 | 72.7% | 8 |
| Lotto | 63.0% | 85 | 63.6% | 70 | 60.0% | 15 |
| Pick 3: | 62.9% | 56 | 61.1% | 44 | 70.6% | 12 |
| Gambling on the Internet (not including poker) | 62.5% | 20 | 64.0% | 16 | 57.1% | 4 |
| Poker, either at home, friends home, at work or on the Internet: | 62.0% | 57 | 59.7% | 46 | 73.3% | 11 |
| Sports Pools or the outcome of sporting events (through a bookie, charity, with | 60.2% | 62 | 60.2% | 62 | 60.0% | 9 |
| Horse Races, either live at the track or off track: | 60.0% | 36 | 62.7% | 32 | 44.4% | 4 |
| Jacks | 60.0% | 51 | 61.5% | 40 | 55.0% | 11 |
| Computer games | 55.3% | 52 | 58.0% | 40 | 48.0% | 12 |
| Arcade or Video Games) | 54.9% | 100 | 56.2% | 91 | 45.0% | 9 |
| Bingo | 53.7% | 202 | 52.6% | 133 | 56.1% | 69 |
| Marbles | 51.7% | 196 | 52.6% | 174 | 45.8% | 22 |
| Cards games such as Yuh-Gi-Oh | 51.2% | 42 | 49.3% | 33 | 60.0% | 9 |
| Coin games such as heads and tails or ackee and toto/ackee and bobo | 50.9% | 149 | 53.4% | 126 | 40.4% | 23 |
| Video lottery terminals (VLT machines) | 50.0% | 26 | 46.7% | 21 | 71.4% | 5 |
| “lastic” (Elastics) | 45.5% | 120 | 45.5% | 91 | 45.3% | 29 |
| Raffles or fundraising tickets | 45.5% | 55 | 46.3% | 38 | 43.6% | 17 |
| Gambling at Gaming establishments | 42.7% | 35 | 41.2% | 28 | 50.0% | 7 |

▪ No significant differences emerged

^Δ Base for each game=persons reporting every having played game at least once in their lifetime

Chart 2

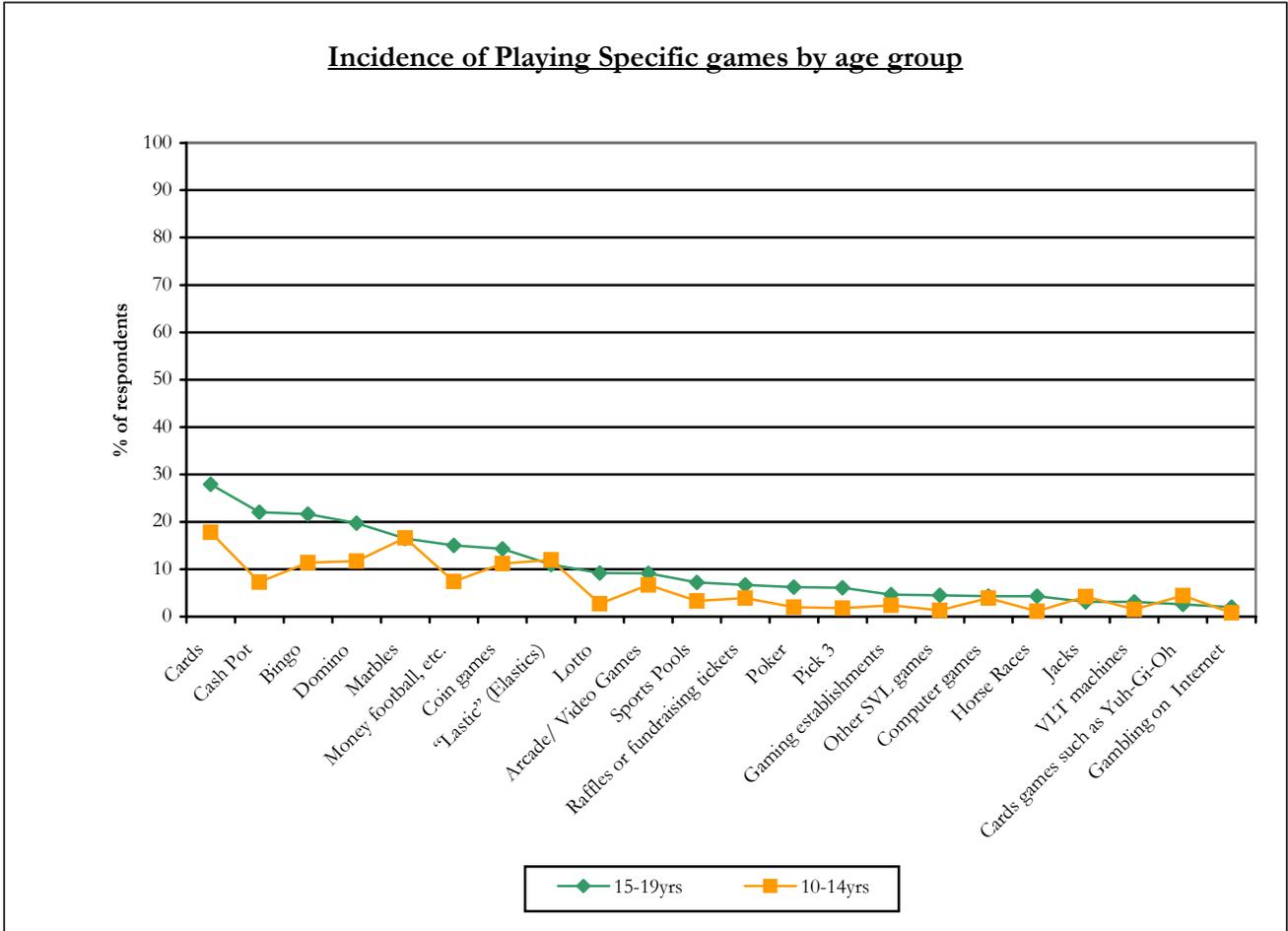


Table 6: Lifetime Incidence of playing specific games for money by Age Group

| Games ever played for money | % of persons reporting ever having played specific game for money | | | |
|--|---|---------------------------|---------------------------|----------------------------|
| | Total (N=2298) % | 10-14yrs (n=1194) % | 15-19yrs (n=1104) % | Chi square significance |
| Cards (not including poker or games such as Yuh-Gi-Oh) or board games at home, friends home or at work | 22.7 | 17.8 | 27.9 | *** |
| Marbles | 16.5 | 16.6 | 16.5 | - |
| Bingo | 16.4 | 11.4 | 21.6 | *** |
| Domino | 15.6 | 11.7 | 19.7 | *** |
| Cash Pot | 14.4 | 7.3 | 22.0 | *** |
| Coin games such as heads and tails or ackee and toto/ackee and bobo | 12.7 | 11.2 | 14.3 | * |
| “Lasticlastic” (Elasticlastics) | 11.5 | 12.0 | 11.0 | - |
| Money football, bottle stopper football and cork football | 11.0 | 7.4 | 15.0 | *** |
| Arcade or Video Games | 7.9 | 6.7 | 9.1 | * |
| Lotto | 5.9 | 2.7 | 9.2 | *** |
| Raffles or fundraising tickets | 5.3 | 3.9 | 6.7 | ** |
| Sports Pools or the outcome of sporting events (through a bookie, charity, with | 5.1 | 3.3 | 7.2 | ** |
| Computer games | 4.1 | 3.9 | 4.3 | - |
| Poker, either at home, friends home, at work or on the Internet | 4.0 | 2.0 | 6.2 | *** |
| Pick 3 | 3.9 | 1.8 | 6.1 | *** |
| Jacks | 3.7 | 4.2 | 3.1 | - |
| Cards games such as Yuh-Gi-Oh | 3.5 | 4.4 | 2.6 | * |
| Gambling at gaming establishments | 3.5 | 2.4 | 4.6 | ** |
| Other SVL games of chance | 2.9 | 1.3 | 4.5 | *** |
| Horse Races, either live at the track or off track | 2.6 | 1.1 | 4.3 | *** |
| Video lottery terminals (VLT machines) | 2.3 | 1.5 | 3.1 | * |
| Gambling on the Internet (not including poker) | 1.4 | 0.8 | 2.0 | * |

- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

Table 7: Incidence of recent gambling: playing specific games for money in the last 12 months by Age Group

| Games ever played for money | % of persons reporting having played specific game for money in last 12 months ^Δ | | | | | Chi square significance | |
|--|---|-----|----------|-----|-----------|-------------------------|-----|
| | Total | | 10-14yrs | | 15-19yrs. | | |
| | % | f | % | f | % | f | |
| Cash Pot | 67.7% | 224 | 80.5% | 70 | 63.4% | 154 | ** |
| Domino | 64.0% | 229 | 60.0% | 84 | 66.8% | 145 | - |
| Other SVL games of chance | 63.6% | 42 | 73.3% | 11 | 60.0% | 30 | - |
| Cards (not including poker or games such as Yuh-Gi-Oh) or board games at home, friends home or at work | 63.5% | 331 | 61.0% | 130 | 65.5% | 201 | - |
| Money football, bottle stopper football and cork football | 63.4% | 161 | 65.9% | 58 | 62.0% | 103 | - |
| Lotto | 63.0% | 85 | 59.4% | 19 | 63.7% | 65 | - |
| Pick 3 | 62.9% | 56 | 59.1% | 13 | 64.2% | 43 | - |
| Gambling on the Internet (not including poker) | 62.5% | 20 | 90.9% | 9 | 50.0% | 11 | * |
| Poker, either at home, friends home, at work or on the Internet | 62.0% | 57 | 50.0% | 12 | 66.2% | 45 | - |
| Sports Pools or the outcome of sporting events (through a bookie, charity, with | 60.2% | 62 | 69.2% | 27 | 55.7% | 44 | - |
| Horse Races, either live at the track or off track | 60.0% | 36 | 38.5% | 5 | 66.0% | 31 | - |
| Jacks | 60.0% | 51 | 70.0% | 35 | 45.7% | 16 | * |
| Computer games | 55.3% | 52 | 60.9% | 28 | 50.0% | 24 | - |
| Arcade or Video Games | 54.9% | 100 | 58.8% | 47 | 51.5% | 52 | - |
| Bingo | 53.7% | 202 | 56.7% | 76 | 52.3% | 126 | - |
| Marbles | 51.7% | 196 | 60.3% | 120 | 42.2% | 76 | *** |
| Cards games such as Yuh-Gi-Oh | 51.2% | 42 | 51.9% | 27 | 50.0% | 15 | - |
| Coin games such as heads and tails or ackee and toto/ackee and bobo | 50.9% | 149 | 56.7% | 76 | 46.2% | 73 | - |
| Video lottery terminals (VLT machines) | 50.0% | 26 | 72.2% | 13 | 38.2% | 34 | * |
| “lastic” (Elastics) | 45.5% | 120 | 53.8% | 77 | 35.5% | 43 | ** |
| Raffles or fundraising tickets | 45.5% | 55 | 47.8% | 22 | 43.2% | 32 | - |
| Gambling at gaming | 42.7% | 35 | 40.7% | 11 | 42.6% | 23 | - |

- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

^Δ Base for each game=persons reporting every having played game at least once in their lifetime

Chart 3

Incidence of Playing Specific Games by General Population vs At-risk Youth

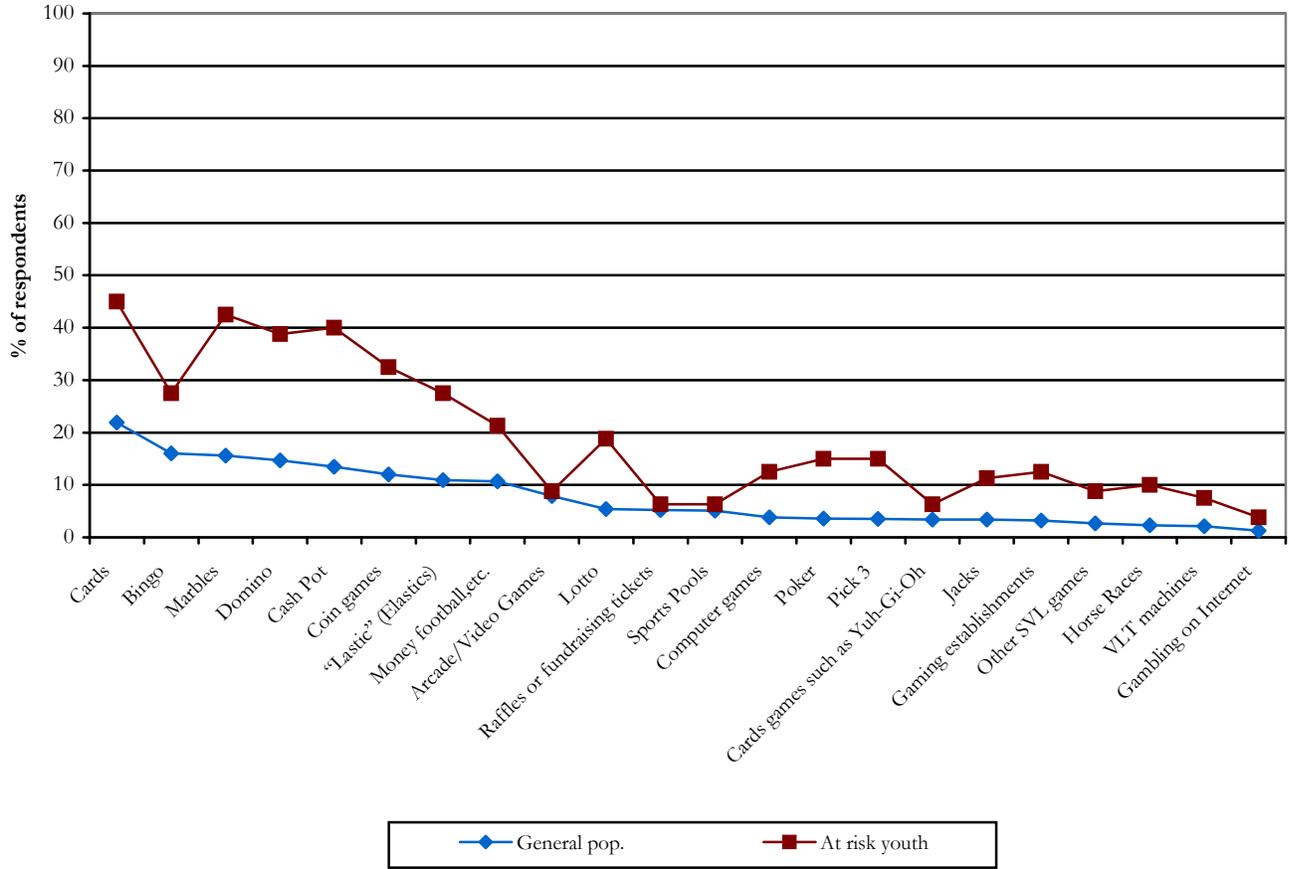


Table 8: Lifetime Incidence of playing specific games for money by General vs At-Risk Youth Populations

| Games ever played for money | <i>% of persons reporting ever having played specific game for money</i> | | | |
|---|--|---------------------------------|--------------------------------|---------------------------------------|
| | Total (N=2299) % | General pop. (n= 2219) % | At risk youth (n= 80) % | <i>Chi square significance</i> |
| Cards (not including poker or games such a Yuh-Gi-Oh) or board games at home, friends home or at work | 22.7 | 21.9 | 45.0 | *** |
| Marbles | 16.5 | 15.6 | 42.5 | *** |
| Bingo | 16.4 | 16.0 | 27.5 | ** |
| Domino | 15.6 | 14.7 | 38.8 | *** |
| Cash Pot | 14.4 | 13.5 | 40.0 | *** |
| Coin games such as heads and tails or ackee and toto/ackee and bobo | 12.7 | 12.0 | 32.5 | *** |
| “Lastic” (Elastics) | 11.5 | 10.9 | 27.5 | *** |
| Money football, bottle stopper football and cork football | 11.0 | 10.7 | 21.3 | ** |
| Arcade or Video Games | 7.9 | 7.9 | 8.8 | *** |
| Lotto | 5.9 | 5.4 | 18.8 | *** |
| Raffles or fundraising tickets | 5.3 | 5.2 | 6.3 | - |
| Sports Pools or the outcome of sporting events (through a bookie, charity, with | 5.1 | 5.1 | 6.3 | - |
| Computer games | 4.1 | 3.8 | 12.5 | *** |
| Poker, either at home, friends home, at work or on the Internet | 4.0 | 3.6 | 15.0 | *** |
| Pick 3 | 3.9 | 3.5 | 15.0 | *** |
| Jacks | 3.7 | 3.4 | 11.3 | *** |
| Cards games such as Yuh-Gi-Oh | 3.5 | 3.4 | 6.3 | *** |
| Gambling at gaming establishments | 3.5 | 3.2 | 12.5 | *** |
| Other SVL games of chance | 2.9 | 2.7 | 8.8 | ** |
| Horse Races, either live at the track or off track | 2.6 | 2.3 | 10.0 | *** |
| Video lottery terminals (VLT machines) | 2.3 | 2.1 | 7.5 | ** |
| Gambling on the Internet (not including poker) | 1.4 | 1.3 | 3.8 | - |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Table 9: Incidence of recent gambling: playing specific games for money in the last 12 months by General vs At-Risk Youth Populations

| Games ever played for money | % of persons reporting having played specific game for money in last 12 months ^Δ | | | | | |
|---|---|-----|--------------------|-----------|---------------|----|
| | Total | | General population | | At-risk youth | |
| | % | f | % | f | % | f |
| Cash Pot | 67.7% | 224 | 66.2% | 198 | 81.3% | 26 |
| Dominoes | 64.0% | 229 | 63.9% | 209 | 64.5% | 20 |
| Other SVL games of chance | 63.6% | 42 | 69.5% | 41 | 14.3% | 1 |
| Cards (not including poker or games such a Yuh-Gi-Oh) or board games at home, friends home or at work | 63.5% | 331 | 62.6% | 303 | 75.7 | 28 |
| Money football, bottle stopper football and cork football | 63.4% | 161 | 64.7% | 154 | 43.8% | 7 |
| Lotto | 63.0% | 85 | 63.3% | 76 | 60.0% | 9 |
| Pick 3 | 62.9% | 56 | 67.5% | 52 | 33.3% | 4 |
| Gambling on the Internet (not including poker) | 62.5% | 20 | 65.5% | 19 | 33.0% | 1 |
| Poker, either at home, friends home, at work or on the Internet | 62.0% | 57 | 62.5% | 50 | 58.3% | 7 |
| Sports Pools or the outcome of sporting events (through a bookie, charity, with | 60.2% | 62 | 61.9% | 70 | 20.0% | 1 |
| Horse Races, either live at the track or off track | 60.0% | 36 | 61.4% | 32 | 50.0% | 4 |
| Jacks | 60.0% | 51 | 61.3% | 46 | 50.0% | 5 |
| Computer games | 55.3% | 52 | 54.8% | 46 | 60.0% | 6 |
| Arcade or Video Games | 54.9% | 100 | 53.7% | 94 | 85.7% | 6 |
| Bingo | 53.7% | 202 | 53.4% | 189 | 59.1% | 13 |
| Marbles | 51.7% | 196 | 51.0% | 177 | 59.4% | 19 |
| Cards games such as Yuh-Gi-Oh | 51.2% | 42 | 51.3% | 39 | 50.0% | 3 |
| Coin games such as heads and tails or ackee and toto/ackee and bobo | 50.9% | 149 | 49.8% | 133 | 61.5% | 16 |
| Video lottery terminals (VLT machines) | 50.0% | 26 | 54.3% | 25 | 16.7% | 1 |
| “lastic” (Elastics) | 45.5% | 120 | 45.5% | 110 | 45.5% | 10 |
| Raffles or fundraising tickets | 45.5% | 55 | 45.7% | 53 | 40.0% | 2 |
| Gambling at gaming establishments | 42.7% | 35 | 44.4% | 32 | 30.0% | 3 |

▪ Significant differences noted for Pick 3 (p<.05) and Other SVL games (p<.005)

^Δ Base for each game=persons reporting every having played game at least once in their lifetime

B. FREQUENCY WITH WHICH GAMES PLAYED FOR MONEY

Games were played for money weekly, from as often as everyday to less often (once or twice a week). Poker, gambling on the internet (35% respectively) and coin games (33%) were played everyday or almost everyday. Jacks, money football, dominoes and “lastic” were a few of the games played once or twice a week. One in 3 young persons played weekly (*see Table 10*).

Table 10: Frequency of Play in last 12 months

| | Everyday or almost everyday % | Once or twice a week % | Once or twice a month % | Once or twice a year % |
|--|-------------------------------|------------------------|-------------------------|------------------------|
| Money football, bottle stopper football and cork football; (n=161) | 35.2 | 30.2 | 21.0 | 13.0 |
| Poker, either at home, friends home, at work or on the Internet; (n=57) | 35.1 | 26.3 | 24.6 | 14.0 |
| Gambling on the Internet (not including poker) ; (n=20) | 35.0 | 30.0 | 20.0 | 15.0 |
| Arcade or Video Games ; (n=100) | 34.0 | 35.0 | 13.0 | 18.0 |
| Coin games such as heads and tails or ackee and toto/ackee and bobo; (n=149) | 32.9 | 26.8 | 20.1 | 20.1 |
| Cash Pot; (n=224) | 32.1 | 33.0 | 17.0 | 17.9 |
| Marbles; (n=196) | 30.6 | 31.6 | 17.9 | 19.9 |
| Jacks; (n=51) | 29.4 | 39.2 | 13.7 | 17.6 |
| Cards (not including poker or games such a Yuh-Gi-Oh) or board games at home, friends home or at work; (n=331) | 26.9 | 32.3 | 20.5 | 20.2 |
| Domino; (n=229) | 26.6 | 33.2 | 21.0 | 19.2 |
| “lastic” (Elastics) ; (n=120) | 25.8 | 30.8 | 20.8 | 22.5 |
| Cards games such as Yuh-Gi-Oh; (n=42) | 25.6 | 37.2 | 18.6 | 16.3 |
| Computer games; (n=52) | 23.1 | 36.5 | 25.0 | 15.4 |
| Video lottery terminals (VLT machines) ; (n=26) | 23.1 | 38.5 | 15.4 | 23.1 |
| Pick 3; (n=56) | 21.4 | 55.4 | 16.1 | 7.1 |
| Bingo; (n=202) | 19.8 | 30.7 | 25.2 | 24.3 |
| Other SVL games of chance; (n=42) | 19.0 | 33.0 | 31.0 | 16.7 |
| Gambling at gaming establishments ; (n=35) | 14.3 | 37.1 | 22.9 | 25.7 |
| Sports Pools or the outcome of sporting events (through a bookie, charity, with; (n=62) | 12.7 | 32.4 | 16.9 | 38.0 |
| Lotto; (n=85) | 11.8 | 50.6 | 22.4 | 15.3 |
| Horse Races, either live at the track or off track; (n=36) | 5.6 | 61.1 | 13.9 | 19.4 |
| Raffles or fundraising tickets; (n=55) | 0.0 | 12.7 | 30.9 | 56.4 |

C. AMOUNT OF TIME SPENT GAMBLING

Amount of time spent gambling on specific games was heaviest (more than 3 hours) for arcade/video games (19%), Bingo (19%), computer games, (17%), cards not including Yuh-Gi-Oh (15%) and dominoes (14%) (see Table 11).

Others spent less than an hour on Pick 3 (93%), marbles (72%), other SVL games (64%), coin games (58%) and card games such as Yuh-Gi-Oh (57%) (see Table 11).

Importantly, many were unaware of how long they spent gambling at gaming establishments (97%), on horse races (92%), Jacks (80%), sport pools (78%), “lastic” (75%), raffles (75%) and Lotto (72%) (see Table 11).

Table 11: Amount of time Spent Gambling

| | <1hr | Up to an hour | 1-2hrs | 2-3hrs | More than 3 hours | Unsure |
|---|------|---------------|--------|--------|-------------------|--------|
| Arcade or Video Games ; (n=100) | 21.0 | 24.0 | 19.0 | 13.0 | 19.0 | - |
| Bingo;(n=202) | 31.7 | 22.8 | 12.9 | 9.9 | 18.8 | - |
| Cards (not including poker or games such a Yuh-Gi-Oh) or board games at home, friends home or at work | 35.6 | 23.6 | 16.3 | 6.0 | 14.5 | - |
| Cards games such as Yuh-Gi-Oh | 57.1 | 21.4 | 4.8 | - | 2.4 | - |
| Coin games such as heads and tails or ackee and toto/ackee and bobo | 58.4 | 25.5 | 6.0 | 3.4 | 2.7 | - |
| Computer games | 30.8 | 21.2 | 13.5 | 5.8 | 17.3 | - |
| Domino | 29.3 | 18.3 | 20.5 | 13.1 | 14.4 | - |
| Gambling at gaming establishments | - | - | - | 2.9 | - | 97.1 |
| Gambling on the Internet (not including poker) | 10.0 | 15.0 | 20.0 | 5.0 | - | 50.0 |
| Horse Races, either live at the track or off track | 2.8 | 2.8 | - | - | 2.8 | 91.7 |
| Jacks | 7.8 | 2.0 | 7.8 | - | 2.0 | 80.4 |
| “lastic” (Elastics) | 13.3 | 3.3 | 3.3 | 2.5 | 2.5 | 75.0 |
| Lotto | 16.5 | 3.5 | 1.2 | 2.4 | - | 71.8 |
| Cash Pot | 27.2 | 0.9 | 1.8 | 0.4 | 4.7 | 69.2 |
| Pick 3 | 92.9 | 1.8 | 1.8 | 1.8 | 0.4 | 0.0 |
| Other SVL games of chance | 64.3 | 2.4 | 2.4 | - | 1.8 | 28.6 |
| Marbles | 71.7 | 0.5 | 0.5 | - | 2.4 | 90.8 |
| Money football, bottle stopper football and cork football | 20.5 | 9.9 | 9.9 | 3.1 | 0.5 | 53.4 |
| Poker, either at home, friends home, at work or on the Internet | 14.0 | 7.0 | 10.5 | 5.3 | 3.1 | 56.1 |
| Raffles or fundraising tickets | 12.7 | 7.3 | 1.8 | 3.6 | 7.0 | 74.5 |
| Sports Pools or the outcome of sporting events (through a bookie, charity, with | 16.9 | 4.2 | 1.4 | 0.0 | 0.0 | 77.5 |
| Video lottery terminals (VLT machines) | 19.2 | 23.1 | 7.7 | 3.8 | 0.0 | 42.3 |

D. AMOUNT OF MONEY SPENT GAMBLING IN LAST 6 MONTHS

Over the last 6 months, 10-19 year old youth spent heaviest at gaming establishments and on horse racing, reporting a mean outlay of approximately \$900 respectively. The maximum amount spent at gaming establishments was \$13,400 while a maximum of \$10,000 was spent on horse racing. No significant difference, in amount of money spent, emerged for those 10-14 versus those 15-19 years. (see Table 12).

Fundraisers, poker, internet gambling, computer games and sports pools followed with an average of approximately \$209-\$270 being spent on these activities in the same six month period. The maximum spent on these activities ranged between a low of \$1,500 to a high of \$6,500 (see Table 12).

Table 12: Amount of money spent gambling in last 6 months

| | Median \$ | Mean \$ | Minimum \$ | Maximum \$ |
|---|--------------|------------|---------------|---------------|
| Gambling at gaming establishments | 50.00 | 902.29 | 5.00 | 13400.00 |
| Horse Races, either live at the track or off track | 100.00 | 893.61 | 10.00 | 10000.00 |
| Raffles or fundraising tickets | 100.00 | 265.89 | 20.00 | 5000.00 |
| Poker, either at home, friends home, at work or on the Internet | 30.00 | 233.45 | 1.00 | 4000.00 |
| Gambling on the Internet (not including poker) | 50.00 | 231.04 | 10.00 | 2500.00 |
| Computer games | 50.00 | 226.13 | 1.00 | 6500.00 |
| Sports Pools or the outcome of sporting events (through a bookie, charity, with | 100.00 | 209.03 | 10.00 | 1500.00 |
| Arcade or Video Games | 50.00 | 173.10 | 5.00 | 5000.00 |
| Money football, bottle stopper football and cork football | 50.00 | 139.91 | 1.00 | 5000.00 |
| Cards (not including poker or games such a Yuh-Gi-Oh) or board games at home, friends home or at work | 20.00 | 104.91 | 1.00 | 5000.00 |
| Cash Pot | 30.00 | 87.05 | 5.00 | 2000.00 |
| Domino | 40.00 | 84.43 | 1.00 | 2300.00 |
| Lotto | 40.00 | 77.53 | 10.00 | 600.00 |
| Bingo | 30.00 | 74.32 | 2.00 | 1000.00 |
| Pick 3 | 45.00 | 71.16 | 10.00 | 1000.00 |
| Other SVL games of chance | 50.00 | 54.14 | 4.00 | 300.00 |
| Video lottery terminals (VLT machines) | 50.00 | 54.12 | 10.00 | 100.00 |
| Cards games such as Yuh-Gi-Oh | 20.00 | 35.05 | 1.00 | 200.00 |
| Jacks | 10.00 | 31.59 | 1.00 | 500.00 |
| Coin games such as heads and tails or ackee and toto/ackee and bobo | 10.00 | 30.99 | 1.00 | 500.00 |
| Marbles | 10.00 | 23.55 | 1.00 | 300.00 |
| “lastic” (Elastics) | 10.00 | 22.73 | 1.00 | 500.00 |

E. REASONS FOR GAMBLING

Gambling was motivated primarily by the excitement and entertainment value of the activities as well as the prospect of winning money. Specifically the vast majority of youth gambled for excitement (84%), entertainment (81%) and to win money (73%) . Six in ten youth also found the skill factor of the activities appealing and gambled, because they are good at it” (63%) (see Table 13).

Examining reasons by gender revealed that male youth were significantly more likely than females to be motivated by the skill and luck appeal of gambling. Males were more likely to gamble because they felt they are ‘good at it’ (66%) and because they ‘feel lucky’ (61%). They were also more likely to use gambling to fill an emotional void and thus engage in such activities “to be alone” (18%). (see Table 13).

Table 13: Reasons for Gambling by Gender

| | Total (N=705) % | Male (n=541) % | Female (n=164) % | Chi square Significance |
|------------------------------------|--------------------------------|-------------------------------|---------------------------------|------------------------------------|
| Because it’s exciting and fun | 84.2 | 83.8 | 85.8 | - |
| For entertainment or fun | 80.9 | 80.8 | 81.1 | - |
| To win money | 73.0 | 74.9 | 67.1 | - |
| Because you’re good at it | 63.3 | 66.4 | 53.0 | ** |
| Because you’re lucky | 58.2 | 60.6 | 50.0 | * |
| To do things with your friends | 57.0 | 57.7 | 54.9 | - |
| To forget problems for a while | 54.0 | 53.8 | 54.9 | - |
| It decreases my boredom | 50.9 | 50.1 | 53.7 | - |
| Out of curiosity | 34.9 | 34.6 | 36.0 | - |
| To support good causes | 29.5 | 30.1 | 27.4 | - |
| Because of problems in your family | 18.6 | 18.9 | 17.7 | - |
| To be alone | 15.9 | 17.7 | 9.8 | * |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Younger respondents (10-14 years old) were significantly more likely to have gambled because of the skill appeal and their perception of being ‘good at it’ (70%) as well as to a coping mechanism as 6 in 10 gambled to ‘forget their problems for a while” (61%). Older youth on the other hand were significantly more likely to gamble for entertainment and fun (85%) and to decrease boredom (56%) (see Table 14)..

Table 14: Reasons for Gambling by Age

| | Total (N=705) % | 10-14yrs (n=302) % | 15-19yrs (n=402) % | Chi square Significance |
|------------------------------------|-----------------------|--------------------------|--------------------------|----------------------------|
| Because it's exciting and fun | 84.2 | 81.8 | 86.0 | - |
| For entertainment or fun | 80.9 | 74.8 | 85.3 | ** |
| To win money | 73.0 | 71.9 | 74.1 | - |
| Because you're good at it | 63.3 | 69.9 | 58.5 | * |
| Because you're lucky | 58.2 | 61.6 | 55.5 | - |
| To do things with your friends | 57.0 | 55.0 | 58.7 | - |
| To forget problems for a while | 54.0 | 61.3 | 48.8 | * |
| It decreases my boredom | 50.9 | 43.7 | 56.2 | * |
| Out of curiosity | 34.9 | 33.4 | 35.8 | - |
| To support good causes | 29.5 | 33.1 | 26.6 | - |
| Because of problems in your family | 18.6 | 22.8 | 15.4 | - |
| To be alone | 15.9 | 16.9 | 15.2 | - |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

The general population was significantly more likely to gamble for excitement and fun (85%) whilst at risk youth were significantly more likely to gamble for the skill appeal -“good at it” (79%) and emotional reasons-to be alone (30%). (see Table 15).

Table 15: Reasons for Gambling (general population vs. at risk youth)

| | Total (N=705) % | General pop. (n= 662) % | At risk youth (n=43) % | Chi Square Significance |
|------------------------------------|-----------------------|----------------------------------|---------------------------------|----------------------------|
| Because it's exciting and fun | 84.2 | 85.0 | 72.1 | * |
| For entertainment or fun | 80.9 | 81.0 | 79.1 | - |
| To win money | 73.0 | 72.2 | 86.0 | - |
| Because you're good at it | 63.3 | 62.2 | 79.1 | * |
| Because you're lucky | 58.2 | 57.3 | 72.1 | - |
| To do things with your friends | 57.0 | 57.6 | 48.8 | - |
| To forget problems for a while | 54.0 | 53.2 | 67.4 | - |
| It decreases my boredom | 50.9 | 50.2 | 62.8 | - |
| Out of curiosity | 34.9 | 34.6 | 39.5 | - |
| To support good causes | 29.5 | 29.6 | 27.9 | - |
| Because of problems in your family | 18.6 | 18.3 | 23.3 | - |
| To be alone | 15.9 | 15.0 | 30.2 | * |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

F. WHERE GAMBLING TAKES PLACE

Gambling primarily takes place at home, on the street side or at school. In the case of school, playing games for money often took place during a class break and/or on fun days. The bar also emerged as a key location for persons who bet via horse racing, poker and video terminal machines (*see Table 16*).

Table 16: Location of gambling

| | Home | On the street | School | Bars | Gaming Lounge | Vendor | Friend/neighbor | Plaza /park | Track/betting shop | Corner shop | Other |
|-------------------------|------|---------------|--------|------|---------------|--------|-----------------|-------------|--------------------|-------------|-------|
| | % | % | % | % | % | % | % | % | % | % | % |
| Arcade or Video Games | 41 | 9 | 1 | 3 | 27 | 8 | 6 | 3 | 2 | 3 | 3 |
| Bingo | 43 | 29 | 1 | 4 | 5 | 6 | 4 | 1 | 1 | 5 | 3 |
| Cards | 47 | 23 | 13 | 2 | 3 | 4 | 5 | 2 | - | 3 | 2 |
| Cards such as Yuh-Gi-Oh | 52 | 12 | 19 | - | - | 5 | 10 | - | - | 2 | - |
| Coin games | 34 | 21 | 42 | - | - | 1 | 3 | 2 | - | 1 | 2 |
| Computer games | 65 | 4 | 6 | - | 4 | 4 | 14 | - | - | 2 | 4 |
| Domino | 38 | 30 | 4 | 6 | 2 | 6 | 6 | 5 | 1 | 5 | 1 |
| Internet gambling | 82 | - | - | - | 6 | 6 | 6 | - | - | - | - |
| Horse Races | 7 | 15 | 2 | 15 | 7 | 20 | 2 | 4 | 29 | - | 2 |
| Jacks | 71 | 13 | 21 | - | - | - | 2 | 2 | - | 2 | - |
| “lastic” (E”lastic”s) | 55 | 22 | 15 | - | 1 | 3 | 3 | 4 | - | - | - |
| Marbles | 43 | 24 | 22 | - | - | 3 | 10 | 1 | 1 | - | 3 |
| Money football etc | 24 | 30 | 28 | 1 | - | 7 | 3 | 15 | - | 1 | 3 |
| Poker | 25 | 28 | 3 | 25 | 6 | 6 | - | 4 | - | 3 | - |
| Raffles/fundraisers | 12 | 30 | 25 | - | 4 | 14 | - | 11 | - | - | 8 |
| Sports Pools | 23 | 14 | 11 | 7 | 3 | 11 | 4 | 23 | 1 | 3 | 2 |
| VL/T machines | 24 | 10 | - | 31 | 24 | - | 7 | - | - | - | 3 |

Games were played primarily with friends (84.5%) and family members (26.7%) (see Table 17). more than a quarter (28.3%) played with persons other than family or friends.

Table 17: Who games played with

| | <i>% of respondents who gambled in last 12 months (n=703)</i> |
|----------------------------------|---|
| Played with friends | 84.5 |
| Played with other people. | 28.3 |
| Played with other family members | 26.7 |
| Played alone | 6.1 |
| Played with parents | 4.3 |

G. TYPES OF CARD GAMES PLAYED

Three-a-card was most popular among the sample regardless of gender or age. It was however the males (76% vs. females: 69%) and older youth (78% vs. 10-14 years: 68%) who mentioned this card game most often. Also quite popular were sinker, romeys and burns, across both sexes and age groups (see Tables 18 and 19).

Table 18: Types of card games played by Gender

| | Total (n=328) | Male (n=248) | Female (n=80) |
|-------------------|--------------------------|-------------------------|--------------------------|
| | % | % | % |
| Three-a-card | 74.1 | 75.8 | 68.8 |
| Sinker | 31.7 | 37.9 | 12.5 |
| Burns | 31.1 | 27.0 | 43.8 |
| Romey | 28.0 | 28.2 | 27.5 |
| Black Jack | 13.7 | 13.3 | 15 |
| Five-a-card | 10.7 | 11.3 | 8.8 |
| Strip Me | 5.2 | 4 | 8.8 |
| Go fishing | 3.7 | 3.2 | 5 |
| Pass Round Donkey | 2.7 | 2.4 | 3.8 |
| Steel Castle | 1.2 | 1.2 | 1.3 |
| Flush | 0.6 | - | 2.5 |
| Stress Fighter | 0.3 | 0.4 | - |

Table 19: Types of card games played by Age

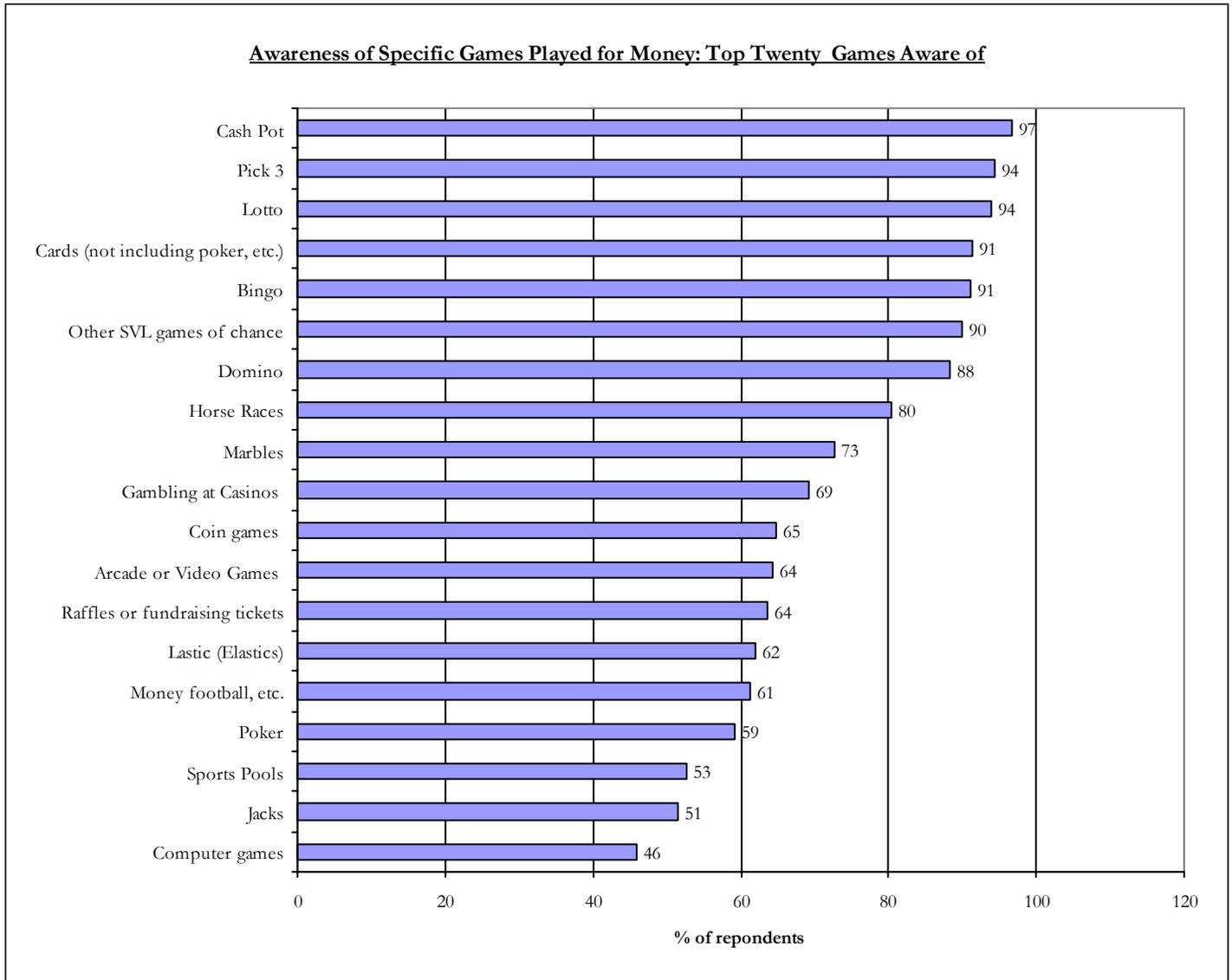
| | Total (n=328) | 10-14 years (n=131) | 15-19 years (n=197) |
|-------------------|--------------------------|--------------------------------|--------------------------------|
| | % | % | % |
| Three-a-card | 74.1 | 67.9 | 78.2 |
| Sinker | 31.7 | 21.4 | 38.6 |
| Burns | 31.1 | 39.7 | 25.4 |
| Romey | 28.0 | 20.6 | 33.0 |
| Black Jack | 13.7 | 9.2 | 16.8 |
| Five-a-card | 10.7 | 6.1 | 13.7 |
| Strip Me | 5.2 | 2.3 | 7.1 |
| Go fishing | 3.7 | 5.3 | 2.5 |
| Pass Round Donkey | 2.7 | 3.1 | 2.5 |
| Steel Castle | 1.2 | 2.3 | 0.5 |
| Flush | 0.6 | 0.8 | 0.5 |
| Stress Fighter | 0.3 | 0.8 | - |

IV. AWARENESS OF AND ATTITUDES TO GAMBLING

A. AWARENESS

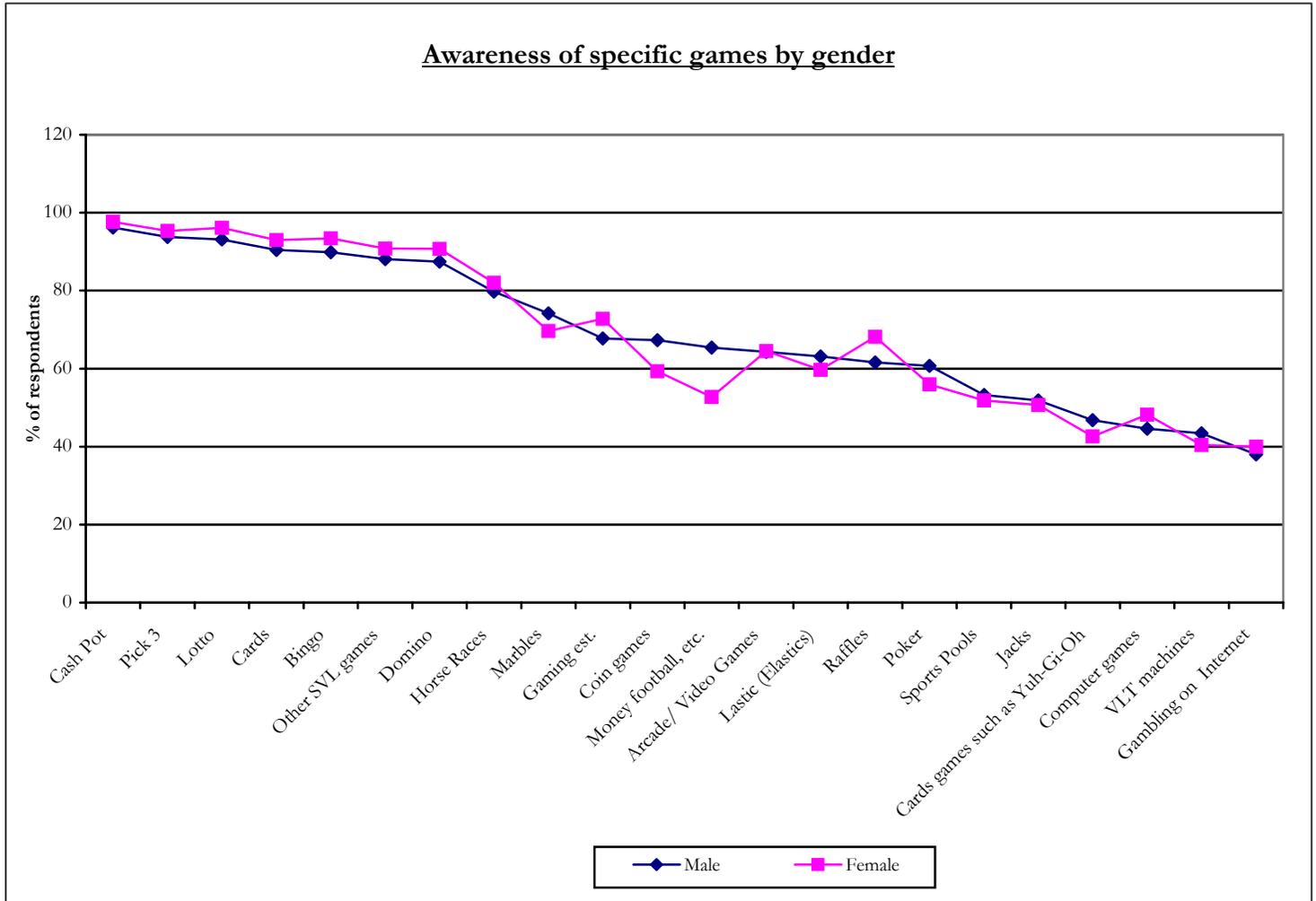
Almost all respondents (99.8%) were aware of games being played for money. Awareness of specific games however varied by the game itself. This was highest among games of chance, cards (91%) and Bingo (91%). Games of chance aware of included Cash pot (97%), Pick 3 (94%), Lotto (94%) and other Supreme Ventures Ltd's games (90%). (see Chart 4)

Chart 4



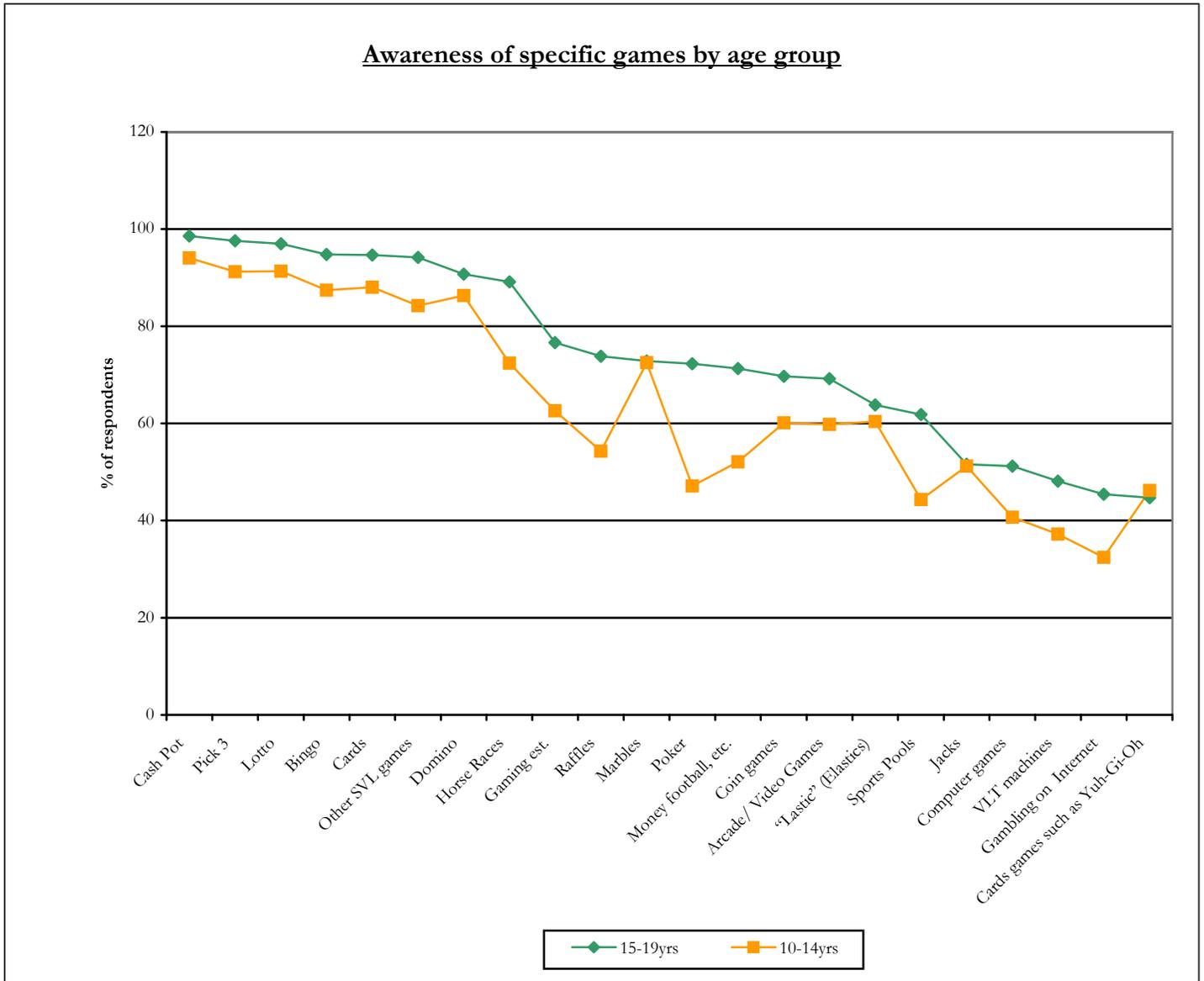
Female youth were significantly more aware of established games such as Bingo, cards, board games, Lotto, other SVL games and raffles while males were significantly more aware of games such as coin games, card games such as Yuh-Gi-Oh, marbles, money football and poker. For all other games respondents showed similar levels of awareness. (see Chart 5)

Chart 5



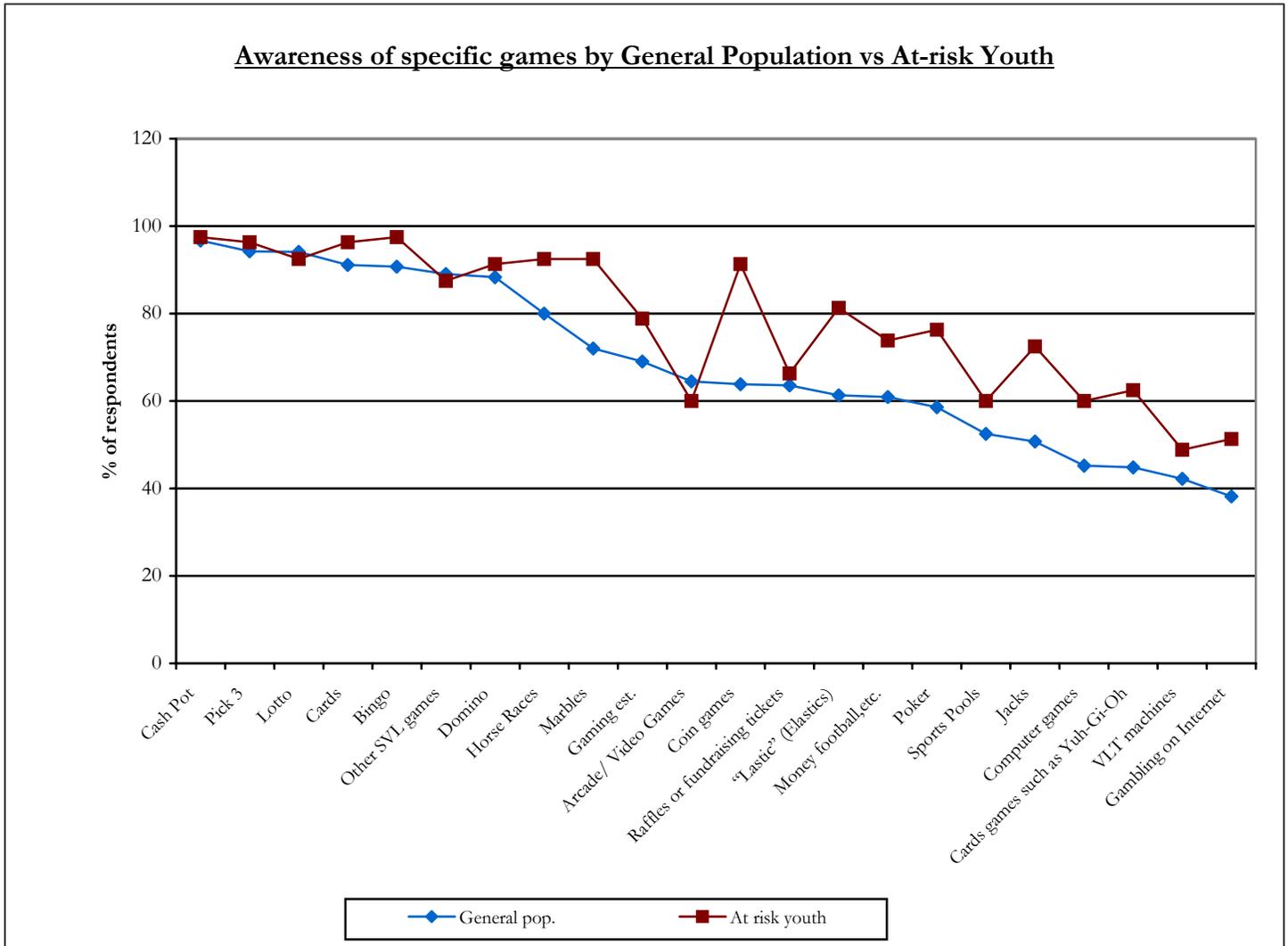
Overall older youth appeared more aware of specific games played for money than the younger age cohort. Only awareness of card games such as Yuh-Gi-Oh, Jacks, “lastic” and marbles were similar across both age groups. For the remaining 16 games, youth 15-19yrs. reported significantly higher awareness. (See chart 6)

Chart 6



At-risk-youth had significantly higher awareness for many of the established games such as: Bingo, card games, coin games, computer games, internet gambling, horse racing as well as the more childhood entry games such as jacks, “lastics”, marbles, money football and poker. Awareness of Cash Pot, Pick 3, Lotto, other SVL games, arcade and video games as well as raffles as games played for money was similar across both groups. (See Chart 7)

Chart 7



B. ATTITUDES TO GAMBLING:

In order to measure overall attitudes to gambling respondents were asked to indicate whether they agreed or disagreed with specific statements reflecting how persons felt about gambling. Respondents were also asked to indicate whether they felt certain statements relating to how persons viewed gambling were true or false. Factor analysis was then performed on these statements and four distinct factors emerged. These factors organize the attitudinal statements into four distinct dimensions of respondents' attitudes to gambling.

Factor 1: Gambling is fun, exciting and a positive contributor

Factor one comprised of 8 items which described gambling as fun, exciting and something done for relaxation. This attitude of gambling as fun and excitement also endorsed the activity as one which was financially rewarding and could give the individual a chance in life as well as contribute to the betterment of the country. Items which reflected this view were:

- Gambling is fun
- Gambling is something you do for relaxation
- I've no problem with gambling and people who gamble
- Gambling can make you big and give you a chance in life
- Playing games for money adds excitement and fun
- A gambler can be a good person
- Gambling is a means to get rich
- Gambling can contribute to making the country better

Generally gambling was thought to hold some element of fun and excitement with most persons showing moderate endorsement (56.7%) for this view towards gambling. This implies that youth generally see gambling as an activity which offers some excitement and fun as well as providing a possibility of monetary gain. While there was some endorsement for this view it is important to know that most did not show high support but held a rather moderate view of the excitement appeal of gambling. (*see Chart 8*)

Factor 2: Gambling is addictive and wrong

Factor 2 consisted of 6 items describing gambling as extremely negative of the degree of drug addiction and prostitution. This view describes gambling as highly addictive and destructive which can lead to crime and "war" (street violence including gang war). This view of gambling held any such activity as bad and wrong. Specific items included in this factor were:

- Gambling is like drug addiction and prostitution
- One can get addicted to gambling easily
- Gambling can lead to crime and "war"
- Gambling is bad
- God says gambling is wrong
- Gambling and risk taking are the same thing

Overall, most persons supported this view of gambling with approximately 6 in 10 (60%) scoring high on the resultant scale. This suggests that despite acknowledging the excitement and recreational appeal of gambling most persons simultaneously hold the view of gambling as activities with the possibility of extremely negative effects including addiction, crime and war. (see Chart 8)

Gambling is endorsed here as an activity similar to drug addiction and prostitution. In fact almost two-thirds (64%) of respondents agreed with the statement “*gambling is like drug addiction and prostitution*”.

Factor 3: Gambling is a loser’s game.

Gamblers accept their world and so are perceived as never feeling bad or depressed about losing. Qualitative research had found that the phrase gambling referred to games where large bets were made and afforded one the chance of a big win or a big loss. This was viewed as different from smaller games and games of chance. Respondents therefore viewed gambling as a high loss, high gain activity. The potential for high losses can be interpreted as regardless of who is gambling the loss is big and can make one poor. Hence it was perceived under this attitude to gambling that only the rich gamble because they can afford to lose and then never felt bad about losing.

This view of gambling generally received moderate (47.5%) to low (42.7%) support. This implies that while almost 5 in 10 persons held some support for the view of gambling as a losers game, 4 in 10 did not support this perception. (see Chart 8) Items included in this scale were:

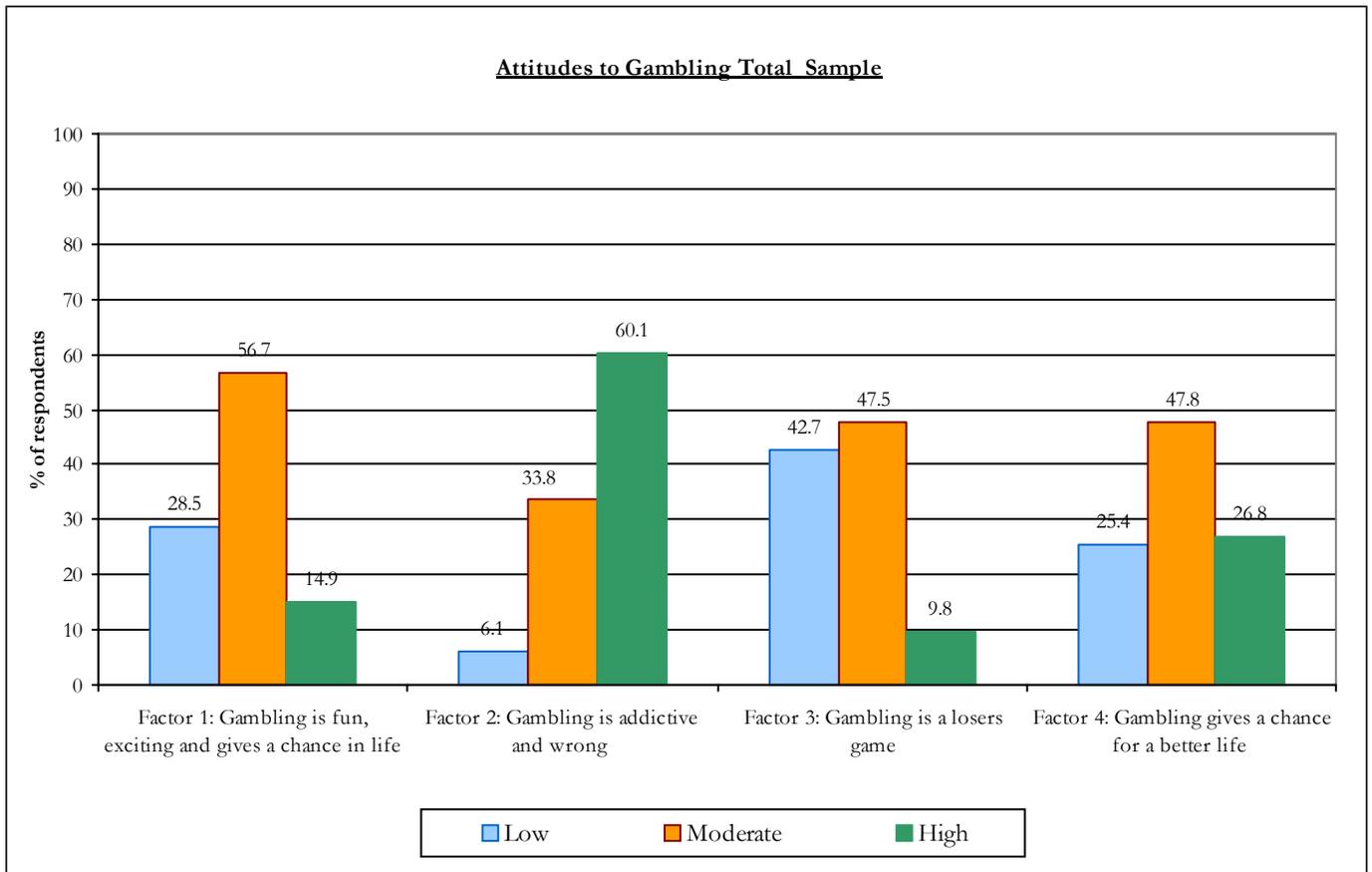
- Gamblers are poor (*because they keep losing*)
- You never win at gambling because the system always cheats
- Only rich people gamble
- A gambler has no use
- People who gamble never feel bad/depressed about losing

Factor 4: Gambling gives a chance for a better life

The fourth factor was one which described gambling as a means of advancement as it afforded the player the opportunity for a better life. Statements which reflected this view centered on the winning of the activity and the solution winning brings to financial problems. It also included the optimistic view that the gambler does win more than is lost and will win their money back even on a losing streak. This view contradicts the previous loser’s game perception describing instead a situation where the player wins more than they lose and at least breaks even before finishing the activity. This view also encompassed the affirmation that Lotto and Cash Pot provide the poor a way to “step-up in life”. Overall a quarter (26.4%) of respondents held high support for this view with an additional 47.2% reporting moderate support (see Chart 8). Items comprising this factor were:

- Winning the big jackpot solves the player's problems
- Your odds of winning the jackpot are increased if you buy more
- When people gamble they usually win more than they lose
- Lotto and Cash Pot really gives poor people a chance to step-up in life
- People generally win their money back if they have a losing streak
- Gambling refers only to activities in gaming establishments, racetracks and bars

Chart 8



Overall boys were more likely than girls to exhibit favorable attitudes to gambling. They were significantly more likely to see gambling as fun and exciting (*High endorsement: Males 16.0% vs Females 12.4%*) as well as providing a chance for a better life (*High endorsement: Males 26.8% vs Females 18.9%*). Interestingly they were also the group more critical of gambling and were significantly more likely to endorse the perception of it as a loser's game (*High endorsement: Males 11.2% vs Females 6.6%*). Both gender equally endorsed the view of gambling as addictive and wrong (*High endorsement: Males 59.5% vs Females 61.4%*). (see Table 20)

Table 20: Attitude to Gambling by Gender

| Attitude to gambling | Males (n=1559) % | Female (n=740) % | Chi-square value |
|---|------------------------|------------------------|---------------------|
| Factor 1: Gambling is fun, exciting and a positive contributor | Males | Females | |
| Low | 27.0 | 31.6 | |
| Moderate | 57.0 | 55.9 | * |
| High | 16.0 | 12.4 | |
| Factor 2: Gambling is addictive and wrong | | | |
| Low | 6.4 | 5.4 | |
| Moderate | 34.1 | 33.2 | - |
| High | 59.5 | 61.4 | |
| Factor 3: Gambling is a loser's game | | | |
| Low | 40.7 | 46.8 | |
| Moderate | 48.0 | 46.5 | *** |
| High | 11.2 | 6.6 | |
| Factor 4: Gambling gives a chance for a better life | | | |
| Low | 27.6 | 36.4 | |
| Moderate | 45.6 | 44.7 | *** |
| High | 26.8 | 18.9 | |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Attitudes to gambling were also found to vary significantly by age (see Table 21). Overall older youth 15-19yrs, who often have had greater experience gambling, hold a more realistic attitude towards such activities. They appear to recognize gambling as fun and exciting while simultaneously acknowledging its potential pitfalls and perceiving it as wrong and addictive. While it is not thought to be a loser's game by them it is also not necessarily viewed as giving one a chance on life.

Specifically, they were significantly more likely to endorse gambling as both fun and exciting (*High endorsement: 15-19yrs. 20.0% vs 10-14yrs 9.2%*) as well as being addictive and wrong (*High endorsement: 15-19yrs. 70.9% vs 10-14yrs 50.1%*). While they were also less likely to view gambling as a loser's game (*High endorsement: 15-19yrs. 6.8% vs 10-14yrs 12.5%*) and were also less likely to see such activities as a chance for a better life (*High endorsement: 15-19yrs. 22.3% vs 10-14yrs 26.0%*) (see Table 21).

Table 21: Attitude to Gambling by Age

| Attitude to gambling | 10-14yrs. (n=1194) % | 15-19yrs. (n=1104) % | Chi-square value |
|---|----------------------------|----------------------------|---------------------|
| Factor 1: Gambling is fun, exciting and a positive contributor | | | |
| Low | 38.7 | 17.4 | |
| Moderate | 52.1 | 61.7 | * |
| High | 9.2 | 20.9 | |
| Factor 2: Gambling is addictive and wrong | | | |
| Low | 8.9 | 3.1 | |
| Moderate | 41 | 26 | *** |
| High | 50.1 | 70.9 | |
| Factor 3: Gambling is a loser's game | | | |
| Low | 34.8 | 51.2 | |
| Moderate | 52.7 | 42 | *** |
| High | 12.5 | 6.8 | |
| Factor 4: Gambling gives a chance for a better life | | | |
| Low | 25.5 | 35.6 | |
| Moderate | 48.4 | 42.1 | *** |
| High | 26.0 | 22.3 | |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Persons who reported having gambled at least once in their life appeared to have significantly different attitudes towards gambling when compared to their non-gambling counterparts. Specifically persons who had gambled at least once held a significantly more favorable attitude towards such activities than those who had never gambled. Those who had gambled were significantly more likely to endorse such activities as fun and exciting (*High endorsement: Gambled 23.5% vs Never gambled 7.9%*) as well as giving a chance for a better life (*see Table 22*).

Table 22: Attitude to Gambling by Gambling Experience

| Attitude to gambling | Never Gambled (n=1273) % | Gambled at least once (n=1025) % | Chi-square value |
|---|--------------------------|----------------------------------|------------------|
| Factor 1: Gambling is fun, exciting and a positive contributor | | | |
| Low | 38.6 | 15.9 | |
| Moderate | 53.5 | 60.6 | *** |
| High | 7.9 | 23.5 | |
| Factor 2: Gambling is addictive and wrong | | | |
| Low | 5.3 | 7.0 | |
| Moderate | 31.6 | 36.6 | *** |
| High | 63.0 | 56.4 | |
| Factor 3: Gambling is a loser's game | | | |
| Low | 40.3 | 45.7 | |
| Moderate | 49.4 | 45.2 | * |
| High | 10.3 | 9.1 | |
| Factor 4: Gambling gives a chance for a better life | | | |
| Low | 34.4 | 25.4 | |
| Moderate | 43.4 | 47.8 | *** |
| High | 22.2 | 26.8 | |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

V. GAMBLING AND ITS RELATION TO RISK BEHAVIOUR

- *Males:*

Overall gambling in boys appeared to have an association with other risk behavior. Males who reported having gambled at least once in their lifetime were also significantly more likely to report having engaged in substance use. Specifically boys who had gambled were almost twice as likely as boys who had never gambled to engage in substance use including having smoked cigarettes, engaged in binge drinking, smoked ganja and drank ganja tea. (see Table 23)

Table 23: Gambling engagement and its relation to lifetime risk behaviour in males

| <i>During your lifetime have you ever...</i> | Never gambled | Gambled at least once |
|--|----------------------|------------------------------|
| Males | (n=780) % | (n=779) % |
| Had at least one drink of alcohol | 65.4 | 81.4 *** |
| Had five or more drinks of alcohol in a row | 16.4 | 29.7 *** |
| Smoked cigarettes | 13.6 | 31.7 *** |
| Smoked ganja | 12.1 | 27.5 *** |
| Drank ganja tea | 7.7 | 17.5 *** |
| Sniffed glue or any other inhalant | 2.9 | 3.9 |
| Used ecstasy | 0.3 | 0.6 |
| Used crack/cocaine | 0.1 | 0.1 |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Additionally boys who gambled were also significantly more likely to report having taken part in almost all risk behaviour probed in the last 12 months. When compared to their non-gambling counterparts, boys who had gambled were almost twice as likely to report skipping a class, being involved in a group fight, carrying a weapon to school, injuring someone seriously, stealing from a family member and being arrested by the police. They were also significantly more likely to report failing a class and having to repeat a grade. (see Table 24)

Table 24: Gambling engagement and its relation to Past 12 Months risk behaviour in males

| <i>Activities involved in within the last 12 MONTHS</i> | Gambled at least once (n=779) % | Never gambled (n=780) % | Significance |
|---|--|--------------------------------|---------------------|
| MALES | | | |
| A physical fight | 49.4 | 44.0 | - |
| Failing a class | 30.9 | 23.7 | ** |
| Skipping a class | 25.2 | 14.6 | *** |
| Failing a grade (having to repeat a grade) | 22.1 | 15.9 | ** |
| A group fight | 21.1 | 12.8 | *** |
| Carrying a weapon to school | 18.4 | 9.0 | *** |
| Skipping a day of school | 16.0 | 12.2 | - |
| Injuring someone seriously | 11.8 | 6.7 | *** |
| Stealing from a friend or family member | 11.6 | 6.7 | ** |
| Breaking a window | 10.4 | 8.2 | - |
| Deliberately damaging someone else's property | 9.6 | 7.6 | - |
| Starting a fire | 6.9 | 5.5 | - |
| Being arrested by the police | 6.9 | 2.2 | *** |
| Running away from home | 4.6 | 2.2 | - |
| Shoplifting | 3.7 | 3.3 | - |
| Riding in a stolen car | 1.4 | 0.5 | - |
| Stealing a car | 0.4 | 0.1 | - |

- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

In addition to being more likely to engage in risk behaviour, persons who had gambled at least once were also more likely to report greater frequency of physical violence and drug use. Specifically while few males reported having sold or been offered an illegal drug, when compared to non-gambling males, males who had gambled were twice as likely to report having this experience two or more times within the last 12 months (*Non-Gambling males 2.1% vs Gambling males 4.5%*) (see Table 25).

Males who had gambled appear to experience more physical violence in their lives than non-gambling males. Specifically, males who had gambled were significantly more likely to report two or more occasions within the last 12 months of carrying a weapon to protect themselves (*Gambling males 6.4% vs Non-Gambling males 2.4%*), carrying a knife for protection (*Gambling males 13.5% vs Non-Gambling males 7.3%*), belonging to a gang (*Gambling males 9.9% vs Non-Gambling males 3.6%*) and being threatened or injured with a weapon (*Gambling males 7.8% vs Non-Gambling males 4.2%*) (see Table 25).

While more than a third (37%) of males who had gambled reported two or more occasions of being in a physical fight significantly fewer non-gambling males (31.3%) reported similar behavior. Additionally, while more than 4 in 10 (41%) of males who had gambled had hit or slapped someone 2 or more times in the last year it was less than a third (33%) of males who had never gambled who mirrored this behavior (see Table 25). Further emphasizing this

comparatively more violent nature of their lives was the fact that while more than a third 38% of gambling males had also contemplated hurting or killing someone some of the time/almost always within the last 12 months compared to a quarter (25.8%) of males who had never gambled reported similar experiences (see Table 26).

Table 25: Gambling engagement and its relation to frequency of specific risk behaviour in the past 12 months in males

| <i>Activities involved in within the last 12 MONTHS</i> MALES | Never gambled (n=780) % | Gambled at least once (n=779) % | Significance |
|---|--------------------------------|--|---------------------|
| <i>Been offered, sold or given an illegal drug</i> | | | |
| 0 times | 95.8 | 93.2 | * |
| 1 time | 2.2 | 2.3 | |
| 2 or more times | 2.1 | 4.5 | |
| <i>Been threaten or injured with a weapon</i> | | | |
| 0 times | 88.3 | 82.1 | ** |
| 1 time | 7.3 | 10.2 | |
| 2 or more times | 4.2 | 7.8 | |
| <i>Been in a physical fight</i> | | | |
| 0 times | 46.0 | 43.2 | * |
| 1 time | 22.3 | 19.5 | |
| 2 or more times | 31.3 | 37.3 | |
| <i>Ever bit or slapped anyone</i> | | | |
| 0 times | 49.6 | 42.7 | ** |
| 1 time | 18.0 | 15.5 | |
| 2 or more times | 32.2 | 41.2 | |
| <i>Had something stolen or deliberately damaged</i> | | | |
| 0 times | 48.8 | 48.8 | - |
| 1 time | 16.7 | 17.0 | |
| 2 or more times | 34.4 | 34.1 | |
| <i>Carried a gun to protect yourself</i> | | | |
| 0 times | 98.1 | 97.3 | - |
| 1 time | 0.3 | 0.3 | |
| 2 or more times | 1.6 | 2.0 | |
| <i>Carried a knife to protect yourself</i> | | | |
| 0 times | 89.8 | 80.4 | *** |
| 1 time | 2.9 | 5.9 | |
| 2 or more times | 7.3 | 13.5 | |

Table 25(cont'd): Gambling engagement and its relation to frequency of specific risk behaviour in the past 12 months in males (cont'd)

| <i>Activities involved in within the last 12 MONTHS</i> | Never gambled (n=780) % | Gambled at least once (n=779) % | Significance |
|---|-----------------------------------|---|---------------------|
| MALES | | | |
| <i>Carried any other weapon</i> | | | |
| 0 times | 96.0 | 89.0 | *** |
| 1 time | 1.6 | 4.4 | |
| 2 or more times | 2.4 | 6.4 | |
| <i>Belonged to a gang</i> | | | |
| 0 times | 92.5 | 83.6 | *** |
| 1 time | 3.7 | 6.5 | |
| 2 or more times | 3.6 | 9.9 | |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Table 26: Gambling engagement and its relation to Depression and Suicide Ideation in Males

| Males | Never gambled (n=780) % | Gambled at least once (n=779) % | Significance |
|--|-----------------------------------|---|---------------------|
| <i>During the past year how often have you felt so sad that you felt life wasn't worth living...</i> | | | |
| Almost always | 5.5 | 6.9 | - |
| Often | 5.4 | 7.7 | |
| Sometimes | 37.6 | 38.4 | |
| Rarely | 7.1 | 8.6 | |
| Never | 44.4 | 38.3 | |
| <i>During past 12 months have felt like killing self</i> | 16.5 | 19.5 | - |
| <i>During past 12 months have tried to kill self</i> | 12.4 (n=129) | 21.1 (n=152) | - |
| <i>Do you ever think about hurting or killing someone</i> | | | *** |
| Never | 72.9 | 61.0 | |
| Some of the time | 23.0 | 32.0 | |
| Almost always | 2.8 | 6.7 | |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Gambling engagement also emerged as related to sexual risk taking among male adolescents. Males who had gambled were almost twice as likely to report being sexually active (*Gambling males 61.0% vs Non-Gambling males 39.7%*). but were also significantly less likely to report having used a condom at last sex (*Gambling males 67.9% vs Non-Gambling males 72.1%*).

Irrespective of gambling experience mean age of sexual initiation among boys was 12yrs. (see Table 27.) Given the youthful nature of the sample and their propensity for short term relationships and multiple partnership this increased likelihood of sexual initiation while being least likely to practice protective behavior is reasons for concern particularly in today's world of a growing HIV/AIDS epidemic.

Table 27: Gambling engagement and its relation to Sexual Risk Taking in Males

| Males | Never gambled (n=780) % | Gambled at least once (n=779) % | Significance |
|--------------------------------|-------------------------|---------------------------------|--------------|
| Sexually active | 39.7 | 61.0 | *** |
| Mean age of first intercourse | 12yrs. | 12yrs. | - |
| Using a condom at last sex act | 72.1 (n=308) | 67.9 (n=477) | - |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Incidence of gambling by a family member was also a significant correlate for gambling among male adolescents . Specifically males who had gambled at least once were also 50% more likely to report having someone in their family who gambled (*Gambling males 61.0% vs Non-Gambling males 44.4%*). Both groups were however equally likely to report having a family who gambled too much.

Thus while youth gambling was related to having a family member who gambled, it was not related to having a family member who gambled ‘too much’. (see Table 28) Having a family member who gambles may make gambling recreationally a normal and socially acceptable behavior, thus increasing an adolescent’s likelihood of gambling as the behavior may be viewed in a more acceptable manner. However a family member who gambles too much may serve to reinforce the negative view of gambling and thus would not necessarily serve to increase likelihood of the behavior.

Gambling engagement among adolescent males was also related to worry about a friend’s gambling. Specifically while more than a quarter (25.9%) of those who had gambled had worried about a friend’s gambling in the last 12 months compared to less than a fifth (17.0%) of those who had never gambled (see Table 28).

Table 28: Youth gambling engagement and family member gambling in males

| Males | Never gambled % | Gambled at least once % | Significance |
|--|-----------------|-------------------------|--------------|
| Someone in family gambles for money | 44.4 (n=780) | 61.0 (n=779) | *** |
| Someone in family gambles too much | 43.4 (n=346) | 43.8 (n=475) | - |
| <i>Past 12 months have been worried about</i> | | | |
| Mother's gambling | 9.6 (n=344) | 10.4 (n=473) | - |
| Father's gambling | 13.7 (n=473) | 19.0 (n=473) | - |
| Relative's gambling | 32.0 (n=473) | 33.1 (n=473) | - |
| Friend's gambling | 17.0 (n=473) | 25.9 (n=473) | ** |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

- Females:

Adolescent females who had gambled were also significantly more likely to engage in substance use than their non-gambling counterparts. Overall girls who had engaged in gambling were more likely to have tried alcohol and three times more likely to have smoked cigarettes and ganja. They were also four times more likely to have drunk ganja tea and twice as likely to have engaged in binge drinking. (see Table 29)

Adolescent girls who had gambled were also more likely to report involvement in violence and school related delinquency in the last 12 months. Specifically, girls who had gambled were significantly more likely to have engaged in a physical fight, engaged in a group fight, carried a weapon to school, stole from a family member or friend and deliberately damaged someone else's property. (see Table 30)

As it related to school delinquency, girls who had gambled were more likely to have both failed a class at school and a grade. They were twice as likely to report having skipped a class and skipped an entire day of school. Other behaviors such as running away from home and carrying a weapon to school were also two times higher among girls who had gambled when compared to their non-gambling counterparts. (see Table 30)

Female gamblers also reported greater frequency of violent behavior in the last 12 months. Specifically, they were more likely to report 2 or more occasions of having been threatened/injured with weapon, hit or slapped someone and having deliberately stolen or damaged something. In terms of weapon carrying, girls who gambled were three times more likely to report having carried a knife for protection and five times more likely to have carried any other weapon on two or more occasions in the last 12 months. They were also more likely to report having been in a physical fight at least once in the last 12 months. (see Table 31)

Among adolescent girls, gambling engagement was also found to have an association to both depression and suicide ideation. While almost a quarter of girls who had gambled (23.6%) reported feeling "so sad life wasn't worth living" often/almost always within the past year it

was 18.8% of those who had never gambled who reported similar feelings. Additionally as many as 41% of girls who had gambled also reported suicide ideation within the last 12 months, compared to less than a third (29%) of non-gambling girls. Violent thoughts towards others was also highest among girls who had gambled with many (44.7%) reporting having considered hurting or killing someone some of the time/almost always in the last year, compared to a quarter (26.5%) of girls who had never gambled (see Table 32).

Table 29: Gambling engagement and its relation to lifetime risk behaviour in females

| <i>During your lifetime have you ever...</i> | Never gambled | Gambled at least once | Significance |
|--|----------------------|------------------------------|---------------------|
| Female | (n=494) | (n=246) | |
| | % | % | |
| Had at least one drink of alcohol | 57.1 | 76.0 | *** |
| Smoked cigarettes | 11.9 | 32.9 | *** |
| Had five or more drinks of alcohol in a row | 8.3 | 20.3 | *** |
| Smoked ganja | 6.3 | 20.7 | *** |
| Sniffed glue or any other inhalant | 4.0 | 4.9 | |
| Drank ganja tea | 2.2 | 9.8 | *** |
| Used crack/cocaine | - | 0.4 | |
| Used ecstasy | - | 0.4 | |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Table 30: Gambling engagement and its relation to Past 12 Months risk behaviour in females

| <i>Activities involved in within the last 12 MONTHS</i> | Never gambled (n=494) % | Gambled at least once (n=246) % | Significance |
|---|--|--|---------------------|
| FEMALES | | | |
| A physical fight | 29.1 | 42.3 | *** |
| Failing a class | 21.3 | 29.3 | ** |
| Skipping a class | 12.6 | 20.7 | ** |
| Failing a grad (having to repeat a grade) | 12.1 | 15.9 | * |
| A group fight | 8.7 | 19.1 | *** |
| Skipping a day of school | 7.3 | 15.0 | ** |
| Carrying a weapon to school | 4.9 | 12.6 | *** |
| Stealing from a friend or family member | 4.7 | 9.8 | ** |
| Breaking a window | 4.5 | 6.1 | |
| Injuring someone seriously | 3.6 | 4.1 | |
| Starting a fire | 3.0 | 4.1 | |
| Deliberately damaging someone else's property | 2.8 | 6.1 | * |
| Running away from home | 2.8 | 7.3 | * |
| Being arrested by the police | 1.4 | 2.0 | |
| Shoplifting | 1.2 | 2.8 | |
| Riding in a stolen car | 0.8 | 0.4 | |
| Stealing a car | 0.2 | 0 | |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Table 31: Gambling engagement and its relation to frequency of specific risk behaviour in the past 12 months in females

| Activities involved in within the last 12 mths FEMALES | Never gambled (n=494) % | Gambled at least once (n=246) % | Significance |
|--|-------------------------------|---------------------------------------|--------------|
| Been offered, sold or given an illegal drug | | | |
| 0 times | 98.2 | 97.1 | |
| 1 time | 0.2 | 1.0 | |
| 2 or more times | 1.6 | 2.0 | |
| Been threaten or injured with a weapon | | | |
| 0 times | 91.7 | 84.8 | * |
| 1 time | 5.6 | 8.3 | |
| 2 or more times | 2.8 | 6.8 | |
| Been in a physical fight | | | |
| 0 times | 63.1 | 50.0 | ** |
| 1 time | 19.1 | 22.5 | |
| 2 or more times | 30.2 | 27.4 | |
| Ever hit or slapped anyone | | | |
| 0 times | 49.8 | 35.3 | ** |
| 1 time | 19.4 | 20.1 | |
| 2 or more times | 30.2 | 44.1 | |
| Had something stolen or deliberately damaged | | | |
| 0 times | 52.5 | 43.6 | * |
| 1 time | 17.6 | 12.3 | |
| 2 or more times | 29.1 | 43.7 | |
| Carried a gun to protect yourself | | | |
| 0 times | 99.8 | 100.0 | - |
| 1 time | - | - | |
| 2 or more times | 0.2 | - | |
| Carried a knife to protect yourself | | | |
| 0 times | 96.6 | 88.2 | *** |
| 1 time | 0.9 | 4.9 | |
| 2 or more times | 2.3 | 6.8 | |
| Carried any other weapon | | | |
| 0 times | 96.6 | 87.3 | *** |
| 1 time | 1.6 | 2.9 | |
| 2 or more times | 1.8 | 9.8 | |
| Belonged to a gang | | | |
| 0 times | 95.3 | 83.3 | *** |
| 1 time | 2.9 | 11.3 | |
| 2 or more times | 1.8 | 5.4 | |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Table 32: Gambling engagement and its relation to Depression and Suicide Ideation in Females

| Females | Never gambled (n=494) % | Gambled at least once (n=246) % | Significance |
|--|-------------------------------|---------------------------------------|--------------|
| <i>During the past year how often have you felt so sad that you felt life wasn't worth living...</i> | | | |
| Almost always | 7.3 | 10.6 | * |
| Often | 11.5 | 13.0 | |
| Sometimes | 41.1 | 46.7 | |
| Rarely | 10.9 | 10.6 | |
| Never | 29.1 | 19.1 | |
| <i>During past 12 months have felt like killing self</i> | 29.1 | 41.1 | ** |
| <i>During past 12 months have tried to kill self</i> | 24.3 (n=144) | 20.8 (n=101) | |
| <i>Do you ever think about hurting or killing someone</i> | | | |
| Never | 72.9 | 54.9 | *** |
| Some of the time | 24.7 | 39.0 | |
| Almost always | 1.8 | 5.7 | |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Gambling engagement among adolescent girls was also related to sexual risk taking. Approximately 4 in 10 girls who had gambled at least once (42.7%) were sexually active compared to 2 in 10 girls who had never gambled (25%). Although not significant they were also less likely to report condom use at last sex act. Irrespective of gambling experience mean age of sexual initiation among girls was age 15 (see Table 33).

Table 33: Gambling engagement and its relation to Sexual Risk Taking in Females

| Females | Never gambled (n=494) % | Gambled at least once (n=246) % | Significance |
|--------------------------------|-------------------------------|---------------------------------------|--------------|
| Sexually active | 25.3 | 42.7 | *** |
| Mean age of first intercourse | 15 yrs | 15 yrs | - |
| Using a condom at last sex act | 76.0 (n=125) | 71.4 (n=105) | - |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

As was evident among adolescent boys, gambling within the family appears to influence the adolescent's likelihood of engaging in the behaviour. Specifically it was 7 in 10 girls who had

gambled (69%) compared to 4 in 10 girls who had never gambled (44%), who reported having a family who played games for money. Girls who had engaged in gambling were also more likely to report a family member they perceived as gambling too much (*Gambled: 55.0% vs Non-Gambling: 41.9%*), as well as express concern for a friend's gambling within the last 12 months (*Gambled: 22.5% vs Non-Gambling: 13.7%*). (see Table 34)

Table 34: Female youth gambling engagement and family member gambling

| Females | Never gambled % | Gambled at least once % | Significance |
|---|-----------------|-------------------------|--------------|
| Someone in family gambles for money | 44.4 (n=494) | 69.1 (n=246) | *** |
| Someone in family gambles too much | 41.9 (n=222) | 55.0 (n=169) | * |
| <i>Past 12 months have been worried about ...</i> | | | |
| Mother's gambling | 15.4 (n=220) | 14.7 (n=170) | - |
| Father's gambling | 12.3 (n=220) | 18.2 (n=170) | - |
| Relative's gambling | 35.0 (n=220) | 39.4 (n=170) | - |
| Friend's gambling | 13.7 (n=220) | 22.5 (n=170) | * |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

VI. GAMBLING AND RESILIENCY FACTORS

In an attempt to probe possible protective factors against gambling the theory of the Risk and Youth Development Module (RYDM) was applied. The RYDM is a part of the California Healthy Kids Survey, which aims to measure the presence of external and internal assets which are associated with positive youth development and resilience. The RYDM contains 59 questions which measure 17 external and internal assets in the home, school, community, peer group and individual, as well as a school connectedness scale, all of which have been consistently and strongly linked to resilience and positive youth development.

The major tenet of the youth development or resilience approach is that resilience is a capacity for healthy development innate to *all* people. Resilience can be defined as an inborn developmental wisdom that naturally motivates individuals to meet their human needs for love, belonging, respect, identity, power, mastery, challenge, and meaning. It is therefore proposed that when young people experience home, peer, school and community environments rich in the developmental supports and opportunities of caring relationships, high expectations and opportunities for meaningful participation, these needs are met. As a result of the external environment meeting these needs youth develop the individual characteristics that define healthy development and successful learning—and protect against involvement in health-risk behaviors.

Given its ability to measure factors which may protect against risk behaviour, the youth development framework was included in this study. Figure 1 below illustrates the theory's conceptual model.

Figure 1: Youth Development Conceptual Model

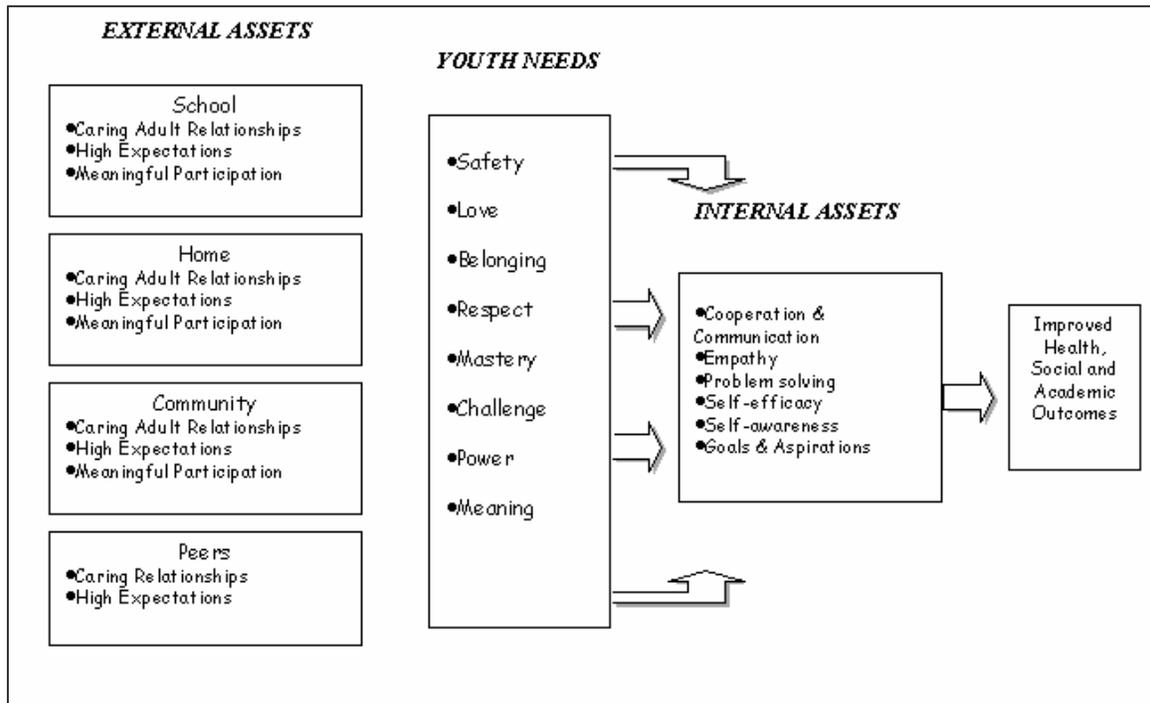


Figure 2: RYDM: Assets Score Summary Table by Gambling Non-gambling Grouping

| % of youth scoring High, Moderate and Low in Assets | Never gambled | | | Gambled at least once | | |
|---|---------------|-------------|-------------|-----------------------|-------------|-------------|
| | High % | Mod. % | Low % | High % | Mod. % | Low % |
| * Total External Assets | 47.3 | 45.4 | 7.4 | 41.5 | 50.3 | 8.2 |
| * Caring relationships | 36.8 | 53.9 | 9.3 | 33.5 | 53.7 | 12.9 |
| *** High expectations | 60.4 | 32.1 | 7.5 | 52.1 | 38.3 | 9.6 |
| ** Meaningful participation | 35.9 | 58.9 | 5.3 | 30.0 | 63.3 | 6.6 |
| | | | | | | |
| *** School environment | 55.8 | 27.8 | 16.4 | 45.6 | 30.2 | 24.2 |
| * Caring relationships: Adult in school | 63.4 | 32.7 | 3.9 | 55.5 | 39.7 | 4.8 |
| * High expectations: Adult in school | 78.7 | 20.0 | 1.4 | 73.1 | 24.7 | 2.1 |
| ** Meaningful participation: Adult in school | 68.1 | 29.1 | 2.8 | 62.0 | 35.3 | 2.6 |
| | | | | | | |
| Home environment | 57.7 | 27.8 | 16.4 | 45.6 | 30.2 | 24.2 |
| Caring relationships: Adult in home | 18.0 | 72.5 | 9.5 | 21.8 | 67.5 | 10.7 |
| High expectations: Adult in home | 81.0 | 17.3 | 1.8 | 77.6 | 20.4 | 2.0 |
| Meaningful participation: Adult in home | 49.2 | 44.9 | 5.9 | 45.1 | 49.5 | 5.5 |
| | | | | | | |
| Community environment | 55.4 | 34.5 | 10.0 | 52.2 | 38.5 | 9.3 |
| Caring relationships: Adult in comm.. | 48.1 | 39.1 | 12.8 | 48.3 | 39.7 | 11.9 |
| High expectations: Adult in comm. | 62.6 | 28.3 | 9.1 | 59.8 | 31.1 | 9.2 |
| ** Meaningful participation: Adult in comm. | 37.2 | 50.5 | 12.2 | 31.4 | 52.8 | 15.8 |
| | | | | | | |
| Peer environment | 25.2 | 62.6 | 12.2 | 23.1 | 64.7 | 12.2 |
| Caring relationships: Peers | 36.2 | 48.2 | 15.6 | 37.7 | 47.1 | 15.2 |
| * High expectations: Pro-social peers | 19.5 | 64.5 | 16.0 | 18.2 | 61.3 | 20.5 |
| | | | | | | |
| Total Internal Assets | 65.5 | 33.6 | 0.9 | 64.3 | 35.2 | 0.5 |
| Cooperation and communication | 55.4 | 42.6 | 2.0 | 53.8 | 44.6 | 1.7 |
| Self-efficacy | 54.7 | 43.5 | 1.8 | 56.9 | 42.0 | 1.1 |
| * Empathy | 46.8 | 47.7 | 5.5 | 43.2 | 52.5 | 4.3 |
| * Problem solving | 41.6 | 49.8 | 8.6 | 37.2 | 52.1 | 10.7 |
| Self-awareness | 60.9 | 37.1 | 2.0 | 63.2 | 34.8 | 2.0 |
| Goals & aspirations | 83.3 | 15.7 | 1.0 | 80.1 | 18.9 | 1.0 |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

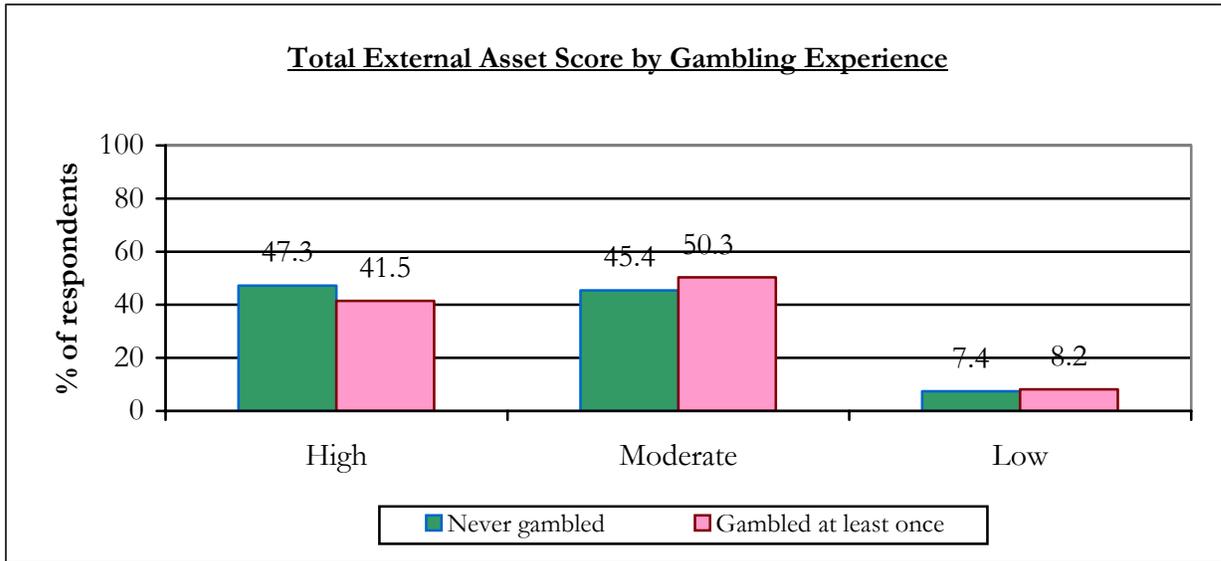
A. EXTERNAL ASSETS

The youth development framework holds as its key premise the idea that providing environmental supports and opportunities (external assets) in the form of caring relationships, high expectations and opportunities for meaningful participation will subsequently engage the innate resilience of youth and thus promote positive outcomes as evidenced by behaviour. The external asset measurements discussed here represent a measurement of the extent to which youth experience caring relationships, high expectations and opportunities for meaningful participation within the environments thought to be most influential to their development.

Chart 9 summarizes how gambling versus non-gambling youth scored (*Low*, *Moderate*, and *High*) across all the External Assets: (Caring Relationships, High Expectations, and Meaningful Participation). Chart 10 then presents the proportion of youth who score *High* for each of the four environments namely: home, school, community and peer. Chart 11 provides the percent scoring *High* on each of the individual assets. Figure 2 (shown above) provides detailed information on percentage of youth scoring *High*, *Moderate*, and *Low* on each asset and environment.

The presence of specific external assets, particularly within the school environment appeared to significantly reduce the likelihood of gambling engagement. Overall non-gambling youth (47.3%) were significantly more likely to achieve a high external asset score than the youth who had engaged in gambling (41.5%) (see Chart 9).

Chart 9



Youth who had never gambled were significantly more likely to achieve high total external asset scores within the school environment (see Chart 10) as well as higher scores for each of the three assets measured (see Chart 11). This means that youth who had never gambled were also more likely to experience a school environment rich in caring relationships, higher expectations and opportunities for meaningful participation as well as higher school connectedness.

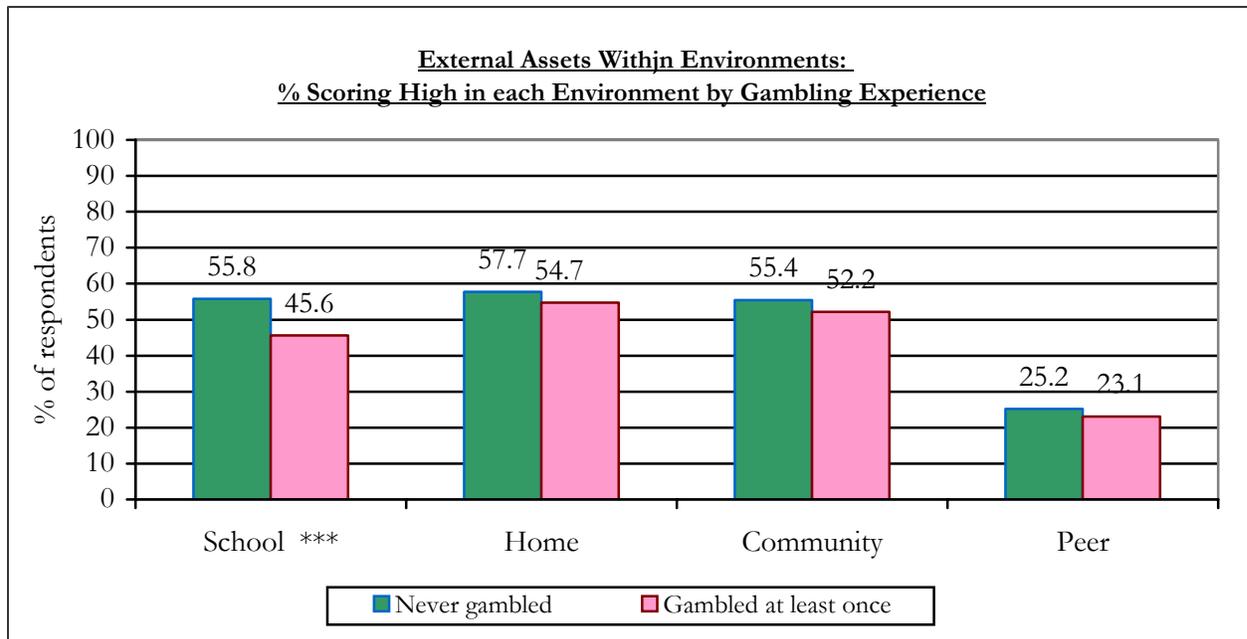
Additionally, the aggregate school environment score also provides a measure of *school connectedness*. Thus youth who had never gambled were significantly more likely to report high connectedness to their schools.

According to the Resilience and Youth Development Module school connectedness as a protective factor is gaining increasing in importance as:

*“Increasingly, research is revealing the critical importance of strong school connectedness as a factor in promoting academic achievement and in mitigating involvement in risk behaviors such as substance abuse, delinquency, and dropping out of school (Dornbusch et al. 2001; Ryan 1999; Wentzel 1999; Goodenow 1993).”*³

Non-gambling youth were also significantly more likely to experience lives richer in caring relationships, higher expectations and opportunities for meaningful participation although not environment specific.

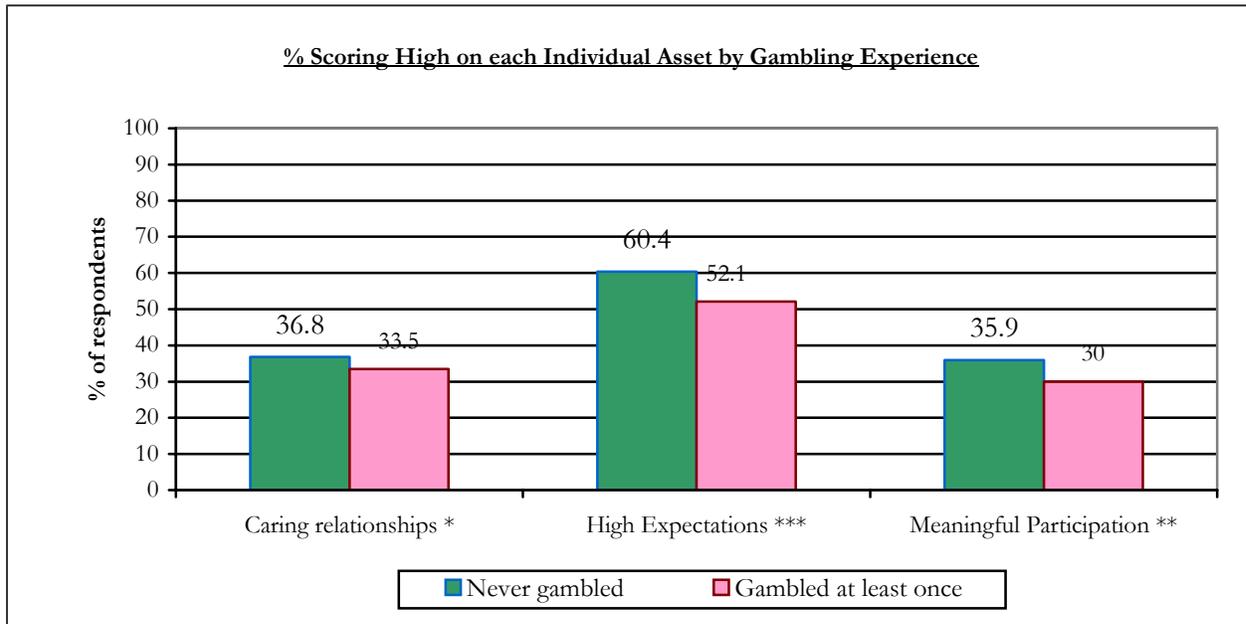
Chart 10



- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

³ Austin, G & Rolfe, M; 2002; *Resilience and Youth development Module*; WestEd; page 12; <http://www.wested.org/hks> .

Chart 11



- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

- ***External Assets within the School, Home, Community and Peer Environments:***

Overall, youth who had never gambled score higher on each external asset within the school environment. Specifically, significantly more youth who had never gambled achieve a high score for caring relationships, high expectations and opportunities for meaningful participation within the school setting. (see Chart 12)

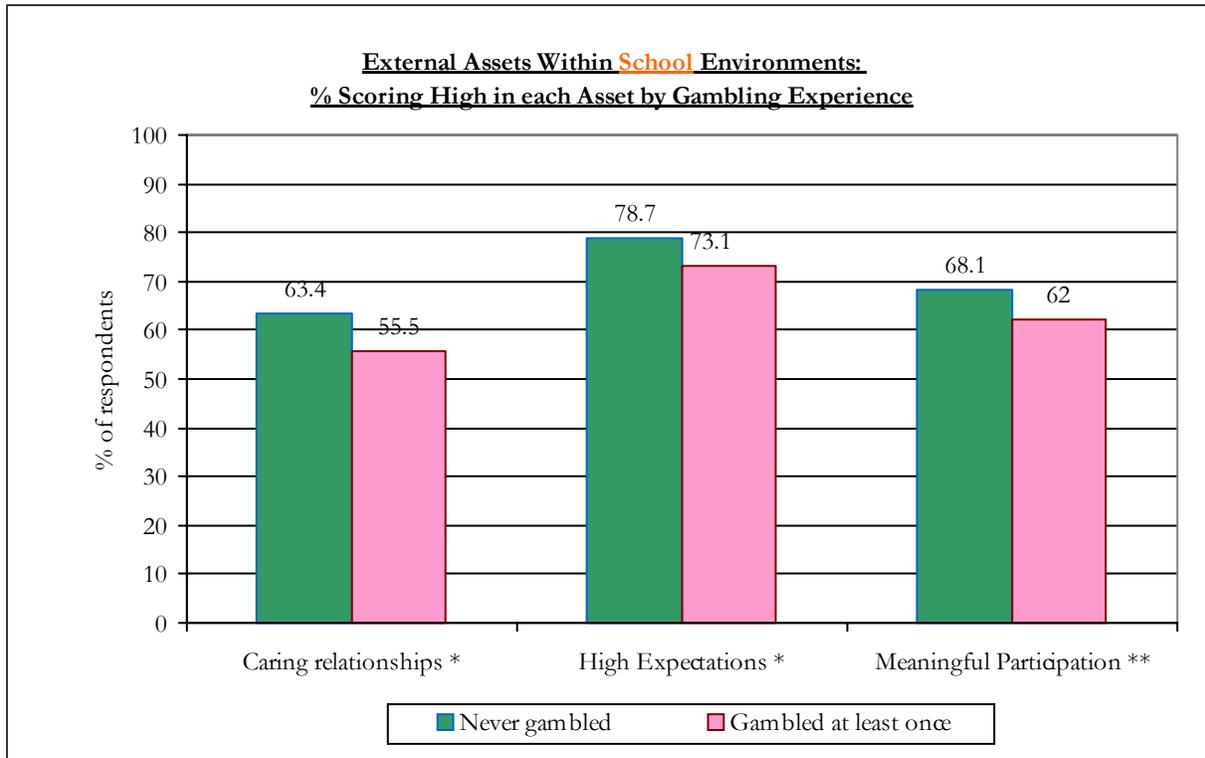
The home environment did not emerge as significantly related to incidence of gambling. While non-gambling youth tended to achieve high scores in high expectations and meaningful participation the differences between these scores and those of youth who had gambled were not significant. Interestingly slightly more youth who had gambled scored high in terms of caring relationship within the home environment, this difference was not significant. (see Chart 13)

Non-gambling youth were also more likely to enjoy high levels of meaningful participation in communities (see Chart 14) and high expectations from their peers (see Chart 15).

B. INTERNAL ASSETS

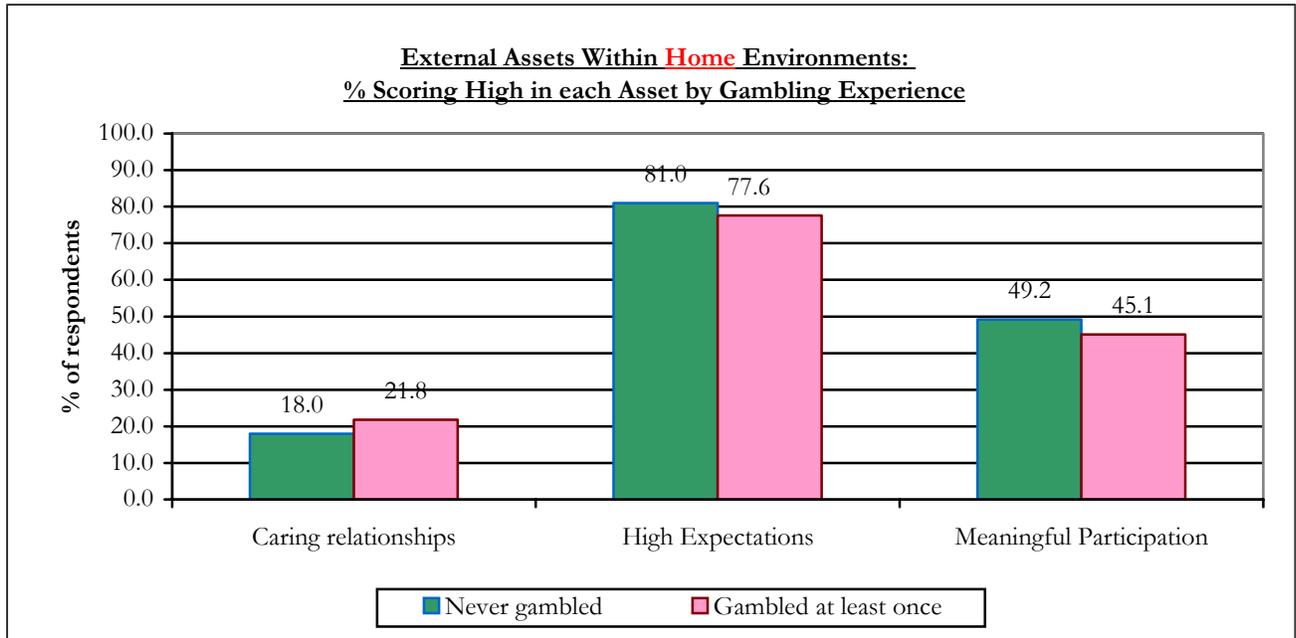
Non-gambling youth also illustrated significantly higher levels of the internal assets of empathy and problem solving (see Chart 16).

Chart 12



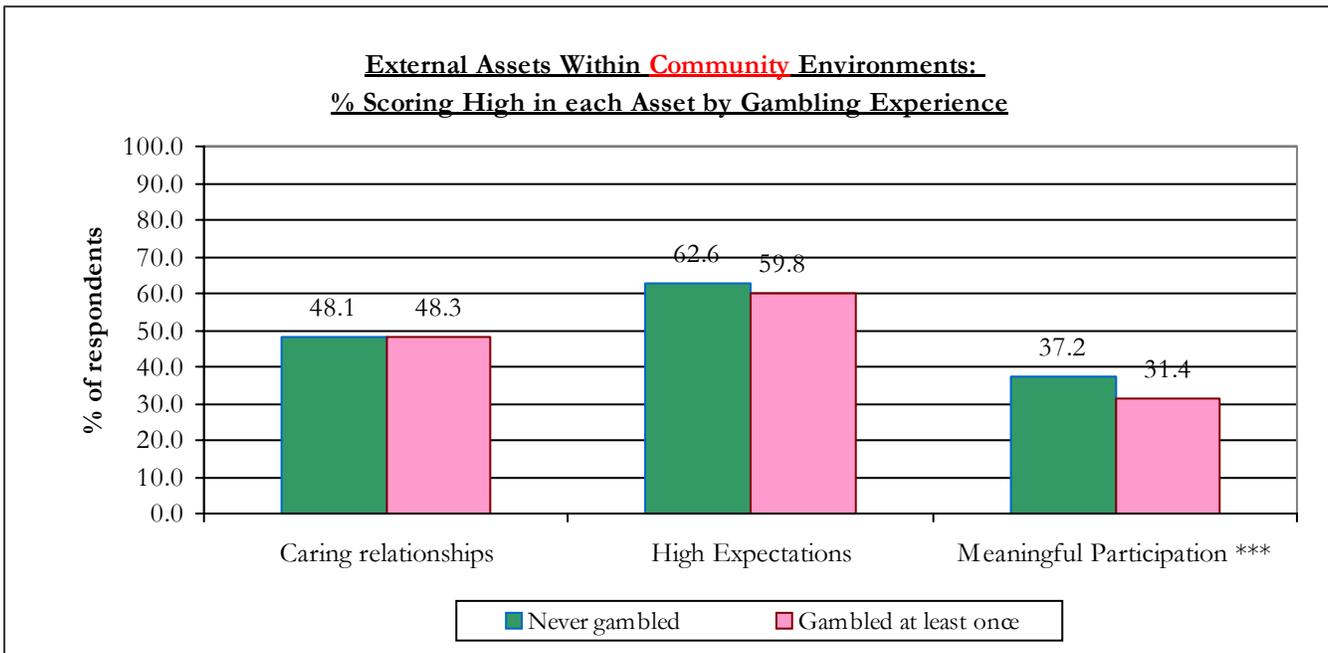
- = p not significant; * = $p < 0.05$; ** = $p < 0.005$; *** = $p < 0.000$

Chart 13



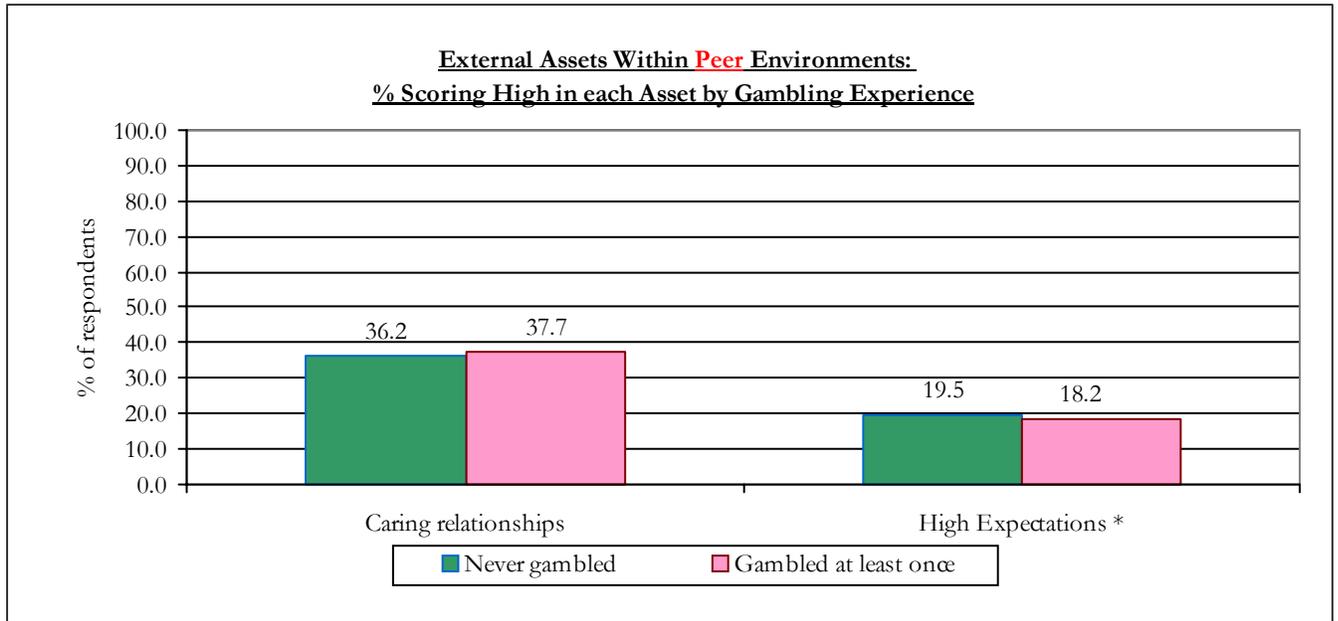
- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

Chart 14



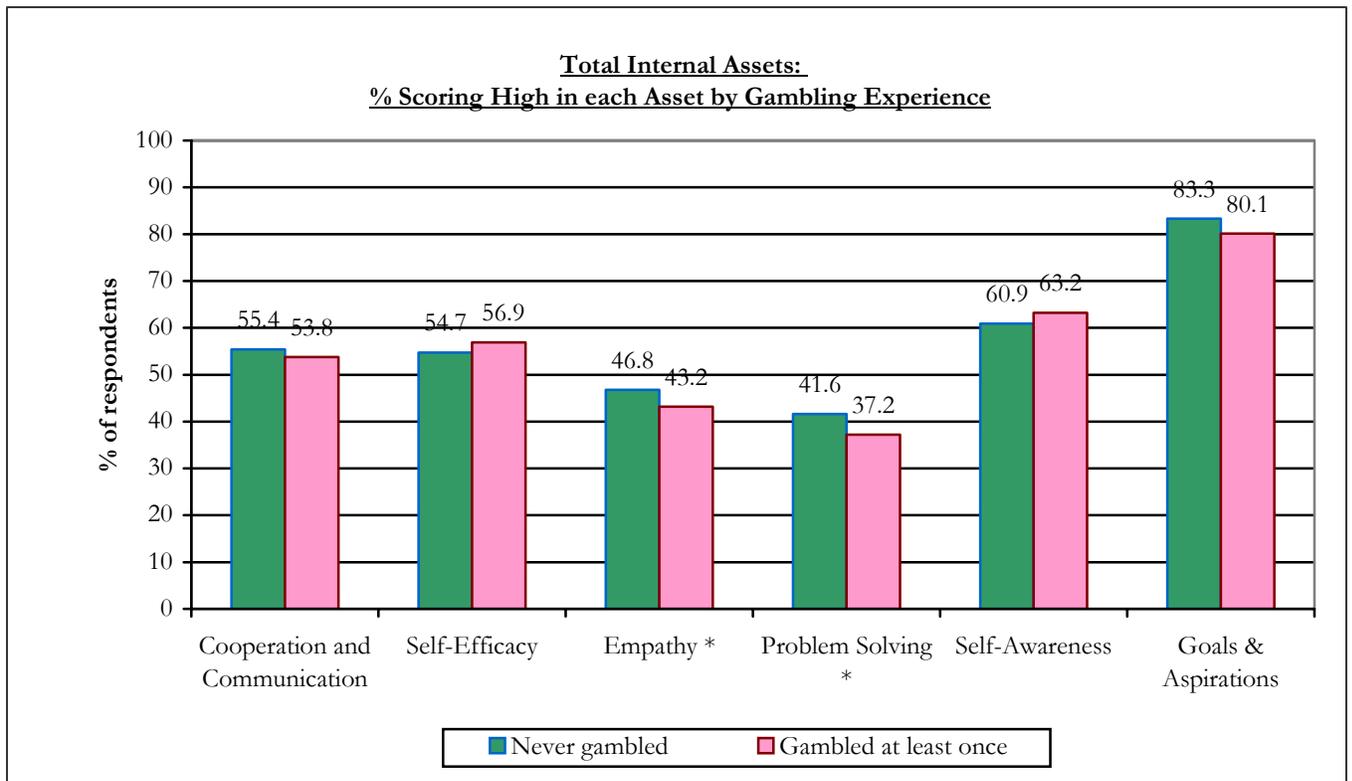
- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

Chart 15



- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

Chart 16



- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

C. CORRELATES OF GAMBLING

Using correlation analysis, school connectedness emerged as having a small but significant association with prevalence of gambling. This means that youth who experience high level of school connectedness and a school environment rich in the developmental assets of caring relationships, high expectations and opportunities for meaningful participation, were less likely to engage in gambling activities (*see Table 35*). School connectedness thus emerged as a protective factor against gambling.

Attitude to gambling as it relates to the perception of gambling as fun, exciting and a positive influence emerged as having a moderate and significant relationship to prevalence of gambling. This means that the stronger the youth endorsement of gambling as fun, exciting and a positive influence, the more likely they are to engage in gambling. Gender, age and the presence of a family member who gambles emerged as having a small but significant association to prevalence of gambling. This means males, older youth and individual's with a family member who gambles were more likely to engage in gambling activities (*see Table 35*).

Risk behaviors which showed a small but significant relationship to gambling engagement were: thoughts of aggression and being in a group fight in the last 12 months. Other aggressive and violent behaviors with a small and significant relationship were those occurring in the last 12 months within the school environment as comprised of: being threatened or injured with a knife, being in a physical fight, slapping or hitting someone, carrying a knife for protection, carrying any other weapon for protection and belonging to a gang. This means that youth who had engaged in gambling were more likely to engage in these risk behaviors. (*see Table 35*).

Table 35: Correlates of Gambling

| | Pearson's r | Chi-square |
|--|--------------------|-------------------|
| Protective Factor | | |
| School Connectedness | -.113 | *** |
| Risk Factors: Background and attitudes | | |
| Gender | -.157 | *** |
| Age Group | .135 | *** |
| Presence of a family member who gambles | .186 | *** |
| Factor 1: Gambling is fun, exciting and a positive influence | .316 | *** |
| | | |

Table 35: Correlates of Gambling (cont'd)

| Risk Behaviour: Risk behaviors with a correlation to problem gambling | | |
|--|------|-----|
| Thought about hurting/killing someone | .157 | *** |
| <i>Last 12 months in school been:</i> | | |
| - threatened/injured with a gun or knife | .113 | *** |
| - in a physical fight | .108 | *** |
| - slapped or hit someone | .114 | *** |
| - carried a knife for protection | .144 | *** |
| - carried other weapon for protection | .139 | *** |
| - belonged to gang | .158 | *** |
| Last 12 months been in a group fight | .130 | *** |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

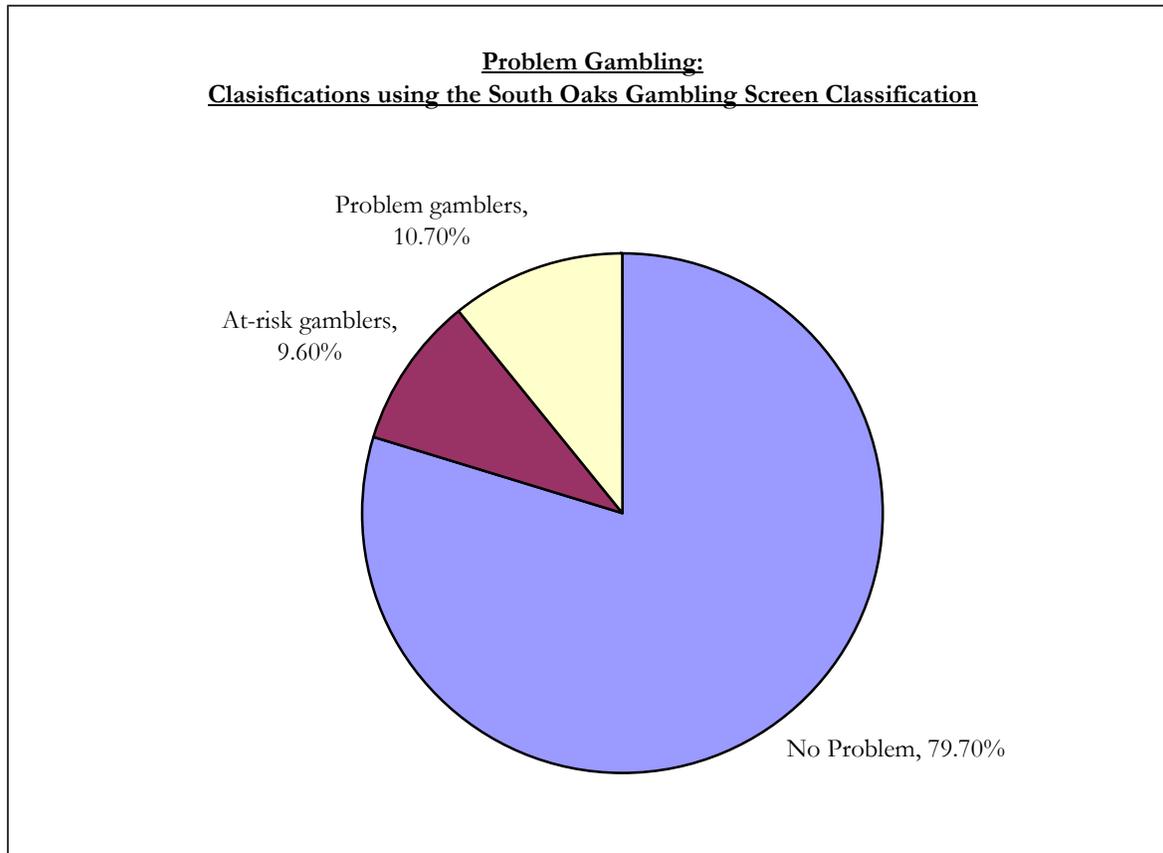
VII. PROBLEM GAMBLING

Levels of problem gambling within the sample were calculated using the South Oaks Gambling Screen (SOGS). The South Oaks Gambling Screen is a twenty item instrument based on the DSM-III criteria for pathological gambling. The screen uses participant responses to measure levels of risk of problem gambling. Using responses to the 20 items participants' scores are calculated and classified into three groups, namely:

- No problem
- At-risk gambler
- Problem gambler

The SOGS was also included in the questionnaire used in this survey. Using the classifications of the SOGS a total of 10.7% of the sample were found to be problem gamblers with an additional 9.6% being classified as at-risk of problem gambling. This means that approximately 20% or one (1) out of every five (5) adolescent is either a problem gambler or at-risk of becoming one. Four (4) in every five (5) adolescents would be classified as having no potential gambling problem (*see Chart 17*).

Chart 17



The following analysis of problem gamblers will speak to both the at-risk and problem gambler as a single group as the main differences in behavior were between the no problem

groups and the problem group where the problem group represents a summation of both the at-risk and problem gambler groups. Additionally, the behavior of the problem gambler tended to be a more extreme reflection of the at-risk group. The tables and charts do however show each of the three groups separately.

A. PROFILE OF THE PROBLEM GAMBLER

Adolescent boys were more likely than girls to be at-risk or problem gamblers. In fact almost a quarter (23.5%) of boys was classified as at-risk or problem gamblers compared to 13.5% of adolescent females. Interestingly however no differences by age emerged with almost a fifth of both age groups being classified as at-risk or problem gamblers. Of concern however is that while a fifth (19.4%) of the adolescent population recruited from schools and within the communities were classified as at-risk or problem gamblers, as much as 44% of the youth-at risk emerged as at-risk or problem gamblers. This means that the youth-at risk population was two times more likely than the general population to develop problem gambling (see Table 36). The term *youth-at-risk* as explained earlier represents youth who have dropped out of school including street youth, drop-outs in the community and youth in government institutions which provide intervention for this target.

At-risk gamblers and problem gamblers generally began gambling at an average age of 11yrs, compared to no-problem gamblers who had begun gambling on average at age 13 (see Table 36).

Table 36: Gambler type by demographics

| | No problem | At-risk | Problem | Chi square significance |
|---|--------------|-------------|--------------|-------------------------|
| Total | 79.7% | 9.6% | 10.7% | |
| Gender | | | | |
| Male; (N=1559) | 76.5% | 11.2% | 12.3% | *** |
| Female; (N=740) | 86.5% | 6.2% | 7.3% | |
| Age Group | | | | |
| 10-14yrs.; (N=1194) | 80.2% | 9.8% | 10.1% | - |
| 15-19yrs.; (N=1104) | 79.3% | 9.4% | 11.3% | |
| General Population; (N=2219) | 80.6% | 9.3% | 10.1% | *** |
| Youth-At-Risk; (N=80) | 55.0% | 18.8% | 26.3% | |
| Mean Age of Initiation of Gambling | 13.25yrs | 11.41yrs. | 11.4yrs. | *** |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

- Problem Gambling and Attitudes to Gambling

When compared to the no problem groups, the at-risk and problems groups were significantly more likely to endorse gambling as fun and exciting and less likely to endorse such activities as addictive and wrong. These groups were also significantly more likely to view gambling as giving a chance for a better life. Specifically the at-risk and problem groups were two to three times more likely to strongly endorse gambling as fun and exciting. They were less likely to endorse the negative perception as, while six in ten no problem gamblers saw gambling as addictive and wrong, it was five in ten problem and at risk gamblers who endorsed this view. The problem gambler groups was also more likely to see gambling as giving a chance for a better life with more than a third (35%) strongly endorsing this perception compared to a quarter of the at-risk (25.9%) and no problem (22.6%) groups. The no problem group was also more likely to reject gambling as giving a chance for a better life while the at-risk group moderately supported this view (*see Table 37*).

Table 37: Attitude to Gambling by Gambler Type

| Attitude to gambling | No Problem gambler (n=1833) % | At-risk gambler (n= 221) % | Problem Gambler (n=245) % | Chi-square value |
|--|-------------------------------|----------------------------|---------------------------|------------------|
| Factor 1: Gambling is fun and exciting. | | | | |
| Low | 32.7 | 14.9 | 9.0 | *** |
| Moderate | 56.4 | 58.4 | 57.1 | |
| High | 10.9 | 26.7 | 33.9 | |
| Factor 2: Gambling is addictive and wrong | | | | |
| Low | 5.9 | 7.2 | 6.5 | ** |
| Moderate | 32.1 | 42.1 | 39.6 | |
| High | 62.0 | 50.7 | 53.9 | |
| Factor 3: Gambling is a loser's game | | | | |
| Low | 43.7 | 40.0 | 38.0 | - |
| Moderate | 46.7 | 52.3 | 49.4 | |
| High | 9.6 | 7.7 | 12.7 | |
| Factor 4: Gambling gives a chance for a better life | | | | |
| Low | 33.5 | 19.1 | 18.0 | *** |
| Moderate | 44.0 | 55.0 | 46.9 | |
| High | 22.6 | 25.9 | 35.1 | |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

- Reasons for gambling

In addition to the main motivators for gambling discussed in previous chapters, problem gamblers also gambled primarily to win money (83.7%), for the personal validation which often results when one plays “because you are good at it” (75.5%) and because they considered themselves lucky (68.6%). Gambling activities also provided some emotional comfort for the problem gambler player, and to a lesser extent the at-risk player. Many problem gamblers gambled also “to forget problems for a while” (62.9%), “because of problems in the family” (29.8%) and “to be alone” (19.2%). Gambling was also a social activity with more than two-thirds (67.3%) engaging in it “to do things with friends” (see Table 38).

Table 38: Gambler Type and Reasons for Gambling

| | No Problem gambler (n=1833) % | At-risk gambler (n= 221) % | Problem Gambler (n=245) % | Chi-square value |
|------------------------------------|----------------------------------|-------------------------------|------------------------------|------------------|
| For entertainment or fun | 80.8 | 80.1 | 81.6 | - |
| Because it’s exciting and fun | 79.6 | 85.9 | 87.3 | - |
| To win money | 66.1 | 68.8 | 83.7 | *** |
| It decreases my boredom | 54.4 | 49.8 | 48.6 | - |
| Because you’re good at it | 50.6 | 63.3 | 75.5 | *** |
| To do things with your friends | 50.2 | 52.9 | 67.3 | ** |
| Because you’re lucky | 49.4 | 56.1 | 68.6 | *** |
| To forget problems for a while | 38.5 | 61.1 | 62.9 | *** |
| Out of curiosity | 34.7 | 35.3 | 34.7 | - |
| To support good causes | 26.8 | 30.8 | 31.0 | - |
| Because of problems in your family | 9.2 | 16.3 | 29.8 | *** |
| To be alone | 8.4 | 20.4 | 19.2 | ** |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Gambling within the family and possible problem gambling by a family member appeared to influence the individual’s likelihood of developing problem gambling. Specifically, while less than a half (48.7%) of the no problem group had a family member who gambled, it was the majority of the at-risk (72.4%) and problem gambling (76.1%) groups who reported having a family member who gambles. Additionally the problem gambling group was significantly more likely to report having a family member who gambles too much. It was 6 in 10 problem gamblers who reported a family member who gambles too much compared to 4 in 10 no problem and at-risk gamblers (see Table 39).

Additionally, many problem gamblers (43.5%) reported worrying about a relative’s gambling in the last twelve months, compared to a third of the at-risk and no problem groups. Three in ten persons from the at-risk group and the problem gambling group also reported worrying about a friend’s gambling in the last 12 months. (see Table 39)

Table 39: Gambler type and impact of a family member gambling

| | No Problem gambler (n=239) % | At-risk gambler (n= 221) % | Problem Gambler (n=245) % | Significance |
|--|------------------------------|----------------------------|---------------------------|--------------|
| Someone in family gambles for money | 48.7 (n=1788) | 72.4 (n=217) | 76.1 (n=243) | *** |
| Someone in family gambles too much | 42.7 (n=853) | 45.5 (n=154) | 60.4 (n=182) | *** |
| <i>Past 12 months have been worried about</i> | | | | |
| Mother's gambling | 11.6 | 7.7 | 15.2 | - |
| Father's gambling | 14.4 | 16.7 | 23.9 | - |
| Relative's gambling | 32.1 | 33.8 | 43.5 | * |
| Friend's gambling | 16.4 | 30.1 | 32.6 | *** |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

- Problem Gambling and Youth Development Assets

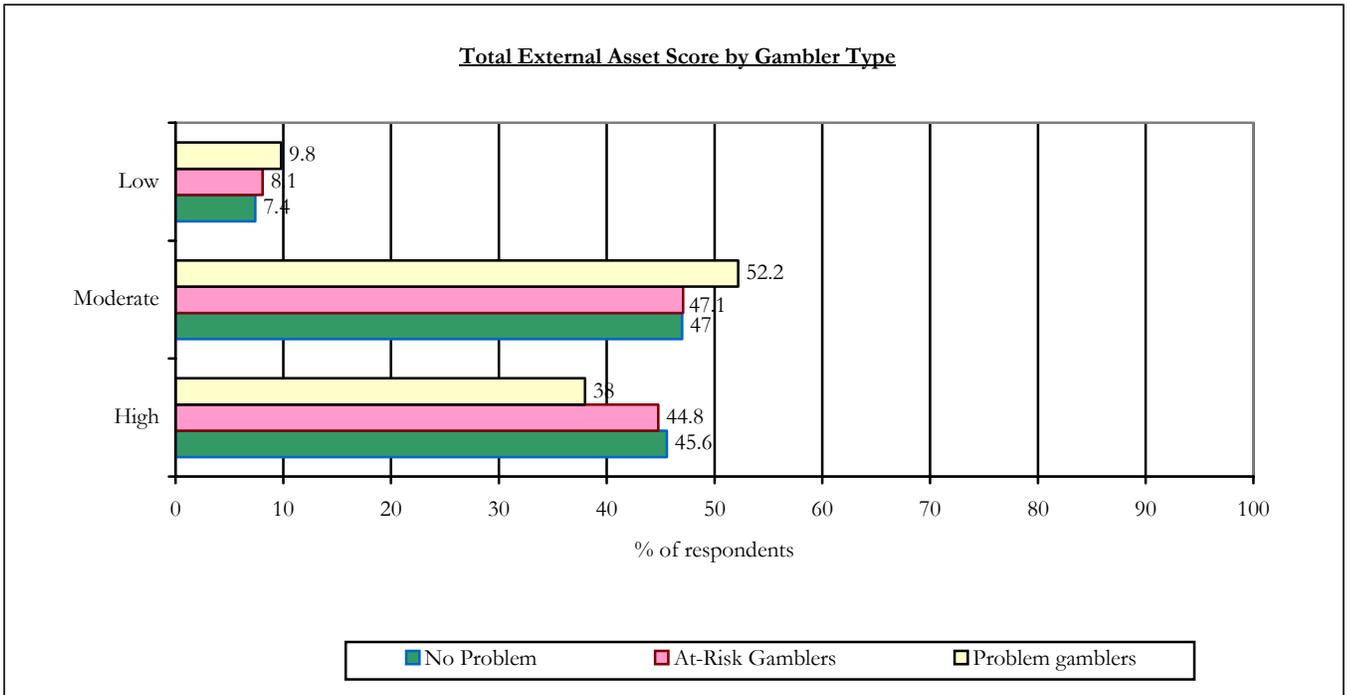
Using the RYDM an environment rich in high expectations emerged as protecting against the development of problem gambling. When compared with no-problem and at-risk gamblers, problem gamblers were found to exist in environments characterized by overall lower levels of high expectations (*see Chart 19*). Specifically problem gamblers were significantly less likely to report high levels of high expectations in their home (*See Chart 22*) and school environments (*See Chart 21*).

According to the resiliency and youth development model high expectation messages are the consistent communication of direct and indirect message that let the young person know they can and will succeed responsibly. Such messages are at the core of caring relationships and reflect the adult's and friend's belief in the young persons innate resilience and their ability to learn. High messages communicate to the youth that: *"You can make it; you have everything it takes to achieve your dreams; I'll be there to support you."*

Additionally, a high expectation approach conveys a challenge and support message as well as firm guidance and clear boundaries. Provision of guidance and boundaries also provide the youth with the structure necessary for creating a sense of safety and predictability. Such an environment fosters development not through enforcement of compliance and control but rather by allowing youth the freedom and exploration necessary to develop autonomy, identity and self-control.

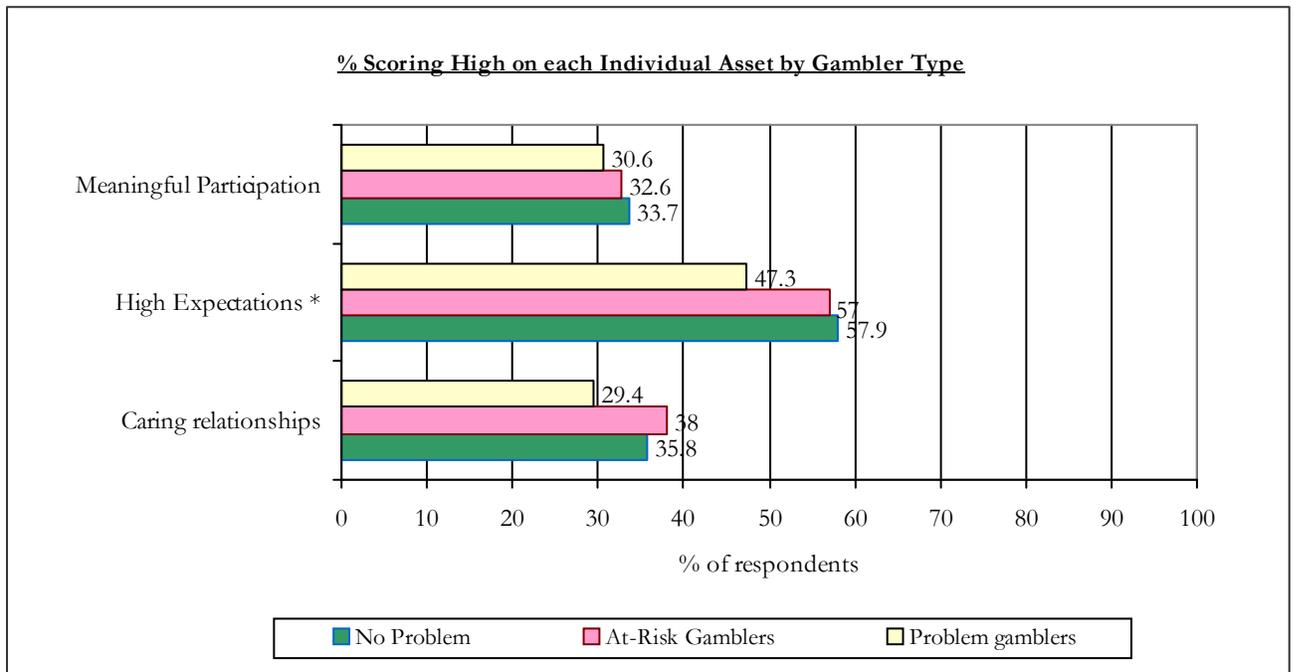
Problem gamblers were also characterized by significantly lower levels of goals and aspirations, empathy, cooperation and communication skills (*see Chart 26*) and school connectedness (*see Chart 20*). The problem and at-risk gambler groups also experienced less caring relationships within the community (*see Chart 23*).

Chart 18



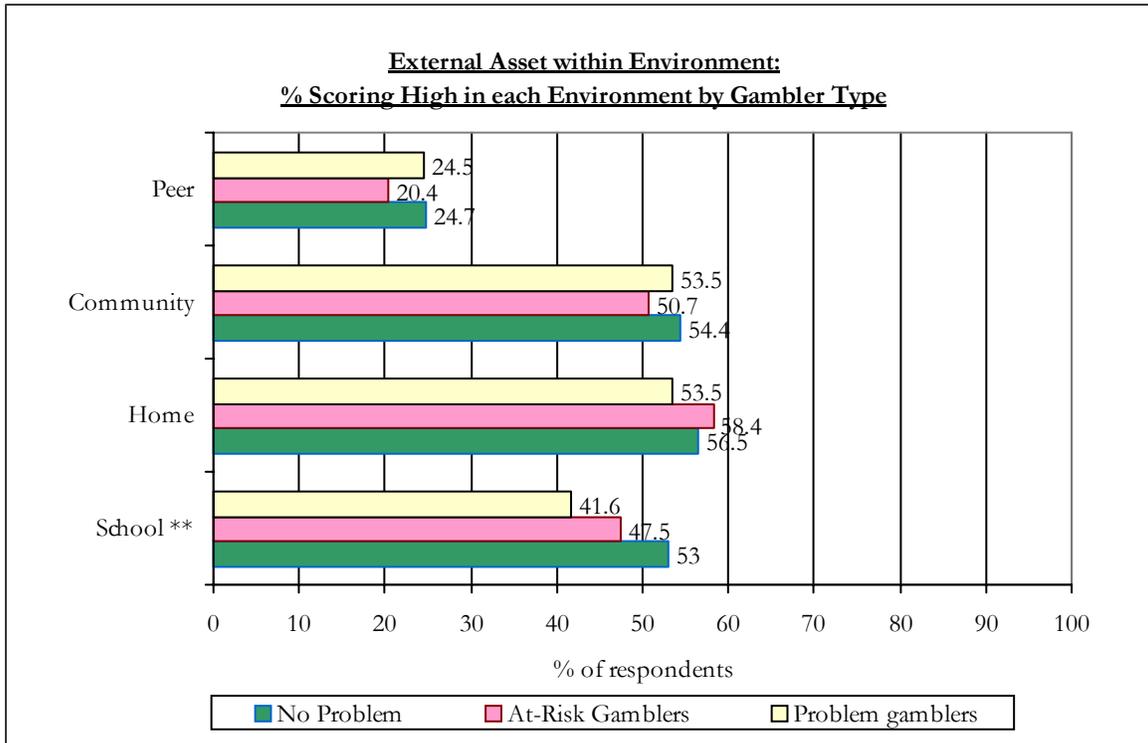
- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Chart 19



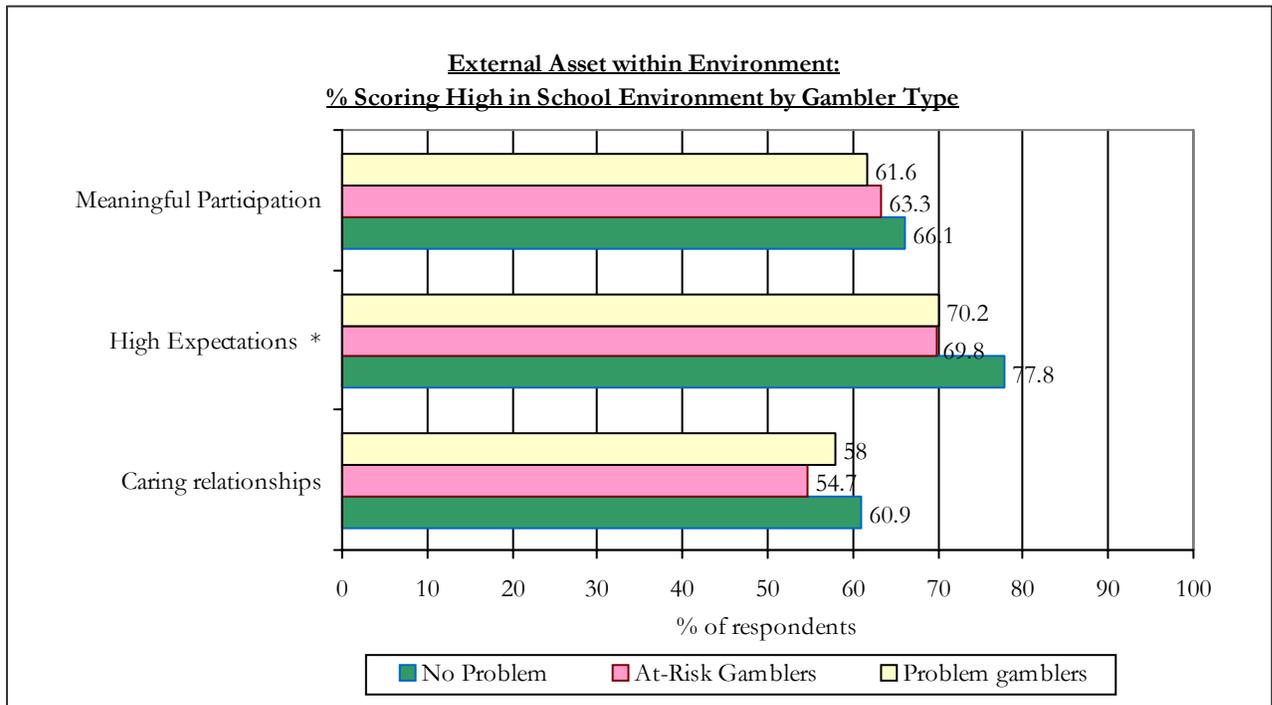
- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Chart 20



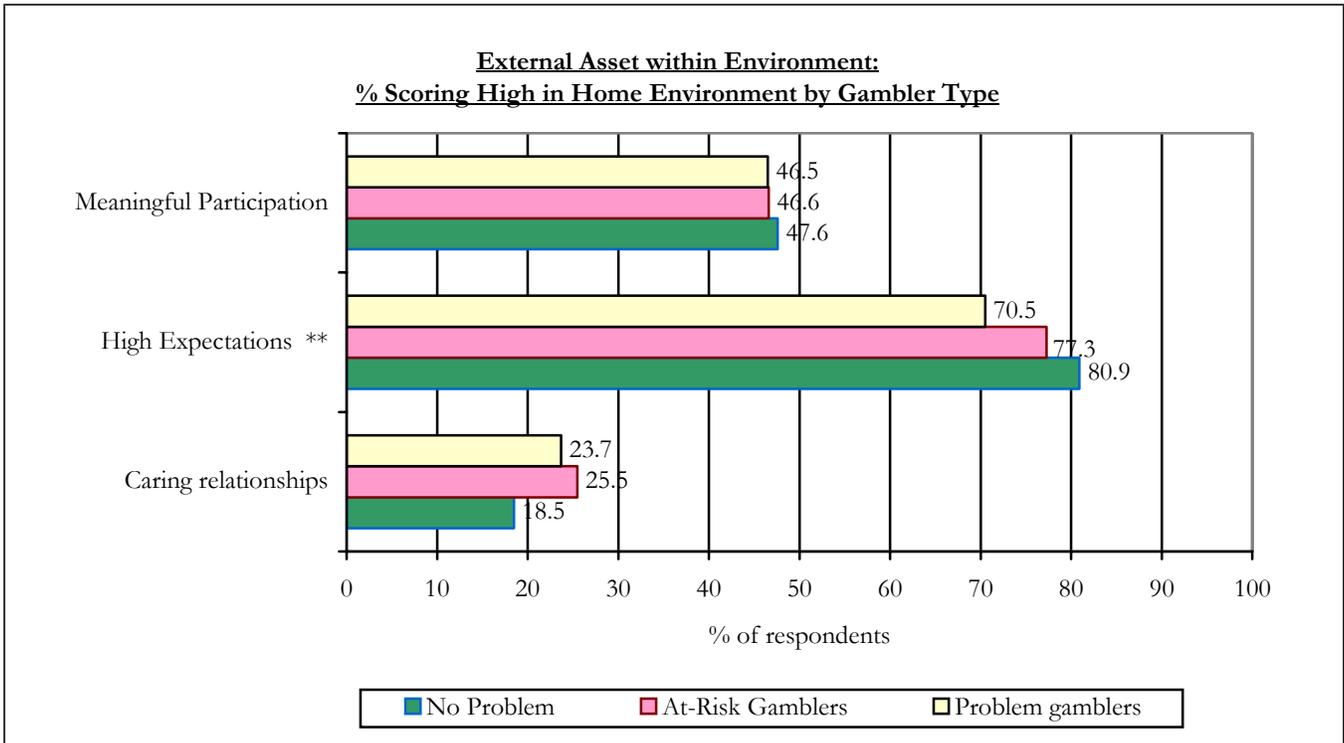
- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

Chart 21



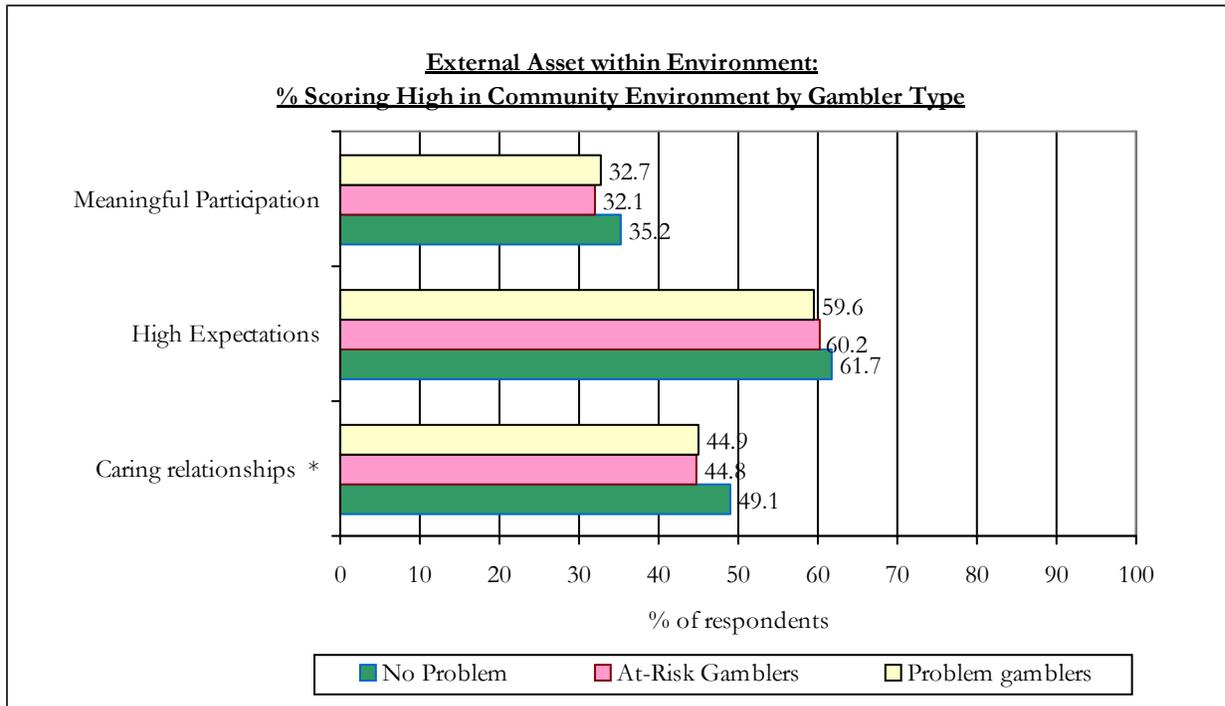
- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

Chart 22



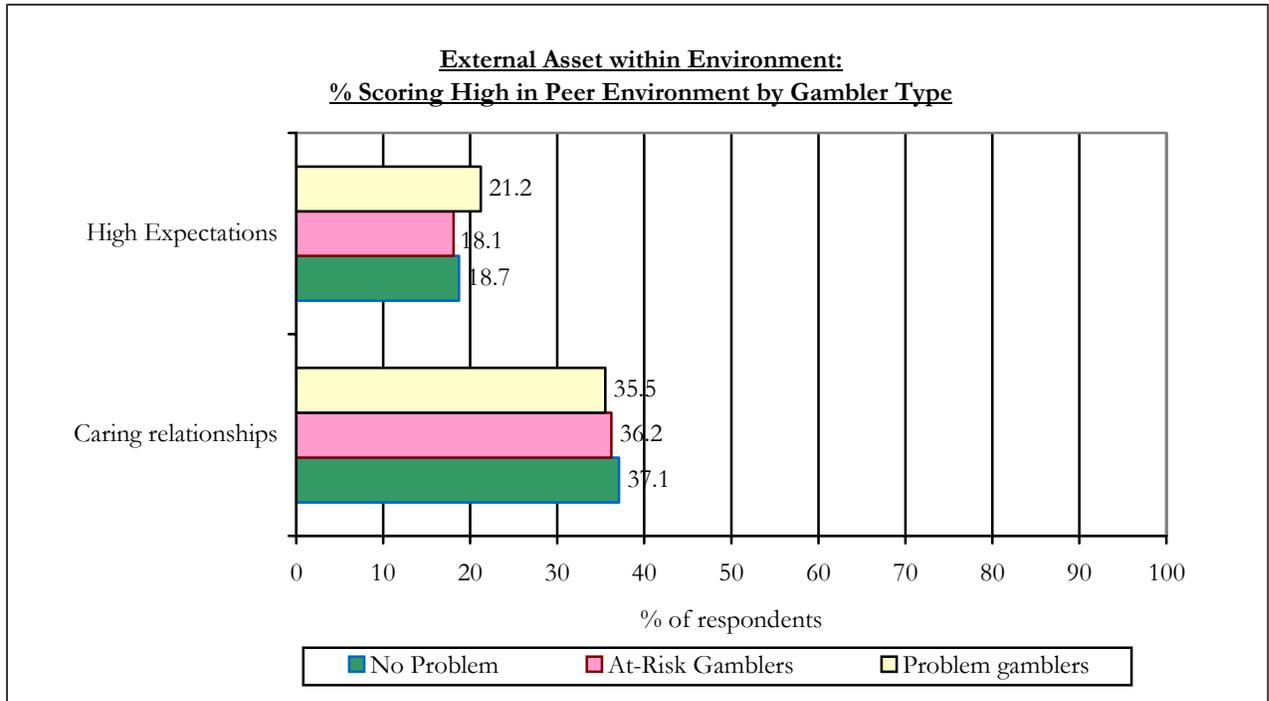
- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

Chart 23



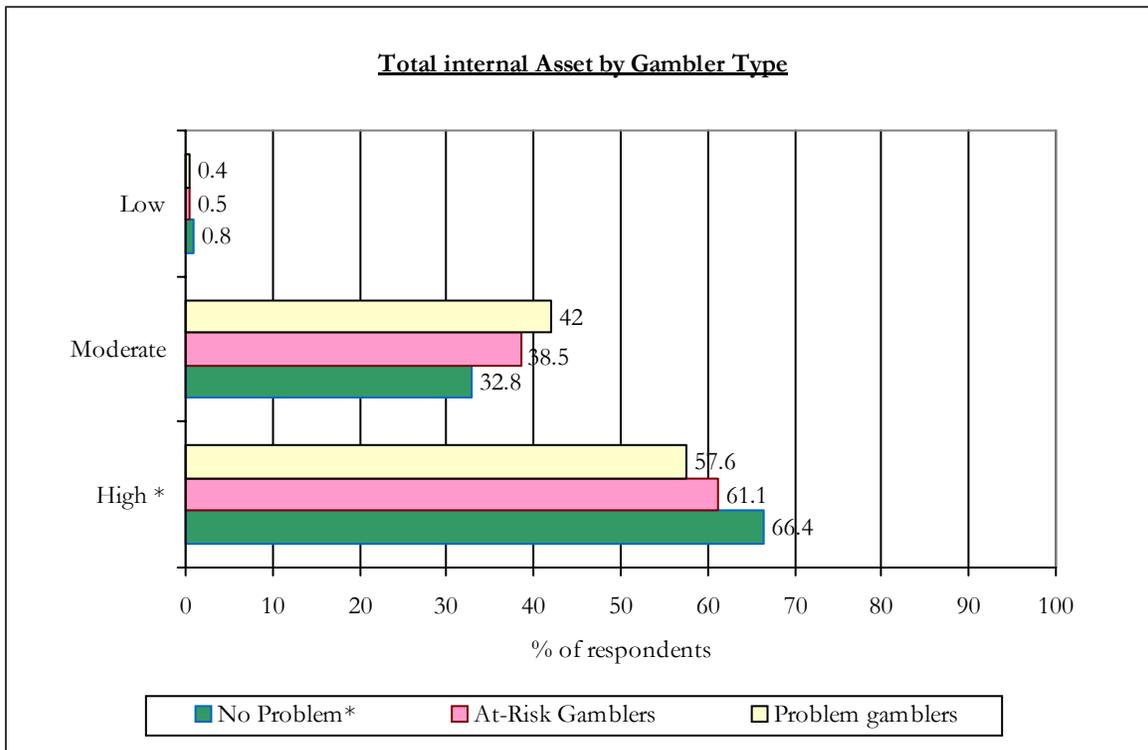
- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

Chart 24



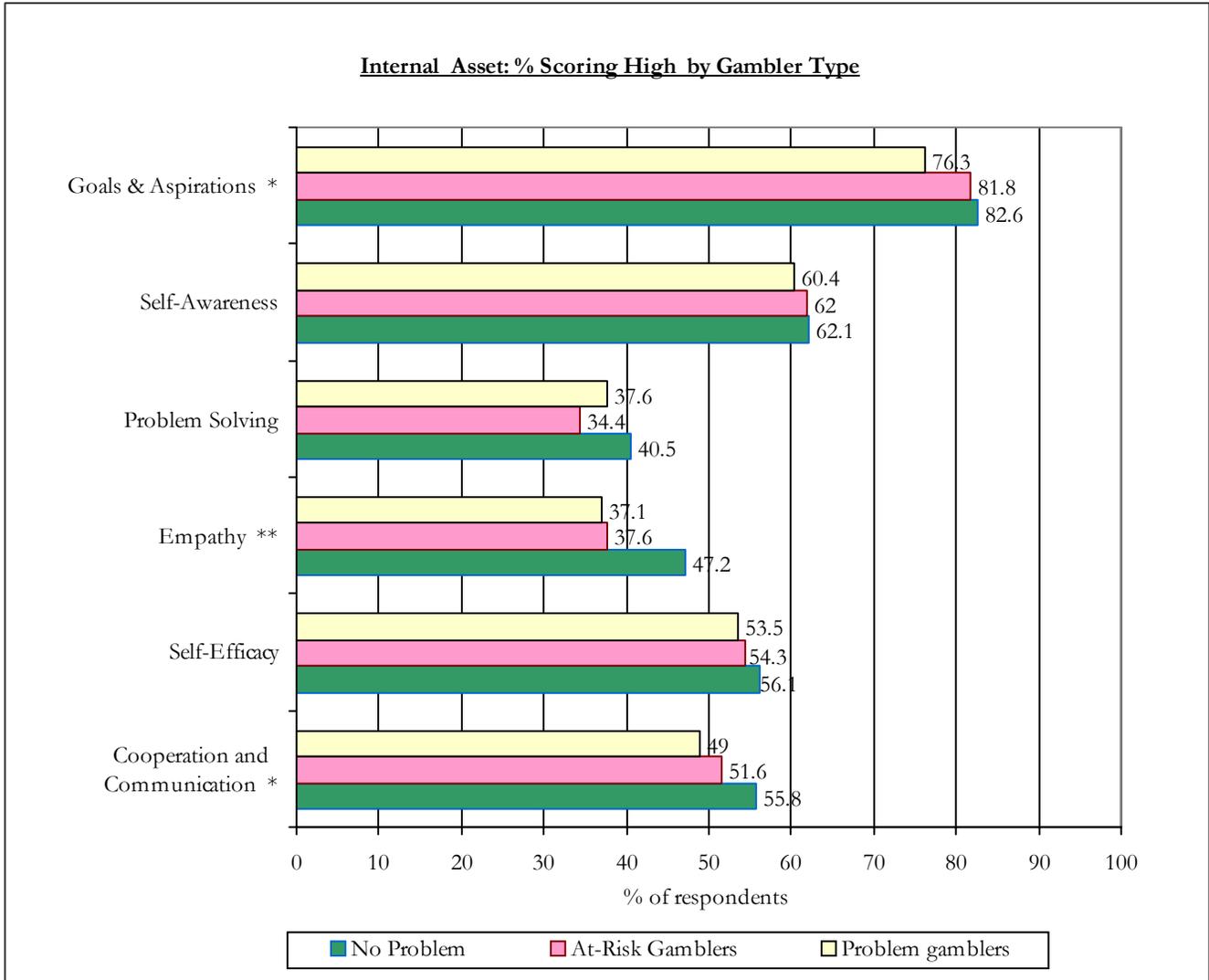
- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

Chart 25



- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

Chart 26



- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

- Problem Gambling and Risk Behavior

Overall, the at-risk and problem gamblers were significantly more likely than their no problem counterparts, to report lifetime engagement and past twelve month engagement in risk behavior.

When compared to the no problem group the at-risk gambler was twice as likely and the problem gambler three times as likely have smoked cigarettes in their lifetime. The at-risk and problem groups were also significantly more likely to report having drunk alcohol as well as twice as likely to have engaged in binge drinking at least once in their lifetime. Within their lifetime the at-risk and problem gamblers were also two to three times more likely to have smoked ganja and three to four times more likely to have drank ganja tea.

Table 40: Gambler Type and its relation to lifetime risk behaviour

| <i>During your lifetime have you ever...</i> | No Problem gambler (n=1833) % | At-risk gambler (n= 221) % | Problem Gambler (n=245) % | Significance |
|--|--------------------------------------|-----------------------------------|----------------------------------|---------------------|
| Smoked cigarettes | 16.8 | 33.9 | 44.9 | *** |
| Had at least one drink of alcohol | 67.7 | 80.5 | 79.2 | *** |
| Had five or more drinks of alcohol in a row | 16.0 | 30.3 | 36.3 | *** |
| Smoked ganja | 13.2 | 26.2 | 36.7 | *** |
| Used crack/cocaine | 0.1 | 0.0 | 0.8 | - |
| Sniffed glue or any other inhalant | 3.5 | 3.2 | 5.3 | - |
| Used ecstasy | 0.2 | 0.9 | 1.2 | * |
| Drank ganja tea | 6.8 | 19.5 | 25.7 | *** |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

The at-risk and problem gamblers were significantly more likely, than the no problem group, to report violent risk behavior and school delinquency in the past month. In fact these two higher risk groups were significantly more likely to report engagement in the last twelve months of sixteen out of seventeen specific risk behaviors probed (*see Table 41*).

Thinking specifically of the problem gamblers, within the last 12 months, more than a half (56.7%) had been in a physical fight, more than a third had been in a group fight (38.4%) and 17% had injured someone seriously. Other violent behavior reported most by this group were: breaking a window (15%), starting a fire (11.4%) and deliberately damaging someone else's property (13.9%). A quarter (24.5%) of this group also reported carrying a weapon to school, a fifth (20%) had stolen from a family member, one in ten (10%) had been arrested by the police and 9% had run away from home. The problem gambling group also demonstrated high delinquency in school with almost a quarter (23.7%) having had to repeat a grade, a third (33%) had failed a class (subject), three in ten (29.8%) had skipped a class and one in four (24.5%) had skipped an entire day of school. At-risk gamblers tended to mirror the behavior described above to a lesser extent (*see Table 41*).

At-risk and problem gamblers were also significantly more likely to report recent engagement in violent behavior at school. Within the school setting in the last 12 months they were significantly more likely to report having been threatened or injured with a weapon, having been in a physical fight, having hit or slapped someone, having carried a knife or other weapon to protect themselves and having been in a gang. They were also significantly more likely to report having had something stolen or deliberately damaged. Both groups were also twice as likely to report having been offered, sold or given an illegal drug (see Table 42).

Table 41: Gambler Type and its relation to Past 12 Months risk behaviour

| <i>Activities involved in within the last 12 MONTHS</i> | No Problem gambler (n=1833) % | At-risk gambler (n= 221) % | Problem Gambler (n=245) % | Significance |
|---|--------------------------------------|-----------------------------------|----------------------------------|---------------------|
| A physical fight | 38.9 | 56.1 | 56.7 | *** |
| A group fight | 11.5 | 23.1 | 38.4 | *** |
| Injuring someone seriously | 5.7 | 11.8 | 17.1 | *** |
| Shoplifting | 2.2 | 2.7 | 8.6 | *** |
| Deliberately damaging someone else's property | 5.7 | 11.3 | 13.9 | *** |
| Stealing a car | 0.2 | 0.0 | 0.4 | - |
| Riding in a stolen car | 0.6 | 0.5 | 3.3 | *** |
| Running away from home | 2.9 | 4.1 | 9.0 | ** |
| Carrying a weapon to school | 8.7 | 21.7 | 24.5 | *** |
| Failing a grade (having to repeat a grade) | 15.5 | 23.5 | 23.7 | *** |
| Failing a class | 24.8 | 30.3 | 33.5 | ** |
| Breaking a window | 6.6 | 10.9 | 15.1 | *** |
| Starting a fire | 4.4 | 5.9 | 11.4 | ** |
| Skipping a class | 16.0 | 25.8 | 29.8 | *** |
| Skipping a day of school | 11.0 | 14.0 | 24.5 | *** |
| Stealing from a friend or family member | 6.7 | 7.7 | 20.0 | *** |
| Being arrested by the police | 2.5 | 5.4 | 10.6 | *** |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

Table 42: Gambler Type and its relation to frequency of specific risk behaviour in the past 12 months in school

| <i>Activities involved in within the last 12 mths at school</i> | No Problem gambler (n=1610) % | At-risk gambler (n= 190) % | Problem Gambler (n=198) % | Significance |
|---|--|---|--|---------------------|
| <i>Been offered, sold or given an illegal drug</i> | | | | |
| 0 times | 96.3 | 93.1 | 91.9 | * |
| 1 time | 1.4 | 2.6 | 2.5 | |
| 2 or more times | 2.2 | 4.2 | 5.5 | |
| <i>Been threaten or injured with a weapon</i> | | | | |
| 0 times | 88.6 | 81.1 | 76.8 | *** |
| 1 time | 7.3 | 10.0 | 11.6 | |
| 2 or more times | 4.1 | 8.9 | 11.7 | |
| <i>Been in a physical fight</i> | | | | |
| 0 times | 52.4 | 40.2 | 33.8 | *** |
| 1 time | 21.6 | 15.3 | 19.2 | |
| 2 or more times | 26.0 | 44.4 | 47.0 | |
| <i>Ever hit or slapped anyone</i> | | | | |
| 0 times | 49.8 | 32.8 | 29.4 | *** |
| 1 time | 18.0 | 16.9 | 16.8 | |
| 2 or more times | 32.2 | 50.3 | 53.8 | |
| <i>Had something stolen or deliberately damaged</i> | | | | |
| 0 times | 50.3 | 45.0 | 44.4 | * |
| 1 time | 17.4 | 14.3 | 12.6 | |
| 2 or more times | 32.3 | 40.8 | 42.9 | |
| <i>Carried a gun to protect yourself</i> | | | | |
| 0 times | 98.9 | 96.8 | 98.5 | * |
| 1 time | 0.3 | 0.5 | 0.5 | |
| 2 or more times | 0.9 | 2.7 | 1.0 | |
| <i>Carried a knife to protect yourself</i> | | | | |
| 0 times | 90.8 | 79.5 | 74.7 | *** |
| 1 time | 3.2 | 4.7 | 6.6 | |
| 2 or more times | 6.1 | 15.8 | 18.7 | |
| <i>Carried any other weapon</i> | | | | |
| 0 times | 95.5 | 81.1 | 84.8 | *** |
| 1 time | 2.1 | 5.3 | 4.5 | |
| 2 or more times | 2.4 | 13.7 | 10.6 | |
| <i>Belonged to a gang</i> | | | | |
| 0 times | 92.8 | 79.5 | 70.2 | *** |
| 1 time | 3.8 | 8.4 | 14.1 | |
| 2 or more times | 3.5 | 12.1 | 15.7 | |

- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

The problem gambler also reported higher incidences of depression, suicide ideation and attempts at suicide. Specifically, 18.8% of problem gamblers reported almost always/often having felt so sad that they felt life was not worth living and a third of this group (32.7%) reported suicide ideation in the last 12 months. Of those who had considered suicide more than a fifth (22.5%) had actually attempted suicide. While the portion reporting depressions and suicide attempts were not significantly different across the groups, they were higher within the problem gambler group (see Table 43).

Both the at-risk and problem gambling groups were significantly more likely to report having thought about hurting or killing someone almost always/some of the time (see Table 43).

Table 43: Gambler Type and its relation to Depression and Suicide Ideation

| | No Problem gambler (n=1833) % | At-risk gambler (n= 221) % | Problem Gambler (n=245) % | Significance |
|--|-------------------------------|----------------------------|---------------------------|--------------|
| <i>During the past year how often have you felt so sad that you felt life wasn't worth living...</i> | | | | |
| Almost always | 6.5 | 5.9 | 11.0 | - |
| Often | 8.4 | 8.1 | 7.8 | |
| Sometimes | 38.8 | 43.0 | 42.9 | |
| Rarely | 8.8 | 8.1 | 9.4 | |
| Never | 37.5 | 34.8 | 29.0 | |
| <i>During past 12 months have felt like killing self</i> | 21.4 | 24.0 | 32.7 | ** |
| <i>During past 12 months have tried to kill self</i> | 19.3 (n=393) | 18.9 (n=53) | 22.5 (n=80) | - |
| <i>Do you ever think about hurting or killing someone</i> | | | | |
| Never | 70.3 | 60.3 | 51.4 | *** |
| Some of the time | 26.6 | 30.6 | 39.6 | |
| Almost always | 3.0 | 9.1 | 9.0 | |

- = p not significant; * = p<0.05; ** = p<0.005; *** = p<0.000

The problem and at-risk gamblers were also significantly more likely to have initiated sexual activity and less likely to report condom use at last intercourse. Specifically more than a half of the at-risk (56.1%) and the problem gambling group (60.8%) groups reported being sexually active compared to less than half (40.5%) of the no problem group. Additionally of those sexually active 73% of the no problem group reported condom use at last sex compared to less than two-thirds of the problem (65.3) and at-risk (61.6%) groups (see Table 44).

Table 44: Gambler Type and its relation to Sexual Risk Taking

| | No Problem gambler (n=1833) % | At-risk gambler (n= 221) % | Problem Gambler (n=245) % | Significance |
|----------------------------------|-------------------------------|----------------------------|---------------------------|--------------|
| % sexually active | 40.5 | 56.1 | 60.8 | *** |
| % using a condom at last sex act | 73.1 | 61.6 | 65.3 | * |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

- **Problem Gambling Correlation Analysis:**

Problem Gambling Risk Factors:

Using correlation analysis, risk factors associated with the development of problem gambling emerged as: gender, presence of a family member who gambles and gambles too much, an earlier age of initiation of gambling as well as endorsement of the view of gambling as fun and exciting as well as providing a chance for a better life. These factors showed a small but significant relationship to gambler type (*see Table 45*).

This means that the at-risk and problem gambler was more likely to be male, have begun gambling at an early age and most likely to have a family member who gambles as well as a family member who gambles too much. They were also most likely to endorse the view of gambling as fun, exciting and a positive influence as well as providing a chance for a better life.

Type of games tried also emerged as a possible risk factor to problem gambling. Games tried which showed a small but significant correlation to the development of problem gambling include: jacks, coin games, “lastics”, marbles and coins/bottle stopper football. While these games are not necessarily the games currently played they may represent entry games, the way through which those likely to develop problem gambling first engage in playing games for money. Inherent in the informal and childhood nature of these games, is the fact that youth do not view playing these games for money as gambling they rationalize that money is included in these games for the excitement while gambling is motivated by money and the desire to win this money (*see Table 45*).

- Risk Behavior and Problem Gambling

The risk behaviour findings were further underscored by correlation analysis which found a small but significant association with gambler type and thoughts of aggression, stealing from a friend or family member, past 12 month involvement in: a group fight, injuring someone seriously and deliberate damage to someone's property.

Aggression at school including past 12 month: threatening or injuring someone with a gun or knife, involvement in a physical fight, slapping or hitting someone, belonging to a gang and the carrying of a knife or other weapon for protection also showed a small but significant association with problem gambling. This means that problem gambling was associated with increasing incidence of aggressive and violent behaviour. (see Table 45)

Table 45: Problem Gambling and Correlation Analysis

| | Pearson's r | Chi-square |
|---|--------------------|-------------------|
| Risk Factors: Background and attitudes | | |
| Gender | .112 | *** |
| Age of gambling initiation | -.294 | *** |
| Presence of a family member who gambles | .207 | *** |
| Presence of a family member who gambles too much | .114 | *** |
| Factor1: Gambling is fun, exciting and a positive influence | .270 | *** |
| Factor 4: Gambling gives a chance for a better life | .148 | *** |
| Risk Factors: Games tried which show a correlation to problem gambling | | |
| Coin games | .140 | *** |
| Jacks | .148 | *** |
| E"lastic"s/"lastic" | .176 | *** |
| Marbles | .117 | *** |
| Coin/Bottle stopper and money football | .109 | *** |
| Risk Behaviour: Risk behaviors with a correlation to problem gambling | | |
| Thought about hurting/killing someone | .152 | *** |
| Stole from a friend or family member in last 12 months | .128 | *** |
| <i>Last 12 months in school been:</i> | | |
| - threatened/injured with a gun or knife | .140 | *** |
| - in a physical fight | .179 | *** |
| - slapped or hit someone | .173 | *** |
| - carried a knife for protection | .175 | *** |
| - carried other weapon for protection | .182 | *** |
| - belonged to gang | .226 | *** |
| Last 12 months been in a group fight | .234 | *** |
| Last 12 months injured someone seriously | .143 | *** |
| Last 12 months damaged someone's property deliberately | .112 | *** |

- = p not significant; * = p<0.05; ** = p<0.005; ***= p<0.000

REFERENCES

- Griffiths M;1995; Adolescents Gambling; London Routledge; 1995.
- Hope Enterprises Ltd.; 2001; Celebrating Youth- A Report on Resiliency Based Research Conducted Among Adolescents in Clarendon, Jamaica; the Change Project and USAID.
- Lesieur, H. & Blume, S.; 1987; The South Oaks Gambling Screen (SOGS): A new instrument for the identification of pathological gamblers; America Journal Psychiatry 144:2; Sept. 1987.
- Mackay, T; Patton, D. & Broszeit, B.; Sept. 2005; Student Gambling Report 2005; AFM Research.
- Rossen, F.; Dec. 2001; Youth gambling: A Critical Review of the Public Health Literature; Centre for Gambling Studies University of Auckland.
- Volberg, R.A; 1993; Gambling and Problem Gambling Among Adolescents in Washington State; Gemini Research
- Volberg, R.A; 2002; Gambling and Problem Gambling Among Adolescents in Nevada; Gemini Research
- Wested; 2002; Resilience and Youth development Module; Wested & California Safe and Healthy Kids Program Office; <http://www.wested.org/hks>.
- Winters KC et al.,1993; Patterns and characteristics of adolescent gambling; Journal of Gambling Studies 9:371-386, 1993.

APPENDIX 1: Questionnaire

**YOUTH GAMES SURVEY
2006**

Introduction: “My name is _____. I’m working for Hope Enterprises Ltd., a Market Research company in Kingston. We are interviewing young people today to find out about life in general and the games they play. You have not been singled out anyone could have been chosen and you were selected by chance to participate in this survey, first...let me tell you some more about it. Is that okay with you?”

Your honest answers to these questions will help us better understand young people and their lives. Your name will not be written on this form, and will never be used in connection with any of the information you tell me. This survey asks some personal questions, but your answers will not be shown to anyone and you do not have to answer any questions that you do not want to. Your answers are completely confidential.

You may end this interview at any time that you want to. However, we would greatly appreciate your participation. We are only interviewing persons **10-19 years**.

Do you qualify? Do you have any questions? Would you be willing to participate?

(Signature of respondent indicating that they understand what was explained and informed consent has been given verbally)

(Signature of interviewer that consent was given by the respondents)

Q109. Now I would like to talk to you briefly about the household in which you usually live. Which of the following are in your household? **READ LIST. MULTIPLE RESPONSES ALLOWED**

| | | | |
|----|----------------------------------|-------|------|
| a. | Telephone | 1 Yes | 2 No |
| b. | Radio | 1 Yes | 2 No |
| c. | Television | 1 Yes | 2 No |
| d. | Cable | 1 Yes | 2 No |
| e. | VCR/DVD | 1 Yes | 2 No |
| f. | Refrigerator | 1 Yes | 2 No |
| g. | Computer | 1 Yes | 2 No |
| h. | A car or vehicle that is working | 1 Yes | 2 No |

Q110. What type of toilet facilities does your household have?

- 1 Flush Toilet
- 2 Outside pit latrine
- 3 Other (*specify*) _____

SECTION 2: RESILIENCE ASSESSMENT

For each of the statements below please tell me if you feel it is never true, sometimes true, often true or always true as it relates to your life. **(SHOW CARD)**

I have a friend about my own age.....

| | | Never True | Sometimes True | Often True | Always True |
|-------|--|---------------|-------------------|---------------|----------------|
| Q201. | Who really cares about me. | 1 | 2 | 3 | 4 |
| Q202. | Who talks with me about my problems. | 1 | 2 | 3 | 4 |
| Q203. | Who teases me very much. | 1 | 2 | 3 | 4 |
| Q204. | Who helps me when I am having a hard time. | 1 | 2 | 3 | 4 |

In my home, there is an adult

| | | Never True | Sometimes True | Often True | Always True |
|-------|--|---------------|-------------------|---------------|----------------|
| Q205. | Who expects me to follow the rules | 1 | 2 | 3 | 4 |
| Q206. | Who believes that I will be a success | 1 | 2 | 3 | 4 |
| Q207. | Who is too busy to pay much attention to me | 1 | 2 | 3 | 4 |
| Q208. | Who talks with me about my problems | 1 | 2 | 3 | 4 |
| Q209. | Who always wants me to do my best | 1 | 2 | 3 | 4 |
| Q210. | Who listens to me when I have something to say | 1 | 2 | 3 | 4 |

For each of the statements below please tell me if you feel it is never true, sometimes true, often true or always true as it relates to your life. **(SHOW CARD)**

| | | Never True | Sometimes True | Often True | Always True |
|-------|---|---------------|-------------------|---------------|----------------|
| Q211. | I feel bad when someone gets their feelings hurt | 1 | 2 | 3 | 4 |
| Q212. | I do fun things or go fun places with my parents or other adults | 1 | 2 | 3 | 4 |
| Q213. | I try to understand what other people go through | 1 | 2 | 3 | 4 |
| Q214. | When I need help, I find someone to talk with | 1 | 2 | 3 | 4 |
| Q215. | I know where to go to for help with a problem | 1 | 2 | 3 | 4 |
| Q216. | I try to work out problems by talking about them | 1 | 2 | 3 | 4 |
| Q217. | My friends get into a lot of trouble | 1 | 2 | 3 | 4 |
| Q218. | My friends try to do what is right | 1 | 2 | 3 | 4 |
| Q219. | I do helpful things at home | 1 | 2 | 3 | 4 |
| Q220. | I help make decisions with my family | 1 | 2 | 3 | 4 |
| Q221. | My friends do well in school <i>(ASK IF IN SCHOOL ONLY)</i> | 1 | 2 | 3 | 4 |
| Q222. | At school, I help decide things like class activities or rules <i>(ASK IF IN SCHOOL ONLY)</i> | 1 | 2 | 3 | 4 |
| Q223. | I do helpful things at my school <i>(ASK IF IN SCHOOL ONLY)</i> | 1 | 2 | 3 | 4 |

ASK Q224 – Q230 IF IN SCHOOL ONLY: *At my school, there is a teacher or some other adult...*

| | | Never True | Sometimes True | Often True | Always True |
|-------|--|---------------|-------------------|---------------|----------------|
| Q224. | Who really cares about me | 1 | 2 | 3 | 4 |
| Q225. | Who tells me when I do a good job | 1 | 2 | 3 | 4 |
| Q226. | Who notices when I'm not there | 1 | 2 | 3 | 4 |
| Q227. | Who is mean to me | 1 | 2 | 3 | 4 |
| Q228. | Who always wants me to do my best | 1 | 2 | 3 | 4 |
| Q229. | Who listens to me when I have something to say | 1 | 2 | 3 | 4 |
| Q230. | Who believes that I will be a success | 1 | 2 | 3 | 4 |

Outside of my home and school, in the community there is an adult...

| | | Never True | Sometimes True | Often True | Always True |
|-------|---|---------------|-------------------|---------------|----------------|
| Q231. | Who really cares about me | 1 | 2 | 3 | 4 |
| Q232. | Who tells me when I do a good job | 1 | 2 | 3 | 4 |
| Q233. | Who notices when I am upset about something | 1 | 2 | 3 | 4 |
| Q234. | Who believes that I will be a success | 1 | 2 | 3 | 4 |
| Q235. | Who always wants me to do my best | 1 | 2 | 3 | 4 |
| Q236. | Who I trust | 1 | 2 | 3 | 4 |

Q237. IF OTHER ADULT OUTSIDE OF HOME AND SCHOOL Who were you thinking of?
(CIRCLE AS MANY AS APPLY. DO NOT READ LIST)

- 1 Pastor 2 Teacher 3 Friend 4 Guidance Counselor
5 Doctor 6 Nurse 7 Family friend
8 Other (specify) _____

Please tell me if each of the following are never true, s/times true, often true or always true as it relates to you.

| | | Never True | S/ True | Often True | Always True |
|-------|---|---------------|------------|---------------|----------------|
| Q238. | I can work out my problems | 1 | 2 | 3 | 4 |
| Q239. | I can do most things if I try | 1 | 2 | 3 | 4 |
| Q240. | I can work with someone who has different opinions than mine | 1 | 2 | 3 | 4 |
| Q241. | There are many things that I do well | 1 | 2 | 3 | 4 |
| Q242. | I enjoy working together with other students my age | 1 | 2 | 3 | 4 |
| Q243. | I stand up for what I believe in | 1 | 2 | 3 | 4 |
| Q244. | I try to understand how other people feel | 1 | 2 | 3 | 4 |
| Q245. | I feel like I am all alone in the world | 1 | 2 | 3 | 4 |
| Q246. | There is a purpose to my life | 1 | 2 | 3 | 4 |
| Q247. | I understand my moods and feelings | 1 | 2 | 3 | 4 |
| Q248. | I understand why I do what I do | 1 | 2 | 3 | 4 |
| Q249. | I am a part of club, sports team, church group or other such extra activity | 1 | 2 | 3 | 4 |
| Q250. | Outside of my home and school, I help other people | 1 | 2 | 3 | 4 |
| Q251. | I am confused about what I want out of life | 1 | 2 | 3 | 4 |
| Q252. | I have goals and plans for the future | 1 | 2 | 3 | 4 |
| Q253. | I plan to graduate from high school or I have already graduated | 1 | 2 | 3 | 4 |
| Q254. | I plan to go to college or some other school after high school | 1 | 2 | 3 | 4 |

Please tell me if you strongly agree, agree, neither agree nor disagree, disagree or strongly disagree with the following statements.

| | | Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
|-------|---|-------------------|-------|----------------------------------|----------|----------------------|
| Q255. | What happens will happen no matter what | 5 | 4 | 3 | 2 | 1 |
| Q256. | The world is run by a few people in power, and there is not much the little person can do | 5 | 4 | 3 | 2 | 1 |
| Q257. | These days, a person does not know whom he can count on | 5 | 4 | 3 | 2 | 1 |
| Q258. | Many times, I might just as well decide what to do by flipping a coin | 5 | 4 | 3 | 2 | 1 |
| Q259. | If you try to change things, you usually make them worse | 5 | 4 | 3 | 2 | 1 |
| Q260. | I have little influence over the things that happen to me | 5 | 4 | 3 | 2 | 1 |
| Q261. | I want to know if something will work before I take a chance on it | 5 | 4 | 3 | 2 | 1 |
| Q262. | Nowadays, a person has to live for today and let tomorrow take care of itself | 5 | 4 | 3 | 2 | 1 |

**SECTION 3:
GAMBLING INVOLVEMENT AND ACTIVITIES**

First, we'd like to ask some questions about gambling activities you may participate in. People spend money and gamble on many different things including buying lottery tickets, playing bingo, or card games with their friends. I am going to list some activities that you might have bet or spent money on.

Q301. People play different games for money for different reasons. Which of the following have you ever heard of people playing for money?

| | Q301 | |
|---|------|----|
| | Yes | No |
| a. Arcade or Video Games | 1 | 0 |
| b. Bingo | 1 | 0 |
| c. Cards (not including poker or games such as Yuh-Gi-Oh) or board games at home, friends home or at work | 1 | 0 |
| d. Cards games such as Yuh-Gi-Oh | 1 | 0 |
| e. Coin games such as heads and tails or ackee and toto/ackee & bobo | 1 | 0 |
| f. Computer games | 1 | 0 |
| g. Domino | 1 | 0 |
| h. Gambling at Gaming establishments | 1 | 0 |
| i. Gambling on the Internet (not including poker) | 1 | 0 |
| j. Horse Races, either live at the track or off track | 1 | 0 |
| k. Jacks | 1 | 0 |
| l. "Lastic" (Elastics) | 1 | 0 |
| m. Lotto | 1 | 0 |
| n. Cash Pot | 1 | 0 |
| o. Pick 3 | 1 | 0 |
| p. Other SVL games of chance | 1 | 0 |
| q. Marbles | 1 | 0 |
| r. Money football, bottle stopper football and cork football | 1 | 0 |
| s. Poker, either at home, friends home, at work or on the Internet | 1 | 0 |
| t. Raffles or fundraising tickets | 1 | 0 |
| u. Sports Pools or the outcome of sporting events (through a bookie) | 1 | 0 |
| v. Video lottery terminals (VLT machines) | 1 | 0 |

Q302. Have you ever been exposed to games played for money? Yes 1 No 2

Q303. Have you ever had the opportunity to play a game for money? Yes 1 No 2

Q304. In your lifetime which have you ever played for money? Would you say (_____)? **READ LIST**

| | Q304 | |
|---|------|----|
| | Yes | No |
| a. Arcade or Video Games | 1 | 0 |
| b. Bingo | 1 | 0 |
| c. Cards (not including poker or games such as Yuh-Gi-Oh) or board games at home, friends home or at work | 1 | 0 |
| d. Cards games such as Yuh-Gi-Oh | 1 | 0 |
| e. Coin games such as heads and tails or ackee and toto/ackee & bobo | 1 | 0 |
| f. Computer games | 1 | 0 |
| g. Domino | 1 | 0 |
| h. Gambling at Gaming establishments | 1 | 0 |
| i. Gambling on the Internet (not including poker) | 1 | 0 |
| j. Horse Races, either live at the track or off track | 1 | 0 |
| k. Jacks | 1 | 0 |
| l. "Lastic" (Elastics) | 1 | 0 |
| m. Lotto | 1 | 0 |
| n. Cash Pot | 1 | 0 |
| o. Pick 3 | 1 | 0 |
| p. Other SVL games of chance | 1 | 0 |
| q. Marbles | 1 | 0 |
| r. Money football, bottle stopper football and cork football | 1 | 0 |
| s. Poker, either at home, friends home, at work or on the Internet | 1 | 0 |
| t. Raffles or fundraising tickets | 1 | 0 |
| u. Sports Pools or the outcome of sporting events (through a bookie) | 1 | 0 |
| v. Video lottery terminals (VLT machines) | 1 | 0 |
| | | |

IF NO TO ALL SKIP to Q311

Q305. What other games have you played for money? **(Please Specify)**

None 1 Don't know 98 No response/refused 99

Q306. **ASK FOR EACH GAME REPORTED IN Q304:** In the last 12 months, how often did you play each of the following for money?

Q307. Approximately how much did you bet in each sitting?

| | | Q306 Frequency of play in <u>LAST 12 MONTHS</u> | | | | | Q307 Amount Spent/ bet in one sitting |
|----|---|--|----------------------------|-----------------------------|----------------------------|---------------|---|
| | | Everyday or almost everyday | Once or twice a week | Once or twice a month | Once or twice a year | Not at all | \$\$\$\$\$\$\$\$\$\$\$\$ |
| a. | Arcade or Video Games | 5 | 4 | 3 | 2 | 1 | |
| b. | Bingo | 5 | 4 | 3 | 2 | 1 | |
| c. | Cards (not including poker or games such a Yuh-Gi-Oh) or board games at home, friends home or at work | 5 | 4 | 3 | 2 | 1 | |
| d. | Cards games such as Yuh-Gi-Oh | 5 | 4 | 3 | 2 | 1 | |
| e. | Coin games such as heads and tails or ackee and toto/ackee and bobo | 5 | 4 | 3 | 2 | 1 | |
| f. | Computer games | 5 | 4 | 3 | 2 | 1 | |
| g. | Domino | 5 | 4 | 3 | 2 | 1 | |
| h. | Gambling at Gaming establishments | 5 | 4 | 3 | 2 | 1 | |
| i. | Gambling on the Internet (not including poker) | 5 | 4 | 3 | 2 | 1 | |
| j. | Horse Races, either live at the track or off track | 5 | 4 | 3 | 2 | 1 | |
| k. | Jacks | 5 | 4 | 3 | 2 | 1 | |
| l. | “Lastic” (Elastics) | 5 | 4 | 3 | 2 | 1 | |
| m. | Lotto | 5 | 4 | 3 | 2 | 1 | |
| n. | Cash Pot | 5 | 4 | 3 | 2 | 1 | |
| o. | Pick 3 | 5 | 4 | 3 | 2 | 1 | |
| p. | Other SVL games of chance | 5 | 4 | 3 | 2 | 1 | |
| q. | Marbles | 5 | 4 | 3 | 2 | 1 | |
| r. | Money football, bottle stopper football and cork football | 5 | 4 | 3 | 2 | 1 | |
| s. | Poker, either at home, friends home, at work or on the Internet | 5 | 4 | 3 | 2 | 1 | |
| t. | Raffles or fundraising tickets | 5 | 4 | 3 | 2 | 1 | |
| u. | Sports Pools or the outcome of sporting events | 5 | 4 | 3 | 2 | 1 | |
| v. | Video lottery terminals (VLT machines) | 5 | 4 | 3 | 2 | 1 | |

**INTERVIEWER: IF NO GAME PLAYED IN LAST 12 MONTHS SKIP TO SECTION 5:
INCIDENCE OF ADULT ROLE MODEL GAMBLING**

**FOR EACH GAME PLAYED FOR MONEY IN LAST 12 MONTHS ASK:
(INTERVIEWER INSERT APPROPRIATE CODE)**

Q308. Where do you usually play (insert game) for money? Would you say:

- | | | |
|----------------------------|----------------------------------|------------------|
| 1. At home | 2. At work | 3. On the street |
| 4. At school-during breaks | 5. At school when skipping class | 6. In bars |
| 7. At the gaming lounge | 8. Other(specify) _____ | |

Q309. Thinking specifically of when you play for money, how long do you usually play for? Please tell me in

- terms of: 1. <1hr, 2. up to an 1hr, 3. 1-2hrs, 4. 2-3hrs,
5. 3-4 hrs, 6. 4-5hrs, 7. 5-6 hrs, 8. More than 6 hours.

| | Q308 Where played | Q309 Length of time played for |
|--|-------------------------|--------------------------------------|
| a. Arcade or Video Games | | |
| b. Bingo | | |
| c. Cards (not including poker or games such a Yuh-Gi-Oh) or board games at home, friends home or at work | | |
| d. Cards games such as Yuh-Gi-Oh | | |
| e. Coin games such as heads and tails or ackee and toto/ackee and bobo | | |
| f. Computer games | | |
| g. Domino | | |
| h. friends or at work) | | |
| i. Gambling at Gaming establishments | | |
| j. Gambling on the Internet (not including poker) | | |
| k. Horse Races, either live at the track or off track | | |
| l. Jacks | | |
| m. "Lastic" (Elastics) | | |
| n. Lotto | | |
| o. Cash Pot | | |
| p. Pick 3 | | |
| q. Other SVL games of chance | | |
| r. Marbles | | |
| s. Money football, bottle stopper football and cork football | | |
| t. Poker, either at home, friends home, at work or on the Internet | | |
| u. Raffles or fundraising tickets | | |
| v. Sports Pools or the outcome of sporting events (through a bookie, charity, with | | |
| w. Video lottery terminals (VLT machines) | | |

IF CARDS PLAYED FOR MONEY IN LAST 12 MONTHS ASK:

Q310. Which of the following cards games do you usually play for money? Any other?

- | | | |
|-----------------------|----|---|
| Black Jack | 1 | |
| Burns | 2 | |
| Three-a-card | 3 | |
| Five-a-card | 4 | |
| Sinker | 5 | |
| Romey | 6 | |
| Other (specify) _____ | | 7 |
| Don't know name | 98 | |
| No answer | 99 | |

Q311. People play games for money for different reasons. When you play games for money, please tell me whether or not each of the following is a reason for you. **READ LIST**

| | | |
|---------------------------------------|-------|------|
| a. To do things with your friends | 1 Yes | 2 No |
| b. Because it's exciting and fun | 1 Yes | 2 No |
| c. Because you're lucky | 1 Yes | 2 No |
| d. It decreases my boredom | 1 Yes | 2 No |
| e. To win money | 1 Yes | 2 No |
| f. To support good causes/ Charity | 1 Yes | 2 No |
| g. Out of curiosity | 1 Yes | 2 No |
| h. For entertainment or fun | 1 Yes | 2 No |
| i. To forget problems for a while | 1 Yes | 2 No |
| j. Because you're good at it | 1 Yes | 2 No |
| k. To be alone | 1 Yes | 2 No |
| l. Because of problems in your family | 1 Yes | 2 No |
| m. Other (<i>specify</i>) | 1 Yes | 2 No |

Q312. When you participate in the types of games/activities we have just discussed, do you usually do so...**READ LIST, RECORD ALL MENTION**

| | |
|---------------------------|---|
| Alone | 1 |
| With your friends | 2 |
| With parents | 3 |
| With other family members | 4 |
| With other people | 5 |
| Don't know/Refused | 6 |

Q313. How old were you the first time you bet or played any game for money? _____

SECTION 4: PROBLEM GAMBLING ASSESSMENT

Q401. In the past 12 months, how often have you gone back another day to try to win back the money you lost?

Every time 4 Most of the time 3 Some of the time 2 Never 1

Q402. In the past 12 months when you were betting, have you ever told others you were winning money when you really weren't winning?

Yes 1 No 2

Q403. Has your betting money, in the past 12 months, ever caused any problems for you such as arguments with family and friends, or problems at school or work?

Yes 1 No 2

Q404. In the past 12 months, have you ever gambled more/spent more money than you had planned to?

Yes 1 No 2

Q405. In the past 12 months, has anyone criticized your betting or told you that you had a gambling problem, regardless of whether you thought it was true or not?

Yes 1 No 2

Q406. In the past 12 months, have you ever felt bad about the amount you bet, or about what happens when you bet money?

Yes 1 No 2

- Q407. Have you ever felt, in the past 12 months, that you would like to stop betting money but didn't think you could?
Yes 1 No 2
- Q408. In the past 12 months, have you ever hidden from family or friends any betting slips, IOU's, lottery tickets, money that you've won, or other signs of gambling?
Yes 1 No 2
- Q409. In the past 12 months, have you had money arguments with family or friends that centered on gambling?
Yes 1 No 2
- Q410. In the past 12 months, have you borrowed money to bet and not paid it back?
Yes 1 No 2
- Q411. In the past 12 months, have you ever skipped or been absent from school or work due to betting activities?
Yes 1 No 2
- Q412. Have you borrowed money or stolen something in order to bet or to cover gambling debts in the past 12 months?
Yes 1 No 2 **(GO TO Q501)**
- Q413. If yes, mark from whom or where you got the money or goods (mark all that apply):
- | | |
|--|---|
| Parents | 1 |
| Brother(s) or sister(s) | 2 |
| Other relatives | 3 |
| Friends | 4 |
| Loan sharks | 5 |
| You sold personal or family property | 6 |
| You passed a bad cheque on your chequing account | 7 |
| You stole from someone | 8 |

**SECTION 5:
INCIDENCE OF ADULT ROLE MODEL GAMBLING**

- Q501. Does anyone in your family gamble for money?
Yes 1 No 2 Don't know 98 Refused 99 **IF NO SKIP TO SECTION 6**
- **IF YES ASK: Which family member?**
- | | | | | | |
|-----------------------|---|-------------|----|------------------------|----|
| Mother only | 1 | Father only | 2 | Both mother and father | 3 |
| Older Sibling | 4 | Aunt/Uncle | 5 | Grandparent | 6 |
| Other (specify) _____ | 7 | Don't know | 98 | Refused | 99 |
- Q502. Do you think anyone in your family gambles too much?
Yes 1 No 2 Don't know 98 Refused 99
- **IF YES ASK: Which family member?**
- | | | | | | |
|-----------------------|---|-------------|----|------------------------|----|
| Mother only | 1 | Father only | 2 | Both mother and father | 3 |
| Older Sibling | 4 | Aunt/Uncle | 5 | Grandparent | 6 |
| Other (specify) _____ | 7 | Don't know | 98 | Refused | 99 |
- Q503. In the **PAST 12 MONTHS** have you been worried about...
- | | | |
|--------------------------------|-------|------|
| a. Your mother's gambling | 1 Yes | 2 No |
| b. Your father's gambling | 1 Yes | 2 No |
| c. A close relative's gambling | 1 Yes | 2 No |
| d. A close friend's gambling | 1 Yes | 2 No |

**SECTION 6:
GENERAL ATTITUDE TO GAMBLING & LIFE**

Please tell me if you think the following statements are true or false.

| | | True | False |
|-------|---|------|-------|
| Q601. | A small minority of teens gamble | 1 | 0 |
| Q602. | You have less risk of developing gambling problems | 1 | 0 |
| Q603. | There are systems that make it easier to win while gambling | 1 | 0 |
| Q604. | People generally win their money back if they have a losing streak | 1 | 0 |
| Q605. | Your odds of winning the jackpot are increased if you buy more tickets. | 1 | 0 |
| Q606. | Gambling and risk taking are the same thing | 1 | 0 |
| Q607. | A person who gambles too much, only hurts themselves | 1 | 0 |
| Q608. | Gambling only refers to activities that occur in casinos, racetracks, and bars. | 1 | 0 |
| Q609. | Winning the big jackpot solves the player's problems | 1 | 0 |
| Q610. | People who gamble never feel bad or depressed about their losses. | 1 | 0 |
| Q611. | When people gamble they usually win more than they lose | 1 | 0 |

Please tell me whether you strongly agree, agree, neither agree nor disagree, disagree or strongly disagree with the following statements:

Q612. Gambling is bad.

| | | | | |
|----------------|-------|----------------------------|----------|-------------------|
| Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| 5 | 4 | 3 | 2 | 1 |

Q613. Only rich people gamble

| | | | | |
|----------------|-------|----------------------------|----------|-------------------|
| Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| 5 | 4 | 3 | 2 | 1 |

Q614. Gambling is something you do for relaxation.

| | | | | |
|----------------|-------|----------------------------|----------|-------------------|
| Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| 5 | 4 | 3 | 2 | 1 |

Q615. A gambler has no use

| | | | | |
|----------------|-------|----------------------------|----------|-------------------|
| Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| 5 | 4 | 3 | 2 | 1 |

Q616. Gambling is fun.

| | | | | |
|----------------|-------|----------------------------|----------|-------------------|
| Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| 5 | 4 | 3 | 2 | 1 |

Q617. Gambling is a means to get rich

| | | | | |
|----------------|-------|----------------------------|----------|-------------------|
| Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| 5 | 4 | 3 | 2 | 1 |

Q618. One can get addicted to gambling easily.

| | | | | |
|----------------|-------|----------------------------|----------|-------------------|
| Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| 5 | 4 | 3 | 2 | 1 |

| | | | | | |
|--|----------------|-------|----------------------------|----------|-------------------|
| Q619. Gambling is like drug addiction and prostitution | Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| | 5 | 4 | 3 | 2 | 1 |
| Q620. A gambler can be a good person | Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| | 5 | 4 | 3 | 2 | 1 |
| Q621. God says gambling is wrong | Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| | 5 | 4 | 3 | 2 | 1 |
| Q622. Gambling can contribute to making the country better | Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| | 5 | 4 | 3 | 2 | 1 |
| Q623. Gamblers are poor | Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| | 5 | 4 | 3 | 2 | 1 |
| Q624. I have no problem with gambling and people who gamble | Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| | 5 | 4 | 3 | 2 | 1 |
| Q625. Gambling can lead to crime and war | Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| | 5 | 4 | 3 | 2 | 1 |
| Q626. Gambling can make you win big and give you a chance in life | Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| | 5 | 4 | 3 | 2 | 1 |
| Q627. You never win at gambling because the system always cheats | Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| | 5 | 4 | 3 | 2 | 1 |
| Q628. Games such as Lotto and Cash Pot really do give poor people a chance to step up in life and make a little more money | Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| | 5 | 4 | 3 | 2 | 1 |
| Q629. Playing a game for money adds excitement and fun to the game. | Strongly agree | Agree | Neither agree nor disagree | Disagree | Strongly disagree |
| | 5 | 4 | 3 | 2 | 1 |

Q722. In the LAST 12 MONTHS have you been involved in the following things?

| | | |
|---|-------|------|
| a. A physical fight | 1 Yes | 2 No |
| b. A group fight | 1 Yes | 2 No |
| c. Injuring someone seriously enough to require medical attention | 1 Yes | 2 No |
| d. Shoplifting | 1 Yes | 2 No |
| e. Deliberately damaging someone else's property | 1 Yes | 2 No |
| f. Stealing a car | 1 Yes | 2 No |
| g. Riding in a stolen car | 1 Yes | 2 No |
| h. Running away from home | 1 Yes | 2 No |
| i. Carrying a weapon to school | 1 Yes | 2 No |
| j. Failing a grade (having to repeat a grade) | 1 Yes | 2 No |
| k. Failing a class | 1 Yes | 2 No |
| l. Breaking a window | 1 Yes | 2 No |
| m. Starting a fire | 1 Yes | 2 No |
| n. Skipping a class | 1 Yes | 2 No |
| o. Skipping a day of school | 1 Yes | 2 No |
| p. Stealing from a friend or family member | 1 Yes | 2 No |
| q. Being arrested by the police | 1 Yes | 2 No |

Q723. During the past year, how often did you ever feel so sad that you felt life wasn't worth living? Was that....

1 Almost always 2 Often 3 Sometimes 4 Rarely 5 Never

Q724. During the past 12 months, did you ever feel like killing yourself?

1 Yes 2 No **(SKIP TO q726)**

Q725. Have you ever tried to kill yourself? 1 Yes 2 No

Q726. Do you ever think about hurting or killing someone?

1 Never 2 Some of the time 3 Almost always

Q727. Have you ever had sex? 1 Yes 2 No **(SKIP TO END)**

Q728. How old were you when you had sex for the first time? _____yrs old

Q729. The last time you had sex, did you or your partner use a condom? 1 Yes 2 No

Q730. The last time you had sexual intercourse, what other methods did you or your partner use to prevent pregnancy? **DO NOT READ LIST**

- 1 No other method was used to prevent pregnancy
- 2 Birth control pills
- 3 Depo-provera or other injectables
- 4 Withdrawal
- 5 Some other method
- 6 Not sure

Please tell me if the following is true for: All questions; Most questions; Only some questions; Hardly any questions:

1. I understood the questions on this survey.

1 All questions 2 Most questions 3 Only some questions 4 Hardly any questions

2. I answered the questions on this survey honestly.

1 All questions 2 Most questions 3 Only some questions 4 Hardly any questions

THANK YOU VERY MUCH FOR YOUR TIME!!!

TIME ENDED: _____ DATE: _____

INTERVIEWER: _____

VALIDATED BY: _____