HOW MANY IS TOO MANY FOR BC YOUTH?

ALCOHOL USE AND ASSOCIATED HARMS
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MCCREARY TEAM

Annie Smith, Executive Director  
Elizabeth Saewyc, Research Director  
Duncan Stewart, BC AHS Coordinator/Research Associate  
Maya Peled, Research Associate  
Colleen Poon, Research Associate  
Kate Kovaleva, Research Assistant  

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EXECUTIVE SUMMARY

Among 12- to 19-year-olds who completed the 2013 BC Adolescent Health Survey (BC AHS), 45% of males and females had tried alcohol. With this percentage of BC students consuming alcohol it is important to establish the level at which use becomes harmful. Some people would argue that any use is risky, and some of the data in this report supports this. However, the data also clearly shows where harms noticeably increase, who is at greater risk of harmful use, and what protective factors can contribute to youth who drink staying within Canada’s Low-Risk Alcohol Drinking Guidelines.

Youth are generally making healthier choices than their peers five and 10 years ago, with youth less likely to have tried alcohol than in previous years, to have drunk alcohol in the past month, and to have engaged in heavy sessional drinking. They are also more likely to wait until they are at least 15 years old to drink.

Youth who started drinking at an earlier age reported poorer health than those who had not tried alcohol or waited longer to first try alcohol. For example, 16- to 18-year-olds who first drank at 12 or younger were more likely to have considered or attempted suicide, and used substances other than alcohol than those who had not used alcohol until they were at least 15.

Youth who had been drinking for more than a year (regardless of how old they were when they started) were more likely to drink regularly, drink heavily, and binge drink than those who were newer to using alcohol. They were also more likely to use alcohol to manage their emotions, as well as to experience negative consequences of their use and to report needing help for their use.

Canada’s Low-Risk Alcohol Drinking Guidelines suggest that if youth do decide to drink, they should never have more than one to two drinks per occasion and never drink more than one or two times per week. Many findings offered support for these guidelines. However, even youth who drank on three or more occasions in the past month reported poorer mental health than those who did not drink or drank less often, although the poorest outcomes were seen among those who drank on 10 or more occasions.

Despite recommendations that females consume fewer alcoholic drinks than males, older females drank at a similar level to older males, and younger females were more likely than younger males to have been drinking on three or more days in the past month and to have engaged in heavy sessional drinking during that time. Females were more likely than males to report using alcohol because they wanted to have fun, their friends were doing it, because of stress, or because they felt down or sad.

There were some concerning findings among youth who drank well above the recommended levels. For example, youth who engaged in heavy sessional drinking (meaning they had
consumed five or more drinks within a couple of hours) were less likely to report good or excellent overall health, and were more likely to report being seriously injured or experiencing a concussion in the past year.

Drinking above the rate recommended by Canada’s Low-Risk Alcohol Drinking Guidelines on the Saturday before completing the survey (males who had four or more drinks and females who had three or more drinks) was associated with a range of negative consequences and with lower ratings of overall health, mental health, and school connectedness.

Some youth were at greater risk of harmful alcohol use, including youth who identified as lesbian, gay, or bisexual; youth who had been physically or sexually abused; youth who had experienced discrimination; and youth who were employed. Also the more hours youth worked, the more likely they were to have engaged in heavy sessional drinking.

There were some geographical differences in alcohol consumption, most notably that youth in rural parts of the province were more likely than their urban-based peers to have tried alcohol at an early age and to have drunk on three or more days in the past month (30% vs. 26%).

Among youth who had tried alcohol, those who felt connected to school, family, and community, and who had supportive adults in their lives were less likely to drink at harmful levels than those without these supports to rely on.

Relationships with peers were complex, as youth without any close friends and those with a wider circle of friends were more likely to engage in risky drinking than their peers with a smaller circle of friends. However, regardless of how many friends they had, if youth had friends with healthy attitudes towards alcohol use, they were less likely to drink at harmful levels.
INTRODUCTION

Although the legal drinking age in British Columbia is 19 years, many youth begin to experiment with alcohol before this age.

Studies have shown that alcohol consumption by youth under the age of 19 is associated with an increased likelihood of involvement in health risks, such as a vehicle crash or a sexual or physical assault. Early, regular, and heavy alcohol use in adolescence is also linked to higher use, alcohol dependence, and other alcohol-related problems in adulthood.

As alcohol use among school-age youth has been linked to negative current and future outcomes, McCreary was asked by the BC Ministry of Health to produce an in-depth report which looked at the patterns of student drinking in BC.

Specifically, the report aims to:

› Identify harmful levels and patterns of alcohol consumption.
› Consider risk and protective factors related to risky or harmful drinking.
› Provide information on the geographical distribution of alcohol-specific risk and protective factors for youth who are in school in BC.

ABOUT THE REPORT

The report is based on the responses of almost 30,000 students in Grades 7-12 who completed the 2013 BC Adolescent Health Survey (BC AHS) across 56 BC school districts. For more details about the survey methodology and to view provincial and regional survey results visit www.mcs.bc.ca.

Trends over time are considered in relation to the 2003 and 2008 BC Adolescent Health Survey results.

When percentages are compared in the text, they are always statistically significant. However, graphs and tables may show frequencies that are not necessarily statistically significant at every point. Where this is not obvious, it is indicated in the text below the graph.

Where an asterisk (*) appears beside a percentage, the percentage should be interpreted with caution as it has a high standard error, but is still within the releasable range.

Quotes from youth who completed the 2013 BC AHS are included throughout this report to add qualitative detail and context.
A number of analyses in this report consider whether there is a difference between youth who started drinking alcohol at a younger age compared to those who first drank when they were older. For these analyses, we focused on youth aged 16 to 18. This allowed us to compare the experiences and trajectories of those who had started drinking at very young ages with those who waited until they were more mature.

**ABOUT THE ANALYSES**

The data from the survey was weighted to ensure it was representative of youth in Grades 7-12 in every region of the province.

All comparisons and associations reported in this study have been tested and are statistically significant at $p < 0.01$. This means that there is up to a 1% likelihood that the results presented occurred by chance.

Correlations which are reported cannot be assumed to prove causation or show the direction of a relation. There may be other factors involved. For example, the report shows a link between risky alcohol consumption and extreme despair but it is unknown if despair is a result of using alcohol, the reason for using alcohol, or if there is a third variable involved.

**LIMITATIONS**

As with any survey the BC AHS has limitations. It was designed as an overall health survey rather than an alcohol use survey, and as such may have missed some details about alcohol use which would be useful to know.

The survey is administered in mainstream public schools across the province. This means that youth with limited English language comprehension, youth who were absent on the day of the survey, and youth attending alternative and private schools are not included in these results.

Although the report provides a comprehensive overview of youth alcohol use among those who completed the survey, youth who were using alcohol at the most harmful levels may not have been in school on the day the survey was administered, and therefore may not be included in these results.
**TERMS USED IN THE REPORT**

- **Binge drinking** is used to describe when youth exceeded Canada's Low-Risk Alcohol Drinking Guidelines on the Saturday before completing the survey. It refers to males who consumed four or more alcoholic drinks and females who consumed three or more.

- **Extreme poverty** is used to describe youth living in conditions where they went to bed hungry often or always because there was not enough money for food at home.

- **Heavy sessional drinking** is used to describe when youth consumed five or more drinks of alcohol within a couple of hours.

- **Protective factors** are experiences or other aspects in a young person's life that can reduce the chances they will use alcohol at potentially harmful levels.

- **Risk factors** are experiences or other aspects in a young person's life that can increase the chances they will use alcohol at potentially harmful levels.

- **Risky or harmful drinking levels** are levels beyond those recommended in Canada's Low-Risk Alcohol Drinking Guidelines.

**CANADA’S LOW-RISK ALCOHOL DRINKING GUIDELINES**

The guidelines point out that alcohol can harm the way the brain develops and suggest that youth should wait until their late teens before drinking.

If youth under 19 do decide to drink they should:

- Speak to their parents or guardians about drinking;
- Never have more than one to two drinks per occasion; and
- Never drink more than one or two times per week.

For youth aged 19-24 years:

- Females should never have more than two drinks a day and never more than 10 drinks a week; and
- Males should never have more than three drinks a day and never more than 15 drinks a week.

The guidelines also note that if youth keep within the single-day and weekly limits for their gender, this does not mean there is no risk to drinking.

Source: Canadian Centre on Substance Abuse (www.ccsa.ca)
Between February and June 2013, students in Grades 7-12 completed the fifth BC Adolescent Health Survey (BC AHS) in schools across British Columbia (BC). These students answered 130 questions about their health and about the presence of risk and protective factors in their lives.

The results of the survey illustrated that BC youth came from increasingly diverse backgrounds. For example, between 2008 and 2013 the percentage of students speaking a language other than English at home increased, while the percentage of students who lived with their parents and those who identified as completely heterosexual decreased.

The results also showed that youth generally made healthier choices about risk behaviours than they had in previous years. For example, a lower percentage of students reported having tried tobacco, alcohol, marijuana, and many other substances than their peers five and 10 years ago.

They were also more likely to engage in injury prevention behaviours, such as always wearing a seat belt, not driving after drinking, and using contraception when they had sex. These choices may also be reflected in better health outcomes as students were also less likely to have had a serious injury, a sexually transmitted infection (STI), or been involved in a pregnancy than in previous years.

### FAMILY BACKGROUND

<table>
<thead>
<tr>
<th>Family Background</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>European</td>
<td>53%</td>
</tr>
<tr>
<td>East Asian</td>
<td>18%</td>
</tr>
<tr>
<td>Aboriginal</td>
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<tr>
<td>South Asian</td>
<td>10%</td>
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<tr>
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<tr>
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</tr>
<tr>
<td>West Asian</td>
<td>2%</td>
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<tr>
<td>Other</td>
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</tr>
<tr>
<td>Don’t know</td>
<td>8%</td>
</tr>
</tbody>
</table>

Note: Youth could choose more than one response.

### AGE OF STUDENTS WHO COMPLETED 2013 BC AHS

<table>
<thead>
<tr>
<th>Age Group</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>12 years old or younger</td>
<td>10%</td>
</tr>
<tr>
<td>13 years old</td>
<td>16%</td>
</tr>
<tr>
<td>14 years old</td>
<td>16%</td>
</tr>
<tr>
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<td>16 years old</td>
<td>18%</td>
</tr>
<tr>
<td>17 years old</td>
<td>18%</td>
</tr>
<tr>
<td>18 years or older</td>
<td>6%</td>
</tr>
</tbody>
</table>

Note: Percentages do not equal 100% due to rounding.
YOUTH WHO HAD TRIED ALCOHOL

Among 12- to 19-year-olds who completed the 2013 BC AHS, 45% of males and females had tried alcohol. This represented a decrease from 54% in 2008 and 58% in 2003.

As noted earlier, the legal drinking age in British Columbia is 19 years. However, most youth who had tried alcohol had done so earlier than this. In fact, 96% of those who had tried alcohol had their first drink before their 17th birthday.

Older youth were more likely to have tried alcohol than younger ones, which is consistent with what is seen for many experimentation and risk-taking behaviours. For example, 7% of all youth aged 12 or younger had tried alcohol, compared to 49% of 15-year-olds and 72% of 18-year-olds.

REGIONAL DIFFERENCES

Youth attending schools in urban areas of the province were less likely to have tried alcohol than those in rural ones (43% vs. 56%); and if they had tried alcohol, they were more likely to wait until they were at least 15 years old to do so (37% vs. 27% of rural youth).

Among the five Health Authority regions of the province, youth in the Fraser and Vancouver Coastal areas were less likely to have tried alcohol than their peers in the Interior, Northern, and Vancouver Island regions.

Note: The difference between 17 and 18 years old was not statistically significant.
When the data was broken down further into the 16 Health Service Delivery Areas (HSDAs), there were differences within each health authority. For example, within the Interior, youth in Kootenay Boundary and East Kootenay were more likely to have tried alcohol than those in the Okanagan. Within Vancouver Coastal, youth in the North Shore/Coast Garibaldi area were more likely to have tried alcohol than those in Richmond or Vancouver.

The Northeast, Kootenay Boundary, and East Kootenay were areas where a higher percentage of youth had tried alcohol. Vancouver, Richmond, and Fraser South were HSDAs where lower percentages of youth had used alcohol.

"If I drink I do so responsibly."
17-year-old female

Note: The difference between Vancouver Coastal and Fraser regions was not statistically significant. The difference between Northern and Interior regions was not statistically significant.
YOUTH WHO HAD EVER TRIED ALCOHOL

Over half of BC youth had never had an alcoholic drink, and this report shows that the health picture of these youth was generally more positive than for those who consumed alcohol.

However, McCreary has conducted many focus groups and workshops with youth aged 12-19 where participants have spoken of experiencing peer pressure to drink alcohol, and of feeling left out if they did not drink. The data appear to confirm this, as 16- to 18-year-old youth who had never tried alcohol were less likely than youth who drank at any age to have three or more friends (77% vs. 83%) and were less likely to feel like they were a part of the activities that they participated in.
Among youth who had tried alcohol, the most common age for first doing so was 14 years old (24%). Reflecting the pattern seen in 2003 and 2008, there were no gender differences in age of first use except among youth who first tried it at age 10 and younger, where males were more likely than females to have tried alcohol, and for those who tried it at 13 or 14 years old where females were more likely than males to have done so.

Among youth who had tried alcohol, 35% waited until they were at least 15 years old to do so. This was a higher percentage than in previous years (25% in 2008 and 20% in 2003). There was a corresponding decrease in the rate of youth who first drank at 12 years old or younger.

Among youth who had tried alcohol, youth in Kootenay Boundary and East Kootenay were generally less likely to wait until they were at least 15 years old to first drink alcohol, while Richmond and Vancouver youth were more likely to have waited until they were 15 years old to have their first drink.

“In my grade (9), many people are beginning to drink and get drunk. Almost 100% of the grade does. I do not want to and am not allowed... I may lose most of my friends because of this.

15-year-old female
To look at the harms associated with the age that youth first drank alcohol, we looked at youth aged 16 to 18, to consider the experiences of those in this age group who first started drinking at 12 or younger, at 13 or 14, and at 15 or older.

**Harms Associated With Early Use**

Youth aged 16 to 18 who had not tried alcohol reported the best overall health and mental health. For example, 83% of 16- to 18-year-olds who had never tried alcohol rated their mental health as good or excellent compared to 76% of students who had tried alcohol.

Among older youth who had tried alcohol, the younger they were when they first drank, the less likely they were to rate their overall and mental health as good or excellent.

One in five 16- to 18-year-olds who first drank at age 12 or younger felt extremely stressed in the past month, compared to 15% of those who started drinking at 13 or 14, 12% of those who waited until they were at least 15, and 8% of those who had never tried alcohol.

**Overall and Mental Health**

Youth aged 16 to 18 who had not tried alcohol reported the best overall health and mental health. For example, 83% of 16- to 18-year-olds who had never tried alcohol rated their mental health as good or excellent compared to 76% of students who had tried alcohol.

Among older youth who had tried alcohol, the younger they were when they first drank, the less likely they were to rate their overall and mental health as good or excellent.

One in five 16- to 18-year-olds who first drank at age 12 or younger felt extremely stressed in the past month, compared to 15% of those who started drinking at 13 or 14, 12% of those who waited until they were at least 15, and 8% of those who had never tried alcohol.
Older youth who first drank at 12 or younger were more likely to have considered suicide in the past year than those who had not drunk until they were at least 15 (23% vs. 13%) and more than twice as likely to have made a suicide attempt during that time (12% vs. 5%).

**SCHOOL AND COMMUNITY**

Early alcohol use appeared to be associated with challenges at school. Older youth who started using alcohol before their 15th birthday were less likely to feel connected to school or plan to enter post-secondary education than those who started later or did not drink.

Reduced levels of community engagement also appeared to be associated with early use.

For example, 16- to 18-year-old females who first drank at 12 or younger were less likely to currently feel connected to their community (26%) compared to those who first drank at 13 or 14 years old (33%) and those who waited until later (41%). A similar pattern was seen for males.

The older youth were when they first drank alcohol, the more likely they were to currently feel that the activities they took part in were meaningful to them. For example, 60% of 16-to 18-year-olds who drank at 12 or younger felt that their extracurricular activities were meaningful, compared to 69% of those who first drank at 13 or 14 and 72% who waited until they were at least 15 years old.
Previously it was noted that there was an association between having few friends and never having tried alcohol. A link was seen for drinking at an earlier age and having fewer friends. Youth aged 16-18 who drank before their 13th birthday were less likely to have three or more close friends in their community than those who waited longer to have their first drink.

**HEALTH RISK BEHAVIOURS**

The relation between early alcohol use and current harmful use is discussed in more detail later in this report. However, early use was also associated with other health risks. For example, the age that youth first tried alcohol was associated with the age that they first had sex and to sexual abuse.

Among 16- to 18-year-olds, 12% of youth who first drank at 12 or younger also had sex before turning 13 years old, compared to 2% who had not used alcohol until they were 13 or 14 and 1% who had waited until after turning 15 to first drink. It is likely that those who both used alcohol and had sex at the youngest ages were not having consensual sex. For example, among youth who first drank before turning 13 those who also first had sex by that age were more likely to report that they had ever been forced to have sex with an adult (27% vs. 4% of those who first had sex after turning 13 years old), and to report that their first sexual partner was over 20 years old (21% vs. 5%).

Similarly, 91% of those who did not drink until 15 or older also had not had sex until this age, which was above the 73% who first drank at 13 or 14 years old, and 57% who drank before their 13th birthday.
Older youth who had tried alcohol at 12 or younger were three times as likely as those who first drank at 15 or older to have been told by a doctor that they had an STI, and six times as likely to have been involved in a pregnancy. For males, drinking at an earlier age was also associated with making no attempt to prevent pregnancy the last time they had sex.

The earlier youth started drinking alcohol, the more likely they were to have tried substances other than alcohol. For example, 25% of those who first drank at 12 or younger had tried ecstasy, compared to 15% of those who first drank at 13 or 14, and 4% who were 15 or older.

Older youth who were early alcohol users were more likely to engage in behaviours which could lead to serious injuries, such as driving under the influence or not wearing a seat belt (64% of 16- to 18-year-olds who started drinking at 12 or younger always wore a seat belt vs. 71% of those who first drank at 13 or 14 and 79% of those who first drank after turning 15).
ALCOHOL USE IN THE PAST MONTH

Among youth who had tried alcohol, most had drunk at least once in the past year (92% of males vs. 94% of females). Older students were more likely than younger ones to have done so. For example, 95% of 17-year-olds who had tried alcohol had drunk in the past year, compared to 93% of 15-year-olds and 81% of 13-year-olds.

Also, more than 6 out of 10 of those who had tried alcohol had consumed it in the past month (61% of males vs. 63% of females), and 5% of males and 4% of females had drunk on at least 10 days that month. However, youth in 2013 who had tried alcohol were less likely than their peers in previous years to have drunk in the past month (e.g., 62% in 2013 vs. 67% in 2008).

Youth attending schools in rural areas were more likely to have drunk in the past month than those in urban areas (66% vs. 62%).

Among youth who had tried alcohol, females aged 14 and younger were more likely than males in this age group to have been drinking on three or more days in the past month (18% vs. 14%). There was no gender difference among older youth.

“Dad would make us drink half a beer or a cup of wine.”
14-year-old male
HOW MANY IS TOO MANY FOR BC YOUTH?

Harms Associated with Alcohol Use in the Past Month

It is recommended that any young person who decides to drink alcohol before their 19th birthday should not drink on more than one or two days a week.

The BC AHS asked youth about their consumption of alcohol in the past month rather than about their weekly consumption. Youth who indicated drinking on 10 or more days in the month before taking the survey were assumed to be drinking at a rate higher than once or twice a week, while those who drank on two or fewer days in the past month were drinking less than once or twice a week.

For some outcomes, drinking alcohol on 10 or more occasions in the past month appeared to have more negative associations than drinking on three to nine occasions. However, for other outcomes there was a more nuanced picture where drinking on between six and nine occasions was associated with a poorer health picture than drinking on between three and five days in the past month.

Overall and Mental Health

Even drinking at a rate that might be considered to be roughly once or twice a week (i.e., drinking on three to five days in the past month) was associated with less positive ratings of overall and mental health than was seen among youth who drank on fewer occasions.

<table>
<thead>
<tr>
<th>Good/Excellent Overall Health by Number of Days Youth Drank in Past Month (Among Youth Who Had Tried Alcohol)</th>
</tr>
</thead>
<tbody>
<tr>
<td>0 to 2 days</td>
</tr>
<tr>
<td>85%</td>
</tr>
</tbody>
</table>

In this section, the health picture among youth who did not drink in the past month and those who drank on one or two occasions that month was similar, unless otherwise noted.
Youth who drank on three or more occasions in the past month reported poorer mental health than those who did not drink or drank less often. For example, 85% of youth who had tried alcohol who drank on two or fewer days in the past month felt they were able to do things as well as most other people, compared to 82% of those who drank on three to nine days, and 74% of those who drank on 10 or more days.

Frequent alcohol use appeared to be associated with poorer sleep for males. For example, 49% of males who drank alcohol on two or fewer days in the past month slept for at least eight hours the night before taking the survey, compared to 38% of those who drank on 10 or more days.

Nine percent of those who drank on less than three days in the past month attempted suicide in the past year, compared to 12% who drank on three to nine days and 16% who drank on 10 or more days. There was a similar pattern for suicidal ideation.

The patterns of harms associated with alcohol use were generally similar among older and younger youth. One exception was that younger youth who drank on one or two days were more likely to have poorer mental health than their same-age peers who had not been drinking at all in the past month. For example, among youth aged 13 and younger who had tried alcohol, those who drank on one or two days in the past month were more likely than those who had not been drinking to report extreme stress (18% vs. 10%) and suicidal ideation (32% vs. 22%). This difference was not seen among older youth.

![Mental Health in Past Month by Number of Days Youth Drank During That Time (Among Youth Who Had Tried Alcohol)](chart.png)
SCHOOL AND COMMUNITY

Among youth who used alcohol in the past month, those who drank on 10 or more days were less likely to feel connected to their community, to feel the activities they engaged in were meaningful, to feel listened to and valued in their activities, and to have three or more close friends. For example, 29% of youth who drank on 10 or more days felt connected to their community, compared to 35% who drank on two or fewer days in the past month.

Drinking on 10 or more days as opposed to fewer days in the past month appeared to be associated with reduced connections to school and post-secondary plans. However, even drinking on one or two days increased the likelihood that youth would skip school and skip school regularly.

HEALTH RISK BEHAVIOURS

There was a link between drinking on more than two days in the past month and injuries and injury prevention behaviours. For example, 20% of youth who did not drink and 22% who drank on one or two days in the past month had experienced a concussion in the past year, compared to 26% who drank on three to nine days, and 38% who drank more often.
In regard to vehicle safety, 74% of youth who did not drink in the past month and 69% who drank on one or two days always wore a seat belt, compared to 64% who drank on three to nine occasions and 51% who drank more often. In addition, 3% of youth who did not drink in the past month and 9% of those who drank on one or two days had ever driven after using alcohol or marijuana, compared to 18% who drank on three to five days, 30% who drank on six to nine days, and 39% who drank more often. This pattern was also seen for being a passenger in a vehicle with someone who had been drinking.

One in five youth who had drunk alcohol on at least 10 days in the past month had not made any effort to prevent pregnancy the last time they had sex, which was more than double the rate of those who had used alcohol less often (among those who had ever had sex). Similarly, those who were drinking on 10 or more days in the past month were less likely to have used a condom or other barrier/protection the last time they had sex (52% vs. 70% who drank less often among those who had ever had sex).
Rates of pregnancy involvement and sexually transmitted infections (STIs) were also higher among youth who drank on a greater number of days in the past month. Youth who drank on one or two days in the past month were more likely to have tried substances other than alcohol and to have experienced negative consequences of their substance use than those who did not drink at all in the past month. For example, 34% of youth who had tried alcohol but did not drink in the past month had used marijuana, compared to 55% who drank on one or two days, 76% who drank on three to five days, and 84% who drank alcohol on six or more days.

**SEXUAL HEALTH EXPERIENCES BY NUMBER OF DAYS YOUTH DRANK IN PAST MONTH (AMONG YOUTH WHO HAD TRIED ALCOHOL)**

- **Pregnancy involvement**
  - 0 to 2 days: 1%
  - 3 to 9 days: 3%
  - 10 or more days: 12%

- **Diagnosed with an STI**
  - 0 to 2 days: 1%
  - 3 to 9 days: 2%
  - 10 or more days: 7%

**SUBSTANCE USE OUTCOMES IN THE PAST YEAR BY NUMBER OF DAYS YOUTH DRANK IN PAST MONTH (AMONG YOUTH WHO HAD TRIED ALCOHOL)**

- **Experienced consequence of substance use**
  - 0 days: 23%
  - 1 or 2 days: 46%
  - 3 to 5 days: 79%
  - 6 to 9 days: 83%
  - 10 or more days: 46%

- **Needed help for substance use**
  - 0 days: 4%
  - 1 or 2 days: 7%
  - 3 to 5 days: 13%
  - 6 to 9 days: 22%
  - 10 or more days: 36%

Note: The difference in youth experiencing consequences of their substance use between those who drank alcohol on 6 to 9 days and those who drank on 10 or more days was not statistically significant.
HEAVY SESSIONAL DRINKING

The term “heavy sessional drinking” is used to describe when youth consumed five or more drinks within a couple of hours.

Canada’s Low-Risk Alcohol Drinking Guidelines recommend that if youth under age 19 are going to drink, they should not have more than one or two drinks on any one occasion. In this section, we consider youth who have drunk well above this level.

The BC AHS asked youth on how many days in the past month they had consumed five or more drinks in a row within a couple of hours (which is considered “heavy sessional drinking”) and can be particularly harmful to females whose recommended drinking levels are lower than males.

Thirty-nine percent of youth who had tried alcohol had engaged in heavy sessional drinking at least once in the past month, and 6% had done so on at least six occasions in the past month.

Among youth who had tried alcohol, younger females were more likely than younger males to have engaged in heavy sessional drinking. A quarter of females (25%) aged 14 or younger had engaged in heavy sessional drinking in the past month, compared to 17% of males. This gender difference was not seen among older youth.

Note: Heavy sessional drinking refers to youth who had five or more drinks of alcohol within a couple of hours.

### Number of Days Youth Engaged in Heavy Sessional Drinking in Past Month (Among Youth Who Had Tried Alcohol)

<table>
<thead>
<tr>
<th>Days</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>0 days</td>
<td>61%</td>
</tr>
<tr>
<td>1 or 2 days</td>
<td>24%</td>
</tr>
<tr>
<td>3 to 5 days</td>
<td>9%</td>
</tr>
<tr>
<td>6 to 9 days</td>
<td>4%</td>
</tr>
<tr>
<td>10 or more days</td>
<td>2%</td>
</tr>
</tbody>
</table>

A quarter of females (25%) aged 14 or younger had engaged in heavy sessional drinking in the past month, compared to 17% of males. This gender difference was not seen among older youth.

Note: Heavy sessional drinking refers to youth who had five or more drinks of alcohol within a couple of hours.
Overall, males were more likely to have engaged in heavy sessional drinking on all 30 days in the past month (1% vs. virtually no females).

In comparison to previous years, youth who had tried alcohol were less likely to have engaged in heavy sessional drinking.

Harms Associated with Heavy Sessional Drinking

Overall and Mental Health
Youth who engaged in heavy sessional drinking were less likely to report good or excellent overall health (81% vs. 85% who had tried alcohol but did not engage in heavy sessional drinking), and were more likely to report being seriously injured or experiencing a concussion in the past year.

Among youth who had been injured, females who had engaged in heavy sessional drinking were more likely to have had their most recent serious injury while in a motor vehicle (7% vs. 3% of those who had not been drinking to that level), and males were more likely to have been injured in a fight (5% vs. 3% who had not drunk at that level) or while distracted by their cellphone (8% vs. 4%).

Youth who engaged in heavy sessional drinking were less likely to rate their mental health as good or excellent (70% vs. 76% who did not drink at this level), and were more likely to report extreme levels of stress (17% vs. 13%) and despair (12% vs. 10%) in the past month and to have considered suicide in the past year (20% vs. 17%).

Note: The differences between 2003 and 2008 were not statistically significant.

Note: Heavy sessional drinking refers to youth who had five or more drinks of alcohol within a couple of hours.
For females, heavy sessional drinking was also associated with an increased risk of self-harm (35% vs. 30% of females who did not drink at this level) attempting suicide (16% vs. 12%), and with lower ratings of self-confidence. Females who engaged in heavy sessional drinking were also less likely to have slept for at least eight hours the previous night (45% vs. 50%). This was not the case for males.

**SCHOOL AND COMMUNITY**

Heavy sessional drinking was associated with low school connectedness and skipping school. For females it was also associated with a lower rate of planning to continue their education beyond high school (86% vs. 89% of those who had not engaged in heavy sessional drinking) and of feeling that the activities they were involved in were meaningful to them (64% vs. 69%)

**HEALTH RISK BEHAVIOURS**

Youth who had engaged in heavy sessional drinking in the past month were more likely to have used alcohol or other substances before they had sex the last time, to have been involved in a pregnancy, and to have been diagnosed with an STI. Females were also less likely to report that they or their partner had used a condom or other barrier the last time they had sex (63% vs. 68% who had not engaged in heavy sessional drinking in the past month; among those who ever had sex).

**SKIPPED SCHOOL ON THREE OR MORE DAYS IN THE PAST MONTH (AMONG YOUTH WHO HAD TRIED ALCOHOL)**

<table>
<thead>
<tr>
<th>Did not engage in heavy sessional drinking</th>
<th>Engaged in heavy sessional drinking</th>
</tr>
</thead>
<tbody>
<tr>
<td>Did not engage in heavy sessional drinking</td>
<td>8%</td>
</tr>
<tr>
<td>Engaged in heavy sessional drinking</td>
<td>21%</td>
</tr>
</tbody>
</table>

Note: Heavy sessional drinking refers to youth who had five or more drinks of alcohol within a couple of hours.
Heavy sessional drinking was associated with the use of other substances. For example, youth who had consumed five or more drinks within a couple of hours at least once in the past month were more likely than their peers who had not drunk at this level to have tried marijuana (77% vs. 39%; among those who had tried alcohol), tobacco (65% vs. 30%), mushrooms (21% vs. 5%), ecstasy (19% vs. 3%), and cocaine (11% vs. 2%).

These youth were also more likely to have needed help for their substance use in the past year (16% vs. 5%), and to have driven under the influence or to have been a passenger in a vehicle with an impaired driver.

**SEXUAL HEALTH BY WHETHER YOUTH ENGAGED IN HEAVY SESSIONAL DRINKING IN PAST MONTH (AMONG YOUTH WHO HAD TRIED ALCOHOL)**

<table>
<thead>
<tr>
<th></th>
<th>Did not engage in heavy sessional drinking</th>
<th>Engaged in heavy sessional drinking</th>
</tr>
</thead>
<tbody>
<tr>
<td>Involved in pregnancy</td>
<td>1%</td>
<td>4%</td>
</tr>
<tr>
<td>Diagnosed with STI</td>
<td>1%</td>
<td>2%</td>
</tr>
</tbody>
</table>

Note: Heavy sessional drinking refers to youth who had five or more drinks of alcohol within a couple of hours.

**HISTORY OF IMPAIRED DRIVING BY WHETHER YOUTH ENGAGED IN HEAVY SESSIONAL DRINKING IN PAST MONTH (AMONG YOUTH WHO HAD TRIED ALCOHOL)**

<table>
<thead>
<tr>
<th></th>
<th>Did not engage in heavy sessional drinking</th>
<th>Engaged in heavy sessional drinking</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ever driven after drinking or using marijuana</td>
<td>4%</td>
<td>21%</td>
</tr>
<tr>
<td>Ever been a passenger with a driver who had been drinking or using marijuana</td>
<td>33%</td>
<td>59%</td>
</tr>
</tbody>
</table>

Note: Heavy sessional drinking refers to youth who had five or more drinks of alcohol within a couple of hours.
The BC Adolescent Health Survey included questions about how many standard size drinks of beer, wine, liquor, or cooler youth had on the Saturday before taking the survey.

Forty-two percent of students who had tried alcohol drank on the Saturday before completing the survey. There was no gender difference in consuming alcohol last Saturday among older youth, but younger females were more likely than younger males to have done so. For example, 30% of males who were 14 or younger who had tried alcohol drank last Saturday, compared to 39% of females that age.

The use of liquor and beer was more common among older youth, whereas wine and coolers were equally popular among younger and older youth.

Among youth who drank last Saturday, almost two-thirds (64%) had mixed different types of alcohol, and 21% of males and 27% of females mixed three or four types. Youth in the Northern region of the province were more likely than youth in any other area to have mixed three or four different types of alcohol (33%).

Among youth who mixed types of alcohol last Saturday, the most common combination was beer and liquor (30%). Other common combinations were mixing liquor and coolers (22%), or beer, liquor, and coolers (24%). Males were more likely than females to mix beer and liquor (47% vs. 16%), while females more frequently mixed liquor and coolers (33% vs. 9% of males).
Canada’s Low-Risk Alcohol Drinking Guidelines state that for older youth and young adults, males should not have more than three drinks a day, females should not have more than two drinks a day, and youth should not have more than two drinks at a time. In this report, exceeding these levels on the Saturday before taking the survey is referred to as binge drinking.

HARMS ASSOCIATED WITH BINGE DRINKING LAST SATURDAY

Among youth aged 12-19 who had tried alcohol, 30% of males and 33% of females binge drank on the Saturday before completing the survey. There were few differences between youth who drank last Saturday within the guidelines for older youth and young adults and those who did not drink that day. The exception was that males who drank up to three drinks were more likely than males who did not drink last Saturday to report trying substances other than alcohol, using alcohol or other substances before having sex, and experiencing negative consequences of their substance use.

However, there were a number of differences between youth who drank above the recommended levels for older youth and those who did not exceed these guidelines.

Most teenagers party. At least 80% or more in my school including me. There is usually drinking at parties.

16-year-old female

“Normally when I drink I take about 7 shots and no beers.

17-year-old female

Harms Associated with Binge Drinking Last Saturday

<table>
<thead>
<tr>
<th>Other Substance Use</th>
<th>Did not drink last Saturday</th>
<th>Had 1 or 2 drinks</th>
<th>Had 3 or more drinks</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ever tried marijuana</td>
<td>41%</td>
<td>41%</td>
<td>76%</td>
</tr>
<tr>
<td>Ever driven after drinking or using marijuana</td>
<td>5%</td>
<td>5%</td>
<td>15%</td>
</tr>
</tbody>
</table>
Among youth who had tried alcohol, engaging in binge drinking the previous Saturday (compared to not drinking at all that day) was associated with the following:

› A lower likelihood of good or excellent overall health ratings (males: 84% vs. 88% of those who did not drink last Saturday; females: 77% vs. 81%)
› A lower likelihood of good or excellent mental health ratings (males: 78% vs. 85%; females: 60% vs. 69%)
› A greater risk of having a serious injury (males: 46% vs. 34%; females: 34% vs. 26%)
› A greater likelihood of feeling extreme stress or despair in the past month, and of suicidal thoughts and attempts in the past year
› An increased risk of skipping school in the past month
› Lower school connectedness
› An increased likelihood of having tried marijuana, tobacco, or other substances
› A greater risk of experiencing negative consequences as a result of substance use
› An increased likelihood of needing help for substance use
› A greater likelihood of using alcohol and other substances before sexual activity
› An increased risk of pregnancy involvement and STIs

In addition, for females binge drinking was associated with:

› A greater likelihood of feeling that the activities they were involved in were meaningful (64% vs. 70% of those who did not drink last Saturday)
› A decreased likelihood of using a condom or other barrier the last time they had sex

**ENERGY DRINKS**

Combining alcohol with energy drinks can mask the signs of intoxication and has been linked to increased alcohol use and risk behaviours such as driving while drunk. Sixteen percent of males and 13% of females who drank last Saturday mixed alcohol with energy drinks.

Among youth who drank the previous Saturday, those who also consumed energy drinks were more likely than those who drank but did not mix alcohol with energy drinks to report driving under the influence (31% vs. 15%), and they were less likely to have slept for eight or more hours the previous night (33% vs. 43%), and to report good or excellent overall health (74% vs. 83%), or mental health (62% vs. 71%). They were also more likely to binge drink than those who had not mixed energy drinks with the alcohol they consumed (92% vs. 73%).
ALCOHOL AND OTHER SUBSTANCES

Among the 45% of BC youth who had drunk alcohol, less than half (42%) reported that alcohol was the only substance they had used. The most common other substance youth had tried was marijuana (55% of males vs. 52% of females).

Females in rural areas who had tried alcohol were more likely to have also tried marijuana than those in urban areas, but there was no geographical difference for males.

Among youth who had used both alcohol and marijuana, 47% had used alcohol first, 17% had used marijuana first, and 36% had tried them both at the same age. Males were more likely to have used marijuana before alcohol (21% vs. 14% of females), while females were more likely than males to have tried them both at the same age. For females who had tried both alcohol and marijuana, those in rural areas were more likely to have used marijuana before alcohol than those in urban regions (19% of rural females vs. 13% of urban females).

Among youth who had tried alcohol, older students were more likely than younger ones to have also tried marijuana. For example, 59% of 17-year-old students who had tried alcohol had also tried marijuana, compared to 33% of 13-year-olds. Older males were generally more likely than younger ones to have tried substances other than marijuana (such as cocaine and ecstasy), although there was no such age difference for females.

I can’t drink alcohol because of the pills I take.
17-year-old female
Although not all youth who drank alcohol tried other substances, the majority of those who used other substances had also used alcohol. For example, 93% of those who had tried marijuana had used alcohol; 63% of those who had used prescription pills without a doctor’s consent had tried alcohol; and 89% of those who had used other substances (such as ecstasy, crystal meth, or cocaine) had also used alcohol.

LAST SATURDAY USE
In total, 7% of males and 5% of females had used both alcohol and marijuana on the Saturday before taking the survey. Youth who lived in the North, Interior, or on Vancouver Island were more likely to have used both substances last Saturday than those in Fraser and Vancouver Coastal (6%-8% vs. 4%-5%).

### ALCOHOL AND MARIJUANA USE LAST SATURDAY (AMONG YOUTH WHO HAD USED BOTH ALCOHOL AND MARIJUANA)

<table>
<thead>
<tr>
<th></th>
<th>Males</th>
<th>Females</th>
</tr>
</thead>
<tbody>
<tr>
<td>Used both alcohol and marijuana</td>
<td>27%</td>
<td>20%</td>
</tr>
<tr>
<td>Exclusively used alcohol</td>
<td>26%</td>
<td>36%</td>
</tr>
<tr>
<td>Exclusively used marijuana</td>
<td>12%</td>
<td>8%</td>
</tr>
<tr>
<td>Used neither</td>
<td>35%</td>
<td>37%</td>
</tr>
</tbody>
</table>

Note: The difference between males and females in using neither substance was not statistically significant.
The BC AHS asked youth about specific consequences they might have experienced as a result of their substance use in the past year. Youth who had used both alcohol and other substances were excluded from the next analyses as it could not be determined if the consequences they experienced were a result of alcohol use or the use of another substance.

Among youth who had used alcohol exclusively (i.e., had not used any substances other than alcohol), 30% reported that their use had resulted in at least one negative consequence, including 4% who had experienced three or more. The most common consequence was being told that they had done something they could not remember.

Males were more likely than females to report damaging property (3% vs. 1%), getting in a physical fight (2% vs. 1%), or getting in trouble with the police (2% vs. 1%); while females were more likely to report doing something they could not remember (24% vs. 18% of males), arguing with family members (5% vs. 3%), or losing friends or a romantic partner (3% vs. 2%).

“[A consequence of my alcohol use is] that I don’t drink anymore.”
14-year-old male
Youth who had driven after drinking were more likely than those who had not done so to have been injured as a result of their alcohol use (13% vs. 4%) and to have damaged property.

Youth who had engaged in heavy sessional drinking in the past month or binge drank were more likely to experience multiple negative consequences than those who drank less. For example, among youth who had used alcohol exclusively, males who binge drank last Saturday were more likely to have experienced two or more consequences as a result of their substance use in the past year (24% vs. 10% of those who had one to three drinks last Saturday). Similarly, females who binge drank that day were more likely to report multiple consequences of their alcohol use compared to those who had one or two drinks (26% vs. 10%).

The more days on which youth drank alcohol in the past month, the more likely they were to experience multiple negative consequences. For example, 28% of those who drank on three or more days reported multiple negative consequences of their use, compared to 13% who drank on one or two days.

Youth who experienced any negative consequence of their alcohol use in the past year were more likely to think they needed help for their use (6% vs. 1% of those who had not had any consequences). For example, 20% of those whose school grades changed as a result of their drinking had needed help (compared to 2% of those whose grades had not changed).

![YOUTH WHO EXPERIENCED THREE OR MORE CONSEQUENCES OF ALCOHOL USE IN PAST YEAR (AMONG YOUTH WHO HAD USED ALCOHOL EXCLUSIVELY)](image)

Note: Heavy sessional drinking refers to youth who had five or more drinks of alcohol within a couple of hours.
Among youth who had tried alcohol, 4% of males and 5% of females reported that they had either felt or been told that they needed help for their alcohol use in the past year. This included 2% of youth who had used alcohol and had not used any other substance.

Youth who started drinking at younger ages were more likely to have needed help for their substance use in the past year. For example, 12% of youth aged 16 to 18 who had first tried alcohol when they were 12 or younger needed treatment for their alcohol use, compared to 5% of those who first drank at 13 or 14 and 2% who waited until after turning 15 years old to try alcohol.

"I can’t tell if I am addicted to alcohol or not. I want a counsellor but my parents think it’s a joke.

15-year-old male"
Among youth who used alcohol exclusively (i.e., had not used any other substance), the most common reasons youth last drank were because they wanted to have fun, to experiment, and because their friends were doing it.

Females were more likely than males to report using alcohol because they wanted to have fun (62% vs. 50%), their friends were doing it (31% vs. 23%), because of stress (11% vs. 6%), or because they felt down or sad (10% vs. 5%).

There was no difference by age in youth drinking alcohol because they felt down or sad, or because of stress. However, older youth more frequently reported drinking alcohol to have fun, while younger students more commonly wanted to experiment.

Youth who were experiencing challenges in their lives were more likely to report particular reasons for their alcohol use. For example, youth with a mental or emotional health condition more frequently used alcohol because of stress (24% vs. 7% without a mental or emotional health condition) or because they felt down or sad (26% vs. 5%). Youth who had been physically or sexually abused were also more likely to have been drinking because of stress (18% vs. 7%) or feeling sad (17% vs. 5%). In addition, youth who had been bullied

In order to identify the reasons youth use alcohol, all analyses in this section are among youth who used alcohol exclusively (i.e., had not used any other substance).

**Most Common Reasons Youth Used Alcohol the Last Time They Drank (Among Youth Who Had Used Alcohol Exclusively)**

<table>
<thead>
<tr>
<th>Reason</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Wanted to have fun</td>
<td>56%</td>
</tr>
<tr>
<td>Wanted to experiment</td>
<td>30%</td>
</tr>
<tr>
<td>Friends were doing it</td>
<td>27%</td>
</tr>
<tr>
<td>Because of stress</td>
<td>9%</td>
</tr>
<tr>
<td>Felt down or sad</td>
<td>7%</td>
</tr>
<tr>
<td>Nothing else to do</td>
<td>4%</td>
</tr>
<tr>
<td>Pressured into it</td>
<td>3%</td>
</tr>
<tr>
<td>Didn’t mean to do it (e.g., someone spiked my drink)</td>
<td>1%</td>
</tr>
<tr>
<td>To manage physical pain</td>
<td>1%</td>
</tr>
<tr>
<td>To help focus</td>
<td>&lt;1%</td>
</tr>
</tbody>
</table>

Note: Youth could choose more than one response.

“[I drink] because I am Canadian!”

16-year-old female
in the past year were more likely to have been drinking because their friends were doing it (31% vs. 20%) or because they felt pressured into using alcohol (3% vs. 1%).

Youth who drank for certain reasons were more likely to have been binge drinking last Saturday. For example, males were more likely to have been binge drinking if they drank because they were stressed (74%* vs. 54% of those who did not drink due to stress) or because they wanted to have fun (66% vs. 40%). A similar pattern was seen among females. However, females were also more likely to have been binge drinking if they were drinking alcohol because their friends were doing it. Youth who were drinking to experiment were less likely to binge drink than those who drank for other reasons.

Note: Not all differences between data points were statistically significant.
It is important for youth who decide to drink alcohol to learn their limits, not feel pressured to drink outside these limits, to recognize if they have had too much, and to understand that it is possible to lower risk by drinking in moderation. In this analysis, we consider youth who had begun drinking more recently with those who had been drinking for longer in order to understand more about youth during the time they are starting to use alcohol. For example, youth who were 18 years old when they completed the survey and first drank alcohol at 17 or 18 years old would be considered to have started recently. Eighteen-year-olds who started drinking at 16 or younger would be considered to have started more than a year ago.

Among youth who had tried alcohol, 42% of males and 45% of females started using alcohol recently. These youth were less likely than their peers who had been drinking longer to have consumed alcohol in the past month or on the previous Saturday.

Also, 37% of youth who had their first drink more than a year ago drank alcohol on three or more days in the past month, compared to 13% who had started drinking recently; and 6% who drank on 10 or more days in the past month (vs. 1% who first drank recently).

<table>
<thead>
<tr>
<th>Alcohol Type</th>
<th>Recently Drank</th>
<th>More than a Year Ago</th>
</tr>
</thead>
<tbody>
<tr>
<td>Beer</td>
<td>14%</td>
<td>30%</td>
</tr>
<tr>
<td>Wine</td>
<td>4%</td>
<td>8%</td>
</tr>
<tr>
<td>Liquor</td>
<td>22%</td>
<td>38%</td>
</tr>
<tr>
<td>Coolers</td>
<td>16%</td>
<td>23%</td>
</tr>
</tbody>
</table>
Youth who had been drinking alcohol for longer were more likely to drink heavily. Half of youth who had been drinking for more than a year engaged in heavy sessional drinking in the past month, compared to around a quarter (24%) who had their first drink recently.

Youth who had been drinking for more than a year were also more likely to have engaged in binge drinking on the Saturday before taking the survey. Eighteen percent of males who had their first drink recently consumed four or more drinks last Saturday, compared to 39% who had been drinking longer. Similarly, 23% of females who were newer to alcohol had three or more drinks last Saturday, compared to 41% who had been drinking for over a year.

The reasons youth gave for drinking alcohol the last time they drank were different between those who first drank recently and those who had been drinking for more than a year. For example, among those who had used alcohol exclusively, youth who had their first drink recently were more likely to report that they were experimenting (37% vs. 20% who had been drinking alcohol longer), and were less likely to use alcohol because they wanted to have fun (55% vs. 59%), or because they were sad (6% vs. 9%) or stressed (7% vs. 10%).

As youth who had been drinking for more than a year were more likely to drink at harmful levels, it was not surprising that they were also more likely to experience negative consequences of their alcohol use and to experience multiple consequences. For example, 16% of youth who used alcohol exclusively and had been drinking for longer had passed out in the past year, compared to 9% of those who first drank recently; and 7% experienced three or more negative consequences, compared to 3% who had first tried alcohol within the past year.

Finally, youth who had first used alcohol more recently were less likely to feel that they needed help for their alcohol use (1% vs. 3% of those who first drank more than a year ago).

"Alcohol sucks and it’s bad for you. The only reason kids do it is because they already have some in the house."
15-year-old male
YOUTH AT RISK FOR HARMFUL ALCOHOL USE

In this section, we consider some experiences and challenges which might make youth more vulnerable to drinking alcohol at a rate which can cause harms.

GEOGRAPHICAL RISK
Youth in rural areas of the province were more likely to have tried alcohol at an early age. For example, 17% of 16- to 18-year-old youth in rural areas first drank at age 12 or younger compared to 13% of urban youth (among youth who had tried alcohol). They were also more likely to have drunk on three or more days in the past month (30% vs. 26% of urban youth).

Further regional differences can be found in the Appendix.

LENGTH OF TIME IN CANADA
Youth who were born in Canada were more likely than those born abroad to have tried alcohol (47% vs. 35%) and to have engaged in heavy sessional drinking (40% vs. 30%; among those who had tried alcohol). However, among older youth who had tried alcohol, those born outside Canada were more likely to have had their first drink before turning 12 years old (18% vs. 13% of 16- to 18-year-olds who were born in Canada).

The longer females had lived here the more likely they were to drink alcohol. For example, females who had lived in Canada for less than two years were less likely to have tried alcohol than those who had lived in Canada longer (38% vs. 46%), and were less likely to have engaged in heavy sessional drinking in the past month (24% vs. 39%; among those who had tried alcohol).

Among those who had tried alcohol, females born in Canada were more likely to have been drinking on three or more days in the past month and to have engaged in binge drinking on the Saturday before taking the survey. These differences were not seen for males.

43% of females in rural areas engaged in heavy sessional drinking in the past month (vs. 38% in urban areas).
SEXUAL MINORITY YOUTH
Lesbian, gay, and bisexual youth were more likely to have tried alcohol than their straight peers. Among 16- to 18-year-old females who had tried alcohol, lesbian and bisexual females were more likely than straight females to have first tried drinking at age 12 or younger (19% vs. 10%).

Lesbian and bisexual females were no more likely than their peers to have been drinking at risky levels. However, among males who had tried alcohol, gay and bisexual males were more likely than straight males to have drunk on at least three days in the past month.

YOUTH WHO HAD EXPERIENCED ABUSE OR VIOLENCE
One in 10 males and 15% of females had been physically abused, and 4% of males and 13% of females had been sexually abused. These youth were more likely than their peers to have used alcohol, and among 16- to 18-year-olds, to have had their first drink at age 12 or younger. For example, 77% of youth who had experienced sexual abuse had tried alcohol, compared to 41% of those who had no history of sexual abuse.

Among those who had tried alcohol, youth who had been sexually abused were more likely to have been drinking on three or more days in the past month (40% vs. 24% who had not been sexually abused) and to have engaged in heavy sessional drinking (52% vs. 36%) during the same time period. A similar pattern was seen among females, but not males, who had been physically abused.

There was also a link between abuse and binge drinking the previous Saturday. Females were more likely to binge drink if they had been sexually abused (45% binge drank vs. 29% who had not been sexually abused), or physically abused (38% vs. 31% who had not been physically abused). For males, sexual abuse was associated with binge drinking the previous Saturday (52% vs. 29% who had not been sexually abused) but physical abuse was not.

FIRST DRANK AT 12 OR YOUNGER BY WHETHER YOUTH HAD BEEN ABUSED (AMONG YOUTH AGED 16-18 WHO HAD TRIED ALCOHOL)

- Physical abuse:
  - Abused: 22%
  - Not abused: 21%

- Sexual abuse:
  - Abused: 11%
  - Not abused: 12%
Youth who had been discriminated against in the past year were more likely to have tried alcohol and, among those aged 16 to 18, to have started drinking at 12 years old or younger.

Males who had been discriminated against in the past year were more likely to have drunk alcohol on three or more days (29% vs. 24% who had not been discriminated against) and to have engaged in binge drinking last Saturday (33% vs. 29%).

**ENGAGEMENT IN CERTAIN EXTRA-CURRICULAR ACTIVITIES**

Weekly participation in informal sports (such as skateboarding, hiking, biking, or road hockey) or in dance or exercise classes was associated with having tried alcohol.

Youth who participated in informal sports on a weekly basis were more likely than those who did not participate to consume alcohol on three or more days in the past month, engage in heavy sessional drinking during that time, and, for females, engage in binge drinking last Saturday. This pattern was not seen for youth in organized sports, although the more frequently youth played organized sports the more likely they were to have tried alcohol.

**PEER RELATIONSHIPS**

The role of friends as a protective factor is discussed on p 48 and 49. However, there were also some risks associated with peer relationships which show the complexity of these relationships. For example, youth who had at least one close friend were more likely to have tried alcohol than those who had no close friends (45% vs. 39%). Yet, among 16- to 18-year-olds who had tried alcohol, those with three or more friends were less likely to have started drinking earlier.

Although McCreary research has consistently shown positive associations for having three or more friends, having a larger group of friends increased the likelihood that youth who had tried alcohol would engage in heavy sessional drinking. Males who had 10 or more risky alcohol use in past month by whether youth had been physically abused (among females who had tried alcohol)

<table>
<thead>
<tr>
<th></th>
<th>Physically abused</th>
<th>Not physically abused</th>
</tr>
</thead>
<tbody>
<tr>
<td>Drank on three or more days</td>
<td>33%</td>
<td>26%</td>
</tr>
<tr>
<td>Engaged in heavy sessional drinking</td>
<td>43%</td>
<td>37%</td>
</tr>
</tbody>
</table>
close friends were more likely than those who had three to nine close friends to have engaged in heavy sessional drinking in the past month, while for females those with six or more friends were more likely than those with three to five friends to have drunk at this level.

Youth who had been in a romantic relationship in the past year were more likely to have been drinking on three or more days in the past month (31% vs. 21% who had tried alcohol and did not have a boyfriend or girlfriend in the past year) and to have engaged in heavy sessional drinking during that time (44% vs. 32%). If youth were in a relationship where they had been physically abused by their partner, they were even more at risk. Forty-seven percent of youth who had been in a violent relationship in the past year had been drinking on three or more days in the past month, and 62% had engaged in heavy sessional drinking during that time.

Among youth who had tried alcohol, 34% who had been physically assaulted in the past year at school or on the way to or from school drank alcohol on three or more days in the past month, compared to 26% of those who had not been assaulted. Being assaulted was also associated with a higher rate of youth engaging in heavy sessional drinking in the past month (44% vs. 38%) and with binge drinking last Saturday for males (40% vs. 29%) and females. In addition, females who had experienced teasing in the past year were more likely to binge drink last Saturday.

Youth who had been victimized through the Internet or other technology in the past year were more likely to have tried alcohol (60% vs. 42% of those who had not been cyberbullied). They were also more likely to drink on three or more days in the past month (33% vs. 25%) and to binge drink (among those who had tried alcohol). For example, 36% of males who had been cyberbullied binge drank last Saturday, compared to 29% who had not been cyberbullied. Both males and females who had met someone unsafe online were more likely to drink on three or more days in the past month (31% vs. 26%).

**Note:** Heavy sessional drinking refers to youth who had five or more drinks of alcohol within a couple of hours.
LIVING IN POVERTY

Youth living in extreme poverty, that is, those who went to bed hungry often or always because there was not enough money for food at home, were more likely to have tried alcohol than their peers who did not go to bed hungry that frequently (75% vs. 44%).

Among youth aged 16 to 18, those who experienced extreme poverty were more likely to have first tried alcohol at age 12 or younger (36% vs. 13% who did not experience this level of poverty), as were youth whose parents were not employed (24% vs. 13% with at least one parent who was working).

Among youth who had tried alcohol, those living in extreme poverty were more likely to report harmful alcohol use in the past month, including drinking on three or more days and heavy sessional drinking.

Youth who went to bed hungry often or always were more likely to binge drink last Saturday. For example, 57% of females who went to bed hungry this frequently binge drank last Saturday, compared to 32% of females who did not go to bed hungry that frequently (among those who tried alcohol).

GOVERNMENT CARE EXPERIENCE

Female youth who had ever lived in a foster home, group home, or on a Youth Agreement were more likely to have tried alcohol than those who had not been in government care (56% vs. 45%). This was not the case for males. However, among all 16- to 18-year-olds who had tried alcohol, youth who had been in care were more than twice as likely as those never in care to have first tried alcohol at 12 years old or younger (30% vs. 13%).

Among youth with care experience, 36% had drunk on three or more days in the past month (vs. 26% of those who had not been in care) and 46% engaged in heavy sessional drinking during that time (vs. 38% who had not been in care). Females with care experience were more likely than those who had never been in care to binge drink last Saturday (44% vs. 32%), and the same pattern was seen for males (41% vs. 30%).

<table>
<thead>
<tr>
<th>Went to bed</th>
<th>Drank on three or more days</th>
<th>Engaged in heavy sessional drinking</th>
</tr>
</thead>
<tbody>
<tr>
<td>hungry often or always</td>
<td>49%</td>
<td>26%</td>
</tr>
<tr>
<td>Went to bed hungry less frequently</td>
<td>58%</td>
<td>38%</td>
</tr>
</tbody>
</table>

Note: Heavy sessional drinking refers to youth who had five or more drinks of alcohol within a couple of hours.
YOUTH WITH A HEALTH CONDITION OR DISABILITY

Youth with any type of health condition or disability were more likely than their peers to have tried alcohol (55% vs. 41% without a health condition or disability). For example, among youth with a mental health condition, 69% had tried alcohol compared to 42% without a mental health condition.

Among 16- to 18-year-old youth who had tried alcohol, youth who had a mental health condition were more likely to have had their first drink at 12 or younger (20% vs. 12% without such a condition), as were youth with a learning disability (22% vs. 13%).

Youth who had a mental health condition, behavioural condition (e.g., problems with anger), or a learning disability, were more likely to have been drinking at risky levels. For example, youth with a mental health condition were more likely to have consumed alcohol on three or more days in the past month (35% vs. 25% without a mental health condition), to have engaged in heavy sessional drinking during that time (47% vs. 37%), and to have engaged in binge drinking last Saturday. A similar pattern was seen for males, but not females, with a physical disability.

PAID EMPLOYMENT

Youth who worked at a paid job in the past year were more likely to have tried alcohol (64% vs. 37% who did not work), and the more hours they worked, the more likely they were to have tried alcohol.

Employed youth were also less likely to have waited until they were at least 15 years old to first try alcohol. Forty-seven percent of those aged 16 to 18 with a job had waited to first try alcohol until after their 15th birthday, compared to 53% of those who were not employed.

Youth who had a job in the past year were also more likely to have recently been using alcohol at risky levels. For example, 33% of youth who had a job had been drinking on three or more days in the past month, compared to 22% of those without a job.

For youth with a job, the more hours they worked, the more likely they were to drink on three or more days and to engage in heavy sessional drinking in the past month. Thirty-four percent of youth who worked less than five hours a week had engaged in heavy sessional drinking in the past month, compared to 47% of those who worked five to 12 hours a week and 55% who worked 21 or more hours a week.

42% of females with a mental health condition binge drank last Saturday, compared to 30% without such a condition (among those who had tried alcohol).
PROTECTIVE FACTORS LINKED TO LESS HARMFUL ALCOHOL USE

All analyses in this section are among youth who had used alcohol.

Having established what levels of alcohol use are the most harmful for youth and who is at risk for drinking alcohol in ways that are particularly detrimental to their health and safety, it is important to consider the protective factors than can help reduce the risk of youth using alcohol at harmful levels.

YOUTH WITH FAMILY SUPPORT
FAMILY CONNECTEDNESS

Youth who felt connected to their family (i.e., they felt people in their family understood them, they had fun with their family, and their family paid attention to them) were more likely to have started drinking at a later age. For example, 59% of youth aged 16 to 18 who felt most connected to their family had first started drinking after turning 15 years old, compared to 41% of those who felt least connected.

Among all youth who had tried alcohol, feeling connected to their family was associated with a lower likelihood of engaging in heavy sessional drinking in the past month. Similarly, males who had tried alcohol were less likely to binge drink last Saturday if they felt highly connected to their family (30% vs. 38% of those who were least connected), as were females (30% vs. 40%). Males were also less likely to drink on three or more days in the past month.

“...

When I drink, my parents are aware of it, and the alcohol percentage is usually quite low. It is not a regular thing.

17-year-old female
**SUPPORTIVE ADULT IN FAMILY**

For both males and females, having a supportive adult in their family was associated with less risky alcohol use. Among 16- to 18-year-olds, those who had an adult in their family they could talk to if they had a problem were more likely to wait until they were 15 years old to drink (53% vs. 44% without such an adult).

Youth with a supportive adult in their family were less likely to drink at risky levels in the past month. For example, 25% drank alcohol on three or more days in the past month, compared to 30% of those without a supportive family member. These youth were also less likely to have engaged in heavy sessional drinking in the past month.

Having a supportive adult in the family was linked to consuming fewer drinks on the Saturday before taking the survey. Males with an adult in their family they could turn to were less likely to binge drink last Saturday (28% vs. 35%), as were females (30% vs. 37%).

**HELPFUL FAMILY**

Youth who sought help from someone in their family when they had a problem and found that relative to be helpful were less likely to have first tried alcohol at 12 or younger (among those aged 16 to 18) or to have engaged in heavy sessional drinking in the past month (38% vs. 43% of those who did not find their family member helpful), and females were less likely to binge drink last Saturday.

**PARENTAL MONITORING**

Among 16- to 18-year-olds who had tried alcohol, those whose parents knew what they were doing in their spare time or ate supper with them were more likely to have waited until after turning 15 years old to first try alcohol. For example, 58% of youth who reported that their parents always knew what they were doing with their free time had not tried alcohol until after their 15th birthday, compared to 33% of those whose parents never knew.

Youth whose parents always knew what they were doing with their spare time were less likely to have been drinking on three or more days in the past month (19% vs. 48% whose parents never knew what they were doing) or to have engaged in heavy sessional drinking during that time (30% vs. 60%).

Youth whose parents always ate their evening meal with them were less likely to have drunk on three or more days in the past month or to have engaged in heavy sessional drinking during this time. They were also less likely to have been binge drinking last Saturday. This was the case for both males (26% vs. 42% who never ate dinner with parents) and females (25% vs. 46%).

Note: Heavy sessional drinking refers to youth who had five or more drinks of alcohol within a couple of hours.
School connectedness was associated with less risky alcohol use. Among 16- to 18-year-old youth who had tried alcohol, 63% of those who felt most connected to school had waited until they were at least 15 years old before drinking, compared to 40% of those who were the least connected.

Among all youth who had tried alcohol, those with the highest levels of school connectedness were less likely to have been drinking on three or more days in the past month (24% vs. 33% of those with lower school connectedness), to have engaged in heavy sessional drinking in the past month (34% vs. 44%), or binge drank last Saturday. For example, 24% of males who were the most connected to school binge drank last Saturday, which was lower than the 40% who were least connected.

Youth who had not been involved in any type of bullying in the past year, either as a victim or a perpetrator, reported less harmful alcohol use than those who had been either a victim, a perpetrator, or both.

Among 16- to 18-year-old youth who had tried alcohol, 54% of those who had no bullying involvement in the past year had not tried alcohol before their 15th birthday, compared to 48% who had either been victimized or had bullied others.

Among all youth who had used alcohol, those who only had positive peer relationships at school were less likely to have had alcohol on three or more days in the past month (24% vs. 28%) or to have engaged in heavy sessional drinking (37% vs. 40%).

Youth with positive peer relationships were also less likely to binge drink than their peers with less positive relationships. For example, 30% of females who had not been involved in bullying binge drank last Saturday, compared to 34% of those who had some bullying involvement.

Youth sought help from a variety of school staff members during the past year. When they found that support to be helpful, there were links to less risky drinking. For example, among youth who were 16 to 18 years old, those who found their teacher to be helpful
when they asked them for help were more likely to have waited until they were at least 15 years old to first try drinking (54% vs. 37% of those whose teacher was not helpful).

Youth who had tried alcohol and found school staff to be helpful were also less likely to have been drinking at risky levels in the past month or binge drinking last Saturday. For example, 26% of youth who found their school counsellor to be helpful had been drinking on three or more days in the past month, compared to 34% of those who sought help from their school counsellor but did not find that person helpful. Similarly, 35% of those whose teacher was helpful had engaged in heavy sessional drinking in the past month, compared to 46% of those whose teacher was not helpful.

**PEER RELATIONSHIPS**

Although peer relationships could be a risk for harmful alcohol use as noted earlier, these relationships could also be protective. Among 16- to 18-year-old youth, those who had three or more close friends at school or in their neighbourhood were more likely to have waited until after their 15th birthday to first try alcohol (52% vs. 46% of those with fewer friends), and were also less likely to have first tried alcohol at a very young age (e.g., 12% drank at 12 years old or younger vs. 19% with fewer friends).

Regardless of the number of friends they had, youth who had friends with healthy attitudes toward alcohol were less likely to have used alcohol at an early age or to have used it recently. For example, among 16- to 18-year-old youth who had tried alcohol, those whose friends would be upset with them if they got drunk were more likely to have waited until they were at least 15 years old to first use alcohol (63% vs. 49% of those whose friends would not be upset).

Among all youth who had tried alcohol, those whose friends would disapprove of them getting drunk were less likely to have been drinking on three or more days in the past month (11% vs. 30%) or to have engaged in heavy sessional drinking during that time.

Having friends with healthy attitudes was also associated with fewer youth drinking at risky levels last Saturday. For example, 13% of females whose friends would disapprove of them getting drunk reported binge drinking last Saturday, compared to 37% whose friends would not be upset. Likewise, males with friends who would disapprove of them getting drunk were less likely to binge drink last Saturday (15% vs. 33%).

**YOUTH WHO WERE CONNECTED TO THEIR COMMUNITY**

**COMMUNITY CONNECTEDNESS**

Youth who felt that they were a part of their community were less likely to have started drinking at an early age or to drink at risky levels. For example, among 16- to 18-year-old youth who had tried alcohol and found school staff to be helpful, 52% had waited until they were at least 15 years old to first try alcohol, compared to 46% of those whose teacher was not helpful.

Note: Heavy sessional drinking refers to youth who had five or more drinks of alcohol within a couple of hours.
levels. For example, males who felt most connected to their community were less likely to have been drinking on three or more days in the past month than those who felt the least connected (24% vs. 28%), and females were less likely to binge drink last Saturday (30% vs. 36% who felt least connected).

It was also important that youth felt engaged and valued within the activities they took part in. Among 16- to 18-year-old youth who had tried alcohol, those who felt that the activities they were involved in were more meaningful were more likely to have waited until after their 15th birthday to first try alcohol (53% vs. 43% who did not participate in an extracurricular activity). Females were also less likely to have been drinking on three or more days in the past month (27% vs. 32%), although no such pattern was seen for males.

MEANINGFUL EXTRACURRICULAR ACTIVITIES

Participation in at least one extracurricular activity on a weekly basis, such as sports, dance, volunteering, or music was associated with less risky alcohol use. For example, among 16- to 18-year-old youth who had tried alcohol, those who took part in at least one weekly activity were more likely to have waited until they were at least 15 years old before trying alcohol (52% vs. 43% who did not participate in an extracurricular activity). Females were also less likely to have been drinking on three or more days in the past month (27% vs. 32%), although no such pattern was seen for males.
Finding their activities meaningful and feeling listened to and valued within those activities was particularly important for females, as these were associated with being less likely to drink on three or more days in the past month, engage in heavy sessional drinking during that time, or binge drink last Saturday.

FEELING SAFE

The relation between feelings of safety and harmful alcohol consumption was complex. For example, always feeling safe in their neighbourhood at night was not protective against most alcohol use outcomes for youth, and there was no positive cumulative effect to feeling safe across different locations.

However, feeling safe at school, at home, or in their neighbourhood during the day was each linked to lower levels of risky alcohol use. For example, feeling safe at school reduced the likelihood of males and females using alcohol before their 15th birthday and was protective against heavy sessional drinking for males.

| FEELING SAFE AS PROTECTIVE FOR RISKY ALCOHOL USE (AMONG YOUTH WHO TRIED ALCOHOL) |
|-------------------------|-----------------|-----------------|----------------|----------------|
|                         | Always felt safe |                 |                |                |
| **Outcome**             | At school       | In neighbourhood during the day | In neighbourhood at night | At home |
| First used alcohol at 15 or older (among youth aged 16-18) | Yes | Yes | No | Yes |
| Less likely to drink on three or more days in the past month | Males | Males | No | Yes |
| Less likely to engage in heavy sessional drinking in the past month | Males | Males | No | Males |
| Less likely to binge drink last Saturday | Yes | Yes | Males | Yes |
# APPENDIX — HEALTH AUTHORITY AND HSDA COMPARISONS

<table>
<thead>
<tr>
<th>HEALTH AUTHORITIES</th>
<th>NORTHERN (a)</th>
<th>INTERIOR (b)</th>
<th>VANCOUVER ISLAND (c)</th>
<th>VANCOUVER COASTAL (d)</th>
<th>FRASER (e)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Ever tried alcohol</td>
<td>58% (c,d,e)</td>
<td>54% (c,d,e)</td>
<td>51% (a,b,d,e)</td>
<td>39% (a,b,c)</td>
<td>38% (a,b,c)</td>
</tr>
<tr>
<td>Among those who had tried alcohol</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>First tried alcohol at 12 years old or younger</td>
<td>27% (c,d,e)</td>
<td>24% (d,e)</td>
<td>22% (a,e)</td>
<td>20% (a,b)</td>
<td>19% (a,b,c)</td>
</tr>
<tr>
<td>Drank at least once in the past year</td>
<td>93%</td>
<td>94% (d,e)</td>
<td>93%</td>
<td>92% (b)</td>
<td>92% (b)</td>
</tr>
<tr>
<td>Drank on three or more days in the past month</td>
<td>28% (e)</td>
<td>30% (c,e)</td>
<td>26% (b)</td>
<td>29% (e)</td>
<td>23% (a,b,d)</td>
</tr>
<tr>
<td>Engaged in heavy ses- sional drinking in the past month</td>
<td>42% (e)</td>
<td>42% (e)</td>
<td>39%</td>
<td>40% (e)</td>
<td>35% (a,b,d)</td>
</tr>
<tr>
<td>Males who binge drank last Saturday</td>
<td>35% (e)</td>
<td>33%</td>
<td>29%</td>
<td>30%</td>
<td>28% (a)</td>
</tr>
<tr>
<td>Females who binge drank last Saturday</td>
<td>38% (c,e)</td>
<td>37% (c,e)</td>
<td>30% (a,b)</td>
<td>33%</td>
<td>30% (a,b)</td>
</tr>
</tbody>
</table>

Note: Letters indicate Health Authority regions for which the percentage estimate was statistically different. For example, Vancouver Coastal (d) and Fraser (e) youth were less likely to report drinking alcohol in the past year than youth in the Interior (b).
## HSDA Comparisons

<table>
<thead>
<tr>
<th>Region</th>
<th>Ever Tried Alcohol</th>
<th>First Tried Alcohol at 12 or Younger (Among Youth Who Had Tried Alcohol)</th>
<th>Engaged in Heavy Sessional Drinking in Past Month (Among Youth Who Had Tried Alcohol)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Northwest</td>
<td>57%</td>
<td>24%</td>
<td>47%</td>
</tr>
<tr>
<td>Northeast</td>
<td>60%</td>
<td>30%</td>
<td>37%</td>
</tr>
<tr>
<td>Northern Interior</td>
<td>58%</td>
<td>27%</td>
<td>41%</td>
</tr>
<tr>
<td>Thompson Cariboo Shuswap</td>
<td>55%</td>
<td>24%</td>
<td>42%</td>
</tr>
<tr>
<td>Okanagan</td>
<td>52%</td>
<td>23%</td>
<td>41%</td>
</tr>
<tr>
<td>Kootenay Boundary</td>
<td>60%</td>
<td>25%</td>
<td>47%</td>
</tr>
<tr>
<td>East Kootenay</td>
<td>59%</td>
<td>31%</td>
<td>42%</td>
</tr>
<tr>
<td>North Vancouver Island</td>
<td>52%</td>
<td>24%</td>
<td>40%</td>
</tr>
<tr>
<td>Central Vancouver Island</td>
<td>53%</td>
<td>22%</td>
<td>40%</td>
</tr>
<tr>
<td>South Vancouver Island</td>
<td>50%</td>
<td>22%</td>
<td>37%</td>
</tr>
<tr>
<td>North Shore/Coast Garibaldi</td>
<td>52%</td>
<td>19%</td>
<td>50%</td>
</tr>
<tr>
<td>Vancouver</td>
<td>33%</td>
<td>20%</td>
<td>36%</td>
</tr>
<tr>
<td>Richmond</td>
<td>35%</td>
<td>20%</td>
<td>30%</td>
</tr>
<tr>
<td>Fraser North</td>
<td>39%</td>
<td>20%</td>
<td>35%</td>
</tr>
<tr>
<td>Fraser South</td>
<td>37%</td>
<td>17%</td>
<td>36%</td>
</tr>
<tr>
<td>Fraser East</td>
<td>41%</td>
<td>21%</td>
<td>35%</td>
</tr>
</tbody>
</table>

Note: Not all differences in percentages are statistically significant. Heavy sessional drinking refers to you who had five or more drinks of alcohol within a couple of hours.