Substance Use and Suicide Risk Webinar

30th October 2012
3:00-4:30pm (EDST)
This webinar is presented by:

Panel:
- Professor Diego De Leo, DSc, Griffith University
- Professor David Kavanagh, Queensland University of Technology
- Assoc Prof Lynne Magor-Blatch, University of Canberra

Facilitator:
- Bella Saunders (APS), Clinical Psychologist
Session ground rules

• Ensure sound is on and volume turned up on your computer.

• If you are experiencing problems with sound, dial in using your telephone as per details on your confirmation email (enter telephone number and password provided).

• Dial 1800 733 416 for technical support (Redback).

• If you have a specific question/s that is not addressed in the webinar, if time permits you will have the opportunity to ask questions at the end of the presentation.
Substance Abuse
& Suicidality

Prof. Diego De Leo, DSc
Suicide and Mental Disorders: general population studies (N=15,629) 2004

- Mood disorders 35.8%
- Substance-related disorders 22.4%
- Other DSM axis I diagnosis 5.1%
- Anxiety/somatoform disorders 6.1%
- Personality disorders 11.6%
- Schizophrenia 10.6%
- Adjustment disorders 3.6%
- No diagnosis 3.2%
- Other psychotic disorders 0.3%
- Organic mental disorders 1.0%

(8205 cases, 12292 diagnoses)

WORLD HEALTH ORGANISATION
Common Risk Factors for Suicide

*Psychopathology and psychiatric hospitalization:*

- Mood disorders (incl. major depression and bip. dis.)
- Schizophrenia and other psychotic disorders
- Substance-related disorders
- Personality disorders (espec. borderline and antisocial)
- Organic mental disorders (espec. brain injury)
- Anxiety/somatoform disorders (incl. PTSD)
- Adjustment disorder.
- Psychiatric co-morbidity
- Psychiatric hospitalization
- Recent discharge
### Suicide Attempters: DSM-III-R diagnoses by age group

<table>
<thead>
<tr>
<th>Diagnostic groups n (%)</th>
<th>15-34</th>
<th>35-59</th>
<th>60 (=/&gt;)</th>
<th>Total</th>
<th>$\chi^2$/p*</th>
</tr>
</thead>
<tbody>
<tr>
<td>Schizoph./Paran.</td>
<td>38 (14)</td>
<td>25 (14)</td>
<td>8 (8)</td>
<td>71 (13)</td>
<td>n.s.</td>
</tr>
<tr>
<td>Mood Disorders</td>
<td>75 (28)</td>
<td>88 (48)</td>
<td>70 (69)</td>
<td>233 (42)</td>
<td>54.79/&lt;0.000</td>
</tr>
<tr>
<td>Anxiety Disorders</td>
<td>13 (5)</td>
<td>11 (6)</td>
<td>0</td>
<td>24 (4)</td>
<td>5.97/=0.05</td>
</tr>
<tr>
<td>Adjustment Disorders</td>
<td>36 (14)</td>
<td>15 (8)</td>
<td>13 (13)</td>
<td>64 (12)</td>
<td>n.s.</td>
</tr>
<tr>
<td>Abuse/Depend. Disorders</td>
<td>19 (7)</td>
<td>8 (4)</td>
<td>2 (2)</td>
<td>29 (5)</td>
<td>n.s.</td>
</tr>
<tr>
<td>Other diagnoses</td>
<td>9 (3)</td>
<td>7 (4)</td>
<td>5 (5)</td>
<td>21 (4)</td>
<td>n.s.</td>
</tr>
<tr>
<td>Personality Disorders</td>
<td>77 (29)</td>
<td>29 (16)</td>
<td>3 (3)</td>
<td>109 (20)</td>
<td>33.58/&lt;0.000</td>
</tr>
</tbody>
</table>

Illicit Drugs
WHO/EURO Multicentre Study on Suicidal Behaviour: almost 30% of individuals cited addiction as the reason for their suicide attempt (Keeley et al., 2004).

Samples of attempted suicides have high proportions of drug abusers.

Increased completed suicide rates in opioid, cocaine and methaqualone abusers.
Risk of suicide attempt

A new study found that people who smoke marijuana before age 17 are 3.5 times more likely to attempt suicide as those who started smoking marijuana later in life.

In addition, people who are dependent on marijuana have a higher risk of experiencing major depression and suicidal thoughts and behaviors (Lynskey et al, 2012).

This large-scale epidemiological study was funded by the National Institute on Drug Abuse.
Social Anxiety

Despite a clear relationship between marijuana use and suicidality, little is known about psychological vulnerability factors that may interact with marijuana use to increase suicidality. Although social anxiety did not moderate the relation between use status and suicidality, it did moderate the relation between daily use status and suicidality after controlling for a wide range of relevant variables (e.g., demographics, depression, negative affect, and other types of anxiety). The overall model accounted for 59% of the variance in suicidality: daily marijuana users with elevated social anxiety reported the highest suicidality (Buckner et al, 2012).
In people receiving treatment for drug dependence, discharge from a period of hospitalisation marks the start of a period of heightened vulnerability to drug-related death (Merrall et al, 2012).
Using state-level data for the period 1990 through 2007, the effect of legalising medical marijuana on suicide rates in California was estimated.

Results suggest that the passage of a medical marijuana law is associated with an almost 5 percent reduction in the total suicide rate, an 11 percent reduction in the suicide rate of 20-through 29-year-old males, and a 9 percent reduction in the suicide rate of 30- through 39-year-old males.

Estimates of the relationship between legalization and female suicides are less precise (Anderson et al, 2012).
Alcohol
Suicide and Alcohol

• Alcohol misuse reported in 15% of males and 4% of female attempters. Particularly high rates in repeaters. Alcohol consumption at the time of the attempt is associated with higher risk of eventual suicide.

• History of alcohol abuse and heavy drinking is present in 15-54% of suicides. Follow up studies of alcoholics reveal estimates of excess suicide mortality between 25 and 100% for men.

• Destructive social consequences of chronic abuse and the risk associated with acute intoxication are high risk factors.
Alcohol use has consistently been implicated in the precipitation of suicidal behavior. Alcohol abuse may lead to suicidality through disinhibition, impulsiveness and impaired judgment, but it may also be used as a means to ease the distress associated with committing an act of suicide.

Multiple genetically-related intermediate phenotypes might influence the relationship between alcohol and suicide. Psychiatric disorders, including psychosis, mood disorders and anxiety disorders, as well as susceptibility to stress, might increase the risk of suicidal behavior, but may also have reciprocal influences with alcohol drinking patterns.

Increased suicide risk may be heralded by social withdrawal, breakdown of social bonds, and social marginalization, which are common outcomes of untreated alcohol abuse and dependence.
Suicide and Alcohol

- Substance abuse can be viewed as “chronic suicide.”
- Substance abuse may lead to the onset of stressors.
- Alcohol often increases toxicity of medication in attempters.
- Alcohol and drugs lower restraints, increase impulsivity and impair judgement.
- Alcoholism produces depressive symptoms.
- Alcohol abuse may result in lowering serotonin levels related to suicidal behaviours and depression.
- Suicide and substance abuse may stem from the same underlying factor (e.g., psychopathology and/or social stressors).
- Some drug and alcohol abusers use the abused substance to kill themselves.

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SUICIDE PATHWAYS: Micro-level

INTERNAL

PREDISPOSING
- Psychiatric illness
- Physical illness
  - Rigidity, Perfectionism
- Genetics

PRECIPITATING
- Uncommon eg hallucinations
- Cognition
  - Hopelessness
  - Reasons for living

SUICIDE ATTEMPT
- Individual threshold for suicidality
  - Less ambivalence
  - More ambivalence

SUICIDE
- Alcohol Drugs
- Support Care Continuity

EXTERNAL

- Attachment deficiencies
  - Family conflict
  - Family models
  - Early trauma
- Loss
  - Rejection
  - Humiliation
  - Shame

(AISRPA, 1998, 2009)
# Most Common Epidemiological Risk Factors for Suicide

## Socio-demographic risk factors
- Male sex
- Age of 55 years or older
- Widowed or divorced
- Caucasian
- Living alone
- Unemployed or having financial problems
- Recent adverse event, such as job loss or death or someone close

## Clinical risk factors
- Clinical depression or schizophrenia
- Substance abuse
- History of suicide attempts or ideation
- Feeling of hopelessness
- Panic attacks
- Severe anxiety, particularly if combined with depression
- Severe anhedonia
Most Common Epidemiological Risk Factors for Attempted Suicide

**Socio-demographic risk factors**

- Female sex
- Age under 35 years
- Perceived threat to an intimate relationship
- Living alone
- Unemployed or having financial problems
- Recent adverse event, such as job loss or death or someone close

**Clinical risk factors**

- Clinical depression or schizophrenia
- Substance abuse
- Borderline Pers. Disorder
Examples of Warning Signs

- Appearing sad or depressed most of the time.
- Feeling anxious, agitated, or unable to sleep, or sleeping all the time.
- Neglecting personal welfare; deteriorating physical appearance.
- Withdrawing from friends, family, and society.
- Loss of interest in food, hobbies, work, and school.
- Frequent and dramatic mood changes.
- Expressing feelings of excessive guilt or shame.
- Feelings of failure or decreased performance.
- Talk, write, or draw pictures about death, dying, or suicide when these actions are out of the ordinary for the person.
- Talk about suicide in a vague or indirect way, saying things like: "I'm going away on a real long trip"; or "Don't worry if you don't see me for a while".
- Give away prized possessions.
- Put affairs in order, tie up loose ends, and/or make out a will.
- Seek access to firearms, pills, or other means of harming oneself.
- Call or visit family and/or friends as if to say goodbye.
- **Increasing tobacco, alcohol or drug use.**
Mental Health Disorders (SCID-I) and Suicide

Any diagnosis at death
Mood disorders
SCH and other psychotic disorders
Substance related disorders
Anxiety disorders
Dementia & other cognitive disorders
Adjustment disorders

De Leo et al, under review, 2012

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Social Phenomena Influencing Suicide Trends

- Unemployment/economic depression
- Alcohol consumption
- War
- Fertility rate
- Divorce (+/-)
- Religious beliefs (+/-)
- Social Fragmentation (+/-)
Contextual explanations for increased suicide rates: The Pacific Islands

- **Alcohol use:**
  - In some Asian and Pacific countries, alcohol use is “a masculine activity, and while heavy drinking is tolerated in males, it is usually disapproved in women” (*Brewis et al*, 1996);
  - Alcohol is used to vent anger toward elders (*Tousignant*, 1998);
Contextual explanations for increased suicide rates: Australia and New Zealand

- **Lack of access to support services** *(Dixon & Welch, 2000; Bourke, 2003)*;

- **Interpersonal problems** *(Bourke, 2003)*;

- **Gender norms and stigma** *(Bourke, 2003)*;

- **Drug and alcohol exposure in Indigenous communities** *(Elliott Farrelly, 2004; Hunter et al., 2001)*;

- **Colonisation of the Indigenous population** *(Farrelly, 2008; Clark et al., 2008).*
# Data from Current Literature on Indigenous People

<table>
<thead>
<tr>
<th>Risk Factors</th>
<th>Indigenous Australians</th>
<th>General Population*</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Age</strong></td>
<td>&lt;35 years of age <em>(De Leo et al., 2006)</em></td>
<td>25-34, 75+ <em>(De Leo et al., 2006)</em></td>
</tr>
<tr>
<td><strong>Male/female ratio</strong></td>
<td>3:0:1 <em>(De Leo et al., 2006)</em></td>
<td>3.8:1 <em>(De Leo et al., 2006)</em></td>
</tr>
<tr>
<td><strong>Hanging as suicide method</strong></td>
<td>89.2% <em>(De Leo et al., 2006)</em></td>
<td>41.2% <em>(De Leo et al., 2006)</em></td>
</tr>
<tr>
<td><strong>Psychopathology:</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>• Schizophrenia</td>
<td>All present, but not clearly determined</td>
<td>7% <em>(De Leo &amp; Kliive, 2007)</em></td>
</tr>
<tr>
<td>• Major Depression</td>
<td><em>(Butler et al., 2007; Elliott-Farrelly, 2005a; Kariminia et al., 2007)</em></td>
<td>Up to 60% <em>(Fawcett, 2006)</em>.</td>
</tr>
<tr>
<td>• Personality Dis.</td>
<td></td>
<td>3-9% <em>(Oquendo, et al., 2006)</em></td>
</tr>
<tr>
<td><strong>Substance Abuse:</strong></td>
<td></td>
<td></td>
</tr>
<tr>
<td>• Alcohol</td>
<td>Up to 77% <em>(Hanssens, 2007a)</em></td>
<td>19-47% <em>(Neulinger &amp; De Leo, 2001)</em></td>
</tr>
<tr>
<td>• Other</td>
<td>Up to 10 times <em>(Clough et al., 2006)</em></td>
<td>Up to 30% <em>(Keeley et al., 2004)</em></td>
</tr>
<tr>
<td><strong>Same sex attraction</strong></td>
<td>No available evidence</td>
<td></td>
</tr>
<tr>
<td><strong>Impulsivity</strong></td>
<td>Reported as particularly frequent <em>(Hanssens, 2007a)</em></td>
<td>Unclear data from Australia. Reportedly present in between 35 and 55% of cases <em>(Simon, 2006)</em></td>
</tr>
<tr>
<td><strong>Physical disease/disability</strong></td>
<td>Reported as frequent <em>(Parker &amp; Ben Tovim, 2002)</em></td>
<td>25-70% <em>(Hawgood, et al., 2004)</em></td>
</tr>
<tr>
<td><strong>Legal troubles</strong></td>
<td>No clear evidence <em>(Kariminia et al., 2007)</em></td>
<td>5-37% <em>(Neulinger &amp; De Leo, 2001)</em></td>
</tr>
<tr>
<td><strong>Previous self-harm behaviour</strong></td>
<td>Reported as frequent <em>(Davidson, 2003; Parker &amp; Ben-Tovin, 2002)</em></td>
<td>Up to 44% <em>(Kerkhof &amp; Arensman, 2004)</em></td>
</tr>
</tbody>
</table>

*Data from current literature on Indigenous people.*
From the 1970s on, social transformations among Indigenous people became very rapid, with a probable turning point represented by the unprecedented “access to a cash economy through welfare, including unrestricted access to alcohol” happening in those years (Hunter & Milroy, 2006, p. 144). Those changes became exacerbated by social and economic disadvantages, as manifested in the over-crowding of houses, poor nutrition, low rates of school attendance, and high unemployment (Pink & Allbon, 2008), but also high rates of violence, crime and incarceration (Cheers et al., 2006).
Alcohol has been implicated in up to 77% of Indigenous suicide deaths (*Hanssens, 2007*).

Illicit drugs and substances, such as cannabis and ‘petrol sniffing’, are also important determinants of suicidal processes (*Chenhall & Senior, 2009*), probably magnifying the role of broader, social risk factors for suicide within many Indigenous communities.
Indigenous suicide cases had significantly more often substance use disorder (OR=1.71; 95% CI 1.11-2.63), while non-Indigenous cases had more often a diagnosis of unipolar depression (OR=5.03; 95% CI 3.53-7.09).
Suicide: significant differences between ethnicities

a) Socio-demographic factors

Gender ratio: Indigenous 4.5:1, non-Indigenous 3.7:1

Unemployment: Indigenous 40.3%, non-Indigenous 21.5%

Use of hanging: Indigenous 87.5%, non-Indigenous 37.1%

b) Health and life-style

Physical illness: Indigenous 6.4%, non-Indigenous 12.8%

Problematic alcohol use: Indigenous 39.3%, non-Indigenous 17.0%

Drug use: Indigenous 38.2%, non-Indigenous 23.7%
Drinking Patterns: Europe

(Ramstedt & Hope, 2003)

- Ireland
- UK
- Finland
- Sweden
- Germany
- France
- Italy

Weekly Binge drinking

Binge per 100 drinking Occ
Drinking Consequences

(Ramstedt & Hope, 2003)
Alcohol-related mortality & alcohol consumption per capita in Ireland, 1970-2001

(Central Statistics Office, 2003)
The biggest danger: Alcohol

The benefits of restricting access to alcohol have been confirmed by a reduction in alcohol consumption and suicide deaths (eg, Nemtsov, 2003).

Furthermore, such restrictions might lead to a reduction in all alcohol-related deaths, such as accidents, homicide, alcohol cirrhosis, alcohol poisoning, etc (Pridemore & Snowden, 2009).

The implementation of policies which reduce alcohol consumption should be recommended in all countries.
Restricting *alcohol availability* has been shown to reduce the number of deaths from suicide and other external causes in some countries (WHO, 2010).
Perestroika (restructuring)

Following the introduction of reforms including the implementation of a strict anti-alcohol policy restricting the sale of alcohol in 1985, the first year of perestroika, there was a 34.5% decline in suicide rates throughout the USSR.

The political reforms during this period were characterised by a powerful democratisation process, accompanied by a sense of optimism and the hope of improvement in living conditions (Wasserman et al, 1998).
Suicide and Alcohol

• Alcohol intoxication can lead to aggression and aggression can lead to drinking. One condition that can predict alcohol consumption in response to aggression is helplessness.

• Many believe that alcohol will give them the motivation to commit suicide, make it painless, and thereby resolve ambivalence about suicide.

• The painful contrast created during alcohol intoxication - when the expectation of relief from dysphoria is met with exacerbated negative affect - could increase the proximal risk of suicide.
Suicide and Alcohol

• Violent behaviour is a risk factor for suicide.
• Violent behaviour in the last year of life is a significant predictor of suicide, a finding not attributable to alcohol use disorder alone.
• Alcohol use disorder strongly related to aggression towards others and suicide.
• Violence in women appears to confer greater risk of suicide than violence in men (Conner, 2001).
Conclusions

• Given the close association between levels of alcohol consumption and suicidal behaviour any prevention strategy that does not adequately address the problem of alcohol misuse and abuse is doomed to failure.

• Unless there is proper control over the drinks industry and their advertising alcohol will always win
Gracias!
Merci!
Danke!
Thank you!
Grazie!
Suicide Risk in Substance Misuse: Assessment and Comorbidity

Professor David Kavanagh, Queensland University of Technology
Screening for suicide risk

- Severe depression and related ideation is a risk, but is neither necessary nor sufficient
  - e.g. impulsive behavior
  - e.g. command hallucinations

- In substance misuse, note
  - Event may be during intoxication—
    - recall of intent may be affected
  - may not have suicidal intent
    - e.g. > impulsivity, grandiose delusion
Consider risk factors
Standard screening for suicide risk

• Suicidal thoughts
  – Graded questions, initially “ever”...“now”?
  – Frequency, rumination

• Models of attempts, completed suicide
  – Recent? Multiple?

• Conflict/other stressors, including
  – Recent losses (& rumination on repeated or early loss)
  – Chronic or severe illness, pain

• Current social isolation

• Previous attempts by person
  • Nature (perceived and actual lethality; perceived likely success)
  • Trigger (likely recurrence)
  • Context (e.g. intoxication? symptoms?)
  • How survived (likely repeat?)
Screening for suicide risk

• Specific plan, preparation
  – Reported (specificity, perceived lethality, access)
  – Observed—giving away possessions, etc.

• Perceived protective factors unstable/absent
  – (note goals; relationships)

• Apparent calm after depression/agitation
BPRS suicide item

2 Very mild
   Occasional feelings of being tired of living. No suicidal thoughts

3 Mild
   Occasional suicidal thoughts without intent or specific plan/feels better off dead.

4 Moderate
   Suicidal thoughts frequent, without intent or plan

5 Moderately severe
   Many fantasies of suicide. May seriously consider making a specific attempt with specific time and plan, or impulsive attempt with nonlethal method or in view of potential saviours.

6 Severe
   Wants to kill self. Searches for means and time, or potentially serious attempt with knowledge of potential rescue

7 Extremely severe
   Specific plan and intent, or suicide attempt with plan patient thought was lethal or attempt in secluded environment

Schizophrenia Bulletin, 12, 578-602
Beck Scale for Suicide Ideation (BSSI)

19-item observer scale: each item has 0-2 alternatives

- Wish to live; To die
- Reasons for living/dying; Desire to make active attempt
- Passive desire
- Duration of ideation; Frequency
- Attitude to ideation; Control over action
- Deterrents to active attempt; Reason for contemplated attempt
- Specificity, plan; Availability/opportunity
- Sense of capability to carry out; Expectancy/anticipation of attempt
- Actual preparation; Note; Final acts
- Deception/concealment of contemplated suicide

Positive if total ≥ 6
Journal of Consulting and Clinical Psychology, 47, 343-352
Comorbidity of other mental disorders and SUDs is high

2007 National Survey of Mental Health and Wellbeing
Comorbidity of affective and SUDs

2007 National Survey of Mental Health and Wellbeing
Translates to large numbers: SUD and Other MD

2007 National Survey of Mental Health and Wellbeing
Translates to large numbers: SUD and Affective

SUD/MH Comorbidity

 Thousands

- Men
- Women
- All

2007 National Survey of Mental Health and Wellbeing

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Screening for suicide risk

- Since substance use + other symptoms dramatically increases risk, increase suspicion
  - *In mania, esp. substance-induced symptoms?*

- Substance misuse missed in mental disorders
  - Routinely screen
  - May be multiple
    - e.g. + personality disorders; PTSD (or history of trauma)
    - e.g. schizophrenia + depression
    - e.g. + physical
How often do you have a drink containing alcohol?

- never
- monthly
- once a week or less
- 2 to 4 times a week
- 5 or more times a week

How many ‘standard drinks’ do you have on a typical day when you are drinking?

- 1 or 2
- 3 or 4
- 5 or 6
- 7 to 9
- 10 or more

How often do you have six or more drinks on one occasion?

- never
- less than monthly
- monthly
- weekly
- daily or almost daily
Remainder of AUDIT

How often during the last year have you found that you were not able to stop drinking once you had started?

- never
- less than monthly
- monthly
- weekly
- daily or almost daily

How often during the last year have you failed to do what was normally expected from you because of your drinking?

- never
- less than monthly
- monthly
- weekly
- daily or almost daily

How often during the last year have you needed an alcoholic drink in the morning to get yourself going after a heavy drinking session?

- never
- less than monthly
- monthly
- weekly
- daily or almost daily

How often during the last year have you had a feeling of guilt or remorse after drinking?

- never
- less than monthly
- monthly
- weekly
- daily or almost daily

How often during the last year have you been unable to remember what happened the night before because you had been drinking?

- never
- less than monthly
- monthly
- weekly
- daily or almost daily

Have you or someone else been injured as a result of your drinking?

- no
- yes, but not in the last year
- yes, during the last year

Has a relative or friend, or a doctor or other health worker been concerned about your drinking or suggested you cut down?

- no
- yes, but not in the last year
- yes, during the last year

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# Severity of Dependence Scale

<table>
<thead>
<tr>
<th></th>
<th>0</th>
<th>1</th>
<th>2</th>
<th>3</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Never or almost never always</td>
<td>Sometimes</td>
<td>Often</td>
<td>Always or nearly always</td>
</tr>
</tbody>
</table>

1. Did you ever think your use of (substance) was out of control?
2. Did the prospect of missing a fix (or dose) or not chasing make you anxious or worried?
3. Did you worry about your use of (...)?
4. Did you wish you could stop?
5. How difficult did you find it to stop, or go without (...)?

Positive if ≥ 1

*Addiction, 90, 607-614*
In the last 3 months...... No (0), A bit (1) or A lot (2)

1. Did *(substance)* cause any money problems for you?
2. Did (...) make you have problems at work, or at school (etc.)?
3. Did you have housing problems because of (...)?
4. Were there problems at home or with your family because of (...)?
5. Did you have any arguments or fights because of (...)?
6. Has (...) caused any trouble with the law, or the police?
7. Has (...) caused any health problems or injuries?
8. Have you done anything ‘risky’ or outrageous’ after using (...)?
   (e.g. driving under the influence; unprotected sex; sharing needles)?
Did your use of (...) in the last 3 months result in you...

9. Being uninterested in your usual activities?
10. Feeling depressed?
11. Being suspicious or distrustful of others?
12. Having strange thoughts?

Over the 12 questions, positive if $\geq 2$

Addictive Behaviors, 36, 927-932.
DOI: 10.1016/j.addbeh.2011.05.004
Additional issues in people with severe mental disorder

• Awareness of severity, likely prognosis
  – First episode; *better* premorbid adjustment
  – Poor response to treatment

• Severity of medication side-effects

• History of admissions triggered by suicidality

• Increased symptoms, especially
  – Psychosis + depression
  – Mixed manic/depressive symptoms
  – Command hallucinations
  – + > substance use

• Anticipated reduction in service support
InterSePT scale for suicidal thinking

Rate the patient based on the highest rating in the last 7 days.

1. Wish to Die
   - 0 = None
   - 1 = Weak
   - 2 = Moderate to strong

2. Reason for living versus dying
   - 0 = For living outweigh for dying
   - 1 = About Equal
   - 2 = For dying outweigh for living

3. Desire to make active suicide attempt
   - 0 = None
   - 1 = Weak
   - 2 = Moderate to strong

4. Passive suicidal desire
   - 0 = would take precautions to save life
   - 1 = would leave life/death to chance
   - 2 = would avoid steps necessary to save or maintain life

5. Frequency of suicidal ideation
   - 0 = Rare or occasional
   - 1 = Intermittent
   - 2 = Persistent or continuous

6. Attitude towards ideation/wish
   - 0 = Rejecting
   - 1 = Ambivalent or indifferent
   - 2 = Accepting

7. Control over suicidal action/acting out/or delusions/hallucinations of self-harm
   - 0 = has complete ability to control impulses
   - 1 = unsure of ability to control impulses
   - 2 = Has no ability to control impulses

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InterSePT scale for suicidal thinking

8. Deterrents to active attempt (e.g. religious values, family)
   0 = would not attempt because of deterrents
   1 = some concerns about deterrents
   2 = Minimal or no deterrents

9. Reason for contemplating attempt
   0 = To manipulate the environment; revenge; get attention
   1 = Combination of 0 and 2
   2 = Escape, solve problems, psychotic reasons

10. Method: Specificity/planning of contemplated attempt
    0 = Not considered or not applicable
    1 = considered, but details not worked out
    2 = Details worked out; well-formulated plan

11. Expectancy/anticipation by patient of actual attempt
    0 = None
    1 = Uncertain
    2 = Yes

12. Delusions/Hallucinations of self-harm (including command hallucinations)
    0 = None
    1 = Occasional
    2 = Frequent

(Not as yet strong enough to use as a formal screen)
Clinical considerations for clinicians working with substance use: Suicide risk

Assoc Prof Lynne Magor-Blatch

University of Canberra
National Convener, APS Substance Use Interest Group
Chair, IDIS Project
Executive Officer, Australasian Therapeutic Communities Assoc
What’s the problem?

- Over 6.6 million Australians have used an illicit drug in their lifetime (AIHW, 2008).

- Almost two in every five Australians (38.1%), aged 14 years or older, have used an illicit drug at some time in their lives with more than one in seven (13.4%) having used illicit drugs in the previous 12 months (AIHW, 2008).

- Most common types of drugs used among Australians are marijuana/cannabis, Ecstasy, meth/amphetamines, and pharmaceuticals.
What’s the problem?

- In Australia, 2006 ABS data showed that 13.4% of the population consumes enough alcohol to be classified in the risky/high risk categories.
- In June 2008, there were 41,347 people registered for pharmacotherapy treatment of opioid dependence, two-thirds were male (AIHW, 2009).
- Other treatments being undertaken include counselling, residential rehabilitation (including therapeutic communities), and other outpatient services.
- Detoxification is NOT in itself a treatment – but provides a gateway to treatment services.
A comparison

<table>
<thead>
<tr>
<th>Country</th>
<th>Marijuana/cannabis</th>
<th>Ecstasy</th>
<th>Meth/amphetamines</th>
<th>Cocaine</th>
<th>Opiates</th>
</tr>
</thead>
<tbody>
<tr>
<td>Australia</td>
<td>10.6</td>
<td>4.2</td>
<td>2.7</td>
<td>1.9</td>
<td>0.4</td>
</tr>
<tr>
<td>New Zealand</td>
<td>13.3</td>
<td>2.6</td>
<td>2.3</td>
<td>0.8</td>
<td>0.4</td>
</tr>
<tr>
<td>Republic of Ireland</td>
<td>6.3</td>
<td>1.2</td>
<td>0.4</td>
<td>1.7</td>
<td>0.5</td>
</tr>
<tr>
<td>USA</td>
<td>12.3</td>
<td>1.1</td>
<td>1.6</td>
<td>2.8</td>
<td>0.6</td>
</tr>
<tr>
<td>Canada</td>
<td>17.0</td>
<td>1.3</td>
<td>1.0</td>
<td>2.3</td>
<td>0.2-0.4</td>
</tr>
<tr>
<td>England and Wales</td>
<td>7.4</td>
<td>1.5</td>
<td>1.0</td>
<td>2.3</td>
<td>0.9-1.0</td>
</tr>
<tr>
<td>Scotland</td>
<td>11.0</td>
<td>3.2</td>
<td>2.2</td>
<td>3.8</td>
<td>1.5-1.7</td>
</tr>
<tr>
<td>Northern Ireland</td>
<td>7.2</td>
<td>1.8</td>
<td>1.0</td>
<td>1.9</td>
<td>0.1</td>
</tr>
</tbody>
</table>

Source: Adapted from United Nations Office on Drugs and Crime (UNODC) 2009. Note: (a) The methods, including age groups, vary for deriving prevalence. The specific data years also vary from 2000 to 2008 due to the timing of data collection in each country.

Illicit drug use in Australia seems moderate to high compared to similar countries.
Why do people use drugs?

- Social activity
- Relaxation
- Stress relief or control
- Pain relief
- Peer pressure
- Rebellion

Main reason people start – *plain curiosity*.

The main reason they stop – *no longer applicable or fits within life.*
Suicide: prevalence

• The most recent 'causes of death' publication from the Australian Bureau of Statistics (ABS) indicates that in 2010, suicide was the leading cause of death for young people aged 15-24, followed closely by road traffic accidents.

• In 2010, 88 males aged 15-19 years and 129 males aged 20-24 years died by suicide.

• For young females, 25 aged 15-19 years and 54 aged 20-24 years died by suicide (ABS, 2012).
Substance use and suicide: the link

• Research indicates that substance misuse is consistently associated with suicidal thoughts, suicide attempts, and suicide mortality.

• Risk of suicide likely to be greater in persons with more severe levels of substance abuse as well as in those with depression.

• Additionally, a propensity to engage in interpersonal violence is an important suicide-related risk factor.

• These findings reinforce the need for increased suicide assessment and intervention efforts to address co-occurring problems in individuals with substance use disorders and/or interpersonal violence.
Suicide and self-harm: Young people

- Number of young people who die by suicide in Australia each year is relatively low compared with the number who self-harm.

- Difficult to estimate the rate of self harm as evidence suggests that only 10% of young people who self-harm will present for hospital treatment (De Leo & Heller, 2004).

- Taken together, suicide and self-harm account for a considerable portion of the burden of disability and mortality among young Australians.
Mental Disorders & Suicide

• Building from a Lancet review by Prince et al., 2007, there is evidence suggesting that the rate of suicide is significantly higher in people suffering from a mental disorder compared to those with no mental health problems.

• Functional disorders such as mood and substance use disorders are more strongly associated to suicide than organic-based disorders like dementia (Harris et al., 1997).
People with history of opiate dependency appear more likely to have made at least one suicide attempt.

Trémeau et al., 2008 found that 48% of clients attending a detoxification program in France had a history of attempting suicide.

Additional risk was present for those who were assessed as more impulsive, had initially tried opiate substances at age 19 years (as opposed to 21) or had a family history of suicide. Increased risk was present for those who had a combination of these risk factors.
Mental Disorders & Suicide

• Toxicology reports from suicide cases in New South Wales for the period 1997-2006 (Darke, Duflou, Torok, 2009) suggests that the majority of the deceased were not chronic substance users.

• 67.2% of those completing suicide by means other than overdose had some form of substance in their system at the time of death.

• Only 16.9% of all cases analysed were known to have a history of substance dependence (primarily intravenously delivered substances and alcohol).

• Most common substance was alcohol (40.6% of all cases).

• Proportion of substances present in the toxicology reports were up to 41 times higher than what might be expected to be found in the general Australian population.
Mental Disorders & Suicide

- Individuals with a substance use disorder (ie. either a diagnosis of abuse or dependence on alcohol or drugs) are almost 6 times more likely to report a lifetime suicide attempt than those without a substance use disorder (Kessler, Borges & Walters, 1999).

- Numerous studies of individuals in drug and alcohol treatment show that past suicide attempts and current suicidal thoughts are common (Kessler et al., 1999; Roy, 2001; Roy, 2009).

- Men with a substance use disorder approximately 2.3 times more likely to die by suicide than those who are not substance abusers.

- Among women, a substance use disorder increases the risk of suicide 6.5-fold (Ilgen et al. 2010).
Mental Disorders & Suicide

• Correlation between substance use and mental illness that can increase suicide risk.

• Comorbidity of mental illness and substance use often goes unacknowledged when treatment is considered (Surja, Talari, Nair, Mettu, Lippman, 2008).

• Importance of completing a suicide risk assessment with substance using clients (Sher, 2006; Surja et al., 2008).
Risk factors for suicide

- Many risk factors for suicide in the general population also apply to those with substance use disorders. These include:

<table>
<thead>
<tr>
<th>Past psychiatric history</th>
<th>Impulsivity</th>
</tr>
</thead>
<tbody>
<tr>
<td>Current mental illness</td>
<td>Self-harm</td>
</tr>
<tr>
<td>Comorbidity</td>
<td>Suicidal ideation</td>
</tr>
<tr>
<td>Family relationship disturbance</td>
<td>Prior suicide attempt</td>
</tr>
<tr>
<td>Recent suicide of somebody close</td>
<td>Stressful life events</td>
</tr>
<tr>
<td>Childhood physical/sexual abuse</td>
<td>Physical illness</td>
</tr>
<tr>
<td>Unipolar depressive disorder</td>
<td>Social isolation</td>
</tr>
<tr>
<td>Feelings of hopelessness and/or worthlessness</td>
<td>Psychiatric illness and/or substance use during pregnancy</td>
</tr>
<tr>
<td>Drug/alcohol abuse/dependence</td>
<td>Antidepressant use</td>
</tr>
<tr>
<td></td>
<td>Psychiatric hospitalisation</td>
</tr>
</tbody>
</table>
Risk factors for suicide

– Older men with SUDs are at greater risk for nonfatal attempts and for death by suicide than are younger persons (Conner, Beautrais & Conwell, 2003; Darke & Ross, 2002).

– Past suicide attempts are a strong risk factor for subsequent suicidal behaviours in those with SUDs (Ilgen, Harris, Moos & Tiet, 2007).

– Depressed mood is a risk factor for suicidal behaviours in the general population and also predicts a greater likelihood of suicide in those with alcohol or drug use disorders (Harris & Barraclough, 1997; Ilgen et al., 2007; Conner et al., 2003).
Risk factors for suicide

– Link between depression and suicidal behaviours in those with SUDs may be particularly strong given the high comorbidity between mood and SUDs (Conner, Pinquart & Gamble, 2009).

– Although it has not been examined thoroughly, independent mood disorders and substance-induced mood disorders are likely to confer risk for suicide.
Risk factors for suicide

• Emerging research suggests some individuals with particular types of substance use and abuse may be more likely to engage in suicidal behaviours.
  – Those who use opiates, cocaine, and sedatives may have a noticeably higher risk of suicide than those who use other drugs (Ilgen et al., 2007; Maloney, Degenhardt & Darke, 2007; Darke, Ross, Lynskey & Teesson, 2004; Wines et al, 2004).
  – Among those with an alcohol use disorder, a greater severity of recent drinking is associated with the greater likelihood of suicide attempt and suicide mortality (Cornelius, 1996; Murphy, Wetzel, Robins & McEvoy, 1992).
  – Co-occurring alcohol and drug use disorders may be particularly strong indicators of increased risk of suicide (Preuss et al., 2002).
Risk factors for suicide

• Therefore, the severity of substance use disorders (ie. a greater number of substances or misuse of more than 1 substance) may predict a greater likelihood of suicide.

• Engaging in violent behaviour is a potentially important risk factor for suicide in substance abusers.

• Up to 75% of those who begin substance use treatment report having engaged in violent behaviour (eg. physical assault, mugging, attacking others with a weapon) (Burnette, 2008; Chermack et al., 2008).
Risk factors for suicide

• Emerging research also indicates that violence may partially account for the connection between substance abuse and suicide risk.

• In those seeking substance use treatment, perception that they have difficulty in controlling their own violent behaviour found to be associated with a greater likelihood of a prior suicide attempt (Tiet et al., 2006).

• Therefore, individuals who have difficulty in controlling their anger may be more likely to act impulsively, thus turning the violence on themselves rather than on others (Tiet et al., 2006).
Risk factors for suicide

- Those with alcohol use disorders and prior aggressive behaviour more likely to report suicidal thoughts or past suicide attempts (Ilgen et al., 2010; Koller et al., 2002).

- Study of over 6000 adults in substance use treatment found those who had committed serious violent acts (eg, rape, murder, assault resulting in serious injury) more than twice as likely to report multiple suicide attempts. This finding held true even after statistically controlling for demographic characteristics, depression, and past victimization (Ilgen, 2010).

- Another study comparing accident victims with individuals who completed suicide, found violent behaviour in last year of life linked to higher likelihood of suicide, even when controlling for alcohol use disorders and other potential suicide risk factors (Conner et al., 2001).
Several important clinical implications for mental health treatment providers.

In all settings, it is important to incorporate questions about violent behaviour and substance abuse into broader assessments of suicide risk.

Clients who report a combination of past suicide attempts and/or serious plans of suicide, depression, significant substance misuse, and episodes of interpersonal violence are at significantly elevated risk for future suicidal behaviors.

Treatment that focuses on only 1 of these domains (eg. depression) may not be optimally effective.
Treatment strategies

• Important to develop a strategy that directly addresses each of the presenting and underlying problems and contains specific steps for managing an acute suicidal crisis.

• Important to work within an interdisciplinary team (IDT) as medications may be indicated (both for addictive disorder and/or mental health disorders).

• Where indicated, make referrals to specialty addiction treatment facilities.

• Also consider anger management therapy or couple’s behavioural therapy designed to address aggressive behaviours and to improve interpersonal problem solving and communication for violent clients.
Protective factors

• Good communication with family

• Problem-solving confidence

• Social connectedness

• Locus of control

• Reasons for living
Management plan

• Before deciding upon the most appropriate treatment, management plan should address the person's immediate safety, in the context of establishing a therapeutic relationship.

• As part of the development of a safety plan, a decision needs to be made as to whether hospitalisation is required, or if the person can utilise existing support networks, such as family and friends, in carrying out their safety plan.
Management plan

• A comprehensive safety plan should cover the following steps:

  – The person's early warning signs
  – Coping strategies the person could try to feel better
  – People and social settings that provide a distraction
  – People who can be contacted for help
  – Professionals or agencies the person can contact for help
  – How the person can make the environment safe
Treatment strategies

- Evidence limited on effectiveness of interventions, a large, randomized, controlled trial found that CBT significantly decreased the likelihood of suicidal behaviours over 18 months of follow-up (Brown et al., 2005).

- Modified version of CBT that focuses specifically on suicidal behaviours for those with substance use disorders has been developed.

- Although the evaluation is ongoing, clients appear to appreciate the opportunity to discuss the links between their substance abuse, prior impulsive behaviours, and suicide attempts (Ilgen & Kleinberg, 2011).

- Even without a specific CBT approach, the therapeutic relationship can benefit from a direct discussion of the client’s perception of the connections between his or her substance abuse, tendency to become violent with others, and prior suicide attempts.
John’s story – age 45: Treatment case study

• John is 45 years old, unemployed, and undergoing court-ordered residential (therapeutic community) treatment for drug dependence following his arrest for drug possession.

• He reports that he began drinking heavily and using amphetamines and marijuana on a regular basis during his late teens. He also reports experiencing frequent “up and down” moods that coincide with his drug use. He has been in numerous romantic relationships, many of which involved physical and verbal altercations.
Treatment intervention: case study

• John has undertaken (short-term) residential treatment in the past. On one occasion, he left treatment early; he has also completed treatment twice, only to relapse within a week. He has made 2 suicide attempts.

• In previous treatment, he mentioned his suicide attempts, but the response was either focused on his safety (eg. assigning him a “buddy” to accompany him to the toilet) or an antidepressant or mood stabilizer was prescribed.
Treatment intervention: case study

- A detailed history of earlier suicide attempts taken and identification of John’s perceived link between substance abuse, feelings of frustration or anger, and suicidal thoughts and behaviours.

- Much of this focused on helping John to conceptualize suicidal thoughts as something that he could manage and that did not require him to take action.

- 8 sessions of CBT (2 sessions a week for 4 weeks) for suicidal thoughts and behaviours included as part of the residential drug treatment program.
Treatment intervention: case study

- John was able to develop a detailed list of steps that he could take to keep himself safe when feeling suicidal. John and his psychologist also discussed reasons to be hopeful and ways that he could remember these reasons post-treatment.

- Final CBT sessions involved an imaginary exposure exercise during which John was asked to recall his most recent suicide attempt and then envision himself seeking help before making the attempt.
Treatment intervention: case study

- Overall, John reportedly appreciated the intervention, and described the focus on his suicidal behaviour as unique and helpful.

- The relative safety and stability of a residential treatment facility allowed the focus directly on content related to suicidal thoughts, plans, and suicide attempts.

- John remained for the duration of the residential program (4 months) and was referred to aftercare.
Jane’s story – age 55

• Jane has been in the Public Service for 30 years – since leaving university as a graduate and gaining entrance to the Graduate Program.

• She has had a number of different appointments and in different government departments, but has been in Foreign Affairs for the past 25 years.

• Jane has had a number of overseas appointments, and on one of her early appointments to the UK met and married William, with whom she has 2 children – Kim aged 20 years and Brad aged 18 years. William and Jane divorced 10 years ago.
Jane’s story – age 55

• Jane first started drinking at university and admits that it was ‘out of control’ for a bit. For a while it was OK, but increased again with the many cocktail parties and events she was required to attend with Foreign Affairs. After her divorce her drinking increased once again.

• Jane now drinks 1-2 bottles of wine daily. She keeps a bottle in her car and pops down to the car park during work.

• It has now come to the attention of her supervisor.
Jane: Treatment considerations

- Jane has been referred through ATAPS

- Number of sessions available

- Is there a need for detoxification?
  - Chronic alcohol consumption leads to tolerance through adaptation of receptor systems – decrease in activity of GABA, increase in activity of glutamate and reduction in release of endorphins and dopamine.
  - When alcohol use is abruptly stopped, neurons become over-excitable as the adaptive changes are no longer counteracted by alcohol.
Jane: Treatment considerations

- Alcohol withdrawal syndrome
  - Minor withdrawal – symptoms subside within a week
  - Withdrawal seizures (about 15% cases)
  - Major withdrawal (delirium tremens) (5%)
  - Protracted withdrawal – some symptoms persist for weeks or months
  - Anxiety, irritability, hostility, depression, insomnia, fatigue, craving

- Negative reinforcement – self-treatment with alcohol relieves withdrawal.
Jane: Treatment considerations

- Key issues in treatment of alcohol dependence
  - Patient’s stage of change
  - Management of withdrawal
  - Referral to specialist alcohol treatment units
  - Use of pharmacological treatments – Naltrexone, Acamprosate (Campral), Disulfiram (Antabuse)
  - Use of behavioural treatments
  - Monitoring and follow-up

➢ Consider the possible need for residential treatment – important to find out about services in your area, and further afield if need be. Sometimes this is seen as desirable – but balance this with importance of building positive supports in local community and amongst family and friends.
Questions and Discussion
References


Upon closing…

• Please feel free to contact: **Bella Saunders** ([b.saunders@psychology.org.au](mailto:b.saunders@psychology.org.au)) or **Margie Crea** ([m.crea@psychology.org.au](mailto:m.crea@psychology.org.au)) at the APS.

• Two more webinars are scheduled – please contact us if you would like more information.

• A recording of the webinar will be emailed to you and also be available on the APS website in the near future.

• Please complete the Exit Survey – your feedback is appreciated.

• Thank-you for your participation and we hope you enjoyed it!