

## **CHAPTER 1: LITERATURE REVIEW**

### **1.1 Introduction**

Suicide is “a self-inflicted death in which one makes an intentional, direct and conscious effort to end one’s life” (Comer, 1995, p. 345). In considering suicide, attention must be directed to suicide ideation. Suicide ideation generally exists prior to suicide, although not all suicide ideation leads to attempted or completed suicide.

Suicide ideation refers to current plans and wishes to commit suicide in the absence of any recent overt suicide attempts (Ranieri, Steer, Lavrence, Rissmiller, Piper and Beck, 1987). Beck, Steer, and Ranieri (1988) define the suicide ideator to be “the individual at the earliest stage of suicidal risk” (p. 968). Thus any investigation of suicidality must logically be extended to include suicide ideation as well.

It is reported that every year approximately 30,000 people die by suicide in the United States, and one million world-wide. It is the third leading cause of death among American youths (Kaplan & Sadock, 1997). The current status of suicide among South African adolescents and young adults is not well documented. However, researchers agree that suicide among the youth is on the increase in South Africa as well. One possible factor, which may help identify individuals with high levels of negative suicide ideation, could be the type of coping strategies that are displayed.

Considering the magnitude of the problem of suicide, treatment and prevention is essential. The focus of the following study is on prevention specifically. A number of prevention programs have been explored to reduce the incidence of suicide and

suicidal behaviours. At multiple levels (universal, selective, and indicated) interventions attempt to address risk factors and to enhance protective factors. Programs that integrate prevention at multiple levels are likely to be the most effective (Garland, Shaffer, Whittle, 1989).

While there are several promising programs that have been implemented, long term assessments and vigorous evaluation of their effectiveness are unavailable. Furthermore, some programs may work only in certain populations under certain circumstances; it is not yet evident whether these programs can be generalised to other populations or what characteristics of the programs are broadly applicable.

Comprehensive school-based programs have shown some success in reducing suicidality. Screening programs, support and skills training groups and school based crisis response teams can create a co-ordinated effort that identifies youth at risk for suicide and provides individual follow-up. If done appropriately, these interventions can provide the skills that allow young people to cope effectively with their life stresses (Mazza, 1997).

The present study aims to look at changes in coping strategies based on a suicide prevention program conducted by the South African Depression and Anxiety Group.

Edwin Schneidman (cited in Kaplan and Sadock, 1998) defines suicide as “the conscious act of self-induced annihilation, best understood as a multidimensional malaise in a needful individual who defines an issue for which the act is perceived as the best solution” (p. 864).

World wide, over one million people commit suicide every year (WHO, 1999b). Suicide is a very complex act. It is not merely a simple, isolated, incidental act of compulsion. It is a death in which the murderer and the murdered are combined into one person (Menninger, 1933).

## **1.2 Suicide Behaviour**

Suicide is the taking of one's own life. It is a universal concept and happens all over the world. Ahrens, Linden, Zaske and Berzewski (2000) define suicidal behaviour as ranging from feeling that life is not worth living to thoughts of suicide and suicidal acts.

According to Durkheim (as cited in Williams, 1997) there are three types of suicide. In other words three categories, which reflect a breakdown in the relationship between the individual and society. Egoistic suicide incorporates the notion that an individual has no concern for their community and no interest in being involved in it. There is a lack of meaningful social interactions and therefore a low level of social integration, as exemplified in urban areas, as opposed to rural areas. Madu and Matla (2003) studied the prevalence of suicidal behaviours among secondary school adolescents in the Limpopo province and found that rates of attempted suicide were highest in urban areas. This fits with the above theory as urban areas and townships are known for low adherence to cultural and traditional values. This causes acculturation, which is the breakdown of family ties and an increase in social misconduct, leading to egoistic suicide. However, this study found no significant relationship between place of residence and plans to commit suicide or attempted suicide. In systems (families)

where the boundaries between the system and the surrounding community are impervious, the family becomes isolated from the social environment in which they exist (Barker, 1992). This has potentially negative effects on the adolescent, who is struggling to develop an independent autonomy.

Altruistic suicide is when society has a strict hold over the individual, giving the person too little individualism. In this situation the family system has highly permeable boundaries, making the family and the individuals within the family highly susceptible to events and changes within their wider social environment (Barker, 1992). In both of the above-mentioned cases, the adolescent may have trouble disengaging from the family and developing an independent identity because of either too much or too little influence from the wider social environment.

Durkheim defined Anomic suicide as a self-annihilation triggered by a person's inability to cope with sudden and unfavourable change in a social situation (Davison & Neale, 2001). Anomic suicide includes a situation where an individual is socially isolated from significant others. This may occur for reasons including changes in family structures and reduced employment opportunity. The individual does not benefit from societal normative restraints because they no longer participate in society. Although the above are sociological explanations for suicide, they correlate with the reasons and risk factors for suicidal behaviour. The above explanations show how the boundaries between the family system and the wider social environment pose challenges to the adolescent living within the family, in terms of building a healthy autonomous identity and disengaging from the family, in order to become an independent individual. The challenges these adolescents face, within the above-

mentioned scenarios, often result in feelings of hopelessness and helplessness, associated with depression, which in turn is associated with suicidal behaviour, including suicide ideation.

A study by Huff (1999) identified factors that related to adolescent stress and predicted suicide ideation in these individuals. These factors included depression, family disruption, poor grades and drug and alcohol abuse. These findings are consistent with theory that speaks about the individual being interconnected with their environment and it is a combination of many internal and external factors that bring about stress for the developing adolescent.

Although the link between hopelessness, depression and suicide has been stressed above, it is important to be aware, that the common psychological assumption that depression causes suicide, is more complex than this one-to-one association.

Zhang and Jin (1996) speak about a model that integrates individual characteristics (depression and attitudes toward suicide) and social structural characteristics (including gender and family cohesion). This model assumes that suicide ideation is an individual behaviour that is influenced by social structure, both directly and indirectly through individual attitudes and behaviours. Suicide ideation is predicted simultaneously by the two characteristics mentioned above. A theoretical model such as this fits quite well with Durkheim's explanations of suicide, involving the individual within a society or community. De Man, Labreche-Gauthier and Leduc (1991, as cited in De Man and Leduc, 1993) found that adolescents from controlling backgrounds reported low levels of self-esteem and high levels of stress, depression and anomie. In a later study by De Man and Leduc (1993) they found that suicide

ideation among adolescents was positively related to depression, negative stress, and drug and alcohol abuse and negatively related to self-esteem, satisfaction with social support and school absenteeism. It is evident that risk factors leading to suicide ideation and ultimately suicide, take the form of both individual and environmental factors. It is impossible to isolate one group of factors. The risk factors for suicide ideation among adolescents must rather be seen as an interplay of many factors within different areas.

### **1.3 Attempted Suicide and Parasuicide**

Attempted suicide refers to the failed attempt to take one's life. It is the intention of the individual to take their own life, but for whatever reason, the attempt fails. This differs from parasuicide, which is distress behaviour (Pillay and Schlebusch, 1987). It is a cry for help. The individual intends to inflict self-harm upon themselves without fatal injuries. It has been found by MacLeod, Pankhania, Lee and Mitchell (1997, as cited in O'Connor, Connery and Cheyne, 2000) that individuals who engage in deliberate self-harm irrespective of intention are impaired in their ability to generate positive future thoughts, when compared to controls drawn from either hospital or non-hospital settings. MacLeod (1992, as cited in Williams and Pollock, 1993) found that while both parasuicide and completed suicide are related to depressive experiences, they differ to the degree of anger expressed. Parasuicide is related to the experience of anger, whereas suicide is more related to giving up. Suicidal people are often poor at solving interpersonal problems. Hopelessness mediates the relationship between depression and suicidal intent within a parasuicide population. Hopelessness has also been found to predict repetition of parasuicide six months later. These results

indicate that it is a different population that would commit suicide to those that would commit a parasuicide.

According to Runeson (2002) the notion that parasuicide and suicide involve different populations have been found to be inaccurate. He states that parasuicide can be a predictor of suicide and that the risk persists without decline for two decades.

Williams and Pollock (1993) state that parasuicide is assumed to be an attempt to communicate, to manipulate or influence others or to die (suicide attempt). They argue that there are other possible motivations behind a parasuicide, such as mood regulation. In other words each case needs to be individually assessed. The only way anyone can really know if suicidal behaviour is in fact a suicide attempt or a parasuicide is by asking the individual. Hence it is difficult to determine the difference between a suicide attempt and a parasuicide without honest answers from the individual. The important point to note is that recent research has shown that parasuicide is a risk factor for actual suicide and both attempted suicides and parasuicides should be given equal attention.

#### **1.4 Prevalence of Adolescent Suicide**

In many studies suicide is quoted as a leading cause of death among adolescents in the United States. (Kaplan, Feinstein, Fisher, Klein and Olmedo, 2000; Paluszny and Davenport, 1991; Zhang and Jin, 1996). During the past forty years the suicide rate among young people aged between 15 and 24 years in the United States has tripled, while the overall United States population suicide rate has remained stable (Barrios, Everett, Simon and Brener, 2000). In Australia, Frydenburg (1997) states an increase in adolescent suicide in the 15 - 19 age group. In South Africa there exists

very little research regarding suicide ideation in adolescents, yet we increasingly hear of suicide amongst adolescents in this country. Figures gathered in 1994 show that in the 15 - 24 age group approximately 8 South Africans (Whites and Indians) per 100,000 commit suicide each year (Wassenaar and Naidoo, 1995). Due to the political situation that existed in South Africa there are no reliable reports of suicide among black or coloured adolescents at that time. Teenage suicidal behaviour in South Africa is definitely on the increase (Tshabalala-Msimang, 2003), with an increase of 48 percent in the last ten years (Schlebusch, as cited in Kantiyi, 2003). Shaffer (1986) points out that the stigma attached to suicide and the complex procedures that lead up to certification may lead to systematic misreporting, especially in the case of children and adolescents. This means that the figures that are reported as suicide rates are merely an indication and that the actual figures are probably higher.

The prevalence of suicide and more specifically adolescent suicide within South Africa is high and is increasing at an alarming rate. As pointed out by Peirson (2001) any investigation into suicidal behaviour must be extended to suicide ideation as well. It is therefore extremely important that research is conducted to gain a better understanding of adolescent suicide ideation and factors that impact upon it.

### **1.5 Suicide in South Africa**

According to the World Health Organization, a suicide occurs every forty seconds. In South Africa, suicide accounts for approximately 8% of all deaths. The average suicide rate is 17.2 per 100 000 deaths, but the actual figure is thought to be higher. The suicide rate for children aged between ten and fourteen years old has doubled over the last fifteen years (Depression and Anxiety support Group, 2003b). World



Health Organisation figures show that for those who commit suicide in South Africa, 43 percent are Black, 38 percent are White, 15 percent are Coloured and 2 percent are Indian (Kantiyi, 2003). Reliable figures for many areas in the country are unavailable, however suicide is on the increase. Dr Peter Jones (2003), Chairman of Council, International Institute of Traumatology in Johannesburg, says that because South Africa is a third world country with high unemployment and high HIV/Aids prevalence, its' suicide rate is neither high nor unduly unexpected. South Africa is placed thirteenth out of the top twenty countries' national suicide rates and falls well behind countries such as Hungary (45.3 suicides per 100 000), Germany (43.1 suicides per 100 000), Denmark (27.8 suicides per 100 000) and Switzerland (23.8 suicides per 100 000). South Africa is a country with diverse cultures, beliefs and languages. It has a history of Apartheid and violent atrocities. The economics include areas of extreme wealth and others in dire poverty. Not everyone in the country has access to basic needs; running water, sanitation, electricity and housing. It is an interplay of these social, political and economic factors that impact upon the lives of adolescents living in this country and play a role in stress, depression, feelings of hopelessness, helplessness and possible suicide ideation. .

### **1.6 Adolescent Suicide in South Africa**

In a study by Wassenaar and Naidoo (1995) it was concluded that different cultural groups within South Africa have different suicide patterns with regard to gender, risk age and method. They compared White and Indian suicide rates in a Pietermaritzburg, Kwa-Zulu Natal sample compared to a South African sample and found both Indian males and females had higher suicide rates than White males and females in the 15 – 24 age group. Males scored higher than females in each group as well. These results

should be understood in the context that there is a higher concentration of Indian people in this area when compared to the country as a whole.

They also found that the peak risk age for both males and females was the 15 – 24 age group. Further results showed that White males and females use predominantly firearms, followed by carbon monoxide poisoning for males and jumping for females. Indian males used predominantly hanging, followed by firearms and females used ingestion followed by hanging as preferred methods. Meel (2003) found an increasing incidence of deaths due to hanging in the Transkei, a former black homeland in South Africa. Half of the deaths (51%) due to hanging were young adults, between 16 and 30 years of age, while 13% were adolescents younger than fifteen years. In the Limpopo province, Madu and Matla (2003) found the most frequent methods used for attempting suicide was self-poisoning (44%), followed by drug overdoses (25.3%) and hanging (22%). These findings were for adolescents aged between 15 and 19 years. There was a higher incidence of male attempted suicide (25%) than female (18%).

A study by Laubscher (2003) looked at the dramatic increase in suicides among young Coloured men living in Paarl, a South African town in the Western cape. This study reads suicide as a cultural phenomenon within a post-apartheid context. The men were between 25 and 35 years of age, were first generation university graduates from working class backgrounds. Although the author does not give exact incidences of methods used, he mentions the following in this order; shooting, gassing, hanging and slitting of the wrists.

Suicide in South Africa is therefore increasing at alarming rates within all cultural groups and appears to be determined by gender, age and method used. It is therefore vitally important to understand the role that gender plays in this regard, among adolescents, which seem to be the age group most at risk.

### **1.7 Suicide Ideation**

Suicide ideation refers to current plans and wishes to commit suicide in the absence of any recent overt suicide attempt (Ranieri, Steer, Lavrence, Rissmiller, Piper, and Beck, 1987). Ranieri and colleagues (1987) explain that suicide ideation logically precedes a suicide attempt or completed suicide. Suicide ideation does not, however, necessarily imply that suicide will be attempted or completed. Thus, in an investigation of suicidality, a focus on suicide ideation is an appropriate beginning.

During the past decade, suicidality among children and adolescents has received increasing attention. Despite the large body of literature on suicide, attempted suicide and deliberate self-harm, there are few studies on the frequency of suicide ideation in representative general population samples. Epidemiological surveys around the world show that 9% to 26% of adolescents report suicide ideation in some period of their lives (Garrison, Jackson, Addy, McKeon, & Walter, 1991; Kirmayer, Malus, Boothroyd, 1996; Lamb and Pusker, 1991; Martin, Rozanes, Pearce & Allison 1995; Olsson and von Knorring, 1997). The substantial discrepancies in the reported rates may be explained by considerable methodological differences in sampling procedures, age grouping, screening instruments, and time frames.

While a suicide attempt is an important clinical precursor of future completed suicide (Leenaars, 1996), suicidal ideation may be an antecedent for attempted suicide, with a variety of risk and protective factors intervening between them. In their efforts at early detection of vulnerability of adolescents to attempted suicide, many investigators have tried to determine clinical, behavioural and social factors predicting suicide ideation. The following predictors have been reported: high level of depression, low self-esteem, low psychological well being, elevated level of anger and poor anger control, deviancy and delinquency, low social support, family dysfunction, and undesirable life events (Gartrell, Jarvis & Derksen, 1993; Hirsch and Ellis, 1995; Hovey and King, 1996; Howard-Pitney, LaFromboise, Basil, September & Johnson, 1992; Martin, Rozanes, Pearce & Allison, 1995).

Suicidal ideation is typically investigated using multivariate models that include the following factors: family relationships, loneliness, anger, depression, and substance abuse (Jacobs, Brewer, & Klein, 1999). In a recent multivariate study of 120 adolescents, discriminant function analyses indicated that high levels of depression and anger expression predicted self-reported wish to die (Boergers, Spirito, & Donaldson, 1998). In a similar study of 374 high school students, social support and depression were significantly related to suicidal ideation levels one-year later (Mazza & Reynolds, 1998). The research regarding family relationships has generally focused on social support. Peer relationships have often been overlooked except for the use of loneliness as a variable. In one study, suicidal thinking was found to be related to greater loneliness (Martin, Rozanes, Pearce & Allison, 1995). In that study, as in many studies, depression was the strongest factor to emerge in the regression analyses. In fact, in one study, when the effect of depression was removed, the

relationships between suicidal ideation and other correlates weakened or disappeared (De Man, 1999). In longitudinal studies, depression has been found to be the most frequent predictor of subsequent suicidal ideation and attempts, with suicidal ideation and attempts, in turn, being predictors of subsequent depression (Fisher, 1999).

### **1.8 Suicide Ideation among Adolescents**

Children in South Africa commit suicide for a number of reasons. Risk factors include depression due to high levels of violence and family problems, alcohol and drug abuse and availability of firearms in the home. Extreme poverty, unemployment and HIV/Aids intensify the situation in certain areas of the country (Depression and Anxiety support group, 2003a). In a study with Indian adolescents, Pillay and Schlebush (1987) found that these adolescents found themselves in a conflict situation, having staunch cultural roots, but leaning toward a western way of life. The resultant stress was found to be closely associated with parasuicide. It has been found that generally Black people in South Africa find suicide unacceptable, irrespective of their sex, age, educational level or religious belief (Forster and Keen, 1988; Mayekiso, 1995). However, there has been an increase in the suicide rate among black South Africans (Levin, 1992; Mkize, 1992). Spangenberg and Henderson (2001) found that the intensity of stress experienced by Black South African adolescents, was higher than that experienced by other adolescents.

In a study conducted by Sacoor (1991) in Johannesburg, among black adolescent girls, it was found that feelings of low self worth, school difficulties, feelings of separation anxiety and inability to solve problems were all causes for attempted suicide.

Clearly adolescents are at high risk of attempting suicide and various factors would influence their level of suicide ideation before they would carry out an attempt.

Coping strategies may be one such of these factors. When adolescents do not cope effectively, depression may manifest and could lead to suicide ideation. Families like all systems, attempt to maintain balance. When faced with a stressor, the family uses its capacities, Internal and external resources and coping skills, to meet demands, Internal and external stressors (Berg-Cross, 2000). Ackerman (1984) says that adolescence is a common time for the onset of major mental illness. This is associated with the biological fragility of the adolescent combined with inevitable decreased involvement with the family. The family may not be able to comprehend adolescent ways and the loss of “emotional headquarters” can lead to breakdown (Ackerman, 1984, *p.* 132). At this time the adolescent may feel isolated from the family as the family does not understand the situation that the adolescent finds him/herself in. Due to this lack of understanding, the adolescent loses the family as a support system and at this time either increases or decreases the intensity of involvement with the family. As Frydenburg (1997) points out, those adolescents who use fewer problems solving, less positive reappraisal, more cognitive avoidance and resigned acceptance were more depressed and anxious. These adolescents would be more prone to suicide ideation. Kaplan *et al* (2000) include a history of depression, family disruption, abuse and alcohol as some of the risk factors involved in suicide attempts. Parental conflicts, school difficulties and social isolation are some of the precipitating factors.

In a study by Paulszny and Davenport (1991) it was found that the suicide ideation group had significantly more psychological problems than the control group and they

came from more chaotic families. These families often have high levels of stress and unpredictable events. Huff (1999) found that five of the ten highest ranked stressors for adolescents, involved conflict with parents and siblings. Family problems as well as developmental issues therefore play a significant role in the factors that lead to an adolescent having thoughts about suicide. Again it is important to look at the situation holistically and at the different life facets that play a role in the suicide ideation of adolescents, two of which are developmental issues, pertaining to the development of an identity and the family system.

Beautrias (2000) speaks about three categories of risk factors for suicide attempts in young people. The first is social and family. It was found that suicide is twice as high among low socio-economic individuals compared with those from advantaged backgrounds. Adolescents are more at risk if there is a family history of parental separation, physical and sexual abuse and impaired parent-child relationship. The second category incorporates the individual and personality. This includes the individual's genetic make-up and personality traits, which predispose the adolescent to suicide. The final category is mental health and includes affective mood disorder, substance abuse, anxiety disorders and psychosis.

In Australia, it was found that there was an increase in suicides among young people on Tiwi and Melville Islands, during a four-month period. At the same time there was an increase in alcohol usage in the area (Parker and Ben-Touim, 2002). Alcoholic subjects appear to experience a relatively high rate of suicide attempts (Preuss *et al*, 2003). These studies clearly show a direct link between alcohol abuse and suicide attempt. One can assume that suicide ideation was present prior to suicide attempt and deduce that alcohol can play a significant role in the presence of suicide ideation. If an

individual is having thoughts about taking their life they are less likely to worry about consuming large amounts of alcohol or the possible consequences that may result from the consumption of excessive amounts of alcohol.

The risk factors discussed above are general. In the following section the difference in risk factors between the genders will be discussed, to enable the reader to get a clearer idea of the risk factors which make females more likely to attempt suicide, but males more likely to succeed. However, as Pokomy (1983 as cited in Goldney, 1990, *p* 49) concluded, “we do not possess any item of information or any combination of items that permit us to identify to a useful degree the particular persons who will commit suicide”. One can therefore only rely on certain risk factors to give one an indication that a particular individual may be at risk of committing suicide.

High levels of negative suicide ideation, which manifest in adolescents, may do so for a number of reasons. These include family problems, social, political and economic problems or lack of functional coping strategies. It has been discussed above that adolescents who use more dysfunctional coping strategies are more prone to depression and therefore suicide ideation. It would be beneficial if caregivers could identify potential at-risk individuals through the coping strategies they display. It would therefore be important, for this purpose, to link different types of coping strategies with different levels of suicide ideation.

### **1.9 Suicide ideation and Gender**

It has already been suggested that suicidal ideation and suicidal behaviour is different for the genders – male or female. Vannatta (1996) identifies males as four times more



likely to complete suicide than females. Langhinrichsen-Rohling, Lewinsohn, Rohde, Seeley, Monson, Meyer and Langford (1998) report that the suicide rate for males in 1992 was 21.9 per 100,000 compared to a female rate of 3.7 per 100,000. This was despite the fact that females are more likely to report suicide attempts. According to Canetto (1997), “between 1970 and 1980, the suicide mortality rates for females ages 15 to 24 showed a slight increase, while the suicide mortality rates for males of the same age group increased by 50%” (p. 341). Yet females are three times as likely to engage in nonfatal suicidal behaviour (Canetto, 1997).

Canetto (1997) explores the epidemiology of suicidal behaviour, establishing that a higher percentage of females than males (23.7% and 14.8%, respectively) engage in suicidal ideation and that females are three times more likely to be non-fatally suicidal.

Gender differences have also been noted for the relationships between depression, substance use, and suicidality. In their model of adolescent suicide risk, Mazza and Reynolds (1998) reported that males progressed from depression to substance use and then to suicide risk, while females progressed directly from depression to suicide risk. Similarly, in a longitudinal study across a 21 year period (1970 to 1990), detailed analyses of a random sample of 80 psychiatric patients showed that suicidal behaviour increased significantly among male adolescents only, and substance misuse correlated with that increase over time. The rates of both suicidal behaviour and substance misuse almost doubled across those years.

Langhinrichsen-Rohling, et al. (1998) sought to assess the gender differences in suicidal youth by assessing how they engaged in behaviours that were defined as either life enhancing or life diminishing. The reasoning behind the study was that “overtly suicidal behaviour has been directly associated with a broad range of other potentially self-destructive and life-threatening behaviours” (p. 840). Theoretically then, promoting life-enhancing behaviours and reducing life-threatening ones can prevent suicide. Their results indicated that males engage in more risk taking behaviours. The results are also compatible with males’ higher suicide rates. It is also suggested that since females report more depression, using depression as an indicator of suicidality may be more appropriate in cases of females than males. Thus, they suggest that support and prevention programs for suicidal individuals may need to be gender specific.

### **1.10 Suicide Intervention**

Thus far, the following review has focused heavily on the high risk factors in adolescents in terms of suicidal ideation and suicidal behaviour. The reason being that high risk factors contribute to the type of intervention that will be implemented.

As suicidal behaviour is an important health responsibility and suicide is irreversible, early detection and successful intervention is fundamental. Effective preventative measures and efforts to decrease its prevalence and incidence depend significantly on early identification of high risk individuals and appropriate and effective treatment strategies (Deonarain & Pillay, 2000). These measures should be vastly more effective when social support or connectedness is increased and when social isolation is decreased (Sue, Sue & Sue 2000). Schlebusch (1992) believes that this can occur if

there is a reduction in the myths around suicidal behaviour, a possibility for suicidal patients to seek help and the education of other professions likely to become involved in cases of suicidal behaviour such as educators.

Many of these types of programs have been implemented. They include curriculum-based programs in which people are educated about suicide and information on how to handle life stresses is provided. Telephone hotlines and other crisis intervention services also seem to be useful (Davison & Neale, 2001). Crisis intervention is aimed at providing intensive short-term help to a patient in resolving an immediate life crisis. It recognises the immediacy of the patient's state of mind (Deonarain, Pillay, 2000).

### **1.11 The Issue of Prevention**

Three general classes of prevention strategies have been identified: (Mazza, 1997)

“Universal” prevention strategies are targeted at the entire population. This blanket approach increases the likelihood that all at-risk persons will be “innoculated” by the prevention activity, but on a mass level it is difficult to control how much “prevention dose” each subject receives. The mass approach may also be more expensive than the alternatives. Any prevention strategy should clearly outweigh the costs and risks of implementing that strategy. This requirement is true for all three types of prevention strategies, but the burden of showing this positive balance is greatest for the “universal” group, because the costs are often high and the risks are often ignored.

“Selective” prevention strategies target specific subgroups that are known or thought to be at elevated risk for suicidal ideation. “Selective” strategies tend to address the risk factor(s) defining the subgroup at risk, directly or indirectly. A direct strategy might involve intervening to lower depression severity for a subgroup of youth that qualified for a diagnosis of major depression. An indirect strategy might involve offering support and education to those who are thought to be at high risk.

“Indicated” prevention strategies target individuals known or suspected to be high risk for suicide. This approach presumes that tools exist for identifying individuals at high risk with good sensitivity and specificity.

### **1.12 School-based Suicide Prevention**

The school is a logical sight for instituting preventative models to address public health problems of youth: student attention is held relatively captive, teaching and learning are normative tasks, and peer interaction can be mobilised around a common theme (Berman and Jobes, 1991). The goals of school based suicide prevention programs are to: increase awareness, promote identification of students at high risk of suicide and suicide attempts, provide information to students, teachers and parents on the availability of mental health resources, and enhance the coping abilities of teenagers (Zenere and Lazarus, 1997). The School based programs are the most efficient means for reaching the greatest number of at-risk adolescents (Mazza, 1997). However, it is yet to be established that the focus of changing attitudes and knowledge and the attempt to impact skill building in relatively short periods of training can impact on the ultimate goal of these models – decreasing the incidence of suicidal behaviour (Berman and Jobes, 1991).

### **1.13 The Issue of Effective Programs**

A critical review of the scientific literature reveals two major handicaps facing all that design, test or implement youth suicide prevention programs. There is a lack of empirical suicide prevention trials, and there is a lack of empirical suicide treatment trials to guide our planning. These problems are not unique to the field of youth suicide prevention. The same can be said about the status of knowledge about suicide prevention and treatment for all other age groups.

Is there any evidence that school-based youth suicide prevention programs are effective? Do good intentions and professional input guarantee that the programs are safe? Since the great majority of adolescents never make a suicide attempt in their entire lifetime, can existing suicide prevention programs educate the low-risk majority and “inoculate” the high-risk minority in one swoop?

Garland and her colleagues (1989) examined survey response data characterising 115 youth suicide prevention programs with experience implementing school-based prevention curricula. Programs were identified in 34 states and the District of Columbia. On average, the programs had been in place for five years. The typical program reached 17 schools encompassing 1700 students during the 1986-87 school year. Forty-four percent of the programs were offered to children from elementary school all the way through to high school; 98% were offered to high school students. 89% offered some form of training or education to school staff, and 71% included a program for parents. While most of the programs spent only one hour of direct contact time with students, 34% spent more than two hours.

Most programs covered facts about suicide, warning signs of suicide, mental health resources available to the students, and techniques for getting a troubled student in touch with help. The great majority of programs (95%) reported that their theoretical approach was patterned after the “stress model”, wherein, “Suicide is seen as a response to extreme stress, to which everyone is vulnerable” (Shaffer & Craft, 1999). Only four percent subscribed to the view that suicide is typically a consequence of a mental disorder. The investigators warned that the prevailing assumptions (all youth are at risk for suicide and suicide is a result of overwhelming stress) are not supported well by available scientific evidence. Suicide rarely occurs in the absence of a documented psychiatric illness. In 1997, Mazza conducted an extensive review of the effectiveness of eleven school-based suicide prevention programs. The main goals of the reviewed programs were suicidal behaviour education and identification of peers who may be at risk for suicide. Mazza (1997) believed that the prevention programs might have shown limited effectiveness because they targeted all students regardless of their previous behaviour or current risk status rather than directing efforts toward those most at risk for suicide. Furthermore, there is particular concern because several reports, cited in Mazza (1997), have documented that adolescents who were at the greatest risk for future suicidal behaviour showed increased levels of hopelessness, more maladaptive coping strategies and less evaluative skills after the prevention programs were implemented. The implication is that the content focus of school-based suicide education programs should be on the nature of major psychiatric disorders associated with a risk for suicidal behaviour and ways to access appropriate quality mental health treatment, rather than a specialised focus on suicide thinking or behaviour per se.

Referring to evidence from other studies, Garland and colleagues (1989) argue that high school students who have not been exposed to prevention programs already know about suicide warning signs and have “very reasonable and favourable attitudes about seeking help for suicide-related problems”. The authors endorse efforts to educate and train school staff because the positive effects of these activities have been documented.

Garland and colleagues (1989) suggest that instead of continuing to devote so many resources to prevention programs that do not yet reach one percent of the US high school population, it would be wiser to focus prevention efforts on youngsters known to be elevated risk for suicide: those struggling under the influence of mental disorders (e.g. major depression, alcohol or drug abuse, schizophrenia), those who have made suicide attempts before, and those recently exposed to a model of suicide. It is feasible to identify a large proportion of these high-risk individuals and tailor prevention efforts to their unique situations.

The authors conclude by recommending that school-based suicide prevention programs focus their efforts in three areas: (a) Institute systematic psychological screening procedures to identify adolescents with symptoms including suicide ideation; (b) teach adolescents how to recognise psychiatric symptoms in themselves; (c) change attitudes by encouraging adolescents to be more receptive to the ideas of seeking help from adults.

Findings by Shaffer et al. (1990) suggest that purely educational programs are not appropriate for identifying and reaching high-risk adolescents, show limited effectiveness in changing pathological attitudes among the small number of high-risk students who may be targeted by these programs, and may have untoward effects in not-at-risk students. Consistent with other data, these results suggested that techniques combining more efficient case identification of (treated or untreated) high-risk potential youth suicides with individualised evaluation and intervention would be most beneficial (Shaffer et al, 1990).

Zenere and Lazarus (1997) recently reported that a school district wide suicide prevention and school crisis management program provided for five years to the fourth largest public school system in the United States (Dade County, Florida) had a positive influence on suicide death rates and suicide attempt rates over time. In the absence of any meaningful comparison group, however, it is difficult to accept the premise that the program had a direct impact on suicidal behaviour. Other changes (e.g. accessibility or quality of health care, alcohol/drug use patterns) occurring in the county during the same period may account better or more directly for the decline in suicidal behaviour.

A more recent review by Shaffer and Craft (1999) argues forcefully for the effectiveness of in-school self-administered screening programs. It involves systematic screening for the predictors of suicide in general high school populations. As a strategy for identifying teenagers at greater risk for suicide, Shaffer writes that the careful employment of such a method would be both efficient and cost effective. The adoption of such a strategy would likely involve the use of in-school



professionals and requires a robust relationship with community-based mental health and substance abuse services.

#### **1.14 Suicide Prevention in South Africa**

In South Africa, very little research has been done with regard to the effectiveness of suicide prevention programs. The obvious reason for this may be that very few prevention programs have been implemented due to a lack of resources and funds thus, few evaluations have been carried out. Hotlines, e.g. lifeline, are the common form of intervention in South Africa whereby crisis intervention is given to suicidal individuals by trained counsellors. However, in response to the increasing number of suicides amongst South African teens and young adults, the South African Depression and Anxiety Support Group launched a Depression and Suicide Prevention Program in February 2001. This program has been used in several high schools and is one of the first of its kind in South Africa.

#### **1.15 The South African Depression and Anxiety Group's Prevention Program**

In response to the increasing number of suicides among South African adolescents and young adults, the South African Depression and Anxiety Support Group launched a suicide prevention program, which focuses exclusively on adolescents and school talks. This program has several goals. These include raising awareness of the causes and appropriate treatment for depression and suicide; improving recognition, diagnosis and treatment for suicidal individuals, improving understanding of compliance and adequate length of therapy and ultimately reducing the number of suicides and suicide attempts in the South African context.

In view of the history of suicide prevention programs and the information available as to their effectiveness, certain approaches to preventing and treating youth suicidal behaviour are suggested. And, while applications pertaining to the following topics are encouraged, these topics should be considered illustrative, and not restrictive. Programs designed specifically to screen for suicide risk factors and establish a comprehensive referral and follow-up system for youth at continued risk as those who suffer from severe mental illness, including schizophrenia, major depression and bipolar disorders, obsessive-compulsive disorder, conduct disorder, as well as behaviour disturbances, and substance abuse are needed.

A number of school-based suicide awareness and post-intervention efforts have been developed, but few are adequately evaluated to determine their effectiveness. The development and testing of theory driven, school-based preventative interventions for depression and substance abuse, with suicidality as a key outcome, are needed. Programs that incorporate measures of suicidality in school-based interventions designed to reduce violence and aggressive behaviour would add to the knowledge base of effective treatments for suicidality in youth.

### **1.16 Current Perspectives on Coping**

There are many definitions of coping. At the most general level, coping includes all responses to stressful events or episodes. The most widely cited definition is that of Lazarus and Folkman (1984, as cited in Compas, Connor-Smith, Saltzman, Thomsen, Wadsworth, 2001, p 88) who define coping as “constantly changing cognitive and behavioural efforts to manage specific external and/or Internal demands that are appraised as taxing or exceeding the resources of the person”. Coping is therefore a

process that includes an interaction between the situation and the person (Frydenburg, 1997; Latack and Havlovic, 1992). Coping processes are conscious and intentional and function to diminish stress (Somerfield and McCrae, 2000). However, coping may also occur when there appears to be no experience of strain or difficulty.

According to Newton (1989) an individual may employ coping behaviours whether a demand is appraised as stressful or not. Hence, some coping may be routine and a “successful copier” may be an individual who accurately diagnoses when a particular coping approach will be effective (p 449). Skinner’s (1995, as cited in Compas *et al*, 2001) definition differs from those mentioned above. It includes volitional and automatic responses to manage perceived threats. In other words, coping strategies do not always need to be conscious and intentional. They sometimes happen automatically. This is the definition that will be adopted throughout this study.

### **1.17 Coping Strategies**

Coping strategies are thought to be “complex and dynamic, changing in response to their effects on the environment” (Aldwin, 1994, p 110). Coping would therefore seem to be a combination of individual and environmental factors. The factors influencing coping would include developmental factors such as the development of an individual’s identity, together with the relationship that exists between the individual and the family, within the community in which that individual lives.

According to Folkman and Lazarus (1980, as cited in Folkman, Lazarus, Dunkel-Schetter, DeLongis and Gruen, 1986) coping has two major functions. Firstly, *emotion-focused coping*, which includes the regulation or reduction of the emotional

distress associated with the situation and secondly *problem-focused coping*, which includes doing something or solving the problem to alter the source of stress.

According to Lazarus (2000) these two coping functions cannot be separated, as both strategies are interdependent and work together, supplementing each other in the overall coping process.

Folkman and Lazarus (1985) found that problem-focused coping is used more frequently in situations that are appraised by the individual as being changeable, while emotion-focused coping is used more in situations that are appraised as unchangeable. This assumes that an individual will always attempt to solve the problem if possible. It does not take into account situations in which the individual denies there is a problem or uses other methods, like alcohol or drugs to forget that such a problem exists. Folkman and Lazarus (1985) would argue that this kind of coping strategy may indeed be termed emotion-focused coping, as the individual is reducing the emotional distress caused by the situation, through denial or substance abuse.

Compas *et al* (2001) discuss coping as a distinction between *engagement* and *disengagement* coping. *Engagement coping* would include responses that are oriented toward the source of the stress or one's emotions or thoughts, for example problem solving or seeking social support. *Disengagement coping* would refer to responses that are oriented away from the above, for example Withdrawal or denial. These approaches to coping, relate to approach and avoidance.

Contrary to Folkman and Lazarus (1985), Phelps and Jarvis (1994) differentiate

between denial and emotion-focused coping, when discussing four coping strategies. *Active coping* (1) is when the individual utilises social supports in seeking advice or help from others. *Avoidant coping* (2), includes denying the event occurred and physically removing oneself from the situation or escaping through drugs and alcohol. *Emotion-focused coping* (3) is the releasing of emotions such as crying, while *acceptance coping* (4) includes removing oneself psychologically from the situation and cognitively redefining the situation and accepting it as it is. Active, emotion-focused and acceptance coping could be considered forms of engagement coping, while avoidant coping could be considered a form of disengagement coping.

This concurs with the work of Seiffge-Krenke and Schulman (1990) who state that general coping behaviour reflects a person's mode of responding, either Actively or passively to their environmental demands. Their study determines coping along three dimensions. Firstly, *Active coping*, which includes Actively seeking support and taking advice. Secondly, *Internal coping*, which includes appraising the situation and searching for a compromise and thirdly, *Withdrawal coping*, which is indicative of withdrawing from the situation and using denial.(Seiffge-Krenke, 1992). The first two dimensions could be considered engagement or functional coping, the latter would indicate disengagement or dysfunctional coping.

Seiffge-Krenke and Shulman (1990) compared coping strategies between adolescents from Germany and Israel. In the German sample ( $n = 353$ ), females consistently scored higher than males on each coping strategy. The results also showed that Active coping was used more frequently than Internal coping, which in turn was used more

frequently than Withdrawal. In the Israeli sample ( $n = 187$ ), females scored higher than males on each coping strategy, except for males aged fifteen, who scored higher than females for Withdrawal. This sample showed Internal coping as the predominant coping strategy, followed by Active coping and lastly Withdrawal. Both samples show that the functional coping strategies predominate over the dysfunctional one.

Coping strategies therefore encompass more than just being either emotion- or problem-focused, as originally described by Folkman and Lazarus. They include Internalising and accepting the situation, Actively seeking support and help and withdrawing from the situation in any form, hence showing both functional and dysfunctional forms of coping.

According to Skinner, Edge, Altman and Sherwood (2003), “good” coping practices are organized, flexible and constructive, while “bad” coping practices are rigid, disorganized and derogatory. However, as Folkman and Lazarus (1985) point out, during any stressful encounter, there are individual differences in emotion that reflect individual differences in cognitive appraisal and coping. Kraaij, Garnefski, de Wilde, Dijkstra, Gebhardt, Maes and ter Doest (2003) state that *cognitive coping* plays an important role in determining whether adolescents develop emotional problems after experiencing stressful events. They found that cognitive coping strategies seemed to play an important role in adolescence, as adolescents with more depressive symptoms reported to use self-blame, rumination and “catastrophizing” to a significantly higher extent and positive reappraisal to a significantly lower extent. These findings suggest that cognitive coping plays an important role in determining whether adolescents develop emotional problems after experiencing stressful events. In vulnerable

adolescents, more negative coping strategies are utilised as a reaction to a stressful event, thus suggesting that cognitive coping has a direct relationship with depression.

Some studies have shown that adolescents use different strategies depending on the stressor. In a study by Poole and Evans (1988) adolescents who mentioned personal relationships as their major concern saw themselves as coping better than others. Those who mentioned the future saw themselves as coping somewhat less well. Griffith, Dubow and Ippolito (1999) show how *avoidance* is used as a coping strategy for family stressors, while *approach* coping is used more as a strategy for school and peer pressures. School is sometimes stressful for adolescents because they provide settings which are unique, conflicting and place both performance and relationship demands on learners and teachers alike (Cole and Sapp, 1988). School achievement is one of the major stressors in the lives of adolescents and is discussed in the previous section. The types of stressors that an adolescent would experience at school would include examinations, worries about the future, concerns regarding authority by teachers, self-management, relationships with others and self-esteem (Fanshawe and Burnett, 1991). The practical implications of this stressor is that it can be fairly easily measured, as schools are abundant in our society and a large number of adolescents can be assembled at any given time, whereby their stress levels and coping strategies can be measured. School is a sanctioned institution in our society and ethically it does not pose many problems measuring adolescent's coping strategies in a school environment. Therefore measuring adolescent coping strategies in a school environment is practical, ethical and valid.

It is clear from the literature that there is little consensus in the description and the

manner in which coping is operationalised. Irrespective of the number of coping strategies defined or named, it is clear that some coping strategies are beneficial, while others have potential to cause further harm to the individual. It is important to remember that adolescents are exposed to a wide range of stressful situations, which result in different coping strategies (Lewis and Frydenburg, 2002; Aldwin, 1994). The coping instrument derived by Seiffge-Krenke is therefore beneficial because it encompasses eight different areas in which problems may occur within an adolescent's life, thus giving a more accurate picture of the coping strategies an adolescent would utilise, as opposed to many other self-report questionnaires, which ask the participant to think about one problem only. This instrument also takes into account three different types of coping strategies, which can be grouped into engagement and disengagement, as discussed by Compas *et al* (2001), approach and avoidance coping, as discussed by Griffith *et al* (1999) and includes cognitive coping, as discussed by Kraaij *et al* (2003). This instrument, however, does not include emotion-focused coping, as discussed by Folkman and Lazarus (1985) and Phelps and Jarvis (1994). The releasing of emotions would be a coping strategy almost every individual has used at some point during adolescence and which this instrument ignores. Due to the fact that there is little consensus within the literature in terms of the description and operationalisation of coping, this instrument seems to be well suited for determining coping strategies as exhibited by adolescents.

New demands require new ways of coping and thus no single coping strategy is effective for all types of stress. A strategy that may be adaptive in one situation may be maladaptive in another (Compas, 1987). Coping and coping strategies are therefore complex phenomena, which have received little attention in South Africa, making



further investigation into this area both useful and beneficial.

### **1.18 Gender and Coping among Adolescents**

According to Frydenburg (1997) gender is linked to coping strategies used by adolescents. She found that boys use distraction as an effective coping mechanism, more than girls. Boys will get involved in alternative activities, like sports, to reduce their stress and therefore suppress or ignore the problem more than girls, thus putting them more at risk of substance abuse. Girls are more likely to use social support and rely on others for approval. They report that they are more affected by stressful events than boys and evaluate these events as more complex. When the event is over they tend to continue thinking about it. Therefore, while boys, either act out or use denial, girls are more likely to ruminate and turn against themselves. Girls tend to use a more ruminative style of coping than boys do and hence tend to be more depressed. Their depression will also last longer, making girls more predisposed to higher levels of suicide ideation than boys because of their coping strategies. This recent research corroborates the earlier work of Nolen-Hoeksema (1987) who talks about the origins of a ruminative style of coping as found in the stereotyping of males and females. Being emotional and inactive are, part of the female stereotype, while being active and ignoring one's mood is part of the male stereotype. Males tend to engage in active behaviour when depressed, which increases their chances of controlling their environment. They obtain positive reinforces and thereby dampen their depressed mood. Siddique and D'Arcy (1984) state that during adolescence girls are under much pressure to conform to traditional "feminine" roles and often develop a lack of control over their behaviour patterns, thus causing them to function under greater stress than their male counterparts. Coping strategies or lack of adequate

coping strategies are therefore linked to depression (Frydenburg, 1997).

Eshun (2000) compared American and Ghanaian college students and found gender differences in suicide ideation levels for the American sample, but not for the Ghanaian sample. She also found that irrespective of cultural group, those individuals displaying more ruminative coping strategies had higher suicide ideation scores. This agrees with the work of Nolen-Hoeksema (1987) and Frydenburg (1997) mentioned above.

However, the literature also tells us that girls tend to use social support and reliance on others for approval more than boys do (Frydenburg, 1997; Seiffge-Krenke, 1992). Girls will evaluate the same problem as more complex and will continue to think about a stressful event even when it is over, but will use functional forms of coping more so than boys who tend to use distraction as an effective coping strategy and get involved in alternative activities to reduce stress. Boys tend to be more aggressive and often use denial, a dysfunctional coping strategy.

In a study on youths in South Africa, Wissing, Claassens and Du Toit (1998) found that females more often used seeking social support and emotional discharge as coping strategies. They proved to be better able to cope behaviourally, thinking more often in ways that would facilitate effective action. Males more often used asocial coping strategies, such as indirect action or aggression. It was also found that males used more rational, cognitive styles of coping. Differences were therefore found between the genders in terms of cognitive style and coping strategy. This is in line with social stereotypes and the socialisation practices that girls and boys

encounter, which are discussed further on. The above studies therefore indicate that females use more Active or engagement coping, while males use more Withdrawal, denial or disengagement coping.

Gender does seem to play a role in coping strategies, but contradictory to our stereotypic beliefs that men are more problem focused, while women are more emotion focused, a study by Folkman and Lazarus (1980) showed no gender differences in the use of emotion focused coping skills and that men used more problem focused coping skills at work only. This is contradicted by Govender and Killian (2001) who found that female adolescents are more prone to using emotion-focused coping strategies of wishful thinking and acceptance, while adolescent males are more likely to use problem-focused coping strategies, which leads them to be more Active and in control of their situation.

### **1.19 Conclusion**

Thus, from the literature it is clear that suicide is a serious problem among the youth. Suicide ideation represents the earliest stage of suicide risk. Therefore, it is crucial that preventative programs and interventions tap into this issue. Also, it has been illustrated in the literature that adolescent boys and girls have different coping strategies, which can be divided into positive and negative coping. It is hypothesised that negative coping is related to high levels of suicide ideation (Siddique, & D'Arcy, 1984), thus it is crucial to look at coping strategies as well as suicide ideation in terms of a suicide prevention program.