# Stress, depression and role conflict in working mothers

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# **Abstract**

It is believed that depression will be the number one cause of disability worldwide in the year 2020, and stress will be a contributing factor. This is significant for South Africa which is considered to be one of the most highly stressed societies in the world with many social problems that contribute to stress and depression. One of the factors that research has indicated may lead to stress is work/home role conflict. This is often considered stressful for working mothers as they tend to carry a greater domestic burden. This study aimed to explore the levels of and interrelationships between stress, depression and work/home role conflict in a sample of 59 working mothers. Mediating factors such as coping skills and social support were also explored. The study found that for this sample work/home role conflict was not significant but that half of the sample reported features of depression. There was a positive correlation between stress and depression and negative correlations between coping, support, stress and depression.

#### Introduction

Clinical depression is ranked as one of the most costly illnesses in the world, together with heart disease, cancer and AIDS. According to the US National Institute of Mental Health, clinical depression affects more than 17,5 million adults each year and costs society billions of dollars. The World Health Organization predicts that depression will be one of the most prevalent debilitating illnesses of the new millennium. By the year 2020, it will be the no. 1 cause of disability worldwide.<sup>1</sup>

South Africa is regarded as one of the most highly stressed societies in the world, with many social problems that can lead to both high levels of stress and depression.<sup>2</sup>

# **Depresson and Stress**

Depression is a "whole body illness" that is distinguished by its severity, intensity and duration. It negatively affects how the body feels, and determines the mood of the individual, what they think and how they act. It has been defined as the persistent and sustained feeling that the self is worthless, the world meaningless and the future hopeless<sup>3</sup>.

There are certain variables that have been correlated with depression. These are socioeconomic status (SES), education and relationship/marital status. Gender is also significant. Women are more at risk for depression than men.<sup>4</sup> Studies consistently indicate that depression occurs twice as frequently in women than men and this ratio is consistent across cultures.<sup>5</sup>

One of the problems with depression, however, is that it is an illness that can and often does remain undetected. Research conducted in the US and SA suggest that the rate of undetected depression is high. Ninety four percent of individuals (over 200 000 persons) screened for depression who had scores consistent with de-

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pression according to the Zung Self Rating Depression Inventory, were receiving no treatment.<sup>6</sup> A South African study yielded percentages between 42 to 44 %.<sup>7</sup>

Stress and depression have many similar symptoms and causes and research indicates that there is a direct relationship between inordinate degrees of stress and psychological disorders, such as depression.<sup>8</sup>

The connections between stress and depression are both biological and psychological. On the biological level, research has implicated many neurotransmitter systems that become overactive in individuals with high stress levels. Neurotransmitters play a critical role in both mental health and illness. Serotonin specifically is critical in the physiology and etiology of depression.

Psychological factors are also important, such as coping styles and psychosocial resources. Blalock & Joiner 9 found that higher levels of stress predicted more anxiety and depression among women who used less effective coping styles, such as cognitive avoidance, than women who relied on other forms of coping. Researchers from the University of Texas and Stanford University<sup>10</sup> investigated the connection between stressors and depressive symptoms in individuals and found that the role of psychosocial resources, such as emotional support, guidance and assistance from family and friends, was significant in the experience of depressive symptoms. According to Rapmund<sup>11</sup>, depression is one outcome between stress and supports. Stressors render a woman more vulnerable to depression, while supports protect her in the face of stress. This is especially true for support from the partner. A study by Brown & Harris<sup>5</sup> reported that women with close, confiding, reciprocal relationships with their partners were four times less likely to develop depression under stress.

Cobb defined social support as "information leading the subject to believe that he/she is first, cared for and loved; second, is esteemed and valued, and third, belongs to a network of communication and mutual obligation.<sup>12</sup> Basically, social support "has to do with everyday things – sharing tasks and feelings, exchanging information and affection as well as dramatic but common human experiences – the joy of love, the pain of isolation, family ties and

the bonds of friendship."13

Social support appears to contribute to positive adjustment and personal development, as well as providing a critical buffer against the negative effects of stress.<sup>14</sup>

Coping involves an individuals' strategies and resources which are aimed at dealing with a stressor, either by accepting, altering or avoiding it. <sup>15</sup> Coping strategies are those behavioural, cognitive or emotional attempts to manage a situation that taxes or exceeds a person's perceived ability to cope.

One variable that may be stressful and demanding for working women is the conflict between work and home demands. Work/home conflict has been linked to psychological distress, life dissatisfaction, poor physical health and heavy alcohol use. Many factors determine whether the occupation of multiple roles will result in the experience of stress. Marriage and parenthood have been linked to increased role conflict and overload, with the role of parent perceived as the most stressful. <sup>16</sup> The change in role complexity from single status to married or cohabiting status, through to parenthood may be increasingly stressful. This is especially true for women who tend to carry the greater domestic burden. Research has suggested that working women with families tend to spend an average of 90 hours per week on paid and unpaid work, while men spend only 60.

Hence, since women are at greater risk for depression than men and it is suggested that they may experience greater pressure from the conflict between work and home demands, it was decided to explore the levels of and interrelationships between stress, depression and work/home role conflict in working mothers. Other variables known to contribute towards, exacerbate or mediate these relationships were also explored. These variables included the presence of social support and the use of coping strategies.

The following propositions were thus formulated:-

- 1. In the specific sample used, stress and depression have a significant positive relationship.
- 2. There is a relationship between the ages and number of children and the experience of stress.
- There is a negative relationship between the use of coping techniques and the provision of support and the experience of stress and depression.

# METHODOLOGY Sample

The sample consisted of 59 working mothers selected from eight nursery schools in the Roodepoort area. Questionnaires were handed to study participants for completion.

# Questionnaire

The questionnaire was based on concepts identified in the literature as relevant. The questions were designed to elicit subjects' responses to their experiences of stress, depression, work/home role conflict, support and coping. The questions were adapted from the literature and an occupational stress index. The Zung Self Rating Depression Scale (ZSRDS) was utilized as a measure of depression. Relevant demographic information was also included, such as age, preferred home language, relationship status, ages and number of children, occupation and work hours, as well as financial status of family.

# **Analysis**

Once all the questionnaires were collected, they were coded and scored and a database was constructed in Windows Excel to capture the scores. Statistical analysis utilizing Spearman's correlation and chi square tests were applied as appropiate.

#### **RESULTS**

# **Demographics**

The subjects' ages ranged from 20 to 49 years of age with 63% being in the 30 to 39 year old range. Except for one respondent who spoke Southern Sotho, they were all Afrikaans (47%) or English (51%) speaking. Ninety two percent of the sample were in an established relationship, either married, cohabiting or in a subsequent relationship after a divorce. Only five respondents were single parents. The total number of children in the sample was 114 and almost half of these were in the two to six year age range. The subjects were generally well educated. More than half had post matric education. The most common occupations were in the secretarial or financial fields and a third of the sample held managerial positions. The average household income was in the R51 000 to R150 000 per annum range.

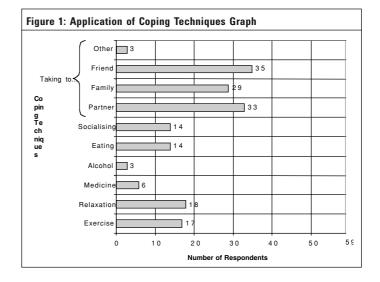
# **Support and Coping**

Information and advice and emotional support were the most frequent types of support and partners and family members were the most frequent sources, with high levels of support being received by many of the sample (Table 1 and Table 2).

With regard to forms of coping such as exercise, relaxation, use of substances and talking to people, all of the respondents applied some form of coping (Figure 1). In terms of the application of constructive cognitive and emotional strategies, 41 subjects (65%) indicated that they applied these strategies most of the time.

Table 1 : Frequency of types and sources of support reported					
TYPE / SOURCE:	Information & advice	Emotional	Practical	Financial	Other
Partner Family members Friends Other	20 19 10 14	28 18 14 3	14 11 2 4	14 10 2 3	0 0 2 1

Table 2 : Level of support from sources					
SUPPORT FROM:	Partner	Family	Friend	Work coll.	Manager
High Medium Low None Not applicable	42% 29% 12% 8%	49% 22% 19% 10% 0%	41% 29% 22% 7% 2%	27% 32% 24% 12% 5%	29% 22% 25% 19% 5%



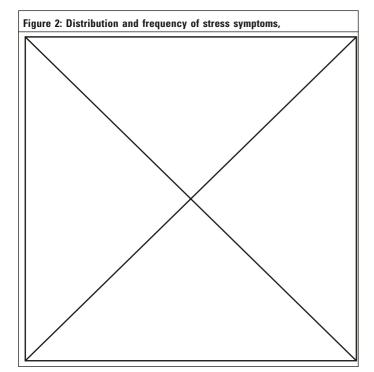


Table 3 : Distribution of stress scores			
STRESS RANGE	NO. OF RESPONDENTS	PERCENTAGES	
Low stress score Medium stress score High stress score	22 29 8	37 % 49 % 14 %	

#### **Stress and Depression**

Approximately two thirds of the sample had medium to high stress scores. In terms of the most frequently occurring symptoms, the most prominent were back, neck or shoulder pain, feeling tired or weak and increased craving and/or use of sweets, caffeine and tobacco (Table 3 and Figure 2).

The analysis of the depression scores revealed a mean score of 50,54, which is the borderline score for mild depression on the Zung Self Rating Depression Scale. Whilst 51% of the sample (n=30) reported features consistant with moderate to severe depression (Table 4), only three respondents admitted to actually receiving treatment with only 8% indicating feeling depressed most of the time at work and 5% most of the time at home.

# Work/Home Role Conflict

Only ten respondents (17%) admitted to substantial work/home role conflict. The remaining respondents experienced role conflict only sometimes or hardly at all.

# **Analysis of the Propositions**

With regard to proposition one, Spearman's correlation co-efficient yielded an "r" value of 0,61, which is considered relevant in the social sciences, at the 0,05 level of significance, thus confirming the

Table 4 : Depression scores				
RANGE	PERCENTAGES			
Minimal to mild depression	53%			
Moderate to marked depression	33%			
Severe depression	13%			

Table 5 : Correlations between stress, support and coping		
CORRELATED VARIABLES	VALUE	
Correlation between level of support and stress Correlation between practical support and stress Correlation between emotional support and stress Correlation between cognitive coping and stress Correlation between coping techniques and stress	r = -0,26* r = -0,20* r = -0,40* r = -0,51* r = 0,01	
* Denotes statistical significance at the 0,05 level.		

Table 6 : Correlations between depression, support and coping			
CORRELATED VARIABLES	VALUE		
Correlation between level of support and depression Correlation between practical support and depression Correlation between emotional support and depression	r = -0,28* r = -0,23* r = -0,34*		
Correlation between cognitive coping and depression Correlation between coping techniques and depression	r = -0,53* r = 0,009		
* Denotes statistical significance at the 0,05 level.			

proposition.

The chi square test on proposition two yielded a value not greater than the critical value i.e. it was not significant. The null hypothesis was therefore accepted, i.e. there is no relationship between the ages and number of children and the experience of stress in this sample.

For proposition three, Spearman's correlation co-efficient yielded mainly negative correlations which would be expected in that as support and coping increase, so the experience of stress and depression decrease (Table 5 and Table 6).

#### DISCUSSION

The age range of the sample is considered to be an individuals' prime years, when they are supposed to gain experience and skill in their occupational fields and to develop their families and social networks. Any illness during this stage can be devastating. The finding that many of this sample, in their prime years had rating scale scores indicating depression was of concern. Functioning in all spheres deteriorates when an individual is suffering from depression and thus it is questionable whether these subjects could be functioning optimally in their work and family lives if they were depressed. Furthermore, it would have an impact on their parenting and implications for their children. Research suggests that the offspring of depressed parents are at a high risk for developing depressive disorders themselves, as well as other conditions such as phobias, panic disorder, alcohol dependence and greater social impairment.

Consistent research also suggests that married individuals have the lowest prevalence of depression, compared to divorced, cohabiting and single people. However, in this sample, whilst 69% of the subjects were married, the prevalence of reported depression was still high. Thus, it could not be assumed that relationship status in itself accounted for the depression. Merely having a spouse may provide some sort of psychological support and security, but the quality of the relationship may also have an impact and perhaps studies need to take this into account. It was interesting to note, however, that of the five single parents, four had scores in the depression range.

Statistical analysis did not confirm the hypothesis that the ages and number of children had a significant relationship to the experience of stress. The literature indicates that as role status changes from singlehood to marriage to parenthood, it becomes increasingly complex, demanding and stressful and that having many and/or young children adds to the complexity. This study's finding does not dispute the literature but merely suggests that for this sample in particular, it was not relevant.

In terms of the experience of stress, half of the sample had scores in the mid range. This is not surprising or unexpected considering the many demands, pressures and threats South Africans have to live with. Only eight subjects (14%) had high stress scores which could be considered serious. There did not seem to be a common possible reason or cause for this amongst these eight – their relationship status, ages and numbers of children, occupations, financial status, support and coping all varied. The only common denominator amongst them was their depression scores. All eight were depressed and it is possible that their depression accounted for their physical complaints on the stress index, as it is well known that depressed individuals have more physical complaints than non-depressed individuals.<sup>4</sup>

The implications of the finding that many of the sample reported symptoms suggesting the presence of clinical depression are twofold. Firstly, it lends support to the fact that women are vulnerable to depression curs with the figures cited by Jacobs.<sup>6</sup>

A significant positive relationship between stress and depression was found, indicating that as the experience of stress increased, so did the experience of depression. This implies that high stress levels increase the vulnerability to depression which is not surprising. It supports the literature that maintains that there is a direct relationship between inordinate degrees of stress and psychological disorders. The relationship is also reciprocal in that not only can stress render an individual vulnerable to depression but depression also undermines an individual's ability to cope with stress. The relationship is about the pression also undermines an individual's ability to cope with stress.

Research consistently indicates that social support provides a crucial buffer against stress<sup>15</sup> and has a protective function in the face of depression. The form the sample, it appeared that most had an adequate support network. Approximately two thirds of the sample experienced medium to high support from partners, family or friends and thus, the high incidence of depression scores was surprising. This seems to suggest that although support may provide a buffer against stress and depression, it does not prevent the experience of it entirely.

Coping also provides a protective function. All of the subjects applied one or more form of coping and 65% applied constructive cognitive and emotional coping strategies most of the time. These referred to consideration of important issues, controlling emotions when faced with a problem and making decisions based on consequences. This did not seem congruent with some of the other questions or the depressive scores, but it was not clear what accounted for this.

The correlations between stress, depression, support and coping were also significant in the negative direction, except for those between stress, depression and coping techniques. It is not clear why this was so as it is generally understood that use of coping techniques is critical in stress management and depression. The highest correlations were between stress and emotional support, stress and cognitive coping, as well as between depression and emotional support and depression and cognitive coping. This supports previous research where it was found that women's restricted cognitive and coping styles increased their vulnerability to depression. It is also well recognized that emotional support is critical for adequate and effective coping under stress and during depression, especially for women.

An important issue that was raised related to the incongruence between the finding that most of the sample indicated adequate support, yet 51% were depressed according to the self report depression inventory. Some possible explanations are as follows. Firstly, that there were some 'false positives' and that not so many subjects were depressed. Secondly, it is possible that the subjects inflated the support they received so as not to present a negative impression of their loved ones. Complete objectivity and honesty are always difficult in questionnaires and those used in this study did not include any compensation for lying, faking or exaggerating. A last possibility is that support provided a buffering effect by protecting those in the mild range from becoming moderate to severe. Those subjects in the moderate to severe range did have the least amount of support, thus suggesting that lack of support may be critical. Furthermore, it indicates yet again that although support is critical in times of stress and in depression, it might not prevent the experience of either entirely.

# CONCLUSION

There are limitations to this study. The sample was not a random sample and the battery of questionnaires, except for the Zung inventory (ZSRDI), had not been validated. However, many of the findings support previous research.

The ramifications of the findings extend into both the social and work arena, as well as the medical field. Health is not just the absence of illness but a feeling of well being and this is no less true for mental health. A sense of well being involves zest and enthusiasm for living, hope for the future, a sense of direction and meaning, feeling good about oneself and knowing that one has significant others who love, care for and support you.<sup>7</sup>

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