Chapter 7

Results – Research Question 3

As with Chapters 5 and 6, this Chapter will be restricted to presentation and analysis of the collected data, without drawing general conclusions or comparing results to those of other researchers which were discussed in Chapter 3 (Perry, 1995).

The Chapter is structured around the third research question:

What relationship exists between strategic planning and organisational performance in disability-based organisations?

As each construct in the research question has been examined individually in the previous two Chapters, this Chapter will focus on discussing the relationship between the two constructs. The strategic planning construct has five dimensions - internal orientation, external orientation, functional coverage, use of planning techniques, and involvement of key personnel.

The organisational performance construct also has five measures - overall organisational effectiveness, objective fulfilment, job satisfaction, central life interests, and profitability. As previously mentioned, profitability will not be included in the analysis.

The source for all tables and figures will be the analysis of survey results.

The next Chapter, Chapter 8 will discuss the findings of Chapters 5-7 within the context of the literature, prior to making some conclusions, as well as discussing the implications of this research for theory and for policy and practice. Chapter 8 will also discuss the limitations of this research, and provide some recommendations for further research.
1 WHAT RELATIONSHIP EXISTS BETWEEN STRATEGIC PLANNING AND ORGANISATIONAL PERFORMANCE IN DISABILITY-BASED ORGANISATIONS?

In this Chapter, the analysis will examine the relationships between each of the five dimensions of strategic planning systems and each of the five measures of organisational performance, before concluding with a brief summary of the results of the data as they apply to the research question.

1.1 The Relationship between Strategic Planning and Organisational Performance

As the data relating to the two constructs, strategic planning and organisational performance, have been previously described and shown to be fundamentally reliable and valid, this section will discuss the relationship between the two constructs. As previously described, all the dimensions of strategic planning and organisational performance were measured on a 5 point Likert scale. Due to the nature of the data (previously mentioned), aggregate correlations between the strategic planning and organisational performance constructs were carried out using Spearman’s rho, the results of which are shown in Appendix 18.

Although the correlations were weak, all of the dimensions of strategic planning and strategic planning overall were significantly related (at the .01 level of significance) with each other, and there were also significant (at the .01 level of significance) correlations between all the various measures of organisational performance. Overall organisational effectiveness (Mott, 1972) was positively correlated to objective fulfilment (Ramanujam et al., 1986a) and was significant at the .01 level; job satisfaction (Miskel, 1982) was positively correlated to objective fulfilment and was significant at the .01 level; and central life interests (Hoy & Miskel, 1987) was positively correlated to job satisfaction and was significant at the .05 level.

The strategic planning construct was found to be a significant predictor of organisational performance in a number of respects. Overall, the strategic planning construct showed high explanatory values in relation to the variance of objective fulfilment and central life interests (at the .01 and .05 levels of significance respectively). Similarly, the external orientation dimension was a significant predictor of the same measures (both at the .01 level of significance). Also, functional integration and use of key personnel dimensions were found to be highly correlated (both at the .01 level of significance) with the objective fulfilment measure of organisational performance.

On a State by State basis, there were important differences from the overall situation, principally in Tasmania, as can be seen in Appendices 19-20. Victorian agencies showed similar correlations to the aggregate, although size ceased to be a significant predictor of the degree of emphasis of external orientation. Further, functional integration and key personnel involvement
dropped out as a significant predictor of objective fulfilment, and strategic planning and external orientation diminish in significance (to .05).

On the other hand, Tasmanian agencies demonstrated little association at all between the two constructs and their various dimensions and measures. There were also no significant relationships between the various measures of organisational performance with the exception of job satisfaction with organisational effectiveness—a negative correlation significant at the .05 level of confidence. The correlations between the various strategic planning dimensions were also weaker than those in the overall population, and those in Victoria. Two hitherto significant relationships (internal orientation and use of key personnel, and external orientation and use of key personnel) ceased to be significant in Tasmanian agencies, and four other correlations exist at the 95 per cent level of confidence rather than the 99 per cent level.

The small size of the Tasmanian sample may have affected the results.

The next section will examine the strategic planning effects on the various measures of organisational performance (organisational effectiveness, objective fulfilment, job satisfaction, and central life interests) in more detail.
1.1.1 Internal orientation and organisational effectiveness

The scatterplot of the two variables is shown below in Figure 67. The figure generally shows a neutral slope, reflecting the Spearman's rho correlation of .043 that was not significant.

Figure 67 Internal orientation dimension of strategic planning and Mott's (1972) measure of organisational performance

For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that there was no evidence of a relationship between the two variables. The internal orientation dimension of strategic planning explained approximately .1 per cent of the variance in the organisational effectiveness measure of organisational performance, which was not significant as indicated by the p-value.

1.1.2 Internal orientation dimension and objective fulfilment

The scatterplot of the two variables is shown below in Figure 68. The figure generally shows a neutral slope, reflecting the Spearman's rho correlation of .099 that was not significant.

Figure 68 Internal orientation dimension of strategic planning and Ramanujam et al.'s (1986a) measure of organisational performance
For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the internal orientation dimension of strategic planning explained approximately .6 per cent of the variance in the organisational effectiveness measure of objective fulfilment, which was not significant as indicated by the p-value. As each level of internal orientation was added, .134 of explanation is added.

1.1.3 Internal orientation and job satisfaction
The scatterplot of the two variables is shown below in Figure 69. The figure generally shows a neutral slope, reflecting the Spearman’s rho correlation of .046 that was not significant.

For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the internal orientation dimension of strategic planning explained approximately .4 per cent of the variance in the job satisfaction measure of organisational performance, which was not significant as indicated by the p-value.

1.1.4 Internal orientation and central life interests
The scatterplot of the two constructs is shown below in Figure 70. The figure generally shows a neutral slope, reflecting the Spearman’s rho correlation of .066 that was not significant.
For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the internal orientation dimension of strategic planning explained approximately .4 per cent of the variance in the central life interests measure of organisational performance, which was not significant as indicated by the p-value.

1.1.5 External orientation and organisational effectiveness
The scatterplot of the two variables is shown below in Figure 71. The figure generally shows a neutral slope, reflecting the Spearman’s rho correlation of .058 that was not significant.
For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the external orientation dimension explained approximately 1.3 per cent of the variance in the organisational effectiveness measure of organisational performance, which was not significant as indicated by the p-value.

1.1.6 External orientation and objective fulfilment
The scatterplot of the two variables is shown below in Figure 72. The figure generally shows a positive slope, reflecting the Spearman’s rho correlation of .275 that was significant at the 99 per cent level of confidence.

![Figure 72](image)

For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the external orientation dimension explained approximately 3.4 per cent of the variance in the objective fulfilment measure of organisational performance, which was significant as indicated by the p-value. Each level of external orientation added .197 of explanation of the variance.

1.1.7 External orientation and job satisfaction
The scatterplot of the two variables is shown below in Figure 73. The figure generally shows a neutral slope, reflecting the Spearman’s rho correlation of .129 that was not significant.
For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the external orientation dimension explained approximately 2.0 per cent of the variance in the job satisfaction measure of organisational performance, which was not significant as indicated by the p-value.

1.1.8 External orientation and central life interests
The scatterplot of the two variables is shown below in Figure 74. The figure generally shows a positive slope, reflecting the Spearman’s rho correlation of .229 that was significant at the .01 level of confidence.

Figure 73  
External orientation dimension of strategic planning and Miskel’s (1982) measure of organisational performance

Figure 74  
External orientation dimension of strategic planning and Hoy & Miskel’s (1987) measure of organisational performance
For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the external orientation dimension explained approximately 6.4 per cent of the variance in the central life interests measure of organisational performance, which was significant as indicated by the p-value. Each added level of external orientation added .168 of explanatory power of the variance in central life interests.

1.1.9 Functional integration and organisational effectiveness
The scatterplot of the two variables is shown below in Figure 75. The figure generally shows a neutral slope, reflecting the Spearman's rho correlation of .106 that was not significant.

Figure 75 Functional integration dimension of strategic planning and Mott's (1972) measure of organisational performance

For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the functional integration dimension of strategic planning explained approximately 1.8 per cent of the variance in the organisational effectiveness measure of organisational performance, which was not significant as indicated by the p-value.

1.1.10 Functional integration and objective fulfilment
The scatterplot of the two variables is shown below in Figure 76. The figure generally shows a positive slope, reflecting the Spearman's rho correlation of .290 that was significant at the .01 level of significance.
For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the functional integration dimension of strategic planning explained approximately 4.2 per cent of the variance in the organisational effectiveness measure of organisational performance, which was significant as indicated by the p-value.

1.1.11 Functional integration and job satisfaction
The scatterplot of the two variables is shown below in Figure 77. The figure generally shows a neutral slope, reflecting the Spearman’s rho correlation of .147 that was not significant.
For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the functional integration dimension of strategic planning explained approximately 1.9 per cent of the variance in the job satisfaction measure of organisational performance, which was not significant as indicated by the p-value. Each added level of functional integration added .109 of explanation of the variance in job satisfaction.

1.1.12 Functional integration and central life interests
The scatterplot of the two variables is shown below in Figure 78. The figure generally shows a neutral slope, reflecting the Spearman’s rho correlation of .109 that was not significant.

![Figure 78 Functional integration dimension of strategic planning and Hoy & Miskel’s (1987) measure of organisational performance](image)

For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the functional integration dimension of strategic planning explained approximately 2.3 per cent of the variance in the central life interests measure of organisational performance, which was not significant as indicated by the p-value. Each added level of functional integration explained .115 of the variance in central life interests.

1.1.13 Use of techniques and organisational effectiveness
The scatterplot of the two variables is shown below in Figure 79. The figure generally shows a neutral slope, reflecting the Spearman’s rho correlation of .049 that was not significant.
For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the use of techniques dimension of strategic planning explained approximately .8 per cent of the variance in the organisational effectiveness measure of organisational performance, which was not significant as indicated by the p-value.

1.1.14 Use of techniques and objective fulfilment
The scatterplot of the two variables is shown below in Figure 80. The figure generally shows a neutral slope, reflecting the Spearman's rho correlation of .088 that was not significant.
For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the use of techniques dimension of strategic planning explained approximately .1 per cent of the variance in the objective fulfilment measure of organisational performance, which was not significant as indicated by the p-value.

1.1.15 Use of techniques and job satisfaction
The scatterplot of the two variables is shown below in Figure 81. The figure generally shows a neutral slope, reflecting the Spearman's rho correlation of .096 that was not significant.

![Figure 81](image_url)

For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the use of techniques dimension of strategic planning explained approximately 1.6 per cent of the variance in the job satisfaction measure of organisational performance, which was not significant as indicated by the p-value.

1.1.16 Use of techniques and central life interests
The scatterplot of the two constructs is shown below in Figure 82. The figure generally shows a neutral slope, reflecting the Spearman's rho correlation of .154 that was not significant.
Use of techniques dimension of strategic planning and Hoy & Miskel's (1987) measure of organisational performance

For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the use of techniques dimension of strategic planning explained approximately 2.9 per cent of the variance in the central life interests measure of organisational performance, which was not significant as indicated by the p-value.

1.1.17 Use of key personnel and organisational effectiveness

The scatterplot of the two variables is shown below in Figure 83. The figure generally shows a neutral slope, reflecting the Spearman's rho correlation of .062 that was not significant.
For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the use of key personnel dimension of strategic planning explained approximately .4 per cent of the variance in the organisational effectiveness measure of organisational performance, which was not significant as indicated by the p-value.

In relation to the involvement of all staff in the strategic planning process (Question 22 of Section B of the Managers Questionnaire, see Appendix 1), there was no evidence of a relationship between involvement of all staff in the strategic planning process and the organisational effectiveness measure of organisational performance.

1.1.18 Use of key personnel and objective fulfilment
The scatterplot of the two variables is shown below in Figure 84. The figure generally shows a positive slope, reflecting the Spearman’s rho correlation of .244 that was significant at the 99 per cent confidence level.

![Figure 84](image)

For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the use of key personnel dimension of strategic planning explained approximately 2.6 per cent of the variance in the objective fulfilment measure of organisational performance, which was not significant as indicated by the p-value. As the use of key personnel dimension moved up a level, the explanatory level was increased by .161.
In relation to the involvement of all staff in the strategic planning process (Question 22 of Section B of the Managers Questionnaire, see Appendix 1), there was no evidence of a relationship between involvement of all staff in the strategic planning process and the objective fulfilment measure of organisational performance.

1.1.19 Use of key personnel and job satisfaction
The scatterplot of the two variables is shown below in Figure 85. The figure generally shows a neutral slope, reflecting the Spearman’s rho correlation of .044 that was not significant.

For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the use of key personnel dimension of strategic planning explained approximately .4 per cent of the variance in the job satisfaction measure of organisational performance, which was not significant as indicated by the p-value.

In relation to the involvement of all staff in the strategic planning process (Question 22 of Section B of the Managers Questionnaire, see Appendix 1), there was no evidence of a relationship between involvement of all staff in the strategic planning process and the job satisfaction measure of organisational performance.

1.1.20 Use of key personnel and central life interests
The scatterplot of the two variables is shown below in Figure 86. The figure generally shows a neutral slope, reflecting the Spearman’s rho correlation of .093 that was not significant.
Use of key personnel dimension of strategic planning and Hoy & Miskel's (1987) measure of organisational performance

For the purposes of the following analysis, the variables were treated as being continuous, and bivariate regression analysis was undertaken as summarised in Appendix 21.

The results showed that the use of key personnel dimension of strategic planning explained approximately 2.0 per cent of the variance in the central life interests measure of organisational performance, which was not significant as indicated by the p-value.

In relation to the involvement of all staff in the strategic planning process (Question 22 of Section B of the Managers Questionnaire, see Appendix 1), there was no evidence of a relationship between involvement of all staff in the strategic planning process and the central life interests measure of organisational performance.

1.1.21 Summary
This section examined the strategic planning effects on the various measures of organisational performance (organisational effectiveness, objective fulfilment, job satisfaction, and central life interests) in more detail.

There were significant relationships found between a number of dimensions of strategic planning and organisational performance, but not in Tasmania, possibly because of the small sample size. These were between external orientation, functional integration, and key personnel involvement with objective fulfilment, and between external orientation and central life interests.

There was however no evidence of a significant relationship between involvement of all staff in the strategic planning process and any of the measures of organisational performance. This was the case even when the data was compared by State. The next section will examine the data relating to this third and final research question by using multiple regression techniques involving all the independent variables.
2 MULTIPLE REGRESSION

Three major regression models will be used – standard or simultaneous regression, hierarchical regression and stepwise regression. These models differ in two ways: in the treatment of overlapping variability due to correlation of the independent variables; and in terms of the order of the entry of the independent variable into the equation (Coakes & Steed, 1999).

In the standard or simultaneous model, all independent variables enter the regression equation at once so as to examine the relationship between the whole set of predictors and the dependent variable.

In stepwise regression, the number of independent variables entered and the order of entry is determined by statistical criteria generated by the stepwise procedure. Method of entry can be forward, backward, or a combination of both.

In hierarchical multiple regression, the order of entry of the independent variables is determined by the researcher.

2.1 Standard or simultaneous regression

Standard or simultaneous regression was used to determine that the independent variables of size, location, strategic planning, internal orientation, external orientation, functional integration, use of planning techniques, and use of key personnel together explained 4.9 per cent of the variance in organisational effectiveness, which was not significant. An examination of the p-values showed that only functional integration was a significant predictor of organisational effectiveness, (p=.048).

Similarly, the independent variables of size, location, strategic planning, internal orientation, external orientation, functional integration, use of planning techniques, and use of key personnel together explained 10.4 per cent of the variance in objective fulfilment, which was not significant. An examination of the p-values showed that none of the independent variables were significant predictors of objective fulfilment.

Further, the independent variables of size, location, strategic planning, internal orientation, external orientation, functional integration, use of planning techniques, and use of key personnel together explained 10.4 per cent of the variance in job satisfaction, which was not significant. An examination of the p-values showed that only size was a significant predictor of job satisfaction, (p=.009).

Finally, the independent variables of size, location, strategic planning, internal orientation, external orientation, functional integration, use of planning techniques, and use of key personnel together explained 7.1 per cent of the variance in central life interests, which was not significant. An examination of
the p-values showed that none of the independent variables were significant predictors of central life interests.

2.2 Stepwise regression
Stepwise regression was used to determine that the independent variables of size, location, strategic planning, internal orientation, external orientation, functional integration, use of planning techniques, and use of key personnel failed to meet the selection criteria and were all excluded from the regression equation which used organisational effectiveness as the dependent variable.

Similarly, the only independent variable to be entered into the regression equation using objective fulfilment as the dependent variable was functional integration which explained 4.2 per cent of the variability in objective fulfilment, (p=.016). The independent variables of size, location, strategic planning, internal orientation, external orientation, use of planning techniques, and use of key personnel failed to meet the selection criteria and were all excluded from the regression equation.

Further, the only independent variable to be entered into the regression equation using job satisfaction as the dependent variable was size (which explained 5.8 per cent of the variability in job satisfaction, (p=.004). The independent variables of functional integration, location, strategic planning, internal orientation, external orientation, use of planning techniques, and use of key personnel failed to meet the selection criteria and were all excluded from the regression equation.

Finally, the only independent variable to be entered into the regression equation using central life interests as the dependent variable was external orientation which explained 6.4 per cent of the variability in central life interests, (p=.003). The independent variables of size, location, strategic planning, internal orientation, functional integration, use of planning techniques, and use of key personnel failed to meet the selection criteria and were all excluded from the regression equation.

2.3 Hierarchical multiple regression
Hierarchical multiple regression was used to determine that size, location, strategic planning, internal orientation, external orientation, functional integration, use of planning techniques, and use of key personnel together contributed 4.9 per cent of explanation of the variance in organisational effectiveness. When all the independent variables were present in the regression equation, functional integration was a significant predictor (p=.048), but clearly was significantly correlated with the other variables.

Similarly, the independent variables of size and location only contributed 1.7 per cent of the variance in objective fulfilment. However, strategic planning made a significant (p=.017) unique contribution of 4.2 per cent, as did functional integration which contributed 2.8 per cent (p=.046). When all the
variables were included in the regression equation, the effects of strategic planning and functional integration were insignificant. Overall, the independent variables explained 10.4 per cent of the variance in objective fulfilment.

Overall, the independent variables explained 10.4 per cent of the variance in job satisfaction. The independent variable of size was a significant predictor (p=.004) and contributed 5.8 per cent of the variance in job satisfaction. When the other independent variables were added, size remained a significant predictor (p=.009).

Finally, the independent variables of size and location only contributed .3 per cent of the variance in central life interests. However, strategic planning made a significant (p=.010) unique contribution of 4.9 per cent. When all the variables were included in the regression equation, the effect of strategic planning was insignificant. Overall, the independent variables explained 7.1 per cent of the variance in central life interests.

2.4 Regression summary
This section examined the relationship between strategic planning and organisational performance using three regression models. The major findings are as shown below.

(a) Standard or simultaneous regression
Functional integration was a significant predictor of organisational effectiveness, and size was a significant predictor of job satisfaction.

None of the independent variables were significant predictors of objective fulfilment or central life interests.

(b) Stepwise regression
Functional integration was a significant predictor of objective fulfilment, and size was a significant predictor of job satisfaction. Further, external orientation was a significant predictor of central life interests.

None of the independent variables were significant predictors of organisational effectiveness.

(c) Hierarchical multiple regression
Functional integration was a significant predictor of organisational effectiveness, and size was a significant predictor of job satisfaction.

None of the independent variables were significant, continuing predictors of objective fulfilment or central life interests.
3 SUMMARY

As each construct in the question had been examined individually in the previous two Chapters, this Chapter was limited to discussing the relationship between the two constructs in the research question, without drawing general conclusions or comparing results to those of other researchers which were discussed in Chapter 3 (Perry, 1995).

The relationship was discussed overall, and then according to the interaction between each of the five dimensions of the strategic planning construct and the five perspectives of organisational performance.

The Chapter presented and analysed the data by conducting appropriate statistical manipulation (including bivariate, multivariate, and regression techniques) in relation to hypothesis testing.

This Chapter examined the results of the data as they related to the third research question:

What relationship exists between strategic planning and organisational performance in disability-based organisations?

The overall results of the data analysis as they relate to the third research question are shown in Figure 87 below.

Figure 87 Relationship (Spearman’s rho correlation) between strategic planning and organisational performance

**Correlation is significant at the .01 level (2 tailed)
As can be seen, there were statistically significant correlations in disability based agencies between the strategic planning processes and systems and their respective organisations' performance on two out of the five measures of organisational performance used in this research.

On two of these measures, objective fulfilment and central life interests, there was an extremely high level of explanatory power.

Victorian agencies showed a greater correlation than those in Tasmania with respect to strategic planning overall and the central life interests measure of organisational performance, and between external orientation and central life interests. Tasmanian agencies demonstrated little association at all between the two constructs and their various dimensions and measures.

The correlations between the dimensions of strategic planning and organisational performance were supported by the various regression analyses.

The next Chapter, Chapter 8 will discuss the findings of Chapters 5-7 within the context of the literature, prior to making some conclusions, as well as discussing the implications of this research for theory and for policy and practice. The next Chapter will also discuss the limitations of this research, and provide some recommendations for further research.