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A model of predictors of managers performance

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Keywords

model, predictors, managers, performance

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Abstract

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Keywords: Wellbeing, Job Satisfaction, Performance

Background

The origins of the ‘happy-productive worker’ thesis can be traced to the seminal Hawthorne studies (Roethlisberger & Dickson, 1939), where higher levels of job related performance were attributed to so called ‘happy’ employees. In recent years, the ‘happy-productive worker’ thesis has expanded into the area of managerial performance, in response to increasingly complex local, national and global workplace dynamics which are dependent on managers’ capacity to achieve and maintain high levels of individual job performance. As a consequence, predictors of improvements or deterioration of managers’ performance are arguably critical to optimising organisations competitive edge.

Research presented here posits that affective wellbeing and intrinsic job satisfaction may be a more accurate predictor of managers’ job performance when compared to undifferentiated job satisfaction. The construct, ‘managers’ job performance’ previously has not been robustly measured, making associations between these constructs problematic, partly due to conceptual misspecification and the use of inadequate research methodologies. Rather than being an aberrant stream of investigation these previous findings result from poorly specified and measured constructs. Expanding the construct space for both affect and performance in the workplace makes it possible to test potential new linkages between these variables. A more sophisticated understanding of how affective wellbeing and intrinsic job satisfaction interacts with managers’ performance is posited to contribute to a better understanding of aspects of the relationships underlying these constructs. There is a case for extending the happy-productive worker thesis into an examination of the extent to which managers’ affective wellbeing influences performance using a more robust methodology to measure these constructs.

The Partial Model

Methodology

An empirical methodology was used to develop the initial *Partial Model of Managers’ Affective Wellbeing, Intrinsic Job Satisfaction and Performance* (‘Partial Model’) shown in Figure 1. Hypotheses were developed in relation to the following research questions: (a) Is there an association between affective wellbeing, intrinsic job satisfaction and managers’ contextual and task performance? (b) To what extent does affective wellbeing and intrinsic job satisfaction predict different dimensions of managers’ contextual and task performance? (c) Does positive affective wellbeing result in enhanced managers’ performance and is poor affective wellbeing detrimental to managers’ performance? A cross sectional questionnaire was administered to managers from a range of occupational groups in the private, public, and

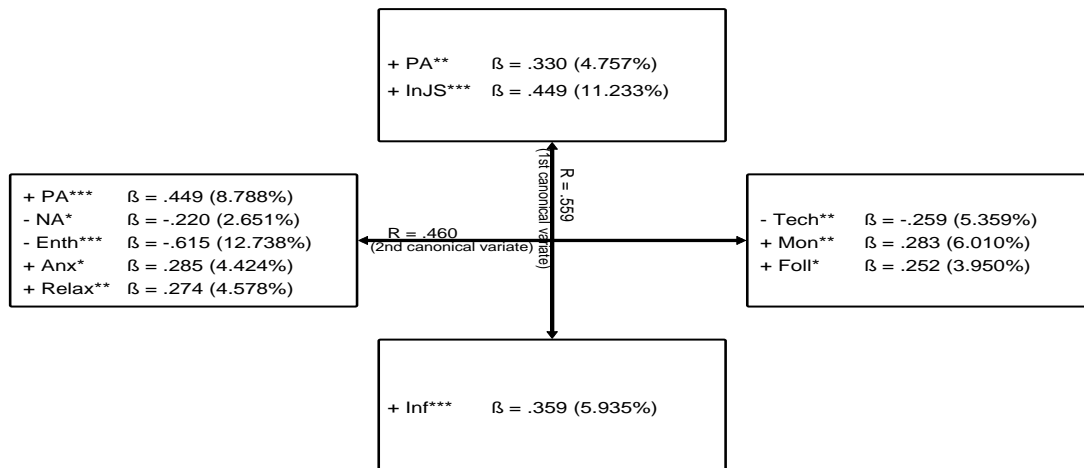
third sector occupational groupings, in 19 Western Australian organisations. Data was collected using self report measures of affective wellbeing and intrinsic job satisfaction and downward appraisal of managers' contextual and task performance (by the person to whom managers report). A total of 400 questionnaires were returned from the 1,552 distributed, representing a 26% useable response rate.

Items for the questionnaire used in this study were derived from established affective wellbeing and job satisfaction scales. The 12-item Four Factor Model of Job related Wellbeing (Sevastos, 1996); 20-item PANAS (Watson & Clark, 1984), and 16-item Job Satisfaction (Cook, 1981). Intrinsic job satisfaction, PANAS and The Four Factor Model of Affective Wellbeing were used in conjunction to provide psychometrically robust measures of dispositional and state affect that also denoted hedonic tone suitable for predicting employee performance. Managers' contextual performance scales were devised from Borman and Motowidlo's (1997) 5-dimension taxonomy. The task performance scales were developed from Borman and Brush's (1993) 18-dimension taxonomy of managerial performance. Subscale items were also developed to measure constructs of 'Organisational Effectiveness' and 'Judgement'.

Analysis of the Partial Model

The Partial Model was summarised into two orthogonal dimensions for illustration (See Figure 1 below). As reported in the literature, it is assumed that the direction of the relationship between the variables is from affective wellbeing, intrinsic job satisfaction to performance (Warr in Kahneman, Diener, & Schwarz, 1999). However, this should not be taken to infer causality between these dimensions. Affective wellbeing and job performance are assumed to be linked in a reciprocal framework of relationships, with each set of factors influencing the other across time (Warr, 1987). Partial model suggests that happiness leads to performance. A variety of different sources of evidence however, suggest that positive affect leads to certain outcomes rather than simply being caused by them.

Figure 1: Partial Model of Managers' Affective Wellbeing, Intrinsic Job Satisfaction and Performance (n = 125)



Note: * $p < .05$; ** $p < .01$; *** $p < .001$.

Of particular importance was the development and testing of the Measurement Model of Managers' Job Performance as detailed in Hosie et al. (2006). An 8-Dimensional Measurement Model of managers' performance, derived from the contemporary literature, was tested to differentiate the structure of managers' contextual and task performance. The job performance construct was found to consist of four contextual dimensions (Endorsing, supporting and defending organisational objectives; Helping and cooperating with others; Persisting with enthusiasm and extra effort to complete task activities successfully; Following organisational rules and procedures) and four task dimensions (Monitoring and controlling resources; Technical proficiency; Influencing others; and Delegating to others).

Managers' self report of affective wellbeing and intrinsic job satisfaction was related to superiors' ratings of managers' performance to ensure the independence of the measures. Specific indicators of affective wellbeing and intrinsic job satisfaction were found to be reliable predictors of certain dimensions of managers' performance. Affective wellbeing (Positive Affect, Intrinsic Job Satisfaction) was found to be positively associated with a dimension of superiors' report on task performance (Influencing). Positive associations between dimensions of self report for affective wellbeing (Positive Affect, Anxiety and Relaxation) were found to be negatively associated with dimensions of superiors' reports (i.e., downward) on managers' task performance (Monitoring) and contextual performance (Following). Positive Affect, Anxiety and Relaxation were positively associated with the contextual performance variable, Following, and the task performance variable Monitoring.

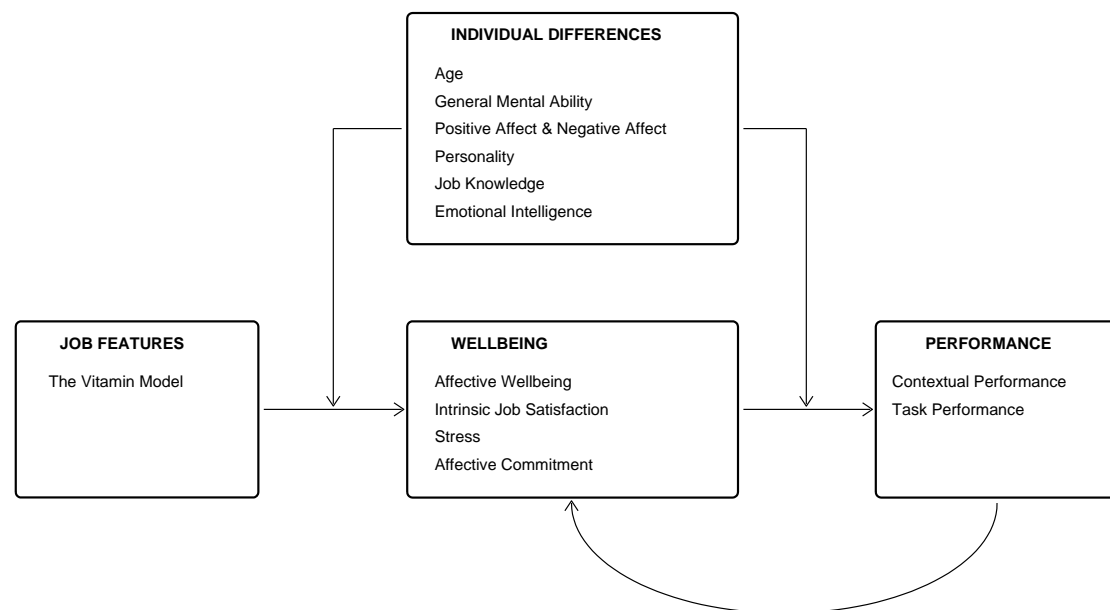
The development of a more complete model

In the following we suggest additional dimensions that could be incorporated into a future model for testing predictors of managers' performance. A more comprehensive explanation will be provided of the upward and downward spirals of managerial effectiveness, whereby positive or negative affective wellbeing and intrinsic job satisfaction lead to increased or reduced performance, which either enhances positive, or exacerbates negative affective wellbeing and intrinsic job satisfaction. There are many relationships which may impinge on managers' affective wellbeing and intrinsic job satisfaction in relation to their performance, including general mental ability (GMA), age and personality (particularly Conscientiousness). Known managerial stressors, such as role overload, role conflict and role ambiguity (Peterson et al., 1995; Rizzo, House, & Lirtzman, 1970), and work to home overlap (Frone, Russell, & Cooper, 1992; Williams & Alliger, 1994) could also be included. A causal variable set is used with moderator variables that suggest a complex set of relationships which are interactive rather than additive approach. Empirical data will assist in demonstrating the causal link between certain individual differences and the level of managers' performance.

Model of Predictors of Managers' Performance

A more complete model of the relationship between the constructs predicting managers' performance is given in Figure 2.

Figure 2: Comprehensive Model of Predictors of Managers' Performance



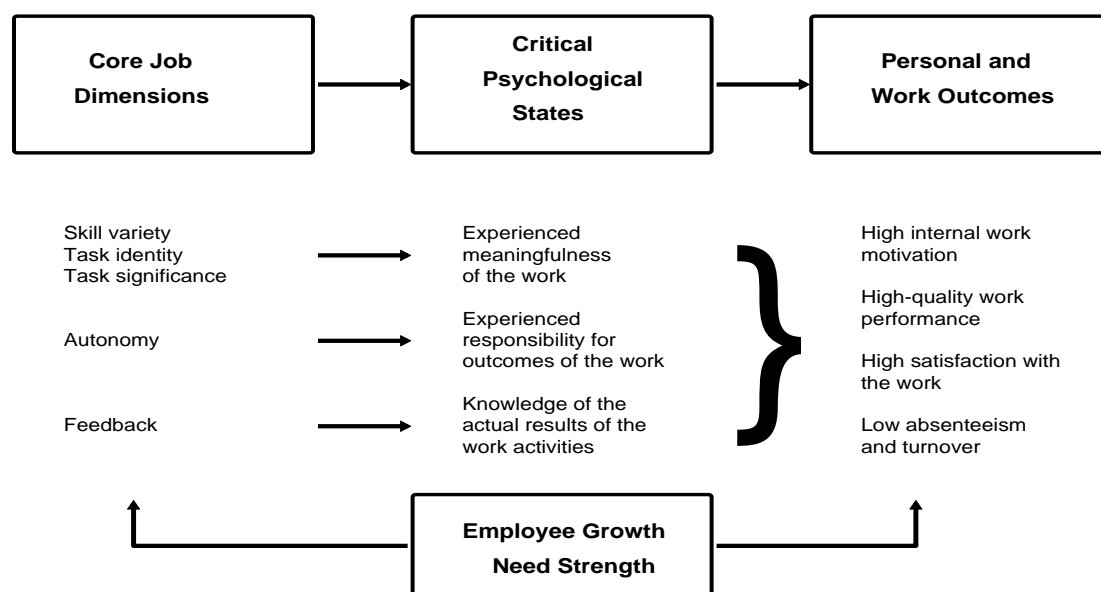
This Model of Predictors of Managers' Performance is a logical extension to the partial model, and represents a more complete and sophisticated conceptualisation of predictors of

managers' performance than any currently available in the literature. Robust measures are the foundation of any rigorous model assessment of the relationship between managers' affective wellbeing, intrinsic job satisfaction and performance.

Job Features

Numerous attempts have been made to develop conceptual models, perspectives and theories about job characteristics and wellbeing (Kahn & Byosiore, 1992). Most of the empirical investigations over the past three decades have been based on frameworks developed from the Job Characteristics Model shown in Figure 3 (Hackman & Oldham, 1980). Job characteristics assist in differentiating a person's psychological state from the external characteristics of a job. As Cordery and Sevastos (1993: 34) noted 'job-design research has been dominated for nearly two decades by the Job Characteristics Model', which explains how enriched or complex jobs are associated with increased job satisfaction, motivation and job performance.

Figure 3: Job Characteristics Model (Adapted from Hackman and Oldham [1980])



Five core job characteristics—skill variety, task identity, task significance, autonomy, and feedback from the job—are considered to affect four critical psychological states—experience, meaningfulness of work, experienced responsibility for outcomes of work, and knowledge of the actual results of work activities (1980; Hackman & Oldham, 1975). The JCM assists in differentiating a person's internal psychological states by describing the external characteristics of a job. These states influence work outcomes for internal work motivation, growth satisfaction, overall job satisfaction, work effectiveness, and absenteeism. Three factors - knowledge and skill growth, needs strength, and context satisfaction are considered

to moderate the relationship between job characteristics and work outcomes (Hackman & Oldham, 1980). To improve psychological outcomes at work, all five of Hackman and Oldham's core job characteristics need to be developed but specific outcomes are associated primarily with some job characteristics rather than with others (Fried & Ferris, 1987). Psychological outcomes are not directly measured by the JCM. Reliable measures of affective wellbeing and intrinsic job satisfaction are needed to determine how these states are associated with job characteristics. Attributes of jobs are filtered through employees' perceptions and result in psychological states which determine a person's affective and behavioural responses (Dodd & Ganster, 1996).

There has been considerable research conducted into job characteristic perspectives of job design. A need remains to identify the casual mechanism by which the changes to job design can enhance performance. There are considerable difficulties in operationalising such a wide array of job feature constructs which are essentially an extension of Hackman and Oldham's (1975) Job Characteristics Model (JCM) as depicted in Figure 3. Moreover, there is a paucity of studies using the JCM that are specifically concerned with the relationship between managers' job characteristics and their performance. As managers invariably perform complex tasks it will be worth establishing the extent to which autonomy impacts on high variety (complex) tasks. This reasoning is predicated on the assumption that job characteristics meet individual managers' desire for growth, a proposition which can also be tested using a variation of Hackman and Oldham's Job Characteristics Survey (1975) as detailed in Table 1. In general, there is support for the JCM's capacity to explain job satisfaction, but with some reservation about its value for measuring productivity (Umstot, Bell, & Mitchell, 1976).

Table 1: Core Job Dimensions - Job Characteristics Model (Adapted from Hackman and Oldham, (1975: 59)

Skill variety	The degree to which a job requires a variety of different activities which involve the use of a number of different skills and talents of the person.
Task identity	The degree to which the job requires completion of a whole and identifiable piece of work.
Task significance	The degree to which the job has a substantial impact on the lives or work of other people
Autonomy	The degree to which the job provides substantial freedom, independence and discretion to the individual
Feedback	The degree to which carrying out the work activities required by the job results in the individual obtaining direct and clear information about the effectiveness of their performance.

Individual differences

AGE: In the context of ageing populations there are important policy issues and concerns

about encouraging older workers to continue to participate in the workplace. Attracting and retaining older managers and employees is likely to depend upon more intrinsic motivators rather than extrinsic motivators, such as wages and hours of work. A strong and significant U shape relationship has been found between intrinsic and extrinsic job satisfaction and age by Clark, Oswald and Warr (1996) with job satisfaction typically rising from the early thirties and reaching its peak at 36 years of age. Meta analyses by Waldman and Avolio (1986) and McEvoy and Cascio (1989) concluded that no difference between objective measures of performance was evident between older workers and younger workers. Later work by Schmidt and Hunter (1998: 15) unambiguously asserted that the 'age of job applicants shows no validity for predicting job performance'. Job knowledge on the other hand, is a very important predictor of job performance. When one relates job knowledge to job experience, it may be assumed that older workers are likely to have accumulated considerable job knowledge by virtue of their experience (Schmidt & Hunter, 2004). Overall, there is a lack of specific empirical evidence on the relationship between individual age and performance, indicating a need for more research.

GMA: Considerable evidence exists to support the validity of GMA measures for predicting job performance compared to other existing methods (Ree & Earles, 1992; Schmidt & Hunter, 1981; Schmidt & Hunter, 1998; Schmidt, Hunter, & Outerbridge, 1986). Three combinations of GMA and job performance emerged from Schmidt and Hunter's (1998) meta analytic of the highest multivariate validity and utility for job performance: GMA with a work sample test (mean validity of .63), GMA with an integrity test, which mainly measures conscientiousness (mean validity of .65), and GMA with a structured interview which partly measures conscientiousness and related personality traits, such as agreeableness and emotional stability (mean validity of .63). Both combinations are good predictors of performance in job training (.67 and .59, respectively), as well as performance on the job (Schmidt & Hunter, 1998). Up to 33% of managerial job performance was accounted by estimates of the manager's GMA. No other characteristic or combination of characteristics accounts for such a high proportion of managerial success. High correlations for validity were found for GMA as a predictor of job performance (.58), for professional-managerial jobs (.56) (Hunter, 1986). The knowledge of how to perform on the job has also been found to result in superior job performance (Hunter, 1989). Mental ability has been found to have a major direct causal impact on the acquisition of job knowledge. Thus, GMA has been found to be the best predictor of job related learning and the acquisition of job knowledge learned on the job and of performance in job training programmes (Schmidt & Hunter, 1992; Schmidt et al., 1986).

PANAS-Plus: Dispositional affect is an appropriate rating of individual managers' performance leading to a stronger operationalisation of the 'happy-productive worker' thesis (Wright & Staw, 1999b; Wright & Staw, 1999a). Depending on the time frame instructions, these dimensions may also be measured as state or trait Positive Affect (PA) and Negative Affect (NA). State affect represents a person's mood, while trait PA and NA represent enduring aspects of a person's personality. Staw and Barsade (1993) argued that affect pleasantness descriptors denoting high positive affect or happiness (e.g., 'cheerfulness') and high negative affect or depression ('blue', 'gloomy') may be required to capture the construct of affective disposition. Wright and Staw (1999a: 11) also observed that 'conspicuously missing from the PANAS scale are items such as 'happy', 'contented', 'pleased', 'unhappy', arguing that these 'pleasantness items may be precisely the descriptors needed for predicting employee performance', as the items in the PANAS-Plus scale measure.

Conscientiousness: Conscientiousness, has been found to consistently predict job performance and career success in all job families (Barrick & Mount, 1991; Mount & Barrick, 1995). A meta analytic estimate of .31 for conscientiousness for predicting job performance was reported by Mount and Barrick (1995). Conscientiousness was found to be higher for managers in high autonomy jobs than in low autonomy jobs. Furthermore, it was considered by Barrick, Mount and Strauss (1993) to affect motivational states, goal setting and goal commitment potentially acting as a motivational contributor to job performance. After controlling for GMA, employees who are higher in conscientiousness are likely to develop higher levels of job knowledge. This may be a result of highly conscientious individuals applying greater effort and spending more time focussing on job tasks. This job knowledge may result in higher levels of job performance (Schmidt & Hunter, 1998) providing the rationale for the inclusion of conscientiousness in any consideration of managers' performance.

Job knowledge: Job experience and job knowledge constructs are related but different. There are sound theoretical and practical reasons for differentiating between the constructs of job experience and job knowledge. Job experience and conscientiousness are antecedents of job knowledge. From a theoretical standpoint, the central variables determining job performance are GMA, job experience (i.e., opportunity to learn), and conscientiousness, a personality trait (Schmidt & Hunter, 1998). Although A number of measures can be used to represent an individual's level of work experience (Hoffman, 1992; Rowe, 1988), not all measures are identical. Research suggests that individuals with the equivalent amount of job tenure can vary considerably in the number and types of tasks they perform (Ford, Quinones, Sego, &

Sorra, 1992; Schmitt & Cohen, 1989). Further, as DuBois and McKee (1994) observed, experience is not equal to practice. Amount and task level measures appear to be a superior measure of what people actually do on the job. A range of contextual factors such as supervision, feedback, and ability to work in groups can have an impact on job performance. Work experience is a complex and multi-dimensional construct which needs to be closely defined to ensure congruency between the conceptualisation, operationalisation, and interpretation of results (Ostroff & Ford, 1989). Further research is needed to confirm the multi dimensional perspective of the work experience construct.

Wellbeing

Affective Wellbeing: Evidence supporting a monopolar model of affective wellbeing structure is theoretically and empirically robust. A monopolar construction is more stable over time and is appropriate for measuring state affect. The Four Factor Model of Affective Wellbeing (Sevastos, 1996) complements and extends the constructs measured by PANAS-Plus. Refer to Hosie et al. (2006) for qualities and items used in The Four Factor Model of Affective Wellbeing scales. Questionnaire items will be derived from established affective wellbeing and job satisfaction scales that provide psychometrically robust measures of dispositional and state affect that are suitable for predicting managers' performance. Karasek's (1979; 1989; 1990) research highlighted an intriguing proposition worth further examination in relation to managers' affective wellbeing and performance: are managers who are experiencing high work pressure likely to report positive job satisfaction and high anxiety but low depression or do managers with less enriched jobs experience low pressure, dissatisfaction and low anxiety but increased depression?

Intrinsic Job Satisfaction: A meta analysis by Judge, Heller and Mount (2002) found the Big-Five traits had a multiple correlation of .41 with job satisfaction, indicating support for the validity of the dispositional source of job satisfaction. Three personality traits—neuroticism, extraversion, and conscientiousness—displayed appreciable correlations: neuroticism emerged as the strongest and most consistent correlate of job satisfaction while conscientiousness displayed the second strongest correlation. Neuroticism and Extraversion related to job satisfaction generalised across studies. However, Judge et al have also speculated that the Five-Factor model may contain an additional trait, Conscientiousness, which is potentially a better predictor of job satisfaction than the PA–NA typology (Organ & Lingl, 1995), and could facilitate the maximum prediction of job satisfaction. Also, PA and NA are quasi dispositional in that they also assess mood or 'affective traits' (Watson, 2000) and are possibly less stable than other dispositional measures (Judge & Bretz, 1993), and may to some degree be confounded with life satisfaction (Judge, Locke, Durham, & Kluger, 1998). The

empirical validity of both frameworks and similarity between them warrants further integrative research into the personality–satisfaction relationship. A case has been established for integrating diverse frameworks of the dispositional source of job satisfaction in order to capture the psychological processes involved in explaining the relationships of the personality traits to job satisfaction.

Affective organisational commitment: Organisational commitment and intrinsic job satisfaction have been found to be correlated with superiors' ratings of managers' performance and promotability, while affective commitment is positively related to employee performance (Meyer et al., 1989). Affective commitment has been found to be correlated negatively with superiors' evaluations of managers' performance (Meyer, Allen, & Smith, 1993; Meyer, Paunonen, Gellatly, Goffin, & Jackson, 1989). The uncertainty of the relationship between commitment and superior performance also extends to the relationship between commitment and performance data. Using a well worn equation, Purcell (2004: 3) argued that job commitment and satisfaction are triggered by (P)erformance, (A)bility, (M)otivation and (O)pportunity. In other words, people are predicted to perform well when they: possess the necessary knowledge and skills to be able to do so; when they are adequately incentivised and motivated, and when the work environment provides the necessary support and avenues for expression. Both Mayer and Schoorman (1992) and DeCotiis and Summers (1987) found support for the argument that commitment was positively associated with job performance. Furthermore, job satisfaction has been found to be more strongly aligned with organisational commitment, than with superiors' ratings of performance (Shore & Martin, 1989). Thus, it is worth testing if managers' affective organisational commitment may be associated with their contextual or task performance.

Stress: Difficulties are often attributed to stress yet may actually be symptoms of depression and anxiety. Job related depression and anxiety are aspects of affective wellbeing. Intrinsic and extrinsic stimuli resulting in emotional reactions, determine a person's reactions to stressful situations. Therefore, research on the construct of stress informs the study of the construct of affective wellbeing, and vice versa. Aspects of job satisfaction have been strongly linked with mental and psychological health problems in the workplace. Also mental illness and affective wellbeing in the workplace may be identified in measures of stress. The ASSET instrument is validated and suitable for the measurement of managers' workplace stress, mental health and affective wellbeing (Johnson & Cooper, 2003).

Managers' task and contextual performance

Evidence emerged from the literature to suggest that managers' job performance comprises contextual and task performance domains (Borman & Brush, 1993; Borman & Motowidlo, 1993; Hosie et al., 2006). Activities associated with contextual performance are relatively similar across jobs, whereas activities associated with task performance will vary between jobs. Contextual performance is linked with personality and motivation; while task performance is linked with ability. Contextual performance is discretionary and extra role and not an explicit requirement of the job, while task performance is prescribed and comprises in role behaviour. Despite important recent advances, research into contextual performance is still underdeveloped. Additional research is needed to stabilise the conceptualisation and measurement of contextual performance specifically for managers. Also, it needs to be further clarified whether the antecedents and impact of contextual performance, or other personality domains, are valid predictors of performance. There has been a call to expand the limited amount of research that has been conducted in non English speaking countries (Meyer & Allen, 1997). This process would be substantially aided by the development of the managers' performance instrument for use in different cultures. The managers' performance instrument needs to be further tested in other cultures to provide validation for its use beyond Australia.

Conclusion

The Partial Model represented the initial steps towards the development of a predictive model of managers' performance. The outcome of the empirical research and a thorough review of the literature suggests the incorporation of a wider array of predictors of managers' performance and an acknowledgement of the relationships that exist between them. Individual differences are considered an important element that must be accounted for, particularly, those of age, GMA, personality, conscientiousness and job knowledge. Wellbeing is another consideration, incorporating affective wellbeing, intrinsic job satisfaction, stress and commitment. Performance on the other hand, must be considered in terms of both a managers' task and contextual environment. As a whole, this model suggests a complex set of relationships which are interactive rather than additive in their approach. Empirical data will assist in demonstrating the causal link between certain individual differences and the level of managers' performance, and to determine if there is a causal relationship between affective wellbeing, intrinsic job satisfaction and managers' performance. Indeed, a more comprehensive Model of Predictors of Managers' Performance is devised to determine what other relationships may exist. Opportunities for further research also include: a refinement and extension of the Partial Model, with the addition of other relevant personal and context variables, such as, growth needs strength, opportunities to perform, job challenge

and rewards, career stages, job characteristics, role conflict, role overload and ambiguity, affective commitment and extrinsic job satisfaction. Macro factors, such as culture, also need to be included.

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