

# The use of an entrepreneurial personality measure to develop a sustainable human competitive advantage

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*The study utilised a Chinese sample of working adults (N=299) from a state-owned manufacturing enterprise in China to examine the relationships between Psychological Capital (hope, self-efficacy, optimism, and resilience) and other similar constructs. The initial workings of an Entrepreneurial Personality Measure (EPM) were explicated and a systemic framework proposed for EPM to be used in organisations for the development of an entrepreneurial and sustainable human competitive advantage.*

**E**NTREPRENEURSHIP, as a catalyst for innovation and job creation, has significance for prosperity and well-being at the individual, family, community, and national levels. There is a wealth of research on entrepreneurship in business, economics, management and sociology but psychology's contribution is yet to be fully exploited, demanding a more scientific, systematic approach to the study (Hisrich et al., 2007).

Of the many psychological constructs that are considered to make up an entrepreneurial personality, four in particular were given precedence. These were hope, self-efficacy, optimism, and resiliency, which together make up the core construct of Psychological Capital (PsyCap; Luthans et al., 2007a; 2007b).

Empirical support for the measurement of PsyCap in the Entrepreneurial Personality Measure (EPM; Tan & Jellis, 2011), as well as the practical significance of PsyCap in the Chinese context for an entrepreneurial and sustainable human competitive advantage, are sufficient to justify the choice of construct.

As the relationships between each facet of the PsyCap were cross-examined with other similar constructs, it was proposed through the literature review that:

1. *Hope* (willpower and pathways) and goal orientation (performance approach, performance avoidance, and learning orientations) are distinct, but related constructs. More specifically, intrapreneurs<sup>1</sup> higher in hope will demonstrate (a) a higher learning orientation, and (b) a lower performance avoidance orientation. That is, (a) pathways is positively related to the learning orientation, and (b) willpower is negatively related to the performance avoidance orientation.
2. (a) The *self-efficacy* measured in PsyCap is positively related to the occupational self-efficacy. Intrapreneurs' level of self-efficacy is (b) positively related to hope and (c) positively related to optimism.
3. The *optimism* measured in PsyCap is positively related to an optimistic life orientation. Intrapreneurs who are optimists and who make a positive attribution about

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<sup>1</sup> The entrepreneur construct can be broadened to include those who exhibit innovative and enterprising behaviour within an existing organisation, that is, corporate entrepreneurs or intrapreneurs; the distinction between entrepreneurship and intrapreneurship is that the former is for self-gain while the latter for organisational gain (Hisrich, 1990).

succeeding now and in the future also have positive outcome expectancies or belief that good things will happen.

4. (a) Intrapreneurs' level of *resiliency* and PsyCap is positively related to the ability to keep going despite setbacks (perseverance), having a sense of purpose in life (meaningfulness), the belief in one's self and capabilities (self-reliance), the recognition of one's unique path and acceptance of one's life (aloneness), and having a balanced perspective of life (equanimity). In particular, (b) meaningfulness and perseverance is positively related to hope; (c) self-reliance and aloneness is positively related to self-efficacy; and (d) equanimity is positively related to optimism. That is, intrapreneurs' level of resiliency is (e) positively related to hope, (f) positively related to self-efficacy, and (g) positively related to optimism.

## Method

The cross-sectional design entails the collection of data from 299 employees at a state-owned manufacturing enterprise in northwest China. The data collected is subsequently analysed and examined for patterns of association/relationship between the four variables.

The survey instrument included demographic questions and the 24-item Psychological Capital Questionnaire (PCQ-24; Luthans et al., 2007a; 2007b) measuring PsyCap as a higher order construct; the subscales include hope, self-efficacy, optimism and resiliency. Zweig and Webster's (2004) general three-factor measure of goal orientation was used as an alternative instrument to assess hope; Schyns and von Collani's (2002) occupational self-efficacy scale (OCCSEFF) permitted the investigation of individual differences in self-efficacy associated with various professions and job roles; the revised Chinese version of the Life Orientation Test (LOT-R; Lai et al., 1998) was used to measure optimism among the participants; and Wagnild and Young's (1993) Resilience Scale (RS) was used as an alternative instrument to assess resiliency.

## Results and analysis

1. There was a significant relationship between pathways and learning orientation,  $r=.44$ ,  $p(\text{one-tailed})<.001$ . Besides, learning orientation was also significantly correlated with hope,  $r=.56$ , and willpower,  $r=.46$  (both  $ps<.001$ ); the strength of the relationships was considered to be medium. Of note is that performance avoidance was not significantly related with any of the constructs except performance approach,  $r=.21$ ,  $p<.001$ .
2. The research found a significant relationship between self-efficacy and occupational self-efficacy,  $r=.61$ ,  $p(\text{one-tailed})<.001$ . Intrapreneurs' level of self-efficacy was significantly correlated to hope,  $r=.51$ , and optimism,  $r=.56$ ; so was their occupational self-efficacy to hope,  $r=.65$ , and optimism,  $r=.76$  (all  $ps<.001$ ). The strength of the relationships was considerably large.
3. The relationship between intrapreneurs' optimism and their optimistic life orientation was also found to be significant,  $r=.36$ ,  $p(\text{one-tailed})<.001$ .
4. (a) There was a significant relationship between the resiliency as measured in PsyCap and the resilience measured in the Resilience Scale,  $r=.66$ ,  $p(\text{one-tailed})<.001$ . Specifically, (b) hope was significantly correlated with meaningfulness,  $r=.60$ , and perseverance,  $r=.48$ ; (c) self-efficacy was significantly correlated with self-reliance,  $r=.52$ , and aloneness,  $r=.39$ ; (d) optimism was significantly correlated with equanimity,  $r=.48$ . Intrapreneurs' resiliency was also found to be significantly correlated with (e) hope,  $r=.47$ , (f) self-efficacy,  $r=.41$ , and (g) optimism,  $r=.60$  (all  $ps<.001$ ).

## Discussion

The results seem to suggest that intrapreneurs high in hope tend to concentrate on acquiring skills and increasing competence as they forecast obstacles to achieving goals and engage in learning as an alternative way to reach those goals. The research evidence also seems to suggest identifying and treating performance avoidance as an independent dimension of goal orientation.

The strong correlations found further support for the argument that self-efficacy best meets the inclusion criteria for PsyCap. Significantly strong and positive relationships between general and occupational self-efficacy with optimism (i.e. the positive belief) and hope (i.e. the mobilisation of goal-directed energy to successfully meet work goals) further endorsed the operational definition of self-efficacy as used in the existing study and literature; the three constructs, though related, are distinct.

Optimism and life orientation showed a significantly positive but medium correlation. In other words, intrapreneurs who have a positive attribution about succeeding now and in the future (optimism) tend also to have a positive outcome expectancy or belief that good things will happen (optimistic life orientation). While the two constructs are related, optimism involves more than just a positive outcome outlook but a positive attribution of events, including positive emotions and motivation, and has the caveat of being realistic. This realistic optimism results in a practical evaluation of what can and cannot be accomplished in a particular situation, and adds to one's hope, self-efficacy, and resiliency.

By breaking down resilience into a five-factor structure of meaningfulness, perseverance, self-reliance, aloneness and equanimity, it has made it possible to examine how resiliency may be positively related to hope, self-efficacy and optimism. While there is some conceptual convergence between resiliency and the other PsyCap factors (e.g. intrapreneurs who are hopeful, confident and optimistic are more likely to bounce back from adversity than those who are not), a key distinction between the other constructs and resiliency is the prerequisite of a trigger event (adversity) as does the definition of resilience.

## Conclusion

This study proposes a systematic and systemic framework for the investigation into entrepreneurial personality. Distinctively, the research provides an initial working of the EPM, featuring the PsyCap of hope, self-efficacy, optimism, and resiliency as its foundational construct because it meets the inclusion criteria of being founded in theory and empirical evidence, yet at the same time offering pragmatic applications and advancement of the psychological profession into entrepreneurship research and practice.

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