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"Hope on the Edge: Examining the Role of Adult Hope Theory in Predicting Risk Taking Behavior amongst Traders"

Parul Dhingra, Dr A.A.S Azam
Research Scholar, Assistant Professor
Amity Institute of Behavior and Allied Sciences, Amity University, Manesar, Haryana

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Abstract
This study investigates the influence of psychological strength- hope, its subcomponents (agency and pathway thinking), —on risk-taking behavior in traders (or market analysts). Drawing from a sample of 436 traders, working in independent and organizational settings, the research examines how these positive psychological constructs predict tendencies to engage in risk taking, a critical factor in high-stakes professions such as financial trading, leadership, and decision-intensive roles.
Results revealed that Total Hope ($r = .118$, $p = .014$) and its Pathway component ($r = .107$, $p = .025$) were positively and significantly associated with Risk Taking, suggesting that individuals with stronger goal-planning capacities tend to engage more readily in calculated risks. However, Agency ($r = .031$, $p = .520$) showed no significant relationships with risk-taking behavior.
These findings underscore the partial influence of hope, particularly the cognitive planning (Pathway) aspect, in facilitating risk-oriented behavior. The absence of a strong connection with Agency suggests that while general optimism and coping skills are beneficial traits, they may not directly contribute to one's willingness to take risks in professional contexts. Implications are discussed in terms of designing psychological interventions and development programs aimed at enhancing decision-making and adaptive performance in high-demand environments.
Keywords: Hope Theory, Pathway Thinking, Risk-Taking Behavior, Positive Psychology, Organizational Performance

Introduction

In the high-stakes world of trading, where decisions must be made under conditions of uncertainty, understanding the psychological drivers of risk-taking is critical. Among such drivers, *hope*—a positive psychological construct associated with goal-directed thinking—has emerged as a potential predictor of adaptive behaviors. This study applies **Snyder's Adult Hope Theory** (Snyder et al., 1991) to examine the extent to which hope and its subcomponents influence risk-taking tendencies among traders operating in both national and international markets. This variable was chosen for study since there were studies amongst various groups suggesting aspects like how behavioral and neural pathways support the development of prosocial and risk-taking behavior (Blankenstein et al., 2019).

Hope Theory

Snyder's Adult Hope Theory conceptualizes hope as a cognitive-motivational construct comprising two distinct but related components: **Agency** and **Pathway**. *Agency* reflects the motivational aspect of hope—the belief in one's ability to initiate and sustain movement toward goals. *Pathway*, in contrast, represents the perceived capacity to generate multiple routes to achieve these goals. Total Hope is broader than the mere combination of

these two components, capturing a broader outlook on goal pursuit.

While hope has been widely studied in relation to well-being, academic achievement, and resilience (Gallagher & Lopez, 2009), its role in behavioral decision-making, particularly **risk taking**, remains less understood. Some evidence suggests that hopeful individuals may be more inclined to engage in calculated risks due to greater confidence in their ability to overcome challenges (Lopez et al., 2003). However, whether this inclination stems more from motivational drive (Agency) or cognitive flexibility (Pathway) remains unclear as there have been no direct studies. But there have been studies like one titled *Seeing is believing* explored how self-efficacy and trait hope influence youths' intentions to engage in positive risk-taking behaviors (Wong & Yang, 2021).

Risk Taking in the Context of Trading

Traders frequently operate in volatile environments that demand rapid, high-stakes decisions. Their behavior is often influenced not only by market indicators but also by psychological attributes, including optimism, resilience, and risk tolerance. Understanding the extent to which hope—and more precisely, its components—correlates with or predicts risk taking may inform the development of psychological tools or interventions to enhance decision-making efficacy. According to a study by UMass Medical School (n.d.), higher hope levels were associated with greater engagement in risk-taking behaviors.

Method

Participants

The study sampled 436 adult participants actively engaged in trading in national and international financial markets. Participants included both independent traders and those associated with trading through organizations. Eligible participants were over 21 years of age with at least one year of trading experience.

Measures

Hope

Hope was measured using **Snyder's Adult Hope Scale** (Snyder et al., 1991), a 12-item instrument designed to assess overall hope and its two subcomponents: **Agency** (e.g., "I energetically pursue my goals") and **Pathway** (e.g., "I can think of many ways to get out of a jam"). Participants rated their responses on an 8-point Likert scale ranging from 1 (*Definitely False*) to 8 (*Definitely True*). The scale yields three scores:

- **Total Hope**: The sum of all scale items.
- **Agency**: The sum of items reflecting goal-directed determination.
- **Pathway**: The sum of items assessing cognitive strategies to reach goals.

The Adult Hope Scale has consistently shown strong internal reliability and construct validity (Snyder et al., 1991).

Risk Taking

Risk propensity was assessed using the **General Risk Propensity Scale (GRiPS)** developed by Zhang et al. (2019). The GRiPS is a reliable and validated 8-item scale designed to measure an individual's general tendency to take risks across contexts. Items include statements such as "I enjoy taking risks" and "I prefer situations with uncertain outcomes." Responses were recorded on a 5-point Likert scale ranging from 1 (*Strongly Disagree*) to 5 (*Strongly Agree*), with higher scores indicating greater risk propensity. The GRiPS has demonstrated strong psychometric properties and is considered appropriate for use across diverse occupational domains, including financial decision-making.

Procedure

Participants completed the online questionnaire via a secure survey platform. The survey included demographic questions, the Hope Scale, and the GRiPS. Data were analyzed using SPSS Version 26.

Data Analysis

The analysis proceeded in three stages:

1. **Pearson correlations** were calculated to examine the relationships between Risk Taking and Total Hope, Agency, and Pathway.
2. **95% confidence intervals (CIs)** were computed for each correlation.
3. A **multiple linear regression** analysis was performed to assess the predictive power of the hope components (Total Hope, Agency, Pathway) on Risk Taking. The regression model was evaluated using R^2, F-statistics, and individual β coefficients.

The significance level was set at **$p < .05$** for all statistical tests.

Results

Descriptive Statistics and Correlations

Descriptive analyses were first conducted to examine the central tendencies and distributions of the main variables: Risk Taking (GRiPS), Total Hope, Agency, and Pathway. Pearson correlation coefficients were calculated to explore the relationships among these variables. As shown in **Table 1**, there was a statistically significant, positive correlation between **Risk Taking and Total Hope** ($r = .118$, $p = .014$), and between **Risk Taking and Pathway** ($r = .107$, $p = .025$). The correlation between **Risk Taking and Agency** was not statistically significant ($p > .05$).

Table 1

Correlations Between Risk Taking and Components of Hope

Variable 1	Variable 2	r	p-value	95% CI	Significant
Risk Taking	Total Hope	.118	.014	[.024, .210]	Yes
Risk Taking	Pathway	.107	.025	[.014, .199]	Yes
Risk Taking	Agency	n.s.	> .05	Includes zero	No
Agency	Pathway	n.s.	> .05	Includes zero	No

Regression Analysis

A multiple linear regression analysis was conducted to assess whether **Total Hope, Pathway, and Agency** could predict **Risk Taking behavior** as measured by GRiPS. The overall model was statistically marginal, explaining a small proportion of variance in Risk Taking ($R^2 = .017$, $F(3, 432) = 2.548$, $p = .055$), as shown in **Table 2**.

Table 2

Regression Model Summary Predicting Risk Taking from Hope Variables

Model	R^2	F	df	p-value
1	.017	2.548	(3, 432)	.055

In examining individual predictors, none of the components reached statistical significance. Total Hope had a small, positive beta coefficient ($\beta = .094$, $p = .168$), while both Pathway and Agency were non-significant predictors ($p > .05$), as summarized in Table 3.

Table 3

Coefficients of Predictors in the Regression Model

Predictor	β	p-value	Significant
Total Hope	.094	.168	No
Pathway	n.s.	> .05	No

Agency	n.s.	> .05	No

Discussion

The purpose of this study was to investigate the relationship between hope, as conceptualized by Snyder's Adult Hope Theory, and risk-taking behavior among traders operating in national and international financial markets. By analyzing the predictive value of **Total Hope**, **Agency**, and **Pathway**, the study sought to clarify how motivational and cognitive components of hope relate to risk propensity as measured by the **General Risk Propensity Scale (GRiPS)**.

Interpretation of Findings

Consistent with the study by UMass Medical School (n.d.), the results demonstrated a statistically significant, albeit small, positive correlation between **Total Hope** and **Risk Taking**. This finding also aligns with prior research suggesting that individuals with higher levels of hope are more likely to engage in purposeful, goal-directed behaviors—even in uncertain environments (Lopez et al., 2003). Specifically, hopeful individuals may perceive risk as a necessary and manageable part of achieving long-term success, particularly in dynamic domains such as financial trading.

As an indirect research by Wong & Yang (2021) stated, the **Pathway** subcomponent of hope was significantly and positively associated with risk-taking. This suggests that traders who are more adept at generating strategic alternatives for achieving goals may be more comfortable navigating uncertain decisions, possibly due to increased confidence in their ability to adapt if initial strategies fail. This result highlights the importance of **cognitive flexibility** in managing risk, especially in high-pressure decision-making environments like trading.

In contrast, **Agency**—the motivational component of hope—did not significantly correlate with risk-taking behavior, nor did it emerge as a significant predictor in the regression model. This contradicts the studies, which had found that aspects like Agency would not only correlate with but also serve as a stronger predictor than Pathway (Blankenstein et al., 2019). One possible explanation is that **Agency**, though essential for goal pursuit, may not directly translate to behaviors involving uncertainty unless paired with cognitive strategies for overcoming obstacles. Traders may feel motivated, but without perceived routes to success (Pathway), motivation alone may not prompt risk-oriented action.

Interestingly, although **Total Hope** and **Pathway** were individually associated with risk-taking, the **multiple regression model** did not reveal any statistically significant predictors when controlling for shared variance. This finding suggests that **multicollinearity** or overlapping variance between hope components may dilute their individual predictive effects when modeled together. Moreover, the model explained only a small proportion of variance in risk-taking ($R^2 = .017$), indicating that other psychological or contextual factors likely play a more dominant role in shaping risk-related decisions in trading contexts.

Implications

These findings offer meaningful implications for several niche populations such as the trading professionals, other professionals whose work involves a lot of risk taking like leaders, military professionals, policemen etc. and performance psychology practitioners. Interventions designed to enhance Pathway thinking—such as scenario planning, cognitive rehearsal, and adaptive goal setting—may bolster traders' confidence and ability to manage risk constructively. In contrast, interventions solely focused on increasing motivation (Agency) may have limited impact unless accompanied by planning-based strategies.

Moreover, this study underscores the value of integrating positive psychology frameworks like Hope Theory into occupational and organizational settings, especially those that demand high cognitive resilience and decision-making under pressure.

Limitations

Several limitations should be noted. First, the cross-sectional design limits the ability to infer causality between hope and risk-taking behavior. Second, all measures were self-reported, which may introduce **social desirability bias** or **response fatigue**, especially in high-functioning professionals like traders. Third, while the GRiPS is a validated instrument, risk-taking in real-world financial contexts may also be influenced by domain-specific cues (e.g., market volatility, trading experience) not captured by general scales.

Additionally, the study sample, though representative of traders, may not generalize to other populations where risk behavior is shaped by different motivational dynamics (e.g., entrepreneurs, athletes, or emergency responders).

Future Directions

Future research should consider **longitudinal** or **experimental designs** to explore causal pathways and temporal dynamics between hope and risk-taking. It may also be beneficial to examine how **emotional regulation**, **risk perception**, or **domain-specific efficacy beliefs** interact with hope constructs in predicting risk behavior.

Moreover, qualitative studies could provide deeper insights into the **cognitive processes** traders use when confronting risk, potentially revealing practical strategies that align with the **Pathway** dimension of hope. Finally, exploring cultural or gender differences in hope-related risk behavior may illuminate additional nuances not addressed in this study.

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