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AUTHOR Cheung, Ping Chung  
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## ABSTRACT

This study examined the relationship between ego-oriented or task-oriented motivation on one hand and subjective well-being and perceived ability on the other. Undergraduate (N=124) and graduate (N=212) students at Purdue University responded to a questionnaire by listing up to 10 personal projects and rating the 2 most important ones with respect to perceived ability, motivational orientations, project characteristics, and project satisfaction. Results revealed that academic projects were the most popular personal projects. Satisfaction with projects was found to be positively related to the perceived ability about the project. Hierarchical multiple regression analyses of questionnaire data indicated that motivational orientation had moderating effects on the relationship between project satisfaction and perceived ability about the project. Findings showed that the involvement of self-concept in affect regulation was most salient for ego-oriented (as opposed to task-oriented) subjects, although the relative importance of the project was crucial in eliciting the active involvement of self-concept in affect regulation. The study also identified a new and useful motivational orientation--social solidarity--to expand on the conceptions of motivation characterized by ego orientation and task orientation. References are included. (TE)

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PERCEIVED ABILITY, MOTIVATIONAL ORIENTATIONS, AND  
SATISFACTION WITH PERSONAL PROJECTS

Ping Chung Cheung

The Chinese University of Hong Kong

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# Perceived Ability, Motivational Orientations, and Satisfaction with Personal Projects

Ping-Chung Cheung  
The Chinese University of Hong Kong

In the social-cognitive approach (Dweck & Leggett, 1988; Nicholls, 1984) to motivation and personality, goals or goal orientations provide a crucial link between dispositional antecedents and behavioral consequences. The impact of goals is most salient in the personalization of motivation (Markus & Wurf, 1987; Nuttin, 1984) in which the self is the goal, as well as the goal-setter. Nicholls (1984) pointed out that differentiation of goal orientations could explain individual differences in perceived ability and goal-related behaviors. Ego orientation (desire for superiority), rather than task orientation (desire for understanding), is susceptible to perceived ability. Dweck and Leggett (1988) suggested that two different forms of self-concept, entity and incremental theories, would lead to the setting of two different types of goals for the enhancement and maintenance of self-esteem. While entity theorists conceptualize the self as a collection of fixed traits and tend to set performance goals to gain favorable judgment of competence or avoid negative judgment, incremental theorists conceptualize the self as a system of malleable qualities and tend to set learning goals to increase competence. It is therefore argued that personalization of motivation is most readily observed in ego-oriented people who set performance goals. This argument has obtained some supporting evidence from an experimental study (Elliott & Dweck, 1988) with manipulation of relative goal value (learning vs. performance) and perceived ability (high vs. low). Elliott and Dweck (1988) found that subjects with learning goals indicated challenge-seeking and a mastery-oriented response to failure regardless of perceived ability. In contrast, subjects with performance goals indicated challenge-avoidance and learned helplessness when perceived ability was low and mastery-oriented response in the face of obstacles when perceived ability was high. Such goal-related phenomena are held not to be confined to the laboratory. They should also be manifested in real-life situations.

Recent studies (Ames & Ames, 1984; Wentzel, 1989) on classroom goals have revealed that students may pursue goals social in nature. For example, their goals may be making friends, maintaining peer status, and collaborating with peers. Wentzel (1989) found that the pursuit of social responsibility goals was unique in distinguishing high-achieving from low-achieving students. Thus, the inclusion of a social orientation may build and expand on the approach motivation characterized by ego orientation and task orientation.

The project-analytic framework proposed by Little (1983) is

useful for the investigation of goal-related phenomena in real-life situations. Within this framework, goals can be conceptualized in terms of personal projects or strivings. Some previous studies (Emmons, 1986; Palys & Little, 1983) employing the project-analytic framework have shown that personal projects, personal strivings, or personal goals are useful heuristic devices for understanding individual differences in subjective well-being.

In Emmons' (1986) study of personal strivings and subjective well-being, the conception of success, though crucial in striving assessment, was taken for granted. No distinction was made between one conception of success or goal orientation from another. However, the social-cognitive approach to motivation and personality suggests that differentiation of motivational or goal orientations could clarify the relationship between subjective well-being and perceived ability concerning personal strivings or projects. It is expected to observe interaction between motivational orientations and perceived ability in the satisfaction with personal projects.

## Method

### Subjects

The study included 333 subjects who were recruited in two phases. In the first phase, 124 Purdue University students enrolled in either an introductory psychology course or an introductory educational psychology course were recruited. They received one hour of credit for participating. In the second phase of data collection, a survey was conducted at the two graduate houses on Purdue campus. A total of 434 questionnaires were given out. Within two weeks 212 completed questionnaires were sent back. This made up a return rate of 48.8%. However, three questionnaires were discarded due to missing data. In both phases, subjects responded to a questionnaire by listing up to 10 personal projects and rating two most important ones.

The average age of the subjects in the total sample was 23.1 years ( $SD = 4.5$ ). There were about the same number of males ( $n = 160$ ) and females ( $n = 170$ ). The sex of three subjects was unknown.

### Measures

The subjects rated their two most important personal projects with respect to perceived ability, motivational orientations, project characteristics, and project satisfaction. Most of the items of perceived ability and motivational orientations were adapted from scales used in a previous study (Nicholls, Cheung, Lauer, & Patashnick, 1989). Items were written to assess some important aspects of personal projects identified by previous studies (Emmons, 1986; Palys & Little, 1983). Responses to the

items in each of the four aspects about personal projects were factor analyzed. The factor structures for the two most important personal projects were strikingly similar. This was a sign of high construct validity for the related measures. Based on the results of factor analysis, scales of fairly high reliability were constructed.

Perceived ability. Two scales were constructed to measure the perceived ability about personal projects. The Social Comparison scale (4 items) and the Global Evaluation scale (4 items) had alpha coefficients .82 and .76 for Project A (the first most important personal project) and .83 and .66 for Project B (the second most important personal project) respectively.

Motivational orientations. Three scales were constructed to measure the motivational orientations related to personal projects. The alpha coefficients of the Ego Orientation scale (4 items), the Task Orientation scale (3 items), and the Social Solidarity scale (5 items) were .88, .68, and .80 for Project A and .90, .71, and .87 for Project B respectively.

Project characteristics. A total of four 2-item scales were constructed to measure the characteristics of personal projects. The alpha coefficients of the Effort Needed scale, the Collaboration Needed scale, the Success Probability scale, and the Hindrance scale were .82, .75, .58, and .61 for Project A and .77, .72, .60, and .58 for Project B respectively.

Project satisfaction. Three scales were constructed to tap the interest and positive and negative feelings the subjects had about their important personal projects. The alpha coefficients of the Interest scale (5 items), the Contentment scale (3 items), and the Anxiety scale (2 items) were .86, .79, and .58 for Project A and .85, .82, and .62 for Project B respectively.

## Results

### Students' Concerns and the Characteristics of Personal Projects

Little (1983) isolated twelve content categories of personal projects in his study with university students. Eight of these content categories were found useful in categorizing the personal projects of undergraduates and graduate students in this study. The author himself and another doctoral student in educational psychology coded all the personal projects individually. Interrater agreement was found to be 94%. The descriptions and examples of different types of personal projects are shown in Table 1. All the examples were taken from the protocols of this study. The frequencies of different types of personal projects are shown in Table 2. Academic projects were the most popular, followed by interpersonal and vocational/financial projects.

### Students' Satisfaction with Their Important Personal Projects

The means and standard deviations of the scales of personal

projects are shown in Tables 3A and 3B. The scale means and standard deviations of Project A and Project B were comparable. On the whole, the subjects found their important personal projects fairly interesting. They were rather content with, though a little bit anxious about their personal projects. The correlation between project satisfaction and perceived ability, motivational orientation, and project characteristics can be seen in Tables 4A and 4B. On the whole, perceived ability was positively related to interest and contentment, but negatively related to anxiety. Ego orientation was positively related to anxiety. Task orientation was positively related to interest and anxiety. Social solidarity was positively related to interest and contentment. The characteristics of projects had effects on project satisfaction. Both interest and contentment were positively related to effort needed and success probability, but negatively related to hindrance. On the contrary, anxiety was negatively related to success probability, but positively related to hindrance and effort needed.

Subsequent hierarchical multiple regression analyses indicated that motivational orientation had moderating effects on the relationship between project satisfaction and perceived ability about project (see Tables 5A and 5B). In the prediction of interest in project, motivational orientation accounted for 11% of the variance for Project A and 9% of the variance for Project B. Perceived ability accounted for an additional 11% of the variance for Project A and 10% of the variance for Project B. The set interaction did not account for a significant percentage of variance in both cases. The contribution of motivational orientation was mainly due to task orientation ( $\beta = .23, p < .001$ ;  $\beta = .28, p < .001$ ) and ego orientation ( $\beta = -.18, p < .01$ ;  $\beta = -.12, p < .05$ ). The contribution of perceived ability (after partialling out the effects of motivational orientation) was mainly due to global evaluation ( $\beta = .22, p < .001$ ;  $\beta = .29, p < .001$ ).

In the prediction of contentment with project, motivational orientation accounted for 5% of the variance for project A and 3% of the variance for Project B. Perceived ability accounted for an additional 35% of the variance for Project A and 37% of the variance for Project B. The set interaction did not account for a significant percentage of variance in both cases. The contribution of motivational orientation was mainly due to social solidarity ( $\beta = .18, p < .01$  for Project A;  $\beta = .15, p < .05$  for Project B). The contribution of perceived ability (after partialling out the effects of motivational orientation) was mainly due to global evaluation ( $\beta = .47, p < .001$ ;  $\beta = .44, p < .001$ ) and social comparison ( $\beta = .18, p < .01$ ;  $\beta = .25, p < .001$ ).

In the prediction of anxiety about project, motivational orientation accounted for only 10% of the variance for Project A and 13% of the variance for Project B. Perceived ability accounted for an additional 13% of the variance for Project A and 17% of the variance for Project B. The set interaction accounted for a significant percentage (4%) of the variance in the case of

Project A. The contribution of motivational orientation was mainly due to ego orientation (beta = .26,  $p < .001$  for Project A; beta = .20,  $p < .001$  for Project B). The contribution of perceived ability (after partialling out the effects of motivational orientation) was mainly due to global evaluation (beta = -.37,  $p < .001$ ; beta = -.44,  $p < .001$ ). The contribution of set interaction (after partialling out the effects of motivational orientation and perceived ability) was mainly due to the interaction of ego orientation by global evaluation (beta = .24,  $p < .001$ ).

### Discussion

It was found that academic projects were the most popular among all types of personal projects. This indicates that the students were concerned about their study more than other things. In general, the students were rather content with, though quite anxious about, their important personal projects. They also found their projects fairly interesting.

Consistent with previous findings (Raynor & Nochajski, 1986), satisfaction with project was found to relate positively to the perceived ability about project. This was true for both dimensions of perceived ability: social comparison and global evaluation. Therefore, if people have high self-concept of ability about their projects, they will find them interesting, feel no anxiety about them, and be content with them.

The multifaceted structure of the self-concept revealed in this study contrasts with that in Shavelson's (Shavelson, Hubner, & Stanton, 1976) model. Shavelson and his coworkers construe the self-concept as a hierarchy of self-conceptions in various areas. The results of this study suggest that even in the same area of self-evaluation, people can make judgment at different levels. For example, the level of global evaluation was distinct from the level of social comparison when the subjects evaluated their own ability in personal projects. As most previous studies on perceived ability did not distinguish between the different levels of self-evaluation, confounding of effects might occur and resulted in inconsistency of findings. The differentiation of levels of self-evaluation does not contradict the differentiation of areas of self-perception. On the contrary, they complement each other.

The three motivational orientations correlated with project satisfaction in a different manner. Interest in project was positively related to task orientation and social solidarity, whereas contentment in project was positively related to social solidarity only. Anxiety about project was positively related to ego orientation and task orientation. Nicholls and his colleagues (Nicholls, Patashnick, & Nolen, 1985) found that task orientation but not ego orientation was positively related to satisfaction with school learning. As the personal projects in this study are mostly academic in nature, the correspondence of results is expected. In comparison, social solidarity was solely

related to positive affect and ego orientation was solely related to negative affect. Does this mean that social solidarity is the most desirable and ego orientation the least desirable with regard to project satisfaction? More empirical evidence is needed to answer this question.

The dynamic nature of the self-concept was manifested in the interaction which showed up in the hierarchical regression analysis. As expected, the involvement of the self-concept in affect regulation was most salient for those ego-oriented subjects. It was found that the relationship between project satisfaction and perceived ability was moderated by ego orientation. A closer examination indicated that even though highly ego-oriented subjects might have high perceived ability, they still worried about their projects. Therefore, some seemingly inconsistent relationships between perceived ability and anxiety can be clarified if motivational orientations of people are taken into consideration.

It must be noted that the variance accounted for by the interaction between ego orientation and perceived ability was relatively small and that the interaction only showed up for the first most important project (Project A). This might indicate that the importance of project is crucial in eliciting the active involvement of the self-concept in affect regulation. Although the self-concept may get involved in the regulation process, the relatively weak strength of interaction is not measurable for less important projects. As no previous findings can be compared, replication studies are needed to shed light on the above speculation.

In sum, findings of personal projects in this study reveal the concerns and satisfaction of university students. They also lend support to the social-cognitive approach (Dweck & Leggett, 1988; Nicholls, 1984) to motivation and personality in real-life situations. A new and useful motivational orientation, social solidarity, has been identified in this study. It has the potential to build and expand on the approach motivation characterized by ego orientation and task orientation.



## References

- Ames, C., & Ames, R. (1984). Systems of student and teacher motivation: Toward a qualitative definition. Journal of Educational Psychology, 76, 535-556.
- Dweck, C. S., & Leggett, E. L. (1988). A social-cognitive approach to motivation and personality. Psychological Review, 95, 256-273.
- Elliott, E. S., & Dweck, C. S. (1988). Goals: An approach to motivation and achievement. Journal of Personality and Social Psychology, 54, 5-12.
- Emmons, R. A. (1986). Personal strivings: An approach to personality and subjective well-being. Journal of Personality and Social Psychology, 51, 1058-1068.
- Little, B. R. (1983). Personal projects: A rational and method for investigation. Environment and Behavior, 15, 273-309.
- Markus, H., & Wurf, E. (1987). The dynamic self-concept: A social-psychological perspective. In M. R. Rosenzweig & L. W. Porter (Eds.), Annual review of psychology (vol. 38, pp. 299-337). Palo Alto, CA: Annual Reviews.
- Nicholls, J. G. (1984). Achievement motivation: Conceptions of ability, subjective experience, task choice, and performance. Psychological Review, 91, 328-346.
- Nicholls, J. G., Cheung, P. C., Lauer, J., & Patashnick, M. (1989). Individual differences in academic motivation: Perceived ability, goals, beliefs, and values. Learning and Individual Differences, 1, 63-84.
- Nicholls, J. G., Patashnick, M., & Nolen, S. B. (1985). Adolescents' theories of education. Journal of Educational Psychology, 77, 683-692.
- Nuttin, J. (1934). Motivation, planning, and action: A relational theory of behavior dynamics. Hillsdale, NJ: Erlbaum.
- Palys, T. S., & Little, B. R. (1983). Perceived life satisfaction and the organization of personal project systems. Journal of Personality and Social Psychology, 44, 1221-1230.
- Raynor, J. O., & Nochajski, T. H. (1986). Development of the Motivation for Particular Activity Scale. In D. R. Brown & J. Veroff (Eds.), Frontiers of motivational psychology. Berlin, Germany: Springer-Verlag.
- Shavelson, R. J., Hubner, J. J., Stanton, G. (1976). Self-concept: Validation of construct interpretations. Review of Educational Research, 46, 407-441.

Wentzel, K. R. (1989). Adolescent classroom goals, standards for performance, and academic achievement: An interactionist perspective. Journal of Educational Psychology, 81, 131-142.

Table 1  
 Descriptions and Examples of Different Types of Personal Projects

Type	Description	Example
Academic	related to school	"improve my GPA" "be a good student" "finish degree"
Interpersonal	related to the relationship with other people	"improve relationship with my boy friend" "be a good husband" "impress my boss"
Intrapersonal	related to self; personality, emotion, and abilities are included here	"be more independent" "gain self-esteem" "improve decision making" "listen more and talk less"
Body/health	related to body or health	"lose weight" "improve looks" "eat more healthy food"
Spiritual	related to God or religion	"be a good Christian" "grow in faith" "study the Bible daily"
Recreational/hobbies	related to out-of-school or out-of-work activities of recreational nature	"learn cooking" "learn to play squash" "improve my piano playing" "travel all over the states"
Vocational/financial	related to work, career, or money	"get a job" "be a good physicist" "get my commercial pilot's license" "make money"
Family/home activities	related to some functions that involve family members	"buy a house" "decorate home" "prepare for my wedding"

Table 2  
Frequency of Different Types of Personal Projects

Type	Project A	Project B	Projects A & B
Academic	118	79	197
Interpersonal	64	72	136
Intrapersonal	28	37	65
Body/health	24	44	68
Spiritual	27	8	35
Recreational/ hobbies	10	27	37
Vocational/ financial	42	49	91
Family/home activities	11	8	19

Note. Project A and Project B were the first and second most important personal projects respectively.

Table 3A  
Means and Standard Deviations of the Scales for Project A

Scale	Mean	Standard Deviation
<b>Perceived ability</b>		
Social comparison	3.49	0.80
Global evaluation	2.63	0.87
<b>Motivational orientation</b>		
Ego orientation	3.57	0.95
Task orientation	4.30	0.60
Social solidarity	3.94	0.64
<b>Project characteristics</b>		
Effort needed	3.45	1.08
Collaboration needed	2.89	1.05
Success probability	3.47	0.87
Hindrance	2.79	1.03
<b>Project satisfaction</b>		
Interest	3.90	0.83
Contentment	3.37	0.92
Anxiety	3.47	0.88

Note. All items were rated on a 5-point scale, with 1 indicating the weakest endorsement and 5 indicating the strongest endorsement. The scale means were the averages of the relevant item means.

Table 3B  
Means and Standard Deviations of the Scales for Project B

Scale	Mean	Standard Deviation
<b>Perceived ability</b>		
Social comparison	3.42	0.80
Global evaluation	2.55	0.79
<b>Motivational orientation</b>		
Ego orientation	3.45	1.00
Task orientation	4.24	0.60
Social solidarity	3.86	0.72
<b>Project characteristics</b>		
Effort needed	3.37	1.04
Collaboration needed	2.85	1.04
Success probability	3.42	0.91
Hindrance	2.64	0.95
<b>Project satisfaction</b>		
Interest	3.79	0.82
Contentment	3.32	0.94
Anxiety	3.71	0.87

Note. All items were rated on a 5-point scale, with 1 indicating the weakest endorsement and 5 indicating the strongest endorsement. The scale means were the averages of the relevant item means.

Table 4A  
Correlation between Variables for Project A

Variable	Project Satisfaction		
	Interest	Contentment	Anxiety
Perceived ability			
Social comparison	.28***	.49***	-.18**
Global evaluation	.31***	.59***	-.37***
Motivational orientation			
Ego orientation	-.09	.03	.30***
Task orientation	.23***	.13*	.20***
Social solidarity	.22***	.20***	.07
Project characteristics			
Effort needed	.21***	.32***	.13*
Collaboration needed	.14*	.05	.04
Success probability	.37***	.63***	-.32***
Hindrance	-.41***	-.34***	.32***

\*  $p < .05$ . \*\*  $p < .01$ . \*\*\*  $p < .001$ .

Table 4B  
Correlation between Variables for Project B

Variable	Project Satisfaction		
	Interest	Contentment	Anxiety
<b>Perceived ability</b>			
Social comparison	.25***	.51***	-.15**
Global evaluation	.30***	.58***	-.42***
<b>Motivational orientation</b>			
Ego orientation	-.01	.00	.30***
Task orientation	.27***	.07	.31***
Social solidarity	.17**	.16**	.12*
<b>Project characteristics</b>			
Effort needed	.34***	.45***	.12*
Collaboration needed	.08	.08	.08
Success probability	.40***	.64***	-.18**
Hindrance	-.29***	-.17**	.24***

\*  $p < .05$ . \*\*  $p < .01$ . \*\*\*  $p < .001$ .



Table 5A  
Comparative Contribution to the Prediction of  
Satisfaction with Project A of Motivational  
Orientation and Perceived Ability

Dimension of project satisfaction	Set of predicting variables	R square	R square increase	F change
Interest	Motivational orientation (MO)	.11	.11	13.04***
	Perceived ability (PA)	.22	.11	23.04***
	MO X PA interaction	.24	.02	1.42
Contentment	Motivational orientation (MO)	.05	.05	5.15**
	Perceived ability (PA)	.40	.35	94.98***
	MO X PA interaction	.41	.01	0.74
Anxiety	Motivational orientation (MO)	.10	.10	11.29***
	Perceived ability (PA)	.23	.13	28.60***
	MO X PA interaction	.27	.04	2.50*

\*  $p < .05$ . \*\*  $p < .01$ . \*\*\*  $p < .001$ .

Table 5B  
 Comparative Contribution to the Prediction of  
 Satisfaction with Project B of Motivational  
 Orientation and Perceived Ability

Dimension of project satisfaction	Set of predicting variables	R square	R square increase	F change
Interest	Motivational orientation (MO)	.09	.09	10.23***
	Perceived ability (PA)	.19	.10	19.93***
	MO X PA interaction	.21	.02	0.93
Contentment	Motivational orientation (MO)	.03	.03	2.79*
	Perceived ability (PA)	.40	.37	97.99***
	MO X PA interaction	.42	.02	1.67
Anxiety	Motivational orientation (MO)	.13	.13	15.25***
	Perceived ability (PA)	.30	.17	38.37***
	MO X PA interaction	.33	.03	1.79

\*  $p < .05$ . \*\*\*  $p < .001$ .