Full Length Research Paper

Experiencing creative self-efficacy: A case study approach to understand creativity in blogging

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In the sixty years of the modern study of creativity, numerous approaches have been used to examine motivation in the light of being creative. One of these approaches, creative self-efficacy, has expanded from just three papers twenty years ago to a vibrant subfield of creativity research. However, many studies do not differentiate between self-efficacy for creative thinking and self-efficacy for creative performance. Therefore, a qualitative study is used to examine the dimensions of creative self-efficacy among bloggers. A case study with theoretical sampling is used to develop understanding of creative self-efficacy. Four co-authors of a popular blog were interviewed and the transcripts were then coded to examine major themes. Four of these themes relating to creativity and self-efficacy are then examined in detail.

Key words: Creative, creative thinking, creative performance, self-efficacy, creative self-efficacy, creative performance self-efficacy, creative thinking self-efficacy, case study.

INTRODUCTION

Blogs or informal online chronologies, are ranked through systems similar to citation indices, in which blogs with more and higher quality incoming links are given a higher rank. That is, more favorable peer review - receive a better ranking that blogs that do not (Technorati, nd). Creative self-efficacy, or subjectively-rated confidence in one's ability to produce new and useful solutions to problems, has been shown to predict the emergence of creativity (Abbott, 2010a). Exploring creative self-efficacy within the context of blogging will help advance understanding of both creative self-efficacy and blogging for while creative self- efficacy is a growing subfield of research into motivation (Gist, 1989; Tierney and Farmer, 2002; Beghetto, 2009; Lemons, 2009), there has been no published research on how bloggers experience creative self-efficacy. In this study, a qualitative approach similar to that used in Abbott (2010b) is employed to build an understanding of creative self-efficacy.

Abbreviations: CT, Creative thinking; CP, creative performance; CTSE, creative thinking self-efficacy; CPSE, creative performance self-efficacy.

THE RATIONALE FOR A QUALITATIVE APPROACH

Qualitative approaches are better for constructing meaning while quantitative approaches are better in establishing the effect sizes and correlations between variables (Creswell, 2007, 2008). As this study seeks to explore meaning in particular, how bloggers experience their creativity and creative self-efficacy a qualitative approach is most appropriate.

THE CASE STUDY TRADITION OF INQUIRY

The case study is an efficacious form of research when the objective is to construct an understanding of a phenomenon (Creswell et al., 2007). This investigation is a case study, so the authors of a blog were interviewed and artifacts were in order to better understand the phenomenon of creative self-efficacy.

SAMPLING METHOD

Theoretical sampling was used in this study, as the purpose of this

study is to help generate hypotheses for future research (Creswell, 2008). In particular, the sample consisted of a popular blog and its four authors referred to as H, U, E, and O. This sample was appropriate because it is an example of a blog that is created in the sense of middle C creativity capable of influencing audiences while still being widespread in the population (Gardner, 2004).

DATA COLLECTION

Data collection in a case study involves the collection of information that has already been generated, such as documents, archival records and physical artifacts, as well as new information that is created with the researcher, such as interviews and direct observations (Creswell et al., 2007, p. 248). The objective of collecting information from multiple information sources is "to develop an in-depth understanding of each (participant) and the context in which he or she works". Both interviews and artifacts were collected in the course of this study, but this paper discusses only portions of the interview transcripts.

DATA ANALYSIS

Data was analyzed by the author through coding to link concepts together and break apart ideas that emerge from the interviews in different places and from different participants (Morse and Richards, 2002). The three stages to this analysis are descriptive coding, topic coding and analytic coding. Data analysis was conducted on four text files produced by the internet instant messaging programs used to conduct the interviews. Upon analysis, several themes emerged, including creative performance (CP), creative performance self-efficacy (CPSE), creative thinking (CT) and creative thinking self-efficacy (CTSE).

ETHICAL CONSIDERATIONS

The purpose of ethical rules is to respect the participants, ensure they receive a fair benefit from participating and protect them from harm that may come as a result of the generosity they show in sharing their time and information. All of the guidelines were followed, both in form and in spirit, to protect the rights of the participants.

FINDINGS

Creative thinking

"We could get into a length of philosophical discussion on what creativity is, I suppose!" E responded, when I asked him if focus increases or decreases his creativity.

E emphasized the inner life of the creative person, the inner thoughts that are the substance of creativity. My creativity is not limited to activities of course. What is going on inside my head when doing mundane tasks such as driving is highly creative?

H likewise described creativity thought and creative performance separately, such as when he said on one hand that "part of, if not the majority, of being creative is just the way you are born" but also described what he used to "nourish or strengthen my creative skills and

abilities to see things in different ways." This apparently contradictory stance is solved when talking to U, who noted that creative success "depends on what type of creativity we are talking about," for instance, one's ability to build a car versus finding solutions to problems. Participants appear to agree that while creative performance is a skill that can be improved, creative thought is the focusing of abilities that already exist.

Creative thinking self-efficacy

Creative thought itself is an effortless process of the mind over which an individual has only limited control. As U said in his own words: "Summoning the abilities to think creatively is the first step of creativity. Thinking creatively is the first step. It is the easiest thing to do. I think creatively in the shower, in bed, walking the dog, in the gym, while commuting to work, everytime I have a spare moment I am thinking creatively. Most of those thoughts never leave my head. Sometimes, I decide to express those creative thoughts. That is what is so great about a blog, or at least the type of blog that I write on. I get regular practice at expressing some of the creative thoughts I think about. Doing something creative is the third and final step".

Interestingly, the high self-efficacy for creative thought can coincide with an external locus of control for creative thought. H noted that "it is hard to sit down and focus on being creative," but that "things tend to come together suddenly." H continued that "my best ideas all come at random times, in the shower, on the subway etc." Similarly, O expressed high creative self-efficacy when he said creativity allows him to "decide the variables" to solve, noted that thinking creatively "is not all hard like a math problem." O noted that he is not confident about his ability to do things, but he is "confident in [his] ability to come up with all sorts of ideas about how to do them." However, O simultaneously expressed helplessness when it came to external environment and wished he did not have to "depend on certain locations or 'warm up' time" to be creative.

Creative performance

The mediation that a creative individual performs between his work and the field was directly addressed by U: "the creative act has to meet the goal of whatever is being done," he stated. He continued, "And be accepted by the right people involved. Therefore, we can see certain political implications in doing creative things." U also describes the political aspect of creative production, when he noted that his "challenge is to more carefully 'propose' creative solutions instead of 'advocating' creative solutions." Describing a specific project he had been involved in, U noted that the decision makers in that case "had certain standards they insisted were met."

Summarizing the experience, U noted that he "ultimately worked as a mediator, being creative using what I knew about all the parties involved, but sometimes, I ended up proposing things and becoming too involved, when I should have just let the parties fight it out more often." U's creative production was enabled by his political savvy, and where he fell short, he experienced it as a result of political naivety.

More general thoughts on the importance of recognition in creativity were also obtained from O. O described the process and stated the goal was to "come up with something that people would not believe was made with these tools." Whether a work is experienced as creative depends on the mindset of the audience and not simply the intention of the creative individual. Indeed, O forcefully wrote that, "production is the only thing that counts /me make things/ intent is not good enough" (capitalization and punctuation original).

Creative performance self-efficacy

"Thinking creatively is easy," U said. "Expressing that creative thought is a little more difficult and time-consuming, however, is still a very straightforward task. Implementing something creative takes more." Later in the interview U reiterated his point: "doing something creative is the third and final step. It requires much more-depending on what it is you are doing." And again: "Implementation is the hardest. There are lots of possible hurdles." O said that important to creativity is hard writing. "But I am a lazy bastard, remember. Actual writing, not thinking about it, which is what I do."

Participants several times appeared to indicate powerlessness over their efforts to be creative (which, as participants experienced creativity as joyful, indicates powerlessness over their own reinforcement schedule). "I am too young to do certain things," O (aged 30 years) wrote, one of which is writing. "I figured when I was about 40 or 50 this would happen." He continued: "I blame my schedule, my time, my location, my 'real life,' but I think it is just because I am a slave to my creative pattern." Interestingly, this same helplessness emerged even when creative performance appeared to be easy: "I am not sure if I have ever 'done creative things.' I would rather describe them as happening," H said. Thus, helpless appeared to be present both in cases where it was difficult and when it was easy to be creative. H later would say that "I am confident that I will be able to impress with my writing," but as indicated above, appeared not to express himself as an active agent in the process.

DISCUSSION AND IMPLICATIONS

Self-efficacy is generally connected to Rotter's locus of

control framework, which holds learners who believe they are more able to control their own reinforcement schedule for a learned behavior are more motivated to perform that behavior (Rotter, 1966, 1990). However, self-efficacy is the cognitive locus of operations (Bandura, 1977), or a learner's belief in an ability to perform the task given the totality of the situation and all internal drives (Bandura, 2007). Thus, effortless tasks that a learner has no control over (such as breathing while asleep) would have an external control but a very high self-efficacy. Participants generally reported both a high CTSE and an external locus of control for CT. Creative individuals may have no control over their own creative thought, but are nonetheless very highly self-efficacious with respect to it. The theme of creative performance revealed that participants understood doing creative things as a sociopolitical act. These perspectives recall Sternberg's (2000) emphasis on leadership as a vital aspect of creativity. Example of quotes that illustrated this were U's statements that "we can see certain political implications in doing creative things," as well as H's and E's identification of different social avenues for recognition. Creative performance is a different set of mental abilities than creative thought, both in its attributes and in the experience of individuals. As O emphatically wrote, "production is the only thing that counts /me make things/ intent is not good enough."

This research raises questions over whether CPSE exists as such. U says what he calls implementation "is the hardest. There are lots of possible hurdles," O complains of the hard time he has doing creative things, while H says he is not sure if he has ever "done creative things." Further, U disputed whether such a question made sense; his confidence in his ability to do creative things depended on what sorts of things he was asked to do creatively.

Conclusions

This study raises questions regarding the structural model that underlies creative thinking, CTSE, creative performance and CPSE. While creativity is of course more than just creative self-efficacy, an understanding of the latent structure of creativity should help inform our understanding of the latent structure of creative selfefficacy, and vice versa. That is, suggestions for future research into both the latent structure of creativity creative self-efficacy. A first step to building such a quantitative context for these qualitative results appears in Abbott (2010b) and future steps can be taken using similar methods. For instance, U's discussion of the steps of creative thinking would allow work on a creative selfefficacy inventory to be conducted, by precisely identifying these steps and the tasks involved in each. Likewise, the overall list of themes, codes, and elements that appear in Table 1 presents constructs that should be investigated for their relationship to creative self-efficacy.

Table 1. List of themes, codes and elements.

Theme	Codes	Elements
The joy of creativity	Humor, Joy, Personality	Joy
The ideal of creativity	Confidence, Connections, Critical Thinking, Desire, Masculinity, Models, Nature, Problem solving, Recognition, Resistance, Reverse models	Motivated, Negative models, To be born with, To be desired,
The expression of creativity	Bursts / workstyle, Collaboration, Domain, Experienced, Practice, Writing	Collaboration, Experience, Writing
Creative thoughts	Connections / doubt, Convergences, Discussions, Divergences, Multiple perspectives	Inner life, Mental connections, Multiple perspectives
CTSE	CTSE, Experience, Focus	Locus of control, Unidimensionality
Creative performance	Creative Performance, Experience, Field, Goals, Mediator, Proper fit, Recognition, Skills / ability	Mediation, Recognition, Social situation
CPSE	CPSE, Focus, Overconfidence, Production	Easy, Powerlessness, Multidimensionality
The pain of creativity	Desire, Discouragement, Doubt, Efficacy, Locus of control, Lonely, Need for research, Worry	Alone, Curious

It may be, for instance, that self-reported experiences of joy is related to creative self-efficacy, which in turn predict the strength of the emergence of the specific steps of creative thinking

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APPENDIX A

Informed consent form

Note to reviewers: The informed consent form included has been edited so as to assist in blind review. The blog's name, the researchers involved, and the affiliated university have all been redacted for the review draft of this paper.

INFORMED CONSENT FORM

Identification of project:

Case study of creative bloggers Purpose of the research

This is a research project to study the process of creativity and motivation among bloggers on a blog. You must be 19 years of age or older to participate. You are invited to participate in this study because you are a blogger on the blog, which is an established multiple-author blog.

Procedures

You will be asked four interview questions, not including prompts or queues for more information. This process should take approximately 30 to 45 min.

Risks and/or discomforts

There are no known risks or discomforts associated with this research. In the event of problems resulting from participation in the study, psychological treatment is available at t_____ on a sliding fee scale, telephone ____

Benefits

There are no direct benefits from participating in the study, other than the knowledge that you are assisting in the scientific study of creativity.

Confidentiality

Any information obtained during this study that could identify you will be kept strictly confidential. The data will be stored in password-protected folders on computers in the locked offices of the principal and secondary investigators and will only be seen by the investigators during the study and for three years after the study is complete. The information obtained in this study may be published in scientific journals or presented at scientific

meetings, but the data will be reported as aggregated data.

Compensation

You will receive no compensation for participating in this project.

Opportunity to ask questions

You may ask any questions concerning this research and have those questions answered before agreeing to participate in or during the study. Or you may call the investigator at any time, personal phone, _____. If you have questions concerning your rights as a research subject that have not been answered by the investigator or to report any concerns about the study, you many contact _____, telephone _____.

Freedom to withdraw

You are free to decide not to participate in this study or to withdraw at any time without adversely affecting your relationship with the investigators or _____.

Consent, right to receive a copy

You are voluntarily making a decision whether or not to participate in this research study. Saying "I grant informed consent" certifies that you have decided to participate having read and understood the information presented. You may print out a copy of this informed consent form to keep.

Name and phone number of investigator(s)

APPENDIX B

Interview Protocol

Interview protocol: "Weblog" creativity, talent, and expertise

Interviewer: Date: Time: Participant #:				
Introduction,				
Hello	Thank you for taking	the	time	to

talk to my today about the media access expertise in younger adults. Before we begin, I want to remind you that I am "logging" our conversation today. Do I have your permission to make a textual recording?

[Note response]

I want to assure you that your identity will be kept confidential. I will be asking you a number of questions so feel free to discuss your ideas and views. I have a protocol of questions that I will ask. This interview should take between 30 and 45 min, but I do ask that you not work on other matters during it. Are you ready to begin?

Appendix C

Brief vignettes

The reader would be forgiven for not knowing what year he was in. The monitor has ceased displaying the perfect lines of 21st century technology. Rather, the background of the text is vaguely faded and splotched, as if it was made of paper a century old, left in a library bookshelf. A monograph appears stamped in the upper-left side, and Victorian portraits frame the page. This is the home page the blog featured in this case study.

Yet it is the 21st century, and the whine of the computer's fan declares that this is, if not the British Raj, then at least a Hypertext Raj. Information about contributors H, U, E, and O appear, as well as about individuals they have taken their pseudonyms from. On the day of this visit, the blog prominently featured news and current event from many areas of the world whose voices are often underrepresented.

In the interview U discussed his current job, an attorney in the Pacific Rim. Through our interview U's personality became a dominant force, as he discussed his work on a quarter-billion international construction politics, and his attempt to document and popularizes the once lost (and now restored) kingdoms in an central African state. The main page of blog the blog links to his travelogues across Asia.

If U was expansive, O's manner immediately puts one at ease. "Got my tea and biscuits," the interview began, "Ready to go." O was the only participant to give demographic details in the interview - "White 30 year old" - and he also discussed his wife, who does not speak English. A photogallery of O's impressions of a southwest Asian state is linked to from the front page of the blog.

H, like U and O, painted a picture of an exotic life. In the course of the interview he described his "years of traveling and living abroad," his "many foreign friends," and playing bilingual word games with his wife, whose first language is German. As with U and O, travelogues are given for H's journeys. Indeed, during the interview H

commented that "my personal travel experience has played a large role in giving me both the theoretical and practical sides of issues..." Impressions are available for his journeys through south-west Asia, south-east Europe, and northern Africa.

Less information emerged from E. Aside from comments concerning his high-tech work environment -- "Ventor Linux. Firefox and VL have seem to have occasional disagreements" -- few personal details were offered, and pursuant to the Interview Protocol (Appendix 2), few were asked.

Throughout the interviews that comprise this

[Note response]

1. First, Could you tell me a little about thinking creative thoughts?

=>Are you confident in your ability to do things, like think of things no one else have, or come up with many different responses to a problem?

2. Great. Could you tell me a little about doing creative things?

=> Are you confident in your ability to do things like, find an audience for what you do, or impress people who have the power to publicize your work?

3. Thank you. Could you tell me a little about how being who you are influences how you experience being creative?

=> What about being a guy?

=> What about your age?

=> What about your personality?

4. OK, I see. How do you experience your creativity?

=> What does thinking creative thoughts feel like?

=> What about doing creative things, such as working on your blogs?

=> What else does creativity mean to you, that I forgot to mention?

Thank you.